



Proceedings 11th Annual SEAIR Conference

University Social Responsibility : Pathways to Excellence

November 2-4, 2011, Chiang Mai, Thailand





Proceedings

11th Annual SEAIR Conference

University Social Responsibility: Pathways to Excellence
November 2 – 4, 2011

Research Administration Center

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Chiang Mai 50200, Thailand

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Message From PRESIDENT OF SEAAIR



Dear delegates of SEAAIR 2011 Conference,

On behalf of SEAAIR, we would like to extend a very warm welcome to all participants of the 2011 SEAAIR Annual Conference in Chiangmai, (the Lanna Kingdom), Thailand.

For SEAAIR 2011, 221 Researchers from 9 countries submitted a total of 144 abstracts and 121 were accepted, with a key note speaker supported by ASEF. The 2011 Conference theme, *“University Social responsibility: Pathways to Excellence”* is timely and highly fitting given the continuous changes and challenges higher education institutions are faced with today. We need a review and understanding of what societal responsibility means to us as a higher education institution, the seat of higher learning. University or *“universitas magistrorum et scholarium”* means *“a community of teachers and scholars”* which designates a key university role as the hub of human development through teaching and learning. The end outcome of institutions is the students which are our ultimate responsibility to provide a more pertinent well rounded education that significantly develops the *“total graduate”* as a socially responsible, ethical and moral citizen of a networked global society of the future.

SEAAIR conferences have always aimed to bring together policy-makers, academics, researchers, practitioners and managers in higher education institutions from not only the Southeast Asian region but also from other sister chapters and regions. It continues to aim to expand academic and networking relationships, provide and share new academic, cultural and learning experiences through collaborative efforts via Institutional Research. SEAAIR has grown from strength to strength over the past 11 years to provide a balance of quality academic papers and the rich culture as offered and shared by each host institution in the different countries of Malaysia, Thailand, People’s Republic of China, Indonesia, and the Philippines. We fully believe that the conferences will continue to benefit and built on the academic and cultural learning and sharing as we moves towards ASEAN 2015.

It is hoped that everyone will enjoy the conference learning and sharing, the local favourite hot spots and cultural spots, the local cuisine and the hospitality of the rich traditions and cultures of the Lanna Kingdom. To add to your experience at SEAAIR 2011, the local organizing committee has worked hard to create not only an academic but also an enjoyable and memorable stay in Chiangmai which will highlight the magic of Loy Krathong, the festival of lights in the cool months of November.

We sincerely thank the LOC members and team for the 2011 SEAAIR Conference to take up the challenge of hosting SEAAIR in Chiangmai, Thailand and all participants who will make this conference a success. It is hoped that everyone has not only an enjoyable but a beneficial conference. We also invite everyone to share with us the Borneo heritage when the University Malaysia Sabah, Malaysia welcomes us in 2012. Happy sharing and learning.

Thank you and I remain,

Assoc. Prof. Teay Shawyun, Ph.D
President, SEAAIR



Welcoming ADDRESS

It is with great pleasure and pride that I, on behalf of Chiang Mai University, welcome you to Chiang Mai, Thailand for the South East Asian Association for Institutional Research's 11th Annual SEAAIR Conference, *University Social Responsibility: Pathways to Excellence*, on 2-4 November 2011. We are truly honored to be this year's host, and to uphold this honor, have worked diligently here at Chiang Mai University to organize and deliver what I trust will be a satisfying and valuable conference for all participants. We have not done this alone, however – a special thanks to the SEAAIR Executive Committee and to SEAAIR itself for all of their hard work and support, without which this conference would not be possible.

Chiang Mai University is proud to be a member of SEAAIR, whose work to benefit, assist, and advance research leading to improved understanding, planning, and operations for post-secondary institutions in the region has and continues to benefit us all. While a relatively new association, SEAAIR has already made a substantial impact in institutional research, and I trust that this 11th SEAAIR Conference here in Chiang Mai will add to this already growing legacy.

Chiang Mai University is particularly pleased to host you here in our home, Chiang Mai, a city that encompasses a lively mix of the modern and traditional, providing an exciting and beautiful backdrop to this year's conference that I trust you will all find time to explore.

Welcome fellow colleagues to Chiang Mai and SEAAIR 2011.

Yours sincerely,



Prof. Pongsak Angkasith, Ed.D.
President
Chiang Mai University



Message from CONFERENCE'S CHAIRMAN

On behalf of SEAAIR, and the local organizing committee, I have the great honor of welcoming all participants to the South East Asian Association for Institutional Research's 11th Annual SEAAIR Conference, *University Social Responsibility: Pathways to Excellence*, here in Chiang Mai, Thailand, on November 2-4, 2011. We are looking forward to a highly informative conference, and working together with our colleagues from across the region to increase our understanding and knowledge of institutional research, and the role it can play in helping our regional universities pave a pathway to excellence in social responsibility.

Through sharing of cutting-edge research and practical experience in higher education, we will explore together the themes of: academic endeavors and excellence; institutional research responses and responsibilities; educational and technological advances and applications; institutional capacities and capabilities; quality tenacity and tenants; and new, creative, innovative, and esoteric initiatives.

It is our greatest hope that working together, we can learn and share in such a way as to allow us all to return to our home university, better equipped to develop and deliver *University Social Responsibility: Pathways to Excellence*.

May I extend my warmest welcome to all participants of SEAAIR 2011.

Yours sincerely,

A handwritten signature in black ink, belonging to Assistant Professor Nat Vorayos, Ph.D.

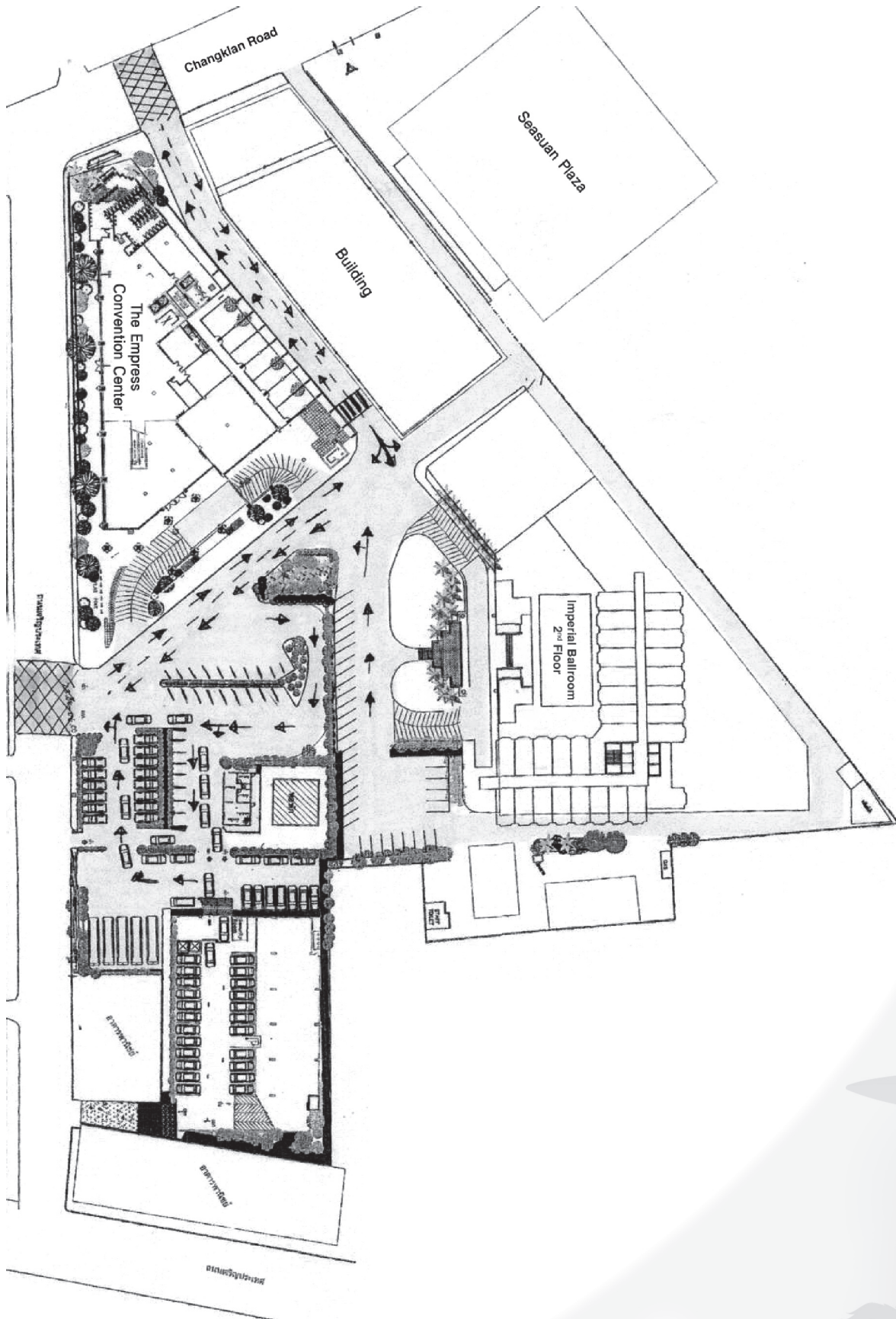
Assistant Professor Nat Vorayos, Ph.D.
11th Annual SEAAIR Conference Chairman

SEAAIR EXECUTIVE COMMITTEE

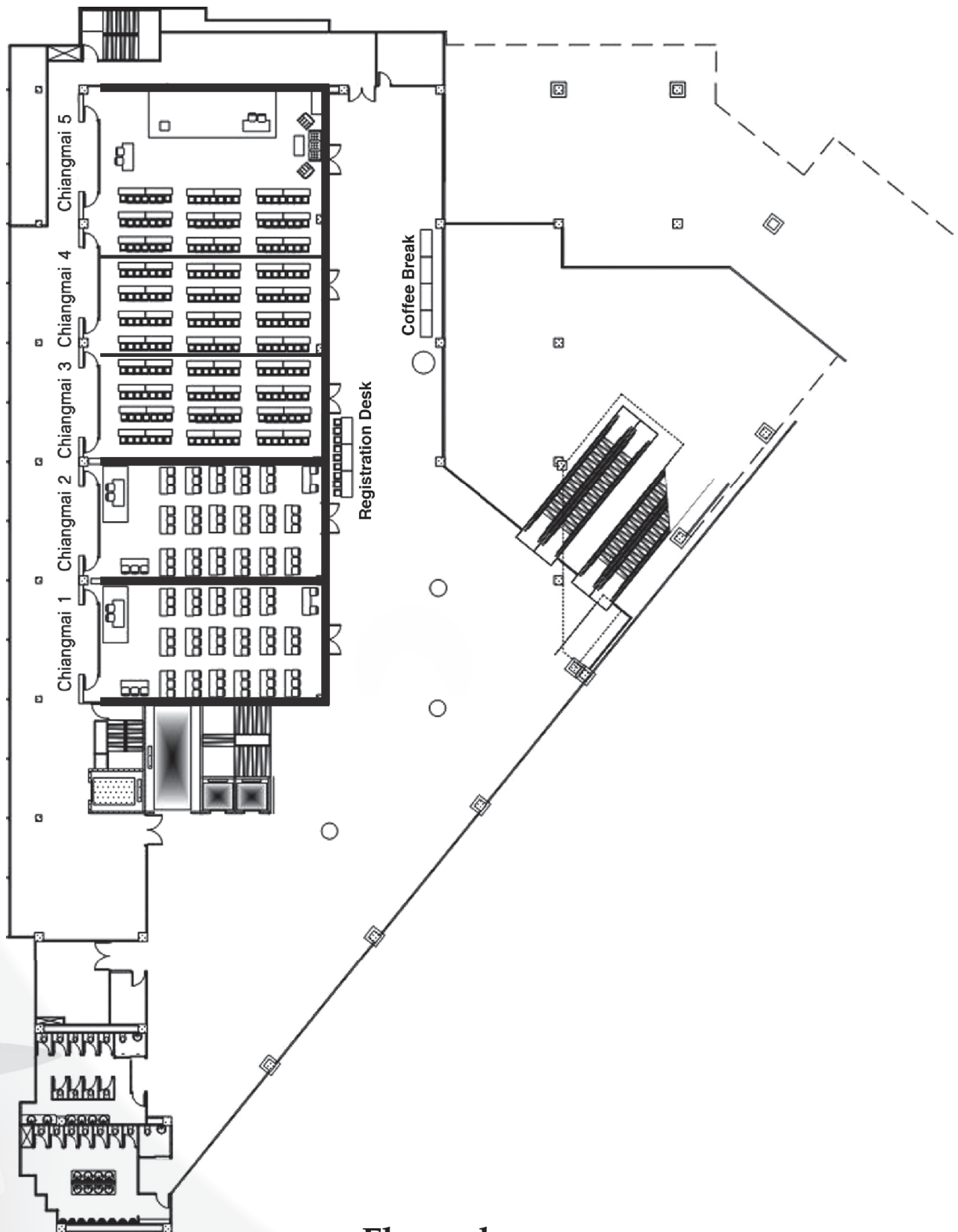
1. **President of SEAAIR**
Teay Shawyun, Assoc. Prof., Ph. D., Assumption University, Thailand
2. **Vice President**
Tatik Suryani, Ph.D., STIE Perbanas Surabaya, Indonesia
3. **Hon. Secretary**
Olivia Legaspi, De La salle University-Dasmarinas, Philippines
4. **Treasurer**
Krisada Tanchaisak, Asst. Prof., Ph.D., Assumption University, Thailand
5. **Immediate past President**
Teay shawyun, assoc. Prof., Ph. D., assumption University, Thailand
6. **Members-at-large**
Raj Sharma, Ph.D., Swinburne University of Technology, Australia Don S. Malabanan, De La Salle University-Dasmarinas, Philippines Sutee Sujitparapitaya, Ph.D., San Jose State University, USA.

LOCAL ORGANIZING COMMITTEE

1. **Local Advisory**
Pongsak Angkasith, Prof., Ed.D.
2. **Steering Committees:**
Nat Vorayos, Asst.Prof., Ph.D.
Jakkapan Sirithunyalug, Assoc. Prof., Dr. rer. nat.
Avorn Opatpatanakit, Assoc. Prof., Ph.D.
Boonsawart Phreksiganon, Assoc. Prof.
Sidthinat Prabudhanitisarn, Ph.D
Nimanong Ngamprapasom, Assoc. Prof., Ph.D.
Pirat Trakarnsirinont, Assoc. Prof.
Rome Chiranukrom, Assoc. Prof.
Sermkiat Jomjunyong, Assoc. Prof., Ph.D.
Niwes Nantachit, Assoc. Prof., M.D.
Wandee Taesotikul, Assoc. Prof.
Theera Visitpanich, Assoc. Prof.
3. **Local Organizing Committee**
 - a. **Conference Co-Chairs**
Nat Vorayos, Asst.Prof., Ph.D.
Avorn Opatpatanakit, Assoc. Prof., Ph.D.
 - b. **Technical program Co-chairs**
Krisada Tanchaisak, Asst. Prof., Ph.D.
Jomjai Sampet, Dr..ror.soc.oec.
 - c. **Finance Co-Chair**
Sansanee Aeuphanwiriyaikul, Asst.Prof., Ph.D.
Thammanoon Noumanong
 - d. **Publication Chair**
Narumon Kimpakorn
Amornlak Trakarnpan
Priraya Rithaporn
 - e. **Information System Chair**
Thanomporn Laohajatsang, Assoc.Prof., Ph.D.
Kasin Prakobwaitayakit, Asst. Prof.
Sakgasit Ramingwong, Ph.D.
 - f. **Logistics and Cultural Co-Chairs**
Pensuwan Nakhapreecha
Wararak Pattanakiatpong
Areerat Sukkasem
Charita Pradipasen



Maps of The Empress Hotels, Chiang Mai



Floor plan
Chiang Mai Meeting Room 2nd Floor
The Empress Convention Center



BIOGRAPHY

Prof. Dr. Saran Kaur Gill

Deputy Vice-Chancellor
(Industry and Community Partnerships)
Universiti Kebangsaan Malaysia
(National University of Malaysia)

Professor Dr Saran Kaur Gill is the first Malaysian Punjabi-Sikh appointed as Deputy Vice-Chancellor (Industry and Community Partnerships) of Universiti Kebangsaan Malaysia (The National University of Malaysia). With this specific portfolio, Saran is responsible for developing mutually beneficial partnerships between the university, industry and community as they support the domains of education, research and service. This is planned for and implemented through the Industry-Liaison Office, the Chancellor's Foundation and the University-Community Partnerships Office.

Attached to the university for more than 30 years, Saran has a diverse background encompassing scholarly pursuits, human resource development and management of large projects. As Head of Academic Training, she collaborated with UNESCO in Bangkok in 1999 to develop and organize workshops on "Asian Women Leaders in Higher Education". In 2004, Saran was appointed member of the UNESCO Scientific Committee for the Asia-Pacific Region for Higher Education, Research and Knowledge. In 1998, she led the intercultural training of 10,000 volunteers for the 16th Commonwealth Games. For her services, Saran in 1999, received the university's Excellence Award for Enhancing the Image of UKM at the National and International Levels, in the category of Human Resource Development.

Saran obtained her PhD from the University of London on an Academic Commonwealth Scholarship. In 2006, she successfully competed for a Fulbright Award to research on "Language Policy: Managing Ethnic, National and International Identities" at the University of Pennsylvania. In 2010, she received the inaugural award of "Education Personality of the Year" from the Australian High Commission in recognition of her efforts in developing Malaysian-Australian educational partnerships.

Through her portfolio, Universiti Kebangsaan Malaysia (UKM) has gained the confidence and trust of many international organisations and is suitably positioned to lead in the area of community engagement. UKM is the secretariat of the **Asia-Talloires Network of Industry and Community Engaged Universities (ATNEU)**. The Talloires Network is based in Tufts University, US and is a network of over 200 universities in 59 countries around the globe, that have a passion for university social responsibility and civic engagement. In addition, UKM has developed a strong relationship with the ASEAN University Network (AUN) and has recently been endorsed as the secretariat of the **AUN thematic network on university social responsibility and sustainability**.



BIOGRAPHY

Prof. Vicharn Panich, MD.

Vicharn Panich was born in 1942 in a village South of Thailand. After MD graduation from the Faculty of Medicine Siriraj Hospital, University of Medical Sciences (now Mahidol University) and one year rotating internship he went to the University of Michigan to study Human Genetics in 1967 – 1968 and received MS in Human Genetics.

He worked as a faculty at the Division of Hematology, Department of Medicine, Faculty of Medicine Siriraj Hospital from 1968 – 1974 where he taught Hematology and Genetics. His research areas was in enzyme G6PD deficiency and thalassemia. Then he moved to Prince of Songkla University in the South to work in a new medical school. His management career began there where he served as Chairman of the Department of Pathology, Vice President of the university and Dean of the Medical School.

In 1993 – 2001 he served as founding director of the Thailand Research Fund (TRF), an autonomous public organization, where he established a good research management systems for the country. From 2003 – 2008 he served as founding director of the Knowledge Management Institute (KMI) under TRF where he worked with partners in developing knowledge management approaches appropriate to various sectors in Thai context. KMI works in networking partners to move Thailand into “Learning Society”.

Dr. Vicharn Panich now serves as Chairman of the Higher Education Commission, Chairman of the University Council of Mahidol University, member of other three university councils, board member of Health Systems Research Institute, board member of Knowledge Network Institute of Thailand, member of Board of Directors of Siam Commercial Bank, and chairman or board member of 7 foundations.

He is married to Dr. Amara (Sawetawan) Panich with 3 daughters and one son.

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Nov. 1, 2011 15:00 – 16:00	Registration <i>Location: 2nd Floor of Empress Convention Centre</i>
Nov. 2, 2011 08:00 – 16:00	Registration <i>Location: 2nd Floor of Empress Convention Centre</i>
09:00 – 09:30	Opening Ceremony <i>Location: Chiang Mai Room 3-4-5</i> Welcome Address Prof. Pongsak Angkasith <i>President, Chiang Mai University</i> Opening Report Asst. Prof. Nat Vorayos <i>Vice President for Research and Academic Affairs</i> Opening Address Assoc. Prof. Teay Shawyun <i>President, SEAAIR</i>
09:30 – 11:00	Keynote speech I <i>Topic: "Institutionalizing Industry and Community Engagement in Higher Education: Challenges and Recommendations Across Asia and Europe"</i> <i>By Prof. Saran Kaur Gill</i> <i>Location: Chiang Mai Room 3-4-5</i> (Break will be served in the session room around 10:30)
11:00 – 12:00	Keynote speech II <i>Topic: "Dual Track University Excellence as a Means towards USR"</i> <i>By Prof. Vicharn Panich, M.D.</i> <i>Location: Chiang Mai Room 3-4-5</i>
12:00 – 12:15	Group photo <i>Location: Chiang Mai Room 3-4-5</i>
12:15 – 13:00	Lunch Break
13:00 – 15:00	Parallel sessions

<i>Session</i>	<i>WPM1-1</i>	<i>WPM1-2</i>	<i>WPM1-3</i>
Topic	<i>Institutional Capacities and Capabilities</i>	<i>Educational and Technological Advances and Applications</i>	<i>IR Responses and Responsibilities</i>
Chair	<i>Shawyun Teay</i>	<i>Tatik Suryani</i>	<i>Krisda Tanchaisak</i>
Location	<i>Chiang Mai Room 3-4-5</i>	<i>Chiang Mai Room 1</i>	<i>Chiang Mai Room 2</i>
13:00 – 13:20	WPM1-1-1	WPM1-2-1	WPM1-3-1
13:20 – 13:40	WPM1-1-2	WPM1-2-2	WPM1-3-2
13:40 – 14:00	WPM1-1-3	WPM1-2-3	WPM1-3-3
14:00 – 14:20	WPM1-1-4	WPM1-2-4	WPM1-3-4
14:20 – 14:40	WPM1-1-5	WPM1-2-5	WPM1-3-5
14:40 – 15:00	WPM1-1-6	WPM1-2-6	

15:00 – 15:40 Coffee Break
15:40 – 17:20 Parallel sessions

<i>Session</i>	<i>WPM2-1</i>	<i>WPM2-2</i>	<i>WPM2-3</i>
Topic	<i>Institutional Capacities and Capabilities</i>	<i>Educational and Technological Advances and Applications</i>	<i>IR Responses and Responsibilities</i>
Chair	<i>Shawyun Teay</i>	<i>Avorn Opatpatanakit</i>	<i>Raj Sharma</i>
Location	<i>Chiang Mai Room 3-4-5</i>	<i>Chiang Mai Room 1</i>	<i>Chiang Mai Room 2</i>
15:40 – 16:00	WPM2-1-1	WPM2-2-1	WPM2-3-1
16:00 – 16:20	WPM2-1-2	WPM2-2-2	WPM2-3-2
16:20 – 16:40	WPM2-1-3	WPM2-2-3	WPM2-3-3
16:40 – 17:00		WPM2-2-4	WPM2-3-4
17:00 – 17:20		WPM2-2-5	WPM2-3-5

18:00 – 20:00 Welcome Party
Location: Imperial Ballroom

Nov. 3, 2011 8:00 – 16:00 **Registration**
Location: 2nd Floor of Empress Convention Centre

9:00 – 10:20 **Parallel sessions**

<i>Session</i>	<i>TAM1-1</i>	<i>TAM1-2</i>	<i>TAM1-3</i>
Topic	<i>Institutional Capacities and Capabilities</i>	<i>Educational and Technological Advances and Applications</i>	<i>Academic Endeavors and excellence</i>
Chair	<i>Olivia Legaspi</i>	<i>Jomjai Sampet</i>	<i>Krisda Tanchaisak</i>
Location	<i>Chiang Mai Room 3-4-5</i>	<i>Chiang Mai Room 1</i>	<i>Chiang Mai Room 2</i>
9:00 – 9:20	TAM1-1-1	TAM1-2-1	TAM1-3-1
9:20 – 9:40	TAM1-1-2	TAM1-2-2	TAM1-3-2
9:40 – 10:00	TAM1-1-3	TAM1-2-3	TAM1-3-3
10:00 – 10:20	TAM1-1-4	TAM1-2-4	

10:20 – 10:30 Coffee Break
10:30 – 11:50 Parallel sessions

<i>Session</i>	<i>TAM2-1</i>	<i>TAM2-2</i>	<i>TAM2-3</i>
Topic	<i>Institutional Capacities and Capabilities</i>	<i>Quality Tenacity and Tenets</i>	<i>Academic Endeavors and excellence</i>
Chair	<i>Olivia Legaspi</i>	<i>Jomjai Sampet</i>	<i>Don S. Malabanan</i>
Location	<i>Chiang Mai Room 3-4-5</i>	<i>Chiang Mai Room 1</i>	<i>Chiang Mai Room 2</i>
10:30 – 10:50	TAM2-1-1	TAM2-2-1	TAM2-3-1
10:50 – 11:10	TAM2-1-2	TAM2-2-2	TAM2-3-2
11:10 – 11:30	TAM2-1-3	TAM2-2-3	TAM2-3-3
11:30 – 11:50	TAM2-1-4		TAM2-3-4

11:50 – 13:00 Lunch Break
13:00 – 14:40 Parallel sessions

<i>Session</i>	<i>TPM1-1</i>	<i>TPM1-2</i>	<i>TPM1-3</i>
<i>Topic</i>	<i>Institutional Capacities and Capabilities</i>	<i>New, Creative, Innovative and Esteric Initiatives</i>	<i>Academic Endeavors and excellence</i>
<i>Chair</i>	<i>Don S. Malabanan</i>	<i>Tatik Suryani</i>	<i>Raj Sharma</i>
<i>Location</i>	<i>Chiang Mai Room 3-4-5</i>	<i>Chiang Mai Room 1</i>	<i>Chiang Mai Room 2</i>
13:00 – 13:20	TPM1-1-1	TPM1-2-1	TPM1-3-1
13:20 – 13:40	TPM1-1-2	TPM1-2-2	TPM1-3-2
13:40 – 14:00	TPM1-1-3	TPM1-2-3	TPM1-3-3
14:00 – 14:20		TPM1-2-4	TPM1-3-4
14:20 – 14:40		TPM1-2-5	TPM1-3-5

14:40 – 15:40 Coffee Break
15:40 – 17:00 Parallel sessions

<i>Session</i>	<i>TPM2-1</i>	<i>TPM2-2</i>	<i>TPM2-3</i>
<i>Topic</i>		<i>New, Creative, Innovative and Esteric Initiatives</i>	<i>Academic Endeavors and excellence</i>
<i>Chair</i>		<i>Don S. Malabanan</i>	<i>Avorn Opatpatanakit</i>
<i>Location</i>	<i>Chiang Mai Room 3-4-5</i>	<i>Chiang Mai Room 1</i>	<i>Chiang Mai Room 2</i>
15:40 – 16:00		TPM2-2-1	TPM2-3-1
16:00 – 16:20		TPM2-2-2	TPM2-3-2
16:20 – 16:40		TPM2-2-3	TPM2-3-3
16:40 – 17:00		TPM2-2-4	TPM2-3-4
17:00 – 17:20			TPM2-3-5

17:45 Bus leaves the Empress Convention Centre
19:00 – 21:00 Banquet
Location: Khum Khantoke

Nov. 4, 2011 8:00 – 10:30 **Annual General Meeting**
Location: Chiang Mai Room 3-4-5
10:30 – 11:00 **Closing Ceremony**
Location: Chiang Mai Room 3-4-5
11:00 – 12:30 **Lunch Break**
12:30 Bus leaves the Empress Convention Centre
13:30 – 18:00 **Tours** (participants have to register for this tour with the conference registration)
Location: Huai Hongkhrai Royal Development Study Center

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Oral Presentation

Wednesday November 2, 2011

13:00 – 15:00 hr.

WPM1-1

Institutional Capacities and Capabilities

Chair(s): Shawyun Teay

Location: Chiang Mai Room 3-4-5

- | | | |
|----------------------|-----------------|--|
| 13:00 – 13:20 | WPM1-1-1 | The Use of Strategic Management Approach in University Social Responsibility Planning and Implementation
(P. 21)
<i>Duangduen Chancharoen, Narat Wattanapanit, Nathee Kerdaroon, Parichat Noentong and Pornpen Oggungwal</i> |
| 13:20 – 13:40 | WPM1-1-2 | Strategic USR Management Framework
(P. 26)
<i>Teay Shawyun</i> |
| 13:40 – 14:00 | WPM1-1-3 | Learning Experience: Does it Matter for Institutions to Provide Conducive Teaching Environment?
(P. 36)
<i>Norhanim Dewa, and Sabarudin Zakaria</i> |
| 14:00 – 14:20 | WPM1-1-4 | Strategic Analysis of Students' Interests Mapping to Forecast and Develop Higher Education Institution's International Competitiveness
(P. 42)
<i>Lindiawati</i> |
| 14:20 – 14:40 | WPM1-1-5 | Effects of Unconscious Reframing in Diminishing Sexual Orientation of Young Male Homosexuals in an Exclusive School in Metro Manila
(P. 47)
<i>Maria Loida Faye C. Borbon</i> |
| 14:40 – 15:00 | WPM1-1-6 | Lecturers' and Employees' Perception on GCG Implementation in Widyatama University
(P. 53)
<i>Rafael G. Aida W., and Lasmanah</i> |

WPM1-2

Educational and Technological Advances and Applications

Chair(s): Tatik Suryani

Location: Chiang Mai Room 1

- | | | |
|----------------------|-----------------|--|
| 13:00 – 13:20 | WPM1-2-1 | Effect of Women and Men Students' Attitudes On Corporate Responsibility in Society Effect
(P. 59)
<i>Triana Mayasari, and Erida Herlina</i> |
| 13:20 – 13:40 | WPM1-2-2 | How the Internet is Related to Metacognitive Strategies Used in Academic Writing: The Smooth Combination of Technology and Education
(P. 64)
<i>Urrat Parnrod</i> |
| 13:40 – 14:00 | WPM1-2-3 | Student's Intensity and Practice's Skill on Integrating Technology into Bank Accounting Course
(P. 69)
<i>Diyah Pujiati, and Nanang Shonhadji</i> |
| 14:00 – 14:20 | WPM1-2-4 | A Community-Driven Research Initiative: Acoustic Technology for Non-Destructive Evaluation to Increase Export Value of Mangosteens
(P. 75)
<i>Hathaichanok Thavichai, Nattapong Swangmuang, Kasemsak Uthaichana, Nipon Theera-Umpon, Hideyuki Sawada, and Tanachai Pankasemsuk</i> |
| 14:20 – 14:40 | WPM1-2-5 | Analysis of Multiple Choice Tests for the University Entrance Test
(P. 80)
<i>Moedjadi Hardjosuwito, and Alfiah Hasanah</i> |
| 14:40 – 15:00 | WPM1-2-6 | The Application of Innovative Progressive Learning Model on Entrepreneurship Course Delivered in University of Ciputra
(P. 88)
<i>Tina Melinda</i> |

WPM1-3
IR Responses and Responsibilities

Chair(s): Krisda Tanchaisak
Location: Chiang Mai Room 2

- | | | |
|----------------------|-----------------|---|
| 13:00 – 13:20 | WPM1-3-1 | Students' Perceptions and Participations towards Social Contribution Activities
(P. 92)
<i>Krisda Tanchaisak</i> |
| 13:20 – 13:40 | WPM1-3-2 | Corporate Social Responsibility (CSR) in Higher Educational Institute: Senior Management Perspectives: A Case Study of Chiang Mai University
(P. 98)
<i>Narumon Kimpakorn, Boonsawat Prugsiganont, Robert E., Waters, Jr., Tanya Promburom, and Jomjai Sampet</i> |
| 13:40 – 14:00 | WPM1-3-3 | University Social Responsibility: Pathways of Lampang Rajabhat University
(P. 103)
<i>Duangchan Diowvilai, Chutima Khamboonchoo, Duangjai Pille, and Pongprad Soonthornpasuch</i> |
| 14:00 – 14:20 | WPM1-3-4 | Student Transition Rates in an Australian Higher Education Institution
(P. 106)
<i>Andrias Paramita</i> |
| 14:20 – 14:40 | WPM1-3-5 | Aligning of Knowledge Management and People Management (Case of Private University in Indonesia)
(P. 112)
<i>Dyah Kusumastuti, and Haryanto Prabowo</i> |

Wednesday November 2, 2011
15:40 – 17:20 hr.

WPM2-1
Institutional Capacities and Capabilities

Chair(s): Shawyun Teay
Location: Chiang Mai Room 3-4-5

- | | | |
|----------------------|-----------------|--|
| 15:40 – 16:00 | WPM2-1-1 | Mapping the Recruitment Method of New Employees for Managing Job Preparation Program in Higher Education
(P. 118)
<i>Harry Widyantoro, and Tjahjani Prawitowati</i> |
| 16:00 – 16:20 | WPM2-1-2 | The Effect of Alignment between Personal and Organization Ambition on Student Engagement and Satisfaction
(P. 123)
<i>Tjahjani Prawitowati, and Harry Widyantoro</i> |
| 16:20 – 16:40 | WPM2-1-3 | What Happens to Organization Performance in the Dimension of Bundling Strategic Resource with IT Capabilities?
(P. 127)
<i>Warrapojn Panrod, and Kaedsiri Jaroenwisian</i> |

WPM2-2
Educational and Technological Advances and Applications

Chair(s): Avorn Opatpatanakit
Location: Chiang Mai Room 1

- | | | |
|----------------------|-----------------|---|
| 15:40 – 16:00 | WPM2-2-1 | Developing and Improving the Quality of Learning Process in Higher Education By E-Learning (Moodle – Forum Software)
(P. 133)
<i>Romanus Wilopo</i> |
| 16:00 – 16:20 | WPM2-2-2 | The Effectiveness of EQ Intervention Program (EQuIP) in Strengthening the Emotional Competence of Transnational Students with Absentee Parents
(P. 139)
<i>Jenneth G. De Guia</i> |
| 16:20 – 16:40 | WPM2-2-3 | The Effectiveness of Modified-Systematic Desensitization Program in Reducing Levels of Test Anxiety and Enhancing Accounting Achievement
(P. 145)
<i>M.J. Arquion</i> |
| 16:40 – 17:00 | WPM2-2-4 | The Effectiveness of the Weblog Used as an Online Computer Assisted Learning Tool on Enhancing Writing Abilities of Low- Intermediate EFL Students
(P. 151)
<i>Thanawan Suthiwartnarueput, and Punchalee Wasanasomsithi</i> |
| 17:00 – 17:20 | WPM2-2-5 | Perceptions of Teachers in Portfolio Assessment in Teaching Math & Science Concepts
(P. 157)
<i>Mary Joan Guzman</i> |

WPM2-3 IR Responses and Responsibilities

Chair(s): Raj Sharma
Location: Chiang Mai Room 2

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|----------------------|-----------------------------|--|
| 15:40 – 16:00 | WPM2-3-1
(P. 163) | Exploring the Technology Readinnes of Business Students in an E-learning Environment Business College
<i>Emma Yulianti, and Laila Saleh Marta</i> |
| 16:00 – 16:20 | WPM2-3-2
(P. 167) | Implementation of Student Centered Learning Model in Teaching Learning Process to Increase the Students' Performance and Core Competency
<i>Lia Amaliaziati, Asfia Murni, and Wawan Wirahmana</i> |
| 16:20 – 16:40 | WPM2-3-3
(P. 173) | Students' Perceptions Regarding Ramkhamhaeng University's Social Responsibility Practices
<i>Narat Wattanapanit</i> |
| 16:40 – 17:00 | WPM2-3-4
(P. 179) | Defining and Redefining the Graduates: The STMTCC Thrust on Institutional Development
<i>Ma. Rhona J. Pelasol</i> |
| 17:00 – 17:20 | WPM2-3-5
(P. 185) | University Social Responsibility: Training of Accounting to support Small and medium Enterprise (SMEs)
<i>Intan Oviantari</i> |

**Thursday November 3, 2011
9:00 – 10:20 hr.**

TAM1-1 Institutional Capacities and Capabilities

Chair(s): Olivia Legaspi
Location: Chiang Mai Room 3-4-5

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|----------------------|-----------------------------|--|
| 9:00 – 9:20 | TAM1-1-1
(P. 189) | Good Governance Management Model for Ratchaburi Subdistrict Administration Organization
<i>Nakom Teerasuwannajuck</i> |
| 9:20 – 9:40 | TAM1-1-2
(P. 194) | Mangrove Throughout the Years: Its Narrative Development and Social Relevance
<i>Araceli C. Doromal</i> |
| 9:40 – 10:00 | TAM1-1-3
(P. 200) | Promoting Developmental Outcomes for Children-in-Conflict with the Law: A DLSU-D Framework
<i>Alice T. Valerio</i> |
| 10:00 – 10:20 | TAM1-1-4
(P. 206) | The Lessons that Students Learned from their Engagement in Community Outreach Activities
<i>Olivia M. Legaspi</i> |

TAM1-2 Educational and Technological Advances and Applications

Chair(s): Jomjai Sampet
Location: Chiang Mai Room 1

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|---------------------|-----------------------------|---|
| 9:00 – 9:20 | TAM1-2-1
(P. 210) | Applying the Rational Unified Process (RUP) Approach to Implement eLearning at Saint Mary's University of Bayombong, Nueva Vizcaya
<i>Gertrude G. Danao</i> |
| 9:20 – 9:40 | TAM1-2-2
(P. 216) | Non-Degree Program's Student Information System [NDP-SIS] A Development of a Student Life Cycle Management System for De La Salle-College of Saint Benilde
<i>Mateo R. Borbon, Jr.</i> |
| 9:40 – 10:00 | TAM1-2-3
(P. 220) | USR – A Program Structure Approach
<i>Nirwan Idrus</i> |

- 10:00 – 10:20 TAM1-2-4** A Comparison of the Achievement of First Year Students in English II
(P. 226) (222102) Class via Student Teams-Achievement Division (STAD) Method
and Lecture Method
Rinda Warawudhi

TAM1-3

Academic Endeavors and excellence

Chair(s): Krisda Tanchaisak
Location: Chiang Mai Room 2

- 9:00 – 9:20 TAM1-3-1** What Fundamental Lawyering Skills do Law Students of Chiang Mai
(P. 231) University Need to Improve Their Legal Practice Ability?
Chainarong Luengvilai, and Pitipong Yodmongkon
- 9:20 – 9:40 TAM1-3-2** Interpersonal Skills Learning in Information System Department for
(P. 237) Developing Soft Skills and Caring Attitude
Faza Faikar Cordova, and Erma Suryani
- 9:40 – 10:00 TAM1-3-3** Exploring Undergraduate Students' Learning Difficulties Through Multiple
(P. 243) Intelligence Theory
Tajularipin Sulaiman, Roselan Baki, and Wan Marzuki Wan Jaafar

Thursday November 3, 2011
10:30 – 11:50 hr.

TAM2-1

Institutional Capacities and Capabilities

Chair(s): Olivia Legaspi
Location: Chiang Mai Room 3-4-5

- 10:30 – 10:50 TAM2-1-1** Developing Hardskill and Softskill for Improving Students Performance
(P. 249) in Accounting Department at Stie Perbanas Surabaya
Gunasti Hudiwinarsih, and Supriyati
- 10:50 – 11:10 TAM2-1-2** Opportunities and Challenges in Solid Waste Management
(P. 254) *Araceli C. Doromal*
- 11:10 – 11:30 TAM2-1-3** Analysis of Community Service Implementation in Supporting the Growth
(P. 260) of Micro and Small Enterprise
Lasmanah, and Rafael G. Aida Wijaya
- 11:30 – 11:50 TAM2-1-4** The Development Concept of Service Quality at Student Affairs
(P. 265) Deptmt of Widyatama University Using Factor Analysis
Tezza Adriansyah Anwar, and Ayuningtyas Yuli Hapsari

TAM2-2

Quality Tenacity and Tenets

Chair(s): Jomjai Sampet
Location: Chiang Mai Room 1

- 10:30 – 10:50 TAM2-2-1** Students' Perception On Attraction And Service Satisfaction In STIE
(P. 271) Perbanas Surabaya
Soni Harsono
- 10:50 – 11:10 TAM2-2-2** PACUCOA Level IV Accreditation of Marine Engineering Program:
(P. 276) Response to Quality Education and Training in the Philippines
Rolando A. Alimen, and Ralph. L. Pador
- 11:10 – 11:30 TAM2-2-3** The Sertec Legacy: What Were the Quality Assurance Practices Perceived
(P. 280) to be Most Effectiveness in Former Teknikons?
Jacob Selesho

TAM2-3
Academic Endeavors and excellence

Chair(s): Don S. Malabanan
Location: Chiang Mai Room 2

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|----------------------|-----------------------------|--|
| 10:30 – 10:50 | TAM2-3-1
(P. 283) | Higher Education Readiness to Implement International Financial Reporting Standard (IFRS) and Changing International Environment
<i>Nanang Shonhadji</i> |
| 10:50 – 11:10 | TAM2-3-2
(P. 288) | Entrepreneur Self-Efficacy Influence of Interest to Students For Entrepreneurship The Role of Gender Differences Moderation
<i>Aniek Maschudah Ilfitriah, and Emma Yulianti</i> |
| 11:10 – 11:30 | TAM2-3-3
(P. 293) | Advancing Genuine Development through University Social Responsibility
<i>Rio R. Mazo</i> |
| 11:30 – 11:50 | TAM2-3-4
(P. 297) | The Impact of Promotional Mix to Widyatama University's Brand Image in the District of Cinajur (Research at High Schools in the District of Cianjur)
<i>Adam Faritzal, and Sri Wiludjeng Sp</i> |

Thursday November 3, 2011
13:00 – 14:40 hr.

TPM1-1
Institutional Capacities and Capabilities

Chair(s): Don S. Malabanan
Location: Chiang Mai Room 3-4-5

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|----------------------|-----------------------------|---|
| 13:00 – 13:20 | TPM1-1-1
(P. 311) | Institutional Research Capabilities of a Maritime University in Asia: Pathway towards Global Excellence in Maritime Education
<i>Rolando A. Alimen, and Cicero D. Ortizo</i> |
| 13:20 – 13:40 | TPM1-1-2
(P. 318) | An Exploratory Study of University X's State of Readiness in Scholarship of Teaching, Shared Governance and Change Management
<i>Hamzah Bin Md.Omar, and Mohd Khairuddin Abdullah</i> |
| 13:40 – 14:00 | TPM1-1-3
(P. 324) | Quality of Physical Service and Environment Provided for Students Learning in Chandrakasem Rajabhat University
<i>Staporn Tawonatiwas, Phachamon Jaisaard, and Pattaraporn Kitchainukoon</i> |

TPM1-2
New, Creative, Innovative and Esteric Initiatives

Chair(s): Tatik Suryani
Location: Chiang Mai Room 1

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|----------------------|-----------------------------|---|
| 13:00 – 13:20 | TPM1-2-1
(P. 328) | Music Therapy for Physically Disabled Children
<i>Jakkrit Klaphajone, Lakkana Thaikruea, Annette Janine George, and Anuruk Tantong</i> |
| 13:20 – 13:40 | TPM1-2-2
(P. 334) | Community Service based Learning as USR Program and the Impact for Marketing University
<i>Tatik Suryani</i> |
| 13:40 – 14:00 | TPM1-2-3
(P. 340) | Waste Segregation in De La Salle University – Dasmariñas
<i>Je Johari dela Cruz</i> |
| 14:00 – 14:20 | TPM1-2-4
(P. 342) | Environmental Hazards in the housing of older people from the academic staff of AMS, CMU
<i>Supawadee Putthinoi, and Nopasit Chakpitak</i> |
| 14:20 – 14:40 | TPM1-2-5
(P. 347) | Using Knowledge Management To Drive Creative Cities in Thailand
<i>Korawan Sangkakorn</i> |

TPM1-3
Academic Endeavors and excellence

Chair(s): Raj Sharma
Location: Chiang Mai Room 2

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|----------------------|-----------------------------|---|
| 13:00 – 13:20 | TPM1-3-1
(P. 351) | USR – A Pedagogy Dilemma in Asia
<i>Nirwan Idrus</i> |
| 13:20 – 13:40 | TPM1-3-2
(P. 356) | Collective Efficacy Amongst Secondary School Teachers in Kota Belud, Sabah
<i>Dewi Isma Madzlan, Khalid Johari, Shukri Zain, and Melati Jilon</i> |
| 13:40 – 14:00 | TPM1-3-3
(P. 365) | Non-Completion of Degrees in the College of Education Graduate Studies: Causes and Recommended Solutions
<i>Olivia M. Legaspi, Maria Luisa S. Abiador, and Dina U. Gagasa</i> |
| 14:00 – 14:20 | TPM1-3-4
(P. 370) | Role Play Method of Teaching for Improving the Students Academic Performance in Banking Laboratory Course
<i>Anggraeni</i> |
| 14:20 – 14:40 | TPM1-3-5
(P. 375) | The Influence of the Graduate Faculty's Habits of Mind On the Relationship Between Their Core-Self Evaluations and Adult Learning Practices: Implications to Graduate School Teaching
<i>Ma. Florecilla C. Cinches</i> |

Thursday November 3, 2011
15:40 – 17:20 hr.

TPM2-2
New, Creative, Innovative and Esteric Initiatives

Chair(s): Don S. Malabanan
Location: Chiang Mai Room 1

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| 15:40 – 16:00 | TPM2-2-1
(P. 381) | Redefining the Sunset Years: The Lived Experiences of Retired University Educators in Bridge Employment
<i>Noel S. Marañon</i> |
| 16:00 – 16:20 | TPM2-2-2
(P. 387) | Emotional Intelligence and the Work Performance of the Fulltime Faculty of a Sectarian Institution: Implications to Personal and Social Competencies
<i>Ana Lee P. Garcia, and Mam</i> |
| 16:20 – 16:40 | TPM2-2-3
(P. 393) | Environmentally Responsible Individuals: Challenge to Sustainable Environmental-Friendly Management
<i>Rolando A. Alimen, Marietta Agustin-Teaño, and Cicero D. Ortizo</i> |
| 16:40 – 17:00 | TPM2-2-4
(P. 397) | Lived Experiences and Lessons Learned: The Case of Seven Effective School Leaders in the Philippines
<i>Nieves M. Medina, and Lester Luis U. Medina</i> |

TPM2-3
Academic Endeavors and excellence

Chair(s): Avorn Opatpatanakit
Location: Chiang Mai Room 2

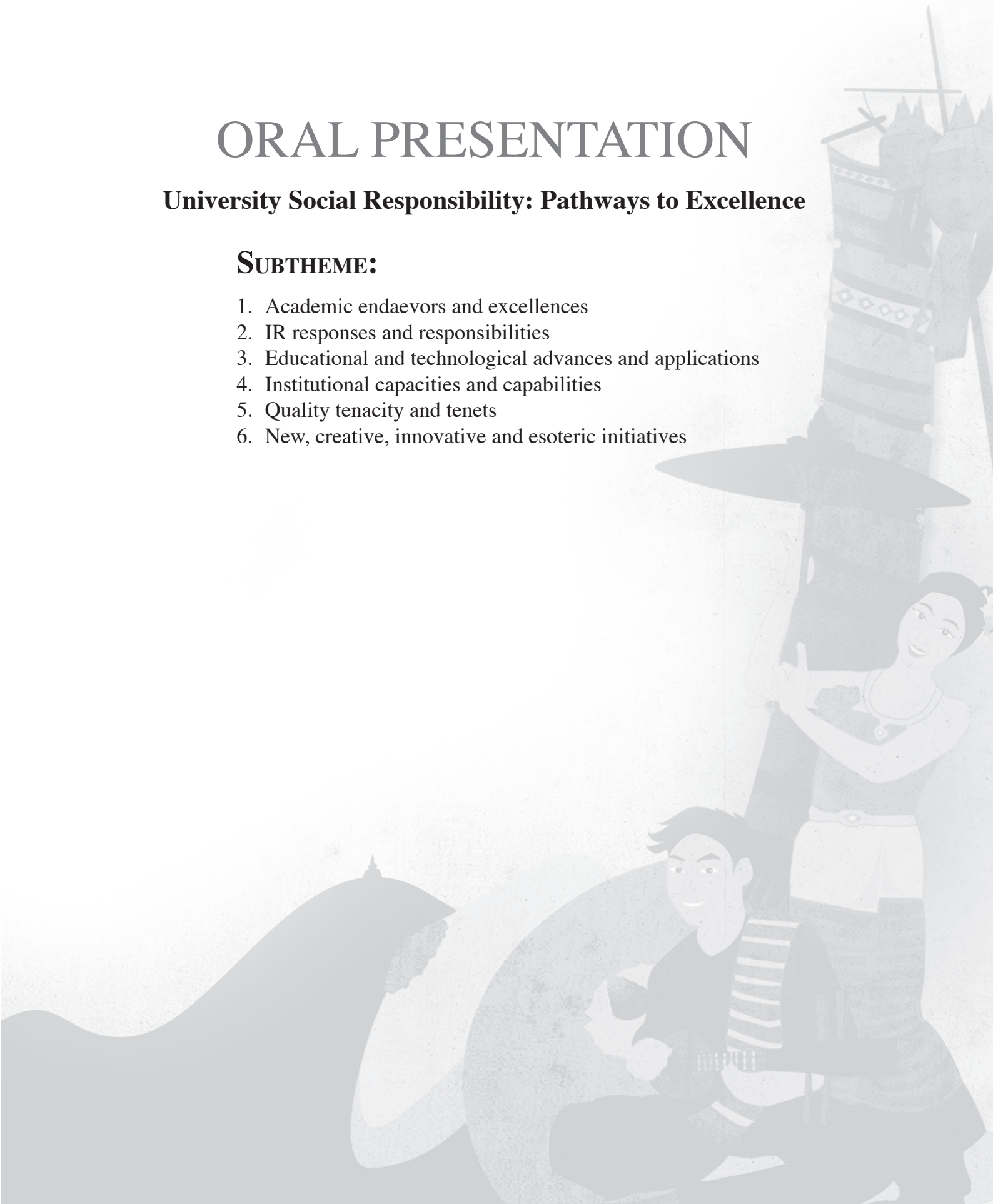
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| 15:40 – 16:00 | TPM2-3-1
(P. 402) | Sexting as Socio-Cultural Practice and Its Influence Among Filipino Youth: A Journey to Explore
<i>Rolando A. Alimen, and Marietta Agustin-Teaño</i> |
| 16:00 – 16:20 | TPM2-3-2
(P. 407) | Cluster analysis in the determination of Widyatama University Students Segments
<i>Taufik Rachim, and Zulganef</i> |
| 16:20 – 16:40 | TPM2-3-3
(P. 412) | The Role of Ethnocentrism in Higher Students Behavior to Consume (The Study of Made in China Fashion Products in Bandung)
<i>Zulganef, and Taufik Rachim</i> |
| 16:40 – 17:00 | TPM2-3-4
(P. 419) | The Comparative Analysis of Academic Advisor Pattern I and Pattern II Considered from Student's Interest in Business and Management Faculty of Widyatama University
<i>Sri Wiludjeng Sp, and Lasmanah Ina</i> |
| 17:00 – 17:20 | TPM2-3-5
(P. 425) | Determinants of Work Performance of Stakeholders: An Evaluation of the Human Resource Short Term Training Program of the University of Mindanao
<i>Reynaldo O. Cuizon, and Michelle Y. Acledan</i> |

ORAL PRESENTATION

University Social Responsibility: Pathways to Excellence

SUBTHEME:

1. Academic endeavors and excellences
2. IR responses and responsibilities
3. Educational and technological advances and applications
4. Institutional capacities and capabilities
5. Quality tenacity and tenets
6. New, creative, innovative and esoteric initiatives



The Use of Strategic Management Approach in University Social Responsibility Planning and Implementation

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Abstract— University social responsibility is becoming an issue among higher education institutions in Thailand. In the former time, universities emphasized more on quality education compare to the contribution to the society. Currently, Thai educators start to recognize the significance and the potentials of social responsibility to create a sustainable development to institutions. There also are calls from the communities for universities, with their academic resources, to assist in developing the communities they reside in. Moreover, the government is trying to promote and support the social responsibility activities among universities. In an attempt to perform these activities, universities are utilizing strategic management paradigm to plan and implement social responsibility with the consideration of internal and external environment. The management has to device appropriate strategies to implement them successfully. The purpose of this research was to investigate the approaches that selected universities in Thailand used in order to create and implement social responsibility strategies and activities. An open-ended questionnaire was developed based on a preliminary interview with an administrator. Ten top administrators in 5 public and 2 private universities' were approached to elicit information asked in the questionnaire regarding the approaches and strategies their universities used for social responsibility planning and implementation.

Keywords — Social Responsibility, University, Thailand, Strategic Management

I. INTRODUCTION

Education institutions are expected to look beyond self-interest. They have duties in creating good citizens to the society. Apart from delivering quality education, they also have to infuse public conscious to students. University social responsibility is a current issue among higher education institutions in Thailand. It is interesting to investigate the approaches that universities came up with strategies to implement their social responsibility practices. This research project aimed at investigating selected universities' approaches in planning and implementing social responsibility practices.

II. LITERATURE

Thai educators start to recognize the potentials of social responsibility to create a sustainable development to students and institutions. There also are calls from the communities for universities, with their resources, to assist in developing the communities they reside in. Moreover, the government is trying to promote and support the social responsibility activities among universities. The Thai government had a resolution that higher education institutions should have social responsibility and participate more in community development. The Commission on Higher Education, Minister of Education initiated a Framework of the 15-Year Long Range Plan of Higher Education of Thailand and implemented during 1990-2004. The national education reform occurred after the end of the first period. The Second 15-Year Long Range Plan on Higher Education of Thailand was drawn for 2008-2022. The Second Long Rang Plan emphasizes the participatory and involvement of higher education stakeholders. This Framework aims to create quality graduates who are capable of lifelong work and adjustment [1]. Nine issues were discussed in The Framework: articulation with secondary and vocational education, proliferation of higher education institutes, university governance and management, national competitiveness, financing higher education system, staff and personnel development, university networks, programs for southern Thailand, and learning infrastructure. These issues are revolving around the responsibility towards the society in various aspects.

Social Responsibility

The traditional social contract suggested that organizations are responsible to the society and various types of stakeholders. However, the responsibility was believed to be static. For The new social contract, the relationship is not just an option that they can drop at any time of their inconvenience or during bad times [2]. [3] suggested that it is not a trade-off between social responsibility and economic results but both are compatible goals. Organizations "must" acknowledge relationship with stakeholders and respond to

the people who are affected by their activities. The new social contract calls for organizations to “do the right thing” for the society. Consumers and investors demand corporations to be socially responsible, fair and ethical [4]. For example, social responsibility was used as one of the major criteria in voting for America’s most admired companies [5]. Organizations that do things for the betterment of the society are admired. This results in a positive image for the organizations and their brands. These organizations have long-term view rather than focusing on short-term gains. The interests of all stakeholders are integrated into the corporate strategy. Corporations should be accountable for their actions that affect people, communities and the environment [6]. Negative business impacts on the society should be acknowledged and corrected some profits might be foregone. Positive image is also an important quality among universities. Apart from academic excellence and research, being recognized and admired is one of the criteria of being a world class university [7].

“Business organizations have responsibilities that go beyond mere profit making and encompass voluntary activities and actions that affect people, their communities and the natural environment [8].” Likewise universities also have responsibilities that go beyond the academe and create activities that contribute to the people, communities and the environment. The United Nations’ World Conference on Higher Education during July 5-8, 2009 had included university social responsibility as one of main themes [9]. Universities are responsible not only to produce graduates, research and community academic services but also social responsibility. Higher education institutions must help to create mechanisms that support the economy and peace in the society. The task of cultivating social conscience among students is one of the major tasks of universities. In Thailand, social responsibility activity was included as one of the key performance indicators for CHE’s quality assurance in components 3 (students’ development activities), 5 (academic services to the society), and 6 (preservation of arts and culture) [10]. Furthermore, the Thai Qualifications Framework for Higher Education specified social responsibility as one of the 5 major expected learning outcomes [11]. Social responsibility is not only donating to the poor but it involves various types of activities. They must be carried out effectively and efficiently else objectives of social responsibility might not be attained. In this regard, the strategic management approach can be utilized to direct these activities towards the real objectives of social responsibility and the organizations.

Strategic Management Approach

Strategic management is a popular approach in the present time. In an attempt to perform social responsibility activities, universities are utilizing various approaches including strategic management paradigm to plan and implement social responsibility with the consideration of internal and external environment. The management has to device appropriate strategies to implement activities successfully. As a development from the traditional

management approach, the strategic management approach is an effective tool to unify organizations’ resources and strengths towards shared values with the consideration of external dynamic environment. In the past, planning emphasized a top-down approach which excluded line managers and the rest of the organization and the environment. Today, personnel throughout the organization are taken into the strategy formation process [12]. The approach realizes the importance of internal and external environment upon the operations of an organization. Organizations interact with various types of stakeholder at all times. Stakeholders’ needs and wants should be integrated into organizations’ activities. Strategic management can create market, cost, technology, and management synergy [13]. The operations would go into the same direction and each project would contribute to the long-term vision rather than starting and ending with no further results for the organization. It is likely to be a powerful tool in planning and executing social responsibility activities.

Strategic management involves managers from all parts of the organization in the formulation and implementation of strategic goals and strategies. Strategic planning becomes an ongoing activity in which all managers are encouraged to think strategically and focus on long-term, externally oriented issues as well as short-term tactical and operational issues [14]. [15] suggested strategic management process include:

1. establishment of mission, vision, and goals
2. analysis of external opportunities and threats
3. analysis of internal strengths and weaknesses
4. SWOT (strengths, weaknesses, opportunities, and threats) analysis and strategy formulation
5. strategy implementation
6. strategic control

The strategic management process starts at creating visions, missions, and goals for the university. This stage is derived from the understanding of the trends of the external context. Visions serve as the future status the university would like to become. Visions are not just daydreams of things an organization want to be. They should be something the organization believes is possible and suitable within the current and future-to-be environment. Missions go hand-in-hand with visions. Visions are the terminal values while missions are instrumental to arrive at the destination. Once the visions and missions are established from careful analysis of the environment, goals are formed. Goals are more objective than visions. Visions, missions, and goals would become the focal points of all operations in organizations. Strategies and operations should be in line with these visions, missions, and goals. Hence, all personnel would work towards the same direction and synergy could be achieved. The analysis of strengths, weaknesses, opportunities, and threats enables organizations to choose feasible and appropriate strategies to move forward. Each unit must consider the needs of all stakeholders in order to choose suitable strategies that can satisfy the needs of all or most stakeholders as well as the organizations’. Another very important part in the strategic management process is the

implementation. All strategies must be translated into operations else the visions could not be realized efficiently. Organizations must seek approaches that can stimulate personnel to work towards in accordance to the strategies formed. The last, but not least, part of the process is to effectively measure the results of the strategies. This enables the organizations to realize the success or failure of their strategies and hence can modify or adjust their visions, missions, goals, and strategies.

The process highlights the importance of internal and external influences as well as the implementation and controlling of the strategies. The societal environment should be taken into consideration. Once the strategies are made, the plans would be broken down along the organization units. Hence, every unit would operate towards common vision, mission, and strategy. Another important aspect of strategic management is the controlling process. Measurement must be planned in order to gauge the progress and success of the strategies. In this regards, strategy map and key performance indicators are effective tools to ensure the operations go towards the overall vision and mission.

III. METHODOLOGY

This research project used the strategic management framework to assess the approaches that universities used in their planning and implementation of social responsibility activities as well as the controlling or evaluation method. An open-ended questionnaire was developed based on a preliminary interview with an administrator. Ten top administrators in 5 public and 2 private universities were approached and information regarding the approaches and strategies their universities used for social responsibility planning and implementation was elicited. These administrators were responsible in academic, administration, and student affairs for their universities. They also served in their universities' senates and took parts in the overall strategic making process for their universities. Questions were related to the strategic management process and social responsibility activities. The researchers interviewed with some administrators through telephone and face-to-face basis for further and in-depth information. Data were compiled and issues related to the process were drawn.

IV. RESULTS AND DISCUSSION

All informants reported that their universities have university-wide visions and at least one of their universities' visions involved the contribution to the society. Two informants mentioned The Tenth National Economic and Social Development Plan 2007-2011 [16] which emphasized the Sufficiency Economy. The Plan aimed to enhance the quality of life of people and local communities. Health, hygiene, and education were emphasized as well as holistic and sustainable management of natural resources and environment. Hence, the Education ministry and Office of Higher Education Commission (OHEC) had reflected these by

including the social responsibility and contributions in the Strategies and Roadmap for Higher Education Reform in Thailand [17]. Universities adopted the Strategies and Roadmap and hence drew visions that encompassed social responsibility in their university level visions and missions. For example, Assumption University (AU) has "enlivened by Christian inspiration" as one of the university's visions. One informant explained that the Christian inspiration implied benevolence and helping the community. Another vision of AU was stated clearly as "serving human society." Chiangmai University (CMU) had "moral and ethical standards", "good governance", "sufficiency economy", and "sustainable development" in their vision statements. These visions were translated into social development, servicing the national community, and preservation of the natural environment. Ramkhamhaeng Univeristy (RU) has "social development as one of the university's visions. Rajamangala University of Technology Krungthep (RUTK) and Chandarakasem Rajabhat University (CRU) have "community development and serve the society" as their missions. Bangkok University (BU) listed social responsibility as one of the university's values.

In case of Assumption University, the president drafted the visions and missions in accordance to CHE's guidelines and had the draft considered by the administration senate and faculty senate. Other universities also had similar process. Chandarakasem had general instructors meetings and workshops to elicit faculties' strengths and weaknesses before strategizing following the Balance Scorecard approach. RUTK had a more thorough procedure by inviting all administrators, selected instructors and personnel as well as students and members of the community for meetings and seminars in order to come up with the university's strategy. However, in spite of allowing participation from several parties, most of the times the administrators are the ones who drafted universities visions, missions, and strategies. Eventually, the university visions and missions would be considered and endorsed by the university council. However, some administrators reported that people involved did not provide much attention to the workshops and seminars. Personnel from various units often skipped away from the sessions and some top administrators did not show any attempts to motivate the personnel to participate in the strategic making sessions. Most administrators reported they had inadequate information to form university's visions and missions. Most of the times, they had to work with limited information and set the visions and missions in accordance with the national development strategies. The universities' strategies were drawn from administrators' opinions rather than really analyzing solid external information.

Once visions and missions were established, they were cascaded down to the faculty, office, and center levels. Faculties and other units would create their own visions and missions which corresponded to the university's visions and missions. Faculties and offices were responsible to create projects that contribute to the society. Social responsibilities were included in their operations usually in the form of

academic services such as training, networking, and scholarships. One university had a mandatory course conducted by the student affair department to initiate social contribution projects in co-operation with other organizations and local communities such as building community weirs or dams, afforesting, teaching in the communities, etc. Students were required to take parts in these projects called service learning. Service learning is an approach that combines society service with normal lecture classes [18]. The focus was on students' critical and reflective thinking regarding the activities they joined. This course required students to create projects to approach the members of the community and assist them in the areas that they needed such as finance, accounting, or marketing knowledge for their businesses. The instructors also initiated social responsibility projects in coordination with external organizations and groups. Students are required to join these projects. There was a gap between the universities' strategies and the social responsibility projects. The only guiding principle was "serve the society" and the rest was left to the people in the operation level to create any project they could think of and could find cooperation or assistance in order to "serve the society". All universities interviewed had no specific strategy regarding the university level social responsibility.

Responsible personnel would conduct primary and secondary data surveys to collect information from internal and external sources such as government reports, opinions from people in the communities. Information was translated into projects such as blood donation, vocational training courses, community development, etc. between the universities and other organizations and groups. There were both short-term and long-term projects, some were universities' initiated and some were initiated by other organizations or groups such as companies that had social responsibility projects and local temples in which the universities brought students to join.

The informants reported that their universities provided sufficient supports for their social responsibility projects such as classrooms and equipment for training programs. Moreover, some projects were partly funded by external organizations such as Siam Cement Group, a large public conglomerate in Thailand, who had many social responsibility projects. Most organizations contributed in the forms of equipment, raw materials, and others rather than real money. Several activities such as training programs were not free. Participants had to pay some fees and sometimes they also donated personal funds for participated projects. Each faculty, center or office would write projects and submit for approval from the university senate and the presidents. These projects would be used as the basis for control afterwards. The government also provided some funds to support university's social responsibility activities.

Self Assessment Report (SAR) was performed as the measure for university's quality assurance purpose. Faculties, centers, and offices had to file their activities together with evidence in their SAR and report to the internal audit committees. Social activities were assessed through SAR.

The administrators also called for oral and written reports regarding the progress of approved projects periodically. Moreover, budgets were used as one of the control mechanisms. Objectives key performance indicators were established so that the success of projects could be monitored.

Unfortunately, it seemed likely that universities performed social responsibility activities because it was a requirement from the Ministry. Personnel performed these activities in order to satisfy the SAR and Thai Qualifications Framework for Higher Education criteria. Most students participated in social responsibility activities because they were parts of the course requirements. There was no information regarding the philanthropic responsibility by any party among universities. Apart from the SAR requirement, one university offered rewards and bonus for the unit that attained highest SAR score for social responsibility.

V. CONCLUSIONS

In general, universities were utilizing strategic management approach in the university-wide level. There were visions and missions in the university level. These visions and missions were translated into faculties' and units' visions and missions. However, in the implementation level, personnel did not have a real objective strategies or directions to follow. Activities were planned and implemented but there were no guiding or master plan for social responsibility activities in either university level or unit level. Personnel initiated projects to help the society in diffused directions they could reach for. Moreover, the researchers observed that the faculties, centers or offices would implement their own social responsibility programs or activities without consulting or relating to other units. The informants reported low degree of cooperation with other faculties in the planning process of their social responsibility activities. One administrator suggested that there should be the centralization of university-wide social activities. Having one unit to take care of the social activities would create synergy of all activities. This unit can help to push and create momentum for activities systematically throughout the university. Future research should be planned to assess the possibility to create such unit as well as the advantages and disadvantages of such unit. Moreover, this project aimed to study the process that universities had performed in order to plan for their social responsibility activities. A survey for the results from the implementation of the programs is warranted.

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Strategic USR Management Framework

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Abstract

CSR (Corporate Social Responsibility) while widely defined and researched, has evaded a holistic agreement on what CSR is. But CSR has slowly been argued and accepted over the last decades as "legitimately what organizations should do towards a successful organization in a healthy society that adheres to the triple bottom-line of profit, people and planet for sustainability". While widely applied to the business, it can also be argued that universities as organizations should also be socially responsible to society. Universities as pillars for human development and that produce graduates for society should be "socially responsible" towards their human product and their potential stakeholders who affect the future of business and society. *University* as derived from its Latin "*universitas magistrorum et scholarium*" means "community of teachers and scholars" designate a key university role as the hub of human development through teaching and learning. A key research issue is what and how CSR can be applied to universities and how the universities can strategically manage its social responsibilities. This paper will review the CSR conceptual foundations and propose a strategic management framework of USR that is anticipated to balance the management of its internal and external stakeholders' social responsibilities through its value creation processes.

Key words: Corporate Social responsibility, stakeholders, University Social Responsibility, Strategic USR management framework

1. Introduction

Corporate Social Responsibility (CSR) has been widely discussed, argued (Friedman, 1962 and 1970; Carroll, 1974 and 1991; Davis, 1973; Epstein and Roy, 2001) and researched

(Dahlsrud, 2006; Heslin and Ochoa, 2008) over the last decades, but it has eluded a definitive and standardized concept as accepted by all (COM 2001, 6; Ethos Institute, 2007). It has also been discussed from the Corporate Social Performance perspectives (Hoevar & Bhambri, 1989; Sethi, 1979; Preston, 1978; Ullmann; 1985; Wartick and Cochran, 1985; Wood, 1991) and its impact on the financial bottom line (Margolis and Walsh, 2003; Orlitzky, Schmidt and Rynes, 2003) and the firm's competitiveness (Kong et.al., 2002; Burke and Logsdon, 1996; Porter and Kramer, 2002 and 2006; and Weber, 2008). Though there are multifarious and diverse perspectives, approaches and frameworks, most of these literatures on CSR are converging into some widely accepted aspects that underpin the CSR directions for the future of CSR. This key convergence is the generally acknowledgement and acceptance of CSR with respect to 1) the basic triple bottom line of "people, planet and profit" or the economic, social and environmental aspects that most firms should aim to achieve; 2) there is an "ethical" and a "moral" dimension of the firm towards its stakeholders, both internal and external; 3) that a successful organization strives and succeed in a healthy society that is sustainable.

Cases and arguments for CSR (Carroll, 1974; Davis, 1973; Epstein and Roy, 2001) centers around: 1) long range self-interest of firm through increased market share (Epstein and Roy, 2001 and long-term survival (Kong et.al., 2002); 2) public image through improved image and reputation (Epstein and Roy, 2001) , 3) viability of business through employees motivations, risk management, cost reductions, differentiations, efficiency gains (Turban and Greening, 1997, Schaltegger and Buritt, 2005), resource preservations (Rondinelli and London, 2002) as CSR can improve competitiveness of company (Burke and Logsdon, 1996 and Weber,

2008) through process and product benefits (Porter and van der Linde, 1998) and positively related to financial performance (Margolis and Walsh, 2003; Orlitzky, Schmidt and Rynes, 2003) like tax advantage, financial advantages and better capital access (Schaltegger and Frigge, 1998); 4) avoidance of government interventions and regulations; 5) responsibility toward social and cultural norms; and 6) stockholders interest. A key question is that with the very diverse and multifarious approaches and understanding of CSR, the issue of what and how the firm or organization can strategically manage CSR is still elusive. While the CSR fundamentals and principles of CSR are still widely debated in the business communities, some of the same issues can also be questioned of the operations of a university as an organization. With public funding becoming scarce, university being more corporatized, commercialized and competitive through student mobility and wider access, and the education for all principle, greater and ease of information access and availability to diverse information in the knowledge society, a university is in the public limelight of its social responsibility and is under the microscopic lens in the newer social order and knowledge society.

2. University Social responsibility

Much has been written on the CSR from the business organization perspectives. Through universities have been in existence for centuries as the foundations of education for all and the development of human sustainability, a key question is the relevance of social responsibility of the university which can be termed as “USR – University social responsibility”. What is the context of USR within the university and what are the mechanisms that are put up to manage USR responsibly toward the society at large. Changes and challenges facing universities changing the universities’ operating scenario were discussed by Vukasovic (2008) and Felt, (2003) in terms of mass expansion of higher education, internationalization, student access and student mobility, decrease in public expenditure, diversification of higher education, commercialization of higher education, and impact of ICT. All these have impacted on the quality of the education value delivery in the

notions of autonomy, and academic freedom, its changing focus and responsibilities towards society (Vasilescu, et. al., 2010). Nagy and Robb (2008) highlighted the fact of the corporatization of the universities and the increased call as a good corporate citizen. CSR as applied to university as USR which are rather new, universities have tried to envision them through their visions and missions statements and a cross sections of the ranked Asian universities found these stated directly and indirectly as:

2.1 Envisioned outcomes desired of university

- community of learners and scholars who value the pursuit of new knowledge in a society of learning and are valued members and leaders of society, and global citizens effective in diverse settings
- graduates who are well-balanced in knowledge and wisdom and are of good character, intelligent, able to think rationally, behave morally and ethically, possess life and leadership skills, conscious of public and common good, practice good governance and socially responsible, world view competency and competent to compete in international job market, socially responsible global leaders

2.2 Envisioned contribution of university

- betterment and benefit of potential of locality, society and mankind through raising, strengthening and transforming community and national potential, services to community for social, community engagement and outreach, economic and national development, preservation and enhancement of national heritage in arts, religious, cultural and socio-cultural, socio-economic building that increase and achieve sustainable development and negotiating power competitiveness of country in the world community and ensuring the well-being, welfare, justice, security and sovereignty of the country and the world by upholding social and humanity values and in realizing peace.
- develop local human resources, nurture creative and entrepreneurial leaders with quality and virtue for society in a society of learning and wisdom through accessibility for acquisition of knowledge, in a variety of dimensions,

formats and platforms through wealth creation, nation building and universal human advancement

- development of a dynamic, learned and morally strong society through contributions for the greater good of society while generating science, technologies and arts beneficial to and advances society with quality, beneficial and sustainable research, creativity and innovation and accountability for national and international society
- advancement of the world civilization by producing its graduates who have global insight, tolerance, sense of love for peace and high academic achievement with commitment to National Development and Social Responsibility and pursue universal principles that relate activities to the needs of the people and their aspirations for social progress and transformation
- generate, advance and disseminate knowledge and learning, expand human knowledge through quality research and education for the nation and for humanity with deep sense of social responsibility in improving the quality of life in society and harmonious development of moral and intellectual virtues in the implementation of university social responsibility

It is noted that these dimensions are discussed and included variously in the Ethos Institute definition of strategy and CSR (2007) “CSR is a form of management that is defined by the ethical relationship and transparency of the company with all the stakeholders with whom it has a relationship as well as with the establishment of corporate goals that are compatible with the sustainable development of society, preserving environmental and cultural resources for future generations, respecting diversity and promoting reduction of social problems”. In reality a key question is what and how these envisioned outcomes and contributions have been affected.

3. Status of USR practices

What is actually being believed and practiced by universities in their USR is still open to debate and these are practiced within their own interpretations and understanding of what USR is and what constitutes USR to be achieved. Since it is still an

open field and open for discussions and debates, most of what the universities practices as USR are within the requirements of quality management and accreditation requirements. Directly or indirectly, the accreditation standards and quality management standards in most countries have a “community” or “social engagement” criteria. These can range from small community services or academic services that are rendered free of charge to the larger community to hosting a community or involvement of the community in its university life. A review of the main accreditation systems that includes a “community relation” or “social engagement” or “academic services” criteria shows that most of the universities will work within the confines of these standards and criteria to fulfill or meet the minimum criteria.

These community and academic practices which the universities consider as social responsibility or responses to the community loosely define and cover the practices of USR as it is understood. Academic service to society is a key mission of higher education institutes. Academic servicing refers to the fact that the educational institution is in the position on which the communities could rely, or is an academic reference point, or performs any functions which impact the development of learning and knowledge of the communities, as well as improving the strength of the community, the nation, and other countries. Academic service projects which impact the development and strengthening of the community refer to those being organized or operated by the institution and result in the improvement of the community in various aspects and make it self-reliant according to its potential. These could include recognized service which are nationally or internationally recognized, are under the responsibility of the institution. Being an academic service center means the institution or a program has a center, or regularly organizes academic activities or the institution functions as an academic reference point, on which the communities could rely for academic services, or it functions in any ways that impact the academic and knowledge development of the communities, and is nationally or internationally recognized. Areas of community support appropriate for inclusion might include their efforts to strengthen local community services; community education; the environment, including collaborative activities to conserve the

environment or natural resources; and practices of professional associations.

Based on these quality criteria, there are processes and mechanisms in the delivery of academic service that are tangible in forms and formats. The objectives of academic services are determined by the operations plans and frameworks to provide academic service by the faculty and department. There are follow-ups, evaluation and control mechanisms and support systems in its performance based on the mission of academic service provided to society by the school human resources which is consistent with the school and institute objectives. School's support of key communities, include the contributions of their senior leaders, workforce, and students.

In retrospect, these school and institute's leaders stress responsibilities to the public, ethical behavior, and the need to practice good citizenship. Leaders should be role models for the school and institute in focusing on ethics and protection of public health, safety, and the environment. Protection of health, safety, and the environment includes the school and institute's operations. Practicing good citizenship refers to leadership and support -- within the limits of a school and institute's resources—of publicly important purposes. Such purposes might include improving education in the community, pursuing environmental excellence, practicing resource conservation, performing community service, and sharing quality-related information. Leadership also entails influencing other school and institutes, private and public, to partner for these purposes. Planning for these social responsibilities entails anticipating adverse impacts that might arise in facilities management, laboratory operations, and transportation. Effective planning should prevent problems, provide for a forthright response if problems occur, and make available information and support needed to maintain public awareness, safety, and confidence.

4. Issues pertaining to USR

In a wider sense of social responsibility, school and institutes should not only meet all local, state, and federal laws and regulatory

requirements, but they should treat these and related requirements as opportunities for improvement "beyond mere compliance." School and institutes should stress ethical behavior in all stakeholder transactions and interactions. Highly ethical conduct should be a requirement of and should be monitored by the school and institute's governance body.

Managing social responsibility requires the use of appropriate measures and leadership responsibility for those measures. The school or universities need to address their current and future impacts on society in a proactive manner and how they accomplish ethical practices in all student and stakeholder interactions. University administrators, faculty and staff, students and itself identify, support, and strengthen their key communities as part of good citizenship practices. They will need to define performance or outcome indicators to ensure that the social consciousness and responsibility meet the basic requirements and expectations to service the stakeholders.

As such, some of the issues pertaining to CSR in the business can be relevant to the universities in terms of:

- What is the role of social responsibility within the context of the university and what would it mean to the organization as a definitive part of the university mission?
- What is the generic social responsibility or moral duty of the university to the society at large in order to define the "university social responsibility" (USR) of an education institution?
- What existing CSR fundamentals, principles, models or frameworks can be adapted for the USR of the education institution?
- What strategic models can be developed for the USR of the education institution?

Based on these academic issues that will need to be addressed, issues on USR that need to be addressed should aim to achieve the following:

- Review the role of the universities in a knowledge society within the context of the existing CSR literature and determine the relevance and applicability of the CSR to the universities.

- Determine what would constitute the USR (University Social Responsibility) of the university.
- Determine the operational variables that the university should envisage and manage as a fully socially responsible university.
- Develop a strategic USR management model that can be used to manage the context of a socially responsible university in a knowledge society.

5. Strategic USR Management Framework

Within this framework of managing USR strategically, this paper aims at developing a comprehensive strategic USR management framework to ensure that the management of USR is prioritized as part of the university management based on its vision and mission. It also introduces the processes that lead to the

development and incorporation of USR in its annual planning processes and as part of the university strategic plan. The basic premise is that the university's final output is a set of "socially and ethically conscious group of knowledgeable and competent graduates in a community of scholars" of which knowledge is interpreted and exercised by the human scholars that affects society. As such, the production of a socially and ethically knowledgeable graduate passes through both an internal process component within the institution, and that conforms to the external societal requirements of a morally and ethically responsible member of society that cares for the overall wellbeing of society as opposed to one who is self-centered and self-destructive.

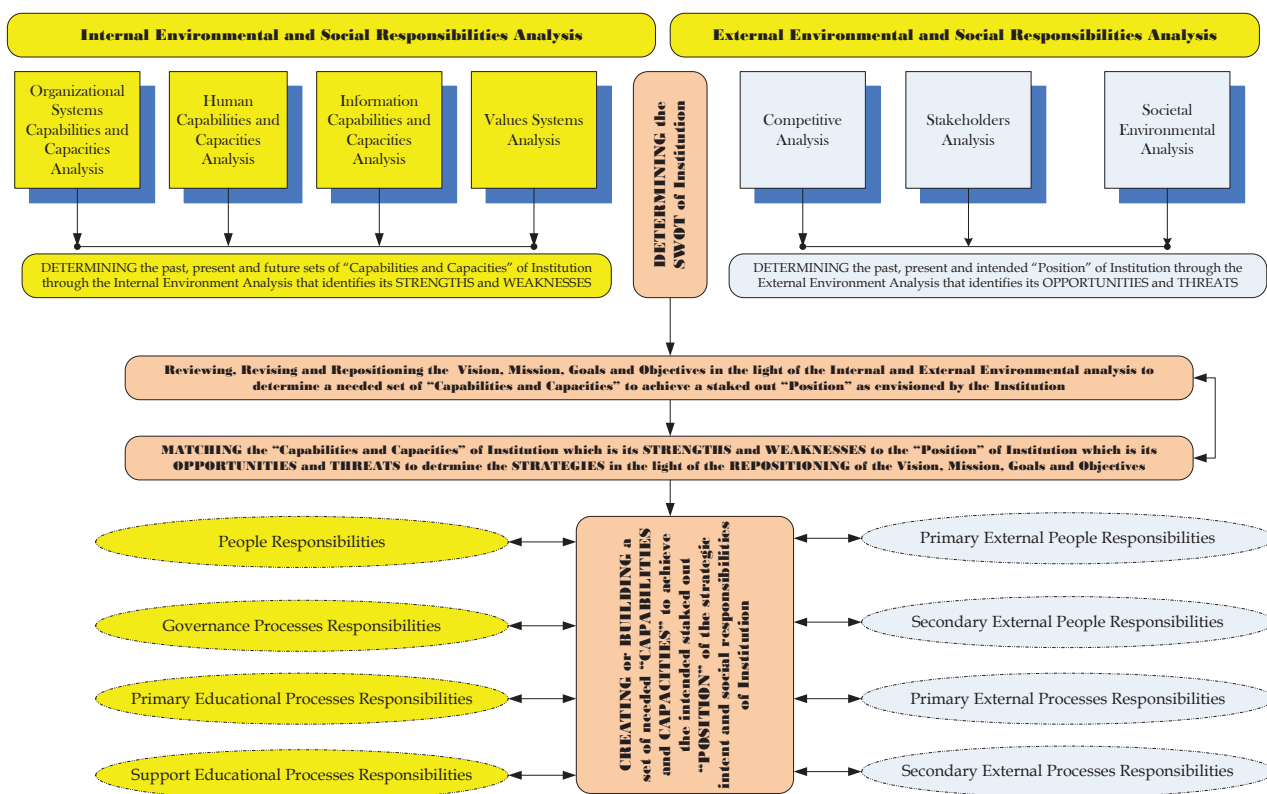


Fig. 1 Strategic USR Management Framework

Since the graduate undergoes two main components of the internal institutional and external societal requirements, it is deemed necessary to fully understand the SWOT of the institution from the perspective of societal responsibilities. It will need to identify its internal strengths and weaknesses of its organizational systems, human, information and values systems capacities and capabilities that constitutes its “capacities and capabilities that is inherent in the institution towards societal responsibilities”. On the external environmental and social responsibilities elements, it would also need to determine its competitive, stakeholders’ and societal requirements that constitute its opportunities and threats that represents a “position that it seek to achieve in its societal

responsibilities”. This will result in the strategic SWOT of the institution’s societal responsibilities that leads to a better understanding of the strategic issue facing the institution’s societal responsibility. Based on the strategic SWOT and the strategic issue pertaining to the institution’s societal responsibility, an appropriate set of institution’s societal responsibility strategy will be developed. The development of the strategies for societal responsibilities lies in matching its “internal societal responsibilities capacities and capabilities” and the “positional societal responsibilities that it seeks to achieve”. The strategic process of the strategic analysis of identifying its internal societal capabilities and capacities and the development of the strategy in achieving its envisioned societal responsibility is shown in Fig. 1.

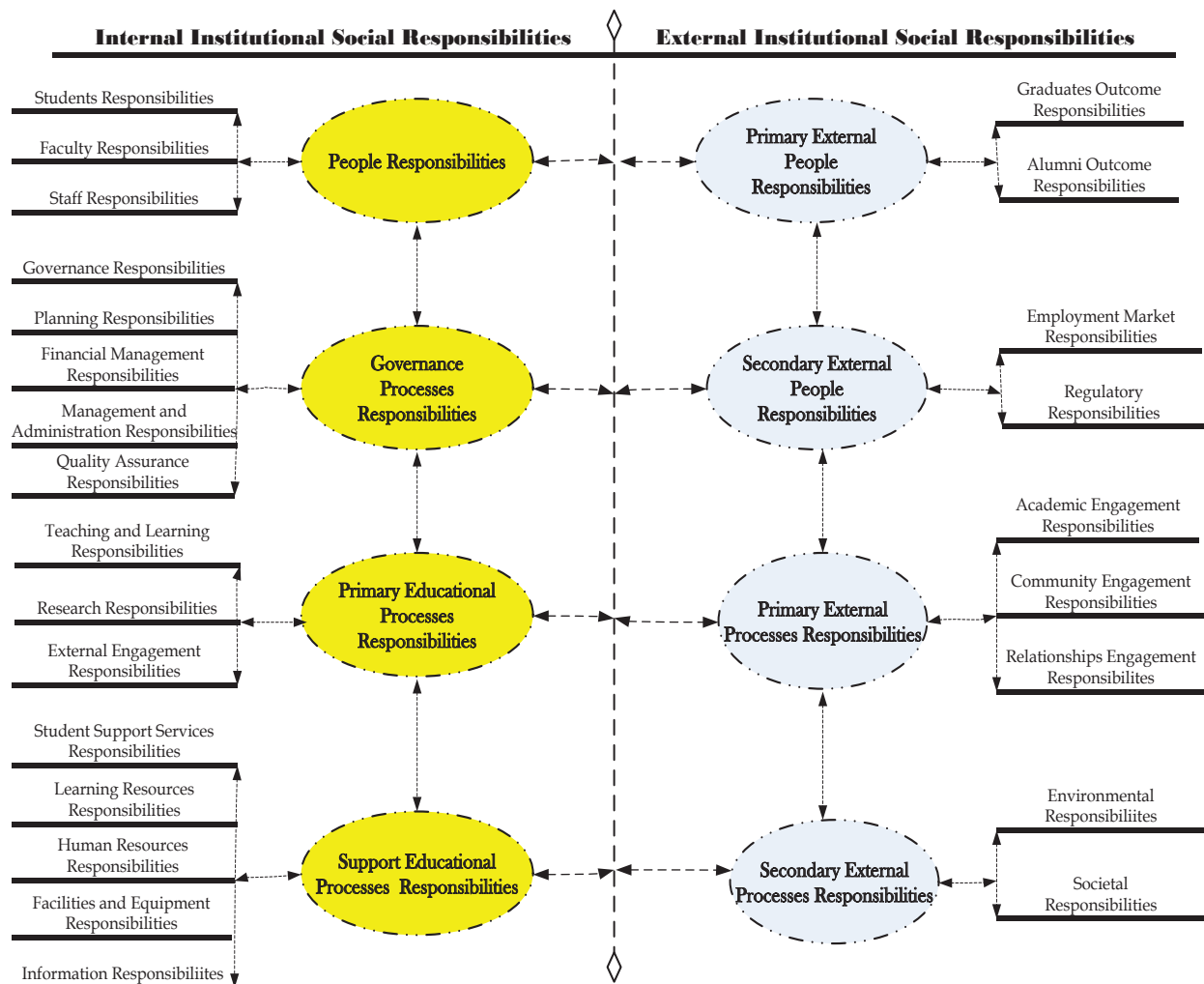


Fig.2 Components of Internal and External Institutional Social Responsibilities

In the implementation of the institution societal responsibility strategy that has been selected based on its internal institutional societal responsibilities analysis and its external environmental societal responsibilities, this calls for the “creation or building” of the institutional societal responsibilities capabilities and capacities and to achieve its external societal responsibilities.

The 4 main internal societal capacities and capabilities dimensions (Fig. 2) that the institution needs to create are proposed to be:

- i. **People responsibilities** – the basic premise is that it is people who are responsible in using the knowledge and skills or its competencies sets that interpret and utilize knowledge within their ethical and moral domain to bring about actions. As such, these 3 main groups of students, faculty and staff should be conscientious of the moral well-being of their actions that contributes to the furthering of society’s well-being.
- ii. **Governance processes responsibilities** – this broadly covers the governance processes, the management and administration of its societal responsibilities, its appending systems and mechanisms developed to ensure societal responsibilities and that is assured through quality systems and mechanisms of managing societal responsibilities.
- iii. **Primary educational processes** – this comprehensively enshrines the societal responsibilities within the teaching and learning, the research and the external engagement educational processes, systems and mechanisms. These educational components are the ultimate mechanisms that should instill and imbues societal responsibilities of “morally and ethically sound mind

in a healthy body” in the students’ development processes.

- iv. **Support educational processes** – this covers the supporting processes, systems and mechanisms that aims at valuing people and building a strong conducive societally responsible environment in support of the primary education processes. These systems cover the student support services, learning resources, human resources, facilities and equipment, and information resources management that add value to the primary education processes.

The external societal responsibilities dimensions (Fig. 2) can be classified as:

- i. **Primary external people responsibilities** – this will basically cover the main institutional output of its graduates and alumni who had undergone the internal institutional societal focused processes to be “ethically and morally sound graduates and alumni” who can contribute positively and proactively to the societal development and its well-being.
- ii. **Secondary external people responsibilities** – as the graduates and alumni are employed, their basic societal responsibilities conscience should contribute to the employment market that works within the framework of regulatory requirements. This in essence provides them with a societal conscience that their actions can either enhance or destruct the society at large, of which there are ample evidence in the downfalls of companies, destruction of natural resources and bettering others through “greed” and one’s self well-being rather than the well-being of the society as a whole.
- iii. **Primary external processes responsibilities** – this comprehensively covers the systems and mechanisms of the “what and how” that the institution set up to relate and to engage their

immediate communities and society at large. Traditionally it means academic services but the enlarged societal responsibilities goes beyond this covering the commitment and positive engagement with the community and society to bring about a better and healthier and more prosperous society built on a more moralistic and ethical foundation.

- iv. **Secondary external processes responsibilities** – this covers the moral well-being of the individual's contributions for the benefit of society through its environmental and societal conscience that had been instilled and imbued in the "responsible citizen of society". This emphasizes that every small contribution of an individual towards environmental and societal protection and conservation will add up to a better and more livable society.

6. Discussion and Conclusion

Though USR is still in a very infant stage, with academics still debating the role and scope of the constituents of USR, one should basically be forward looking and proactively incorporate USR as part of the institution's management. This paper argues for the institution's societal responsibility to be embedded in its internal systems and mechanisms capacities and capabilities that should incorporate the "societal responsibilities" mind set in its operating realms that underlies its internal processes capacities and capabilities. It also argues that the internal processes capacities and capabilities ultimately will result in a societally conscious and responsible graduate who carries on and champion the cause of societal responsibility for the well-being and health of a productive society. Based on this premise, the paper recommended a strategic USR management framework with two main components of:

- Analyzing the internal and external societal environmental (Fig. 1) which is its "internal societal responsibilities capacities and capabilities" and the "positional societal responsibilities" it intends to stake out and in the formulating of its societal responsibilities strategies.
- Implementing its societal responsibilities strategies by creating or building the internal societal responsibilities capacities and capabilities in order to achieve its positional societal responsibilities based on the key internal and external factors as discussed above (Fig.2).

In conclusion, this paper attempts to develop a strategic USR management framework by strategically managing its societal responsibilities focused components. This paper borrows heavily from the CSR researches and the strategic management literature and practices to develop this strategic USR management framework. It is believed that this paper can provide a framework to concretize the approach in developing and managing the societal responsibilities of the universities based on its basic premise that the universities' main output is a socially responsible graduate who is ethically and morally sound and can contribute to a better society. This calls for the managing of its internal capacities and capabilities conscientiously to achieve its strategic intent of the external positional societal responsibilities that it intends to stake out.

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Learning Experience: Does it Matter for Institutions to Provide Conducive Teaching Environment?

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Abstract - Significant amount of work pertaining to learning experiences are directed towards teaching processes. Nonetheless existence of other factors is undeniable as well as contributes towards enhancement of learning experience. The goal of maximizing students' experience is not limited in improving opportunities and understanding of lessons from teaching processes. Indeed the maximization encompasses experiences from teaching environment provided by institution as well. This paper attempts to identify students' views on capacities and capabilities of institutions in providing conducive teaching environment. This paper is aim in justifying the level of importance of physical and non-physical amenities or services provided by institutions towards improvement of learning experience. The identification extends in determining the level of satisfaction amongst students with the current amenities or services in the institutions. A set of questionnaires is distributed to students of private higher learning institutions enrolled in undergraduate business related program. The outcome of this study suggest conducive teaching environment as mainly dependent on capability of human capital particularly teaching staff. Hence the findings indicate institutional capability and capacity in providing conducive infrastructural facilities are skewed towards competitiveness rather than improvement of learning experience. .

Keywords:

Teaching environment, importance, satisfaction, higher education, learning experience.

I. INTRODUCTION

The Malaysian education scene since achieving its independence in 1957 has been growing in leaps and bounds especially with the establishment of many universities and colleges comprising of both public and private. This phenomenon has truly fulfilled the country's aspiration to form the base for future quality human capital equipped with relevant knowledge. The

establishment of the Ministry of Higher Education (MOHE) in 2004 initiated by the government is geared towards Malaysia as the center of educational excellence in producing skilled human workforce [1]. [2] The main aspect of an ideal educational objective is continuous strive towards quality teaching to prepare for the needs of country's human resources in various sectors of development. Although at the same time this objectives needs to be align with the current development of Malaysia in which tertiary education does contributes towards building Malaysia into a developed nation. Therefore to be consistent with these endeavors and current competitive environment, teaching and learning conditions are among the factors that have an impact towards the effectiveness in nurturing future human capital with knowledge and skills [3]. To achieve this, higher institution of learning were not only seen as providing learning opportunities at various discipline but also the learning experience inculcate by conducive teaching environment.

The aim of this study is to evaluate and analyze the factors that could possibly contribute or deter to the achievement of the above mission by focusing on the contributions of creating conducive teaching and learning environments of institutions with effective management. Similarly this study investigates the role of education in compelling the issue of corporate social responsibility towards creating and contributing conducive teaching environment with positive learning experience. For the purpose of this study several indicators were identified and evaluated by several selected focus groups comprising students from the faculty of management. The factors were further prioritized and refined to define constitution of a conducive teaching and learning environment. To bring meaning and logic to the results of the study, the points discussed were categorized into four segments: teaching, student, facilities and services. Consistent to one study in Bangladesh, these findings would be useful as a guide

to professionals and policy-makers in formulating effective educational policy of a country. [4] In ensuring success in teaching and learning, the process requires the support and collaboration of several resources from appropriate technology, tools, academic and supportive staff, departments and faculties, student affairs, resource centers and financial services. In many instances the use of better quality resources and positive environment do lead to better quality of teaching and learning process towards long lasting learning experiences.

II. LITERATURE REVIEW

The main thrust of any higher education institution (HEI) is to inculcate quality through teaching delivery and continued enhancement of excellence in both teaching and learning. For a liberal education, this can be further enhanced by the combination of values with relevant professional qualifications in a globalised economy [5]. True to today's education, the learning environment is the interaction and the application of many elements. Basically the human factors, the educator, the infrastructures and the interaction with students often determine the outcome of many teaching environment. The stated combination is consistent to Hansman concept of learning that espoused learning as the shape of context, culture and tools in the learning process that is not simply happens or spontaneously exist in our mind [6]. High quality education may perhaps subsist due to facilities of higher education but more significant than the facilities is the catalyst of improved performance which is derived from the interrelationship within the context of the organization [7]. This includes tangible factors such as classroom, accommodation and other facilities including the human factors such as the lecturers and the services provided. The results of a survey distributed to determine students' views on an absolute student experience indicated that the elements of conducive teaching environment include both academic and non-academic matters ranging from teaching styles, teaching methods, library, computer provisions as well as university environment, catering, accommodation and social life [8].

Higher education has never been more important in the globalised world as the foundation of economic, social and cultural being of any nation. The major contribution is derived from the nation's ability to develop citizens' intellectualism and enhancing employability. Generally higher education adds to the world's repository of knowledge and understanding by fostering culture and promoting values that characterize higher education such as respect for evidence, respect for individuals and views and the search for truth [9]. One of the most important requirements to be met in order to attain quality higher education is to satisfy the students' expectations. Meeting the needs and expectations of the students as the principal beneficiaries of university education has become *numero uno* to most private HEIs [10]. On the other hand, the staff consist of the teaching team, research support as well as administrative and service staff had to be satisfied with daily tasks is considered as an engine for the organization's forward

movement. To achieve quality education, universities are pressured to change methods of teaching and learning that encompass the appropriate assessment methods, continued renewal of the curriculum, constant updating and upgrading of professional knowledge and skills that improve the broader educational, administrative and resource environments [11].

[12] Suggested that conducive teaching environment include comfort in the lecture halls, individual study areas, libraries, instructional materials and support services. A simple allowing learning process occur in a natural setting is no longer an option in the HEIs. Therefore, availability of resources such as funding, library, technical resource, administrative and faculty support within the HEIs are important factors [13]. In fact, all elements within the environment should interact positively to enhance the learning process. Other factors necessary in creating a conducive learning environment would include classroom management that extends beyond maintaining strict and rigid control over the class and contents but as well encompass an ability to establish comfortable environment that allows everyone to learn and participate freely [14]. Thus, the concept of conduciveness covers aspects that is not merely the process rather the physical aspects which incorporate the functions of management. Rewards brought about by learners who have been transformed in a higher education institution exceed the 'value for money' criteria of the funding bodies and the community at large [15].

Creating a conducive educational environment is as important as is the lessons taught and shared [16]. As such teaching environment is not only the infrastructure, the technology, the educators, or the student itself but also the management of all these factors. A teaching environment extends to the state of the lecture halls, individual study areas, libraries, instructional materials and support services as enhancement of a learning process that can only occur when a conducive learning environment is present [17]. According to [18] the learning experience should be productive rather than merely neutral. In an evaluation of adult learning experience, [19] concluded that higher education environment includes physical surroundings, psychological or emotional conditions, and social or cultural influences that affect intellectual growth and development. The general perception is many students are poorly prepared and have limited knowledge on the concept of the basic requirements on the learning process at higher education level, including study skills, motivation and independence [20].

Thus, there should be consistency in the support by encouraging line management in individual schools and facilities to develop staff at all levels to meet the broad goals, the divisional objectives and the individual maximum potential [21]. Quality can only be embedded successfully in a department or a university when there is a high-level management and leadership abilities [22]. This justifies the view that higher education is in actual fact a business-like enterprise where the student as a consumer seeks a business-like relationship with the

producer (lecturer) that delivers knowledge, skills and competencies that he or she wants [23]. [24] Interaction of many other factors produce growth in students; academic skill and knowledge in addition to school environment, teachers' qualifications, curriculum and instructional approaches [25]. Central to quality teaching is not just the ability of lecturers or educators to deliver lessons effectively and competently but also conducive physical environment up to date facilities that reflect good and efficient teaching management.

Therefore most HEIs provide the best possible teaching and learning environment to students as a form of the investment made by parents. Considering the huge public and private investment in university education, there is a need to evaluate how effectively this investment is being utilized by examining the quality of the educational infrastructure, the cadre of qualified tutors and other resources in place as well as the quality of teaching and learning [26]. In Malaysia, part of the government responsibility towards the structural transformation of the economy and the emphasis of the educational policy has been directed in building pool of well-educated and skilled professionals [27]. Hence part of the HEIs responsibility to the society is providing conducive teaching environment with effective learning experience towards producing better graduates.

III. METHODOLOGY

A set of questionnaires consisting of 46 questions are developed based on Likert scale. The questions are ranked between 1 to 5 with 1 being very unimportant and 5 being very important. The set of questionnaires is distributed to students in private higher education institutions within Klang Valley, Malaysia. A total of 300 questionnaires are distributed and all of them are returned though only 204 are completed by respondents.

The collected data is subjected to descriptive statistics analysis for preliminary findings. Subsequently the data undertake reliability testing of Cronbach's Alpha as well as validity testing of Keiser-Meyer-Olkin and Bartlett's prior to Principal Component Analysis. Ultimately the data progress to Multivariate Regression Analysis. Two regressions are performed in order to determine the association of elements of teaching environment towards students' perception on satisfaction as well as contention of institutions.

IV. FINDINGS

Table I report that more than 60% of respondents are female whereas more than 80% of respondents are local students. Most respondents are in their second year and undertake Business related degree program. Table II report the summary of data from all respondents. On the surface most questions are skewed as being ranked either important or very important by respondents. Table

III report an acceptable level of reliability and validity of each elements of teaching environment in the questionnaires.

TABLE I

Descriptive Statistics of Respondents			
Gender		Nationality	
Male	38.7%	Local	86.8%
Female	61.3%	International	13.2%
Year of Study		Program	
1	33.8%	Marketing	2%
2	42.7%	Accounting	36.3%
3	23.5%	Business Admin	51.5%
		Management	9.3%

TABLE II

Descriptive Statistics of Students' Perception					
	VU	U	N	I	VI
LECTURE AND TUTORIAL FACILITIES					
Overall lecture and tutorial rooms	2%	2%	18.6%	25%	57.5%
Size of classroom	1%	2.9%	16.2%	27.9%	52%
Level of cleanliness	1%	2%	15.2%	27%	54.9%
Lighting and layout	1.5%	1.5%	14.2%	28.9%	53.9%
Teaching equipment i.e. projectors, whiteboard etc.	1%	1%	13.7%	21.1%	63.2%
ANCILLARY FACILITIES					
On-campus food outlets	1%	5.4%	16.2%	35.3%	42.2%
Vending machines	1%	8.3%	35.8%	30.9%	24%
Learning resources centre	0%	1%	21.1%	34.8%	43.1%
IT facilities i.e. labs, computers, printers	1%	1%	18.1%	29.9%	50%
Recreational facilities	0.5%	2.9%	28.9%	37.7%	29%
Availability of parking space	1.5%	2.9%	16.2%	27.9%	57.5%
Security measures	2.5%	1%	19.6%	29.4%	47.5%
Registration procedure	1.5%	1.5%	17.6%	28.9%	50.5%
Accommodation facilities	2%	1.5%	17.6%	28.4%	50.5%
Overall services	0.5%	3.4%	19.1%	27.9%	49%
FACILITATING SERVICES					
Lectures	1%	1.5%	11.8%	25%	60.8%

Tutorials	1%	2.9%	11.8%	25%	59.3%
Teaching presentation	1%	2%	14.2%	32.8%	50%
Supplementary lecture handouts	1%	1.5%	18.6%	34.3%	44.6%
Supplementary tutorial handouts	1%	1.5%	17.6%	33.8%	46.1%
Recommended textbooks	0.5%	5.9%	26%	38.2%	29.4%
Cost of textbooks	2%	5.4%	22.1%	20.1%	50.5%
Tuition fees	3.4%	4.9%	13.2%	20.6%	57.8%
Usefulness of textbooks	1%	2.9%	22.5%	36.3%	37.3%
Availability of textbooks	1.5%	3.4%	22.5%	31.9%	40.7%
Expertise of teaching staff	2%	1.5%	20.1%	30.9%	45.6%
EXPLICIT SERVICES					
Teaching ability of academic staff	1.5%	1.5%	14.7%	25%	57.4%
Consistency of teaching quality	2%	1%	15.2%	30.4%	51.5%
Organization of timetable	1%	2.9%	14.2%	25.5%	56.4%
Responsiveness of teaching staff	0.5%	1%	17.6%	34.8%	46%
Course load	0.5%	2.9%	17.6%	36.8%	42.2%
Appropriateness of assessment method	0.5%	1.5%	21.6%	36.3%	40.2%
Appropriateness of assessment style	0.5%	3.9%	20.6%	35.3%	39.7%
Appropriateness of assessment quantity	0%	3.4%	21.1%	37.7%	37.7%
Promptness of feedback	1%	2.9%	21.6%	33.3%	41.2%
Usefulness of feedback	1%	1%	23.5%	32.8%	41.7%
Helpfulness of admin staff	0.5%	3.9%	22.1%	31.4%	42.2%
Helpfulness of academic staff	1%	2.9%	19.1%	26%	51%
IMPLICIT SERVICES					
Friendliness of academic staff	0.5%	2%	14.7%	23.5%	59.3%
Approachability of admin staff	1%	1.5%	16.2%	26.5%	54.9%
Empathy of staff	1%	2%	18.1%	29.9%	49%
Respect towards feelings, concerns/problems of staff	1%	2.5%	15.7%	32.4%	48.5%
Competency and professionalism of lectures	0.5%	1%	17.6%	39.2%	41.7%
Competency and professionalism of tutorials	0.5%	0.5%	22.5%	33.8%	42.6%

PERCEPTION					
Best interests are served	0.5%	2%	19.1%	35.3%	56.9%
Comfortable university environment	0.5%	2%	12.3%	31.4%	53.9%

TABLE III

Assumptions Testing				
	Cronbach's Alpha	KMO	Bartlett's	Eigen values
Lecture and tutorial facilities	0.915	0.865	717.111*	74.812%
Ancillary facilities	0.917	0.913	1186.866*	57.689%
Facilitating services	0.931	0.877	1854.796*	69.515%**
Explicit services	0.958	0.925	2513.508*	68.681%
Implicit services	0.942	0.909	1556.151*	68.349%

• * p-value < 0.05

• ** The factor analysis produce two component subsequently named as facilitating materials and facilitating costs in the regression analysis.

Table IV report the outcome of regression analysis between elements of teaching environment and students' satisfaction.

TABLE IV

Regression Analysis of Elements and Satisfaction			
Model	Standardized Coefficients	Collinearity Statistics	
	Beta	Tolerance	VIF
LTF	-.191*	.312	3.200
SF	.112	.263	3.806
FSMAT	.037	.269	3.716
FSCOST	.017	.886	1.129
ES	.188*	.242	4.134
IS1	.608*	.275	3.634

• * Significance at 5%

• Adjusted R² is 0.572

• F test value is 46.104 significance at 5%

The model report adjusted R² value of 0.572 reflects the acceptable influence level of elements towards satisfaction level of student. The model is further sustained by the acceptable level of multi-collinearity amongst elements of teaching environment. The significant F-statistics suggested that the acceptable level of model fitness. Subsequently t-statistics suggest lecture and tutorial facilities, explicit services and implicit services are important elements of teaching environment that satisfy the students. The outcomes signify the elements required to provided by institutions

in order to create conducive teaching environment towards improved learning experience.

Table V report the findings of regression analysis between elements of teaching environment students contention of institutions. The outcome report adjusted R^2 value of 0.571 reflects the acceptable level of influence of the elements towards contention level of student. Similarly to the previous model the significant F statistics suggest acceptable level of model fitness. Subsequently t-statistics suggest implicit services as the contributing factors towards students' contention of institutions. The outcomes indicate this is the only elements required by institutions to achieve conducive teaching environment towards improved learning experience.

TABLE V

Regression Analysis of Elements and Contention			
Model	Standardized Coefficients	Collinearity Statistics	
	Beta	Tolerance	VIF
1 (Constant)			
LTF	.096	.312	3.200
AF	-.045	.263	3.806
FSMAT	.050	.269	3.716
FSCOST	-.051	.886	1.129
ES	-.028	.242	4.134
IS	.717*	.275	3.634

- * Significance at 5%
- Adjusted R^2 is 0.571
- F test value is 46.069 significance at 5%

V. DISCUSSION AND CONCLUSIONS

The findings reveal the significant elements in creating conducive teaching environment as lecture and tutorial facilities, explicit services as well as implicit services. The quintessential of explicit services comprise of ability of academic staff i.e. quality and consistent teaching along with assessment design of the program. Whereas the elements of implicit services focus on the capability of and soft skills of academic staff in promoting favorable teaching environment that enhance learning experience.

The study concludes that the role of institution in ensuring constructive learning experience. According to students the essentials of conducive teaching environment are mainly focus on the human capital of institutions, the role of institutions should now signify

towards investment in people in the organization rather than tangible infrastructural facilities. Hence physical and tangible assets of organization are elements that support human capital but not the major elements of conducive learning experience.

The trend of providing up-to-date campus facilities, good location, excellent infrastructure and services are undeniably visible amongst higher education institutions particularly in Malaysia. The main perception leading to the current trend is mainly due to the need of being competitive. Consequently, the competition in term of advanced tangible facilities leads to the reduction of other costs such as attractive remuneration packages and career progression of academic staff. The trade-off between tangible facilities and welfare of employees may perhaps causes unhappiness and disappointment amongst human capital in the industry. Subsequently the industry may suffer insufficient academic experts in the long run if welfare is not given the utmost importance. Thus the findings may perhaps be useful to point out to the HEIs particularly privately owned institution that the effort of improvement in infrastructure are less crucial compared to human capital to maintain competitive advantage.

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Strategic Analysis of Students' Interests Mapping to Forecast and Develop Higher Education Institution's International Competitiveness

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Abstract— Students, as the main customers, are a potential group influencing the Higher Education Institution's strategic planning, objectives, and achievement. Besides lecturers and administrative staff, students can be a powerful agent driving the HEI in enhancing competitiveness. Students may perform achievements both in academic and extra-curricular activities. A kind of quality recognition awarded by local authority of higher education considers the HEI quality from four dimensions namely the governance, research quality, social services, and the students' achievement. This research is conducted to map the students' competencies of a business college in Indonesia namely by identifying the students' interests or hobbies. This research also identifies how student unions' awareness to enhance the institution's international competitiveness. The research design used secondary data of students of batch 2011 taken from systemized data base. These competencies were matched with the awareness of student unions because they have a role to make or involve students in competitions including the international one. The awareness of the student unions was measured by interviewing the twenty managers of the twenty unions available and their annual programs with which the unions make competitions or make achievements. The analysis used descriptive analysis supported by the data taken on the interview with the managers. The result is that the interests of the students fell into arts, sports, managing organizations, and sciences. While the twenty student unions do not strongly support since they are less aware of what they should have done in-line with the college's vision. The implication for the college is that there should be a student union guidance in setting annual programs referred to international involvements.

Key words: strategic analysis, students' interests, student unions, international competitiveness, strategic planning.

I. INTRODUCTION

This The role of students of Higher Education Institution (HEI) to enhance its international competency is of very much importance. This is because the students, as the institution's main customers, may contribute their competency both in academic and non-academic activities, by their achievements and competition participations. Their outstanding records of achievement potentially improve the institution image, and public as well as stakeholders' trusts which is very crucial. In Indonesian Accreditation Assessment, higher education institutions with more students' achievements will get more

points, never mind the international achievements. That's why, higher education institutions should ideally better think of how to see the opportunity of involving students in competitions especially the international one. To see the liability of the students' competence before involving them into competition, HEI must have known whether the students are competent or not. So, there must be an identification to see their hobbies or interests as well as their last achievements. The summary of the identification is a mapping of the students' competencies.

Those what is done with involving the students in competitions are referred push strategy. Anyhow a HEI must also find competition or forums in which its students will join in. Any effort HEI is doing to give students access for competitions or forum to make achievements is referred push strategy. The effort to get access can be events that belong to all student unions or student club at HEIs.

Nowadays, in Indonesia, getting or involving to get international standard or international competencies are very much socialized and encouraged by DIKTI (Indonesian Directorate General for Higher Education) to know and achieve. Strategically, the government would like to improve the nation competitiveness through the quality of human being educated in HEIs.

If push and pull strategies above are matched, the prediction to develop students achievement in international competencies can be done more systematically. So the systemized roles of the HEI's students can strongly help the HEI get international competitiveness.

II. THEORETICAL FRAMEWORK

Strategic analysis refers to analysis done to make very important decisions that need great number of assets, involving multi departments, referring to strategic planning achievement, and refer to future development [4]. Higher Education Institutions (HEI) in Indonesia are strongly encouraged by the Directorate General of Higher Education to involve or start to mingle to have international exposure, or even international achievement. By going global, it is hoped that in turn, HEIs will have international competitiveness. HEIs with international competitiveness then are able to process excellent education and in turn are able to graduate

graduates with excellent international competitiveness. This consideration has been strongly implemented in some longterm strategic planning of STIE Perbanas Surabaya in mingling itself to international exposure [7]. Reference [9] a HEI needs to explore what internal factors that should be developed in priority. In analysing internal resources, HEI of course explores comprehensive matters of the institution to optimize its strengths and to avoid focusing on or minimize its weaknesses. Anyhow, assessing external environment in setting the strategic planning such as government regulation, customer, competitor, politics, demography, economy etc. is also very crucial [3]. Strategically to develop and sustain the existence of a HEI, core competence must be explored and every time must be predicted at what extend to be able to develop [4] The resource management that is managed considering the aspect of being stronger than those belonging to the competitors will the lead to competitive advantage [5],[9].

Indonesia Higher Education Directorate determines its long term strategic planning that is also called Higher Education Long Term Strategy (HELTS) that is, then, referred by universities in preparing their strategic planning. The HELTS includes LRAISE that stands for leadership, relevance and quality of academics, academic atmosphere, internal management, sustainability, efficiency and productivity [7], [9]. These points are referred to improve the quality of teaching and learning, research, and civil services. Anyhow, the role of students become a very much important since students are HEI's main customers.

The descriptive analysis is done by matching the mapping of students interests to the annual programs of the twenty unions' or clubs' annual programs as well as to the comments of all unions' or clubs' managers on the college international competitiveness. The data are analysed descriptively and especially the questionnaire items are analysed to get descriptive pictures of the managers' intentions on the college international competitiveness using excel of Microsoft office. In analysing, to get the potential opportunities for the students to perform and make international exposures or achievements, the college strategic planning is used to direct where the international exposures and achievement should go and which student unions that should perform more in line with the college vision, mission, and strategic planning. The research framework and data are as in the figure below

III. RESEARCH METHOD

The problems of the research are a) what is mapping of the students' interests of STIE Perbanas Surabaya; b) What is the forecast the college's international competitiveness based on the students interests mapping. Referring to these research problem, the objectives of the research are: a) to get the mapping of the students competencies; b) to forecast and develop the college's international competitiveness considering the roles of the students' competencies. Based on the research object which is the students of STIE Perbanas Surabaya, a business college in Surabaya, Indonesia, the data

used are taken from the following sources: a) the students competencies (batch 2011) which are the hobbies or interests of the students in which this secondary data are taken from the database of Student Affairs Unit; b) the second data is on the students union or clubs which covers two kinds of data namely the annual programs of all unions or clubs whether the programs have accommodated students competencies to perform and make achievements; while the second kind of data on the unions is the primary data which are the comments of all unions' or clubs' managers on their intention to support the college's international competitiveness taken from questionnaires distributed to all managers; c) the targets in the college strategic planning concerning to the students achievements.

The descriptive analysis is done by matching the mapping of students interests to the annual programs of the twenty unions' or clubs' annual programs as well as to the comments of all unions' or clubs' managers on the college international competitiveness. The data are analysed descriptively and especially the questionnaire items are analysed to get descriptive pictures of the managers' intentions on the college international competitiveness using excel of Microsoft office [6]. In analysing, to get the potential opportunities for the students to perform and make international exposures or achievements, the college strategic planning is used to direct where the international exposures and achievement should go and which student unions that should perform more in line with the college vision, mission, and strategic planning. The research framework and data are as in the figure below.

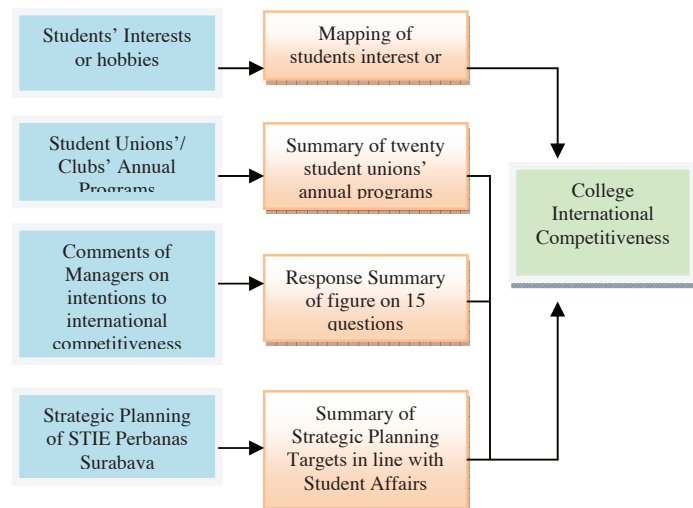


Fig 1 Research Framework

IV. RESEARCH RESULT

A. Student Interests Mapping

The result of the research is some recommendations on finding which area and how to develop the students competencies to achieve international exposures or

achievement. Based on the mapping of the students' interest, it is found that the ten big participants are soccer, dance, journalistic, band, entrepreneurship, basket, and badminton. Three students' clubs that are targeted to improve role to perform in line with the college vision and mission are in IT, English and Entrepreneurship. There are 928 respondents and 48% (446 students) did not answer (skipping hobbies). So the student data processed is 52% (482 students). From the mapping, the interest or hobbies presented in line with the unions or clubs available to accommodate the hobbies, while 'other' taking 7.7% includes several hobbies that institutionally can not be accommodated because there are not unions/clubs that will them. Based on the college strategic planning, three unions of English Club, Entrepreneur Club IT club must be developed in priority, but in fact from the students of batch 2011 only entrepreneur that gets 7.9% (38 students) out of the total data of 482. English Club only get 5% and IT Club gets 3%. The college must think of issuing a policy leading more students to support activities conducted by English Club. Or if the number of these unions is not many, but college can make activities conducted by English Club as an obligation. Top-down policy anyhow can still be acceptable because beside students, actually lecturers have also been involving in international activities, so internal support to this direction will be of great.

IT club seems face similar facts as those of English Club. IT Club gets the least number of participants. Perhaps students think that their academic activities have been burdened or blackberry features have been becoming everything. Anyhow, there should be a serious discussion with an IT expert or lecturers on how to optimize this resource to improve some benefit to the students.

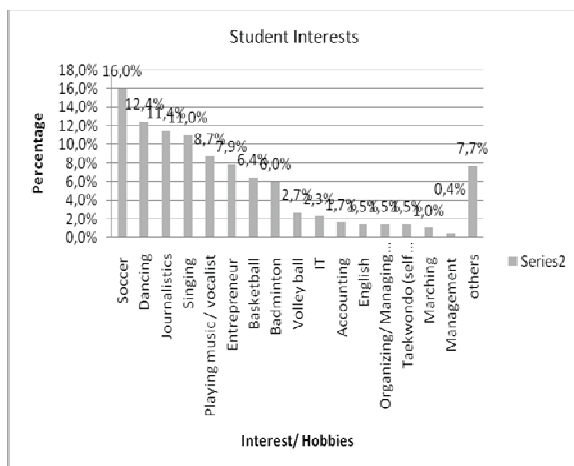


Fig 2 Mapping of the students' interests

Considering joining or making online competition will be of a wide decision since it can welcome students around the world. The last union prioritized in the college strategic planning is the Entrepreneur club. This union has been excellently built some national achievement because there have been a lot of competition obligatory conducted by the Indonesian Higher Education Directorate General such a competitive Student Innovation, Internship program, Entrepreneur competition.

Even students have creatively produced some product that has been highly demanded. To involve more in international arena, there might be some ideas of setting up entrepreneur competition in South East Asia by online. This will be of cheap and highly effective.

B. Student Unions' Annual Programs Identification

The result of this identification is that except English Club, there is no other of the twenty unions having international programs to implement. English Club has several program to improve the students' English through routine practice, using English among members, conducting English Debate Competition, and performing drama in English.

C. Student Unions' Managers Response on the College International Competitiveness

There are twenty unions or clubs in STIE Perbanas Surabaya which are basket ball club, volley ball club, soccer club, lawn tennis club, badminton club, taekwondo (self defence), dance club, choir, band, English club, Journalistics, Computer and IT Club, entrepreneur club, Islamic study club, Christian study club, marching club, Management Club, Accounting club, Student Executive Board, Student Representative Board, so there are twenty managers invited to share their opinion using questionnaires which the result has been summarized as in Table I below.

TABLE I
RESPONSES ON INTERNATIONAL COMPETITIVENESS

No	Questions	Score
1	Understand college vision	4.05
2	Have implemented vision to annual programs	3.45
3	Know college strategic planning	2.8
4	Have implemented strategic planning to annual programs	3.0
5	Know to make annual programs based on strategic planning	3.9
6	Be willing to support college strategic planning	4.3
7	Current annual planning have implemented vision & strategic planning	3.35
8	Union key people willing to support college vision & strategic planning	4.2
9	Among unions are willing to synergize to implement annual programs.	4.3
10	Current college achievements also need students achievements	4.7
11	Unions are willing to raise students achievement	3.9
12	Unions are ready to make achievements	4.55
13	Be ready to search opportunity of competition such as in website	4.55
14	All college achievement depend on students achievement, too	4.55
15	Be ready to be in international competition	3.55

Based on the data, most managers understand the college vision of concerning into international standard and have implemented the strategic planning into their annual program, but in question 3 most of them do not know the college strategic planning. Based on identifying the twenty annual

programs, none of them have been implemented international effort. So there is no consistent in giving answer. However, the positive things are that they are willing to support the college strategic planning (question 6 score 4.3, question 8 score 4.2), are willing to improve students' achievement (question 11 score 3.9) and are ready to join international competitions (question 15 score 3.55). This considers good points since the college still have reliance on the unions' effort to involve all students to be aware of involving in international program, or joining in international competitions.

D. The Strategic Planning Summary concerning to Student Affairs

English Club, Computer and IT Club and Entrepreneur Club are hoped to develop in priority since the substance of their activities can strongly support the college international achievement. Considering the target stated in the college strategic planning and the opportunities some programs are put forward to be included into eleven out of twenty student unions' annual programs and implemented to create international exposure, performance and achievement.

TABLE III
POTENTIAL INTERNATIONAL COMPETITIVENESS

Unions/ Clubs Supports	Potential International Achievement
Soccer	Joining in Indonesia-America Soccer Exchange
Dance	Create a dancing dedicated to an international organization.
Journalistics	Participate in international online competitions
Choir & Band	Create a song dedicated to an international organization.
Entrepreneur	continue networking with the university abroad on entrepreneur competition.
IT	Lead students' to support international competition and to increase webometric rating.
Accounting	Invite international accounting company to share knowledge.; joining international competition.
English	attract students to join international programs, internal English competition, English day.
Student Reps / Executive	Joining international student organization (South East Asia wide)
Management club	Joining online international management competition

Soccer club has made excellent performance by getting two girl-students successfully accepted in Indonesia-America Soccer Exchange. If the college then keeps on networking with the USA Consulate then perhaps the opportunity for the

student to have joint exercise with the USA students will be coming again.

Dance club and band can be collaborated to create a dance and song dedicated to an international organization representing an international moment for example day without tobacco, Children day etc. This can be a very good contribution to that international organization.

Accounting and Management Clubs usually only conduct local or national seminars. Now they need to be challenged by going international perhaps at South East Asian wide.

Student Representative Board and Student Executive Board are two organization of higher levels than the other. Their function is to control other students organization. The college might be thinking of finding an organization at higher institution students' level so it is like an international young students.

V. CONCLUSIONS

The conclusion of the research result are as follows: a) The student competencies mapping showed that English club and IT club do not have good number of participants, but Entrepreneur Club got quite good number of participant; b) the annual programs of the twenty unions have not include activities leveraging international exposures, except English Club; while Unions' managers are willing to support and achieve international exposures and based on the student affairs referred in to the college strategic planning to develop in priority are English Club, Entrepreneur Club and IT Club. Based on the target of the strategic planning and considerations seeing the opportunities to get international exposure to increase the college international competitiveness, it has been recommended some activities that can be implemented by eleven unions.

Journalistics club should strongly conduct competition on writing news or having cooperation with an international media to conduct the competition. If the competition conducted is online then it is very open to welcome anyone in the world.

ACKNOWLEDGMENT

The finalization of this research is strongly supported by the role of STIE Perbanas' Students sharing on the college international competitiveness. Some information is also prepared by the Student Affairs Department of STIE Perbanas. The Head of Management Dept. and the Research Center have also helped evaluate the proposal of this research. At last, SEAAIR Executive Committee (SEC) and Chiang May University having considered and accommodated my suggestion to extend the paper submission due to at prior and on the deadline, Moslems were in religious holly days.

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Effects of Unconscious Reframing in Diminishing Sexual Orientation of Young Male Homosexuals in an Exclusive School in Metro Manila

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Abstract. Individuals who seem to have different sexual orientation from usual expectations of what they should be are customarily scorned for their actions and decisions to the extent of becoming objects of indecent remarks and distasteful jokes. Worse is when they are alienated because their organizations condemn homosexuality as degrading and immoral. This makes promises of liberating them from sexual orientation remote. Studies have shown how effective counseling intervention for homosexuals in dealing with related issues [7], especially if it's within its immediate environment [8] and community [10].

The study aimed to determine the effects of Unconscious Reframing to the sexual orientation of young male homosexuals. Using a pre-experimental research design, six young male homosexuals participated as subjects of the case study. It utilized the Bem Sex Role Inventory (BSRI) to establish the pre-test and the posttest data together with the Draw a Person Test (DAPT). T-test of paired samples was used to establish the effect of the intervention. This study concludes that the Unconscious Reframing, as a Neurolinguistic Programming technique, is an effective counseling intervention in diminishing homosexual tendencies among young males. Realistic recommendations were drawn to further enhance the existing school's effeminacy intervention program, the primary aim of which is to help sexually confused adolescent clarify issues and misconceptions about their sexual orientations.

Key Concepts: Unconscious Reframing, Homosexuality, Young male homosexuals

Theme: University Social Responsibility
Category: Research Paper

I. INTRODUCTION

In situations where individuals seem to have a different sexual orientation from what people expect them to be, they are usually mocked for their choices, actions and actuations. They become, more often than not, the victims of name-calling, object of indecent remarks, objects of distasteful jokes and sometimes are physically abused as well. It is even more oppressing as people in more conservative organizations would dictate that being a homosexual is immoral and degrading. Young individuals in this circumstance would surely feel lost. They would certainly seek support from individuals whom they could

relate and trustingly identify with their feelings and emotions. In most cases, organizations where these homosexuals belong do not have properly placed programs and or structures that support these individuals to help in liberating themselves from their homosexual uncertainties. Opportunities for them are rare to have recognized and guided process of discovering their own sexual identities.

Being a counselor, this researcher has witnessed and lived with these realities. Young homosexuals tend to hide their sexual identities for fear of being discriminated and mistreated. While some of these individuals keep their expressions of their own sexual orientation on hold and seek for the perfect time, place and people before they come out, others seem to find their sexual orientation disturbing. Some would often demand help with the view of minimizing and eventually extinguishing it. In fact, some of these adolescent males expressed overtly that they could have more in life if they revert to their old sexual orientation.

While some are still skeptical about curing homosexuals because it is not a disease or illness [15], there have been successful scientific methods and techniques that have been found to be effective and helpful in addressing the issues and problems related to homosexuality. Some of these techniques and approaches includes hypnosis [1], reparative therapy [5], lesbian and gay affirmative psychotherapy [14] and neurolinguistic programming or NLP ([13], [11], [16]).

NLP, in the personal life of this researcher, has eradicated certain fears and resolved some issues that have prevented her from fully functioning not only as a professional but also as a person. For more than 10 years now, she would use varied techniques that are appropriate for the clients and their problem. There were homosexual clients that were helped to overcome depression and guilt both related to being homosexuals. Sessions involving unconscious reframing and new behavior generator were employed. Among these clients was an adolescent who was pleased to feedback as being in a happier stage and was able to find the right time and place to "come out" to his parents. At this writing, this client has been occupying a junior executive position in a multi-national company; he reported that his homosexual issues are all resolved.

This study investigated the effects of unconscious reframing in diminishing homosexual tendencies among adolescents and has generated realistic recommendations that were considered in developing the schools' effeminacy intervention program.

II. FRAMEWORK

Neurolinguistic Programming is a new science and has found its application not only in counseling but also in business and education, to cite a few. The proponents Grinder and Bandler as influenced by Virginia Satir, Fritz Perl and Milton Erickson, believe that both verbal and non-verbal language need to be observed in order fully understand language and communication [3]. The NLP proponents further explain that everyone's perceptions of the world are filtered through preferred modality of learning. When a counselor is able to give information through this dominant modality, the client will process the information efficiently because of the meaning attached to it. In this study, the major intervention would involve modification of the sexual orientation through unconscious reframing, one of the NLP techniques.

Although there are several theories and studies explaining the genetic and hormonal causes of homosexuality, the researcher believes that the social and/or environmental influence still plays a large part in the development of homosexuals ([16], [4],[9]). This research espouses that the young homosexuals really started out as heterosexual individuals.

As influenced by NLP practitioners, the worldview of these homosexuals is perceived to be limited. Furthermore, the limitation is even more real when they become unhappy about their sexual orientations. The unhappy homosexuals then would desire to change their sexual orientations. The role of the researcher-counselor is to assist the unhappy homosexuals resolve their fears through their negative feelings and thoughts with their positive resources, tapping their unconscious mind to teach them new alternatives that agree with the conscious self. This intervention eventually leads to a wider worldview that helps the participants to happier dispositions and with diminished homosexual tendencies or orientations ([3], [12]).

Figure 1 shows the conceptual framework the underlying assumption of the study which states that the young male homosexuals started out as heterosexual individuals and became homosexuals due to environmental influence. As a consequence, they are unhappy because of their sexual orientation together with their limited world view. Their desire to be helped to change their sexual orientation brought them into the NLP intervention. The study further assumed that said treatment diminishes their sexual orientation and widens their world view.

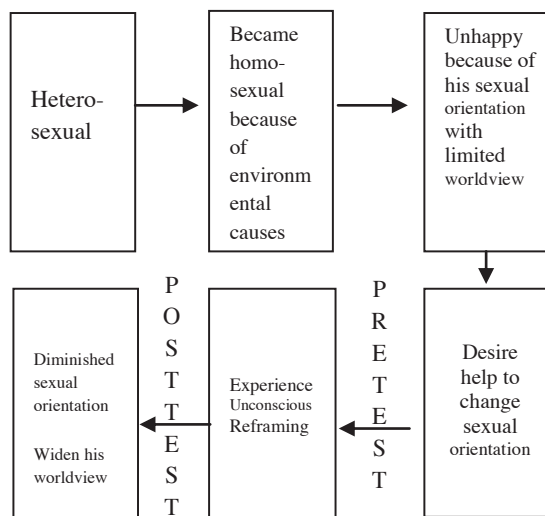


Figure 1 Conceptual Framework Diagram

III. OBJECTIVES OF THE STUDY

The main purpose of this research is to determine the effects of Unconscious Reframing to the sexual orientation of young male homosexuals. The results of the study may be of great benefits to the following:

For the teachers and advisers, the results could make them realize that students with homosexual tendencies may be helped in their personal issues and problems through proper channels. For the students, with similar problems and similar age group, can benefit from concrete and tried counseling interventions. Hopefully, it will also help young male homosexuals in reverting to their original sexual orientation.

For the participants of this research, they are given a chance to explore their issues and problems using the Unconscious Reframing. This gives them also the opportunity to know themselves better throughout the entire process. For the counselors, the treatment can better assist clients with similar problems. The results can also enrich their practice as they handle clients with homosexual issues. To create a program that would help the school's minority hurdle difficulties and further maximize the clients' potentials.

For school administration, the results can help them in supporting and approving programs that are surely backed up with evidences of change, which are quantified in test results and other related data.

IV. RESEARCH DESIGN

The research design of this current study was influenced by the dissertation of [16]. This present study however changed some of the quantification mode to improve the reliability of DAPT measure with younger male population as the subjects. Together with the Bem Sex Role Inventory, DAPT was given as a before and after the treatment (unconscious reframing). This study used a pre-experimental research design, specifically a pretest

post-test method, using one group. This research also made use of case study, a qualitative method to allow a more thorough investigation of individuals that formed the small group. Each participant was given specific treatment. The same treatment was used for each participant. This small-scale research design allowed more depths in terms of detailed description and as well as the interpretation of the treatment made that was eventually varied from one participant to another. Note taking was done per session to fully document the processes for each participant. The detail note taking per sessions is not impossible for small groups [6].

A. *Participants*

There were six (6) participants who were described as young male homosexuals. Their year level counselor endorsed them. They were from an exclusive all-boys school, whose age range was between 15 and 16 years old. All were Roman Catholics and in the second year level. They are all in the heterogeneously group classes. Their school ability and achievement falls within the range of average to above average. All participants have both parents and sibling or siblings. All of them did not have neither homosexual nor heterosexual relationships. They all discovered their homosexual feelings and actions when they were in grade school level. These young homosexuals have expressed their unhappy feelings toward their sexual orientation. This is mostly due to uncertainty and non-acceptance of their state in their own family. They decided to try changing their sexual orientation through the counseling session.

B. *Data Gathering Procedure*

1) *Selection of the Participants*

The participants were chosen only based on the earlier criteria set. During the initial interview, they were thoroughly briefed of the study and were told that the procedure or the treatment will only be effective if the participation is honest and sincere. The effectiveness of the procedure as supported by studies and personal counseling experience was also discussed. The process of documentation was explained thoroughly. All of them were made to understand that the voice recording will only be for the researcher's use. They had been continually assured that no other person will know the details of their thoughts and feelings, unless they consent to the extent of sharing and to whom. Each of the participants then committed to the whole process for them to be included in the study. They were made to understand that confidentiality would be held at all times. Their personal identities were also safeguarded.

2) *Interface Procedure*

Prior to the first session, the counselor made a pre-screening interview. The screening interview was also the venue for giving the orientation. It was also used to

schedule the pre-testing. On the second meeting the participants were administered the two (2) tests. Right after the test administration, the second session was used as the individual treatment itself. The treatment gap from second to the third session was one (1) month. On the last session, the researcher-counselor simply made follow-up counseling session where the participants were asked of their feedbacks. It is also where the participants were post tested using the two (2) tests used earlier.

3) *The Intervention*

The treatment that was used is called the unconscious reframing. It is defined as an intervention that entails learning to recognize negative thoughts and statements and replace them with positive one, while one is unconscious or in a trance state.

C. *Instruments Used*

The Bem Sex Role Inventory (BSRI) and the Draw a Person Test (DAPT) formed the objective measures. BSRI, authored by Sandra Bem, provides independent assessments of masculinity and femininity in terms of the respondent's self-reported possession of socially desirable, stereotypically masculine and feminine personality characteristics. This can also be seen as a measurement of the extent to which respondents spontaneously sort self-relevant information into distinct masculine and feminine categories. The self-administering questionnaire measures masculinity, femininity, androgyny, and undifferentiated, using the Masculinity and Femininity scales. [2]

The Draw-A-Person (DAP) Test is another instrument used for the psychodynamic approach. DAP has been widely accepted in the area of psychological testing. In fact, it was ranked as the eighth most used tool for clinical diagnosis in the United States. This popularity and appeal may be attributed to its being interesting and highly imaginative. But, in spite of its creativity, it remains to be objective and strongly founded. In administering the DAP, the examiner, then, instructs the examinee to "draw a person", thus, the name of the test. After drawing one person, the examinee then proceeds to draw another person of the opposite sex with the first one. [17] To attain reliability of the results, the inter-rater approach was used where the researcher and another guidance counselor scored the DAPT results.

D. *Statistical Treatment*

T-test for paired observation was used to determine the significant difference in the Bem Sex Role Inventory scores before and after the intervention. The Statistical Package for the Social Sciences (SPSS) version 11 was used in the computations. The null hypothesis stating: "the decrease of the post test scores is not significant" was tested.

V. RESULTS

Table 1 shows the Bem Sex Role Inventory (BSRI) scores and the interpretation. The raw scores are necessary in order to get the T-scores, which was compared to their

norm group. The norm values were compared to the actual computed values for both masculine and feminine scale that lead to the final sexual orientation interpretation of each participant. The table shows that out of the six (6) participants, three (3) were feminine and the other three (3) were androgynous. Feminine participants scored high feminine characteristics and scored low on the masculine characteristics. Androgynous participants were described as high feminine characteristics and also high masculine characteristics. These people are capable of being both compassionate and assertive, and can be both masculine and 'feminine' depending on the appropriateness of the actions in certain situation. [2]

TABLE 1

BEM SEX ROLE INVENTORY SCORES AND INTERPRETATION (BEFORE TREATMENT DATA)

Partici- pants	Raw Scores		T - Scores		Interpretation
	M	F	M	F	
1	97	90	4.85	4.50	Feminine (high feminine, low masculine)
2	122	114	6.10	5.70	Androgynous (high masculine, high feminine)
3	113	119	5.65	5.95	Androgynous (high masculine, high feminine)
4	114	116	5.70	5.80	Androgynous (high masculine, high feminine)
5	94	110	4.70	5.50	Feminine (high feminine, low masculine)
6	74	93	3.70	4.65	Feminine (high feminine, low masculine)

The next table (Table 2) shows the individual interpretation of the participants' Draw-A-Person Test (DPAT) before the intervention was given. The main focus of the interpretation was essentially to look for any indications of homosexual tendencies and other related factors that have contributed to such behavior. The first (1st) drawing of participant number 1 shows that he identified with a feminine figure, which was reinforced by his maternal dependence, as seen in his second drawing. The first drawing further suggests that the mother was perceived to be a strong image. A homosexual trend was also present in his drawing, which may be related to his tendency to his feminine identification, a sexual role inversion.

TABLE 2

DAPT INTERPRETATION AND OBSERVATION BEFORE THE INTERVENTION

PARTI CIPANT	DRAWING INTERPRETATION	
	First Drawing	Second Drawing
1	<ul style="list-style-type: none"> ◦ Feminine Identification ◦ Compulsion 	<ul style="list-style-type: none"> ◦ Maternal Dependency

	<ul style="list-style-type: none"> ◦ Wrong attachment to or dependence to mother ◦ Homosexual Trend ◦ Strong mother image 	
2	<ul style="list-style-type: none"> ◦ Identifies with his own sex ◦ Evasive ◦ Dependency 	<ul style="list-style-type: none"> ◦ Sexual Immaturity ◦ Maternal Dependence
3	<ul style="list-style-type: none"> ◦ Wrong attachment to or dependence to mother ◦ Feminine identification with dominant mother ◦ Feminine Tendencies 	<ul style="list-style-type: none"> ◦ Maternal Dependence ◦ Homosexual trend ◦ Homosexually conflicted individual
4	<ul style="list-style-type: none"> ◦ Wrong attachment to or dependence to mother ◦ Maternal Figure ◦ Homosexual Trend 	<ul style="list-style-type: none"> ◦ Maternal Dependence
5	<ul style="list-style-type: none"> ◦ Identifies with his own sex ◦ Maternal Dependency 	<ul style="list-style-type: none"> ◦ Maternal figure ◦ Sensual Needs ◦ Dependency on opposite sex
6	<ul style="list-style-type: none"> ◦ Identifies with his own sex ◦ Evasive ◦ Opposite sex is viewed as smarter or as possessing greater social authority 	<ul style="list-style-type: none"> ◦ Maternal Dependence ◦ Repressive aggression

For participant number two, his two drawings showed dependence to his mother. It is very notable as well that the second (2nd) drawing revealed sexual immaturity. Both drawings disclosed his evasive tendencies. The third participant's DAPT results suggested that he is dependent to his mother. This is shown in both drawings. He had tendencies to have a feminine identification with a dominant mother, thus forming the feminine tendencies. Both of these observations were found in the first (1st) drawing. The second drawing further suggested of his homosexual trend and that he was homosexually conflicted, as an individual. On the other hand, the fourth (4th) participant revealed tendencies to have a feminine identification in his first (1st) drawing which may also be related to the homosexual trend found in the same drawing. The significance of a maternal figure was very evident in his first (1st) drawing, which may be related to his tendencies to be dependent to his mother (1st and 2nd drawings). He likely had a covert hostility. The fifth (5th) participant's DAPT results suggested that he had the tendency to be aggressive and he had sensual needs. In both of his drawings, dependence on the opposite sex maybe due to his tendency to be dependent to his mother. The last participant's drawing shows that he has the tendency to display evasiveness (1st drawing). He tends to have a repressive aggression (2nd drawing). His first (1st) drawing suggests that he tends to view the opposite sex as smarter or as possessing greater social authority. This may be related to his likeness to be dependent to his mother. Generally, the participants were willing to try to know themselves better. They were aware that they were

different in terms of behaving towards the same sex and that they were also different from their masculine classmates. The participants' hesitation of being able to be fully feminine was also due to the non-acceptance of their significant others, particularly their parents. Of the six (6) participants, three of them were more effeminate than the other three. This was observed in their manner of talking and acting. Three of them were mostly loud or seemed to be more outgoing than the others. In each session, it was noticed that all participants were cautious about being found out by their parents. This was also the main reason why they opted to be in the study.

Table 3 shows the Bem Sex Role Inventory (BSRI) scores and the interpretation. The raw scores were necessary in order to get the T-scores, which was compared to their norm group. The norm values was compared to the actual computed values for both masculine and feminine scale that led to the final sexual orientation interpretation of each participant. The table shows that out of the six (6) participants, only one (1) participant was feminine and the other five (5) were androgynous. Feminine participants scored high feminine characteristics and scored low on the masculine characteristics. Androgynous participants were described as high in both feminine characteristics and masculine characteristics. Thus, these five (5) androgynous participants have a balance between feminine and masculine traits.

TABLE 3
BEM SEX ROLE INVENTORY SCORES AND INTERPRETATION (AFTER TREATMENT DATA)

Partici- pants	Raw Scores		T - Scores		Interpretation
	M	F	M	F	
1	117	106	5.85	5.30	Androgynous (high masculine, high feminine)
2	112	109	5.60	5.45	Androgynous (high masculine, high feminine)
3	101	95	5.05	4.75	Androgynous (high masculine, high feminine)
4	111	107	5.55	5.35	Androgynous (high masculine, high feminine)
5	88	106	4.40	5.30	Feminine (high feminine, low masculine)
6	113	119	5.65	5.95	Androgynous (high masculine, high feminine)

Table 4 shows the Draw-A-Person Test results after the counseling intervention. The first participant's first (1st) drawing still suggested his tendency to have feminine identification, a sexual inversion. He had both tendencies to view opposite sex (women) to be more powerful and to be dependent to his mother, primarily. Both drawings show his likelihood to have homosexual tendencies. The second set of drawings belongs to the second participant.

Both drawings revealed that he tended to be evasive and had shown tendencies to be masculine. His drawing also clearly disclosed his tendency to identify with same sex.

Meantime, the third participant was found to have the tendency to identify with his own sex, or same gender. He also tended to be evasive as disclosed in his 1st and 2nd drawings and yet he had the tendency to strive for autonomy (1st drawing). His second (2nd) drawing revealed that he was more inclined to regard females as sexually rejecting, yet he was apt to identify and depend on his mother. His drawing further suggested of his homosexual trend. On the other hand, the results of the fourth participant's DAPT revealed of inclination to have feminine identification, still a sexual inversion. He was likely to be dependent to his mother but he was likely to regard females generally as sexually rejecting. The fifth (5th) participant's two drawings revealed his tendency to be dependent. He also seems to be disposed to show signs of aggression, emotional immaturity and views opposite sex to be more powerful. He has the tendency to identify with his own sex gender. The last drawings were that of the sixth (6th) participant. He was more inclined to identify with the same sex. His first (1st) drawing shows his tendency to be sensitive to criticism. Both drawing manifested his tendency to be aggressive. Maternal figure was significant to him and was more likely to be dependent to his mother.

TABLE 4
DAPT INTERPRETATION AND OBSERVATION AFTER THE INTERVENTION

PARTI CIPANT	DRAWING INTERPRETATION	
	First Drawing	Second Drawing
1	<ul style="list-style-type: none"> ◦ Opposite sex viewed as more powerful ◦ Maternal dependence ◦ Homosexual trend 	<ul style="list-style-type: none"> ◦ Homosexual trend
2	<ul style="list-style-type: none"> ◦ Identifies with his own sex ◦ Evasive ◦ Associated with masculinity 	<ul style="list-style-type: none"> ◦ Evasive ◦ Associated with masculinity
3	<ul style="list-style-type: none"> ◦ Identifies with his own sex ◦ Evasive 	<ul style="list-style-type: none"> ◦ Female regarded as sexually rejecting ◦ Identification with mother possibly ◦ Evasive ◦ Maternal Dependence ◦ Homosexual trend
4	<ul style="list-style-type: none"> ◦ Dependency ◦ Female regarded as sexually rejecting ◦ Maternal Figure ◦ Maternal Dependence ◦ Homosexual trend 	
5	<ul style="list-style-type: none"> ◦ Identifies with his own sex ◦ Dependency 	<ul style="list-style-type: none"> ◦ Dependency ◦ Opposite sex viewed as more powerful
6	<ul style="list-style-type: none"> ◦ Identifies with his own sex ◦ Dependency ◦ Aggression 	<ul style="list-style-type: none"> ◦ Maternal Figure ◦ Repressed aggression ◦ Maternal Dependence

VI. DISCUSSION

In summary, the pre-test data of Bem Sex Role Inventory (BSRI) shows that out of the six (6) participants, three (3) are feminine and the other three (3) are androgynous. On the first set of drawings of the DAPT, before the treatment, it can be observed that all the six (6) participants leaned towards maternal dependence. Feminine identity or sexual inversions were seen on the 3 sets of drawings in the pre-testing of DAPT. Homosexual pattern was consistently observed three times on three sets of drawings both in the DAPT pre-test.

In the counseling sessions, it was observed that five (5) out of the 6 (six) the participants were either closer to their mothers physically or psychologically, as compared to their fathers. The participants were generally anxious about their feelings of being homosexuals and they were confused of what to do about their sexual identity and sexual orientation.

The posttest data of the BSRI shows that out of the six (6) participants, only one (1) participant was feminine and the other five (5) were androgynous. The DAPT posttest results showed a decline, which was only seen among the five (5) participants. Feminine identity or sexual inversion was reduced into two (2) observations in second sets of drawings in the DAPT posttest. Homosexual trend was consistently observed three times on three sets of drawings in the post test DAPT.

With the one month treatment period, the researcher-counselor found out that the relationships with their father improved especially among the three (3) participants. The participants were found to be happier in terms of their self-concept. Four (4) of the participants found the suggestions of their unconscious to be effective enough to have assisted them in diminishing their homosexual orientation. The findings further revealed that the decrease in homosexual tendencies was significant. The subjective measure found on the Draw-A-Person Test (DAPT) supports the objective measure of Bem Sex Role Inventory (BSRI).

VII. CONCLUSION AND IMPLICATIONS

This study concludes that the Unconscious Reframing, as a Neurolinguistic Programming technique, is an effective counseling intervention in diminishing homosexual tendencies among young males.

This study further recognizes the limitation of its data due to the difficulty of selecting the samples. However, it is recommended that an effeminacy program be put in place with the following recommendations to be considered: 1.) An expanded sample size and wider age range be part of another population – other clients may find NLP more fruitful and quicker, in terms of counseling intervention results; 2.) Help sexually confused adolescent clarify issues and misconceptions about their sexual orientations. 3.) An

earlier detection of effeminate tendencies should be verified through a systematic and supportive mechanism that is free of bias; and 4.) Organizing of advocacy within the whole school community through continuous education and reeducation of school personnel, especially the teachers and counselors. It is hoped that this measure can extinguish bias and homophobic reactions due to ignorance and lack of compassion.

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Lecturers' and Employees' Perception on GCG Implementation in Widyatama University

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Abstract— Indonesia has a guidance in implementing Good Corporate Governance (GCG) for profit-oriented organizations, however, we do not have specific guidance for non-profit organizations. A university is under a Foundation, which is a non-profit organization, in other words, the organization that supposed to focus on social matters. Assuming that GCG also focusing on social matters, the implementation of GCG in a Foundation (in this case, University) should be easy. But, is that so? For example, transparency is one of the components of GCG. One way to achieve the goal of transparency is that a company has to make its financial report available for its stakeholders. Yet, not one university has done so. In fact, there are common beliefs that a Foundation (university) does not have to report to its stakeholders at all. We modified the GCG implementation guidance for profit-oriented organization to be applicable for a foundation. Then we surveyed the lecturers and employees of Widyatama University to find out, according to their perception, how far was the Good University Governance (GUG) implementation in the university. Then we analyzed the result using descriptive models and described what points had been implemented, what points had not been implemented or less in implementation. We analyzed what caused it, what were the hindrances or problems, and how the stakeholders could cooperate to help solving the problems. Therefore, we hoped that in the future the university would be able to implement GUG as a whole.

Keywords— GUG, GCG guidance, Foundation, Lecturers, Employees,

I. INTRODUCTION

It began with the enterprise ownership theory of an entity whereas the corporation was a social institution operated for the benefit of many interested groups. The concept considered that the owner of an enterprise were the stakeholders, which were wider than stockholders. According to the Rights Theorist, we all had natural rights, among them was the right to know. Therefore, the stakeholders had a "right" to financial information of the companies, because the companies existed

only with the consent of that public [1]. The emerging of Good Corporate Governance concept was the impact of a corporate awareness of its social environment. In the sense, GCG is social. The GCG concept was then adopted in many kinds of organization. For a University, the term GCG was adapted to become Good University Governance (GUG).

Universities in Indonesia have to be under a Foundation as its legal entity (quoting the government regulation, a foundation is: "a group of society"). The basic thought behind this regulation is because a university operates an education activity, which assumed to be a social activity, therefore the most suitable legal entity to organize it is supposed to be a nonprofit oriented organization, that is a Foundation. It means, profit should not be the main objective, the primary mission should be to enlighten and to educate the society. Therefore, until today, the government still does not allow any education institution under a corporation or any other legal entity except for a foundation, which supposed to be a non-profit oriented organization.

Based on the thoughts, a foundation, which organized a university, should uphold the social attitudes. Nevertheless, have we achieved this ideal condition?

Government regulation no. 20/2003, article 53 section 1 and 3 [4] implied that the executor of a formal education entity should be the government or a group of society in a legal form of education which principle was non-profit oriented and capable of managing fund for itself in developing the education entity. According to government regulation no. 16/2001 [2] article 1, a Foundation is a legal entity, which consists of separated assets, and those assets are used to achieve specific goals in social, religious, and humanity matters.

In an ideal condition, some individuals group together to manage a Foundation. Those individuals are responsible to raise money for the Foundation to fund the education entity (in this case, a university) under its care. The characteristic of governing board in Indonesia was still focus to the founder of the foundation (The Board of Trustees). Although there are representatives of a number of bodies in the membership of the board, such as the academic senate, including the rector, still The Board of Trustees plays the central role in university governance [4]. Because The Board of Trustees elects the rector and the academic senate, the bodies under The Board of

Trustees are not independent and they may have conflicted interests. In some cases, the members of the bodies (employees, lecturers, supervisory board, and advisory board) consists of families of the founders.

Article 46 of the government regulations indicated that the responsibility of raising the fund would fall upon the government and the society altogether. Back to the basic principles of founding a Foundation, which supposed to be a non-profit oriented entity, the Foundation should provide the University with fresh money to support its activity in education whenever the University needed it. In the late government regulation no. 16/2001, article 3 [2], it was indicated that the Board of Trustees was supposed to be independent and did not have conflicting interest, because the regulations stated that a Foundation must not share any profit to the board of trustee, the board of advisory, and the board of supervisor. Therefore, the existing of a Foundation would better serve its main purpose: social and non-profit oriented.

However, recently, the situation had changed. The government revised the regulation no. 16/2001 and replaced it with the new one, which was the government regulation no. 28/2004 [3]. In the new regulation, there are exceptions in article 5, section 2, that the Board of Trustees could have a profit sharing as long as (a) they are not the Founders and do not affiliated with the Founders, Advisory board, and supervisory board, and (b) they handle the Foundation management directly and in full-time. With this regulation, a new kind of Foundation then emerged. Many of the education foundations do not act as the fundraiser for their education entities, but vice versa. In this case, the university under the foundation becomes an undercover corporation, used to raise some fund to provide the needs of the individuals having interests in the Foundation and the bodies under it. Members of The Board of Trustees become the employee (manager) or lecturer; therefore, they could have the “profit sharing” in the terms of “salaries”, “bonuses”, “allowances”, etc. In this situation, the non-profit oriented mission is far from the facts. As much as the money involve, the Board may feel the need to raise as much money as they could, to expense as few as they could and to protect their confidentiality.

That condition could violate the government regulation no. 20/2003 article 48 [4], which stated that the management of the education fund should be carried out based on the principles of justice, efficiency, transparency, and public accountability. Regardless the government regulation, providing public with education institution financial statements is uncommon practice in Indonesia. However, so far, there is not a single foundation in Indonesia that has been prosecuted regarding the matter. We may assume that all foundations has carried out the government regulation well enough or simply because we are having difficulties in measuring the words: justice, efficiency, transparency, and public accountability.

Indonesia had developed Good Corporate Governance Guidance in 2006. The GCG Guidance were not legal regulation, it contained principles of how to manage a company in a business ethic corridor to maintain the

sustainability of a company in the business. Therefore, the implementation of GCG lays on the hand of the company’s awareness. The National Committee on Governance Policy published the GCG Guidance in the ethical driven framework from the business individuals who gave priority to the stakeholders’ interests and avoided creating temporary profit. The Guidance consisted of GCG Principles, which could be adapted into various implementations in various legal entities. Those were the transparency, accountability, responsibility, independency, and fairness. The basic principles of each component were described as follows [6]:

- **Transparency:**

To maintain the objectivity in running the business, a company must provide a material and relevance information. The stakeholders should be able to access the information easily and they should be able to understand it easily. A company must take the initiative to disclose the information, whether it was included in regulations or not. It means all informations, which are important for the decision makers (shareholders, creditors, and other stakeholders).

- **Accountability**

A company has to be accountable for its performance transparently and fairly. Therefore, the company should be managed in a credible way, measurable and in correspond with the company’s interest. However, the interest of the shareholders and other stakeholders should be taken into account. Accountability is a prerequisite to achieve a sustainable performance.

- **Responsibility**

A company must obey the government regulations and carried out its responsibility to the society and the environment in order to maintain the long-term sustainability and to be recognized as a good corporate citizen.

- **Independency**

To smooth the implementation of GCG principles, a company must be managed independently, therefore each body in the company would not dominate each other. It also means that other parties could not intrude the company.

- **Fairness**

In running the business, a company must always pays attention to the interest of the stockholders and other stakeholders, based on the principles of fairness and equality.

In a university, the rector is one of the decision makers for the sake of the university; the employees, lecturers and students are the other stakeholders who also may need information for whatever decision they have to make. Therefore, based on the transparency principle, they all have the rights to access any relevant information from the university/foundation. Providing all necessary information for the stakeholders means the entity’s performance is transparently accountable. Obeying the regulations and rules regarding the Foundation and the National Education System

would show the responsibility level of the entity. To achieve the independency principle, the individuals who found the foundation should not become the member of Boards of Trustees. Furthermore, individuals who run the organization (the boards, academic senate, employee, and lecturer) should not be the related parties (families) of the Founders. Lastly, the fairness principle could be achieved when the university does not apply cherry picking in giving any opportunity to its stakeholders.

The GCG Guidance also included the relationship principles between a company and its stakeholders (employee, business partner, and society). According to it, a company should have a good relationship with its stakeholders based on the principles of equality and fairness, and based on the rules of rights and responsibility of each party. In order to have a good relationship with its stakeholders, a company/foundation should pay attention to the followings:

- The foundation guarantees that there would be no discriminations based on nationality/tribal, religion, race, class, and gender, and guarantees the fair and faithful treatment in pushing the employees' development according to their potentials, capabilities, experiences, and skills.
- The foundation and its business partner should cooperate for the interest of each other based on the win-win situation.
- The foundation should pay attention to the public interest, especially the surroundings society and the consumers (students).

In the university, some of the lecturers legally are employees of the Foundation. However, not all lecturers serve in a university are regular employees; some of them are visiting lecturers or new-contract employees. The regular lecturers have a similar relationship with non-lecturer employees toward the foundation. However, lecturers and employees are substantially different in function and position. Lecturers are somewhat "higher" in position than the employees, possibly because lecturers are functioning as the "automatic production machine" of the education business. In addition, most of the lecturers' activities are under the command of the Faculties; unlike the employees whom are under direct management of the Boards. In this research, we used the term "employee" for non-lecturer employee, to distinguish the two groups.

The relationship between the foundation and its lecturers and employees would affect their perception toward the foundation. According to the idea of the GCG guidance, a good relationship was the beginning of all good things in business.

II. METHODOLOGY

This research was to discover the perception of lecturers and employees as stakeholders of the Widyatama Foundation regarding how far was the implementation of Good University Governance at Widyatama University (Widyatama

Foundation). We use the term "Entity" for the Foundation and the bodies under its care (the board of trustees, advisory board, supervisory board, university, and academic senate).

The samples of this research were 32 lecturers (consisted of regular, visiting and new contract lecturers) and 32 employees of Widyatama University. They were random samples.

The quantitative data for this research were processed from questionnaire. We surveyed the respondents' perception toward the implementation of GUG at Widyatama University using the questionnaire, which consisted of statements to gain insight into the stakeholders' perception regarding how far were the implementation of each of the components of GUG.

The data was measured using Likert scale of five. A value of four and above would indicate that according to the respondents' perception the implementation of GUG was in commensurate with the statement. The scores meant:

- score 5 = implementation in commensurate with the statement
- score 4 = implementation less in commensurate with the statement,
- score 3 = average in implementation;
- score 2 = implementation not in commensurate with the statement,
- score 1 = almost lack of implementation.

We analyzed the data collected using the Statistical Package for Social Science (SPSS) version 13, in order to find the difference of perceptions between the lecturers and employees regarding the GUG implementation. We used t-test for processing each component, with the statistic significance degrees $\alpha = 0.05$. The hypothesis were:

- Ho: There is not any difference between employees' perception and lecturers' perception.
- Ha: There is a difference between employees' perception and lecturers' perception.

As an addition, we also investigated lecturers' comments and ideas to learn what problems behind the less implemented of GUG, how to solve the problems and what the existing hindrances were.

III. FINDINGS

The questionnaire consisted of six classifications. The first classification was regarding the relationship between the employees (lecturers and non-lecturers) and the Entity. The Entity meant the Foundation, the Board of Trustees, Advisory Board, Supervisory Board, University, and Academic Senate. The second through fifth classification were regarding the components of GUG, which was adapted from the GCG Guidance, which were the transparency, accountability, responsibility, independency, and fairness and equality. These findings showed the maximum frequency of respond from the two groups and the difference between them.

A. Relationship Between the Entity and its Employees and Lecturers

The first questionnaire consisted of six statements regarding the relationship between the entity (the foundation and the bodies under its care) and the employees and lecturers. The questions asked regarding the relationship between the entity and its employees were as follows:

- (1) The entity had written regulations, which clearly regulate the recruitment pattern and also regulate the rights and responsibility of the employees
- (2) The entity had guaranteed the creation of a conducive working environment, including the health and safety in work, so that every employees could work creatively and productively
- (3) The entity had ascertained the availability of information, which was important to the employees through a communication system that ran well and on time
- (4) The decision about salary, the inclusion for training, the decision of career ranks, and other terms of work had been carried out objectively
- (5) The entity had ascertained that the employees did not use the entity's name, facility, and good relationship with the external parties for personal interests
- (6) Employees and the Union in the entity had the rights to convey their opinion and proposal regarding the working environment and employees welfare

In response to the questions regarding the relationships with the Entity, 37% of the lecturers agreed that the implementation was average (score 3), 29.7% at score 2, and 28.6% at score 4. The average was 3.06. As for the employees, 40.1% responded at score two, 30.7% responded at score three, 20.3% responded at score four; and the mean value was 2.71. The t-output was 3.822, which meant H_0 was rejected, there was a difference between the two groups with the mean difference was 0.354. The difference between the lecturers' responds and the employees' responds was between -0.536 and -0.172.

B. Transparency

Transparency was an important part of trust. If the Entity trusted its stakeholders and if it had nothing to hide, it would voluntarily disclose any relevant information. The information would be valuable for the stakeholders in making decisions. The questions below were regarding the implementation of transparency of the Entity:

- (7) The entity's policy had been in written and proportionally communicated to the stakeholders
- (8) The entity had provided the information on time, sufficiently, clearly, accurately, and comparably, and can be accessed by the stakeholders easily in correspond with their rights
- (9) The information disclosed had covered, but not restricted to:
 - a. Vision and Mission
 - b. Business goals and strategies
 - c. Financial condition

- d. The Boards members and remuneration
- e. The membership of the Foundation by the Director, Secretary, Treasurer, and their family in the Entity
- f. Internal supervisory and control system
- (10) The transparency principle of the entity did not lessen the obligation to fulfill the entity's confidentiality according to the regulations, secret, and personal rights

The responds from the lecturers regarding the transparency were 55.2% at the average and 23.3% at score 4. The average was at the value of 3.09. The responds from the employees were 59% at score 3 and 25.7% at score 2, with the mean value at 2.74. As for the t-output was 5.680, it meant there was significant perception difference between the two groups, with the lower point at -0.472 and the upper point at -0.229, and the average difference was 0.062.

C. Accountability

Accountability was important in order to make a clear pathway of how to carry a work in the business environment. All employees should act in the track, based on good business ethic and code of conduct. These following questions indicated how to measure the implementation of accountability:

- (11) The entity maintained the job description and responsibilities of each of the bodies and employees clearly; and they were in correspond with the entity's vision, mission, values, and strategies
- (12) The entity had performance measurement for all ranks that consistent with the goal, and had a reward and punishment system
- (13) In carrying out the duty and responsibility, every bodies and employees had to hold on to business ethics and code of conduct

Answers from the lecturers to the questions were 44.8% at score 3 and 34.4% at score 4, mean value at 3.26. Answers from the employees were 53.1% at score 3 and 28.1% at score 4, mean value 3.31. T-output was 0.464, which meant there was no significant difference between the two groups. The mean value of the difference was 0.52, with the lower point at -0.170 and the upper point at 0.274.

D. Responsibility

Responsibility of the Entity related to the obedience in implementing all regulations applied to a Foundation and regarding the education system. In addition to those, there was also moral obligation. The Entity existed because of public, therefore it should give something back to the public (surrounding environment). The questions below were regarding the implementation of those legal and ethical obligations:

- (14) The entity had to be cautious and ascertained the obedience to the regulations, articles of association, and by-laws
- (15) The entity had to carry out its social responsibility such as care for the society and environment, especially surrounding the entity by sufficiently planning and actuating

To those statements, 35.9% lecturers responded at average score, 26.6% at score 4, and 23.4% at score 2. The mean value was 3.11. Responds from the employees were: 51.6% at the average score and 17.2% at score 4, with the mean value landed at 2.82. There were significant differences of perception between the two groups because the t-output was at 5.884. The mean difference was 0.285, with the lower point at -0.380 and upper point at -0.190.

E. Independency

In order to achieve independency, the Entity should be free from any special relationship with the Founders. In the condition where the university was an under cloak profitable company, this independency was a difficult state to achieved. There were many related parties involved in running the business, made the conflicting interests excessive. The questions indicated the perception toward the independency of the Entity were as follows:

- (16) Each body should avoid any domination by other parties, not to influenced by specific interest, free from conflict of interest, and free from any influence and pressure, therefore they could make decisions objectively
- (17) Each body should carry out the function and duty according to the articles of association and regulations, do not dominate one over the other, and throw responsibilities to each other

Regarding the independency, lecturers' answers were 39.1% at the average, 29.7% at score 4, and 21.9% at score 2 the mean value laid at 3.14. The employees' answer were 46.9% at score 3, 25% at score 2, 18.8% at score 5, and the mean value was 3.22. There was no perception differences between those two groups because the t-output was 0.448. The mean difference value was 0.078, ranging from -0.267 to 0.423.

F. Fairness and Equality

Fairness and equality were much related to independency. As there were many related parties involved, the fairness and equality could distorted. The Entity could still treat all the stakeholders in fairness and equality, if those related parties had a good awareness of ethic and had the same mission as the Entity as a whole, that was to keep the sustainability of the university. The questions below showed the implementation of fairness and equality:

- (18) The entity had to provide opportunity to the stakeholders to convey ideas and opinions for the interest of the entity, and open the access to information in correspond with the transparency principle commensurate with their appropriate position.
- (19) The entity had to provide equal and fair treatment to the stakeholders in commensurate with the benefit and contribution given to the entity
- (20) The entity had to provide equal opportunity in recruiting the employee, in career, and professionally carried out the duty, without differentiating by the

nationality, religion, race, class, gender, and physical condition

There were 46.9% lecturers responded at score 3, 30.2% at score 4, and 17.7% at score 2. The mean value was at 3.23. Whereas 42.7% employees responded at score 3, 20.8% at score 4, and 18.8% at score 2. The mean value was 3.29. According to the t-output value of 0.474, there was no difference between the perception of the lecturers and the employees. The mean difference was 0.063, ranging from -0.198 to 0.323.

IV. DISCUSSION

The research began with the perception of relationship between the entity and its employee. As we stated before, a good relationship should be a beginning of a good business. As we found out from the answers from the lecturers, the score laid mostly at the average with the tendency to the perception that the statements and the implementation was not in commensurate. The employees tends to score lower, with most answers was at the level of perception that the implementation was not in commensurate with the statements. We could say that those answers indicated the condition was not quite good enough to begin with.

The first component of GUG was the transparency of the Foundation/University. The lecturers' perception regarding this matter was among the average implementation, with the tendency of a level higher and a level lower. This perception was a bit different with the employees' perception. Most of the employees thought that the implementation of the transparency was in average, with the tendency of a level lower.

In respond to the accountability matters, there was no significant difference of perception between the two groups. They both thought that the implementation of the accountability was on the average level with the tendency of a level higher.

Regarding the implementation of the responsibility components, there was a different perception between the lecturers and the employees. Most lecturers felt that the implementation was at the average, some thought the implementation was sufficient, and some thought it was not sufficient. Whereas most of the employees agreed that, the implementation of responsibility was at average level.

The perception of the lecturers regarding the implementation of independency was somewhat distributed around the average level, and there was no significant difference from the employees point of view.

Fairness and equality implementation was at the average rate, with the variance a level higher and a level lower according to the respondents' perception. No difference detected.

The research found out that lecturers and employees shared the same perception over three components, which were the accountability, independency, and fairness and equality. They assumed that the implementation of those components were at the average, with a slight variations to a level higher or a level

lower. As for the other three components: relationship, transparency, and responsibility, the two groups have different opinion.

Regarding the relationship, the lecturers had a perception that the implementation was around the average. However, 40.1% of the employees tend to assume that the implementation was not good enough. The cause of difference was probably the different kind of relationship between the entity-lecturers and the entity-employees. As we explained in the previous section, the lecturers had somewhat a “higher” position in the organization compare to the employees. Equal to that position, the lecturer tend to have a higher value regarding their relationship with the entity, because they felt respected. Other explanation would be because not all lecturers were the regular lecturers. Regular lecturers had to oblige to all university regulations, just the same as the employees, but visiting lecturer and new-contract lecturer did not had the same obligation. Their relationship with the entity was not so tightly bound.

Majority of the lecturers stated that the implementation of transparency was at the average and sufficient. However, the majority of employees felt that the implementation of transparency was at the average but tend to be less. The difference of the perception probably because the employees had boarder insight assumption of what was happening in the internal entity, therefore they did not entirely buy all the authorized proclaim information; whereas the lecturers only see at the upper layer of the information, they did not –or could not- go any deeper. It was a common secret that many organizations would have “special orders” to its external auditor before the examination. In the end, the reports resulted would be according to the scenario that had been set beforehand. That kind of information which would be available to public.

The perception of responsibility implementation according to the lecturers was at the average with the tendency of a level higher and a level lower. More than half of the employees thought the implementation of responsibility was at the average level, while the other half’s perception spread quite evenly at other levels, including the lowest level. We could not find any good explanation regarding the difference between the two groups.

When we began the research, we expected to have comments from only the regular lecturers. However, most of them refused to fill in the questionnaire. They stated that it was useless, because whatever they wanted to say they had said it and nobody cares. All the response they had was only lip service. During the past 2 years, 10% of the contract and regular lecturers had moved to other universities. We believe that to majority of the regular lecturers, the condition had reached the stage of worse than worse, which drove them to be ignorant.

From the investigation we carried out, we had a long list of problems occurring. The prominent problems are:

- The salary and allowances are not sufficient to secure the lecturers and their family to live a proper life. It causes an unsafe working condition. Most of the regular lecturers are forced to work elsewhere in order to suffice their family needs. To cut the basic salary low, the entity focuses on having more visiting and new-contract lecturers. The loss is that the quality of the teaching process become out of hand. But then,
- The regular lecturers always to be blame for the poor quality of the output (the students, the alumni), when in fact majority of the teaching process was carried out by the visiting lecturers due to the maximum teaching credit regulation applied to regular and contract lecturers.
- In the respondents’ opinion, the entity could have been able to compensate better if only it did not continuously build new buildings. Whereas the entity considered that it was necessary considering the growing student body. On the other hand, to the respondents’ concern, the growing student body was merely to cover the cost poured to the buildings. It means the quality of the enrolling students is not the consent anymore. Then, when the quality of the inputs is decreasing year after year, the regular lecturers are to blame. This is the circle of devil.
- The top management level focuses only to punishment, and not to reward. There are no comprehensive written regulation regarding the punishment and reward system applied. The regulations made to solve case-to-case problems and they usually generalize the case to make overall punishment.

The answer of those problems depends mostly on the Boards attitude to be aware of the destruction condition. The Boards need to sit side by side with all the stakeholders, listen to them earnestly, listen to their hearts honestly, and take necessary acts to rebuild the working environment to be a better place for all.

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Effect of Women and Men Students' Attitudes On Corporate Responsibility in Society Effect

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Abstract— Facing increased competition, universities, college and school are driven to project a positive image to their internal and external stakeholders. So, the universities, college and school are vying to make a social responsibility. While the lecture and staff are doing social responsibility, the students cooperate to that activity. This research describes a survey among Perbanas School of Business students to find answers to the following questions: Do the students understand about social responsibility at college? How they attitudes about corporate social responsibility in campus? Do the attitudes of women students differ from those of men? Are they wanted participate the activity among corporate social responsibility at college? Our sample comprised a few students majoring Accounting and Management. Population in this research is entire students in STIE Perbanas Surabaya, East Java region, Indonesia. This research use convenience sampling, who's past the Ethic. Research questioners will deliver directly to the students. The analysis will be test by using means and ANOVAs method. This research will contribute to university or college, so that they can invite or collaborate with their students.

Keywords— attitude, responsibility, business, corporate social responsibility, gender

I. INTRODUCTION

Universities and college are institutions, whose fundamental tasks are teaching, engaging in basic and applied research, assisting the professional development of their faculty members and the character development of their students (Reed, 2004). The efforts of universities focus on creating and implementing new and innovative academic programs, increasing education quality via course offerings and the teaching of methodology, and preparing students for real life and their future careers (Bourner and Flowers, 1997) on Atakan and Eker (2007).

Universities function in an environment that understands the role and importance of high quality education (Atakan and Eker, 2007). However, as the opportunities for students to pursue their education not only in the national but also in international, so does the competition among universities for attracting and educating students at both a national and an international level. Therefore it is imperative for educational institutions to actively monitor the quality of the education they offer and commit to continuous improvements in order to survive in this competitive environment (Brigham, 1994).

Nowadays, Universities or college are not only increasing for education, but also embed the social responsibility as the part of important things of college. Helping students become more socially responsible and ethically sensitive is a substantive part of our responsibility as we prepare a new generation of business practitioners (Giacalone and Thompson, 2006). We face a difficult struggle, for even as we offer new approaches for dealing with changing business environments, less responsible individuals and businesses learn new ways to prosper through immoral means (Callahan, 2004).

This research will provide about the understanding social responsibility at college, the attitudes about social responsibility at college, to know if there are the different of attitudes of women students from men and they willingness to participated the activity among corporate social responsibility in college. We offer for the other university or college to collaborate students for sustainability social responsibility.

II. LITERATURE REVIEW

A. Previous Research

Anna-Maija Lämsä, Meri Vehkaperä, Tuomas Puttonen and Hanna-Leena Pesonen (2008), this paper describes a survey among Finnish business students to find answers about what are their attitudes on the responsibilities of business in society, the difference of woman and men students, and the influence of business education on these attitudes. Our sample comprised 217 students pursuing a master's degree in business studies at two Finnish universities. The results show that, as a whole, students valued the stakeholder model of the company more than the shareholder model. However, attitudes differed according to gender: women students were more in favor of the stakeholder model and placed more weight on corporate ethical, environmental, and societal responsibilities than their men counterparts – both at the beginning and at the end of their studies. Thus, no gender socialization effect of business school education could be observed in this sense. Business school education was found to shape women and men students' attitudes in two ways. Firstly, valuation of the shareholder model increased and, secondly, the importance of equal-opportunity employment decreased in the course of education.

M. G. Serap Atakan and Tutku Eker (2007), this study describes a Turkish higher education institutions social

responsibility. The study also analyses a specific case using concepts from the Corporate Identity and Corporate Social Responsibility literature. The motives leading the university to manage its corporate identity, the social responsibility initiatives in the local and national communities and the possible benefits of these initiatives for the parties involved are all identified. The major finding is that philanthropy is one of the main elements of Istanbul Bilgi University's corporate identity program and that the university has altruistic motives for its social responsibility initiatives.

Robert A. Giacalone and Kenneth R. Thompson (2006), the topics of business ethics and social responsibility education have received much attention in scholarly and pedagogical literature (although less in the pedagogical literature), the authors argue that the core teaching problem has not been discussed, that is, the worldview underpinning all of management education. The authors discuss this worldview, propose a more ethics-friendly worldview, and provide some considerations of its implication.

Heidi S. C. A. Muijen (2004), value-learning processes to integrate corporate social responsibility (CSR) in organizations as an interesting challenge in (higher) education have two strategies have been proposed for the issue of CSR: a compliance strategy and a cultural change strategy. This paper focuses on the ethical and philosophical presuppositions of these different approaches. The perspective of change through dialogue is proposed as a means of innovating the curriculum and the primary processes of student education. This organizational change perspective is demonstrated by describing how (ethical) reflective aspects are integrated in the curriculum of the Free University of Amsterdam. This paper was using case study from the first year of the Bachelor's program at the Vrije University's Department of Social Sciences.

Josie Fisher (2004), this paper identifies the different ways the relationship between social responsibility and ethics has been represented, the various uses of these two terms, and the contrasting views regarding the connection between morality and ethics. While this analysis does not resolve any difficult substantive questions, it does provide conceptual clarity as a necessary first step towards facilitating students' critical engagement with the substantive issues.

B. Social Responsibility

In general, socialization is a process by which an individual's attitudes, values, motives, and behaviour are influenced to conform to what is seen as desirable in a particular socio-cultural context. Socialization refers to all learning regardless of the setting or the age of the individual. In the socialization process individuals learn about the socially defined expectations and roles that a person in a given social position is expected to follow (Hall, 1987) in Lämsä at al. (2008).

In recent years, increasing attention has been given to the concept of corporate social responsibility, which is defined as the obligation of the corporate decision makers to take action that protects and improves the welfare of the society as a whole, along with their own interests (Davis and Blomstrom,

1975) at Atakan and Eker (2007). Matten and Moon (2005) asserts that corporate social responsibility refers to corporate policies and voluntary initiatives that assume responsibility for the interests of the society. The evolution of the modern concept of corporate social responsibility has been mapped by Archie Carroll (1999) at Fisher (2004). In the 1950s, according to Carroll, a formal literature on the subject began to be developed. During the 1960s and 1970s definitions of corporate social responsibility were expanded and proliferated. A focus on empirical research and alternative themes such as corporate social performance and stakeholder theory marked the 1980s (Fisher, 2004).

In the 1970s Friedman argued that the only responsibility of corporations was to increase profits by legal means, whereas in 1979 Carroll asserted that corporations had broader responsibilities toward society (Atakan and Eker, 2007). These encompass their economic, legal, ethical and philanthropic or discretionary responsibilities. According to Carroll (1979), economic responsibilities are to be productive, profitable and to grow (Atakan and Eker, 2007).

C. Students' Attitudes on Corporate Responsibility in Society.

There are four views concerning the relationship between social responsibility and ethics that can be identified in the literature. First, social responsibility is ethics in an organizational context; second, social responsibility focuses on the impact that business activity has on society while ethics is concerned with the conduct of those within organizations; third, there is no connection between social responsibility and ethics; and, fourth, social responsibility has various dimensions one of which is ethics (Fisher, 2004). According to the first view found in some management literature, the difference between ethics and social responsibility is that people "have" ethics while organizations "have" a social responsibility to protect and enhance the society in which they operate (Fisher, 2004). This view appears in Davidson and Griffin (2000), which is adapted from Griffin (1999). To understand this view it is necessary to identify how Davidson and Griffin define social responsibility and ethics. Their definition of social responsibility is similar to many others writers: "The set of obligations an organization has to protect and enhance the society in which it functions" (p. 127). Ethics is defined as "... an individual's personal beliefs regarding what is right and wrong or good or bad" (p. 114).

In discussing organizations and social responsibility, Davidson and Griffin (2000) take a descriptive approach. The level of social responsibility demonstrated by an organization is represented on a continuum that identifies social obstruction, social obligation, social response and social contribution. It is only organizations whose actions and decisions fall above social obligation on the continuum that do any more than comply with the law. Organizations that adopt a social response approach meet their basic legal and *ethical* obligations and do more in selected cases, while organizations that adopt a social contribution approach are proactive in promoting the good of society (Fisher, 2004). However, it has already been claimed that ethics guides the behavior of both persons and groups.

Gender differences in orientation to responsibility and ethical issues are a subject that has been debated for decades (Gilligan, 1982) in Lämsä et al. (2008). Many studies argue that women tend to be more ethically aware and responsible than men, at least in certain aspects and situations (e.g., Ekin and Tezoğlumez, 1999; Deshpande et al., 2000; Elias, 2004). Still, there are other studies that have found no significant divergence in ethical orientation between genders (Arikan, 2002). Overall, the findings are inconclusive and seem to vary depending on the context.

Prior research shows the important role of business schools as agents in socializing students to the attitudes and values of business life, but there may be a difference in the effects of the socialization process between genders (Lämsä et al., 2000; Luthar and Karri, 2005; Ritter, 2006). Ritter (2006) found that the process had a positive influence only on women, whereas Luthar and Karri (2005) claimed that the differences between female and male students tended to narrow during education. However, it is quite possible that such differences derive from earlier socialization processes and that business school education does not cause any additional change between genders (Lämsä et al., 2008).

Many studies have further claimed that women show greater scepticism than men toward the role of technology in finding solutions (Wehrmeyer and McNeil, 2000; Kollmuss and Agyemmann, 2002). Similarly, research on corporate environmental responsibility (e.g., Wehrmeyer and McNeil, 2000) indicates that women employees are more consistent in rating corporate environmentalism irrespective of their age, position in the organizational hierarchy, and the department they work in. Men's environmental attitudes, on the other hand, were found to depend both on their age and their organizational position.

III. RESEARCH METHOD

A. Sample

Our survey sample consisted of the students of STIE Perbanas Surabaya. The questionnaires were distributed to 446 students who in Majoring Accounting and Management Department, but only 404 questionnaires with the complete answer. This research used convenience sampling, who past the Ethics.

B. Questionnaires and Data Gathering

We conducted the survey by applying the questionnaire adopted from Lämsä et al. (2008) with modification according to the condition in Indonesia. The survey contained items measuring students' computer knowledge and skill and individual learning performance. A four-point response scale used to measure the variable, where 1 = strongly agree, 2 = agree, 3 = disagree and 4 = strongly disagree.

The discussion and testing process were important to render the translation as clear and culturally unambiguous as possible. The respondents filled out the questionnaire in a classroom setting. Questionnaire with missing data were rejected to enable a comparison of all of the original statement.

C. Data Analysis Technique

After the data was collected then data analysis was performed in the following stages. The first analysis was Descriptive Analysis. This analysis was performed to get findings on the respondent's demography. Those collected findings were further presented in a tabulation to be easily understood and read. The descriptive analysis was explained in four things: access, interaction, response and result. For the first and second question, the analyses are using Mean Method. For the question which is to find the different of Woman and Men Attitudes is using ANOVAs Method.

IV. DISCUSSION

A. Descriptive Statistic

The questionnaires distributed for the students of Perbanas School of Business Surabaya, East Java, Indonesia using convenience sampling taking the students who have passed the Accounting Information System course. The questionnaires were distributed to 446 students of STIE Perbanas Surabaya, but only 404 questionnaires with the complete answer.

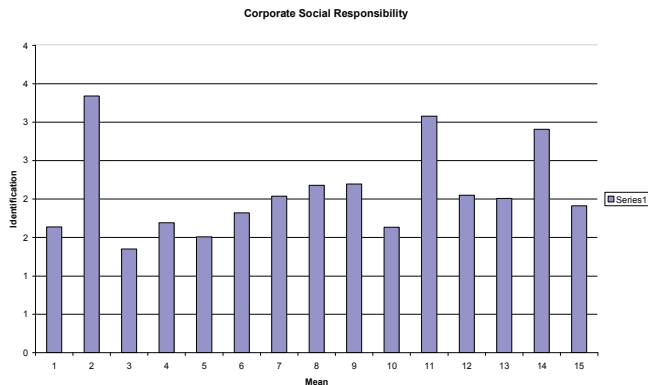
The following descriptive analysis of respondent's identity is presented in Table 1. The descriptive analysis of each respondent shall include the data of their gender, academic year and department (program). Table 1 describes characteristics of respondents. Most of respondents are 63.90% female and 36.10% male. The respondents which dominant in academic year ≤ 2007 , that mean they age are about 22 years old (63.12%).

TABLE I
Characteristics of Respondent

Gender	Number of Students	%
Male	146	36.10
Female	258	63.90
Total	404	100.00
Academic Year	Number of Students	%
2010	10	2.48
2009	97	24.01
2008	42	10.40
≤ 2007	255	63.12
Total	217	100.01.00
Department (Program)	Number of Students	%
Accounting (bachelor)	263	65.10
Management (bachelor)	141	34.90
Total	217	100.00

B. Means Method

DIAGRAM 1



The captions:

- Gender (female : 63.90%)
- Academic Year (≤ 2007 : 63.12%)
- Department (Program) (Accounting : 65.10%)
- CSR is the obligation of the company / college to create an action to protect and develop the social care as an integral part of the company (institution) : 1.69%
- Company / university does not have to have concern for the environment
- CSR-related attitudes and ethics of a person / group to its environment
- I am involved in social activities organized by the campus
- I volunteered to engage in social activities (CSR) on campus
- I was invited by friends to engage in CSR activities on campus
- implementation of CSR can improve environmental stewardship
- I just want to do activities on campus if it relates to the value of my subjects
- I do not want to do social activities because of no relevance to the value of my subjects
- CSR on a Higher Education can be voluntary
- I was forced to perform social activities organized by the campus because it is a necessity
- Student Creativity Program (SCP) is one manifestation of CSR

Table 2 shows that the students who understand the corporate social responsibility at college just for 4.38%. The entire students do not understand the corporate social responsibility at society. About 4.76% the students involve for the activity of corporate social responsibility at college from the obligation of college that all students must be involved for the corporate social responsibility that college do.

C. ANOVAs Method

Next, we applied a two-way ANOVAs Method to test whether there was interaction between the respondents' gender and study phase and found no statistically significant interaction between these factors.

TABLE II
CSR Responses

	Gender	N	Mean	Std. Deviation	Std. Error of Mean
CSR is the obligation of the company / college to create an action to protect and develop the social care as an integral part of the company (institution)	Male	146	1,00	0,43	0,03
	Female	258	1,69	0,53	0,03
Company / university does not have to have concern for the environment	Male	146	1,30	0,47	0,03
	Female	258	1,51	0,57	0,03
CSR-related attitudes and ethics of a person / group to its environment	Male	146	1,72	0,34	0,02
	Female	258	1,82	0,44	0,02
I am involved in social activities organized by the campus	Male	146	1,04	0,29	0,02
	Female	258	2,04	0,49	0,02
I volunteered to engage in social activities (CSR) on campus	Male	146	1,18	0,35	0,03
	Female	258	2,18	0,55	0,03
I was invited by friends to engage in CSR activities on campus	Male	146	1,98	0,38	0,03
	Female	258	2,20	0,58	0,03
Implementation of CSR can improve environmental stewardship	Male	146	1,43	0,36	0,03
	Female	258	1,63	0,56	0,03
I just want to do activities on campus if it relates to the value of my subjects	Male	146	2,79	0,31	0,03
	Female	258	3,08	0,61	0,03
I do not want to do social activities because of no relevance to the value of my subjects	Male	146	1,50	0,46	0,04
	Female	258	2,05	0,76	0,04
CSR on a Higher Education can be voluntary	Male	146	1,99	0,29	0,03
	Female	258	2,01	0,59	0,03
I was forced to perform social activities organized by the campus because it is a necessity	Male	146	2,61	0,39	0,03
	Female	258	2,91	0,69	0,03
Student Creativity Program (SCP) is one manifestation of CSR	Male	146	1,62	0,20	0,02
	Female	258	1,92	0,50	0,02

Women students considered it much more important that a well-run company operates according to its core values and a strong ethical code than did their men counterparts. This difference achieved high statistical significance. Woman gave more weight to these characteristics than men. This finding supports earlier research which suggests that woman may be socialized to such responsibilities more as compared with men (Deshpande et al., 2000; Elias, 2004)

V. CONCLUSIONS

According to this study, students are more aware to the society. The students using the programme of they lecture for

corporate social responsibility at college. So, they will be more aware for another social responsibility.

The results of the current study show that woman business students were more in favour of the stakeholder model and of the ethical, environmental and societal responsibilities of businesses compared to their men counterparts – both at the beginning and at the end of their students.

The gender difference detected in this study may be a problematic issue if we thinking of the growing demand of responsibility of business in society. In terms of business school education this poses a specific challenge to try to influence the attitudes of men students in particular. And this, we feel, may require some fundamental changes in the prevailing ideologies, value, and practices of business school education.

Finally, we feel that a useful way to influence male students' attitudes, in particular, about the ethical, environmental and societal responsibilities of business is precisely through the kind of persuasive communication.

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How the Internet is Related to Metacognitive Strategies Used in Academic Writing: The Smooth Combination of Technology and Education

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Abstract— This study investigated using the Internet to facilitate metacognitive strategies used in academic writing of graduate students. The semi-structured interview was only used to collect the data. The six interviews were conducted individually. To assure the accuracy of the information obtained, all interviews were in Thai with note-taking and two audio recordings. The findings showed the six participants' background and their using the Internet to facilitate their metacognitive strategies in academic writing. The information obtained added the frequency and the purpose of using the Internet reported by each student with different scores of academic writing

Keywords— Metacognitive strategies; Academic writing; Graduate students

I. INTRODUCTION

It is unavoidable to say that the learners and their strategies used consciously during completing academic writing are involved. As for the learners with high autonomous learning, metacognitive strategies classified into planning, monitoring, and evaluating are always used. Previous studies have investigated metacognitive strategies used by learners with different levels of proficiency in different contexts. In Thailand, academic writing in English is still problematic for Thai learners. Although, using the Internet is a solution to help those learners to improve writing, few studies focused on the combination of using the Internet while using metacognitive strategies to complete academic writing.

A. Research Questions

1. What websites do the graduate students use to facilitate their metacognitive strategies in academic writing?
2. What website is frequently used the most?
3. What are the students' purposes for using each website?

B. Definition of Terms

1. The Internet refers to any websites used to facilitate graduate students' metacognitive strategies in academic writing.
2. Metacognitive strategies refer to planning, monitoring, and evaluating strategies.

3. Academic writing refers to an assignment in Language Learning Theories course.
4. Graduate students refer to Thai graduate students for Master's Degree in English Language Teaching program.

II. LITERATURE REVIEW

A. Learning Strategies

Since Rubin (1975) first brought the language learning strategies concept to a wide audience, the term has been notoriously difficult to define (Rubin, 1975; cited in [1]). The literature on language learning strategies demonstrates a variety of definitions of learning strategies. Some important ones given by some influential strategy researchers are chronologically provided in Table I.

TABLE I
DEFINITIONS OF LANGUAGE LEARNING STRATEGIES

Researchers	Definitions of Language Learning Strategies
Stern (1983)	Learning strategies are general tendencies or characteristics of the approach employed by the language learner, leaving techniques as the term to refer to particular forms of observable learning behaviour.
Chamot (1987)	Learning strategies are techniques, approaches or deliberate actions that students take in order to facilitate the learning, recall of both linguistic and content area information.
Oxford (1990)	Learning strategies are specific actions taken by the learner to make learning easier, faster, more enjoyable, more self-directed, more transferable to new situations.
Wenden 1998)	Learning strategies are mental steps or operations that learners use to learn a new language and to regulate their efforts to do so.

Learning strategies were classified similarly based on several influential theorists. According to [6], learning strategies were divided into three parts, metacognitive, cognitive and social/affective strategy (Table II), whereas [4] classified learning strategies into 1) direct strategy, and 2) indirect strategy and 3) social strategy (Table III). Although, [5] classified learning strategies into two parts as [4]'s, her details are different. Those are 1) cognitive, and 2) self-management strategy (Table IV).

TABLE II
CLASSIFICATION OF LEARNING STRATEGIES
BY O'MALLEY AND CHAMOT (1990)

Metacognitive strategies	Cognitive strategies	Socio/ affective strategies
<ul style="list-style-type: none"> Selective attention Planning Monitoring Evaluation 	<ul style="list-style-type: none"> Rehearsal Organization Inferencing Summarizing 	<ul style="list-style-type: none"> Cooperation Questioning for clarification Self-talk

TABLE III
CLASSIFICATION OF LEARNING STRATEGIES BY OXFORD (1990)

Direct	Indirect
<ul style="list-style-type: none"> Memory Cognitive Compensation 	<ul style="list-style-type: none"> Metacognitive Affective Social

TABLE IV
CLASSIFICATION OF LEARNING STRATEGIES BY WENDEN (1998)

Cognitive strategies	Self-management strategies
<ul style="list-style-type: none"> Selecting input Comprehending input Storing input Retrieving input 	<ul style="list-style-type: none"> Planning Monitoring Evaluating

B. Metacognitive Strategies

Concerning metacognitive strategies used as the basis for the study, learning strategies were divided into 3 categories; metacognitive, cognitive, and social/ affective strategies [6]. Focusing on metacognitive strategies, although they were stated as the executive skills relating to planning, monitoring, and evaluating the success of a learning activity, they divided the processes into 4 subsets based on receptive (listening and reading) or productive (speaking and writing) language tasks. The definitions for each subset are presented in Table V.

TABLE V
O'MALLEY AND CHAMOT'S METACOGNITIVE STRATEGIES (1990)

Metacognitive strategies	Definitions
(1) Selective attention	Focusing on special aspects of learning tasks, as in planning to listen for key words or phrases
(2) Planning	Planning for the organization of either written or spoken discourse
(3) Monitoring	Reviewing attention to a task, comprehension of information that should be remembered, or production while it is occurring
(4) Evaluation	Checking comprehension after completion of a receptive language activity, or evaluating language production after it has taken place

After that, learning strategies were divided into cognitive and self-management strategies [5]. As for the self-management strategies, they focused on the learners' acquired store of task knowledge leading into applying to a particular learning task. Moreover, the main areas concerning these strategies in terms of cognitive literature are planning, monitoring and evaluating. So these are the same as metacognitive strategies classified by others, just used different name. However, they are exemplified in Table VI.

TABLE VI
WENDEN'S METACOGNITIVE STRATEGIES (1998)

Strategies	Function
Self-management	<ul style="list-style-type: none"> (1) Planning (2) Monitoring (3) Evaluating

Recently, [7] stated metacognitive strategies as the methods learners used consciously to organize their language learning. All details are presented in Table VII.

TABLE VII
COHEN'S METACOGNITIVE STRATEGIES (2010)

Strategies	Function
Metacognitive strategies	<ul style="list-style-type: none"> (1) Planning what learners will do (2) Checking how it is going (3) Evaluating how it went

All mentioned showed that learning strategies are what the learners performed unconsciously and the use of strategies depend on the situation or goal. In terms of metacognitive strategies used for this study, they are based on Cohen's classification divided into three categories, planning (what learners will do), checking or monitoring (how it is going) and evaluating (how it went).

III. METHODOLOGY

A. Subjects

Among 11 Thai graduate students for Master's Degree in English Language Teaching (ELT), six of them, three from the top group (S1-S3) and another three from the bottom group (S4-S6), were subjects for this study. Although their scores from the assignment were not different a lot, it probably showed some different results relating the main purposes of the study. Their background and scores received from the assignment were presented as follows.

TABLE VIII
SUBJECT'S BACKGROUND

Student No.	Assignment's score	Gender	Educational Background
S1	A	Female	B.A. (English)
S2	A-	Male	B.Sc. (Criminology)
S3	B+/A-	Female	B.A. (Geography)
S4	B/B+	Female	B.Sc. (Computer Engineering)
S5	B/B+	Female	B.A. (English)
S6	B/B+	Male	B.A. (English)

B. Research Instrument

This study mainly focuses on investigating the websites used during completing academic writing including the real purposes for using them. It is complicated to obtain the real information from students. Besides, the small number of the students is suitable for using qualitative approach, especially interview. So the semi-structured interview was used for this study.

C. Data Collection

The semi-structured interview was used for data collection. All interviews were conducted individually to make the participants speak comfortably, not hesitate to speak, and be articulate as stated in [8]. Moreover, to prevent misunderstanding and get the accurate information, the interview was conducted in Thai with note-taking and two audio recordings to assure the accuracy of the data obtained. Each interview lasted around 30 minutes.

Each interview warmed up with asking the participants' educational background, followed by informing them the purpose of the study, what will be done with the data to protect the confidential of the interview, and the time being taken approximately. During the interview, the participants' assignments were used to enhance them remind their processes in completing them.

D. Data Analysis

The 6 interviews were transcribed and translated into English based on the audio recordings. Then the interview

transcript was analyzed using the content analysis defined as the study of recorded human communications [9].

IV. RESULTS

A. Websites used in academic writing

According to the conversation among six students, the information obtained showed the websites used by the graduate students to facilitate their metacognitive strategies in academic writing as presented in Table IX.

TABLE IX
WEBSITES USED IN ACADEMIC WRITING

No.	Metacognitive Strategies		
	Planning	Monitoring	Evaluating
S1	www.google.com	www.google.com	www.paperrater.com
S2	www.google.com	-	www.paperrater.com
S3	-	-	www.google.com
S4	www.google.com	www.google.com dict.longdo.com www.wikipedia.org	www.google.com dict.longdo.com
S5	www.google.com	-	www.google.com dict.longdo.com www.macmillandictionary.com
S6	www.google.com www.wikipedia.org	-	-

Table IX shows that most students mainly used www.google.com in the three strategies, planning, monitoring, and evaluating. Besides, different websites added by S1, S2, S4 and S6 were www.paperrater.com, dict.longdo.com, www.wikipedia.org, and www.macmillandictionary.com. It is obvious that in academic writing, websites were used while evaluating the most and were used the least in monitoring. Additionally, it was found that the two male students gave the same reason for not using any websites to facilitate their checking. They thought that after finishing searching for more information, they did not need to search more during writing.

Furthermore, those websites were also categorized into planning, monitoring and evaluating to reveal the frequency (Never = 1, Rarely = 2, Sometimes = 3, Regularly = 4, Often = 5) in using each website as shown in Table X, XI and XII.

TABLE X
THE FREQUENCY OF WEBSITES USED IN PLANNING

No.	Websites used in Planning	Frequency
S1	www.google.com	2
S2	www.google.com	2
S3	-	1
S4	www.google.com	4
S5	www.google.com	5
S6	www.google.com www.wikipedia.org	4

As is apparent from Table X, the frequency of using websites in planning by the three students, S1 (rarely), S2 (rarely), and S3 (never), receiving the assignment's scores

higher was less than the rest, S4 (regularly), S5 (often), and S6 (regularly).

TABLE XI
THE FREQUENCY OF WEBSITES USED IN MONITORING

No.	Websites used in Monitoring	Frequency
S1	www.google.com	2
S2	-	1
S3	-	1
S4	www.google.com	2
	dict.longdo.com	2
	www.wikipedia.org	2
S5	-	1
S6	-	1

In monitoring process, the frequency of using websites by most students was very low. The information from Table XI revealed that four out of six students did not use any websites.

TABLE XII
THE FREQUENCY OF WEBSITES USED IN EVALUATING

No.	Websites used in Evaluating	Frequency
S1	www.paperrater.com	2
S2	www.paperrater.com	2
S3	www.google.com	2
S4	www.google.com	2
	dict.longdo.com	3
S5	www.google.com	3
	dict.longdo.com	5
	www.macmillandictionary.com	5
S6	-	1

Table XII showed the similar results as appeared in Table X. That is the frequency of using websites and the number of websites used in evaluating by S1 (rarely), S2 (rarely), and S3 (never) was lower than the rest.

B. Purposes for using each website

Purposes for using each website are another interesting issue to mention. The following tables (Table XIII, XIV, and XV) illustrate all purposed reported by all students.

TABLE XIII
THE PURPOSES OF USING WEBSITES IN PLANNING

No.	Websites used in Planning	Purposes
S1	www.google.com	To find more information for some keywords.
S2	www.google.com	To simplify some keywords.
S3	-	
S4	www.google.com	To be quicker for paraphrasing.
S5	www.google.com	To find for more information.
S6	www.google.com	To survey the information related to the assignment.
	www.wikipedia.org	

As presented, the information from Table XIII shows that most students used websites to look for the content in

planning process except S4 using the website to help her save the time in completing the assignment. Additionally, every student revealed that they just opened the google and wikipedia websites to use them as the pathway to open other websites.

TABLE XIV
THE PURPOSES OF USING WEBSITES IN MONITORING

No.	Websites used in Monitoring	Purposes
S1	www.google.com	To complete the assignment as much as she can.
S2	-	
S3	-	
S4	www.google.com	To find some definitions.
	dict.longdo.com	
	www.wikipedia.org	
S5	-	
S6	-	

The main purpose shown from Table XIV was to look for more information to make the assignment more and more perfect in their views.

TABLE XV
THE PURPOSES OF USING WEBSITES IN EVALUATING

No.	Websites used in Evaluating	Purposes
S1	www.paperrater.com	To see overall picture.
S2	www.paperrater.com	To see overall picture.
S3	www.google.com	To assure the terminology.
S4	www.google.com	To check Grammar.
	dict.longdo.com	
S5	www.google.com	To check Grammar.
	dict.longdo.com	
	www.macmillandictionary.com	
S6	-	

For evaluating process, S1 and S1 aimed at only seeing the overall picture. About evaluating spelling and grammar, they gave the opinion that they could do by themselves without any websites. As for S3, she just used the website to assure the terminology and kept spelling and grammar for herself as the previous two students. Obviously, the two students (S4 and S5) receiving the lower scores still used several websites to facilitate they evaluating, especially checking their grammar whereas the rest (S6) did not use any websites to help his evaluating.

Further analyses of the results revealed that google website was used the most by the subjects in completing academic writing. This is consistent with the report of the Top sites on the web [10]. That is the google was used the highest, ordered by Alexa Traffic Rank. This may be beneficial for students to learn how to use keywords in searching for more information from the website. Furthermore, some websites were used to check Grammar. That shows the students, especially graduates, still have anxiety about Grammar in English writing. So in teaching writing, the teachers should focus on not only the content but also grammar.

V. CONCLUSIONS

The results of the study would be the guideline of using the Internet to facilitate the academic writing for the students or others concerned. At the same time, it is beneficial for the teachers to have greater understanding about the strategies their students used and lead into teaching or training them to integrate the use of the Internet and metacognitive strategies efficiently. However, the higher number of participants and investigating the participants in other areas were suggested for further studies.

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Student's Intencity and Practice's Skill on Integrating Technology into Bank Accounting Course

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Abstract

This study aims to explore student's intentions and practice's skill on technology integration in bank accounting course. Using technology information in learning process has been implemented by Bank accounting information system, this technology facilities have made students feel in practice as a real bank officer. There are 108 participants of the students who have taken bank accounting course as unit analysis in quantitative and qualitative research models. Statistical method and triangulation have implemented to cross check the validity answer of selected respondent and focus group discussions have developed to support data reliability. This research takes times in six months to observe the student's intentions and practice's skill in technology integration. The result suggested that students in Indonesia showed strong intentions to integrate technology and to facilitate student-centre learning. However, they reported that they were more likely to use technology as a supporting and instructional tool to learn it as a real situation in bank office, although they didn't interest to work in bank services. Another result, there were different intentions before and after integrated technology of bank accounting information system.

Keywords: student centre learning, technology integration, student's intentions and practice's skill

Introduction

Accounting developments in the banking industries at this moment is suitable with educational institutions to develop learning methods with appropriate bank accounting. Integrating technology information in learning process has been focussed in higher education. Technology integration and transformation into the higher education system has come a long way since the 1990s. Many previous studies have discussed the values and influence of technology in education (Cuban, Kirkpatrick, & Peck, 2001; Kay, 2006; Russell, Bebell, O'Dwyer, & O'Connor, 2003). The literature of educational technology is gradually changing and showing some increasing that lead to the improvement of education quality. Infrastructures of higher education on the use of computers in the classroom-student ratio increased from the average computer 12:1 in 1998 to 5.4:1 in 2001 in the United States (Kay, 2006). Although the debates on the advantages and disadvantages of technology integration and transformation in learning continues to happen, researchers tend to agree that it is important to integrate technology into the educational because the value of integrating technology has always been to enhance students' critical thinking, collaboration, and problem-solving skills (Jonassen, Peck, & Wilson, 1999). Bank Accounting as one of the courses must be taken by students after they have passed taking introductory accounting courses. Learning process in

the bank accounting class room in any higher institutions for the current conditions through by classical theory approach, which provides reinforcement in conceptual ability, but now at Perbanas business school bank accounting course has developed the teaching-learning process which have oriented to user needs. They are going to demonstrate as bank officer such as: teller, account officer, customer services and funding officer depend on their jobs by using bank accounting information system.

Theoretical Framework

The theoretical framework of this study is based on the constructivist learning theory, which articulates that learning to teach is to bring the sorts of changes in knowledge or understanding, skills, and beliefs that may occur through teacher education (Hollingsworth, 1989). Constructivism maintains that individuals create or construct their own new understanding or knowledge through the interaction of what they already know and believe with the new ideas, events, and activities with which they come in contact (Cannella & Reiff, 1994; Lerman, 1989). The applications of constructivist learning theory in the use of ICT in the classroom reveal a shift from using ICT as instructional tools that support the teachers' teaching to using ICT as cognitive tools.

Student centered learning

Student centered learning is 'students might not only choose what to study, but how and why that topic might be an interesting one to study'. He also emphasizes Rogers' belief that students' perceptions of the world were important, that they were relevant and appropriate. This definition therefore emphasizes the concept of students having 'choice' in their learning. Harden and Crosby (2000; 335) describes teacher-centered learning strategies as the focus on the teacher transmitting knowledge, from the expert to the novice. On the other hand, they describe student-centered learning as focusing on the students' learning and 'what students do to achieve this, rather than what the teacher does'. This definition emphasizes the concept of the student 'doing'. Other authors articulate broader, more comprehensive definition. Summaries of the literatures on student-centered learning to include the following tenets: (1) the reliance on active rather than passive learning, (2) an emphasis on deep learning and understanding, (3) increased responsibility and accountability on the part of the student, (4) an increased sense of autonomy in the learner (5) an interdependence between teacher and learner, (6) mutual respect within the learner teacher relationship, (7) and a reflexive approach to the teaching and learning process on the part of both teacher and learner. In summary, it appears from the literature that some view student-centered learning as: the concept of the student's choice in their education; others see it as the being about the student doing more than the lecturer (active versus passive learning); while others have a much broader definition which includes both of these concept, but in addition describe the shift in the power of relationship between the student and the teacher.

Electronic Learning (e-learning)

Electronic learning (e-learning) is the systematic use of networked multimedia computer technologies to empower learners, improve learning, connect learners to people and resources supportive to their needs, and to integrate learning with performance and individual with organizational goals. We can say pedagogy empowered by digital technology (Nichols, 2005). There are three steps to supporting technology while using e-learning method: first step is preparation to making modules (input) as: office application, animation, video streaming, and link to web, voice recorder and editor. Second is setting environment (delivery) as: email chatting search engine, learning management system, video conference and digital library and third is evaluation (output) as: email, chatting and video conference.

Student Beliefs, Attitudes, Intentions, and Actions

Student beliefs and attitudes towards technology integration in the classrooms have been widely researched and published (Ertmer, 1999; Pajares, 1992;

Richardson, 2003; Swain, 2006). Ertmer (1999) suggested that both the first-order barriers to change, which were related to teachers' more effective use of technology, and the second-order barriers to change, which were related to teachers' intrinsic beliefs and practices, have to be addressed for students to integrate technology to in student-centered learning. Pajares (1992) discussed that student and teachers beliefs and self-efficacy greatly influenced their subsequent instructional decisions and classroom practices. Teachers' belief system about teaching and learning may have an effect on meaningful technology integration. Richardson (2003) discussed that student held "deep-seated beliefs" about teaching and learning that were developed from their experiences as students. These beliefs have a strong influence on their future teaching styles and preferences. Swain (2006) examined student self-assessment of integrating technology and found that they lacked the readiness to change their underlying beliefs of how educational technologies can enhance the teaching and learning process. Learning to teach is to bring about cognitive change in student teachers to enable them to be more specific in their knowledge of student learning and the context (Hollingsworth, 1989). Studies have discussed different ways of providing technology-related knowledge and skills to student to try to change their attitudes toward technology integration. Some examples are using standalone technology skills-based courses (Abbott & Faris, 2000) and integrating technology into different courses in the teacher education program (Albee, 2003). These studies suggested that providing educational technology courses to student teachers improved their technology skills and knowledge and in turn improved their attitudes and self-efficacy in integrating technology in the future.

Research Method

The purpose of this study is to investigate the students' intentions and practice skills in technology integration while the student studying bank accounting course. This study began by examining the intentions of student in integrating technology in their learning before and after integrated technology of bank accounting information system. After that, their intentions were compared with their actual practice skills to use technology in bank accounting course during their 14-week in class room. The results of the study were used to show how the student translated their intentions constructed. Statistical analyze and qualitative descriptive method have been used to explain experience and strategic implications of the intentions and practice's skill on integrating technology into bank accounting Course. Populations and sample of the research were accounting students in Perbanas business school that have been studying bank accounting course.

Questionnaires had been used to collected primary data and were distributed to respondents. Questionnaires were divided into five factors as follow: Use of technology as supporting tools, Use of technology in student-centered learning (SCL), Being a bank officer in class, Confidence in practices of ICT in the class room and Support from school and peers.

Result and Discussion

There are 25 statements to measure intention of the students which in divided into two section before integrated technology into bank accounting courses (statement item x1-x10) and after integrated technology. The entire item before integrated technology into bank accounting courses x1-x10 statements are valid, it is characterized by Pearson correlation significance value below 0.05 and The entire item before integrated technology into bank accounting courses x11-x25 statements also valid too, where the significance of Pearson correlation values all below 0.05.

Reliability Statistics

Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items
.844	.858	10

Reliability statistic has shown that items x1-x10 were stating the intention reliable with Cronbach's alpha value of 0.844 is more than the required 0.6.

Reliability Statistics

Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items
.872	.872	15

Statements x11-x25 stating bank accounting software implementation have proved reliable with Cronbach's alpha value of 0.872 more than 0.6 is required. Based on SPSS output that results obtained from the 10 statements about students' perceptions of interest in subject matter and content of banking accounting, the statement indicates that the item-10 is the highest. This indicates that the student has a strong intention to find out how the operations of banking accounting information systems technology. In addition students also have a strong intention to find out what it is accounting banking (x3), how the accounting banking (x4), and bank accounting information systems technology (x7). However, despite the desire to know more about accounting in banking is high, there are students who think that after they have known and have knowledge about bank accounting, they do not have to work in the banking sector (x6). In this case respondents feel that their intention to learn and study bank accounting course as their need to have ability in concept and practice of bank accounting. Over all the intention of the students to study bank accounting course is strong.

Descriptive Statistics

	N	Min	Max	Mean	Stand.Deviation
x1	108	3	4	3.35	.480
x2	108	3	4	3.36	.483
x3	108	2	4	3.43	.533
x4	108	2	4	3.41	.512
x5	108	2	4	3.31	.483
x6	108	1	4	3.18	.807
x7	108	2	4	3.41	.530
x8	108	2	4	3.34	.532
x9	108	2	4	3.31	.523
x10	108	2	4	3.45	.570
Valid N	108				

Descriptive Statistics

	N	Min	Max	Mean	Stand.Deviation
x11	108	2	4	3.44	.584
x12	108	2	4	3.42	.582
x13	108	2	4	3.30	.630
x14	108	2	4	3.39	.609
x15	108	2	4	3.40	.595
x16	108	2	4	3.26	.586
x17	108	2	4	3.37	.504
x18	108	1	4	2.81	.703
x19	108	1	4	3.04	.722
x20	108	1	4	3.25	.672
x21	108	1	4	2.69	.850
x22	108	1	4	2.67	.723
x23	108	1	4	3.39	.639
x24	108	1	4	3.24	.682
x25	108	1	4	3.16	.877
Valid N	108				

Results of this research have obtained that the 15 statements about students' perceptions of the implementation of the banking system of accounting information (accounting software banking), indicating that students have a strong intention to practice banking accounting information systems technology (x11). In addition students have a strong intention to be able to operate (x12), use (x15) and control (x14) banking accounting information systems technology. When they have ability to use, operate and practical skill in bank accounting technology, they think it's easier to get a job (x23). Students did not agree that they have ability to use and capture of banking accounting information technology, and then they will gain positive attention from professors in the classroom (x22), to obtain positive attention from their friends in class (x21), and could earn a lot of friends in class (x18). The researchers conducted factor analysis to know students intention and practice before and after integrated technology of bank accounting information system in the class room. The analysis with Varimax rotation revealed five factors that carried eigenvalues higher than 1.2 from the 25-item survey.

Table 1: Student Intentions and Practice in Integrating Technology into Bank Accounting Course

Factor	Before	After	Post prac tice	F	p- value
	Inten tions	Inten tions			
1. Use of technology as supporting tools	4.15	4.18	4.06	2.81	.06
2. Use of technology	3.78	3.83	2.74	74.13**	<.01
3. Being a bank officer	3.81	4.11	3.71	20.36**	<.01
4. Confidence in Practice	3.23	3.69	3.51	14.42**	<.01
5. Support from schools and peers	3.78	3.86	3.15	24.06**	<.01

** Significant at $p < 0.01$ level

The average age of the participants was 21 years old. There were more female (72%) than male (28%) participants. The researchers employed one-way analysis of variance (ANOVA) on repeated measures to find out if there were significant differences between the students' intentions and practice skills in technology integration at bank accounting course. The ANOVA results showed that there were significant differences in the students' intentions and practice skills in the integration of technology of bank accounting information system across the three stages in four out of the five factors (see Table 1). There was no significant difference found in Factor 1: Use of technology as supporting tools (4.15; 4.18; 4.06). There were significant differences in the other four factors. In Factor 2: Use of technology, the average mean before integrated technology of bank accounting information system in their class increased slightly from 3.78 to 3.83 after integrated technology of bank accounting information system in their class, and dropped to 2.74 when they are practice as a bank officer in their class. This similar pattern was also observed in Factor 3: Being a bank officer in class and Factor 4: Confidence in practice ICT in the class room. The averages increased slightly after integrated technology of bank accounting information system in their class. In Factor 3, the average increased from 3.81 to 4.11 after integrated technology of bank accounting information system, then decreased to 3.71 at the last data collection. In Factor 4: Confidence in practice, the average score increased from 3.23 to 3.69 after integrated technology of bank accounting information system in their class but dipped to 3.51 at the end of post student practice. However, in Factor 5: Support from school and peers, the average decreased after integrated technology of bank accounting information system in their class from 3.78 to 3.86,

and decreased further to 3.15 at the end of the post student practice (see Table 1), these research result supporting with (Angela and Gao, 2009). The researchers ran further pairwise comparisons to compare the differences of the means between before and after integrated technology of bank accounting information system in their class, and between post student practices. The comparisons before and after integrated technology of bank accounting information system in their class focused on their changes in intentions, whereas the comparisons after integrated technology of bank accounting information system and student focused on the translation of their intentions to practice (see Table 2).

Table 2: Pairwise Comparisons of Means Before and After Integrated Technology of Bank Accounting Information System in The Class Room

Factor	Before integrated Intentions	After integrated Intentions	T	p- value
1. Use of technology as supporting tools	4.15	4.18	0.34	0.56
2. Use of technology	3.77	3.85	66.31**	<.01
3. Being a bank officer	3.91	3.97	8.67**	<.01
4. Confidence in practice	3.43	3.62	9.22**	<.01
5. Support from schools and peers	3.98	3.89	28.79**	<.01

** Significant at $p < 0.01$ level

The only factor that did not show any significant differences was Factor 1: Use of technology as supporting tools and there were significant differences of the student intention in the other four factors before integrated technology of bank accounting information system in their class with after integrated technology of bank accounting information system in their class.

Conclusion

The purpose of this study is to investigate the students' intentions and practice skills in technology integration while the student studying bank accounting course. This study began by examining the intentions of student in integrating technology in their learning before and after integrated technology of bank accounting information system in their class and also examine factors analysis to know the difference intention before and after integrated these technology into five factors as follow: Use of technology as supporting tools, Use of technology in SCL, being a bank officer in class, Confidence in practices of technology of bank accounting information system in the class room and support from school and peers. Results of the research were the student has a strong intention to find out how the operations of banking accounting information systems technology and to learn bank accounting course, there were significant differences in the students' intentions and practice skills before and after integrated technology bank

accounting information system in the class into four factors such as; Use of technology in SCL, being a bank officer in class, Confidence in practices of ICT in the class room and support from school and peers. There was no significant difference found in Factor 1: Use of technology as supporting tools.

Suggestion and Implication

Higher education can make policy for using technology in learning process that the student and teacher requirement. Bankers and higher education stake holder can cooperate to develop teaching and learning models that suitable with company or industries need, so this mutual cooperation can enhance graduate employability. This study also suggested to extent factors that affect the student intention to integrated technology in learning process. There are three possible implications of the findings obtained from this study. First, it could offer practical suggestions about how to restructure in teaching and learning process in bank accounting course with regard to integrating technology in teaching and learning. Second, it could contribute to the building of learning model as specially in bank accounting course that technology of bank accounting information systems has supported student and teacher in learning process through creating the really condition at bank activity, so the student feeling and being as a bank officer. Third, this study indicates that the student has strong intention to use technology in learning process so higher education institution should enhance IT awareness. The results of this study will be useful for the improvement of university curriculum especially the banking accounting courses, where in teaching and learning students wish the implementation of banking information system technology. Implementation of banking information systems technology in teaching and learning will have an impact on increasing knowledge and understanding the graduates about the banking field, so they are ready in the work field. This ultimately will affect the company and banking that require graduates who are ready to work and have the knowledge and understanding of banking information system technology so that it can serve customers well.

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A Community-Driven Research Initiative: Acoustic Technology for Non-Destructive Evaluation to Increase Export Value of Mangosteens

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Abstract—Being social responsible by delivering the advanced knowledge and technological research to the society remains an important duty that universities should fulfill. Thailand society is linked closely to the export industry, especially fruits. To benefit the society, a multi-disciplinary research to study a method to improve the quality of exported fruit evaluation by the faculty of Agriculture and the faculty of Engineering is an example set forth. As identifying internal defects in mangosteen are highly demanded in fruit industry, an effort to adopt the acoustic technology for non-destructive classification tool is explored in this study. Existing practical classification such as specific-gravity measurement and visual inspection to predict translucent/non-translucent flesh in mangosteen are accurate up to 80 percent. However, there remain some misclassification errors. The misclassification results in income loss on the exported mangosteens. This paper investigates a low-cost, novel nondestructive acoustic method for predicting flesh conditions as either translucent or non-translucent. Empirical experiment of acoustic signal transmission is conducted and the response signals are examined. With a set of local-grade mangosteens, a machine's specific classification by rules is developed and its predictability of mangosteen flesh is compared with a ground truth. It turns out that the selected rule-based classification provides convincing evidence as it gives 95% accuracy rate for correctly predicting the flesh condition. However, with a set of export-grade mangosteens, adopting the classification by rules does not provide reliable prediction. Hence, the future work is to conduct further investigation to improve its accuracy.

Keywords— Acoustic, Postharvest, Nondestructive, Signal Processing, Mangosteens

I. INTRODUCTION

The key roles of the university include providing education, conducting research, servicing community. Chiang Mai University, as one of the seven national research universities (NRU) in Thailand, is then obligated to provide advanced knowledge and technological research to benefit agriculture-based society of Thailand. In addition, the Commission on Higher Education of Thailand sees the

importance of applying science and technology to help agricultural sector. Therefore, the Postharvest Technology Innovation Center under the Commission on Higher Education provided funding for the development of a multi-disciplinary research namely a non-destructive internal inspection of mangosteens. The research is conducted by the faculty of Agriculture and the faculty of Engineering. Successful development would be financially beneficial to farmers and to the society in general.

Mangosteen (*Garcinia mangostana*) is among popular tropical fruits being grown in South East Asia. In 2010, Thailand generates almost 2 billion baht in export revenue on mangosteen [1]. However, nowadays mangosteen farmers in Thailand still lack of proper inspection technology to assure the quality of the fruit being exported. Especially, USA and Japan have stringent requirement that the exported mangosteens must not contain any translucent flesh. With poor inspection, it can result in rejection of the exported fruit, thereby loss in farmers' revenue.

Considered as the queen of the fruits, mangosteen provides uniquely sweet flavor with delicately white flesh divided into about 4-8 wedge-shaped segments as shown in Fig. 1. This seasonal fruit is small and round with diameter of about 4-7 cm. Its rind (or pericarp) of about 1 cm thick is to protect its internal flesh. Mangosteen rind, when young, appears in light green and it turns into dark violet or deep brownish-purple skin when ripe.

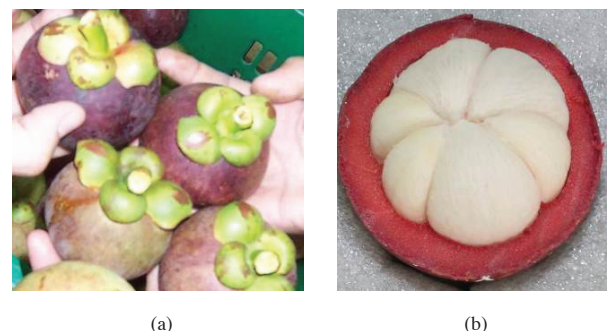


Fig. 1 (a) Mangosteens with different ripening stages; (b) internal flesh and its pericarp

Mangosteen is a commercial fruit that has delicious flavor, delicate flesh texture, nutrient richness, and medicinal benefits. However, some mangosteens after harvesting may come with physiological defects including irregular shape, hardening pericarp, yellow gumming, and translucent flesh [2-4]. In addition, translucent flesh in mangosteen often appears on the largest segment, which could induce translucent symptom to nearby segments as shown in Fig. 2. Typically translucent flesh is often found in a large mangosteen than a smaller one. From various defections, internal defection of mangosteen such as translucent flesh is the most difficult to detect.



Fig. 2 Mangosteen with translucent flesh

Besides appearance, qualities in flavor and flesh are necessary for exporting the fruit. In literature, there are non-destructive methods for investigating the internal quality of mangosteen [5-9]. For instance, combined physical parameters from measurement including hardness, moisture content, or specific gravity were used to predict the flesh quality of the mangosteen [6]. High frequency sensing like microwave and near infrared spectroscopy were used to evaluate moisture and possible translucent flesh [7, 8]. However, there is still a need for an effectual and affordable way to, without cut opening, check for mangosteen internal quality. The low-cost acoustic technique was conducted based on analysis of acoustic tapping responses [9]. It turns out that tapping technique might be too harmful to mangosteen rind while the frequency response in a band of 1,378-1,723 Hz seemed to contain some internal mangosteen information. Hence acoustic signal transmission is investigated instead [10].

The main focus of this experimental research is based on the following questions: Can an acoustic signal processing technique be applied to extract relationships between the acoustic frequency responses and the flesh quality of mangosteens? By adopt nondestructive, acoustic-based method, how effective of the prediction if a certain technique is applied?

The rest of this paper is organized as follows. Section II outlines acoustic signal transmission approach. Section III discusses acoustic signal processing steps used in the study. Experiment results and analysis is presented in Section IV. Finally, conclusion and future work is given in Section V.

II. ACOUSTIC SIGNAL TRANSMISSION APPROACH

The experimental setup for the acoustic signal transmission approach is shown in Fig. 3. The band-limited

acoustic signals of equal amplitudes are generated and transmitted by a speaker through each mangosteen. On the other side of the mangosteen, a signal receiver (a microphone) is attached. An acrylic enclosure with insulators creates controlled environment. Insulators are used to minimize both the acoustic signals that could reach the receiver through the air, and environmental noises. The intention is to have the receiver picking up and processing only the pass-through-mangosteen acoustic signal.

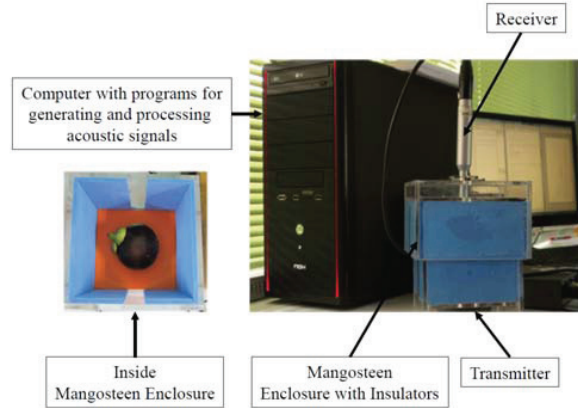


Fig. 3 Schematic of experimental setup for acoustic signal technique

The acoustic transmission approach is applied to two set of mangosteens in the experiment. First, a set of local-grade mangosteens is tested to explore possible rules for classification and its baseline results. Then, a set of export-grade mangosteens is tested.

III. STEPS IN ACOUSTIC SIGNAL PROCESSING

Steps involved in acoustic signal processing are shown by a block diagram in Fig. 4. Each of the steps is explained as follows.

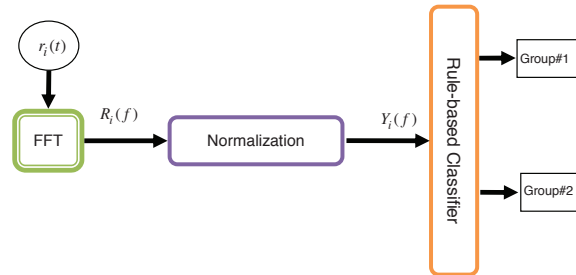


Fig. 4 A block diagram of acoustic signal processing to classify mangosteens

In the first step, a time-varying received signal $r_i(t)$ from the i^{th} mangosteen is represented as a frequency response (a signal as function of frequency f) or a spectrum $R_i(f)$ by applying the Fast Fourier transform (FFT).

For the next step, it is observed that environment and equipment can affect the frequency response. Without the presence of mangosteen, the magnitudes of frequency response through the air $R_{air}(f)$ are non-uniform in f , although the transmitted signal are of equal magnitudes in all frequencies. So instead of using mangosteen frequency

response's magnitudes $|R_i(f)|$ directly, we minimize this effect by performing the following air normalization:

$$RR_i(f) = \frac{|R_i(f)|}{|R_{air}(f)|} \quad (1)$$

, where $RR_i(f)$ represents a ratio between magnitudes of $R_i(f)$ and $R_{air}(f)$ for the i^{th} mangosteen.

When the sizes of mangosteens are significantly different, sizing normalization should be taken into account. Size differences can cause magnitude variation in the frequency responses. However, since all mangosteens used in each set of our experiment are of similar sizes, we ignore the sizing effect of mangosteens.

To classify mangosteens with different internal flesh conditions, we finally compute $Y_i(f)$, by normalizing the magnitude of frequency response by its average over all frequencies:

$$Y_i(f) = \frac{RR_i(f)}{RR_i^{norm}} \quad (2)$$

,where $RR_i^{norm} = \frac{\sum_{k=1}^M RR_i(f_k)}{M}$ and M is a total number of frequencies. Then $Y_i(f)$ of all mangosteens are used as inputs of a rule-based signal classifier in the last step.

IV. EXPERIMENT RESULTS AND ANALYSIS

In the experiment, we adopt two set of mangosteens; local-grade and export-grade mangosteens. A set of local-grade mangosteens (set I) consists of 21 mangosteens samples collected from a local market with a diameter range of 4.58-5.51 cm. A set of export-grade mangosteens (set II) consists of 92 mangosteen samples collected directly from a fruit garden with a diameter range of 5.45-6.65 cm. The transmitter, in Fig. 3, simultaneously generates an acoustic signal of equal amplitudes in the frequency range of 500-2500 Hz and step size of 100 Hz. For each mangosteen, the acoustic signal is recorded for 5 seconds with the sampling frequency of 65,536 samples/second.

Fig. 5 shows the frequency response of the system without the presence of mangosteen. Although a transmitted signal of different frequencies, all with equal magnitudes, is used, the magnitudes of the frequency response $R_{air}(f)$ are non-uniform (not flat). Hence frequency responses from all mangosteens are normalized by this $R_{air}(f)$.

The responses $RR_i(f)$ of all mangosteens in set I are shown in Fig. 6. Five dashed lines in the figure represent five bad (translucent flesh) mangosteens, while sixteen solid lines represent all good mangosteens. From the observation, it is difficult to directly apply $RR_i(f)$ for classifying the flesh conditions of mangosteens, as no clear separation between dashed and solid lines can be identified. Hence, we compute $Y_i(f)$ using equation (2) and focus on the frequency range of 1500 – 2500 Hz due to its wider spread of data. The responses $Y_i(f)$ are shown in Fig. 7.

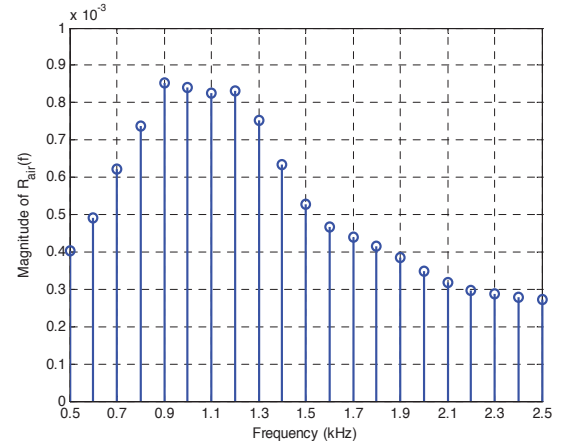


Fig. 5 Frequency response without presence of mangosteen

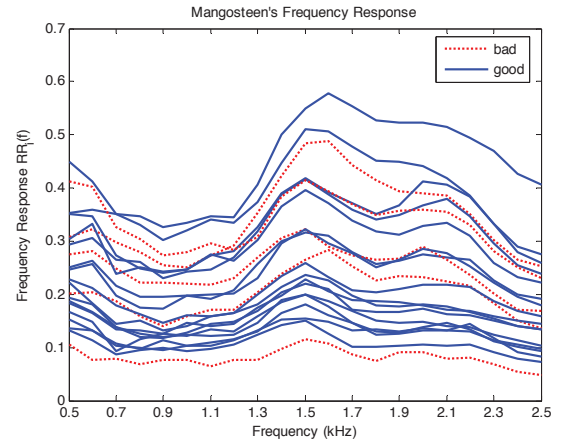


Fig. 6 Frequency response $RR_i(f)$ – Set I

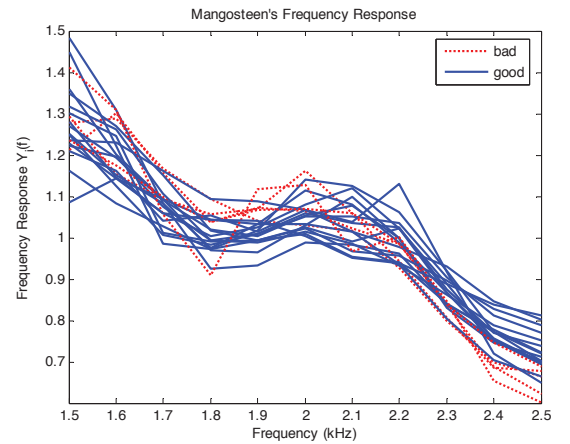


Fig. 7 Frequency response $Y_i(f)$ – Set I

In Fig. 7, some separation between groups of good and bad mangosteens is observed, specifically at frequencies of 1900, 2300, and 2500 Hz. Therefore, these frequencies are selected and used as features for inputs in our classifier. The resulted scatter plots are shown in Fig. 8. Most of good mangosteens (marked by O) are located closely on the left except for one,

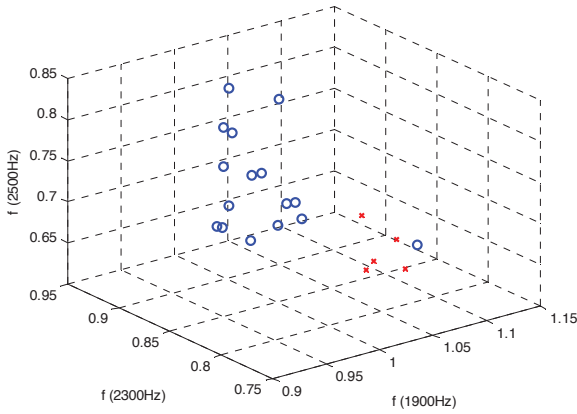


Fig. 8 Scatter plot on selected frequencies – Set I

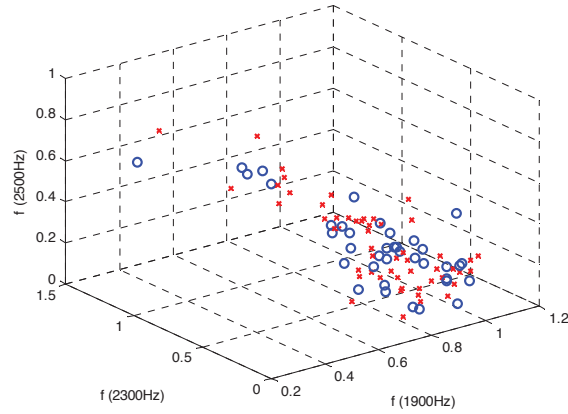


Fig. 10 Scatter plot on selected frequencies – Set II

while all bad mangosteens (marked by X) are located on the right. So a set of rules for classification are developed to predict mangosteen flesh conditions as follows:

IF ($Y_i(f=1900) < 1.05$) AND ($Y_i(f=2300) > 0.82$)
AND ($Y_i(f=2500) > 0.64$)
THEN the i^{th} mangosteen is good
OTHERWISE the i^{th} mangosteen is bad.

It turns out that the above rule-based classifier can correctly predict mangosteen flesh condition at 95.24% accuracy rate.

Next, the acoustic rule-based classifier is applied to mangosteens in set II. The responses $Y_i(f)$ of mangosteens in the set are shown in Fig. 9. In the figure, no clear separation between groups of good and bad mangosteens is observed.

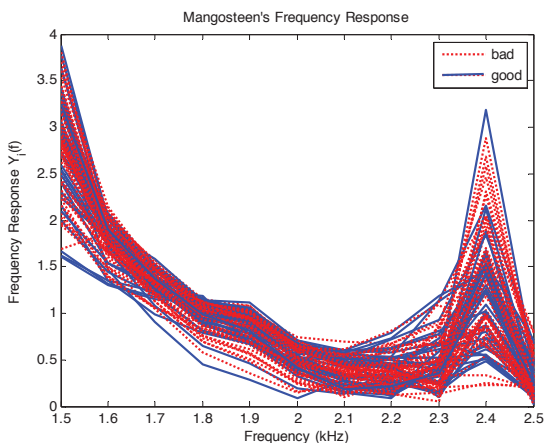


Fig. 9 Frequency response $Y_i(f)$ – Set II

As shown in Fig. 10, good and bad mangosteens are mixed together. Clearly, the selected features (1900, 2300 and 2500 Hz) alone cannot be used to classify flesh conditions for this set of exported mangosteens. With the same rule-based classifier, the accuracy rate for correctly predict mangosteen flesh condition drop to 57.61%. Other choices of frequencies

have been tried but none has produced a feasible simple set of rules for classification. Hence, further investigation on the possible application of acoustic signal to classify the exported mangosteens is needed.

V. CONCLUSION AND FUTURE WORKS

The university should be treated as a social good that must be accountable to society. An example is the engagement through the research in technological applications to benefit society. Thailand has long been agricultural country and has exported agricultural products for the world. Improving the process of exporting such as internal inspection of the fruit product could directly help the social capability for economic growth.

The exploration on the use of acoustic sensing for nondestructive evaluation of mangosteens has been done in this study. Sinusoidal acoustic signals have been generated and transmitted through mangosteens. It is found that by analyzing the response in the frequency domain, a simple set of rules using frequencies 1900, 2300 and 2500 Hz as main features can classify the flesh condition of local mangosteens at 95.14 accuracy rate. However, the simple set of rules cannot differentiate flesh conditions of the exported mangosteens. This suggests that a simple linear classifier (like a rule-based classifier) may not always generate reliable separation between good and bad flesh of all mangosteens. Hence, further investigation is needed to improve classification accuracy. For example, a more complex feature extracted from the mangosteen's frequency spectrum or the application of non-linear classification techniques may help increase overall accuracy rate.

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Analysis of Multiple Choice Tests for the University Entrance Test

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The multiple-choice test is one typical test formats used in the university entrance test. Multiple-choice (or fixed-response) format allows for a wider sampling of the content because more questions can be given in a testing period. These types of tests also offer greater efficiency and reliability in scoring than an essay type. In university entrance test the multiple choice is effective test as a tool to screen qualified candidates.

This study aimed to conduct an analysis of entrance examination at Widyatama University. The analysis will be done with items about the validity of the test level, the level of reliability, item difficulty level, distinguishing features and distracters analysis. Research will use the answers to the test wave 2 participants university entrance test for academic year 2009/2010.

Keywords: university entrance test, multiple choice tests, validity test

I. INTRODUCTION

There are three objectives: first tests on student learning achievement measure (measuring Their achievements) is usually carried out at the end of the learning process (end of course), both in the context of class placement (placement) as well as university entrance examination (university entrance) and third in order evaluation of learning (diagnostic test). With the number of students who are many, efficiency in the implementation process becomes increasingly important test. Therefore, tests using a multiple-choice test (multiple choice test) to be one option.

1.1. University Entrance Test of Widyatama University

In conjunction with the admission of new students Widyatama university carry out entrance test either

independently or jointly with other universities. In each academic year the University held an entrance Test with includes two functions: as a prospective student recruitment program and also to observe the academic ability of new and prospective students.

Test entrance examination held in the form of a written test conducted simultaneously (onsite) as many as three waves in each academic year. Form test includes testing of basic skills math, English and Indonesian languages, and mastery of knowledge that includes the Knowledge Economy & Management, Computer Knowledge and Knowledge Technology & Culture. The total number of questions in each wave are 150 questions with multiple choice test. For prospective students faculty & Visual Communication Design (DKV) coupled with psychometric tests and drawing ability.

Since the 2004/2005 academic year university entrance exam Widyatama administer centrally, meaning that not every faculty conduct their own tests with exam questions are different, as previously done. At first entrance examination held each academic year in two waves, but began the academic year 2006/2007 carried out three waves in each year.

1.2. Multiple Choice Test

Test with multiple choice questions (MC) is the most popular and widely used screening tests especially in university entrance. Multiple choice questions are used to test for learning purposes (variety of learning outcomes) start from testing their ability to remember facts test (recall of facts) to testing the high level of Bloom's cognitive skills (Osterlind, 1998). Form of multiple choice test is widely used from pre-recruitment tests, screening tests in universities, competitive exams, certification tests, quizzes and other. In addition the MC test is also widely used as a tool to test the activities of e-learning, distance learning, Preparatory / coaching classes, and research or market survey. The main reason is because the MC test capable of evaluating

the large number of respondents simultaneously and the test results can be obtain in quick time.

Survey and other research support the use of many multiple choice test format as a tool to test the ability. Siegfried, et al. (1996) reported that the average contribution to the question with a question ESSAY only covers about 5-9% from the end of the study, about 20% short answer and multiple choice form of the rest which is about 2 / 3 from the end of the course. Becker & Watts (1996) found that the form of multiple choice tests used by the dominant eye test economics professor. One of the reasons is because

of his multiple choice tests most easily done, especially with large number of test takers.

1.3. Research Background

Evaluation of the ability of candidates to answer the questions of entrance test from academic year 2005/2006 to 2007/2008 is shown in table 1. On average, the ability of test takers in answer to the question of computer knowledge achieved the highest value which is 47.8% while the lowest average is the math test that is only reached around 34.5%.

Table 1. Average University Entrance Test for period 2005/2006 to 2008/2009 (11 waves)

Test	Number of Questions	Average of right answers	%
Mathematics	30	10.3	34.5
English	25	8.7	34.9
Indonesian	25	10.8	43.1
Economics	25	9.7	38.9
Computer	25	12.8	51.2
Culture & Technology	20	9.6	47.8

However test takers responded to the question actually quite heterogeneous in every test. This can

Based on data entrance test 2007/2008 academic year, the range between minimum and maximum values for each test point is large. This means that the ability of test takers to answer the question is very varied, as we see in the table student can answer only three of mathematics problems, while others could answer 26 questions correctly. Some reasons could be the causes of the problem are the difference of academic background, high school quality, and the region where the student come from. The ability to answer the questions correctly could also be influenced by the level of difficulty of the questions.

1.4. PROBLEM IDENTIFICATION

By looking at facts that the level of response to the question of test takers is very heterogeneous this research will focus on the question of test item analysis. Question item analysis is an activity that works to see how the question can measure how well students learn, and be useful to improve the quality of the question itself. Technical analysis of the question item consists of two types namely, qualitative and quantitative. Qualitative analysis techniques encompassed consideration of content validity, while quantitative analysis encompassed the measurement

be observed from the range of the largest and smallest values obtained in each test.

of the quality of the question in the case of item difficulty levels, different forces (discriminating power), and the function of distracters.

Three main characteristics that should be consist in a content of a test which is validity, Clarity, and reliability. Validity is determined by how well the question can measure the level of knowledge, skills and other capabilities that are expected of the learning process. Clarity measured by the quality of questions that represent material that has been learned. While reliability is seen from the consistency of values and the ability to distinguish between test takers with the ability to have different values (Sevenair & Burkett, 1988). Good multiple choice test is generally valid, it is clear (clear) and reliable than the essay type questions for multiple choice test to take a broader sample material, recognize the level of success and consistency of assessment (Cassels & Johnstone, 1984; Russell et al., 2003).

Based on the description above, this research identifies the particular question concerns the quantitative analysis that is as follows:
How is the validity , reliability, discriminating power, difficulty level and function of distracters of multiple

choice items on the entrance test Widyatama University wave 3 2009/2010 academic year compare to wave 1 2010/2011 academic year.

1.5. Purpose of the research

Based on the discussion above the purpose of the research is :

To investigate the validity , reliability, discriminating power, difficulty level and function of distracters of multiple choice items on the entrance test Widyatama University wave 3 2009/2010 academic year compare to wave 1 2010/2011 academic year.

II. Empirical framework

2.1. Analysis of Question Items

This analysis is carry out to to find out how well the item questions can work. The analysis is generally investigate in two ways, namely qualitative analysis (qualitative control) and quantitative analysis (quantitative control). Qualitative analysis is often named as the validity of the logical (logical validity) and performed before the question is being asked and purposed to investigate how well the question can work. Quantitative analysis is often called empirical. validity.

One of the purposes of question item analysis is to find out and improve the quality of the question, namely whether a question:

1. be accepted because it was supported by sufficient statistical data
2. can be improved, as evidenced some weaknesses, or even
3. not used at all because it is empirically proven not work at all.

2.2. Qualitative analysis

Qualitative analysis is viewed in terms of technical, content and editorial. Technical analysis is intended as a review of the question based on the principles of measurement and the format of writing technique.

Content analysis specifically intended as an analysis of knowledge relating to the qualification in question. Editorial analysis is intended as an analysis of the particular related to the overall editorial format and regularity of one question to another.

Qualitative analysis can also be categorized in terms of materials, construction and language. The analysis is intended as a review of materials related to the

substance in question in terms of knowledge and level appropriate to the ability of the question. Construction analysis is meant as a general review of technical literature related to the question. Language analysis is intended as a review related to the use of language according to legal and formal language.

2.3. Quantitative analysis

Quantitative analysis used to determine the extent to which the question can distinguish between the cognitive ability of the test takers. Question of quantitative analysis emphasizes the analysis of internal characteristics of the test through the data obtained empirically. Internal quantitative characteristics include parameters is the question of the level of distress, its judgment and reliability. Specific multiple-choice questions of two additional parameters that is visible from the opportunity to guess or answer a question correctly and functioning least preferred answer, namely the spread of all the alternative answers from the tested subjects.

2.4. DIFFICULTY LEVEL.

There are several reasons for the state level of difficulty of the question. Difficulty level may be determined by the depth of questions asked, complexity, or other matters related to the ability measured by the question. However, when we examine the depth of the level of difficulty of the question, will be difficult to determine why a question can be more difficult than the other.

In general, according to classical theory, the difficulty level can be expressed in several ways among (1) the proportion answered correctly, (2) difficulty in linear scale, (3) Davis index, and (4) bivariat scale. Proportion of correct answers (p), is the number of test takers who answered correctly compared the total number of test takers is the most widely use of level of difficulty. Essentially, the quality of the test item can be observed from the degree of difficulty or hardship status owned by the respective items of the question. Test items can be expressed as good items if the question is not too difficult nor too easy. The figures give an indication of the level of difficulty of the items identified with the term Difficulty index (item difficulty index number), that the world of evaluation study results are generally denoted by the letter P, which is the abbreviation of the word proportion (proportion = propors). Categories of questions based on difficulty level Nitko, 1996 is

Category level of difficulty

Value of P	category
$P < 0.3$	Difficult
$0.3 \leq p \leq 0.7$	medium
$P > 0.7$	easy

Follow up after category identification are:

Category	Follow up
Difficult	<ol style="list-style-type: none"> 1. Items discarded or dropped and is not issued again on next tests of learning outcomes 2. Are reviewed, tracked and traced so that we can investigate the reason of why the test takers could not answer the question, whether the sentence is not clear, the instructions is difficult to understand, or whether the matter is there are terms that are not clear, and so on. After repairs, the question items can be issued again in the next test. 3. Items that are basically difficult can be reused in the tests especially for a tight selection test.
Medium	These questions item can be issued again in the next test.
Easy	<ol style="list-style-type: none"> 1. Items discarded or dropped and is not issued again on next tests of learning outcomes 2. Are reviewed, tracked and traced so that we can investigate the reason of why the test takers could not answer the question, whether the sentence is not clear, the instructions is difficult to understand, or whether the matter is there are terms that are not clear, and so on. After repairs, the question items can be issued again in the next test. 3. Items that are basically easy can be reused in the tests especially for a loose selection test.

2.5. Discriminating Power

One objective of quantitative analysis is to determine whether a question item can distinguish the different aspect exist between groups. Indices used in distinguishing between the ability of candidates is item discrimination. This index can distinguish between a highly capable candidates from low capable candidates.

The index value ranges from -1 to +1. The negative sign indicates that the low ability test-takers who can answer correctly while the positive sign showed high-ability test takers who answer incorrectly. Thus the matter of distinguishing negative power index shows reversal of quality test takers. Item discrimination indices are generally given the symbol with the letter D (an abbreviation of the discriminatory power).

Index Discriminatory item (D)	classification	Interpretation
$< 0,20$	<i>Poor</i>	The question items has low discriminatory power, considered do not have discriminatory power
$0,20 - 0,40$	<i>Satisfactory</i>	The question items has medium discriminatory power
$0,40 - 0,70$	<i>Good</i>	The question items has good discriminatory power
$0,70 - 1,00$	<i>Excellent</i>	The question items has very good discriminatory power
Negaive sign(-)	-	The question items has very low discriminatory power

2.6. Distracter Function.

The multiple choice objective tests in tests learning outcomes test takers are provided with several possible answers sometimes referred to as options or alternatives. Options or alternatives t ranged from 3 to 5 pieces, and one of them is the correct answers (answer key) while the rest is the wrong answer. The wrong answers one commonly known as the distracters.

Analyzing the function of distracters often known by other terms, namely: analyzing patterns of distribution of answers. This spread pattern is a pattern that can describe how the testee determine the answer between choices available. A possibility exists when the testee not choose any choices or blank answer. Blank statement is often known as omit and given the symbol with the letter O.

Distracters is said to be good if the distracters are choose at least by 5% of the test takers.

The distraction that perform its function properly can be reused on the next tests, while the others should be repaired or replaced with another distracters.

III. Research Method and Object of the Research

3.1. RESEARCH METHOD

This study intended to determine whether the test questions used to screen prospective students at the Widyatama University is a good tool. We can define test tools as a good tools when the question set have a high validity, high reliability, have discriminating power, have the level of difficulty in accordance with the purpose of tests and the distracters items function effectively.

3.1.1. Validity

Validity is a measure that indicates whether a measure tool actually measure something to be measured, or in other words, a measure tool said to be valid if the measure is measuring something that is to be measured. If the gauge used to measure has high validity it means the data obtained from the measurements have a high validity. There are several types of validity, the validity of which is the content (content validity) and construct validity (construct validity) (Bollen, 1989).

3.1.2. RELIABILITY

Reliability is an index (coefficient) which indicates the extent to which a measuring instrument is reliable or unreliable (Singarimbun, 1995:140). That is, if the gauge is used twice to measure the same symptoms and results of measurements obtained relatively consistent, the gauge is reliable. Understanding that research must be reliable measuring instrument actually means that the instrument good enough to be able to uncover reliable data.

Empirically, high and low reliability shown by a number called the coefficient of reliability. Although theoretically the usual reliability coefficient ranged from 0.00 to 1.00, but in fact the coefficient of 1.00 was never achieved in the measurement. In addition, although the correlation coefficient is positive (+) or negative (-), but in terms of reliability negative coefficient has no meaning, because it always refers to the interpretation of reliability coefficients are positive.

3.1.3. Difficulty level

Question set is said to be good if the question is not too easy or too difficult. Questions that is too easy does not stimulate students to enhance efforts to solve it. Conversely, question that is too difficult can

cause students to become desperate and do not have the spirit to try again beyond his reach. Value that indicates difficulty level is called difficulty index. The index ranges from 0.00 to 1.00. Question with difficulty index of 0.00 indicates too difficult meanwhile difficulty index 1.00 means the question is too easy.

$$P = \frac{B}{J_s}$$

The formula to calculate difficulty index is :

Where:

P = difficulty index

B = number of test takers who answered that question correctly

J_s = total number of test takers

In this study, difficulty index is classified following (Arikunto, 1997):

question with P = 0.00 to 0.30 is difficult

Problem with P = 0.30 to 0.70 is medium about being

Problem with P = 0.70 to 1.00 is easy

Questions that are too easy or too difficult does not mean unusable. It will depend on the purpose of the test and the circumstances of the test participants. If we want to have many participants who passed the test, we will used easy question, whereas if we want only selected people to pass then we will use a difficult type question.

Selecting an difficulty level of question item should also consider the answers to guess (guessing). For items with five alternative choices, the guess is 1.00: 5 = 0.20. Therefore, this item should have a level of difficulty of about 0.25 + (1.00-0.20) / 2 = 0.65. Items with difficulty levels between 0.50 -0.90 is a good item. Items that have difficulty approaching the level of 1.00 or below the level of guessing (under 0.20) need to be rewritten or discarded. If possible we should put easier question in front of question and followed by more difficult questions.

3.1.4. DISCRIMINATING POWER

Discriminating power is the ability of question to distinguish between test takers that have low ability and high ability. The index is called discriminating power (D) whose value is between -1.00 to +1.00.

To calculate the discrimination index, we sort the score of the test takers from the highest to the lowest. We divide the value into two groups. First group is the group that received high test scores (JA), while the bottom group (JB) is the group that received low test scores. The formula used to calculate D following Arikunto, 1997:

$$D = \frac{B_A}{J_A} - \frac{B_B}{J_B} = P_A - P_B$$

Where:

J = Numbers of test takers

J_A = Number of test takers with high score

J_B = Number of test takers with low score

B_A = Number of test takers with high score that answer the question correctly

B_B = Number of test takers with high score that answer the question not correctly

Arikunto classified discriminating power as followed :

$D = 0,00-0,20$: poor

$D = 0,20-0,40$: medium

$D = 0,40-0,70$: good

$D = 0,70-1,00$:very good

D = negative : not good. All question item that has negative value should be dropped or discarded.

The investigation will use the software Anatest Version 4 to test the validity, reliability, discriminating power, and difficulty level.

3.2. Object of the Research

4.1.1. VALIDITY & RELIABILITY

	Mathematic	English	Indonesia	Economics	Computer	Culture & technology
Total Number of question	30	25	25	25	25	20
Number of item valid	28	24	18	25	22	20
Number of item not valid	2	1	7	0	3	0
Number of item reliable	30	25	25	25	25	20

4.1.2. Difficulty level

	Mathematic	English	Indonesia	Economics	Computer	Culture & technology
Number of questions	30	25	25	25	25	20
Items difficult ; $P(0,0-0,30)$	19	10	9	15	11	5
Items medium ; $P(0,30-0,70)$	9	13	12	9	9	6
Items easy ; $P(0,70-1,0)$	2	2	4	1	5	9

4.1.3. DISCRIMINATING POWER

	Mathematic	English	Indonesia	Economics	Computer	Culture & technology
Total number of questions	30	25	25	25	25	20
Items poor ; $D(0,0-0,20)$	15	4	16	13	12	12
Items medium ; $D(0,20-0,40)$	11	3	6	10	11	7
Items Good ; $D(0,40-0,70)$	0	1	1	0	2	1
Items very good ; $D(0,70-1,0)$	0	0	0	0	0	0
Items not good ; (D negative)	4	17	2	2	0	0

4.1.4. Distracters Analysis

	Mathematic	English	Indonesia	Economics	Computer	Culture & technology
Total number of question	30	25	25	25	25	20
Answer key chosed >80%	0	1	1	1	1	1

The investigation will compare the analysis of the test tool of two waves of the entrance test which is wave 3 of 2009 /2010 academic year and wave 1 of 2010/2011 academic year and.

The investigation will analyze the validity, reliability, discriminating power, difficulty level and function of distracters of multiple choice items on the entrance test Widyatama University wave 3 2009/2010 academic year compare to wave 1 2010/2011 academic year.

IV. Result and Discussion

4.1. Result for Entrance Test wave 1 2010/2011

There are 167 respondent test takers in entrance test wave 1 2010/2011. The total number of questions are 150 consist of 30 questions for mathematics, 25 questions for English, 25 questions for Indonesian, 25 questions for Economics, 25 questions for Computer and 20 questions for culture & technology.

Distracter chosed <5%	120	100	95	99	95	78
Distracter not chosed	0	0	3	0	4	2
Answer key chosed < other distracter	38	80	76	79	79	72

4.2. Result for Entrance Test wave 3 2009/2010

There are 109 respondent test takers in entrance test wave 3 2009/2010. The total number of questions are 150 questions consist of 30 questions for

mathematics, 25 questions for English, 25 questions for Indonesian, 25 questions for Economics, 25 questions for Computer and 20 questions for culture & technology.

4.2.1. UJI VALIDITY & RELIABILITY

	Math	English	Indonesia	Economics	Computer	Culture & technology
Total Number of question	30	25	25	25	25	20
Number of item valid	18	16	16	14	17	15
Number of item not valid	12	9	9	11	8	5
Number of item reliable	30	25	25	25	25	20

4.1.5. Difficulty level

	Math	English	Indonesia	Economics	Computer	Culture & technology
Number of questions	30	25	25	25	25	20
Items difficult ; P(0,0-0,30)	17	16	9	9	9	7
Items medium ; P(0,30-0,70)	13	9	15	15	10	5
Items easy ; P(0,70-1,0)	0	0	1	1	6	8

4.1.6. DISCRIMINATING POWER

	Math	English	Indonesia	EconS	Computer	Culture & tech
Total number of questions	30	25	25	25	25	20
Items poor ; D(0.0-0.20)	5	4	5	7	9	4
Items medium ; D(0.2-0.4)	15	16	11	13	12	13
Items Good ; D(0.4-0.7)	5	4	5	1	3	2
Items very good ; D(0.7-1.0)	0	0	0	0	0	0
Items not good ; (D negative)	5	1	4	4	1	1

4.1.7. Distracters Analysis

	Math	English	Indonesia	EconS	Computer	Culture & technology
Total number of question	30	25	25	25	25	20
Answer key chosed >80%	0	1	1	1	1	1
Distracter chosed <5%	83	94	96	89	92	82
Distracter not chosed	0	2	2	2	3	2
Answer key chosed < other distracter	40	32	36	47	68	18

4.2. Analysis

Based on the comparation of question test item analysis between two period of entrance test at

4.2. Analysis

Based on the comparison of question test item analysis between two period of entrance test at widyatama university it can be observed that most of the question item is performed well although they have high difficulty level, this can be observed from the validity, reliability . The distracter analysis between those two period not performed well since most of them have value more than 80% choseed <5%. In terms of discriminating power the question item should also be evaluate since the findings showed that some of the in medium level. question item also performed well.

V. Conclusion

The Question test item at widyatama university entrance test showed a good test on overall but its should be evaluate regarding the purpose of the test which is to do the selection process and not to evaluate any learning process.

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The Application of Innovative Progressive Learning Model on Entrepreneurship Course Delivered in University of Ciputra

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Abstract – Learning process is defined as a process of obtaining new information and knowledge. As an educator, one should be able to determine the right teaching strategy hence students' can achieve their learning objective effectively and efficiently. One model of learning is called Innovative Progressive Model or Practice Learning. Practice Learning is an innovation of learning designed to help student understand the theory or concept of knowledge through empirical practice of the learning experience.

The objectives of the research are: (1) to explain how to implement the Innovative Progressive Model on Entrepreneurship course. (2) To know how the effectively Innovative Progressive learning model base on student perception

The approach of the paper is qualitative research, which is based on descriptive method. The unit analysis is the individual. Data was collected through observation, interview and questioner.. This study is conducted in University of Ciputra that aims to create world class entrepreneurs and thus is focusing on Entrepreneurship course since this course supports the university's goal and gives a chance for students from various disciplines to learn and work together. As the samples of this study are 25 students from batch 2008; taking the Entrepreneurship 5 course with Export Import subject.

The result shows that the application of Innovative Progressive Learning Model supports the achievement of class objective though the students are coming from different backgrounds. Hence it can be concluded that the application of Innovative Progressive Learning Model can help students from different disciplines equally absorb the entrepreneurial knowledge as well as being motivated to achieve their learning objective.

Keywords: *Innovative Progressive Learning Model, student centered learning, Entrepreneurship education, entrepreneurship educators*

I. INTRODUCTION

Education is one of the forms of dynamic and progressive embodiment of human culture, therefore, any change or development in this field must be in line with life culture change. One type of education that has the ability to support future development is an education that can develop

students' potential and enable them to face and solve life problems. This concept becomes increasingly essential as they enter working and community world, since they must be able to implement what they learn at school in facing their current or future daily problems.

Learning is usually defined as a change in an individual caused by experience. Changes caused by development (such as growing taller) are not instances of learning. Neither are characteristics of individuals that are present at birth (such as reflexes and responses to hunger or pain). However, humans do so much learning from the day of their birth (and some say earlier) that learning and development are inseparably linked.

Learning is basically a process marked by a change in a person. This change comes as a result of the learning process and can be seen from various aspects such as knowledge, comprehension, attitude and behavior, proficiency, skill and ability, and also other aspects of a change as George J. Mouly has expressed in his *Psychology for Effective Teaching* book. Hence, the core of learning should be behavior change because there's a real-life experience from the individual's interaction with his society.

In the meantime, the Commission on Education for the 21st century recommended four strategies on how to make education successful namely: 1) Learning to learn, 2) Learning to be, 3) Learning to do, and 4) Learning to be together. In reference to the concept, it can be concluded that in an ever-changing society condition, it is ideal for education not to focus only on the past and present, but it should also represent a process that discusses and anticipates the future. According to Buchori in Khabibah (2006), a good education doesn't only prepare students for certain occupation or title but also to equip them in dealing with daily issues.

Entrepreneurship education has become an interesting issue due to the general assumption that an entrepreneur is born and not made. It can be concluded that entrepreneurship education has started to gain a place in high education, as stated in the findings of the Global Entrepreneurship Monitor (GEM Report, 2007). The GEM research that has been conducted for over 6 years in over 40 countries shows that practice and entrepreneurship

education are significant factors that influence the number of entrepreneurs in a country.

According to Arends (1997), it is strange that we expect students to learn yet seldom teach them about learning, we expect student to solve the problems yet seldom teach them about problem solving. Bruner in Dahar also stated that working on one's own to find solution and the accompanying knowledge results in meaningful knowledge gain. It is a logical consequence, because independent problem solving will result in concrete experience that will be useful to solve similar problems since the experience will give students special meaning. This comes in line with the opinions of Shepherd and Douglas (1997) that entrepreneurship education can be taught through four types of approach, which includes: 1) The old success story, 2) The case of Study Approach, 3) The Planning Approach, and 4) The Generic Action Approach.

The Generic Action Approach stresses on learning by doing process. With this approach, students will not only discuss about practical implications of the solution, but also the consequences that arise from applying the concepts and theories used. Thus, the act of learning will not only emphasize on the knowledge gained from running an activity, but also possesses a strong knowledge base before running the activity.

One of the changes in that learning paradigm is how the learning orientation has shifted from teacher-oriented to student-oriented, the methodology from expository-dominated to participatory-dominated, and approach that changes from textual to contextual. These changes are meant to improve the quality of education, both from the process and outcome points of view.

An interesting innovation that comes with the paradigm change is the discovery and implementation of Innovative-Progressive learning method which is also known as learning practice. This innovation is designed to help students understand theories or knowledge concepts through empirical practical learning experience. The final outcome of this learning model is a comprehensive assessment, both in process and products of all learning aspects.

Arends (1997,7) stated that the term 'teaching model' refers to a particular approach to instruction that includes its goals, syntax, environment, and management system. According to Trianto (2009), several implications of the Innovative-Progressive learning model implementation in a learning process include learning components such as teacher existence and students, the need for material and learning facilities, and also evaluation mechanism. This comes in line with the opinion of Subiyanto (1988:30) that a good teaching method is the key and requirement for students to be able to learn well. One of the indicators of a successful learning process is when students understand what they have learned, and therefore, able to meet the expected outcome.

The objectives of the research are: (1) to explain how to implement the Innovative-Progressive model on Entrepreneurship course. (2) To know how the effectiveness of Innovative-Progressive learning model in students' perception

II. METHODOLOGY

This research was conducted to investigate the success rate of the teaching and learning method used in the entrepreneurship subject in the fifth and sixth semester. It is conducted at the University of Ciputra in Surabaya, Indonesia. The method used is qualitative and descriptive research. The data are obtained from the organization documents.

The Entrepreneurship subjects were designed and organized in the university level while the curriculum was developed and planned as an integrated curriculum in six semesters. There are 5 study programs in the university where each has developed its own curriculum. The Entrepreneurship subject curriculum has been developed and integrated in each study program's curriculum. As samples of this study are 25 students from batch 2008; taking the Entrepreneurship 5 course with Export Import subject.

III. RESEARCH FINDING

The respondents of this research are 25 students from 5 different programs as described in the table below:

Table 1
RESEARCH SAMPLE

Faculty	Program	Sample
Management	International Business Management	10
	Tourism Hotel Management	1
Technology	Information Technology	4
	Visual Communication Design	6
	Interior Design	4
Total		25

The effectiveness of the Innovative-Progressive learning model can be seen from 5 indicators, which are: 1) Teacher existence, 2) Students' knowledge, 3) Analysis on the need for teaching materials, 4) Supporting facilities and infrastructure, and 5) Learning evaluation.

Students' perception on the Innovative-Progressive learning model applied in Entrepreneurship 5 class with Export-Import as subjects can be seen from the table below:

Table 2
STUDENT'S PERCEPTION

Indicator	Agree	%	Strongly Agree	%	Total	%
Teacher Existence	15	60	10	40	25	100
Students Knowledge	19	76	6	24	25	100
Analysis on the Need for Teaching Materials	17	68	8	32	25	100
Supporting Facilities and Infrastructure	22	88	3	12	25	100
Learning Evaluation	20	80	5	20	25	100

This subject is supervised by at least two lecturers; one from an academic background and the other a practitioner. This was an ideal combination, because the academic lecturer will be responsible to explain material with the right pedagogic and students can learn about things related to field practice from the expert since lecturers who have entrepreneurial experience will find it easier to accompany students in their learning process. Likewise, Pinchot (1985) said that a new idea that fails in its implementation can result in psychological blow; therefore, lecturers with entrepreneurial experience can be mentors and facilitators since they will be able to discuss not only theories, but also students' problems. Hence, the Teacher Existence indicator shows that 60% of respondents agree and 40% strongly agree on the suggested lecturer combination.

Another thing that requires our attention in the Innovative-Progressive learning method is Students' Knowledge as it provides an opportunity for academic creativity development due to the emphasis on analytical ability development on a concept that combines explorative ability and creativity for students to develop their potentials.

Teaching material plays an important role in the Innovative-Progressive learning as it is important to have learning resources that suit the intended competence while discussing a learning topic. A lecturer's success depends much on his insight, knowledge, comprehension, and creativity level in administering the materials. The material developed in the Entrepreneurship 5 class with Export-Imports subjects involves theory practice and practical knowledge of export-import. Students are trained to see the needs of export market and find suppliers that could fulfil the needs. In order to meet the demands of export market, students must apply the theoretical concept learned according to the field condition. For instance, an exported product must be certified to ensure its quality. Students are also expected to perform innovation towards their products

in order for the products to have added value and competitiveness in global market.

It is essential to have good facilities and infrastructure in the Innovative-Progressive learning process for students to understand the theoretical concept better. This subject is designed to conduct export transactions, therefore, facilities will be needed to prepare students to join international exhibitions that are held both in Indonesia and overseas as exhibitors. Picture 2 shows an example of product display while being exhibitor in an international exhibition. In addition to that, online media such as *Alibaba* and *E-bay* are needed for students to introduce their products.

Assessment involves a series of activity to obtain, analyze, and interpret the data on students' learning process and outcome which is done systematically and continuously in order for it to become a useful information in decision making. Assessment is not only intended to determine whether or not the achievement of specified learning goals is achieved, but also to know whether the learning objectives are important for students and how they can achieve them (Rokhman, 2005,209)

The assessment conducted will look at the process undergone by the students. As an example, a group of students planned to export Indonesian handicrafts. They started by applying their creativity on the handicraft box (as shown in Picture 1). After that, they modified the box (as seen in Picture 2). In their revised version, students applied their innovation and creativity by adding stories about the handicraft theme inside the box.

Therefore, assessment will be done to evaluate the process from both students' creativity and innovation, and not only their success in performing export transaction even though the objective of this subject concerns exporting.



Picture 1 Handicraft Box (First Edition)



IV. CONCLUSION

Innovative-Progressive learning method can be implemented in Entrepreneurship 5 subject, because the subject requires field practice to help students understand related concept and theories. Since Entrepreneurship subject is considered as art, field practice will help improve students' skills.

Students' opinion is that innovative-progressive learning method is really useful as well as easy to follow with the provided study plan.

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Picture 2. Handicraft Box (Revised Edition)



Picture 3 Exhibition Display

Students' Perceptions and Participations towards Social Contribution Activities

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Abstract— Social responsibility is becoming a popular topic since 1970s. Large business organizations adopted the principle after they learn numerous examples of positive consequences created by showing responsibility to the society. As the practice was adopted by business organizations, students in higher education exhibited their responsibility towards the society in the form of extracurricular voluntary clubs and associations managed by students in universities such as Rotaract club, Voluntary club and other similar organizations. However, contrary to the trend in the business arena in the present time, students' voluntary activities seem to be diminished as they have more interests in other entertaining activities such as shopping, sports, chat, the internet, or other teenagers' activities. This research project aims at examining the students' opinions and degree of participation in social contribution activities. Samples were drawn from students in a private university in Bangkok.

Keywords— Students, Social Contribution, Extracurricular, Social Responsibility, Thailand

I. INTRODUCTION

Social responsibility was a popular topic during the 1970s and 1980s [1]. Students began to participate and involved with communities. Students who had similar interests joined and formed up students' clubs and associations. 1970s and 1980s were the decades when democracy bloomed in Thailand. Students actively participated in the political and social activities. Many student clubs popped up during these times.

II. BACKGROUND

Students at Assumption University had various society-related clubs. However, during the 1990s, the interests in political and social activities declined. With the trend in globalization, students turned to focus more on self interests such as surfing the internet [2] or sports. As of 2011, Assumption University of Thailand had more than 40 student clubs ranging from general interest clubs such as Drama, Music, Dogs Lover; sport-related; social-related; spiritual; and job-related clubs [3].

Apart from these voluntary clubs, Assumption University has devised a course named "Business Ethics Seminar" since 1996 under the president's vision with the aims to improve students' personal integrity and professional ethics [4].

Students have to take this course as a mandatory course in every semester. The course is planned as a service learning class [5] which composed of lectures in which guests speakers from business organizations are invited to speak on various issues relating to ethical conducts of businesses. Another part of the course is social service. Students are divided into groups and interview people in the community to assess their needs for assistance. These needs would be analyzed and students would come up with projects to use their knowledge to assist them. For example, there was a student project that helped a food stall next to the university to set up the finance, accounting, marketing and management functions for the food stall. A group co-operate with students in the Architecture Faculty to run a "green surrounding" campaign. Students from Architecture Faculty study the area around the university and made a master plan for landscaping the area. Students from the Ethics Seminar course help as staff. Major projects of the course are planned by the faculty. The faculty would create connections with business organizations and local communities and seek to bring students to join their social responsibility activities. For example, the faculty approached a village leader and offered help to teach English for students in the village. Another project was with Siam Cement Group (SCG), a large conglomerate in Thailand who manufactures all sorts of construction materials. SCG has established SCG foundation to conduct many projects such as child development, special talents promotion, creating social awareness, and sustainable community development [6]. The president monitored the progress of these courses regularly and would suggest the faculty to emphasize some activities and postpone some activities depending on the trend in the society. In addition to the funds from the university, the government also provides some funds and business organizations as well as local communities and groups also subsidized parts of expenditure. Students also contributed some funds to the projects they joined.

This research project surveyed Assumption University's students' perceptions and involvement in social responsibility activities. Specifically, the objective of this study was to examine the perceptions of students regarding social responsibility. These perceptions were categorized based on students' general demographic data. Besides, comments were also elicited from students through open-ended questions.

III. LITERATURE

It was suggested that involvement in voluntary activities provided powerful learning opportunities for students [7]. Extracurricular activities help to liberate people. Exposure to lives of others enables students to learn different aspects and ways of thinking. The Commission on Higher Education, Ministry of Education initiated a Framework of the 15-Year Long Range Plan of Higher Education of Thailand and implemented during 1990-2004. The national-wide education reform occurred after the end of the first Framework. After that, the Second 15-Year Long Range Plan on Higher Education of Thailand was drawn for 2008-2022. This Framework aims to create quality graduates who are capable of lifelong work and adjustment [8]. The Thai Qualifications Framework for Higher Education specified social responsibility as one of the 5 major expected learning outcomes [9]. In this regards, the Thai government urged students to participate in social activities so as to develop their self-awareness and worldview. Funds were granted to support students' activities. Various researchers suggested organizations to create good relationships with the community [10] because they had to operate in such community. Without good relationships with the community, universities could not operate successfully. Organizations or universities operate as an "open systems" which have interactions and interdependences with other groups in the environment [11].

Corporate Social Responsibility refers to the obligation of organizations to promote human welfare in their operations [12]. The extracurricular activities are tools that can help universities to attain such purpose. Moreover, organizations should to go beyond the economic or legal obligations and be responsible to the society voluntarily [13]. Universities should support students to help the society voluntarily. The participation in extracurricular activities has two folds advantages, the first is to help the society and the second is to develop the students' mindsets. Students are exposed to other side of lives and hence would see the world more practically.

IV. METHODOLOGY

This research is a survey of students' perceptions and participations towards social contribution activities. The population of this study was students in Assumption University. Samples included 409 students in all years of study. An interview was performed with personnel responsible for students' social responsibility activities in order to draft a questionnaire. This questionnaire was commented by the vice president of student affairs. The final version of questionnaire was distributed to students in all years of study. Quota sampling was utilized. Questionnaires were distributed to students in each year of study, i.e., approximately 100 freshmen, 100 sophomores, 100 juniors, and 100 seniors. The researcher randomly went to classes that offered courses for each year's students. The instructors of

each class were asked to allow approximately 30 minutes of the class for the researcher to collect information. Data collected were analyzed via descriptive statistics. T-test and ANOVA statistical procedures were used in order to compare the perceptions among the population.

V. RESULTS

The population consisted of 160 males (39.1%) and 249 females (60.9%). In spite of the plan to collect data from 100 respondents in each year of the study, it turned out that students in the classes surveyed were from various years. Hence, the numbers of freshmen was only 28 (6.8%), sophomore was 143 (35%), junior was 93 (22.7%), and senior was 133 (32.5%), 3 students were in their fifth year of study and 9 did not report their years of study. 328 students were from Business Administration Faculty, 67 were from the Faculty of Arts, 7 were from Communication Arts, and 4 were from other faculties. Most students resided in Bangkok (65.3%), 50 students resided in the suburb (12.2%), and 19.1% resided in the provinces. The samples descriptive statistics are presented in table I.

TABLE I
DESCRIPTIVE STATISTICS OF SAMPLES

		Frequency	Percent
Gender	male	160	39.1
	female	249	60.9
Total		409	100.0

Year	first	28	6.8
	second	143	35.0
	third	93	22.7
	fourth	133	32.5
	higher	3	.7
	Total	400	97.8

Faculty	bba	328	80.2
	art	67	16.4
	comm art	7	1.7
	law	3	.7
	aero engineering	1	.2
	Total	406	99.3

		Frequency	Percent
Home town	Bangkok	267	65.3
	Province	78	19.1
	Suburb	50	12.2
	Total	395	96.6

The activities that students reported they joined were student clubs activity, Ethic seminar course activities, university events, Freshy night and first orientation, sport activities, conferences, and job-related activities. Frequencies of joining activities are shown in table II.

TABLE II
FREQUENCY OF ACTIVITIES STUDENTS JOINED

Activities	Frequency
Student clubs activities	159
Ethics seminar course activities	118
University events	98
Freshy night and first orientation	74
Sport activities	47
Conference	28
Job related activities	6

Most students reported that they joined general voluntary activities at the least level (167 students, 40.8%). Only 22 out of 404 students reported they joined general voluntary activities very often (5.4%). Numbers of students who participated in general activities voluntarily are presented in table III.

TABLE III
NUMBERS OF STUDENTS PARTICIPATED IN GENERAL ACTIVITIES VOLUNTARILY

	Frequency	Percent
least	167	40.8
little	158	38.6
often	57	13.9
very often	22	5.4
Total	404	98.8

Most students thought social responsibility activities are interesting (147 student, 35.9%). 144 (35.22%) reported that social responsibility activities were somehow interesting. 82 reported that social responsibilities activities were neutral (20%). 35 reported that social responsibilities activities were not interesting (8.6%). Numbers of students interested in social responsibility activities are presented in table IV.

TABLE IV
STUDENTS INTERESTED IN SOCIAL RESPONSIBILITY ACTIVITIES

	Frequency	Percent
agree	147	35.9
somehow agree	144	35.2
neutral	82	20.0
somehow disagree	31	7.6
disagree	4	1.0
Total	408	99.8

Most students reported they perceived that social responsibilities activities were important. 161 (39.4%) agreed that they were important. 154 (37.7%) reported they somehow agreed. 58 (14.2%) reported they were neutral. 35 (8.6%) reported they disagree about the importance of social responsibility activities. Data regarding the perceived importance of social responsibility activities are presented in table V.

TABLE V
PERCEIVED IMPORTANCE OF SOCIAL RESPONSIBILITY ACTIVITIES

	Frequency	Percent
agree	161	39.4
somehow agree	154	37.7
neutral	58	14.2
somehow disagree	26	6.4
disagree	9	2.2
Total	408	99.8

Most students reported they agreed that they should joy activities (99 students, 24.2%), 151 reported they somehow agree (36.9%). 128 (31.3%) students reported they were neutral. 29 (7.0%) reported they did not think they should joy social responsibility activities. Students' perceptions regarding whether they thought they should joy social responsibility activities are presented in table VI.

TABLE VI
NUMBERS OF STUDENTS WHO PERCEIVED THEY SHOULD AND SHOULD NOT JOY SOCIAL RESPONSIBILITY ACTIVITIES

	Frequency	Percent
agree	99	24.2
somehow agree	151	36.9
neutral	128	31.3
somehow disagree	28	6.8
disagree	1	.2
Total	407	99.5

Most students reported they perceived that social responsibility activities were meaningful (160 students, 39.1%). 130 students reported they somehow agreed that social responsibility activities were meaningful (31.8%). 84 reported they were neutral (20.5%). 32 reported they disagreed that social responsibility activities were meaningful (7.8%). Data regarding the perceived meaningfulness are presented in table VII.

TABLE VII
PERCEIVED MEANINGFULNESS OF SOCIAL RESPONSIBILITY ACTIVITIES

	Frequency	Percent
agree	160	39.1
somehow agree	130	31.8
neutral	84	20.5
somehow disagree	22	5.4
disagree	10	2.4
Total	406	99.3

Most students reported they perceived that participating in social responsibility activities was one way to use their times properly (151 students, 36.9%). 126 students reported they somehow agreed (30.8%). 87 reported they were neutral (21.3%). 43 reported they disagreed (10.5%). Data regarding the perceived appropriateness of the use of time are presented in table VIII.

TABLE VIII
PERCEPTIONS ABOUT THE PROPERLY USED OF TIMES

	Frequency	Percent
agree	151	36.9
somehow agree	126	30.8
neutral	87	21.3
somehow disagree	34	8.3
disagree	9	2.2
Total	407	99.5

The means of perceptions regarding social responsibility activities together with reported participation of general activities and social-related activities are presented in table IX

TABLE IX
MEANS OF PERCEPTIONS TOWARDS SOCIAL RESPONSIBILITY ACTIVITIES AND PARTICIPATIONS

	N	Min	Max	Mean	Std. Dev
interesting	408	1	5	2.02	.977
important	408	1	5	1.94	.995
enjoyable	408	1	5	2.32	.952
should joy	407	1	5	2.22	.900
meaningful	406	1	5	2.00	1.021
use time properly	407	1	5	2.08	1.056
participate in general activity	404	1	4	1.84	.865
participate in social activity	405	1	4	1.84	.748

Only a small number of students reported they participated in social activities (335 students, 81.9%). 62 students reported they participated in social activities often (15.2%). Only 8 students reported they participated very often (2.0%). Data regarding the students' voluntary participation in social responsibility activities are presented in table X.

TABLE X
NUMBERS OF STUDENTS PARTICIPATED IN SOCIAL RESPONSIBILITY ACTIVITIES

	Frequency	Percent
least	142	34.7
little	193	47.2
often	62	15.2
very often	8	2.0
Total	405	99.0

Students reported they should spend their free times for general activities 31.61% of their times, job-related activities 25.72%, study-related activities 22.72%, and social responsibility activities 19.10%

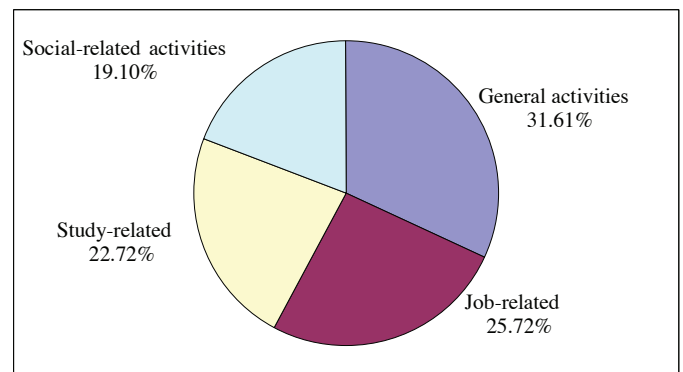


Fig. 1 Proportion of times that students think they should spend apart from studying

One open-ended question elicited reasons for students to join social responsibility activities. Only a handful of students provided answers to this question. Results were summarized in table XI.

TABLE XI
REASONS FOR JOINING SOCIAL RESPONSIBILITY ACTIVITIES

	Frequency	Percent
help society	49	11.9
make friends	22	5.3
use time properly	15	3.6
self development	13	3.2
gain experience	3	.7
doing good deeds	1	.2
no answer	307	75.1
Total	409	100.0

Another open-ended question asked for reasons students did not want to join social responsibility activities. Results were summarized in table XII.

TABLE XII
REASONS FOR NOT JOINING SOCIAL RESPONSIBILITY ACTIVITIES

	Frequency	Percent
no time	130	31.77
no information	60	14.65
no interesting activities	22	5.52
don't want to travel	13	3.17
no colleagues to join	6	1.47
see no meaning	4	0.97
no answer	307	75.1
no support from university	2	0.48
Total	409	100.0

There were no significant differences between male and female regarding their reported participations in general activities. Differences also were not significant between male and female's perceptions about their participations in social contribution activities. However, male reported they joined more general activities than female (means of 1.86 vs. 1.82). Female reported they joined social activities more than male (means of 1.89 vs. 1.77). The mean comparisons as well as Chi-square tests for the differences are presented in table XIII.

TABLE XIII
MALE'S AND FEMALE'S PARTICIPATED IN GENERAL AND SOCIAL ACTIVITIES

Means Comparison

	gender	N	Mean	Std. Dev.
participate in general activity	male	159	1.86	.903
	female	245	1.82	.840
participate in social activity	male	158	1.77	.724
	female	247	1.89	.760

Chi-Square Tests

gender		Value	df	Asymp. Sig. (2-sided)
male	Pearson Chi-Square	132.156	9	.000
female	Pearson Chi-Square	138.085	9	.000

The ANOVA test revealed the differences in all dimensions between male and female regarding the perceptions towards social responsibility activities. ANOVA results are presented in table XIV.

TABLE XIV
ANOVA TEST OF PERCEPTIONS REGARDING SOCIAL RESPONSIBILITY ACTIVITIES BETWEEN MALE AND FEMALE

	df	F	Sig.
interesting	1	23.564	.000
important	1	8.530	.004
enjoyable	1	16.468	.000
should joy	1	15.127	.000
meaningful	1	4.760	.030
use time properly	1	9.615	.002

Students in different years of study and faculties reported no differences in their perceptions towards social responsibility activities (all p 's > .05). There was a difference regarding the perceptions whether social activities were enjoyable. Students residing in the suburb reported higher perceptions than students from the province (mean difference = .443, p < .05).

VI. DISCUSSION AND CONCLUSIONS

Students at Assumption University (AU) in all genders, years of study, and faculty had similar opinions, i.e. they mentioned they had interests in social activities and that social activities were important, enjoyable, meaningful, worth their time, and they should join. However, they reported they seldom participated in the universities' social activities except when forced. Students chose to participate in activities they had interests in so they joined students clubs that could satisfy their interests.

Some students reported they would like to participate but there were some limitations such as they had limited time. Students at AU had to study very hard. There are many projects and assignments in each course. Their schedules are rather tight so they could not find spare time to participate in social activities. Another important reason was that students had insufficient information regarding neither the activity availability nor their significance nor the way to join.

Students nowadays do not like to be forced to do things. They are more independent than before. If they did not agree with these, forcing them to join activities might yield little results. In addition, it might create detrimental effects. A better way might be to handle their perceptions and attitudes rather regarding social responsibility. After all, this is the ultimate objective of performing social responsibility activities. Students who joined only because they were forced to would be very likely to drop it when they were not forced. Some might become defensive and reject the social responsibility activities. Attempts should be made to plan carefully in order to shape students' perceptions and attitudes. In this aspect, sufficient information regarding the significance and benefits of social responsibility activities

might help. Campaigns throughout the campus might be more effective than lecturing in classrooms.

Furthermore, students reported they did not want to travel either to join activity in the provinces or back and forth between their homes and the university. The Suvarnabhumi campus, where most bachelor level students study in, is rather remote than it takes quite a while to travel especially during the night time. Hence, many students who do not stay at the dorm might be discouraged to stay after classes in order to join activities. They prefer short activities during the daytime. Unfortunately, most social activities involve going out and spend time with the community. Moreover, the university has little facility after working hours.

The university seemed to be successful in implementing continuous social responsibility projects with external organizations and participations from students. However, it should consider the real development of the students' individual responsibility towards the society.

A more thorough study regarding the approaches to motivate students to participate more in social contribution activities might be beneficial to the university to fulfill the visions to produce graduates as: "healthy and open-minded persons, characterized by personal integrity,..., exercise responsible leadership".

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Corporate Social Responsibility (CSR) in Higher Educational Institute: Senior Management Perspectives A Case Study of Chiang Mai University

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Abstract—

CSR is an important area of research for universities. They play a critical role in developing the next generation of business leaders and managers, who will lead the future economic and social development of Thailand. Focusing on CSR as a core University value may also create a good deal of positive publicity and goodwill for the University. Thus, this study seeks to understand how the concept of CSR is used in the university context, and to determine which dimensions are meaningful to senior management and employees.

Approach—This paper investigates CSR concepts and dimensions attributed to the Chiang Mai University and explore issues related to how important those dimensions are in decision making and communication, according to the perspectives of senior management in the university located in Thailand. The research questions are posed as “what are the dimensions of CSR identified by senior management?”, and to “what extent are the dimensions of CSR given different levels of importance?”

Finding—The results of this study indicated distinct view of corporate socially responsible in the university context as taking an active role in contributing to the well being of society/ behaves in an ecologically friendly way/ and acts in the field of social solidarity, and adoption of human resource practices that demonstrate respect and concern for the well being of employees and their families.

Value—The provision, by policy-makers and senior management, of a variety of definition of CSR in the higher educational institute has enabled the organizations to work within broad boundaries in term of defining their own conceptions of CSR. The impact of perceived public values upon the activities of the institute members was made clear by continuing share their attitudes towards CSR to other members of the organization. According to the results, it is a major challenge in the educational institute to engage with comprehensive school reform through implication for CSR.

Keywords— Corporate Social Responsibility, Chiang Mai University, Senior Management, CSR, Higher Educational Institute

I. INTRODUCTION

CSR is an important area of research for universities because they play a critical role in developing the next generation of business leaders and managers, and citizens who will lead Thailand in the future. In addition, while universities are not profit-driven, they are large employers and organizations in their own right. Many faculty, staff, and administrators depend on Chiang Mai University for their livelihood and it is an institution critical to the economic and social development of Northern Thailand. In the context of the Sufficiency Economic Philosophy, all organizations in Thailand play a special role in ensuring that moral and ethical considerations play an important part in all business endeavours.

Focusing on CSR as a core University value may also create a good deal of positive publicity and goodwill for the University. Chiang Mai University has good reputation of its social responsible practice. This may also provide an opportunity for Chiang Mai University to be known as the best among all universities in Thailand as “The Socially Responsible University”.

II. OBJECTIVES

To investigate CSR concepts and dimensions attributed to the university and explore issues related to how important the dimensions are in decision making and communication, according to the perspectives of senior management in the university located in Thailand.

III. RESEARCH DESIGN

A qualitative approach used to conduct the research to understand CSR perspective of executive staff who influence on CSR policy maker in the university. The research corresponds to Churchill's (1979) "experience survey" whereby a judgment sample of people is used to gather ideas and insight into the phenomenon. As we wished to uncover as wide a perspective as possible, we followed Gordon and Langmaid's (1998) suggestion and undertook 20 focused interviews. Given the nature of the research, the most appropriate approach was to conduct qualitative focused or semi-structured interviews (Sampson, 1976). A topic guide was used to steer the overall interviewing process, whereby at the beginning of the interviews all respondents were asked "How would you define a CSR", What are the dimensions of CSR identified by senior management?, to what extent are the dimensions of CSR given different levels of importance? The in-depth interview were recorded, and then subsequently transcribed.

In-depth interviews were conducted with a 1-2 representative executives in each faculty from 20 faculty members of Chiang Mai University in 3 areas including 1) Social Science 2) Science and Technology and 3) Physical Science by using a structured interview.

IV. RESULTS

The in-depth interviews were conducted with 23 interviewees, 8 females and 15 males, with an average age of 50 years old. The interviewees are in the position of deans, associate deans, assistant deans and head of centre amounting to 6, 11, 4 and 2, respectively. The faculty members in which the interviewees work for include 6 faculty members in Science and Technology group, 6 faculty members in Physical Science group and 8 faculty members in Social Science group.

TABLE I
GENERAL INFORMATION OF RESPONDENTS

Items	Total N =23
1) Sex	
-Male	N=15
-Female	N=8
2) Age	Avg. = 50 years old
3) Position of Interviewees	
-Dean =	N=6
-Vice Dean =	N=11
-Assistance Dean	N=4
-Head Department	N=2
4) Academic Area	
-Social Sciences	N=8
-Sciences and Technology	N=6
-Physical Sciences	N=6

Based on the in-depth interviews, corporate social responsibility (CSR) under the university context from the management perspective is perceived in various forms. Some indicates that, to be responsible for the social, the university should be administered based on the good governance which emphasizes transparency. In addition, the university should take into consideration the interest of its stakeholders including students, employees, students' parents and communities (N=12). Some opinions stated that as the

university is a non-profit organization established with the aim to serve the need of the people in the region, the most important mission of the university must be to produce the graduates with good knowledge and high conducting social awareness. Also, the university must be the place for studying and conducting research to develop new knowledge and then passing on such knowledge to the community. This should be the university mission, to be responsible for the social (N=7). Most of the management agrees that the university activities for social responsibility show how the academic can be linked to the social. In addition, as suggested, such activities should not be sloppily. Instead, it must be done continuously. The first and the most important thing is that the university should make clear "Whom should we responsible for?"

TABLE II
THE DEFINITION OF CSR IN PERSPECTIVES OF THE UNIVERSITY'S EXECUTIVE STAFF

The definition of CSR	N
-The university should be administered based on the good governance concept: transparency and taking into consideration the stakeholders' interest, for example students, parents, staff, society, alumni etc.	12
-The university has been founded as a non-profit organization. Therefore, its core mission should be emphasized the responsibility for the social.	7
-The university should conduct the activities that serve the needs and expectation of stakeholders while creating no violation to them. Besides, the university should produce graduates with good knowledge and high competency.	2
-Unlike business which aims to maximize profit, the university should support the social.	2

It was found that many faculty members have continuously conducted the activities for social responsibility for 5-10 years, since the quality assurance has not yet been initiated. Most activities have been done under four faculty's missions which are 1) providing higher education, 2) conducting research, 3) providing academic services and 4) preserving and nurturing the religious, cultural heritage and environment. For example, under providing higher education mission, the faculty management realizes that providing education is an upstream activity of the supply chain of producing people to serve the social. Therefore, the faculty must focus on educating students. To be good people for the social in the future, the students must have social awareness and ethics, aside from knowledge. These two things can be developed through the content taught in all courses. In addition, they can be created through the projects assigned for the students to run. All projects must be derived from the community's needs or problems so that the results or findings of the projects would be useful to the community. To know such needs and problems, the students are assigned to do the fieldwork. This would show the students the real situations of the community and it would be the opportunity for the students to apply their knowledge gain from the classroom to solve the community's

problems. Besides, the alumni are the key source of information since they could pass on knowledge gain from their experience in working with the community. In some projects, the students may be assigned to work with other students in different fields. This would make the students be prepared for working with different kinds of people in the real work life. Faculty members of Chiang Mai University that conducting teaching in this way tend to be higher in the future.

For the mission regarding conducting research, the faculty's researchers have to participate with people in the community. The new knowledge gained from this kind of research would be appropriate to such community. Then, if practicing it continuously, the problems of the community should be solved efficiently. Such knowledge could also be applied to other communities with the same environment. Some faculties has even established specialty research centre for the community. Most of all, all research projects have to think carefully about the effects resulting from running the project on environment and stakeholders.

Under providing academic services mission, the projects concerning providing academic services should not be done transitorily. Instead, they should be done continuously and should be concrete. It is quite clear that the projects of the faculty members in Physical Science group are so concreted and have been done for at least 10 years. The faculty members have founded the health care center which provides health care services for people in the community, though with some charges. However, many projects of providing health care services are provide free of charge. Under this kind of project, teachers, students and faculty's staffs voluntarily join the projects without any pay. People who get fewer opportunities, such as people in remote areas and penitentiary, would be given the first priority. For faculty members in the other two groups, namely Sciences and Technology and Social Sciences, they also have academic service centers to serve the community in other forms, such as providing consulting service regarding legal, agricultural technology and innovation. Providing academic services are also done in terms of conducting training courses. By doing this, the new knowledge could be transferred to the communities. Most projects have been done regularly.

Regarding the mission of preserving and nurturing the religious, cultural heritage and environment, the faculty members usually join with the communities in doing traditional activities, such as local custom and religious tradition. Also, most faculty members have the "green" policy for energy saving and environmental preserving. However, the activities for social responsibility under this mission has not been emphasized.

Based on the interview, it was found that the quality assurance policy which emphasizes the concept of integration is the key factor that makes all activities under different missions be performed in integrated way.

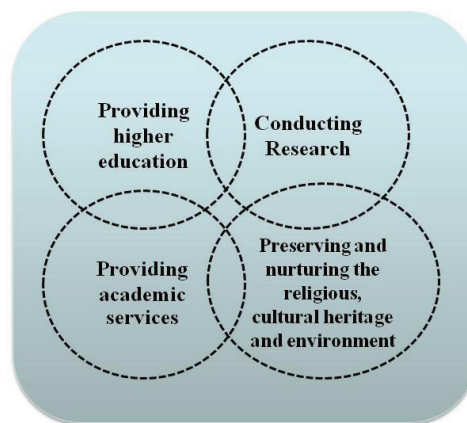


FIGURE 1
THE PARADIGM OF CSR PRACTICES BY INTEGRATING
UNIVERSITY'S MISSION

Concerning factors that drive faculty members to conduct the activities for social responsibility, the key factors are the resolution and mission of the organization itself. Velasque (1996) indicated that it is a matter of enlightened self-interest for organizations to be socially responsible, since ethical behavior is more profitable and more rational than unethical behavior, and crucial for organizational effectiveness. The university has been founded as a non-profit organization which aims to be responsible for society and communities. Ferrell and Gresham (1985) note that ethical decision making of an individual can be influenced by many factors such as individual attributes and the social and cultural environment. Apart from that, the person or leadership in the faculty who is socially-responsible-minded is also an important factor. Mostovicz and Kakabadse (2009) defined that leadership is the ability to choose freely without being influenced by external social forces, whilst simultaneously maintaining full awareness of one's inherent subconscious motivations. All activities that this group of people do usually have the sense of social responsibility. After those activities are acknowledged by other people in the faculty, then other people would do the same. When all of them do it consistently, it turns to be a culture of the faculty finally.

The management support is another factor that makes the social responsibility to be concrete. If the management realizes that the social responsibility is a major factor for the faculty members to grow sustainably, it should be stated clearly in the policy which then turns to be activities being conducted consistently. Then, managers or leaders are important change agents and their awareness of and commitment to CSR are widely recognized as a key success factors for the implementation of social and environmental initiatives (Jenkins, 2006; Mamic, 2005; Pedersen, 2006; Weaver et al., 1999). Furthermore, Hargett and Williams (2009) found that, CSR and sustainability are not typically understood as the execution strategy among majority of companies' leaders and employees. Organizational leaders can, therefore, benefit from learning more about what

practices, systems, and organizational culture components are important in initializing and sustaining CSR in business operations world-wide.

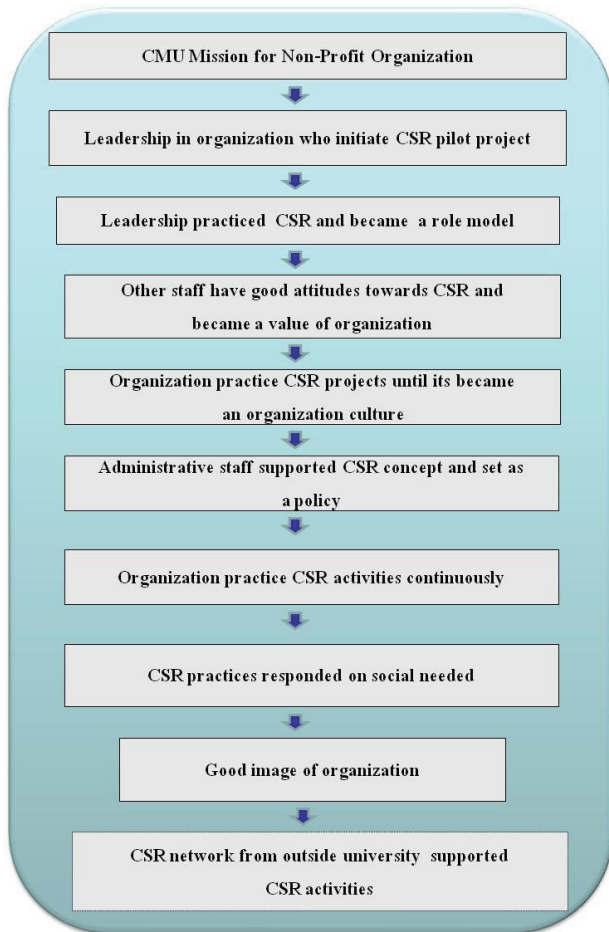


FIGURE II
KEY FACTORS TO DRIVE CSR PRACTICES IN THE UNIVERSITY

Other factors that drive the socially responsible activities to be incurred in the faculty members include high competition between academic institutions, desire to promote the organization, and quality assurance policy which emphasizes on this matter. In parallel with private company, competitiveness plays a critical role that leads a company to sustainability. To be competitive, companies have to provide not only the quality of products or services, but also demonstration of the CSR management of business (Price and Newson, 2003). Top global companies reveal part of their effective management through comprehensive social and environmental policies (Snider et al., 2003). Throughout these mechanisms, companies can have greater prominence in the minds of stakeholders and therefore build up a strong reputation (Rindova et al., 2005). In addition Chen, H.C. (2011) found that CSR was mainly influenced by four core components: accountability, transparency, competitiveness, and responsibility. While developing business strategies, companies taking accountability and transparency as priority would strengthen their competitiveness and generate

responsibility and in turn lead to CSR. Organization would obtain great advantages in the long run.

However, another important group of university stakeholders are corporate supporters of a university. These businesses that provide financial and strategic support to a university are increasingly acclimatized to work with CSR concerns. They will benefit from an alignment of a university strategy that reflects their own concerns. Universities can meet the expectations of stakeholders by adopting a well-conceived CSR strategy in the same manner as other organizations. The same principles of strategic management apply to incorporating CSR as part of competitive advantage: formulation, implementation and evaluation. A key element of a university is to craft an overall strategy and then determine the various categories to be measured and then develop benchmarking capabilities. A strategic action plan will enhance the university's performance potential. A strategic plan will also embrace transparency and indicate to stakeholders that specific steps are being taken to address social concerns. Universities have an opportunity to embrace the concerns of their stakeholders, such as students and business supporters, and to lead in responding in the realm of practising and communicating CSR. Universities realize that it is a competitive market in terms of creating an ongoing stream of satisfied alumni, attracting new students and addressing the concerns of business supporters (Gossen, R., 2009).

V.CONCLUSIONS

The results of this study indicated distinct view of corporate socially responsible in the university context as taking an active role in contributing to the well being of society and acts in the field of social solidarity, and adoption of human resource practices that demonstrate respect and concern for the well being of stakeholders. According to the results, it is a major challenge in the educational institute to engage with comprehensive school reform through implication for CSR. Gossen, R. (2009) indicated that universities are often looked upon to take a leadership role within societies. They are expected to lead through advanced research or by extending the bounds of justice on a global scale. Universities have an opportunity to lead in an area that most businesses have recognized as important. Businesses increasingly appreciate the role of CSR and they wish to engage in positive social actions and communicate these accordingly to their stakeholders. Universities can and should build on a tradition of the past decades of attempting to engage in positive social actions. Universities can lead in the practices of CSR two ways. First, universities should promote a true culture of CSR throughout their organizations. Second, universities should develop social marketing actions in order to better communicate and interact with stakeholders. The development of a vibrant CSR culture will foster the build-up of human and social capital with the organization.

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University Social Responsibility: Pathways of Lampang Rajabhat University

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Abstract– The philosophy and policy of Lampang Rajabhat University (LPRU) is to serve the community and be responsible to society. However, translating this policy into action is a difficult process as most of the university staff is preoccupied with teaching. This paper discusses how the Research and Development Institute (RDI) of Lampang Rajabhat University developed a research management system to help teaching-based university staff undertake area-based research projects that could serve the community better. The research methodology employed participatory action research. The research team at RDI included the Director, three Assistant Directors, and support staff. The research management system, as developed at RDI, included: 1) conducting a situation analysis of RDI's existing research management system, 2) building the research management capacity of the core research team through on-the-job training, 3) facilitating researchers and students to undertake community-based research (CBR) projects, and 4) developing a new RDI research management system, including upstream, midstream, and downstream management systems. With this new approach, managers, researchers, students, and community members gained problem-solving experience through community-based research projects. In addition, the local wisdom and practical experience gained from these projects is now being integrated into the curriculum and teaching at LPRU. Building on these community-based experiences, the researchers have also learned to apply participatory research methodologies to new research ideas and development questions. The Thailand Research Fund (TRF) grant, coaching by the TRF project coordinators, and the new thinking paradigm of the Director of RDI helped make this new research management approach a success at LPRU – building a pathway to excellence.

Keywords– community-based research, community-based research management system, participatory action research, situation analysis, university social responsibility

I. INTRODUCTION

Lampang Rajabhat University established the Research and Development Institute in 2000 to promote research and academic service aiming to solve community problems and increase community strength. RDI's mission is to: 1) promote research that generates practical knowledge and 2) manage the knowledge derived from community development research.

In the past, most university research projects did not serve the local community particularly well as the interests and agendas of the researchers and funding agencies, not the community, drove them. Furthermore, the community rarely participated in the projects as active researchers. Community problems, as a result, were rarely integrated into the research questions driving university-based research projects.

To address these shortcomings, RDI, starting in 2005, worked to develop a participatory research management system to better enable university researchers to conduct research projects that serve the needs and interests of the local community.

II. RESEARCH METHODOLOGY

The Director of RDI played a key role in encouraging the institute to apply participatory action research as a research methodology for this long-term research project. The core research team at RDI included the Director, three Assistant Directors, and support staff. The target groups were the university staff, the university students, and community members in the local research communities.

Participatory action research, as employed at RDI, included:

A) *Conducting a Situation Analysis*

A SWOT analysis was conducted to review the existing research management system at RDI. The local community was surveyed about the usefulness of existing university research projects.

B) *Building the Participatory Research Management Capacity of the RDI Director and Staff*

The core research team at RDI was trained to facilitate researchers, students, and the community to conduct area-based research projects under the ABC-PUS/MAG scheme (Area-Based Collaborative Research Project for Undergraduate Student and for Master Research Grant).

C) *Facilitating University Researchers, Students, and Community Members to Undertake CBR Projects*

The core research team helped facilitate the university researchers, students, and community members conduct CBR projects under the TRF-CBR scheme, with the coaching support of the TRF-CBR coordinator. The principles of CBR are: 1) research problems and questions are identified by the community through a participatory process with university researchers and students, 2) community members are involved as co-researchers, and 3) actions to solve problems are designed through a participatory process.

This facilitation has helped build capacity for participatory action research by university researchers and students.

D) *Facilitating Master Students and Community Members to Undertake CBR Projects*

The core research team helped facilitate the master students and community members to conduct CBR projects under the CB-MAG scheme, with the coaching support of the CB-MAG coordinator. The principles of CB-MAG are: 1) research problem and questions are identified by the community and master students through a participatory process, 2) community members are involved as co-researchers, 3) actions to solve problems are designed through a participatory process, and 4) master students integrate discipline-based knowledge with local wisdom to solve problems.

G) *Developing the RDI Research Management System*

The core research team developed a three-step research management system for RDI, including upstream, midstream, and downstream components, as shown in Fig. 1.

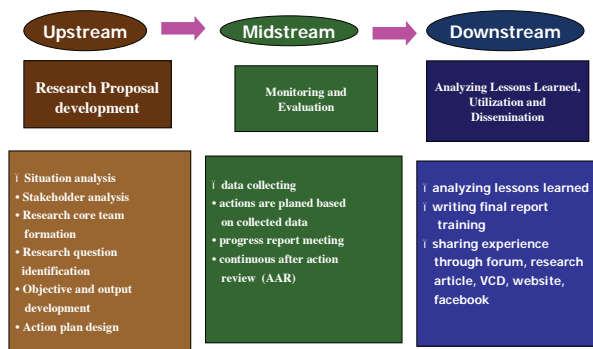


Fig. 1 Participatory research management system

H) *Data Analysis*

Contents analysis was applied to analyze qualitative data.

III. RESEARCH FINDINGS

The core research team used participatory action research to develop the participatory management system. The research findings included:

A) *Participatory Research Management System*

This research produced an effective participatory research management system that included: 1) conducting a situation

analysis of RDI's existing research management, 2) building the research management capacity of the core research team through on-the-job training, 3) facilitating researchers, students, and community members to undertake CBR projects, 4) facilitating master students and community members to undertake CBR projects, and 5) developing a research management system for RDI with upstream, midstream, and downstream components.

B) *Weaknesses of RDI's Existing Research Management*

The situation analysis helped reveal that RDI lacked the skills to facilitate a participatory process through which university staff, students, and community members could identify research questions and design action plans. To address this, the Director, three Assistant Directors, and support staff of RDI formed a core research team to manage the research programs under the ABC-PUS/MAG scheme, with the coaching support of the TRF coordinators. This on-the-job training empowered RDI to learn and practice an effective area-based research management system, with upstream, midstream, and downstream components.

C) *Increasing Facilitation Skills*

The core research team has gained practice in facilitating researchers and master students to undertake CBR projects under the TRF-CBR and CB-MAG schemes. This has enabled them to empower university researchers and students to design a participatory process that encourages community members to fully engage in the research process.

D) *Participatory Research Management System*

RDI has developed a participatory research management system that empowers researchers and students to undertake ABC and CBR projects, as shown in Fig. 1.

IV. PRACTICAL IMPLICATIONS

A) *Outcome*

Experienced research managers at RDI, including the Director, three Assistant Directors, and support staff, can now effectively help university researchers and students conduct participatory ABC and CBR projects. Consequently, more researchers, students, and community members have experience in solving community problems through community-based research projects.

B) *Implications*

This new participatory research management approach has helped to integrate local wisdom with academic knowledge. This is a new way of approaching academic service, and the lessons learned are being incorporated into the teaching-learning process at LPRU so that university researchers and students better appreciate, understand, and utilize the practical knowledge resident in local communities.

C) *Impact*

Lampang Rajabhat University has collaborated with TRF on the ABC and CBR schemes through research matching funds, a research management coaching program, and further

collaborative research called the “Local Learning Enrichment Network (LLEN).” Building on the community-based experiences gained through this collaboration, the researchers have also learned to apply participatory research methodologies to new research ideas and development questions.

D) Success Factors

The success factors of this long-term research project include:

- The new thinking paradigm of the Director of RDI that provided the opportunity for the core research team to review the existing research management process and develop a new participatory one.
- The coaching process, facilitated by the TRF-CBR and TRF-ABC coordinators, which empowered the core research team to: 1) change their way of thinking, 2) increase their knowledge of and ability to use participatory research management concepts, and 3) develop skills in facilitation, evaluation, monitoring, and reflection.
- The initial TRF research grant that allowed the core research team to design the activities and action plan for this research project.
- The ability to put into practice the upstream, midstream, and downstream components of the participatory management process in real-world settings.

F) Originality and Value of this Research

Through this research, Lampang Rajabhat University and the Lampang community have developed a new pathway for university social responsibility. The lessons learned by RDI in working collaboratively with the local Lampang community provide a pathway for other universities, seeking to improve their research services to local communities, to follow.

ACKNOWLEDGMENT

We wish to gratefully acknowledge the assistance of Lampang Rajabhat University and the Thailand Research Fund, whose research grant, coordinators, and helpful coaching helped this project succeed. Our thanks also go to the community researchers who participated in the ABC, CBR, and CB-MAG projects.

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Student Transition Rates in an Australian Higher Education Institution

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ABSTRACT

A key responsibility of institutional researchers is to effectively monitor the university's student transition rates with view to their application in respect to enrolment planning, management and the development of strategies to enhance student retention. The key measures of student transition include attrition, retention and program completion. These metrics are considered in the context of a technological university located in an Australian capital city. More specifically the present study considers the effects of student age, gender, study mode, study load, basis of admission, broad field of education and residency in the higher education institution on the latest available student transition rates at the University. Some of the study findings were consistent with the hypotheses developed from the literature review whilst others were contrary to these earlier studies. Regarding the latter, for instance, it was found that Australian students sustained a lower attrition rate than international students. Implications of this and other study findings for the development of student retention strategies are considered.

Key Words: student transition, attrition, retention and completion

INTRODUCTION

Monitoring key performance indicators (KPIs) is an important activity of higher education institutional researchers. Within the Australian context this institutional research responsibility has gained prominence of late with the Australian Government implementing performance based funding of universities' learning and teaching and indeed research as well. In terms of learning and teaching, the Federal Government has in the past applied certain student transition metrics, particularly, student retention and completion rates in performance based funding regimes. This external environment change has provided increasing impetus for institutional research professionals to inter alia focus on learning and teaching KPIs but more specifically on the monitoring of student transition rates. Further, with the recent decline in Australian tertiary education international students, greater retention of such students has increasingly attracted attention in order to maximise such student numbers and more importantly the associated revenue in order to balance the institutional budget.

Given these environmental forces, it was decided to undertake a study of student transition rates within an Australian technological university located in a mega polis. More specifically the study examined student transition rates for the case study institution during 2008 to 2009. In particular, the following three KPIs were considered in the study:

- Attrition rate;
- Retention rate; and
- Completion rate.

The effects of certain demographic and related variables on the student transition rates were considered, including the cross-tabulation of these rates according to the following variables:

- Age
- Gender
- Program level (Undergraduate or Postgraduate)
- Study load
- Basis of student admission (for commencing students only)
- Broad field of education
- Whether the students are domestic or international

LITERATURE REVIEW

Brawer (1996) notes the increasing interest and concern regarding student retention and attrition rates within the Northern American context. She reports that around 50% of American higher education's commencing students drop out from their studies prior to program completion. Brawer (1996) expresses the need to implement student retention strategies including orientation programs and mentoring in order to lower the higher education attrition rates.

Darlaston-Jones et al (2001) believe that transition to university appears to be linked to stress, anxiety and tension and in a number of cases leading to student failures and drop out from university studies. They suggest that such transition difficulties result in relatively high social and economic costs. Further, Darlaston-Jones et al (2001) note a dearth of research into student transition rates in countries apart from those located in Northern America. Clearly this suggests a need for greater institutional research efforts on this topic in countries such as Australia, thus providing rationale/justification for the present study.

The Australian Department of Education, Employment and Workplace Relations (henceforth DEEWR, 2004) sug-

gest that attrition rates constitute a range of outcome indicators used to measure the performance of higher education institutions. They suggest that it is important for policy and program development to gain an understanding of whether particular groups of students are more likely to drop out from higher education studies than others. Such a viewpoint strengthens the rationale for the present study that aims to examine higher education student transition rates by demographic and related variables within an Australian university. DEEWR (2004,p.1) define attrition rate as the ‘proportion of students in a particular year who neither graduate nor continue studying in an award course at the same institution in the following year’. This paper suggests that the sum of attrition, retention and completion rates will equal 100% in any given year. The present study adopts this definition of student transition rates. Some of the key findings of the DEEWR (2004) study include:

- School leaver commencing undergraduate degrees students sustained a lower attrition rate than other undergraduate commencing students.
- Domestic higher education students experienced greater attrition rate than their international colleagues.
- Postgraduate students had greater attrition rate than undergraduates.

It will be interesting to ascertain whether the present study produces similar findings to the DEEWR analysis that uses much earlier data (1994 to 2002).

Krause (2005) considered student attrition and related issues with respect to first year Australian university students. More specifically they examined student intentions towards discontinuation of studies and found some links between demographic variables and the intention to drop out from studies including:

- Students enrolled in multiple degree programs were less likely to consider discontinuing their studies than their colleagues undertaking single degree programs.
- They found that a greater proportion of students from the low socio-economic (SES) group contemplated withdrawal from University studies in comparison to their more economically advantaged counterparts. However, the mean difference was not statistically significant. The author accordingly suggests that this variable is worthy of further institutional research.

Cao and Gabb (2006) inter alia undertook a study of student attrition with respect to commencing students enrolled in higher education programs at the Victoria University. They used more recent data (2002-2004) than the previously mentioned DEEWR institutional research. Cao and Gabb (2006) main findings regarding the Victoria University’s commencing student attrition rates can be summarised as follows:

- Part-time students sustained a greater student attrition rate than full-timers.
- The Education discipline recorded consistently lower student attrition rates than other fields of study.

- They confirmed the DEEWR (2004) finding that school leavers experienced lower attrition rates than other commencing students.

Deng et al (2007) report on a study of student attrition undertaken at the University of South Australia’s Business Division. Although this South Australian study is more limited in scope than the present institutional research (since this study covers all disciplines offered within the case study higher education institution), nevertheless it is noted that Deng et al (2007) reported the following major findings in areas of interest to the current study:

- Students born in Australia were more likely to be retained than those born overseas with the latter sustaining a greater probability of dropping out from their Business program.
- Students who have incurred greater higher education costs including domestic and overseas fee paying students were less likely to drop out from their Business program than other students.
- They did not find any evidence to indicate that part-time students were more likely to drop out from higher education studies than full-time students. This finding appears contrary to some of the previously mentioned earlier studies and may be due to the Deng et al (2007) research being limited to only one field of education.

Hare (2010) provides very convincing rationale for greater institutional research efforts into higher education attrition rates. In particular, she notes that:

- Student attrition in Australian universities cost more than AUD\$1.4 billion per annum.
- The study found an average annual attrition rate within a dozen case study institutions of around 17%.
- The study notes that it is much cheaper to retain a student than to recruit a new one.
- In addition to the financial cost of higher education student attrition, there are human costs including long-lasting negative psychological and emotional costs.

It is noted that Hare (2010) furnishes a very strong case for on-going institutional research into higher education student attrition and as such, it provides rationale and support for the present study.

METHODOLOGY

It is important to define what is meant by the various student transition rates as applied in this study given that varying definitions are used. For instance, Deng et al (2007) measure student attrition rates at the program level. However, the “official” source in Australia (DEEWR,2004) suggests that attrition is normally determined at the institutional level. Further, whilst the DEEWR publication suggests that student attrition, retention and completion rates add up to 100%, Olsen et al (Undated) combine retained and completing students into the retention metric. The present study adopts the DEEWR (2004) approach, namely, let C be the number of students who completed their program in

year Y, D is the number of students who dropped out of the institution in year Y and R is the number of students who were retained in higher education programs of the institution in the following year (Y+1) then:

T= total number of students enrolled at the institution in year Y (C+D+R)

Attrition Rate (AR)= $D \times 100 / T$ (the % of students in year Y who neither completed their studies in the same year nor returned to the institution in year Y+1).

Retention Rate (RR)= $R \times 100 / T$ (The % of students in year Y who returned to higher education studies at the institution in year Y+1)

Completion Rate (CR)= $C \times 100 / T$ (% of students who completed their program in year Y)

Where AR+RR+CR=100%

The study inter alia will address the following specific research hypotheses derived from the literature review presented in the earlier section:

H1: Part-time students sustained a greater attrition rate than full-time students

H2: School leaver students experienced lower attrition rate than other commencing students

H3: Postgraduate students had higher attrition rate than undergraduates

H4: Domestic students sustained greater attrition rate than international students

H5: Education field of study students experienced lower attrition rate than those drawn from other fields of study.

Information on student transition numbers were extracted by analysing files over 2008/9 using the above adopted definitions.

The demographic variables for the study were extracted and transformed from student systems to study relationship between variables using specialised statistical software.

STUDENT TRANSITION AND DEMOGRAPHIC AND

RELATED VARIABLES: STUDY FINDINGS

Gender

A fundamental demographic variable captured by most higher education student systems (and indeed is required by the Federal Government in Australia which monitors such statistics for purposes of equity) is student gender. Table 1 specifies the attrition, retention and completion rates by student gender. Although the difference in attrition rates in absolute terms across gender appears relatively minor statistical testing indicates that it was significant ($Z=15.8$, $p<0.001$). Whilst the positive outcomes (sum of proportion of completions and retentions) are very similar across the gender (around 83%), it is interesting to note that male program completion rates (20%) were greater than that for females (18%). However, this may be due to other factors such as the length of programs undertaken and proportion of students in final years of their program.

Table 1: 2008/9 Student Transition Rates by Gender			
Gender	% Attrition	% Retention	% Completion
Male	17.02%	62.82%	20.17%
Female	17.04%	65.09%	17.87%
Total	17.03%	63.94%	19.03%

Commencing Students

Table 2 presents the student attrition and other transition rates by the status of the students with respect to whether they are commencing their program or are in subsequent years of their studies at the case study institution. It reveals that the commencing students (15.9%) sustained a lower attrition rate than returning students (17.8%, $Z=1509$, $p<0.001$) with the difference in proportions being highly statistically significant. This finding is somewhat unexpected since a priori, one would expect the first year students to be in transition (adjusting to their new institutional environment and the like) and sustained greater attrition rates than later year students. The lower completion rate for commencing students (4.8%) than returning students (28.6%) makes sense given that most University programs are greater than one year in duration.

Table 2: 2008/9 Student Transition Rates by Commencing/Returning			
Commencing	% Attrition	% Retention	% Completion
Commencing	15.87%	79.38%	4.75%
Returning	17.80%	53.57%	28.63%
Total	17.03%	63.94%	19.03%

Study Load

Table 3 specifies the student transition rates for full-time and part-time study loads. The full-time student attrition rate (26%) was almost double that of part-timers (14%) with the difference in percentages being highly significant ($Z=7347$, $p<0.001$). Research hypothesis H1 is hence rejected. Indeed part-time students sustained lower attrition rate and higher retention rate than full-time students, suggesting a more positive outcome for the former.

Table 3: 2008/9 Student Transition Rates by Study Load			
Study Load	% Attrition	% Retention	% Completion
Full Time	26.05%	50.74%	23.21%
Part Time	14.02%	68.33%	17.65%
Total	17.03%	63.94%	19.03%

Basis of Admission

Table 4 provides the student attrition rate by the basis of admission of students to the University. The attrition rate for school leavers (those entering higher education after completing secondary education) (15.89%) was around 0.12% greater than that applicable to students entering from other basis of admission (15.87%) with the difference in proportions being nevertheless statistically significant

($Z=7$, $p<0.01$). This finding is inconsistent with research hypothesis H2. Other study findings include:

- Students entering the University with prior higher education studies (17.4%) recorded 9% greater attrition rate than school leavers (15.9%) with the difference in proportions being highly significant ($Z=317$, $p<0.001$).
- School leavers (15.9%) were almost 10% more likely to drop out from their higher education program than their counterparts entering with technical and further education qualifications (14.5%) with the difference in percentages being highly significant ($Z=459$, $p<0.001$).
- Mature age students (22.4%) experienced 41% greater discontinuation rate than was the case with school leavers (15.9%) with the observed difference in proportions being highly statistically significant ($Z=24$, $p<0.001$).
- School leavers (15.9%) sustained 55% greater attrition rate than was the case with students commencing with other basis of admission (10.2%) and the difference in percentages was highly significant ($Z=571$, $p<0.001$).

Table 4: 2008/9 Student Transition Rates by Basis of Admission			
Basis of Admission	% Attrition	% Retention	% Completion
Higher Education	17.37%	74.18%	8.45%
Secondary Education	15.89%	83.77%	0.33%
Technical College (TAFE)	14.48%	82.90%	2.63%
Mature Age	22.45%	77.55%	0.00%
Other	10.24%	89.00%	0.76%
Total	15.87%	79.38%	4.75%

Program Level

Table 5 provides the student transition measures according to the level of the academic program being undertaken by the students at the technological University. The data contained in this table confirms research hypothesis 3 with post-graduate programs (20.8%) experiencing 29% greater attrition rate than did under-graduate courses (16.1%) with the difference in proportion being highly significant ($Z=2521$, $p<0.001$). The table also reveals that the retention rate for under-graduate programs is greater but that the completion rate is higher for post-graduate programs. The latter would be due to the fact that certain post-graduate programs (such as Graduate Certificate and Graduate Diplomas) are shorter in length than under-graduate programs.

Table 5: 2008/9 Student Transition Rates by Program Level

Study Load	% Attrition	% Retention	% Completion
Post-graduate	20.75%	52.01%	27.24%
Under-graduate	16.05%	67.06%	16.89%
Total	17.03%	63.94%	19.03%

Permanent Residency

Table 7 provides the student transition rates segmented by domestic Australian students and those emanating from international countries. The local students (16.7%) sustained a lower attrition rate at the case study University than the international students (17.3%) with the difference in proportions being highly significant ($Z=483$, $p<0.001$). This finding is contrary to research hypothesis H4 perhaps suggesting that the institutional context may be a major determinant of student transition rates. For instance, the student demand index in terms of local students for the case study university is relatively high so the institution may be more selective in terms of admissions policies than some of its competitor institutions, thus increasing the relative “success rates” in terms of student transition. It is noted that given the relatively large recruitment costs of international students the greater attrition rate for such students will translate into higher institutional international marketing costs.

Table 7: 2008/9 Student Transition Rates by Permanent Residency

Residency	% Attrition	% Retention	% Completion
Australian	16.73%	63.97%	19.30%
International	17.32%	63.91%	18.77%
Total	17.03%	63.94%	19.03%

Broad Field of Education

Table 8 provides a breakdown of student transition metrics by broad field of education. Ignoring the Food, Hospitality and Personal Services discipline that had only one commencing enrolment in 2008 with the student dropping out from studies by 2009 and the “unclassified” field that sustained only 169 enrolments, the following comments are offered on the measures contained in this table:

- Engineering and Related Technologies experienced the lowest attrition rate of all fields and indeed was the best performer with 88% of the students either graduating or being retained in their program between 2008 and 2009.
- Research hypothesis H5 appears to be supported by the information contained in Table 8 since apart from Engineering and Related Technologies, Education sustained the lowest absolute attrition rate. Statistical testing of Education’s attrition rate with other disciplines reveals that: Education had 14% greater attrition rate than Engineering & Related Technologies with the difference in proportions being highly significant ($Z=178$, $p<0.001$); although Creative Arts experienced

only 0.2% greater attrition rate than Education, the difference in proportion was statistically significant ($z=2.67$, $p<0.01$) and clearly Education out-performed other broad fields of education in sustaining a lower attrition rate.

- The greatest observed student attrition rate was in relation to the Society and Culture broad field (23%).

Table 8: 2008/9 Student Transition Rates by Broad Field of Education

Basis of Admission	% Attrition	% Retention	% Completion
Agriculture, Environmental and Related Studies	17.94%	65.84%	16.22%
Architecture and Building	14.05%	69.42%	16.53%
Creative Arts	13.49%	60.12%	26.38%
Education	13.47%	55.13%	31.40%
Engineering and Related Technologies	11.79%	70.27%	17.94%
Food, Hospitality and Personal Services	100.00%	0.00%	0.00%
Health	14.57%	61.92%	23.51%
Information Technology	17.23%	62.44%	20.32%
Management and Commerce	18.42%	64.64%	16.94%
Natural and Physical Sciences	17.98%	63.53%	18.50%
Society and Culture	22.68%	60.71%	16.61%
Unclassified	97.63%	2.37%	0.00%
Total	17.03%	63.94%	19.03%

Age

Table 9 indicates that student attrition rate increases with age; indeed there is almost perfect positive correlation between age and student dropout rates ($r=0.96$). Thus, for

example, students aged at least 35 years suffered more than double the attrition rate sustained by those younger than 20 years of age.

Table 9: 2008/9 Student Transition Rates by Age Group

Basis of Admission	% Attrition	% Retention	% Completion
< 20 years	12.49%	84.57%	2.94%
20 to less than 25 years	13.90%	62.64%	23.46%
25 to less than 35 years	22.26%	52.12%	25.62%
35 years or older	26.76%	52.39%	20.86%
Total	17.03%	63.94%	19.03%

CONCLUSION

In the competitive environment of the 21st century in higher education, it is important that universities retain their students and indeed minimise their student attrition rates. Simply put, the greater the student retention rate, the larger the University coffers and the smaller the marketing costs for any given number of students. Thus it is important that higher education gain a good understanding of the risk factors associated with student attrition so that retention strategies can then be targeted towards students at greatest risk. The present study identified a number of sub-populations at greater risk of discontinuing their studies.

In absolute terms gender made little difference to student attrition rates at the Case Study University with both male and female student dropout rate being around 17%.

Consequently this variable may not be as important in the development of student retention strategies.

Unexpectedly, the study found that returning students sustained a greater attrition rate than was the case with commencing students. A priori one would expect new students to be more likely to discontinue their program, given their greater effort to adjust to the new University environment. It is suggested that more in depth institutional research be undertaken to identify the basic reasons for such a contrary outcome at the case study higher education institution.

Contrary to the literature and one of the research hypothesis synthesised from the literature review, the present study found that full-time student attrition rate was greater than that pertaining to part-time students. Again this contradictory finding suggests a need for further institutional

research to ascertain why the Case Study University yielded the unexpected result.

The study found that school leavers entering higher education are at greater risk of discontinuing their studies. Efforts need to be strengthened to ensure that such students are more adequately socially and academically integrated within the University in order to maximise their retention rates. However, in terms of basis of admission, students commencing with prior higher education and those who were mature age entry were more likely to drop out from studies than school leavers. It is interesting to note that students entering with TAFE qualifications were less likely to discontinue their studies than most of the other sub groups. This may be due to the fact that the case study university is inter sectoral in nature with the articulation of TAFE programs with higher education. Given that, many of these students are simply transferring from TAFE to the university sector in the same institution. They would be expected to be integrated within the institutional environment, hence less likely to drop out from studies.

The present study finding was also consistent with the literature, revealing that post-graduate students sustained greater attrition rate than under-graduates. This finding could be due to a number of factors. Often post-graduate students hold other responsibilities including a full-time or part-time employment, being married and possibly a parent and the like. Such pressures can distract students from their post-graduate studies resulting in greater attrition rates. However, further institutional research is required to ascertain the reasons for the relatively greater post-graduate student dropout rates.

Contrary to the research hypothesis, the domestic students suffered a lower attrition rate than other students. This is a costly finding to the Case Study University that relies fairly heavily on full fee paying international students. Given that the latter are discontinuing their studies in greater proportion, their numbers will decline, unless more funds are spent on recruiting more overseas students. It is hence necessary for the University to find out why more international students are discontinuing their programs and rectify any under-lying problems to improve their retention rates in the future.

The study established an almost perfect positive correlation between a student's age and chances of discontinuing their program. This does indicate an urgent need to develop student retention strategies for the older students in order to rectify their relatively high attrition rate. Some of the factors may be extraneous to the institutional environment, for example, the older students may have family responsibilities and hence cannot attend University classes. However, perhaps they could be encouraged to embrace distance education including on-line learning, to gain flexibility in terms of when they learn.

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Aligning of Knowledge Management and People Management

Case of Private University in Indonesia

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Abstract— This paper reports on the best practice of developing KM and aligning academics as knowledge workers with the university's commitments to social responsibility. The work was based on collected data, on websites, on interviews with university leaders, KM research reports, evidences of KM application, faculty management and the application of social responsibility. In this study a reputable private university, namely Bina Nusantara University, was the selected by virtue of it winning the coveted status of Most Admired Knowledge Enterprise (MAKE) Award. The findings of this work showed that five major university processes are enhanced. These are the curriculum design, administrative services, research processes, student and alumni services, and the professional services to community. University Social Responsibility is strengthened by the results of aligning the knowledge worker management including competency-based performance and competency-based reward system with the strategies of the knowledge enterprise university.

Key Word : Knowledge Management, People, Social Responsibility

I. INTRODUCTION

Changes in global, political and economic structures have ushered in a competitive lifestyle that demands continuous revision and improvement in the quality of life of the organizations and management strategies.

Three important actions were identified by the Indonesian Higher Education Development Policy of 2009. These are Equity and Expanded Access to Higher education, Quality enhancement, relevance and competitiveness, and good university governance, accountability and public image. The Ministry of National Education's Strategic Plan to 2014 targets 30% Gross Enrolment Rate (GER) in higher education in Indonesia increasing from 17.26% in 2007. The GER in South Korea as a comparison reached 90% already (Prabowo, 2009).

However, Higher Education in Indonesia faces a dilemma. While increasing academic capacity and enhancing quality will attract increased enrolments, university graduates also contribute to increasing unemployment rates following their graduation. It would seem that the labor market's requirements are both knowledgeable and practical employees.

To face the challenges of the 21st century Knowledge Society, university need to focus on the development of professionalism, leadership, management, and empowerment of the Indonesian nation. ICT based KM in HE to maintain

the competitive advantage is expected to produce graduates who are able to compete in the global world as Knowledge Workers. In 2005, Indonesian government policy states that lecturers & teachers should have professional, Social Pedagogy and Personality competences. Therefore, HE as a service provider must have organization capability, mainly in (1) program development and academic resources / faculty member, (2) academic operational services, (3) research and innovation, (4) social responsibility, (5) strategic cooperation, and (6) development and management of Intellectual Property Rights. Application of KM will build a positive learning environment in the organization. There is also a recognition that social responsibility can only be implemented if the people / faculty have a positive view of the organization (Simmons, 2008). So the application of KM and faculty member/lecturer management is an important enabler in the achievement of university performance and commitment in realizing social responsibility.

II. HIGHER EDUCATION(HE) MANAGEMENT SYSTEM

Generally, Indonesian Higher Education (HE) is guided by the country's declaration that their responsibilities are governed by the educational philosophy of "Tri Dharma Perguruan Tinggi" (or *The Trilogy of Higher Education*) which is made up of teaching and learning, research, and service to the community. University management system is therefore a unique system that combines academic interests and educational services business. Both are considered to be mutually inclusive and therefore directly influence university performance.

In a university generally, its management system focuses on 3 (three) main aspects, such as process, content, and resources. Each of these aspects must be managed in an integrated way to achieve the vision, mission, goals and university development requirements. Certainly, there are other requirements in addition to the three aspects above which may be stated as : organizational culture, values, work ethos, leadership and government policy. To achieve better performance, university needs to develop and implement a good strategy.

The roles of lecturers as a Knowledge Workers or Human capital therefore extend beyond the immediate teaching and learning, research and community service as mentioned above, but also to apply their knowledge and expertise as well as skills to generate new professional services.

Human capital can be defined as real capital which is linked to the quality of the human existence in the organization. Lecturer/Faculty Management is therefore very important in Knowledge Society to ensure that this capital continuously help in creating excellence in the University and in using rapidly advancing technology that continuously create innovation , as shown in figure 1.

Process	Content	Resources
Core process : •Teaching learning •Research •Community	Curriculum & Management •Content •Metodology •Knowledge object •Research output •Academic Forum	Human Resource •Lecturer •Employee
Other supporting Processes		Financial Research
Information systems	Knowledge management	IT Infra structure
Organisazion & Management System		

Figure 1. HE Organization & Management System (Prabowo,2009)

A Knowledge Management In Higher Education

According to Kidwell (2001), Knowledge Management in the university involves five main processes namely 1) product development process and curriculum, 2) research process, 3) administrative services process, 4) student & alumni services process, 5) community service process. In each process, KM provides benefits to improve the quality of the process and outcome, as shown in Figure 2

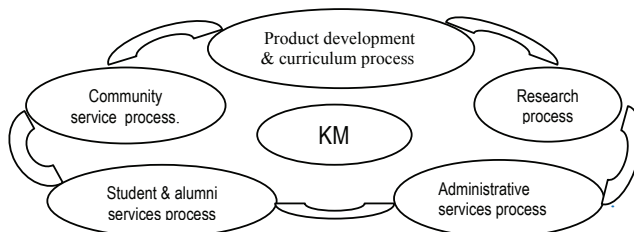


Figure 2 Knowledge Management in Higher Education

III.APPLICATION OF KM IN BINA NUSANTARA UNIVERSITY /BINUS

BINUS UNIVERSITY which started as Modern Computer Course Training Institute on October 21, 1974 became BINUS UNIVERSITY on 8 August 1996. The rapid expansion and development could be traced to the dedication of its management and staff in providing quality education. It has 6 Faculties namely the Faculties of Computer Studies, Economics and Business, Science and Technology, Language and Culture and Psychology.

A. Model Knowledge Management System(KMS)

KMS Development at BINUS used a trilogy of approach namely - People, Process and Technology, and is aligned with the University strategic plan. Through these three elements is the development of KMS starts from two perspectives as shown in Figure 3.

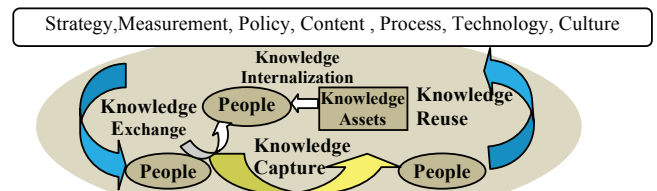


Figure 3 Knowledge Management System (KMS) (Fahmi,2003)

- 1.To include the activities of creating the knowledge process and innovation such as: knowledge exchange, knowledge capture, knowledge reuse, and knowledge internalization. Overall, this process creates a learning organization – an organization which has expertise in creation, acquisition and spread of knowledge and adapting the activity to reflect the new understanding and innovation obtained.
- 2.To include the elements which affect the activity of knowledge creation, which is: Strategy – University's strategic alignment with the KMS strategy measurement – the measurement taken to determine whether there is a KM improvement or benefits taken by policy – written rules or guidelines which has made by the university. Content – part of the university knowledge-base captured electronically. Process – processes used by the university's knowledge worker in order to reach organization's mission and goal. Technology – technology of information that facilitate process of identification, creation and diffusion of knowledge definition among the organization's elements at the whole part of the university. Culture – environment and context in which KM processes must occur (mostly mentioned as value, norm and practices)

B. KMS user (Stakeholder/People)

Binus' KMS user is anyone who is either the result of or involved in the process of formal education on-campus and off-campus. These therefore include students,, teachers, lecturers, faculty staff, alumni and management.

C. KMS BINUS UNIVERSITY

KMS framework of this university integrates the main processes and support content of knowledge-base generated from these processes and technology framework. Solution given is arranged based on practical application which can be directly applied. KM process for knowledge creation is developed through SECI (Socialization, Externalization, Combination and Internalization) process from Nonaka's KM as shown in figure 4 and table 1.

The explicit knowledge can be revealed by words and numbers. Tacit knowledge is highly personal, difficult to formulate so that difficult to communicate and spread to others. The knowledge creation process is a spiral process which is an interaction between tacit and explicit knowledge. Interaction of this knowledge creates a new knowledge.

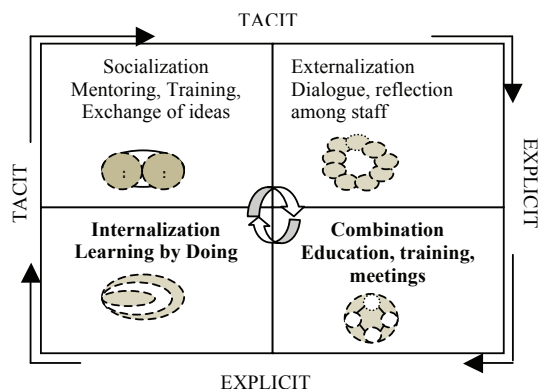


Figure 4. Knowledge Management Model (Nonaka & Takeuchi, 1995:62)

TABLE 1. SECI

<p>1) Socialization Refers to the exchange of experience whereby personal knowledge is created in the form of mental models, such as mentoring, training and the exchange of ideas which generate tacit knowledge (G.M Steyn, 2003). Practically, socialization is implemented through knowledge capture activity through physical approach such as interaction between lecturer and students, lecturer and lecturer, student and student.</p>
<p>2) Externalization Tacit knowledge is made explicit by means of dialogue and collective reflection among staff members (G.M Steyn, 2003). Practically supported by 2 key factors. First, articulation of tacit knowledge – conversion of tacit to explicit – such as in dialogue. Second, translating tacit knowledge from the experts into understandable form, such as document, manual, etc.</p>
<p>3) Combination Training which can be regarded as powerful tools to transfer knowledge, combined through meetings, documents and networking when people exchange knowledge (G.M Steyn, 2003). Practically, depend on 3 processes, which are 1) capturing and integrating the new explicit knowledge – includes external data collecting from inside or outside of institution then combining those data. 2) wide spreading the explicit knowledge through presentation or direct meeting. 3) Processing the explicit knowledge so that easier to re-use – such as into planning document, market data, etc.</p>
<p>4) Internalization Explicit knowledge becomes tacit knowledge through learning-by-doing, although documented knowledge can also play a role in this process. By sharing experiences and learning by doing under the supervision of the mentor or facilitator, the trainee acquires professional knowledge (internalization) (G.M Steyn, 2003). Practically, implemented in two dimensions 1) implementing the explicit knowledge in acting and direct practise. 2) mastering the explicit knowledge through simulation, experiment or learning by doing.</p>

IV. BINUS UNIVERSITY AS KNOWLEDGE ENTERPRISE

Following are the **knowledge-driven activities** concerned with implementation. According to the Most Admired

Knowledge Enterprise (MAKE) there are 8 criteria that need to be followed:

A. Creating an enterprise knowledge-driven culture

1. Developing and deploying a knowledge-driven enterprise vision and strategy.
2. Determining enterprise core competencies (Developing BiNusians into a reliable 'cyber community' supported by solid IT systems and programs. The term "BiNusians" here includes not only students, graduates, alumni, and other academic bodies, but also members of the general public who have been or are closely involved in the educational programs offered by BiNus.

3. Designing a knowledge-driven enterprise structure and relationships between enterprise units. To make it easy for each unit to know about BINUS so we developed a Business Scenario.

4. Developing and managing enterprise knowledge values in order to synergize and maximize the overall performance of the entire Binus family. A Culture of Quality has been developed which involved every member of the academic corps. This Culture of Quality comprises: Trust in God, Continuous Improvement, Benchmarking, Sense of Closure, Sense of Belonging

5. Developing and managing enterprise knowledge behaviors. In the daily application of this approach, these five aspects are clearly identified within a Value System that encourages consistent character, egalitarianism, honesty, open-mindedness, fairness, care, courage and a sense of responsibility.

6. Developing and managing enterprise knowledge systems/processes. Its Vision and Mission to produce qualified and applicable graduates has resulted in Binus achieving ISO 9001 Certification in 1997, one of the earliest HEI to obtain such recognition.

7. Creating and managing a knowledge-based human resource strategy. The Talent Management Directorate at Binus has developed the competency map and training matrix so all the employees get the right competences in their jobs.

Similarly, other criteria in this Program have a number of action items respectively. It is not possible to list them out in detail in this brief paper. However the major areas covered by this Binus Knowledge Enterprise include the following which will be elaborated on during the conference presentation:

- B. Developing knowledge workers through senior management leadership
- C. Delivering Knowledge-based products/services/solutions
- D. Maximizing enterprise intellectual capital
- E. Creating an environment for collaborative knowledge sharing

- F. Creating a Learning Organization
- G. Delivering value based on customer knowledge
- H. Transforming enterprise knowledge to shareholder value

As evidence of being a Knowledge Enterprise University, Binus clearly displays its philosophy as shown in Table 2:

TABLE 2
Evidence of Binus' management philosophy

Vision 20/20 : A world-class University.....
Mission , Learning Management System (LMS) (BINUSMAYA), Human Resource Information System, Performance Management System (PMS), Executive Information System, **Create Sharing Knowledge (CSK)**, **Annual Quality Award**, **Quality Management Center** , Directorat of **Talent Management**, BEC (BINUS Entrepreneurship Center)
 Lecturer Resource Center (LRC), Instructional Design Center (IDC), Widia Center of Excellence for Teaching and Learning.
 Employee Competency Map, Binus ScoreCard (BSC), Business Scenario, Work Ethics, Multi Channel Learning , Quality culture, Digital Library, Center for entrepreneurship, Discussion Forum in Binusmaya, Lotus Notes (K-Net), Binus.edu website (Corporate Website), Binusmaya website (Student Services and LMS).
 BinusCenter website, BinusCareer website, School website, E-Learning Award, Employee dedication award, Taxonomy Bloom & Adult Learning Concept, Multi Channel Learning (MCL),
 University Social Responsibility called with Teach for Indonesia(TFI)

V. ALIGNING PEOPLE MANAGEMENT AND KM IN BINUS UNIVERSITY

To create Sustainable Competitive advantage, especially excellence in education and learning product at a university, developing a working system which is able to use knowledge is needed. Generally lecturers at university are too focused on

- 1) Delivering knowledge, but only a few have developed the knowledge
- 2) Academic activities which are nothing more than a repetition from time to time.
- 3) The 3 main functions of academic named "Tri Dharma Perguruan Tinggi", but not many are oriented to using KM
- 4) Teaching but not on the development of real academic culture.

Currently, development and teaching materials are still the main problem at universities in Indonesia. Academic activities are often just administrative, routine and repetitious. K M has to be able to be used to solve those problems above.

KM application and lecturer management must be aligned. For that we need lecturers at universities who can systemically enhance and transform themselves into precious human capital. This will bring about a change in the quality perception of lecturers based on simply seniority over time to one based on how involved are the lecturers with Knowledge Management at their university (Prabowo, 2009)

To maintain of lecturer's performance as knowledge worker, Binus uses the CBHRM (Competency Based Human resource Management) concept. This uses decision making based on Individual Competency measures through personal working behavior observed in an organization against their job competency requirements (Spencer, 1993).

Government policy stated in the Lecturer and Teacher Act requires that lecturers have Professional Competency, Social Competency, Pedagogy Competency and Personality. Having passed an examination on those four items, lecturers are awarded the Lecturer Certification. In addition the government provides monetary allowance irrespective of whether they teach in public or private universities.

In line with the government policy, the aligning of lecturer management and requirements of a Knowledge enterprise university at Binus is conducted by:

1. The Directorate of Talent Management (TM)
While it reports directly to the CEO it has five functions reporting to itself as shown in Figure 5.

The Strategic Plan needs to cascade down to the various directorates, departments, section and individuals, so as to create the line of sight as shown in Figure 6.

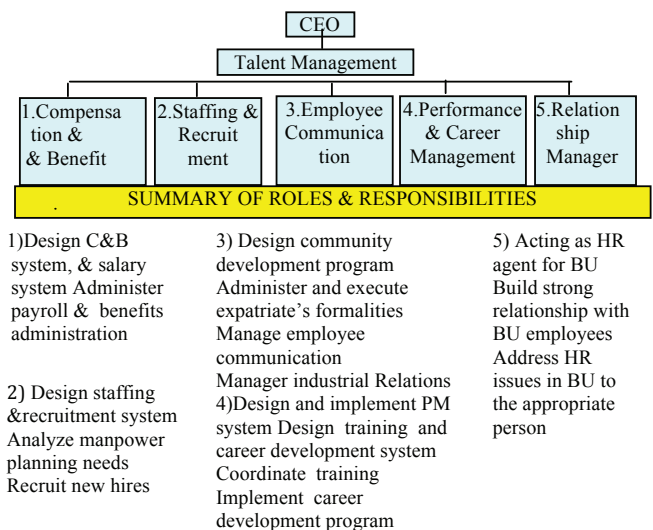


Figure 5. Organization of Directorate Talent Management

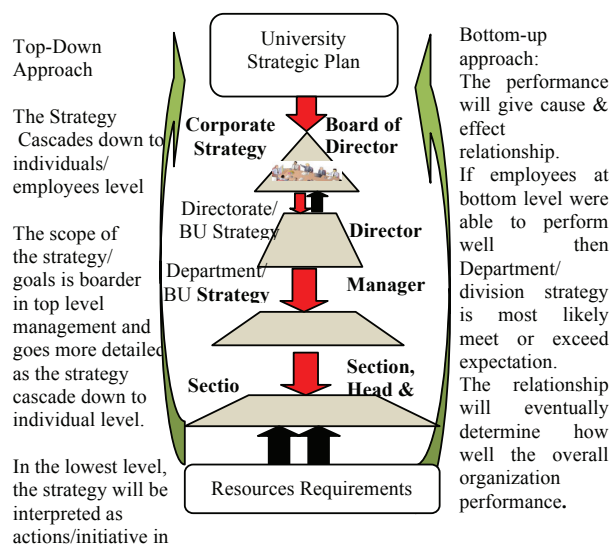


Figure 6 Cascading Strategic plan

2. Alignment Lecture Performance and University Strategic Plan (USP).

This is performed by cascading down to the Directorate, then to the employee or lecturer, thus lecturer's KPI are tied to the success of the University. Performance Appraisal evaluated through competencies and KPI are achieved, as shown in figure 7.

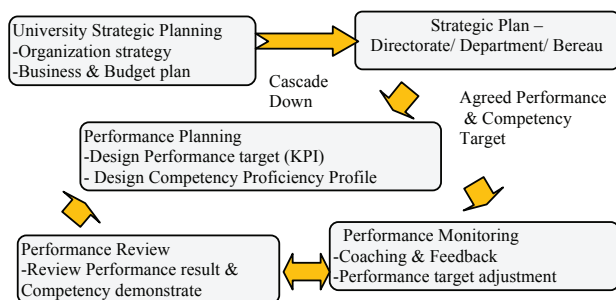


Figure 7. Aligning University Strategic Plan and Performance Appraisal

3. Management system for the lecturers is conducted using Competency Based Concept through Performance Appraisal (PA) with the outcomes shown by KPI (Key Performance Indicator).

Below is the table for lecturer's PA. IKAD is "Indek Kinerja Akademik Dosen" (*Efficiency Index for academics*) and it refers to lecturers' performance in teaching-learning, research publication, community service including Social responsibility activity and academic advising as shown in Table 2

TABLE 2 Faculty Performance Standard (BINUS data)

KPI factor	Target	Weigh	1	2	3	4	5	6
Teaching (IKAD Average)	> 3.00	50%	1,00-1,67	1,68-2,33	2,34-3,00	3,01-3,33	3,34-3,67	3,68-4,00
Publication (minimum 1 paper in National Conference)	2 Published Papers per Year total 4 points	30%	0	1	2	2	2	2
Community Service (CSR activity)	1 activity for each semester	5 %	0	1	2	2	2	2
Academic Advising	4 student/ Semester	15%	5	5	>6	10	10	10

4. Performance Appraisal should be linked with other HR activities such as Reward, Training and Career Development. Reward systems refer to methods used to set fixed and variable pay for the jobs in an organization. The 3P (Position, Performance, People) approach of the reward management system supports the University's strategy, mission and objectives. It is highly pro-active and is fully integrated into University management practices and business strategy. The 3-P system ensures that HRM plays a central role in management decision making and the achievement of University goals as shown in Figure 8

Based on Compensation System interview, the lecturer salary based on 3 payments:

a) Pay as the basic reward for the job. The amount depends on the lecturer's position .b) Pay for Competency, an allowance of lecturer's academic qualifications in accordance with government policy. c) Pay for result based on the achievement of KPIs or performance standard above.

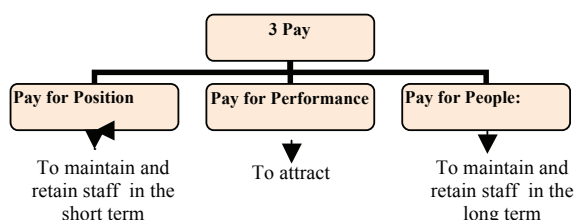


Figure 8: Pay for Position, Pay for Performance, Pay for People (Kusumastuti,2011)

VI.BINUS UNIVERSITY COMMITMENT TO SOCIAL RESPONSIBILITY (SR)

Social Responsibility (SR) is considered achieved at Binus through the application of an integrated KM and ethical Lecturers Management system, including the 3P mentioned earlier.

It was found that the application of KM develops a positive learning and knowledge sharing environment which leads to the implementation of SR (Simmons, 2008). For example Binus' staffs are involved in the *Teach for Indonesia* (TFI) program, a community education program (www.teachforindonesia.org) which would not have been possible otherwise.

VII. CONCLUSION AND IMPLICATION

HE must focus on creating and developing student and faculty as knowledge workers who can succeed and excel in a competitive global environment. KM in HE has become an integral part of the system with commitment from faculties, departments and all stakeholders of the university.

Knowledge creation is a human process gained through personal reflection, interactions and conducive environment. By managing knowledge, university can develop professional lecturers for long life learning commitment and who are efficient and effective. This is further supported by the implementation of ethical management practices as it will generate the targeted performance which in turn will contribute to SR especially at a time when the community in general views SR as a credible measure of the university's competitiveness.

Thus, by KMS that integrated with Performance Appraisal for knowledge-based reward of lecturer will enhance University Social Responsibility.

When this is achieved, we are then on the way towards Social Innovation a responsibility that appears to be shouldered by universities as well, although not too many universities realize this at the moment.

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Mapping the Recruitment Method of New Employees for Managing Job Preparation Program in Higher Education

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Abstract—

Recruitment is the process of capturing prospective employees and it is the first process before the selection process implemented by the company. Therefore, the success in the recruitment process is the first step for graduates to do job seeking. The purpose of this research is to map the recruitment activities by job seekers, and it also describes that the recruitment methods are often used by companies in capturing the prospective employees. There are two different methods of recruitment. The first is described as an active recruitment which consists of using information of existing workforce, approaching higher education institution, contacting colleagues, using database or career sites, through job fairs event, placing banners to attract applicants, and spreading information through any media. The second is called as a passive method. This method consists of putting advertisements in newspaper and company's web site, unsolicited applications, traineeship program and outsourcing to recruitment agency. This research conducted by means of a survey among 98 graduates from college in Surabaya, as job seekers. The sampling technique is convenience. Descriptive analysis is carried out to explain respondents' responses to recruitment methods. The result shows that job fair event as one of active recruitment method is most often followed by job seekers and the results also explained that internship in a company which is a passive recruitment is rarely joined by job seekers. It can be concluded that in applying company's active and passive recruitment

method should be related to the syllabus of job preparation program in higher education.

Keywords-- active recruitment, passive recruitment, job preparation program

INTRODUCTION

It is a fact that by having a reliable employee any organization can achieve the goal effectively and efficiently. This implies that to get a reliable person is the goal of human resource management. For that reason, careful selection of employees is considered the first step in human resource department (HRD) so that they can have employees who are competent. An optimal selection process can be successful if the available job for applicants is sufficient in the number of qualifications commensurate with the requirements of the job. In this case, the process of recruitment is a crucial process of an employee selection process.

The competition between universities or higher education (HEs) to gain recognition in the community requires HEs to be able to creatively make themselves distinct than others. This can be in terms of the new student admission system, educational and teaching activities, and all efforts to shorten the waiting period for graduates to get jobs. These are important because the quality of HEs can be measured by looking at how graduates can compete in the job market. In addition, HEs are considered sources of job seekers as well as for the recruitment process. Understanding the behaviour of applicants in choosing the way recruitment is

held by the company should also be known by HEs in order they can improve their effectiveness in planning the preparatory program of work for the graduates for employability and successful in the recruitment selection process.

LITERATURE REVIEW

Previous studies also provide evidence. For example, research conducted by Henkens, Schippers and Remery [1] also provides evidence. In this study, the researchers analyse the recruitment practices undertaken by the company. In that study, it was concluded that there are three strategies in the recruitment process, such as active and informal recruitment, recruitment through the internet, and formal recruitment. All these are described as in the following sections.

Employee Recruitment

Recruitment is a method to select the applicants in a recruitment process undertaken by the company. According to Bratton and Gold (2010) recruitment is defined as the process to get qualified individuals who are applying for jobs to the company. In this case, it is said to be effective when the recruitment is able to attract a sufficient number of applicants to attend the selection process. The accuracy of the method of recruitment carried out by the company must be an important factor in a response to applicants. Therefore, the information on the frequency level of recruitment methods should also be known by the job seekers and therefore, it is an important source of information for companies. This is good for planning the methods to be used in meeting the ratio of the number of applicants and the number of employees needed.

In connection with the process above, there must be an activity and the path of the recruitment process that can be classified two categories, namely active recruitment methods and passive recruitment methods [2]. First, active recruitment method is a method in which the company is actively caring for job seekers or applicants. So, the company is also actively seeking potential candidates through the approach in educational institutions, use of social networking company's employees, contacting partners, seeking applicants using the web site database of job seekers or career, following the job fair program, organizing the implementation of the recruitment in particular, placing a banner or vacancy information to attract job seekers. On the other hand, passive recruitment method is a

method to select applicants by waiting applicants to come to the company, advertising vacancies in media or in the company's website, offering the internship program, and using the bureau of labour or outsourcing.

Theory of Planned Measures

When there is a program in the Company for pursuing recruitment, it is salient to note the individual characteristics. One of the response characteristics by individual is that of the response that contains a differential element. In this case, a stimulus can cause more than a different response. For example, a theory of planned behaviour of Ajzen [3], suggests that individual attitudes affect behaviour through a process of making a careful and reasonable decision, which contains elements of a specific attitude toward things. It is also affected by certain norms and the belief about how difficult or easy it is to pass a behaviour, which will ultimately form the intention to behave in particular situation.

It is common that a recruitment which is carried out by the company can be considered as a stimulus condition. This stimulus may be responded differently by job seekers based on the specific attitudes that arise over the way recruitment is done by the company, beliefs about other people's expectations on the response to a particular recruitment method. Such a response comes from the job seekers. These can be in the forms of the following: sending a letter through the mass media, visiting the company directly, asking for references from colleagues, sending curriculum vitae to the company's web address or any other form of behaviour. Specifically, the researchers in this occasion, use the measurement by means of the intention to respond to the method of recruitment which is carried out by the company, both active recruitment methods and passive recruitment methods.

METHODOLOGY

This is considered a survey research in which the data used were gathered by means of survey with a sample of individuals [4]. Therefore, a questionnaire is distributed for collecting the main data [5]. Beside, it also uses design of explanations (explanatory research) because the aim is to explain causal relationships between variables through hypothesis testing. Furthermore, it employs a time-based data retrieval that is a cross-sectional research because the data related to the variables were

taken from the sample at a given moment, where the implementation of the study was conducted. This is intended to observe the variation between samples [5-6].

Next is that the thing concerning the population. They are the graduates' universities in Surabaya. From this, a sample was taken. The sampling technique is done by means of convenient sampling method based on availability and ease to obtain [4]. One of the advantages of this method is the execution time of the study which can be achieved relatively and quickly with low cost [6]. In addition, by convenient sampling method, it is able to contribute to the research survey [4]. These samples were used for confirmation and verification of the data. The number of sample units that are obtained is 100 respondents.

The questionnaire is equipped by having a confirmation from the respondents as in the answers given. The questionnaire is used to measure the variables developed by modifying existing instruments. Scales are arranged based on a Likert scale with five alternative answers of such as being "never, rarely, fairly often, often and very often done". The questionnaire contains 12 items that measure the experience of respondents in active or passive recruitment methods. Response to passive recruitment method was measured by the items from the company stating that the respondents send a letter job application via the printed media/newspapers, send letter of application via a company web, follow the recruitment process through internships in companies, send job application letter by visiting the company directly although there is no vacancy information.

Responses to active recruitment methods of the enterprise is declared by a statement indicating the respondents' response by sending a letter of application because of the references from friends that the company is opening a job, send the data themselves via the internet (eg on a job centre web-site), follow the recruitment process and send job application letter through job fairs, send a letter of job application based on the information of vacancies posted on banners or banners, send a letter of job application based on the info vacancies scattered through other sources of information such as pamphlets, brochures.

A good measurement is the measurement that fulfills the principle of measuring what is supposed to be measured or validity [7]. Validity testing is conducted by the

internal consistency approach to obtain the validity of the items. On the other hand, validity testing is done by correlating between the value of the items and a total value of the research variables with Product Moment correlation [6.8]. Significance level was set at 5%. By validity testing, it is intended to have all the items in the questionnaire in good validity.

In another occasion, reliability is also done. Reliability testing is important for seeing the extent to which instruments are used to provide consistent results over time. An instrument or questionnaire is said to reliable or reliable if the gauge is consistent or stable over time. Reliability test carried out by looking at consistency among items for homogeneity [7]. For example, it can be done by using the alpha formula. Interpretation of coefficient alpha is relative; there is no absolute limit as the lowest benchmark rate coefficients that must be achieved so that a reliable measurement said. However, the results of attitude scale reliability coefficient are as high as possible, within the range of 0.9. Therefore, the measurement is considered satisfactory [3]. Yet when coefficient is not high it can still be considered feasible in the case of certain measurements, especially if the results of the measurements are not for the basic decision-making for the individual measurement. Measuring instrument can be said reliably that the coefficient value is > 0.6 [8]. Therefore, reliability coefficient measuring instrument in this study is 0.875.

In search of such endeavour, the researchers should use the data both objectively and representatively with standard errors which should be small and relevant. This is expected to achieve the desired results and closer to the reality. The data used in this study is primary data in which they were collected and processed directly from the objects analysed. Be using questionnaire it the research made a list that contains a series of questions related to the problem. Data analysis was done by checking the completeness of filling the data has been collected, selecting feasible data, and then making data tabulation. In accordance with the purpose of research, data analysis was done by using descriptive statistical techniques, with the average mean.

FINDINGS

As based on the results, it was revealed that there is 67.3% female respondents and 32.7% male respondents with their education of upper secondary school by 4.1%; three-year study

program or undergraduate diploma of 13.3%; Bachelor degree of 81.6%, and a graduate of 1%. From the level of education, it is revealed that job seekers or graduates who undergone recruitment process mostly are the graduates. Most of them are 51% of graduates of state universities, and 49% of graduates from private universities. Therefore, there is nothing different in the percentage of the opportunity to get the recruitment process undertaken by the company. It is 84.7% of respondents that have never worked, still looking for work and 15.3% have experienced of working but looking for another job.

Other finding is that the actual recruitment process is not always responded by job seekers who never have working experience. But, it was also followed by job seekers who wanted to change another job. For that reason, it is important for companies to design an effective way of recruitment in order to get applicants really need jobs so that the company could get the applicants with superior performance. Thus, the applicants are not just of those who are looking for job without any reason.

The results also show that the method of recruitment is most often followed by job seekers. It suggests that it must also be followed by the process of recruitment through job fairs, in which this expectation is supported by the mean that is 3.14., with a frequency from quite often to very often for following recruitment that is by 73.5%. This method is one of active recruitments conducted by the company. The implementation of job fair is an activity to bring together job seekers meeting employers. When the graduates and the users are face to face in this event, the companies can obtain the applicants in accordance with the demands of qualified employees commensurate with the quality for the job. In more specific view, such methods get the response from the respondents in the form of participation in the recruitment process, because by using such method, they can also assess how the image of the company that will be applied for.

The response towards recruitment method is done by sending an application to the company via the web site. This is that of the passive recruitment which has frequency of quite often to very often that is by 57.1% (mean = 2.94). On the other hand, as frequently quoted that this method is done through an internship in a company, it is a passive recruitment with the mean of 1.48. The average level of response to other recruitment methods is done by sending the

data through the Internet with the mean of 2.94. Next is by submitting the application by reference to friends with the mean of 2.83, by sending the application with reference from their friends with the mean of 2.69, then by responding to vacancies as obtained from the campus notice board with the mean of 2.6., the print media with the mean of 2.6, pamphlets with the mean of 2.33, banner with the mean of 2.17. Beside, they also came to the company directly with the mean of 1.98, through job agency with the mean of 1.91.

CONCLUSIONS

It can be generalised that this study is good for the companies in which both active and passive recruitment methods are considered to have adequate response rate from the applicants. In this case, the applicants respond to the active methods such as job fairs, because they can directly meet the companies they are looking for. In addition, the recruitment and selection process can be directly performed in the area job fairs. Like the active method, the passive method is responded by the applicants when the methods are not complicated for them to do. Method of recruitment through the method of apprenticeship is still not too much done in the company, so the response to such methods is also small.

In terms of the HEs, the 12 types of recruitment methods attract the prospective employees in the company and this is considered to be a good inspiration for the development of program materials for preparing the job situation. Each method entails important points that should get attention from applicants, and therefore it should be put in the recruitment process conducted by the company. HEs are advisable to prepare a syllabus of materials in accordance with the interests by the applicants so that each method of recruitment can attract the graduates in the workforce more and more. This is important because of the high level of employment in the job is a form of social responsibility to the public such as the graduates, parents of graduates, and graduates of the users or community.

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The Effect of Alignment between Personal and Organization Ambition on Student Engagement and Satisfaction

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Abstract—

Students' engagement to their campus has a positive effect on campus image. In addition, alignment as a congruent condition between students' ambition and higher education institution (HEI) as an organization is an antecedent for students' engagement. Previous research revealed that when engagement as a condition is positive and persistent, this would affect students' motivation to support the HEI to achieve success and find out what they should do to achieve such a success. Students, as members of the HEI, should understand how to be a part of organization, so that they can dedicate their effort for a good achievement. Socialization of HEI's vision, mission, and value to the students is a way to make students' ambition alignment. The higher level of ambition alignment will make the higher students' engagement and satisfaction. This research involves students of business school as respondents. Utrecht Scale Engagement Work for Students (UWES-S) is used to measure students' engagement. Satisfaction variable is measured using Perceived Quality of Academic Life (PQAL). Alignment of student and organization ambition is measured using internal, external, knowledge and learning, financial, vision, mission, and goal dimensions. The results of this research can be used by HEIs to formulate strategies to align both students' ambition and organization ambition. It also provides the way how to increase students' engagement and make them more satisfied.

Keywords— Personal and organization ambition, Engagement, Satisfaction

Considering the student's interests in administrative activities of HE is an important thing because it can align the student's personal vision with organizational vision. Beside, such an activity or a mechanism should get attention from the HE. The harmony (a term used for students orientation program) would encourage the emergence of students' satisfaction. In this program, engagement and job satisfaction can be applied to student life on campus, namely in the academic work or task. More importantly, engagement and satisfaction can also be used by organizations as a predictor of academic performance and morale of students [3].

Based on the arguments above, the problem raised in this study is whether there is an influence of the alignment of personal ambition and students' ambition towards student engagement and satisfaction. The purpose of this study is to test the significance of the effect of alignment between personal ambition and organization ambition on student engagement and satisfaction. The objective of this research is to provide benefits for the development and the concept of personal ambition and organizational alignment, engagement and satisfaction. For HE, the results of this study can be used as a material consideration in formulating strategy and implementing a vision to all members of the organization including students as part of the organization. Thus, by doing so, there will be alignment or congruence between the organization vision and the vision of student. For researchers, the result of this study is supposed to provide them with insight and knowledge related to the research variables. In addition, the results of this study can be used for research and references to other researchers for further studies.

II. LITERATURE REVIEW

I. INTRODUCTION

Every organization, including Higher Education (HE) wants to achieve its competitive advantage. The engagement of the members of organizations is a good tool for reaching such goal. People who have engagement to organization will provide more energy to the organization, in the form of time and the maximum effort [1]. Engagement to the organization could arise if there is alignment of personal ambition and organization ambition [2].

1) Alignment of Personal and Organization Ambition

Personal ambition is a combination of personal vision and mission, and personal key roles. When individuals feel that their personal values are aligned or congruent with organizational values as reflected in what should be done by individuals, then the individual will feel that the work performed is meaningful and, therefore, will lead to engagement [4].

Dimensions of personal and organizational ambition alignment consist of the internal dimensions that reflect physical and mental condition as the external dimension of the quality of social relationships, i.e. relationships with family and friends. Other dimensions are knowledge and learning, the skills and ability to learn and the financial stability of [2]. Besides such dimensions, there are also vision, mission, values, success factors, objectives, target alignment and the alignment of the corrective action work. From these, alignment is reflected in how much the organization can accommodate those dimensions and how individuals perceive these dimensions.

2) Student Engagement

Engagement is a positive condition of individual motivations and feelings that are characterized by the spirit and energy, dedication, and absorption rates on the job [3].

Level of energy provided by individuals in carrying out the work is one illustration of the engagement to the job. This is consistent with the opinion of the Christian et al [5], which explains that the engagement is an individual condition that simultaneously provides the energy to perform the work or the tasks. In addition, mental toughness in facing difficulties in the implementation of tasks is also an explanation of the spirit dimension. Another dimension of engagement is the dedication, which is a strong psychological identification of the individual, which is characterized by feelings of meaning, enthusiasm, inspiration, a sense of pride and challenge in the face of the work. The third dimension of engagement is absorption, which is characterized by the existence of pleasure and concentration on doing the work, feeling the time passed quickly, and finding it difficult to abandon or release the job [6].

3) Student Satisfaction

Job satisfaction in the context of the research variables is related to the student satisfaction experience in doing assignments at the campus. Besides that, job satisfaction is a positive emotional state as a result of individual evaluation about work or experience in doing assignments, which describe the fulfillment of employment aspect and the perception that the work done is worth.

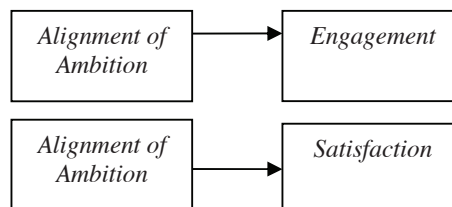
Job satisfaction can be measured by the feeling of how happy and comfort the members are, in carrying out their job. Therefore, student satisfaction is the satisfaction of major and positive feelings toward the educational process, satisfaction with the courses, and the positive feelings that exist during the learning process in the campus, satisfaction with college activities, and satisfaction with extra-curricular activities [3].

4) The relationship between Alignment of Personal and Organization Ambition, Student Engagement and Student Satisfaction

Alignment of personal ambition and organization ambition is an important aspect for encouraging individual engagement to the organization [2]. In addition, engagement to the organization is reflected by identification to the

organization value and the emergence of dedication to the organization and best efforts of individual potential.

Alignment of personal and organization values will lead to positive feelings or satisfaction. Based on the description above, the variable relationship can be described in the conceptual framework as the following.



5) Hypothesis

Hypothesis in this study are:

- H1: There is an effect of personal and organization ambition alignment on student engagement
- H2: There is an effect of personal and organization ambition alignment on student satisfaction.

III. METHODOLOGY

Research design in this study is a survey using the data collected from a sample of individuals [7], with the questionnaire as a means of collecting the main data [8]. Besides that, this study also uses the design of a causal relationship between the variables.

1) Population, Sample, Sample Size and Technique

Population is the students of Business College (STIE Perbanas Surabaya) who are in their last semester. They are selected for the sample as part of the population that is specifically and carefully chosen to represent their characteristics [7].

The sampling technique is done using convenience sampling, one of non random sampling methods. These members are freely chosen, based on the availability and ease consideration in obtaining them [7]. The advantages of this method are the execution time of the study that can be achieved relatively, quickly, and in low cost. In addition, the data taken is able to contribute to the research survey [7]. These samples are used for excavation, confirmation and verification of data. The number of samples consists of 100 respondents.

2) Variables and Operational Definitions

The variables in this study are as the following.

1. Alignment of Personal ambition and Organization Ambition is the perception of respondents regarding the alignment of personal ambition with the organization, measured by the dimensions of the internal dimensions, external, social relationships, knowledge and learning, vision,

mission, values, success factors, objectives, targets and alignment of corrective action.

2. Engagement is the perception of respondents about the spirit and energy, dedication, and absorption rates on the job or task.

3. Satisfaction is the perception of respondents associated with positive feelings as a result of the individual evaluation along work experience in the campus

3) *Instrument*

This study employs questionnaire to gain the response of respondents in correspondent with research variables. This questionnaire is developed by modifying the existing instruments. The preparation of instrument is based on indicators of research variables. Spirit, dedication, and absorption are indicators of engagement variables, measured by using a scale which is a modification of the Work Engagement Scale for Students (UWES-S) - from Salanova (2001) adopted from the study of Wefald and Downey [3]. The alignment of personal ambition and organizational ambition aspects are measured through indicators, consisting of internal and external factors, knowledge and learning, financial aspects, alignment of mission, vision, values, success factors, objectives, performance targets and improvement actions. Student satisfaction is measured by indicators such as being satisfied with the major subject they chose, the educational content, the learning process, and the training activities at the campus as well, and their extra activities available at the campus. The instrument modified from PQAL student satisfaction (Perceived Quality of Academic Life - Staats & Partlo, 1990 [3])

Instruments are arranged in the form of a Likert scale with 5 alternatives such as "strongly disagree, disagree, quite agree, agree and strongly agree"

4) *Reliability and Validity of Instruments*

The indicators showing that instrument is good and valid, whether it measures what it should be measured are important to be gained. Validity testing is conducted by the internal consistency approach to obtain the validity of items. This testing is done by correlating between the values of the items with a total value of the research variables using Product Moment correlation. Significance level is set at 0.05. All items to be measured are engagement variables (14 items), satisfaction variables (6 items) and alignment of ambition (16 items) to have good validity, so that no item is considered failed. By doing so, they can be used for subsequent analysis process.

Accuracy of the measurement procedure is called reliability [9]. This testing is intended to determine the extent to which the measurement instrument provides consistent results over time. It is carried out by looking at consistency between items or homogeneity among the items [i.e. using the alpha formula [9]. This testing can be said reliable when the coefficient value is > 0.6 [10]. Reliability of the ambition alignment instrument is 0.78 and that of engagement is 0.75.

Reliability coefficient for student satisfaction is 0.76. Thus, all the instruments used in this study have good reliability.

5) *Data and Data Collection Methods*

The data in this study is primary data, collected directly from respondents and then they are processed.. Primary data is a good data source, because the obtained information has no other interpretation for another benefit [9]. Data collection methods are by means of questionnaire that contains a series of questions related to the research variables. Respondents provide response as depicted in Likert type, with the five scales of categories, ranging from "strongly disagree, disagree, quite agree, agree and strongly disagree.

6) *Data Analysis*

The analysis is done by checking the completeness of the data filling, the feasibility of data selection, and data tabulation. Data analysis is done by using appropriate data analysis techniques, which is appropriate with the aim of the study. In this study, it is done using descriptive statistical techniques to clarify the respondents' description. Besides that, a regression analysis is also conducted to examine the relationship between research variables.

IV. FINDINGS

Descriptive analysis of respondents includes gender and age. The respondents are 34% male and 66% female, with 18-20 years of 45%, 20 - 23 years of 54% and 23 - 25 years of 1%.

The causal relationship of student ambition alignment and engagement is indicated that there is no significant effect that is of 0.5 (at a significance level of 0.05). Thus, the first hypothesis which states that there is influence of the alignment of personal ambition and organization ambition towards student engagement is acceptable. The determination coefficient is 0.25 which shows that the average value of student engagement of 25% is determined by the alignment of ambition. This means that the remaining 75% is determined by other factors. The existence of the alignment of personal ambition and organization ambition will inspire student to do their best for achievement, and this is creating their dedication to campus so that they feel more responsible for achieving superior performance and campus environment by improving their soft skill. It is understandable that given the environment that supports student learning process, it is of the antecedent condition for student engagement. Balance in life for students should get attention from the HE and those efforts are the responsibility of HE for their students as their users services. Besides, it can create a positive image for HE.

The test of a causal relationship between ambition alignment and student satisfaction shows that there is a significant effect of 0.53 (at 0.05 significance level). The second hypothesis which states there is an influence of the alignment of personal ambition and organization towards the student satisfaction can be accepted. The determination coefficient is 0.28 and this shows that the average value of

student satisfaction is in fact 28%. This is determined by the alignment of ambition, and the remaining 72% determined by other factors. The existence of alignment of personal ambition with organization ambition raises student satisfaction, in which they perceive that the campus provides them with meaningful support to the learning activities in the campus. This is reflected in the activities related to major, teaching-learning process in HE, and training activities- training that enhances the ability of students, as well as extra-curricular activities that can build their non-academic skills. By all having these things, the emergence of student satisfaction can automatically build the positive image towards the campus.

V. CONCLUSIONS

It can be generalized that alignment of ambitions with the engagement and student satisfaction can significantly influence the students' good image toward the college. For that reason, the college should implement the concept of the Personal Balanced Scorecard (PBSC) that translates organizational strategy and development plan of HE into personal improvement: their students. It is important to note that students need to be trained to create a vision, mission, personal values or personal ambition which is aligned with the ambitions of HE as an organization. The balance will occur if there is a combination of the fulfillment, such as the balance of physical and psychological needs. The existence of balancing activities between personal and organization ambition will explore the students' skills, self-knowledge, creativity, and critical thinking, problem solving, communication skills, interpersonal skills, time management, control of emotions and handling the pressure.

However, the researchers admit that there are some limitations in this study for examples, the number of samples

and convenience sampling techniques, thus generalizing of the research results is not maximized and therefore, further research needs to pay attention to such factors. Other suggestion for future research is that it is necessary to explore the relationship between attachment and satisfaction variables.

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What Happens to Organization Performance in the Dimension of Bundling Strategic Resource with IT Capabilities?

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Abstract—This study investigates why some organization persistently outperform others focusing less on industrial structure and marketing power, and more on the differential ability of some firms to more effectively and efficiently respond to customer needs. It aims to: 1) clarify the concept of IT capabilities, and 2) investigate the relationship between strategic resources and IT capabilities in supporting performance to develop a conceptual framework. The documentary analysis was undertaken because of the compelling issues regarding two topics follows: 1) literature identifies strategic resources in the nature of the Thailand business construct and 2) IT capabilities from dynamic capabilities theory and resource-based theory. The results of this study use the dynamic capabilities concept and resource-based views theory as the theoretical framework to develop in Expected Structure Equation Model (SEM). The SEM model shows the relationship between strategic resources and IT capabilities in supporting firm performance. The strategic resources bundled with IT capabilities in this research have four elements: Entrepreneurship, Innovativeness, Organizational learning, and Market orientation.

Keywords — Strategic resources, IT capabilities, Organization performance.

I. INTRODUCTION

Information technology (IT) plays an important role in the age of globalization, the competitive world in particular. IT poses new challenges and provides new competitive opportunities [12]. All business organizations are seeking to broaden their involvement into new international markets [29]. Furthermore, IT has also been mentioned for its possible role in creating sustained competitive advantages for organization [8]. As many companies have tried to harness e-commerce, businesses are required to re-define their roles and operations to better serve the changing needs of their customers [54]. There is no question as to the benefits offered by technology-IT applications that can reduce costs, enhance operational efficiency, and improve service quality [2].

Although the trend of Internet commerce is increasing worldwide in the use of Internet and Web technologies in online business [25] but several empirical studies exploring IT

and performance have revealed that IT adoption and implementation are not necessarily linked to superior performance. For instance, the adoption of the automated teller machine (ATM) in the banking industry did not positively correlated with performance [8]. Within five years of IT implementation, 70 percent of the firms had experienced competitive declines in terms of market share and profits. IT itself is no longer important [13], but the capability related with IT has become the key element to the success of business [14].

So, this study investigated why some organization persistently outperform others focusing less on the industrial structure and marketing power, and more on the differential ability of some organization to more effectively and efficiently respond to customer needs.

II. RESEARCH METHODOLOGY

The research methodology in this paper uses literature reviews and the documentary analysis method of Miles and Huberman [34], and Krippendorff [28]. The findings are presented in analysis description and illustrated in Expected Structure Equation Model. It aims to: 1) clarify the concept of IT capabilities, and 2) investigate the relationship between strategic resource and IT capabilities in supporting business performance to develop a conceptual framework. Besides, the documentary analysis was used by compelling issues in two topics follows: 1) literature identifies strategic resources in the nature of the Thailand business construct and 2) IT capabilities from dynamic capabilities theory and resource-based theory.

III. IT CAPABILITIES

The concept of IT capabilities is based on the dynamic capabilities concept [48] [49] [50] and resource-based theory [8]. Therefore, this paper reviews the past research in research-based views, dynamic capabilities and IT capabilities from JSTOR, Science Direct, Scopus, Business Source Complete, Emerald Full Text, and Google Scholar (see Table I for review from past research).

TABLE I A REVIEW OF PAST RESEARCH

Key words	Time	Total articles
Resource-based views	1991-2010	51
Dynamic capabilities	1994-2011	38
IT capabilities	1996-2011	10

From Table I, this paper categorized the contents of IT capabilities into four parts: historical periods of IT capabilities, meaning and definition of IT capabilities, IT capabilities measurement, and the relationship between IT capabilities, strategic resources, and performance.

A. Historical of IT capabilities studies.

In 1986, the competitive advantage from technology and others has been identified by Porter. At this point many scholars tried to create and sustain superior performance with technology, especially IT, such as the Internet and websites. Most research into the strategic implications of the firm's internal environment has been concerned with issues of strategy implementation and analysis of the organizational processes through which strategies emerge [18].

Barney [5] [6] [8] argued in resource-based theory-sustained competitive advantage derives from the resources and capabilities a firm controls. These resources and capabilities can be viewed as bundles of tangible and intangible assets, including a firm's management skills, its organizational processes and routines, and the information and knowledge it controls.

Later in the 1990s the concept of dynamic capabilities was developed and published by Teece and Pisano [48]. Dynamic capabilities emphasize two key aspects which were not the main focus in previous strategy perspectives. The term "dynamic" refers to the shifting character of the environment. The word "capabilities" emphasizes the key role of strategic management in appropriately adapting, integrating, and reconfiguring internal and external organizational skills, resources, and functional competences toward a changing environment. One well-known scholar in the dynamic capabilities concept, Ross et al. [42] explained the concept of "IT capability" for developing long-term competitiveness through IT assets.

B. Meaning and definition of IT capabilities.

Before the reviews of the meaning and definition of IT capabilities, the researcher reviewed the definition of 'capabilities' and 'dynamic capabilities' for understanding.

1) *Resource-based theory*: capability as the unique bundling of skills and resources that facilitate the execution of business processes, are what ultimately contribute to a sustainable competitive advantage and superior performance [15] [18] [51].

2) *Dynamic capabilities*: capabilities as the firm's ability to integrate, build, and reconfigure internal and external competences to address rapidly changing environments [50].

After clarifying the definition "capabilities", as used in resource-based theory and dynamic capabilities concept, this

paper then reviews the definition of IT capabilities from many scholars as shown in table II.

TABLE II DEFINITION OF IT CAPABILITIES

Study	Definition
Bharadwaj [9]	IT capability is defined as its ability to mobilize and deploy IT-based resources in combination or copresent with other resources and capabilities.
Ward [53]	IT capability-define and design information, application and technology architectures and organization structures and processes to manage the resource.
Bhatt [11]	Managing IT is a capability that can create uniqueness and provide organizations a competitive advantage.
Nakata[36]	IT capability is the ability of a computer system to store, process, and communicate information.
Muhanna [35]	The firm's capacity to leverage the potential of information technology by effectively deploying IT resources in combination or co-present with other resources in the organization.

From table II, the most scholars in capabilities research field [11] [14] [19] [31] [35] [36] [57] use Bharadwaj [9] meaning for the study in IT capabilities.

C. IT capabilities measurement.

Based on extent literature from many scholars [9][51], conceptualize IT capabilities as a multidimensional construct comprise of three critical and complementary resources: human resources (HR), IT resources (ITR), and business resources (BR).

D. The relationship between IT capabilities, resource and performance.

Most research from sources of sustained competitive advantage have focused either on isolating a firm's opportunities and threats, describing its strengths and weakness, or analysing how these are matched to choose strategies [5]. As for the internal analysis, firms must identify their strengths and weaknesses in resources, and capabilities [20]. These resources and capabilities can be viewed as bundles of tangible and intangible assets, including a firm's management skills, its organizational processes and routines, and the information and knowledge it controls [6]. A capability is the capacity for a set of resources to perform a task or an activity in an integrative manner. Capabilities evolve over time and must be managed dynamically in the pursuit of above-average returns [20], as shown in Fig. 1.

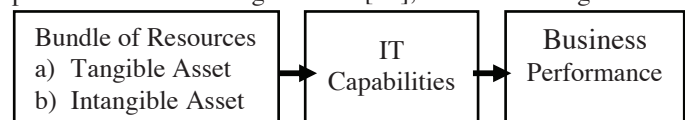


Fig. 1 The relation between resource, IT capabilities and business performance.

The relationship between a firm's resources and performance has been a major area of interest in strategic management research over the last 20 years, and resource-

based theory [4] [4]. However a few scholars studied method to bundling resource with organization's IT Capabilities, so this paper lead to manner of bundling strategic resources with IT capabilities for superior performance in short term and sustainable competitive advantage in a long term.

IV. STRATEGIC RESOURCE

In the past, an organization used resources for the input in I/O model. Most firms are assumed to have similar valuable resources that are mobile across companies [20] but strategic resources are valuable, rare, and difficult to imitate [22] and they can change temporary advantages from IT to a sustainable competitive advantage.

Organizations can improve performance through amassing and utilizing "strategic" assets and capabilities [22]. In resource-based theory, a firm's strategic resources, as sources of competitive advantage and superior performance, must be valuable in the sense of enabling a firm to exploit its environmental opportunities and/or neutralize its threats and making rare among the firm's current or potential competitors, costly to imitate, and without close strategic substitutes [55].

Barney (1986) found that an organizational culture can be a source of sustained competitive advantage. The culture of and organization is valuable, rare, imperfectly imitable, and not substitutable. It is one of a several attributes that differentiates one firm from another [8]. The organizational culture was defined as an ensemble of traditions, values, procedures, conceptions and attitudes that create the context of the activity within the organization [16]. In the context of strategic choice, a firm's culture can be considered to be valuable if it rewards risk taking and creativity and is in an industry where it is important to be an innovator and new product developer. For example, Sony, 3M, Motorola, and Apple Company are in an arena where innovation is a primary key to survival, and the firms would be best served by developing corporate cultures with behavioural norms that encourage innovation [26].

This paper focuses on organizational culture that is valuable, rare, imperfectly imitable, and exploited by the organization. The organization's culture can be separated in to four constructions: entrepreneurship, innovativeness, organizational learning, and market orientation.

1) Entrepreneurship:

a) Entrepreneurship definition.

Entrepreneurship, as originally conceived by Schumpeter, is crucial to economic development. Schumpeter made a distinction between entrepreneurship as a function and the entrepreneur as a person [23]. Aktan & Bulut [1] defined entrepreneurship as the set of organizational policies, processes, and characteristics whereby organizations try to actualize efforts for pioneering innovative ideas in its products, processes, structures and markets. In addition, the definitions of entrepreneurship cover a broad range of activities and processes, including the innovation and creation of an organization, creation of new visions, exploration of opportunities, and risk taking [38].

b) Characteristics of Entrepreneurship culture.

Entrepreneurship can be viewed as a characteristic of organizations and can be measured by looking at managerial behavior as the firm engages in the entrepreneurial process [37]. Over time, an organization develops an orientation towards entrepreneurship that becomes embedded in its culture. Some organizations embrace entrepreneurship more than others and this affects their orientations toward other competitiveness factors such as innovativeness, customers and markets, and learning [23].

c) Entrepreneurship measurement.

Entrepreneurship consists of three characteristics components: risk-taking (RT), autonomy (AU), and pro-activeness (PA) [38].

2) Innovativeness (I):

a) Innovativeness definition

Innovativeness was defined as the capacity to introduce a new process, product, or idea in the organization [21]. Tajeddini [47] suggested that innovativeness is conceived as one of the avenues to gain.

However, there is no real consensus on the meaning of innovativeness because it is a multi-dimensional composite variable composed of radicalness, relative advantage, and the number of innovations adopted [47].

Firm innovativeness is conceptualized from two perspectives. The first views it as a behavioural variable, that is, the rate of adoption of innovations by the firm. The second views it as an organization's willingness to change.

b) Characteristics of innovativeness culture.

The nature of innovativeness, it is the organization's cultural orientation (values and beliefs) towards innovation [23]. Innovativeness has often been shown as one of the most important strategic orientations for firms to achieve long-term success [47], which is the ability of the organization to successfully develop or adopt new products and processes. Firms that are simultaneously loosely and tightly coupled typically have an organizational culture with a strong set of core values—one of which encourages creativity and innovativeness [23].

c) Innovativeness measurement.

Innovativeness dimensions cover several aspects of innovation and affect organizational performance. One of the dimensions is 'innovating leadership: I', which is a very satisfactory dimension and shows a strong commitment to innovation [43].

3) Organizational Learning:

a) Organizational learning definition.

The concept of an organizational learning culture is derived from organizational learning (OL) and the learning organization (LO) concept, and refers to when an organization recognizes learning as absolutely critical for its business success [24].

Organizational learning was defined as an activity or as processes of learning [39] or developing new knowledge and

insights derived from the common experiences of people within the organization. Furthermore, it mainly influences behaviours and improves a firm's capabilities [43]. Organizational learning enables firms to create capabilities, and capabilities in turn form the basis for competitive strategies [56].

b) Characteristics of organizational learning culture.

From the logic of a resource-based view, an organizational learning culture seems to be a strategic resource [22] [46] and is related with IT capabilities [24] [56].

The characteristic of an organizational learning culture is derived from organizational learning and the learning organization concept. The concept of 'learning organization' focuses on the systems, principles, and characteristics of an organization that learns as a collective entity, while 'organizational learning' focuses on the actual process of how organizational learning occurs [24].

c) Organizational learning measurement.

The key dimensions which influence organizational learning [43] are depicted as a composite construct arising from the tangible first-order indicators of team orientations (TEO), systems orientations (SYO), learning orientations (LEO), and memory orientations (MEO) [22].

4) Market Orientation:

a) Market orientation definition.

Market orientation was first defined within the marketing literature as an organization-level culture comprising of values and beliefs about putting the customer first in business planning [41]. Consequently, market orientation is defined as understanding and meeting customers [27].

By definition, market orientation describes such actions as listening to customers and delivering solutions on the basis of the interests and wants of the customers' needs [33].

b) Characteristics of Market orientation culture.

Market orientation represents a specific firm-level resource that enables organizations to sense marketplace requirements and develop other capabilities that connect the organization to its external environment [2] [15]. Market orientation has positive effects on dynamic capabilities and firm performance [17]. Market orientation is a rare, valuable, and inimitable firm-level resource [15].

c) Market orientation measurement.

Narver and Slater [45] have proposed that market orientation consists of three behavioural components: customer orientation (CUO), competitor orientation (COO), and inter-functional coordination (IFC).

V. RELATIONSHIP BETWEEN STRATEGIC RESOURCES, IT CAPABILITIES AND PERFORMANCE.

This paper reviews the relationship among strategic resources, IT capabilities and performance. In addition, the researcher collected the correlation coefficient r and beta from empirical studies to trace the approach to bundle strategic resource with IT capabilities (as table III).

TABLE III RELATIONSHIP BETWEEN STRATEGIC RESOURCES, IT CAPABILITIES AND PERFORMANCE

Relationship (from \rightarrow to)	Correlations (r or β)	Relevant literature
E \rightarrow I	0.51*	[23]
E \rightarrow OL	0.730-0.818*	[47]
E \rightarrow 2 nd order OL	0.34-0.40*	[23]
• E \rightarrow 1 st order LEO (2 nd order OL)	0.35*	[23]
• E \rightarrow 1 st order MEO (2 nd order OL)	0.40*	[23]
• E \rightarrow 1 st order SYO (2 nd order OL)	0.34*	[23]
• E \rightarrow 1 st order TEO (2 nd order OL)	0.34*	[23]
E \rightarrow 2 nd order MO	0.54-0.61*	[23]
• E \rightarrow 1 st order COO (2 nd order MO)	0.54*	[23]
• E \rightarrow 1 st order CUO (2 nd order MO)	0.54*	[23]
• E \rightarrow 1 st order CUO (2 nd order MO)	0.69*	[30]
• E \rightarrow 1 st order IFC (2 nd order MO)	0.61*	[23]
E \rightarrow P	0.30*	[23]
I \rightarrow LO	0.51*	[21]
I \rightarrow MO	0.60-0.62*	[23]
• I \rightarrow 1 st order COO (2 nd order MO)	0.60*	[23]
• I \rightarrow 1 st order CUO (2 nd order MO)	0.60*	[23]
• I \rightarrow 1 st order IFC (2 nd order MO)	0.62*	[23]
I \rightarrow MO	0.24-0.36*	[21]
• I \rightarrow 1 st order COO (2 nd order MO)	0.24*	[21]
• I \rightarrow 1 st order CUO (2 nd order MO)	0.36*	[21]
• I \rightarrow 1 st order IFC (2 nd order MO)	0.30*	[21]
I \rightarrow Performance	0.47*	[21]
I \rightarrow Performance	0.28**	[33]
LO \rightarrow MO	0.84***	[38]
OL \rightarrow I	0.43**	[44]
OL \rightarrow 1 st order IT infrastructure (2 nd order ITC)	0.90**	[11]
OL \rightarrow Performance	0.820*	[40]
MO \rightarrow E	0.68*	[30]
MO \rightarrow I	0.56**	[33]
MO \rightarrow I	0.49-0.60*	[21]
• 1 st order COO (2 nd order MO) \rightarrow I	0.49*	[21]
• 1 st order CUO (2 nd order MO) \rightarrow I	0.60*	[21]
• 1 st order IFC (2 nd order MO) \rightarrow I	0.55*	[21]
MO \rightarrow LO	0.68*	[30]
MO \rightarrow EMC	0.373**	[51]
MO \rightarrow CRP	0.400**	[51]
MO \rightarrow Performance	0.29*	[30]
MO \rightarrow Performance	0.27**	[33]
MO \rightarrow Performance	0.265**	[51]
MO \rightarrow Performance	0.25**	[52]
ITC \rightarrow 1 st order CUO (2 nd order MO)	0.23*	[36]
ITC \rightarrow Performance	0.22*	[36]
E-Marketing capabilities \rightarrow P	0.026**	[51]

* $p < 0.01$, ** $p < 0.05$, *** $p < 0.001$

VI. PROPOSED MODEL

From the relationship among strategic resources, IT capabilities and performance are present in the Expected Structure Equation Model as shown in figure 2. Part of the reticular action model (RAM) symbolism in figure 2 is universal in SEM. This includes the representation in diagrams:






- Observed variables with squares or rectangles (e.g., , ).
- Latent variables with circles or ellipses (e.g., , .
- Hypothesized directional effects of one variable on another, or direct effects, with a line with a single arrowhead (e.g., ).

Figure 2 shows the important strategic resources: entrepreneurship, innovativeness, organizational learning, and market orientation merge with IT capabilities for developing the marketing performance (MP).

VII. CONCLUSIONS

All of strategic resources are intangible resource-organizational culture including having a characteristic as valuable, rare, and difficult to imitate. The combination strategic resource bundled with IT capabilities can improve organizational performance from a level of zero to a superior performance.

The information obtained from the study may accrue to the firm in Thailand. Additionally, other institutes can identify and create underlying core capabilities that enable continuous innovation and adaptation to changing environmental conditions.

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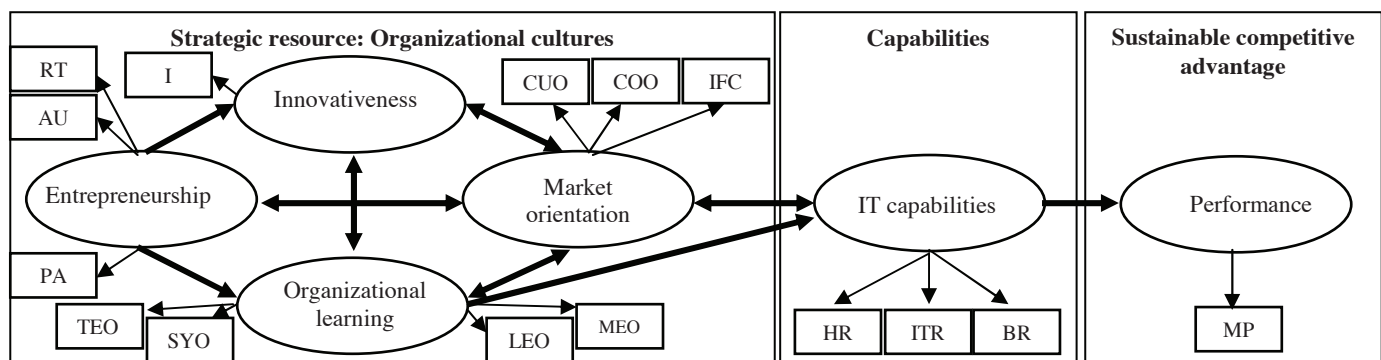


Fig. 2 Expected SEM model for combination strategic resource bundle with IT capabilities.

Developing and Improving the Quality of Learning Process in Higher Education By E-Learning (Moodle – Forum Software)

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Subtheme:

Educational and Technological Advances and Applications

Abstract: - Information technology eliminates the limitation of space and time that restricts the implementation of education, especially in higher education. One of the methods used to eliminate the problem is software of Moodle for Forum program. In Moodle – Forum a lecturer and students can teach, learn, and discuss the material of course without face to face. The purposes of the research are to understand the implementation of Moodle – Forum tried in STIE Perbanas Surabaya in accounting theory and accounting ethic courses and to know opinions of students attending courses on the implementation of the software. Methodologies used in the study are observation and involvement in the courses using the software and investigating students' opinions by questionnaire about the implementation of the software in courses. Students as respondents are one hundred and eight. The result of the study indicates that the learning process in higher education using Moodle – Forum software will develop and improve, especially in eliminating the limitation of space and time. The result also suggests that the minimal implementation in the course is twice in a semester and an advanced server is needed for a good implementation of the software.

Keywords: Information Technology, Moodle – Forum, asynchronous, accounting courses, student participation

I. INTRODUCTION

Now the information technology is an important tool in learning process. Almost all learning processes have used the information technology. Besides simplifying the implementation of learning process, the information technology is also a tool used to eliminate the limitation of space and time that restricts the implementation of education, especially in higher education. The information technology can help the implementation of the learning process without face to face interaction. One of the soft wares of the information technology used to help the learning process without face to face is Moodle – Forum soft ware. Now this soft ware begins to be offered to the lecturers to be implemented in courses.

The study is the development of the author's previous study on the implementation of learning process in higher education curriculum. The research purposes to understand the effectiveness of the implementation of Moodle – Forum soft ware to help the learning process of the higher education. The study wants to know opinions of students attending the courses on the implementation of the software.

II. LITERATURE REVIEW

A. Electronic technology as a learning tool and source

Globalization era has forced nations to see to information technology. For the nations, information technology is an important tool to improve international relationship. Especially, electronic technology can be used to accelerate the education improvement [1]. The evolution of modern information technology used in learning process has developed the traditional learning system. In the conventional learning process, the education is implemented in a special space and time. The traditional learning process doesn't be implemented if the lecturer can't be present in the class. It's a big problem in the conventional learning process.

But now the problem can be overcome. The information technology eliminates obstacles and difficulties of the learning process if the lecturer don't present in the class. By the information technology, the learning process can be performed without face to face interaction. Distance learning is now a growth industry in higher education. As new and more sophisticated educational technologies are developed, universities and colleges have the opportunity to expand the scale and scope of their operations [2].

Now, students also can look for knowledge without lecturer. By an information technology, students can obtain it from internet. Learning orientation is moved from teacher oriented learning to student centered learning. Shifting the paradigm changes educational orientation so can deliver high educational graduate to compete in globalization era. Students much use anything in their around as a learning source. Teaching is about providing opportunities for students to learn [3]. The electronic technology is also changing how we learn. Essentially, the human brain learns by processing information received through sensory channels from a vast array of sources [4].

B. Learning Process in Higher Education without face – to – face interaction

Now with the information technology, the learning process in higher education institution can be performed without face – to – face interaction. The learning process by face – to – face interaction is often expensive and not efficient, even ineffective.

One of the technologies preparing a tool or software for learning process without face – face interaction is Moodle – Forum software. The forum module is an activity where students and teachers can exchange ideas by posting comments. Forum posts can be graded by the teacher or other students. A forum can contribute significantly to successful communication and community building in an online environment. The education institution can use forums for many innovative purposes in educational settings, but teaching forums and student forums are arguably the two more significant distinctions [5].

Moodle – Forum is media where a lecturer can send his/her learning message by on line and students can ask or provide responses to the lecturer about learning materials. If the learning process concentrates in students, students or student groups having a task to present their presentation can use Moodle – Forum as a tool to deliver learning outcomes and other students or students' groups can ask questions and provide feedback or opinion. The lecturer can also give an explanation about the material discussed by students. By Moodle – Forum software the learning process can be performed without face – to – face interaction.

Moodle – Forum software is a kind of asynchronous communication tool. It's means that the implementation of Moodle – Forum doesn't be performed in the same time. Because Moodle – Forum is asynchronous, in a discussion students have much time to prepare questions or answers. They can design and rewrite until they are satisfied with the results. Many researches explained that students more willing to participate in asynchronous forum than to speak in synchronous forum in the class. For students not having a good language or shy students Moodle – Forum software gives many times to students to prepare or make their writing or response.

C. The advantages of Moodle – Forum as learning

Different from other information technology systems like Yahoo Groups, Gmail Groups, Moodle software is specific software for learning. This software can be free downloaded. Moodle software has some programs among others is Moodle – Forum. Moodle – Forum is designed for learning without face to face interaction. Moodle – Forum is not just e-mail media. Moodle – Forum display is shown in the picture below.

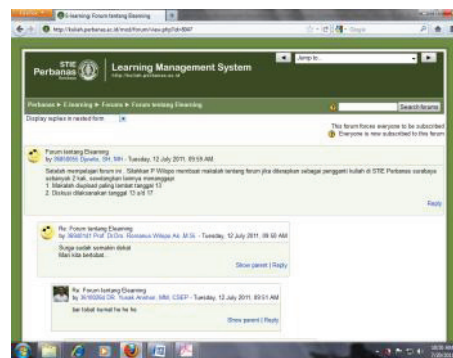


Fig. 1 Example of Moodle – Forum

III. RESEARCH METHOD

The study is an exploratory study. The aim of the study is to get information about the implementation of learning process in higher education by Moodle – Forum. This information can be used to make policy interrelating with the learning process in higher education.

A. Data collecting method

In this study, the observation method is performed to understand the implementation of learning process by Moodle – Forum. Furthermore, to understand the students' opinions and suggestions, the study uses questionnaire. The respondents are students of STIE Perbanas Surabaya attending lectures that using Moodle – Forum as a learning medium. The lectures are Accounting Ethic and Accounting Theory. One hundred and eight students are the respondents in the study. The questionnaire answers are used to know students' opinions and suggestions toward the implementation of Moodle – Forum.

B. Students' Characteristics Data

The study also observes the characteristics of the students' respondents. The students' characteristics observed are about gender, CGPA, comprehension to access to STIE Perbanas web, and how many time and where the students access the e-learning program.

C. Statistical Method

The study uses SPSS program to analysis and know data and information from respondents.

IV. IMPLEMENTATION OF MOODLE – FORUM AND DISCUSSION

A. The Implementation of Moodle Software in Higher Education Learning Process

STIE Perbanas Surabaya as a higher education institution has website named www.perbanas.ac.id. In this website there are some programs: news, web-mail, student information system, e – learning, and e – library.

Virtual screen of the website is pictured in figure no.2



Fig.2 Website of STIE Perbanas Surabaya

The learning process of the course is started by preparing course material by lecturer. The course material is taken from books, journals, and other sources with reference to the courses. The lecturer also prepares a learning contract of learning process. Usually the lecturer prepares it by using electronic technology program. In STIE Perbanas Surabaya the website address of learning management system is named <http://kuliah.perbanas.ac.id/>. This system uses “Moodle software”. It is free software. In the website, there are some facilities, among others is Forum.

STIE Perbanas Surabaya prefer Moodle - Forum because Moodle – Forum can be downloaded for free and easy application

B. The Learning Process by Moodle Software

Learning process using Moodle – Forum software is started by preparing course material by lecturer in learning contract determining when the Moodle – Forum is used. In the even semester of 2010 – 2011 the learning process by Moodle – Forum is performed in 12th meeting. In Moodle – Forum feature, learning instructions and rules with Moodle – Forum are explained. Different with the conventional learning process that usually uses 2.5 hours the time used in the learning process without face – to – face interaction is more than 5 days. The 12th meeting of Accounting Ethic course uses six days (June 2 – 7, 2011) and the 12th meeting of Accounting Theory course uses five days (June 6 – 10, 2011). The example of screen of learning instructions and rules is pictured in Figure no. 3.

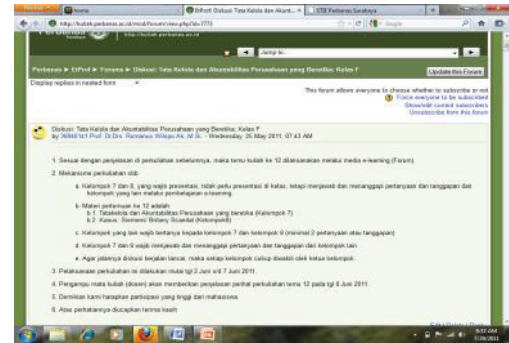


Fig. 3 Learning Instructions and Rules in Moodle – Forum

C. Students' Involvement

In the learning process using Moodle – Forum, the activity of learning is in the student. The lecturer is more as a facilitator and motivator. In 12th meeting the topic of Accounting Ethic course is Corporate Ethical Governance & Accountability with the Siemens' Bribery Scandal case. The topic of Accounting Theory course is Economic Consequences and Positive Accounting Theory.

Different from the learning process by face – to – face interaction that usually uses 2.5 hours the time used in the implementation of the learning process without face – to – face interaction is more than 5 days. It is accordance with the asynchronous concept of Moodle – Forum. Then the discussion is more intensive because each student's group prepares and learns the material of 12th meeting better. The form of discussion process is pictured in Figure no.4.

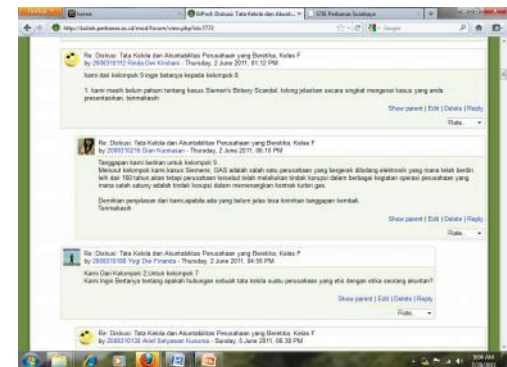


Fig. 4 Discussion Process with Moodle – Forum

Compared with a conventional learning, the learning process with Moodle – Forum makes students more active. There are more than fifty debriefing between students in the 12th meeting. It is different from discussion in the class that usually only twenty four debriefing. It is means that the increasing of student's activities will make the student's understanding about the learning material better than the conventional or face – to – face learning. Beside that advantage, the other advantage of Moodle – Forum is saving

the use of space and its facilities because the learning process is not performed in the class.

D. Difficulties and Obstacles of Moodle – Forum Implementation

Beside of Moodle – Forum advantages there are some difficulties and obstacles of Moodle – Forum implementation. There are:

1. The difficulties:
 - a. If the server of information technology is trouble in connection, the learning process will be disturbed.
 - b. Because the discussion is carried out only by the chair of student's groups there are many complains of the member's groups that fell excluded in the discussion process.
 - c. Although e-learning software, especially Moodle – Forum, is available in STIE Perbanas Surabaya, many lecturers don't utilize the program.
2. The obstacles:
 - a. The consequence of the trouble in the server, then there is the obstacle or barrier in the fluency of learning process.
 - b. Because the discussion only performs between the group leaders, many group members only act as spectators or watcher.
 - c. Because many lecturers don't utilize Moodle – Forum, then the implementation of e-learning program is overall obstructed

E. Opinions and Suggestions from students

Total of students attending Accounting Ethic and Accounting Theory courses using Moodle – Forum in 12th meeting in even semester 2011 – 2012 are one hundred and seventy five. From one hundred and seventy five students is taken one hundred and eight as research samples.

F. Summary

The research result indicates that the implementation of the learning process in higher education without face – to – face interaction is one of the ways of a successfulness of the learning process. The successfulness depends on the student understanding about the information technology. Beside the student understanding about the information technology, the success of learning process without face – to – face interaction depends on an availability of advance software used for the learning process without face – to – face interaction. One form of software to learn without face – to – face is Moodle – Forum software.

1. Students Character

Table 1 shows the samples' character interrelated with the information technology.

- Seven opinions and suggestions explain that it is better if the lecturer mediates if there is a prolix

discussion, not only he/she gives the explanation in the end of the discussion.

TABLE 1
STUDENTS CHARACTER

Gender	Respondents	%
Male	32	29.6
Female	76	70.4
	108	100
CGPA	Respondents	%
Not answer	27	25.0
2.00 – 2.49	1	0.9
2.50 – 3.00	8	7.4
3.01 – 3.50	45	41.7
3.51 – 4.00	27	25.0.6
	108	100
Knowing web of STIE Perbanas Surabaya	Respondents	%
Yes	108	100
No	0	0
	108	100
Knowing web of e-learning	Respondents	%
Yes	108	100
No	0	0
	108	100
Many times to access e-learning per week	Respondents	%
1 time	1	0.9
2 – 3 times	25	23.1
4 – 5 times	37	34.3
> 5 times	45	41.7
	69	100
Places to access e-learning	Respondents	%
1. House	39	36.1
2. Campus	34	31.5
3. Internet Rentals	3	2.8
4. House & Campus	14	13.0
5. House & Int Rent	1	0.9
6. Campus & Int Rent	3	2.8
7. House, Campus & Int Rents	14	13.0
	108	100

2. Student's Opinion and Suggestion about the implementation of Moodle – Forum

In the last meeting, the students are asked to answer a questionnaire about their opinions and suggestions of the implementation of Moodle – Forum in accounting course. The Opinions and the suggestions of students as followed:

a. Opinions

Students' opinions about Moodle – Forum are tabulated in table 2.

TABLE 2
STUDENTS' OPINION ABOUT MOODLE – FORUM

Statements about Moodle – Forum	Strongly agree and agree
The learning process by Moodle – Forum can help to understand the material course without face – to – face interaction	24.1% strongly agree
	65.7% agree
Preparation for asking or give opinion and feedback by Moodle – Forum is better than learning in a class	38.9% strongly agree
	59.3% agree
The learning process by Moodle – Forum improves coordination in student group	19.4% strongly agree
	44.4% agree
Discussion in learning process by Moodle – Forum is going more deeply than discussion by face – face interaction	13.9% strongly agree
	46.3% agree
The learning process by Moodle – Forum is more efficient than the conventional learning process	39.8% strongly agree
	48.1% agree
We isn't difficult to implement learning process by Moodle – Forum	22.2% strongly agree
	67.6% agree
Now the learning process by Moodle – Forum is most important and useful to support the success of the learning process in higher education institution	37.0% strongly agree
	53.7% agree
It's better if the learning process by Moodle – Forum in STIE Perbanas performs twice in a semester	48.1% strongly agree
	49.1% agree

The TABLE 2 explains that many respondents agree with the implementation of e-learning using Moodle – Forum.

b. Suggestions

The suggestions from students are one hundred and thirty three. There are some students giving more than one suggestion. The suggestions can be grouped as follows:

- Sixty three opinions and suggestions suggest that Moodle – Forum is implemented in every course minimal once in semester, because it can save cost and more efficient. The student understanding about material course is better because the implementation of course by Moodle – Forum is longer than the face – to – face course.
- Thirty four opinions and suggestions explain that the implementation Moodle – Forum is need to be supported by good server and sophisticated system, so the users or the students is comfortable in discussion.
- Twenty nine opinions and suggestions suggest that in discussion all members of group can ask and give opinion, not only the chairman of the group.

From the observation and the answer of questionnaire to the students it is known that 88% - 98% the students agree that:

- The learning process by Moodle – Forum can help to understand the material course without face – to – face interaction
- Preparation for asking or give opinion and feedback by Moodle – Forum is better than learning in a class
- The learning process by Moodle – Forum is more efficient than the conventional learning process
- Implementation of learning process by Moodle – Forum is not difficult
- Now the learning process by Moodle – Forum is most important and useful to support the success of the learning process in higher education institution
- The learning process by Moodle – Forum in STIE Perbanas is performed twice in a semester

Although the students argue that Moodle – Forum is very usefulness in the learning process, there are some difficulties in the implementation. The difficulties are:

- If the server of information technology is in trouble in connection, the learning process will be disturbed. Because of that it is needed early to prevent problems in connection of information technology.
- Because the discussion is carried out only by the chair of student's groups there are many complains of the member's groups that fell excluded in the discussion process. The solution of the problem is by displaying the name of member's group asking or giving an opinion through the chairman of the group.
- Although e-learning software, especially Moodle – Forum, is available in STIE Perbanas Surabaya, but many lecturers don't utilize the program. The management of STIE Perbanas Surabaya must obligate the lecturer to use the Moodle – Forum in his/her learning program.

Based on observation during the implementation of the learning process without face – to – face and accordance with opinions and suggestions of the students, it is expected that:

- Moodle – Forum is implemented in every course minimal once in semester, because it can save cost and more efficient. The student understanding about material course is better because the implementation of course by Moodle – Forum is longer than the face – to – face course.
- The implementation Moodle – Forum is need to be supported by good server and sophisticated system, so the users or the students is comfortable in discussion.
- In discussion all members of group can ask and give opinion, not only the chairman of the group.

- It is better if the lecturer mediates if there is a prolix discussion, not only he/she gives the explanation in the end of the discussion.

V. CONCLUSION

Based on the research result toward the implementation of the learning process in higher education with using Moodle – Forum software, can be concluded that:

- a. Moodle – Forum is an efficient information technology tool for learning process in higher education. The software is cheap because this software can be free downloaded. Then Moodle – Forum can be effectively used in the learning process without face – to – face.
- b. But the learning implementation with Moodle – Forum can be performed well then the students that attend the course with this software must understand the information technology and Moodle - Forum must be supported by server and the advance information technology.
- c. The implementation of the learning process will effectively perform if in discussion all members of group

of the students can ask and give opinion, not only the chairman of the group. It is better if the lecturer mediates if there is a prolix discussion, not only he/she gives the explanation in the end of the discussion.

- d. The higher education institution must obligate the lecturer to use the Moodle – Forum in his/her learning program.

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The Effectiveness of EQ Intervention Program (EQuIP) in Strengthening the Emotional Competence of Transnational Students with Absentee Parents

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Abstract—This study determined the effectiveness of an Emotional Intelligence Intervention Program (EQuIP) in strengthening the emotional competence of transnational students with absentee parents. This study was anchored on Mayer's theory of emotional intelligence that focuses on skills that can be acquired through learning and experience. The EQuIP tapped the experiential and strategic dimension of emotional intelligence. The format of each session applied the 5As' of learning process namely: activity, analysis, abstraction, application, and affirmation. Two-stage sampling was applied in the selection of the 66 total transnational student participants living inside the campus dormitory. They were returning students with absentee parents due to overseas works. The Experimental Method using Pretest-Posttest Control Design was utilized in this study. The experimental and control groups had the same level of emotional competence before the EQuIP. The difference between the emotional competence of the experimental group before and after the EQuIP was found statistically significant. In contrast, the results revealed that the control group showed no significant increase in the level of emotional competence. The emotional competence of the experimental group improved after EQuIP in comparison with the control group. These findings reveal that EQuIP is effective in strengthening the emotional competence of the participants.

Keywords— EQ Intervention Program, emotional competence, emotional intelligence, adolescents of Overseas Filipino Workers (OFW), transnational students, absentee parents

I. INTRODUCTION

Addressing emotional intelligence is one of the most important things a school can do to prepare its learners for life characterized by rapid changes fuelled by the continuous improvement in technology. Colleges and universities are impliedly tasked to cultivate and enhance emotional intelligence of their students. If the emotional intelligence of students is improved then this would enable them to achieve better and improve their social emotional skills [12]. Ultimately, emotionally intelligent people are able to effectively manage personal, social and environmental changes by realistically and flexibly coping with the immediate situation and solving problems of an interpersonal nature [1].

Reference [10] mentioned that the transnational family undergoes substantial changes with the growing number of mobile people who are willing to abandon their country in search of work. Links across borders bring about the ambiguities of living apart like stress, potential anxiety and retrogressing emotional concerns between the transnational parent and their children. Adolescents have become even more either vulnerable or resilient as a result of the continuing global migration and Filipino diaspora. Parents and educators need to perform caregiving and teach with intelligence if children are to develop the skills and discernment needed to cope with the complexities of an increasing globalized world.

Hence, this study is in response to the call of the times to find various courses of actions to address the pressing emotional concern of transnational students with OFW parents or absentee parents who are living in transnational mode. Moreover, there is dearth in related studies specifically among adolescents enrolled in College on the area of emotional competence, transnational set-up, and distant parenting. Thus, it is found worthy to deal on them. The education of the children has become a major "project" requiring the relocation of one or more members of the family in a different country. At the same time, as the family is by no means a monolithic unit, it is expected that transnational projects undertaken by the family will encounter sources of tension and discord among family members [4]. De La Salle University - Dasmariñas provides on-campus residence for DLSU-D students. Going away to college can mean major lifestyle changes for transnational students who are living away from home for the first time. Dormitory living can make the transition easier, combining the opportunity for freedom and fun with reassuring comfort and security. It is in this premise that this study was undertaken to determine the effectiveness of an Emotional Intelligence Intervention Program in strengthening the emotional competence of selected transnational students with absentee parents as a result of overseas works.

For a better understanding of the study, Figure 1 demonstrates the paradigm of Emotional Intelligence Program (EQuIP).

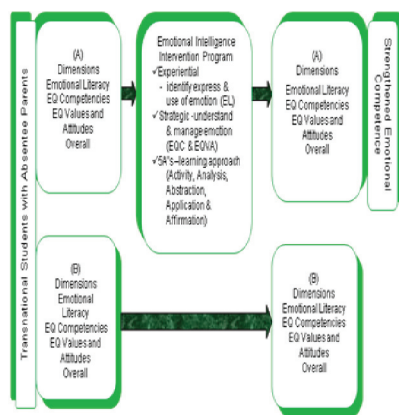


Figure 1. Conceptual Paradigm of the EQ Intervention Program (EQuIP) to Strengthen the Emotional Competence of Transnational Students

The paradigm exhibits the variables considered in this study. These variables were selected on the premise that emotional intelligence can be developed by most individuals to increase performance in many areas of life [1]. Eventually, participants who are emotionally intelligent are able to understand and express themselves, to understand and relate well with others and to successfully cope with the demands of daily life. It is assumed that after the implementation of EQuIP, the level of emotional competence will be strengthened or improved significantly among the participants in the experimental group (A).

II. RELATED LITERATURE

Several points can be noted given the reviewed literature. Foremost, considering the rapid growth of EQ related literature, there is a need for a better understanding of the Emotional intelligence vis-à-vis emotional competence as pointed by [7], [3] and [1]. Second, studies by [6] connect emotional intelligence and emotional competence skills as colleges prepare students for positions of responsibility and leadership. Emerging trends and issues point out the need for new outcome research to document the effectiveness of schools, colleges, and organizations. There is an increased interest and recognition of the contributions of the emotional mind. In short, learning and applying emotional intelligence skills Earlier studies by [5] as supported by [2] indicated that the theory of emotional intelligence provides a new framework and it focuses on emotional skills that can be developed through learning and experience, and posits four central abilities: perceiving, using, understanding, and managing emotions. This was supported by Brackett who developed a program called Emotional Literacy in the Classroom (ELC) to teach the RULER skills of emotion (Recognize, Understand, Label, Express and Regulate) to children from kindergarten to high school [2]. According to reference [5], the concept of emotional intelligence has inspired numerous school-based programs of social and emotional learning interventions that emphasize emotional competencies, such as PATHS (Promoting Alternative Thinking Strategies), as well as management training programs. Whereas Salovey and Mayer proposed a theory

narrowly focused on emotional skills, others have written about emotional intelligence as a general capacity for emotional adaptation, or as an umbrella term to designate a wide array of competencies. The study of [11] examined the impact of a campus wide Emotional Intelligence intervention program on freshmen students at a South Texas institution of higher education. Reference [9], [11] and [8], gave support for the effectiveness of an EQ Intervention Program based on emotional intelligence as a learned ability to identify, experience, understand, and express human emotions in healthy and productive ways. The local study of [12] is based on the grounds that emotional competence is learnable and more effective social skills if improved. These foreign and local literature provided an increased recognition of the importance of the contributions of the emotional mind which in short, learning and applying emotional intelligence skills. Finally, the studies conducted abroad regarding EQ from different universities provided sufficient amount of information for the present study. They served as a frame of reference for the study on hand. Further, it also highlighted the dearth of local interventions as well as training program on emotional intelligence to enhance emotional competence among college students with absentee parents. Hence, the reviewed studies contributed to the essential execution of the present experimental study characterized by the introduction and administration of the EQ Intervention Program for selected transnational students enrolled in tertiary education. The focus of the EQ intervention program of the current study is to train participants using emotional intelligence approach based on the premise that one learns best by drawing from the experiences of the participants themselves. In relation to this, the studies served as foundation to the present research in its aim to explore those factors locally. Interestingly, only limited number of studies have been conducted in the Philippines regarding emotional competence for selected population and none was particularly done for the college transnational students. Much of the study and literature were done using elementary and high school population.

III. METHODOLOGY

The experimental method using the pretest-posttest control design was employed in this study. This allowed for the comparison of the subjects' condition before and after the administration of the EQuIP. This study utilized a true experimental design in which the participants were randomly assigned to experimental and control groups. The experimental workshop permits for the comparison of the participants' EQ dimensions before and after the intervention sessions through the use of EQ Map Questionnaire. The t-test for dependent and independent samples were used to allow for the comparison between experimental and the control group in terms of significant difference between their pretest and posttest scores. In addition, a calculation of effect size using Cohen's d was conducted to provide an extra measure of the significance of these findings. The study included all the DLSU-D dormers who experienced transnational set-up with absentee parents due to overseas work. They were male and

female college students from different programs, randomly assigned in the experimental and control groups using two-stage sampling from the total DLSU-D dormers' population of 522. The DLSU-D dormitory had a total of 118 qualified participants. There were 66 total participants classified with vulnerable and caution performance level during the pretest of EQ Map Questionnaire.

IV. DISCUSSION AND RESULTS

The phenomenon of families living far apart is not new and there are many families leading transnational lives worldwide. Hence, the term transnational student was taken from the transnational family member who is away from them across international border to study. College freshmen have to quickly become more independent, adaptable, socially adept, assertive, self-confident, and self-controlled in order to succeed. Their environment, responsibilities, rights, and challenges change significantly when they enter college.

It can be gleaned from the scores in Table I that before the implementation of EQuIP, the experimental and control groups had a similar vulnerable level of performance zone obtained on the dimension of EL, EQC, EQVA and Overall. This means that though both experimental and control groups possess some of the EQ skill, their EQ is unstable. In the current study, the top three scales with poorest and lowest performance zone were emotional expression (vulnerable), interpersonal connection (caution) and personal power (caution). This signifies that in all of the EQ scales of the participants, these scales were the most problem areas. One possible reason is that the participants are at-risk students with absentee parents due to overseas works. Most of the time, they communicate with their parents via chatting, video conference or long distance calls.

TABLE I
SUMMARY OF THE EQ SCALES AND DIMENSIONS BETWEEN THE EXPERIMENTAL AND CONTROL GROUPS BEFORE THE EQuIP

EQ Scales and Dimension	Experimental Group			Control Group		
	Mean	Std. Dev.	Verbal Interpret	Mean	Std. Dev.	Verbal Interpret
Self-Awareness	18.32	2.61	Vulnerable	19.30	2.69	Vulnerable
Emotional Expression	14.9	2.59	Vulnerable	14.6	2.00	Vulnerable
Emotional Awareness of Others	23.26	4.36	Vulnerable	22.74	3.95	Vulnerable
Emotional Literacy (EL)	18.53	2.28	Vulnerable	18.88	1.61	Vulnerable
Intentionality	25.23	4.33	Vulnerable	26.2	3.91	Vulnerable
Creativity	20.68	4.57	Proficient	19.29	4.29	Proficient
Resilience	26.22	5.99	Vulnerable	26.03	3.89	Vulnerable
Interpersonal Connection	16.42	3.49	Caution	16.6	2.90	Caution
Constructive Discontent	23.68	3.31	Vulnerable	23.09	3.70	Vulnerable
EQ Competencies (EQC)	23.10	3.05	Vulnerable	22.24	2.21	Vulnerable
Compassion	21.61	3.25	Vulnerable	20.8	2.59	Caution
Outlook	18.77	3.68	Vulnerable	17.63	4.09	Vulnerable
Imitation	23.16	3.36	Vulnerable	22.83	3.70	Vulnerable
Trust Radius	18.26	3.39	Vulnerable	17.66	2.55	Vulnerable
Personal Power	21.55	3.29	Caution	19.51	3.30	Caution
Integrity	15.22	3.41	Vulnerable	15.43	1.85	Vulnerable
EQ Values & Attitudes (EQVA)	19.76	2.80	Vulnerable	18.99	1.66	Vulnerable
OVERALL	20.49	1.96	Vulnerable	20.12	1.59	Vulnerable

Lastly, the results revealed that the participants are deficient in terms of meeting the challenges in their college lives away from their parents. Some participants lived out of the dormitory and opted to stay with relatives.

Figure 2 illustrates the emotional competence mean scores between the experimental and control groups before the EQuIP.

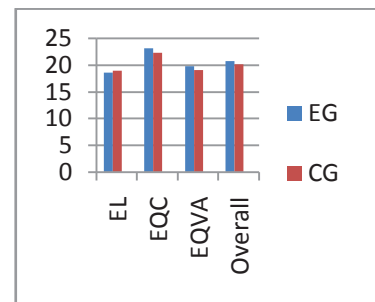


Figure 2. The Emotional Competence Mean Scores Between Experimental and Control Groups Before the EQuIP

As illustrated in the graph, the experimental group (20.69) had higher overall mean scores in the emotional competence when placed side by side with the control group (20.12) before the EQuIP. Both groups had the same vulnerable level of performance zone. Although, both groups had similar vulnerable level of performance zone, the result specifies that before the EQuIP, there was a small variation in both groups as reflected in figure 2. The overall mean score of the experimental group was slightly higher than control group with a difference of 0.57. This difference is not statistically significant. The slight difference can be attributed to the cultural background of the participants being transnational students who were exposed to various culture overseas.

TABLE III
DIFFERENCE IN THE EMOTIONAL COMPETENCE OF THE EXPERIMENTAL AND CONTROL GROUPS BEFORE THE EQuIP

Dimensions	Before EQuIP	
	t-test	p-value
EL	-0.73	0.47
EQC	1.48	0.14
EQVA	1.73	0.09
Overall	1.34	0.19

The results of the pretest on EQ Map Questionnaire before the EQuIP yielded a vulnerable performance zone in all the dimensions among the participants. As observed before the implementation of the EQuIP, the participants lack the ability to effectively apply emotions as a source of information, trust and influence. Some participants expressed that they would like to connect with other dormitory occupants especially transnational students. Other students grabbed the opportunity to find support group inside the campus while other students looked for an outlet to divert their current emotional concerns. Hence, learning how to be emotionally intelligent is not simply an issue for students from different backgrounds, it is a lesson that benefits all students. Furthermore, the findings of the present study only illustrated that the level of emotional competence in terms of EL, EQC, EQVA and Overall of both experimental and control groups before the EQuIP have comparable results showing homogeneity among the level of performance zone of the participants and therefore are equally distributed in the two groups.

Table III reveals the t-tests' p-values for comparison of the scores before and after EQuIP in the experimental and control groups.

TABLE IIIII
DIFFERENCE BETWEEN THE EMOTIONAL COMPETENCE OF THE
EXPERIMENTAL AND CONTROL GROUPS BEFORE AND AFTER EQuIP

Dimensions	A (N=31)		B (N=35)	
	t-test	p-value	t-test	p-value
EL	-5.352	.000	-0.781	0.440
EQC	-3.244	.003	-0.994	0.327
EQVA	-5.229	.000	-0.608	0.547
Overall	-6.117	.000	-0.956	0.346

The difference between the emotional competence of the experimental group before and after EQuIP was found statistically significant. All the p-values of experimental group (A) were less than the significant level ($p \leq 0.05$). This implied that the level of emotional competence of those participants in the experimental group were significantly higher after the intervention. The present study guided the participants to discover target areas for improving emotional intelligence using the 5A's of experiential approach. Another major component was instruction and training in emotional literacy (EL). The subscale on self-awareness has the highest noted improvement while the subscale on emotional expression in this dimension obtained the lowest mean scores. Likewise, the subscales on intentionality and resilience in the dimension of EQ Competencies (EQC) manifested a noticeable improvement. Participants learned about the different models of emotional intelligence and its application to their transnational lives. Similarly, the value of improving emotional and social skills as reflected in the subscale on personal power in the dimension of EQVA yielded a marked improvement as well. Exercises like picture perfect, completed thoughts, moody blues and describing emotions to each other, and other activities were used. Training in managing emotions was further supplemented by Attribute Web and Guided Fantasy. Participants were also given feedback on their emotional competence scores. In contrast,

Table III reveals the t-tests and p-values for comparison of the scores before and after EQuIP in the control group. As reflected in Table III since the p-values are all greater than 0.05 level of significance, therefore there is no significant difference in the emotional literacy (EQL), no competencies (EQC), values and attitudes (EQVA) and overall before and after the intervention in the control group. The results revealed that the control group showed no significant increase in the level of emotional competence. This implies that without the intervention program there was no significant increase in the level of their emotional competence.

Table IV shows the descriptive statistics as reflected by the mean and standard deviation summary of the EQ scales and dimensions of EQ Map between the experimental and control groups after the EQ Intervention Program (EQuIP).

TABLE IVV
SUMMARY OF THE EQ SCALES AND DIMENSIONS BETWEEN THE
EXPERIMENTAL AND CONTROL GROUPS AFTER THE EQuIP

EQ Scales and Dimension	Experimental Group		Verbal Interpret	Control Group		Verbal Interpret
	Mean	Std Dev		Mean	Std Dev	
Self-Awareness	20.58	3.41	Optimal	19.03	3.26	Proficient
Emotional Expression	15.29	1.95	Vulnerable	14.51	1.96	Vulnerable
Emotional Awareness of Others	25.81	4.06	Proficient	24.11	4.03	Vulnerable
Emotional Literacy	20.56	2.56	Proficient	19.22	2.37	Vulnerable
Intentionality	29.87	5.41	Proficient	26.06	4.14	Vulnerable
Creativity	21.42	4.14	Proficient	20.29	3.88	Proficient
Resilience	28.10	4.85	Vulnerable	27.00	3.73	Vulnerable
Interpersonal Connection	17.97	3.23	Vulnerable	16.03	2.50	Caution
Constructive Discontent	25.48	3.82	Proficient	24.03	2.64	Vulnerable
EQ Competencies	24.57	3.09	Proficient	22.68	1.97	Vulnerable
Compassion	23.23	3.90	Vulnerable	20.57	3.19	Caution
Outlook	19.90	3.13	Proficient	17.51	4.15	Vulnerable
Intuition	24.71	4.00	Proficient	23.91	4.60	Vulnerable
Trust Radius	20.13	3.99	Vulnerable	17.03	2.83	Vulnerable
Personal Power	23.99	4.04	Proficient	19.77	3.81	Vulnerable
Integrity	17.16	2.85	Proficient	16.66	3.39	Vulnerable
EQ Values & Attitudes	21.42	2.30	Proficient	19.24	2.39	Vulnerable
OVERALL	22.36	2.34	Proficient	20.47	1.90	Vulnerable

Table IV showed the mean scores and standard deviation results in the EQ Map of the participants in the experimental and control groups after the EQuIP. It reveals that after the implementation of EQuIP, there is an increase from the vulnerable to proficient performance zone on the dimension of EL, EQC, EQVA and Overall for the experimental group while the level of performance zone for the control group remained at the vulnerable level on the dimension of EL, EQC, EQVA and Overall. Based on the different EQ scales, it can be observed from Table IV that the participants in the experimental group obtained an overall mean of $\bar{X} = 22.36$, $SD = 2.34$ and interpreted with performance zone of being proficient. Likewise, the three (3) dimensions namely EL, EQC, EQVA got a proficient level of performance zone. It means that after the intervention, the participants in the experimental group demonstrated balanced EQ effectiveness in most situations. To explain it further, the subscale on self-awareness has the highest improvement with an optimal level of performance zone which means greatest EQ strength is evident even when under pressure. In addition, there are eight (8) subscales that obtained the performance zone of being proficient. These are on the following subscales: emotional awareness of others, intentionality, creativity, constructive discontent, outlook, intuition, and integrity. In contrast, the performance zone in emotional expression, resilience, compassion and trust radius remained vulnerable while the performance zone in interpersonal connection is from caution to vulnerable while personal power is from caution to proficient. It is good to note at this point that after the EQuIP, the mean scores of the participants in the experimental group did not fall under the caution level of performance zone which means EQ ability may prove difficult to use without concentrated attention. On the other hand, the scales that remained vulnerable means that the participants in the experimental group demonstrated some skills and competencies but often run into difficulty bringing EQ into everyday life. Meanwhile on the part of the control group participants, the overall mean is equal to $\bar{X} = 20.47$, $SD = 1.90$ and fell under the performance zone of being vulnerable. The subscales on self-awareness and creativity have a proficient performance zone, with caution level of performance zone in interpersonal connection and compassion while vulnerable with the rest of the scales such as emotional expression,

emotional awareness of others, intentionality, resilience, constructive discontent, outlook, intuition, trust radius, personal power and integrity. The intervention group mean scores had increased across time, whilst the control group mean scores slightly decreased.

The graphical presentation of the emotional competence mean scores between experimental and control groups after the EQuIP can be gleaned from Figure 3.

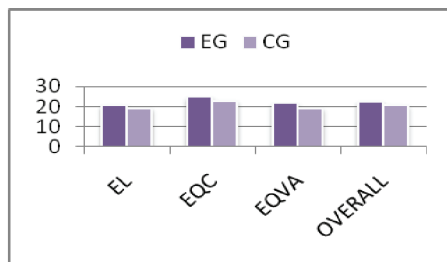


Figure 3. The Emotional Competence Mean Scores Between Experimental and Control Groups After the EQuIP

Figure 3 illustrates the emotional competence mean scores between experimental and control groups after the EQuIP. The graph shows that the experimental group had higher mean scores in the dimension namely EL, EQC, EQVA and Overall as compared to the mean scores of control group. Hence, the participants enhanced their emotional competence especially in the core EQ skills included in the intervention program as revealed by the results in the experimental group.

TABLE V
DIFFERENCE IN THE EMOTIONAL COMPETENCE OF THE
EXPERIMENTAL AND CONTROL GROUPS AFTER THE EQuIP

Dimensions	After EQuIP t-test	p-value
EL	-2.21	0.032
EQC	-2.99	0.005
EQVA	0.82	0.420
Overall	-3.63	0.001

Table V reflects the difference in the emotional competence between the experimental and control groups after EQuIP. The findings revealed that the t-tests' p-values for the dimensions namely EL, EQC and Overall were lesser than the 0.05 level of significance. In contrast, the t-test's p-value of EQVA was greater than the 0.05 level of significance. The results of the study confirmed that students with high emotional competence tend to be better learners, more confident, optimistic, creative, as well as flexible, happier, successful at solving problems, able to cope with stress with a higher self esteem, with fewer behavior problems, and also able to handle emotions much better. The EQuIP training helped students learn emotional vocabulary and feel cared for rather than controlled. It also provided the necessary support to enhance emotional learning, gain insight and enrich experience, thereby improving their potential. At this point, it

is good to recall that the experimental and control groups had both vulnerable level of emotional competence before the intervention. Comparing the results of the posttest of the two groups as seen in Table V, there is a noticeable increase in the mean scores of the experimental group whose level of emotional competence became proficient as compared to the control group whose level of emotional competence remained at the vulnerable level. It also shows that the level of emotional competence of those participants in the experimental group were significantly higher than those participants in the control group which means that the intervention program significantly improved the level of emotional competence of participants with intervention.

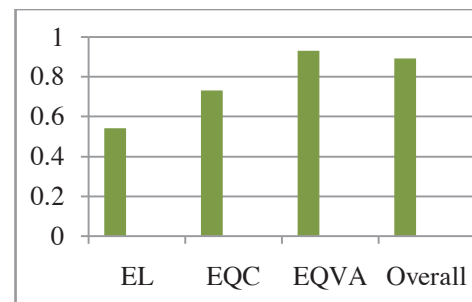


Figure 4. Cohen's d Results

The computed overall Cohen's d for experimental group is equal to 0.89 which suggests that effect size of the intervention is large. Cohen's d of 0.89 has a large effect size as an intervention and an r of 0.41 has a positive effect on emotional competence. This means that the EQuIP is effective in strengthening the emotional competence of the selected transnational students. Furthermore, it was observed during the conduct of the sessions that emotional experience and expression were unique to each participants. This can be attributed to the diverse experiences of the participants as transnational students with vast cultural exposure to different countries. The activities were actively participated especially on the following: (1) Explore... Discover...Feel... An Emotional Awareness of Transnational Students; (2) Excess Baggage: A Personal and Family Revisit and (3) Chilled Up...Let's Have a Guided Fantasy! Likewise, after breaking the barriers, all the participants were expressive and freely expressed both positive and negative feelings, chose emotional vocabulary uniquely, and confidently shared themselves as well as reached out to other participants. Moreover, a 2.5 hour weekly session is enough for the participants to enhance their level of emotional competence. Thus, EQuIP can be learned with ease by tapping the common transnational experiences of the participants.

V. CONCLUSIONS AND RECOMMENDATIONS

Based on the findings of the study, the following conclusions were drawn:

1. The EQuIP is effective in improving the level of emotional competence of transnational students.

2. A 2.5 hour-session is sufficient to effect an improvement in the emotional competence of the subjects.
3. Guided fantasy is a useful activity in enhancing emotional competence.
4. EQIP strengthened the emotional competence of transnational students with absentee parents due to overseas work.

In the light of the findings and conclusions reached in the study, the following recommendations are hereby offered:

1. **Absentee Parents.** The results of the study would give the absentee parents insights to bridge the gap of long distance parenting, encourage open communication between parents and their children, and maximize the use of technology to connect with their adolescents with emotional concerns brought by living in a dormitory while away from them. This study will assure them that their adolescents in school have a support system as needs arise. This study will be beneficial to the absentee parents for them to know that their adolescents are provided with an intervention program tailored to their needs.
2. **Community Counseling and Psychology.** The results of the current study can be linked with the practice of community counseling and psychology. It is an applied discipline aimed at psychological wellness in community and examined various social issues in connection with special population which was investigated in this study. Hence, through this study, they can immerse themselves to local communities and conduct training workshop with similar intervention program in order to extend a helping hand to the Overseas Filipino Workers or absentee parents and their adolescent children.
3. **DLSU-D Community.** The EQ Intervention Program should be considered as part of the program of DLSU-D especially at the DLSU-D Dormitory which accommodates international as well as local students nationwide. This can be implemented in coordination with the Student Wellness Center (SWC) of DLSU-D in connection with their Psychoeducational Program for Special Population.
4. **Guidance Counselors.** It is recommended that the Guidance Counselors of the Student Wellness Center of DLSU-D utilize the EQ Intervention Program as part of their program for special population.
5. **The Field of Psychological Research and The Future Researchers.** Similar studies be conducted to further evaluate the effectiveness of the EQ Intervention Program in strengthening the emotional competence, since there are no similar studies in the local setting to compare and contrast the findings of this study with college population such as the transnational students who are staying outside of DLSU-D Dormitory. Moreover, though the activities were meticulously chosen, addition of other EQ activities that will further improve emotional competence is recommended.

6. **Transnational Students with absentee parents/OFWs.** Since the increase in emotional competence was not found to be significant in the control group, the intervention maybe given to them to further enhance their emotional competence.

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The Effectiveness of Modified-Systematic Desensitization Program in Reducing Levels of Test Anxiety and Enhancing Accounting Achievement

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Abstract — Test anxiety (TA) is considered a major predictor for low academic performance among students. This study aimed at investigating the effectiveness of Modified Systematic Desensitization Program (MSDP) in reducing test anxiety and enhancing Accounting achievement. MSDP, a multi-modal intervention employed Psychoeducation – which teaches participants’ the effects of TA, monitor its severity and handle it effectively; Relaxation-helps in eliminating TA through deep breathing exercises, muscle relaxation, and guided imagery; Cognitive Restructuring - helps restructure the negative experience and process the event in a different, healthier way; SD-teaches participants to relax in their target situation by pairing anxious behaviour with relaxation exercises; and Relapse Prevention- requires the participants to be ready with a plan to manage symptoms through planning and right attitude.

Test gains were calculated from pretest and post-test results using t-test, Pearson r and Cohen’s d in relation to the participants’ blood pressure, pulse rate and accounting achievement. Results suggest that MSDP does improve academic performance in Accounting, helps stabilized Blood pressure and Pulse rate for struggling students with high, moderate and low test anxiety. MSDP is recommended as a diagnostic indicator in applying pedagogical, administrative or psychological remedial strategies for test-anxious students.

Keywords — test-anxiety, blood pressure, pulse rate, Accounting achievement

I. INTRODUCTION

The evolvement of human responses to fear and anxiety in the first part of the century has been designated as the “age of stress”, “age of anxiety”, and more recently the “age of coping” [11]. Ref. [8] also attested that since we live in a test-conscious, test-giving culture, our lives are partly determined by our test performance. With this, anxiety should be taken seriously. Among students, test anxiety is considered a major predictor for low academic performance in school. Thus, they need some form of intervention to reduce anxiety and assist in improving performance in all test-evaluative activities.

In an urban university like De La Salle University-Dasmariñas, the stresses of academic life among students in

the accountancy department have serious effects since they belong to a quota course. Aside from the pressure of high expectations from parents, such requirement has crucial real-life consequences for those who pursue the course. Consequently, psychologists, guidance counselors and educators are trying to understand the intense emotional, behavioural and psychological reactions these students experienced during examinations in any evaluative situation.

In this study, MSDP which serves as its intervention includes psycho education- which teaches participants’ the effects of test anxiety (TA), monitor its severity and handle it effectively; relaxation- helps in eliminating TA through deep breathing exercises, muscle relaxation, and guided imagery; cognitive restructuring - helps restructure the negative experience and process the event in a different, healthier way; systematic desensitization (SD)- teaches participants to relax in their target situation by pairing anxious behaviour with relaxation exercises [11]; and relapse prevention- requires the participants to be ready with a plan to manage symptoms through planning and right attitude.

Guided by the cognitive-behavioural model of test anxiety [8], the research paradigm of this study is illustrated in Figure 1.

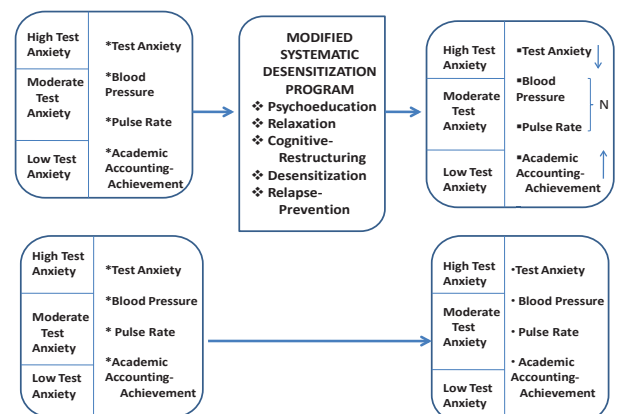


Fig. 1 The research paradigm of the study that defines modified-systematic desensitization program as an intervention under study.

Fig. 1 shows the independent variable which includes MSDP, while the dependent variables include TA, BP, PR and accounting achievement. This study aimed to test the effectiveness of MSDP as an intervention on these test-anxious business students. It also wants to respond with immediacy and prudence with an intervention that would lessen their academic, emotional and psychological anguish and distress relative to test-taking activities.

Statement of the Problem

The cardinal purpose of this study was to investigate the effectiveness of MSDP in reducing levels of anxiety among selected Accounting students of DLSU-D identified to be test anxious and to answer the following queries:

1. What is the mean blood pressure and pulse rate of the Experimental and Control group with HTA, MTA and LTA before MSDP?
2. What is the mean academic achievement in Accounting of the Experimental and Control group with HTA, MTA and LTA before MSDP?
3. Is there a significant difference in the Experimental and Control group before MSDP in terms of:
 - a) BP and PR of HTA, MTA and LTA?
 - b) Academic Accounting achievement of HTA, MTA and LTA?
4. What is the mean of the Experimental and Control group in terms of BP and PR of HTA, MTA and LTA after MSDP?
- 5) What is the mean of the Experimental and Control group in terms of academic Accounting achievement of the HTA, MTA and LTA after MSDP?
- 6) Is there a significant difference between pre and post MSDP scores in the Experimental and Control group in terms of:
 - a) BP and PR of HTA, MTA and LTA ?
 - b) Academic Accounting achievement of HTA, MTA and LTA?
- 7) Is there a significant relationship between TA and academic Accounting achievement?
- 8) What is the effect size of MSDP as an intervention?

II. REVIEW OF RELATED LITERATURE AND METHODOLOGY

Academic achievement is highly emphasized in any educational institutions due to the prevalence of low academic achievement among students. Many research literature all point out that one of the major culprits of the low performance of most students is test anxiety. Writers have viewed test anxiety as the angst that is emitted by various tests in most educational institutions for evaluative purposes [8]. Also, ref. [11] described test anxiety (TA), as a multidimensional construct, describing TA as “a set of phenomenological, physiological and behavioural responses

that accompany concern about possible negative consequences or failure in an exam or some evaluative situations.” High anxiety level produces task-irrelevant responses (error tendencies and self-centered responses) that compete with task-relevant necessary for good performance in an evaluative situation [4].

The connection between anxiety and increased blood pressure can be direct - when one experiences anxiety, there are a number of physiological responses, most of which affect the body in such a way that blood pressure is increased. Anxiety doesn't cause long-term high blood pressure (hypertension). But episodes of anxiety can cause dramatic, temporary spikes in your blood pressure [6].

Meanwhile, the meta-analytic researches of [3] and [5] on the reduction effect size of TA interventions had the following significant effect size: CBT ($E+=0.90$), cognitive restructuring ($E+=1.11$), SD ($E+=0.90$), relaxation training ($E+=0.52$), mental imagery ($E+=0.50$), psycho education ($E+=0.48$), group intervention ($E+=0.67$), college and university participants ($E+=0.68$), 351-500 minutes of therapy (0.79) at $p<0.01$.

The Matched pretest-posttest control group design was utilized together with mean, SD, t-test, Pearson r and Cohen's d . They were used in calculating the test gains between the experimental and control group in relation to their accounting grade, blood pressure (BP) and pulse rate (PR). The ninety (90) participants of the two groups were classified into High TA (TAS=23-37; BP=135/90; PR=95-120), Moderate TA (TAS= 16-22; BP=130/90; PR=90-100) and Low TA (TAS=15-1; BP=125/90; and PR=85-100) levels.

III. DISCUSSION AND RESULTS

Results of this study are tabulated to answer the eight research questions and are briefly discussed below:

TABLE I
THE MEAN BP AND PR of the EXPERIMENTAL and CONTROL CONTROL GROUPS with HTA, MTA and LTA BEFORE MSDP

Group	Levels of Anxiety	Anxiety		Blood Pressure (BP)		Pulse Rate (PR)	
		Mean	SD	Mean	SD	Mean	SD
A	HTA	25.20	2.27	124.67	19.59	81.73	16.72
	MTA	17.60	1.35	131.33	14.07	85.53	14.08
	LTA	12.13	2.47	124.67	15.06	84.60	15.40
B	HTA	25.13	2.13	132.67	17.10	86.87	15.30
	MTA	17.93	1.58	127.33	16.24	83.87	18.47
	LTA	13.33	0.98	122.0	15.68	80.40	15.31

Results show that both the experimental and control group participants in the pre-intervention phase exhibited various scores in relation to BP and PR. Findings show that participants were all classified high normal (pre-hypertension stage). Meanwhile, pulse rate for the three levels of the experimental and control groups were classified normal.

After identifying sixty percent (60%) of the total respondents who were experiencing high level of test anxiety, participants claimed that the fear of not finishing the test on time made their blood pressure go up. Because of fear,

participants' BP change in response to stress like academic pressure, nutritional factors, disease and exercise. When the participants experienced anxiety, their blood pressure and pulse rate increased as a physiological response to the anxious stimuli together with sweaty palms, dried lips difficulty in breathing and mental blackout.

TABLE II
ACADEMIC ACHIEVEMENT in ACCOUNTING of the EXPERIMENTAL and CONTROL GROUPS with HTA, MTA and LTA BEFORE MSDP

Group	Sub-Groups	Accounting Achievement		Interpretation
		Mean	SD	
A	HTA	70.07	6.93	Failed
	MTA	68.47	10.72	Failed
	LTA	73.27	11.42	Passed
B	HTA	71.20	8.60	Passed
	MTA	69.07	9.25	Failed
	LTA	72.67	5.41	Passed

The findings show that LTA level of participants of the experimental and control groups dominated the pretest results by obtaining the highest grade in accounting described as Passed followed by HTA of the control group. While the MTA participants of both groups got the lowest grade in Accounting described as Failed, followed by HTA participants who also obtained a Failing grade. During the intervention session, participants with LTA claimed that they not intimidated with the exams in accounting since they are confident of their answers and their study skills are sufficient enough to deal with whatever academic difficulty they would encounter. While students with MTA felt being left behind by their teachers or parents in their academic activities. These findings are in consonance with other studies of [1] which claimed that individuals with LTA were better able to use metacognition in a positive way than their highly anxious counterparts. Alternatively, other research literature claimed that if the individual's anxiety is too low, he/she may be experiencing the same low level of academic performance as a student with an excessively high anxiety level [9].

TABLE III
DIFFERENCE in the EXPERIMENTAL and CONTROL GROUPS BEFORE MSDP in TERMS of BP, PR and ACADEMIC ACCOUNTING ACHIEVEMENT of HTA, MTA and LTA

Var	A			B			Sigf HTA t	Sigf MTA t	Sigf LTA t
	HTA SD	MTA SD	LTA SD	HTA SD	MTA SD	LTA SD			
TA	25.20	17.60	12.13	25.1	17.9	13.3	0.08	0.621	1.747
	2.27	1.35	2.47	2.13	1.58	0.98	.935	.540	.092
							NS	NS	NS
BP	124.67	131.33	124.67	132.7	127	122	1.192	0.721	0.475
	19.59	14.07	15.06	17.1	16.24	15.7	.244	.477	.638
							NS	NS	NS
PR	81.73	85.53	84.6	86.8	83.8	80.4	0.877	0.278	0.749
	16.72	14.08	15.39	15.3	18.5	15.3	.388	.783	.460
							NS	NS	NS

AA	70.07	68.47	73.27	71.2	69.1	72.7	0.397	0.164	0.531
	6.93	10.72	11.01	8.59	9.25	5.41	.694	.871	.610
							NS	NS	NS

Table 3 shows various mean scores in BP, PR and academic Accounting grade. Results show that there are no significant differences in the mean scores of the two groups in all the three variables studied before the intervention program.

Their mean scores showed unpredictable and dissimilar results distinct from each level. Findings further showed no particular pattern of superiority or dominance in all the three variables studied except the LTA participants of both groups who obtained the lowest TA mean scores but with higher grade in Accounting compared to the mean scores of the HTA and MTA. Such findings are in agreement with the study of [1] who found that differences in levels (low, moderate, and high) of test- anxiety had produced significant differences in GPA scores among students.

Because of the different performances of the participants in response to TA, it would be best to delineate the unique characteristics of each sub-group (HTA, MTA, LTA) although they seem to be diverse in so many ways and thus, achieve diverse mean scores in all the variables studies. Such diversity could be attributed to individual differences as influenced by other related variables like gender, achievement motivation, personality factors, self efficacy, parental expectations and so many others impacting upon each other in a transactional process over time.

TABLE IV
MEAN of the EXPERIMENTAL and CONTROL GROUPS in TERMS of B P and PR of HTA, MTA and LTA After MSDP

Grp	TA Levels	Blood Pre Mean SD	Pressure Post Mean SD	Pulse Pre Mean SD	Rate Post Mean SD
A	HTA	124.67	107.33	81.73	79.66
		19.59	9.61	16.72	11.51
	MTA	131.33	111	85.53	84.13
B		14.07	11.37	14.08	14.6
	LTA	124.67	117.33	84.6	78.13
		15.06	14.86	15.4	11.19
B	HTA	132.67	139.33	86.87	85.66
		17.1	15.79	15.3	12.97
	MTA	127.33	135.33	83.87	80.46
B		16.24	13.55	18.47	12.09
	LTA	122.00	129.33	80.4	81.33
		15.68	9.61	15.31	11.97
t HTA		128.70	123.33	84.3	82.67
		18.52	20.73	15.96	12.43
	t MTA	129.33	123.17	84.70	82.30
t LTA		15.07	17.44	16.16	13.31
		123.33	123.33	82.50	79.73
		15.16	13.73	15.23	11.51

Table 4 shows the mean BP and PR post-test scores of the participants of the two groups. It shows the decline in the blood pressure of the experimental group with HTA, MTA and LTA levels after the intervention program. While pulse rate showed a decline of its anxiety level after MSDP in the LTA level only. The decrease of the mean scores in the blood

pressure and pulse rate could be attributed to the relaxation and deep breathing exercises conducted during the intervention program. Participants of the experimental group were taught to counter their anxiety by employing diaphragmatic breathing and relaxation exercises and cognitive restructuring to lower down their anxiety level during test-taking activities.

Meanwhile on the part of the control group participants, only the HTA level showed a significant decline in their test anxiety level. This decrease could be attributed to the fact that highly-anxious individuals are great worrier and to counter such worry, they have to prepare more for any upcoming test-taking activities.

TABLE V
MEAN of EXPERIMENTAL and CONTROL GROUPS in TERMS of ACADEMIC ACCOUNTING ACHIEVEMENT of HTA, MTA and LTA AFTER MSDP

Group	LevAnx	Achievement in Accounting		
		Pre Mean, SD	Post Mean, SD	t-value/ Significance
A	HTA	70.07, 6.93	88.26, 2.05	11.584/.000 *HS
	MTA	68.47, 10.72	87.80, 2.01	7.796/.000 *HS
	LTA	73.27, 11.42	88.87, 2.64	6.365/.000 *S
B	HTA	71.20, 8.60	83.87, 2.30	6.652/.000 *S
	MTA	69.07, 9.25	82.60, S3.07	5.996/.000 *S
	LTA	72.67, 5.41	82.20, S2.40	8.061/.000 *S
A ≠ B	t HTA	t=0.397, p=0.694	t=5.536, p=0.000	p = 0.000
	t MTA	t=0.164, p=0.871	t=5.496, p=0.000	p = 0.000
	t LTA	t=0.184, p=0.855	t=7.238, p=0.000	p = 0.000

Table 5 shows the difference between the results of TA and Accounting achievement of the two groups from pre-test to post-test showed improved final Accounting grade in the first semester. But only the treatment group demonstrated a statistically high significant improvement at $p \leq .05$ levels. Results illustrate the significant increase of Accounting grade in all the three TA levels of the experimental group specifically, LTA who obtained the highest increase in Accounting grade followed by HTA. On the contrary, MTA got the lowest accounting achievement. The incremental result in accounting grade achieved by the participants' substantiates the effectiveness of MSDP as an intervention for test anxiety.

Similar findings were found in the study of [3] claiming that substantial test-anxiety greater reduction scores ($p < 0.01$), was benefited from systematic desensitization ($E = .90$) together with relaxation ($E = .52$), visual imagery ($E = .45$) and other behavioural techniques ($E = .80$), from cognitive restructuring ($E = 1.11$) and from skill-focused interventions ($E = 0.42$). Also, ref. [11] found that both groups improved their G.P.A. in the program quarter but only the treatment group demonstrated a significant improvement ($p < 0.05$). It concluded that counselling and group desensitization in the 7-

session model ($E = .91$) is an effective and efficient technique to modify anxiety responses to test-taking situations.

TABLE VI
SIGNIFICANT DIFFERENCE BETWEEN the PRE and POST MSD SCORES of the EXPERIMENTAL and CONTROL GROUPS in TERMS of BP, PR and ACADEMIC ACCOUNTING ACHIEVEMENT of HTA, MTA and LTA

Grp of	Level	Blood		Presre		Pulse Rate		AcAcc		Achvt		t-value
		Anxiet Pre	Post	Sig	Pre	Post	Sig	Pre	Post	Sig	Sig	
		SD	SD		SD	SD		SD	SD			
A	HTA	124.7	107	3.747	81.73	79.66	0.579	70.07	88.26	11.584		
				0.002			0.572					
				*S	16.72	11.51	NS	6.93	2.05	0.000		
	MTA	131	111	5.272	85.53	84.13	0.348	68.47	87.80	7.796		
				0.000			0.733					
				*S	14.08	14.6	NS	10.72	2.01	0.000		
B	LTA	14.1	11.4	1.749	84.6	78.13	2.339	73.27	88.87	6.365		
				0.102			0.035					
				*S	15.4	11.19	*S	11.42	2.64	0.000		
	HTA	132.7	139	1.673	86.87	85.66	0.363	71.20	83.87	6.652		
				0.116			0.722					
				NS	15.3	12.97	NS	8.60	2.30	0.000		
Tot t	MTA	127	135	1.633	83.87	80.46	0.822	69.07	82.60	5.996		
				0.125			0.425					
				NS	18.47	12.09	NS	9.25	3.07	*S		
	LTA	122	129	1.489	80.4	81.33	0.249	72.67	82.20	8.061		
				0.159			0.807					
				NS	15.31	11.97	NS	5.41	2.40	*S		
t	HTA	129	123	1.427	84.3	82.67	0.683	70.63	86.07	11.717		
				0.164			0.500					
				NS	15.96	12.43	NS	7.69	3.10	*S		
	MTA	129	123	1.527	84.7	82.3	0.0845	68.67	85.20	9.482		
				0.138			0.405					
				NS	16.16	13.31	NS	9.84	3.67	*S		
t	LTA	123	123	0.000	82.5	79.73	1.158	72.97	85.53	8.661		

Table 6 shows the difference between the results of BP and PR and Accounting achievement of the two groups from pre to post-test. Results showed improved final Accounting grade of both groups in the first semester, but only the treatment group demonstrated a statistically high significant improvement at $p \leq .05$ level. Likewise, BP and PR demonstrate a decline from pre to post intervention sessions. Also, findings showed significant increase of accounting grade in all the three TA levels of the experimental group. The LTA sub-group obtained the highest increase in accounting grade followed by HTA. Meanwhile, MTA got the lowest accounting achievement among the three groupings. The incremental result of this study substantiates the effectiveness of MSDP as an intervention in reducing test anxiety.

TABLE VII
RELATIONSHIP BETWEEN TA AND ACADEMIC ACCOUNTING
ACHIEVEMENT

Group	Variables	Relationship with Accounting Achievement	
		r	Significance
A	TA	-0.422	0.118
	BP	-0.145	0.606
	PR	-0.115	0.683
B	TA	-0.092	0.745
	BP	-0.045	0.875
	PR	-0.168	0.550
A + B	TA	-0.412	0.120
	BP	-0.161	0.510
	PR	-0.165	0.508

Table 7 illustrates the negative correlation between test-anxiety and academic achievement. Likewise, a negative correlation also is shown between TA, BP and PR after the intervention program. Results negate the correlation between test anxiety and achievement in all the three TA levels for the two groups. Findings further show that, as test anxiety decreases, academic achievement in accounting increases. In short, an inverse relationship occurred between test anxiety and academic achievement as a result of MSDP.

TABLE VIII
EFFECTIVENESS of MSDP as an INTERVENTION for EXPERIMENTAL GROUP

L A	Test Anxiety			Blood Pressure			Pulse Rate		
	Pre	Post	Co d	Pre	Post	Co d	Pre	Post	Co d
	Mean	Mean		Mean	Mean		Mean	Mean	
	SD	SD	Intr	SD	SD	Intrpr	SD	SD	Interp
H									
T	25.20	15.0	3.265	124.7	107.3	1.123	81.731	79.66,	0.144
A	2.27	3.79	LE*	19.59	9.61	LE*	6.72	11.51	SE*
M									
T	17.60	14.0,	1.051	131.3	111.0	1.589	85.531	84.13,	0.097
A	1.35	4.65	LE*	14.07	11.37	LE*	4.08	14.60	SE*
L									
T	12.13	7.33	1.295	124.7	117.3	0.49	84.601	78.13,	0.048
A	2.47	4.62	LE*	15.06	14.86	ME*	5.40	11.19	ME*

Criteria of Cohen's d Effect Size: 0.8 = Large, 0.5 = Medium, 0.2 = Small, [2]

Table 8 shows the effect size of MSDP as an intervention in relation to TA, BP and PR of the two groups. The results point out that the HTA participants demonstrate a large decline from pre to post intervention sessions. It also showed the significant decrease in BP and PR after the intervention from moderate to small size effect which helps in normalizing their responses to anxious situations. The decline in TA, BP and PR substantiates the effectiveness of MSDP as intervention in the three aspects of human functioning.

IV. CONCLUSIONS and RECOMMENDATIONS

Based on the findings of the study, the following conclusions are made:

1. Increase blood pressure and pulse rate were influenced by the presence of test anxiety.
2. Test anxiety had negative impact on adolescent's academic achievement. It decreases their learning capabilities and hinders excellent academic performance.
3. An inverse relationship existed between test anxiety and academic performance where low test anxiety participants obtained high GPA's and high test anxiety participants obtained low GPA's.
4. MSDP is an effective tool in decreasing blood pressure and pulse rate when confronted by test anxiety.
5. Modified Systematic Desensitization Program is effective in improving performance in Accounting subject.
6. The incremental result in the academic accounting achievement of the participants substantiates the effectiveness of MSDP as a psychotherapeutic intervention against test anxiety.
7. A negative correlation existed between test-anxiety and academic Accounting achievement among college students.
8. MSDP had large effect size on Test anxiety and Blood Pressure in all the three levels (HTA, MTA, and LTA) while only small effect size on Pulse Rate. Thus, as a whole MSDP was an effective intervention in reducing test anxiety, blood pressure and pulse rate.

In effect, the researcher highly recommends that the said findings be used as a diagnostic indicator in applying pedagogical, administrative or psychological remedial strategies for test-anxious students. In the same manner, the Student Wellness Center (SWC) in coordination/cooperation with the Accountancy department should establish programs that encourage peer relationships and peer tutoring in Accounting subjects through "Peerkadahan," E-Mentoring Project and Peer Shadowing. Such projects would provide the appropriate medium to create an efficient and robust learning environment and supplement the traditional face-to-face classroom method. Likewise, SWC should teach/couch these students to learn behavioural and cognitive techniques like MSDP for preventive, developmental and remedial action combined with skill focus approaches like study skills training, meta-cognition and problem-solving with speed and accuracy. These high anxious students should also learn by heart how to re-label arousal as facilitative and use it to increase and maintain on-task responses rather than attempt to reduce arousal via relaxation exercises. These techniques should be incorporated in the educational guidance and counselling, coping skills programs and psychotherapy in order to improve students' learning and perform better in their academics.

As to the Accountancy department, these moves would help in the development of their course curriculum and in screening and attracting qualified candidates as potential Accounting majors. Finally, future researchers could device a shorter first-aid approach as a crisis intervention based on

MSDP in consideration of HTA, MTA and LTA levels and replicate these findings in other cultural environments using different types of accounting students (postgraduate, professional or undergraduate) in institutions with a more selective admissions policy.

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The Effectiveness of the Weblog Used as an Online Computer Assisted Learning Tool on Enhancing Writing Abilities of Low- Intermediate EFL Students

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Abstract—Weblog is a log of thoughts which provides a large space for students to practice writing (Chuo, 2007). On the weblog, students can write about their experiences during school and social activities while at the same time allowing other Internet users to share thoughts and give comments on their pieces of writing (Elliott, 2008). Regarding the usefulness of the weblog, this study aimed to find out the benefits the low-intermediate EFL students got from the effectiveness of the weblog used as an online computer assisted learning tool on enhancing their writing abilities. The participants were 27 low-intermediate EFL students in a university in Nakhon Pathom, Thailand. During the experiment, the participants were assigned to write two short paragraphs on the weblog: “Introducing Myself” and “My Hometown.” In addition, to further prove its effectiveness and to find out whether their writing errors decreased after practicing writing on the weblog, the types of errors found between these two pieces of writing were investigated and compared. The results of the study show that the participants could write better in the second piece of writing. Their writing errors were reduced 3.12% resulted from the total amount of errors of 10.09% found in the second piece of writing subtracted from 13.21% of the first piece of writing. These findings may prove that the weblog had effectiveness and should be promoted as an alternative language learning tool for writing practice. As for the types of writing errors, it was found that most of the participants had problems with capitalization and spelling in both pieces of writing far more than other types of errors. However, when comparing the errors found between the two topics, the errors of both capitalization and spelling were reduced from 3.96% to 2.02% and 3.10% to 2.56%, respectively. Apart from this, from the interview responses, the participants stated that their writing abilities had some improvement after practicing writing on the weblog. Most of them claimed that the weblog allowed them to view pieces of writing of other people and use them as a guideline to improve their writing abilities. They also stated that they learned more about how to use capital and small letters on the weblog.

Keywords—low-intermediate EFL students, pieces of writing, weblog, writing abilities, and writing errors

I. INTRODUCTION

Weblog is a personalized web page kept in a diary form like a “log on the web” which is kept on a static web page or a database-backed website enabled via “blogging” software (Eastment, 2005). In language teaching, it is also one of the newest Internet learning tools which can be used for writing instruction (Eastment, 2005). With weblogs, students can write their diary describing what they experience during school, travel, and social activities (Elliott, 2008). They can

write comments, suggestions, problems in learning, while at the same time getting some useful comments and suggestions from more knowledgeable others, like their teachers, other peers or even authentic audience to construct new knowledge as well as to improve their writing abilities. Following this, Godwin (2003) claims that weblogs provide learning opportunities online since they are easily linked to larger on-line communities. When publishing the blog online, students have more opportunities to show their writing to many readers other than their teachers and their peers. Such readers can also make some comments on students’ writing via the blog. This typical quality of the weblog makes students write with the awareness that anyone could see their writings. They will be more careful when they are writing and they may get various comments that they can use to improve their writing (Simsek, 2009). Because of this, it can be said that weblog is an online learning tool that has functions related to perspectives of the Social Constructivism theory (Eastment, 2005).

Another reason that makes weblogs become one of the most effective tools in teaching writing is that it is directly related to writing beyond the traditional classroom (Simsek, 2009). Weblogs promote communicative, cognitive, and sociocognitive views of language instruction which has a significant influence on writing abilities (Wright, Knight, & Pomerleau, 1999). Also, Ward (2004) advocates that weblogs can fulfill the needs to develop writing instruction. For example, to create a learner blog, the teacher can use a weblog in all writing stages from drafting to publishing and assessment (Ward, 2004). At the drafting stage, students can exchange their writings via blog pages. During this stage, the teacher and other peers can reach the drafts at anytime anywhere. This allows them to give feedback more easily. There will be no time restriction, so they can review the drafts as long as they want (Ward, 2004). The students can also see the feedback and make use of it to revise their work. After that, their pieces of writing on the weblog can be assessed by the teachers and other peers (Barrios, 2003; Campbell, 2003; Johnson, 2004; Pinkman, 2005; Ward, 2004).

As noted earlier that weblogs have effectiveness on enhancing writing abilities, to integrate weblogs in writing instruction properly, Campbell (2003) recommends how to integrate weblogs into educational contexts at the same time introducing three types of blogs that are useful for students. The first type is devoted to tutor blogs. To promote the use of tutor blogs in language learning, the teacher can encourage students to deal with English websites and guide them in their

self-study by making some online activities, such as quizzes, audio and video files, English news sites, key-pal networks, and interactive websites (Campbell, 2003). The second type is learner blogs. Campbell (2003) suggests that learner blogs are suitable for use in reading and writing classes. Especially for writing, learner blogs can be used as journals for writing practice. This type of weblogs allows students to have writing practice, develop a sense of ownership at the same time experiencing the hypertext documents. Moreover, their writing work can instantly be read by anyone else so that students can get valuable comments and ideas from others (Farmer, 2006). For the last type of weblog, it is a class blog. This type of weblog allows students to work collaboratively like they do with other students in the classroom. It is like a bulletin board for students to share ideas on a common topic (Campbell, 2003).

Highlighting the effectiveness of weblogs on enhancing writing abilities, in a recent study of 70 undergraduate students in the Department of Primary Education at Marmara University in Turkey, it was found that the weblog integrated with writing instruction improved the students' writing competence at a significant level (Simsek, 2009). The students also had an overall positive attitude towards the use of the weblog in teaching writing. Moreover, it had proven more effective in teaching writing than the traditional classroom instruction (Simsek, 2009). Following this, it was found that weblogs can be used with other computer assisted language learning tools like in a CALL-based EFL program on the web. This study was carried out with 21 fourth-year private university students in western Japan, the students' gains in writing fluency were determined by considering the number of words and word frequency levels after they had enrolled in a seven-day intensive CALL-based EFL program (Fellner & Apple, 2006). During studying in the program, the students were exposed to a variety of CALL tasks, such as a web listening, reading, and vocabulary building. They also posted emails to the class free writing weblog. The findings indicated that based on a simple word count of the students' weblog entries, there was an increase in the number of words produced. Moreover, the results of the study indicated that the average word count for student email postings to the class weblog increased. On the first day, there were an average of 31.5 words, while on the last day of the program, the number reached an average of 121.9 words. Such improvement represented an overall increase of nearly 350% in word count (Fellner & Apple, 2006).

According to the aforementioned discussion, the present study regards the roles of weblogs in writing instruction. This study aimed to find out the benefits the low-intermediate EFL students got from the effectiveness of the weblog used as an online computer assisted learning tool on enhancing their writing abilities. To deeply prove its effectiveness, the researchers also investigated and compared the types of writing errors found between two pieces of writing which the students were assigned to do on the weblog.

A. Research Questions

1. What were the benefits the low-intermediate EFL students got from the effectiveness of the weblog used as an online computer assisted learning tool on enhancing their writing abilities?
2. What types of writing errors did the low-intermediate EFL students have in paragraph writing on the weblog?

II. METHODS

A. Participants

The participants in this study were 27 first-year undergraduate students in a university in Nakhon Pathom, Thailand. Nineteen students in this group were male and eight of them were female. They all finished high schools in Thailand and had been studying English for fifteen years. Their ages were between eighteen and twenty two. They were considered low-intermediate EFL students since they got the O-NET score (Ordinary National Education Testing) in the English subject less than forty five points. These students were placed in the English Level 1 classroom. The criteria for judging groups of students were determined by a university faculty that was in charge of English teaching.

B. Materials

The weblog used in this study was powered by Blogspot. It was used as an online computer assisted learning tool which aimed to enhance writing abilities of low-intermediate EFL students. It can be reached at <http://noidiary2010.blogspot.com>. The interview was conducted in order to gain detailed information to support the data obtained from the pieces of writing on the weblog. The participants needed to answer the questions, such as "Do you think the weblog can help you improve your writing abilities and if yes, how can it help you?" "What types of errors do you usually have in writing?" and "How do you make better progress in your writing after practicing on the weblog?."

C. Procedure and Data Analysis

The data for this study were collected during the first semester of the 2011 academic year. The participants were assigned to write two short paragraphs on the weblog. Each paragraph had at least 100 words. Firstly, they were assigned to write in the topic "Introducing Myself". Then the researchers corrected some errors and gave them some comments on their first work. After that, they were assigned to write in the second topic "My Hometown." After the participants completed the second topic, their pieces of writing from these two topics were analyzed using frequency and percentage. The amounts of word errors were counted and calculated in percentage. The data resulted from these two pieces of work were compared to find out types of writing errors and the effectiveness of the weblog on enhancing writing abilities whether or not after the participants received comments and corrected sentences on the weblog, they would have fewer writing errors. After that, ten participants who volunteered for the interview were picked up. The interviewing process took approximately 5 to 10 minutes.

Then the interviews were transcribed. The detailed information obtained from the interview was used to support the data gathered from the pieces of writing on the weblog.

III. RESULTS

The results based on the pieces of writing on the weblog and interview responses were used to answer the research questions of the study: (1) What were the benefits the low-intermediate EFL students got from the effectiveness of the weblog used as an online computer assisted learning tool on enhancing their writing abilities? and (2) What types of writing errors did the low-intermediate EFL students have in paragraph writing on the weblog?

RQ1: What were the benefits the low-intermediate EFL students got from the effectiveness of the weblog used as an online computer assisted learning tool on enhancing their writing abilities?

To answer this question, the number of common writing errors was counted and calculated in percentage. The findings show that the participants could write better in the second piece of writing. Their writing errors were reduced 3.12% resulted from the total amount of errors of 10.09% found in the second piece of writing subtracted from 13.21% of the first piece of writing. The following extracts of writing show how the same student made better progress in her writing.

Topic 1: Introducing Myself

{My nickname is Aom. I'm 19 years old. I'm from Hatyai. I'm single. I believe in the Lord Buddha's teaching. My address [no verb] 68 Rattanaauatis 10 Rd. Hatyai, Songkhla. I'm [no article] student at the College of Sports Science and Technology. I am a freshman, [comma splice] I like to play football [spelling] because it's funny [word meaning]. My hobbies is [subject-verb agreement] drawing.}

Topic 2: My Hometown

{There are many interesting things in my hometown. It's called Songkhla. It is in the south of Thailand. It is famous for the Songkha Lake. You can settle down on the sand. You should go to visit Khlo-Tungkuan, Koh-Nuh, Koh-Meaw, and Koh-Kawseang. It has Arh-Harn-Song-Ta-Lae Festival (The sea food [space] festival). To sumup [space], Songkhla is a good place to visit.}

According to the above extracts of writing, this participant made better progress in her writing when she wrote the second piece of writing. Common writing errors resulted from verb missing, article missing, comma splice, spelling, word meaning, and subject-verb agreement were not found in her second topic.

Regarding the interview data, all of the interviewees stated that they could write better after practicing English writing on the weblog. Additionally, half of them said that they could write much better. For example, interviewee I said, *"It is much better to practice writing on the weblog. The teacher*

and other people can view, make suggestion and correct common writing errors in English. I can use their advice to improve my writing. Moreover, when compared with paper-based assignments, it is faster and more convenient to send my writing assignments through the weblog. This is because I can send my work anyplace where there is a wireless connection."

Seven interviewees claimed that the weblog allowed them to view their friends' pieces of writing which they could adapt to use in their own writing. For example, participant F said, *"Writing on the weblog allows me to see other friends' opinions and ideas. I can see what they have in their minds. I can compare my pieces of writing with those of my friends. However, when I write on paper, I can see only my own work, but I cannot see pieces of writing of other people."*

Two interviewees stated that when they typed something wrong on the weblog, such a piece of information could be deleted or even corrected easily by just pressing the backspace key on the computer keyboard. For example, participant B said, *"If I type something wrong on the weblog, I can easily delete it just pressing the backspace key and then correct it."*

Six interviewees said that they could get useful suggestions and comments from the teacher and their friends more quickly than writing on a sheet of paper. For example, participant E said, *"When I write on paper, no one can tell me what is right or wrong, especially when I am about to send my writing assignment. However, on the weblog, it is easier and quicker to get useful advice and suggestions either from my friends or the teacher."*

Three interviewees said that they could use the weblog anytime anywhere. Moreover, it is more convenient to use for practicing writing. For example, participant F said, *"Regarding time and place for Internet use, it is quite convenient to practice writing in English on the weblog. This is because we can sometimes extend the time or the due date of our work. Instead of sending it in the daytime, we can send it even in the nighttime. We can even connect to the Internet and access the weblog any places where the wireless connection is available."*

Seven interviewees claimed that on the weblog, they knew their common writing errors and how to correct them because they got comments from the teacher in the right place at the right time. As a result of this, the number of errors in their writing decreased gradually. For example, participant F said, *"Because it is easy to get comments from the teacher and other friends on the weblog, this makes me know where I have made mistakes and errors in my writing quicker than getting comments on paper. I use these comments to improve my writing. I know how to avoid errors. As a consequence, errors in my writing will decrease gradually or even disappear at the soonest."*

However, one of them said that the weblog also had a negative effect on the students' writing abilities because on the weblog, if students were dishonest, they could copy pieces of writing of their friends or even from other learning sources to use as their own writing. For example, participant C said, *"If students write an English paragraph on paper, they can*

write from their own thoughts because they cannot copy pieces of writing of other people. On the contrary, when they write on the weblog, they may get pieces of writing from various sources of learning. This may get in trouble. Especially dishonest students, they may copy pieces of writing from other people and use them as their own. As a result of this behavior, the teacher may not be able to see their actual writing abilities only from the weblog."

RQ2: What types of writing errors did the low-intermediate EFL students have in paragraph writing on the weblog?

To answer this question, the frequency of word errors found in both pieces of writing: "Introducing Myself" and "My Hometown" were counted and then calculated in percentage. As shown in Table I, in the first topic, when compared to the total number of word written on the weblog, it was found that the students had problems with capitalization (3.96%), followed by spelling (3.10%), punctuation marks (1.83%), articles (1.22%), parts of speech (1.16%), incomplete sentences (0.61%), prepositions (0.43%), conjunctions (0.24%), word order (0.24%), possessive adjectives (0.12%), subject-verb agreement (0.12%), verb tenses (0.12%), and any and some (0.06%). Also, when compared to the other writing errors, capitalization were the most frequent writing errors (29.95%), followed by spelling (23.50%), punctuation marks (13.82%), articles (9.22%), parts of speech (8.76%), incomplete sentences (4.61%), prepositions (3.23%), conjunctions (1.84%), word order (1.84%), possessive adjectives (0.92%), subject-verb agreement (0.92%), verb tenses (0.92%), and any and some (0.46%).

TABLE I
TYPES OF WRITING ERRORS FOUND ON THE WEBLOG TOPIC
"INTRODUCING MYSELF"

Types of Errors	Frequency (Number of Word Errors)	Percent (%) Compared to the Total Number of Words Written on this Topic	Percent (%) Compared to the Other Writing Errors
1. Any and Some	1	0.06	0.46
2. Articles	20	1.22	9.22
3. Capitalization	65	3.96	29.95
4. Conjunctions	4	0.24	1.84
5. Incomplete Sentences	10	0.61	4.61
6. Parts of Speech	19	1.16	8.76
7. Possessive Adjectives	2	0.12	0.92
8. Prepositions	7	0.43	3.23
9. Punctuation Marks	30	1.83	13.82
10. Spelling	51	3.10	23.50
11. Subject-Verb Agreement	2	0.12	0.92
12. Verb Tenses	2	0.12	0.92
13. Word Order	4	0.24	1.84
Total	217	13.21	100

As illustrated in Table II, in the second topic, when compared to the total number of word written on the weblog, it was found that the students had problems with spelling (2.56%), followed by capitalization (2.02%), punctuation marks (1.48%), parts of speech (1.32%), subject-verb agreement (0.62%), possessive adjectives (0.54%), articles (0.47%), prepositions (0.47%), incomplete sentences (0.31%), and conjunctions (0.31%). Also, when compared to the other writing errors, it was found that spelling was the most frequent error (25.38%), followed by capitalization (20%), punctuation marks (14.62%), parts of speech (13.08%), subject-verb agreement (6.15%), possessive adjectives (5.38%), articles (4.62%), prepositions (4.62%), incomplete sentences (3.08%), and conjunctions (3.08%).

TABLE II
TYPES OF WRITING ERRORS FOUND ON THE WEBLOG TOPIC "MY
HOMETOWN"

Types of Errors	Frequency (Number of Word Errors)	Percent (%) Compared to the Total Number of Words Written on this Topic	Percent (%) Compared to the Other Writing Errors
1. Articles	6	0.47	4.62
2. Capitalization	26	2.02	20.00
3. Conjunctions	4	0.31	3.08
4. Incomplete Sentences	4	0.31	3.08
5. Parts of Speech	17	1.32	13.08
6. Possessive Adjectives	7	0.54	5.38
7. Prepositions	6	0.47	4.62
8. Punctuation Marks	19	1.48	14.62
9. Spelling	33	2.56	25.38
10. Subject-Verb Agreement	8	0.62	6.15
Total	130	10.09	100

When comparing the data in Table I with those in Table II, it was found that the errors in writing were reduced from the total number of errors of 13.21% found in the first topic to 10.09% in the second topic. Moreover, errors in the uses of any and some, verb tenses, and word order in English were not found in the second topic "My Hometown". However, they still had problems with spelling (2.56% compared to the total number of words and 25.38% compared to the other writing errors) and capital and small letters (2.02% compared to the total number of words and 20% compared to the other writing errors). In addition to this, errors in conjunctions, parts of speech, possessive adjectives, prepositions, and subject and verb agreement increased in the second topic.

According to the interview results, the interviewees also claimed that their writing errors, such as spelling, capital and small letters, word order, articles, and conjunctions decreased

after practicing writing on the weblog. Most of them (seven interviewees) stated that their problems in the use of capitalization were reduced. For example, participant E said, *"I know much about capital and small letters. Now I know that capital letters are used as the first letter of a sentence. I learned this from the comments I received on the weblog. On the weblog, it is easy to get comments on writing because the Internet connection is available almost everywhere."*

Five interviewees also added that they learned more about word order in the English language. Participant C, for example, said, *"Firstly, I did not know how to form English sentences correctly and suitably. I only wrote from what I thought. However, after learning from what the teacher has corrected on the weblog, I think I know more about word order. I think I can write English sentences better than before."*

Following this, two interviewees claimed that they knew how to spell words more correctly in English. Participant A said, *"It is much better for me to practice writing on the weblog since I can receive the corrections to my spelling from the teacher's comments. I also learn new vocabulary from my friends' pieces of writing."*

Another two interviewees claimed that their language knowledge about the use of articles (a, an, the) got improved. Participant D said, *"I also knew more how to use articles, like a, an, and the. I build my own comprehension from the sentences the teacher has corrected for me on the weblog."*

Moreover, one of them said that he learned more about how to use conjunctions (and, or, but, so) to connect two sentences correctly. He said, *"In the past, I usually used incorrect conjunctions to connect the English sentences. I think now I can use conjunctions better. I learned this from my friends' pieces of writing on the weblog, and then I built my own comprehension about how to use them."*

IV. DISCUSSION

This study was conducted to find out the benefits the low-intermediate EFL students got from the effectiveness of the weblog used as an online computer assisted learning tool on enhancing their writing abilities. To get clear evidence to support its effectiveness and to find out whether their writing errors decreased after practicing writing on the weblog, the types of errors found between the two pieces of writing (Introducing Myself and My Hometown) were investigated and compared.

The results of the study show that the students had some improvement in writing abilities. Their writing errors were reduced 3.12% resulted from the total amount of errors of 10.09% found in the second piece of writing subtracted from 13.21% of the first piece of writing. In addition, according to the interview responses, all interviewees claimed that their writing abilities were better after practicing writing on the weblog. They mentioned that on the weblog, they could view and use pieces of writing of their friends as a guideline to improve and develop their own writing. They claimed that it was convenient to use the weblog if only there was an Internet connection. They could easily delete writing mistakes just

only pressing the backspace key. It was quicker and easier to delete and correct their writing errors on the weblog after they got the comments and suggestions from the teacher. They also mentioned that after they knew how to correct their pieces of writing, their common errors decreased gradually. Relating these findings to prior research, Ward (2004) claims that weblog can provide a genuine audience but is authentically communicative. To support this, as shown by the present study, suppose that the participants did not have opportunities to see the teacher or their friends face to face, they still could get comments and suggestions from the weblog to improve and develop their own writing. In addition to this, it can be said that the opportunities offered by the weblogs go beyond the teacher and peer feedback. It allows other people on the web to view their pieces of writing and give some comments (Simsek, 2009). However, even though it seems that the weblog has a lot of benefits to practicing writing abilities, one of the participants mentioned that if it was used in the wrong way, it could result in a negative effect. This is because on the weblog, the students could copy pieces of writing of their friends or other sources to use as their own work. As a consequence of this, the teacher may not be able to correctly evaluate the students' writing abilities, and the students themselves may not be able to improve their actual abilities.

Regarding the types of writing errors, the findings show that the students had problems with capitalization and spelling in both topics far more than other types of errors. However, when comparing the number of errors found between the two topics, it was found that the errors of both capitalization and spelling were reduced from 3.96% to 2.02% and 3.10% to 2.56%, respectively. Similar to the data gathered from the interview responses, most of the interviewees stated that their knowledge of capitalization got some improvement after practicing writing on the weblog while two of them claimed that they learned more about word spelling in English. In addition to this, it was found that the errors resulted from the misuses of articles, incomplete sentences, and punctuation marks were also reduced. Moreover, the errors of word order, verb tenses, and any and some were not found in the students' pieces of writing on the second topic. Following this, five interviewees also claimed that the weblog allowed them to learn more about how to write sentences with correct word order. This may be a sign that the students' writing abilities were developed. This is because word order or the syntactic constituent order is directly concerned with the order of subject, verb, and object; the order of modifiers (adjectives, adjuncts, demonstratives, numerals, and possessives) in a noun phrase; and the order of adverbials (adverbs, adverbial phrases, and adverbial clauses) (Connolly, 1991). It is an important linguistic knowledge because the order of words can affect the meaning of sentences and convey grammatical information (Newman et al., 2010). For example, the sentence *"A bear killed a tiger."* if the subject *"A bear"* is moved to the position of the object *"A tiger liked a bear."* the meaning of the sentence will change. With regard to grammatical information, the sentence *"It is raining."* for example, when the auxiliary verb *"is"* is moved from the second position

to the first position “Is it raining?,” the status of the sentence will change from being an affirmative statement to an interrogative statement. According to the above factual information, it can be said that the disappearance of word order errors in the second topic may be able to prove that the students’ writing abilities were enhanced after practicing writing on the weblog. However, even though many of the errors found in this study were reduced, some of them such as conjunctions, parts of speech, possessive adjectives, preposition, and subject and verb agreement increased in the second topic. These findings may be used as a resource for future research.

V. CONCLUSIONS

As noted earlier, the weblog may be able to enhance writing abilities of low-intermediate EFL students since it allows students to view pieces of writing of their peers and use them as a guideline to improve and develop their own writing. Students can connect to the weblog anytime anywhere if only there is an Internet connection. It is easier to correct and revise their writing assignments just only pressing the backspace key. However, it was found that it still has a negative side if the students are dishonest and prefer to copy the work of others. As a consequence of this, their writing abilities may not get improved. To solve this problem, the teacher may have to set more strict rules which will be used to warn them not to copy pieces of writing of other people. With regard to types of errors, it was found that many of the writing errors were reduced after practicing writing on the weblog.

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Perceptions of Teachers in Portfolio Assessment in Teaching Math & Science Concepts

Mary Joan Guzman

Abstract

This study aimed to determine the perception of teachers in portfolio assessment in teaching science - math concepts in terms of frequency, practices, and effectiveness in the development of the cognitive, affective and psychomotor skills and in the attainment of the objectives.

A questionnaire was administered by total enumeration to 60 math and science teachers from both public and private schools of the province of Abra. The questionnaire was composed of four parts. It contains the frequency and five options represent the practices, effectiveness and attainment of objectives of using portfolio assessment. Personal Interviews was also conducted to students and teachers teaching math and science subjects. Frequency count, percentage, weighted mean and normative survey were used to ascertain the data gathered.

Results revealed that math and science teachers mostly used both the process and product oriented assessments which are frequently checked every week and every semester. Practices of portfolio assessment done by the teachers include SMART (specific, measurable, attainable, result-oriented and testable) objectives in which students can integrate the concepts they learned by applying into their real life situations and by showcasing their best works in science and math. The extent of effectiveness in enhancing the teaching of math and science concepts in the development of the cognitive, affective skills and psychomotor skills of the students were almost fully effective. Similarly with the attainment of the objectives which is almost fully attained. This attributes to math and science teachers that demonstrate mastery of math and science concepts with the use of portfolio assessment resulted to the learning outcomes shown by the students that clearly describe their achievements and effectively communicate what they have learned.

Rationale:

Improving mathematics and science education has been a major concern of our country today. Educators have a vital role to play in this endeavor in order to prepare individuals to be equipped to function in the society underpinned by science and technology. As stated by Wilcox (2004), that portfolio has been instituted as the major assessment for Math and Science Curricula. The skills gained in producing a portfolio of one's professional achievements serve to prepare students for the world of work.

A teaching portfolio is a coherent set of materials that represents teachers teaching practice as related to student learning. It includes the goals for student learning, the methods use by the teacher to achieve her goals, the methods use to assess student learning and the plans

for developing and improving teachers teaching. It is also include a systematic collection of teacher's observations and student products.,

Portfolio assessment includes instructional outcomes, multiple products collected over time and, variety of materials such as teacher notes, teacher-completed checklists, student self- reflections, and etc.

Portfolio and portfolio – based assessments are designed to improve the understanding of the mathematical and scientific facts easier in a way that students could reflect on what they are being told, shown and exposed. Effective student engagement depends on students` enjoying their studies in mathematics and science, being confident in their ability and recognizing the relevance of these subjects to everyday life, (parliament.vic.gov.au/etc/reports/math science).

According to Owings and Follo (1992), the portfolio assessment can help students understand their strengths and weaknesses. Furthermore, Gilman et.al (2005) stated that portfolios can be used to evaluate both products and process which allow the integration of learning and assessment. Learning based on portfolio assessment can be more student-directed, and instruction is based on learning styles that is easily evaluated. In sum, portfolios enable to assess global understanding and thinking skills with a multidimensional form of evaluation.

The idea of portfolio is close enough to satisfy educators' belief that assessment is most effective when it becomes an integral part of instruction. Because of the limitation of traditional assessment tests, many educators described the advantages of portfolio assessments. Portfolios help students develop skills necessary for life-long learning. On the other hand, portfolios reduce the teacher's daily burden of grading papers.

Furthermore Wolfe (1996) show that "through the use of large-scale portfolio assessment, students can realize their educational outcomes which focuses on traditional goals such as acquiring content knowledge and performing well on standardized multiple-choice tests. Students were able to reflect on and formulate statements about their personal beliefs and values, their understandings of themselves as learners and their abilities and skills as writers and their goals and aspirations. Moreover, portfolios are valuable tools for demonstrating authentic evidence of the professional skills necessary for mastering in teaching math and science concepts as well as preparing students for easier understanding on math and science concepts.

The importance of using Portfolio as a form of assessment includes the involvement of the real-world problems that mimic the work of professionals; open-ended inquiry, thinking skills, and metacognition; engage students in discourse

and social learning; empower students by choice to direct their own learning.

High quality education outcomes in mathematics and science are important in ensuring growth in new fields of science, technology and innovation.

Statement of the Problem:

This study aimed to determine the perceptions of teachers in portfolio assessment in enhancing the teaching of Math and Science Concepts.

Specifically, it sought to answer the following questions;

1. How frequent is the use of portfolio assessment in teaching Math and Science Concepts?
2. What are the practices of portfolio assessment in teaching Math and Science Concepts?
3. What is the extent of effectiveness of portfolio assessment in enhancing the teaching of Math and Science concepts in the development of ;
 - a. Cognitive Skills
 - b. Affective Skills
 - c. Psychomotor Skills
4. What is the extent of the attainment of the objectives of portfolio assessment in teaching Math and Science concepts?

Conceptual Framework

With the varied form of assessment used in teaching science-math concepts, teachers used portfolio assessment as an innovative form of assessing the performance of students in learning math-science concepts. The research framework of this shows the perceptions of science-math teachers in terms of the frequency, practices, effectiveness and attainment of objectives in using portfolio as a form of assessment. The processes considered in the data gathering procedure were ;a) survey questionnaire that was adopted by Azam(2006) and b) data analysis that made use of descriptive design using statistical tool (weighted mean, percentage & likert scale). It is suggestive that the more frequent that the teacher utilized portfolio as a form of assessment and better implementation of the practices, the higher the degree of effectiveness and the attainment of the objectives of teaching science and math concepts. In addition, it could also make science and math concepts easily understood by the students.

Methodology:

This study made use of the descriptive design using the technique of normative survey. Data were collected through questionnaire which was adopted by Azam (2006) having five options and four parts namely; frequency, practices, effectiveness and attainment of objectives of using portfolio assessment. The questionnaire was administered by total enumeration to 60 math and science teachers who are using portfolio as a form of assessments from both public and private schools of the province of

Abra. Document analysis and follow- up interviews was also done. A letter asking permission to administer the questionnaire was given to the school principal/chairman/Dean. Upon approval, the questionnaire was administered to the teacher respondents.

This study was conducted during the SY 2010-2011. The data gathered were tabulated, presented, analyzed, interpreted and described with the use of appropriate statistical tool.

The statistical treatment of the data includes frequency, weighted mean and the five point Likert Scale.

Results and Discussion:

Frequency and percentage of the used of portfolio assessment in teaching math and science concepts

Table 1 shows the frequency and percentage of using portfolio assessment according to the type of portfolio used and frequency in assessing and evaluating math and science concepts.

As to the type of portfolio used in assessing math and science concepts, fifty percent (50%) utilized both process and product oriented assessment. Thirty six point sixty seven percent (36.67%) made use of the product oriented assessment and thirteen point thirty three percent (13.33%) the process oriented assessment. Most of the math and science teachers used of both the process and product oriented assessment since they were after on the growth and collection of the best works of their students. These give updated information on the students' performance inside the classroom.

When it comes to the frequency of the used of portfolio in the evaluation of the math and science concepts, thirty percent (30%) of the respondents checked the portfolio of their students every week, twenty six point sixty seven percent (26.67%) every semester, twenty five percent every month (25%), eighteen point thirty three percent every quarter and zero percent (0%) every year. This indicates that the respondents continuously monitor the performances/achievements of their students inside the classroom. The respondents tend to monitor the reflection and meta cognition of the students. Thus, portfolio assessment greatly contribute for the success of teaching- learning in the classroom and makes the students easily understand and comprehend the math and science concepts

Table 1. Frequency and percentage of the used of Portfolio assessment in teaching Math and Science Concepts

Factors	f	%
Type of Portfolio		
Process-oriented	8	13.33
Product oriented	22	36.67
Both Process and Product	30	50
Sub-total	60	100%

Frequency of Evaluation		
Every week	18	30
Every month	15	25
Every quarter	11	18.33
Every semester	16	26.67
Every year	0	0
Sub-Total	60	100%

The practices of portfolio assessment in teaching

Math and Science Concepts

The practices of portfolio assessment exhibited by the respondents were; attainable and understandable goals and objectives of the course, designing and applying appropriate assessment techniques, stimulating/motivating and facilitating students to learn, giving feedback to students on their performances and achievements and applying the latest techniques, approaches and strategies in teaching math and science concepts to students.

As seen in Table 2, these practices were almost fully manifested except of the used of multiple instructions that was moderately manifested. This implies that these practices were done by the respondents and good learning outcomes were achieved by the students. The used of multiple instructions was moderately manifested since there is an inadequacy of the multi-media technologies utilized by the respondents in teaching math and science concepts.

Based on students' interview, the common practice they usually do was to demonstrate their knowledge and integrate the concepts they learned from their teachers. They also point out that by means of portfolio assessment they are trained to be more creative, easily understand math and science concepts since it provides a structure of long duration assignments and a concrete idea of what they are learning from their teachers.

Table 2. The practices of portfolio assessment in teaching Math and Science Concepts

Practices	Mean (x)	Descriptive Rating
1. Course and goals of portfolio assessment are tied to specific learning outcomes	3.5	Almost fully manifested
2. Course and goals of portfolio assessment are fully understood by the students	3.8	Almost fully manifested
3. Designing and organizing formal assignments and examinations appropriate to learning outcomes	3.9	Almost fully manifested
4. Uses multiple instruction such as multimedia technologies	3.2	Moderately manifested
5. Designing and applying appropriate assessment techniques	3.6	Almost fully manifested
6. Stimulating students' interest in and engagement with the course material by making it relevant to their lives	3.73	Almost fully manifested
7. Facilitating student's participation in classroom activities that evoke their interest and	4	Almost fully manifested

appropriately challenge them		
8. Give students frequent, timely, and constructive feedback	3.7	Almost fully manifested
9. Provide feedback to students to give them clear messages about their performance in ways that will help them improve before the semester is over	4	Almost fully manifested
10. Include lecturing to convey information and concepts clearly, using forms of group learning and collaborative learning, and running effective discussions	3.92	Almost fully manifested
11. Incorporate approaches that help establish appropriate peer group values and behaviors related to course objectives, and then connect these values to intended learning objectives	3.93	Almost fully manifested
12. Incorporate into your teaching the latest scholarship in your field or discipline	3.4	Almost fully manifested
Total	3.72	Almost fully manifested

Legend:	Mean	Descriptive Rating
1	1.0-1.8	NA
2	1.8- 2.6	LM
3	2.6- 3.4	MM
4	2.4- 4.2	AFM
5	4.1 -5.0	AFM

Extent of effectiveness of portfolio assessment in enhancing the teaching of math and science concepts

The extent of effectiveness of portfolio assessment in enhancing the teaching math and science concepts in the development of cognitive skills, is shown in Table 3-a.

In terms of the knowledge skills, remembering of the math and science concepts was fully effective (4.5). However, recalling and retrieving were almost fully effective. On the other hand, the respondents' responses on portfolio assessment based on comprehension, application, analysis, synthesis and evaluation skills were also almost fully effective with a weighted means ranges from of 3.5 – 3.82 respectively. This signifies that the used of portfolio assessment in teaching math and science was not yet fully implemented among the respondents. Based on interview, they don't have on time checking of the portfolio of their students as it was only done weekly or monthly. Mastery of the cognitive skills learned by the students' lies on the capability of the teacher to teach and assess math and science concepts based on the students' learning dimensions. Hence, observance and provide adequate assistance on the students' progress during the learning process should be considered. According to Wiggins (2007), students are more engaged in tasks and teachers can be more confident that the assessment he gives is meaningful and relevant. In addition Myerson's

(1997) stated three generic categories of factors that affect the implementation process of change within the classroom: teacher uniqueness, professional development, and teaching environment. Parallel to this, teachers tend to be more flexible and responsive to their students' learning needs. In making such inferences about students' reasoning and learning problems, teachers must align the subject knowledge that they target with the situation, types of student responses, and characteristics of the student or group of students (Spinelli et.al, 2001).

Table 3-a .Extent of effectiveness of portfolio assessment in the development of Cognitive Skills

Extent of effectiveness of Portfolio Assessment	Mean (x)	Descriptive Rating
Knowledge (Skills)		
1.Remembering	4.5	Fully effective
2.Retrieving	3.6	Almost fully effective
3.Recalling	3.8	Almost fully effective
relevant knowledge from long-term memory of math and science concepts.		
Comprehension (Skills)		
4.Understand the meaning	3.7	Almost fully effective
5.Translate	3.6	Almost fully effective
6.Interpolate	3.52	Almost fully effective
7.Interpret	3.7	Almost fully effective
Instructions and problems in math and science concepts		
Application (Skills)		
8. use concept in a situation	3.7	Almost fully effective
9. Unprompted use of an abstraction	3.2	Moderately effective
10. Applies what was learned in the classroom into novel situations	3.68	Almost fully effective
11. Carrying out or using a procedure through executing, or implementing.	3.75	Almost fully effective
12. Make use of and apply practice theory	3.6	Almost fully effective
13. Use problem solving	3.8	Almost fully effective
14. Use information in new situations	3.8	Almost fully effective
Analysis (Skills)		
15. Separates material or concepts into components and parts	3.5	Almost fully effective
16. Distinguishes between facts and inferences	3.6	Almost fully effective
17. Taking concepts apart and break them down	3.5	Almost fully effective
18. Recognize poor logic and assumptions	3.5	Almost fully effective
19.Evaluate relevancy of math and science concepts	3.6	Almost fully effective

Synthesis (Skills)		
20. Builds a structure or pattern from diverse elements	3.5	Almost fully effective
21. Put parts together to form a whole, with emphasis on creating a new meaning or structure	3.7	Almost fully effective
22. Put information together in a new & creative way	3.8	Almost fully effective
Evaluation (Skills)		
23. Making judgments based on criteria and standards	3.82	Almost fully effective
24. Make judgments about the value of ideas or materials.	3.77	Almost fully effective
Total	3.67	Almost fully effective

Legend:	Mean	Descriptive Rating
1	1.0 -1.8	NE
2	1.8- 2.6	LE
3	2.6- 3.4	ME
4	2.4-2.0	ALF
5	4.2 -5.0	FE

Table 3-b shows the extent of effectiveness of portfolio assessment in enhancing the teaching math and science concepts in the development of affective skills.

The respondents respond was almost fully effective with a weighted mean ranges from 3.7 – 3.8 which were more or less the same .This implies that the respondents considered to develop educational values and behaviors of their student learn math and science concepts. Furthermore, Weber (2001) found out that portfolio assessment is an effective way of to assess teachers' teaching since they can expressed their feelings of relief and compliments themselves of their handworks if they found out that their students are learning effectively. Furthermore, effective practice of portfolio assessment begins among teachers and enacts a vision of the kinds of learning they most value for their students and strive to help them achieve. Assessment threatens to be an exercise in measuring what's easy, rather than a process of improving what they really care about.

Table 3-b.Extent of effectiveness of portfolio assessment in the development of affective skills

Extent of effectiveness of Portfolio Assessment	Mean (x)	Descriptive Rating
25. Awareness, willingness to hear, selected attention	3.73	Almost fully effective
26. Active participation on the learning of mathematical concepts	3.8	Almost fully effective
27. Attends and reacts to a particular phenomenon	3.6	Almost fully effective
28. Learning	3.7	Almost fully

outcomes may emphasize compliance in responding, willingness to respond, or satisfaction in responding		effective
29. Simple acceptance to a more complex state of commitment in learning math and science concepts	3.8	Almost fully effective
30. internalization of a set of specified values,	3.7	Almost fully effective
31. Organizes values into priorities by contrasting different values, resolving conflicts between them, and creating an unique value system	3.6	Almost fully effective
32. Instructional objectives are concerned with the student's general patterns of adjustment (personal, social, emotional)	3.6	Almost fully effective
33. Reflects the value system of the learner that controls their behavior.	3.8	Almost fully effective
Total	3.70	Almost fully effective

Legend:	Mean	Descriptive Rating
1	1.0 -1.8	NE
2	1.8- 2.6	LE
3	2.6- 3.4	ME
4	2.4- 4.2	AFE
5	4.2 -5.0	FE

As gleaned from Table 3-c, the extent of effectiveness of portfolio assessment in the development of the psychomotor skills of the students was almost fully effective as indicated in the weighted means that ranges from 3.6- 3.7 respectively. This indicates that most of the learning targets of respondents were reflected on the actual performance and range of accomplishments of the students' respondents. They act as facilitator of their students of producing quality works. On the contrary, some of the respondents do not engage their students on self – reflection of their best works. Moreover, Collins (2008) stated that portfolios encourage student creativity and allow for students to emphasize the aspects of a concept most relevant to them in meaningful ways .It also engender self-reflection and self-assessment.

Surtam (2004) stated also that portfolio assessment is a student-centered activity which the students have the chance to choose some of their

works and have a concrete application of their own works for assessment. This shows the learning outcomes learned by the students at the end of the learning process.

Table 3-c.Extent of effectiveness of portfolio assessment in the development of Psychomotor skills

Extent of effectiveness of Portfolio Assessment	Mean (\bar{x})	Descriptive Rating
34. Learners ability to make of use sensory cues to guide their motor activity	3.7	Almost fully effective
35. Readiness to act that includes mental, physical, and emotional sets which predetermined the learners response to different situations	3.7	Almost fully effective
36. Adequacy of performance is achieved by trial and error or imitation	3.6	Almost fully effective
37. Learned responses have become habitual and the movements can be performed with some confidence and proficiency.	3.6	Almost fully effective
38. Proficiency is indicated by a quick, accurate, and highly coordinated performance, requiring a minimum of energy.	3.6	Almost fully effective
Total	3.64	Almost fully effective

Legend:	Mean	Descriptive Rating
1	1.0 -1.8	NE
2	1.8- 2.6	LE
3	2.6- 3.4	ME
4	2.4- 4.2	AFE
5	4.2 -5.0	FE

Extent of the attainment of the objectives of portfolio assessment in teaching math and science concepts.

Table 4 revealed that as a whole the learning objectives of portfolio assessment were almost fully attained as indicated in the weighted means that ranges from 3.6-3.9.respectively.The weighted means drawn from the table indicates that the respondents have more or less equal accomplishments with regards to the attainment of the objectives of portfolio assessment in teaching math and science concepts. Furthermore, despite of the nature of learning of students' respondents, they still provide positive attitudes to the learners to fully attain their objectives. This justifies also that they were knowledgeable enough with portfolio assessments as it gave the same result in the practices and extent of effectiveness of using portfolio assessments in teaching math and science. This finding supports also the idea of Collins (2008) that assessment makes a difference when it begins with issues of use and illuminates questions

that people really care about which means that it recognizes the value of information in the process of improvement to promote change.

Table 4. Extent of the attainment of the objectives of portfolio assessment in teaching Math and Science concepts

Extent of the attainment of the Objectives of Portfolio Assessment	Mean (x)	Descriptive Rating
1. Portfolio matches in assessment in teaching math and science concepts	3.7	Almost fully attained
2. Portfolio assessment has clear goals at the beginning of instruction and are clear to students and teachers alike	3.8	Almost fully attained
3. It gives a profile of learner's abilities in terms of depths, breadth and growth.	3.6	Almost fully attained
4. It is a tool of assessing a variety of skills and normally testable in a single setting for traditional testing	3.6	Almost fully attained
5. It develops awareness of own learning by the students	3.8	Almost fully attained
6. It caters to individuals in a heterogeneous class.	3.68	Almost fully attained
7. It develops social skills.	3.8	Almost fully attained
8. It develops independent and active learners	3.8	Almost fully attained
9. It can improve motivation for learning	3.9	Almost fully attained
10. It provides opportunity for student-teacher dialogue	3.87	Almost fully attained
Total	3.80	Almost fully attained

Legend:	Mean	Descriptive Rating
1	1.0 -1.8	NA
2	1.8 -2.6	LA
3	2.6 -3.4	MA
4	2.4 -4.2	AFA
5	4.2 -5.0	FA

Based on the overall average weighted mean of 3.74 shown in Table 5, this describes that portfolio assessment does almost fully achieved the teaching performance of the respondents in teaching math and science concepts. However, the respondents reflect the balance between practices, effectiveness and attainment of portfolio assessment in teaching math and science concepts to ensure a holistic learning to their students. Moreover, Azam (2006) stated that developing portfolio for assessing teaching was an effective way to document teachers' professional growth and track their progress during their teaching process.

Conclusion:

The findings of the study had led the following conclusions:

1. Portfolio assessment plays a significant role in teaching and learning math and science concepts. It enhances the teaching of math and science concepts

in the development of the cognitive, affective and psychomotor skills of the students.

2. The effective use of the portfolio as learning and assessment tools depends on the knowledgeable experience of the teachers who made use of it.

3. It was found out to be effective in assessing the students' as well as teachers' performances during teaching - learning process math and science concepts.

4. Through portfolio assessment, the attainment of learning the math and science concepts made it easy for the students.

Recommendations:

Based on the conclusions drawn, the following recommendations are hereby suggested for considerations;

1. Realistic portfolio assessment should be practice among math and science teachers to provide quality learning assessment to students.

2. Multiple instructions should be utilized by math and science teachers in teaching math and science concepts.

3. In terms of practices, process oriented portfolio should dominate the product oriented portfolio.

4. In service seminars on portfolio assessment should be undertaken to science and math teachers.

5. Rubrics and self-reflections should be utilized to evaluate both the process and product oriented assessments

6. Portfolio assessment is an index of preparedness to students to learn complex science & math concepts.

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Exploring the Technology Readinnes of Business Students in an E-learning Environment Business College

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Abstract. Recently business schools are offering classes online or classes using a mix face to face or online elements. Current technology use within a college classroom learning environment may include items like Microsoft's Power Point, E-mail, course web sites, multimedia, animation etc. However the technology readiness is the important thing of the success of business students.

Technological Readiness is a well established constructs that conceptualized by Parasuraman (2000). This construct consist of four dimensions: (1) optimism, (2) innovativeness, (3) discomfort (4) insecurity. The four dimensions are relatively independent of each other, therefore an individual could harbor both contributor and inhibitor feelings towards technology.

The aim of this research is to explore the relationship between technological readiness constructs and the demographics variables of business college students in Surabaya who majoring in accounting and management field. Another aim of this research is to know the level of technological readiness in STIE Perbanas College. For the measurement we use 32 items technology readiness index presented by Parasuraman.

The demographic variables used in this study included: gender, field of study, and the status of high school. We conduct an independent sample t-test to explore the differences between the demographic variable with the respects of technology readiness.

The result is that there are no differences on technology readiness of business students with the respect of demographic variables. Based on the demographic variable : gender, field of study and senior high school, The technological readiness among the student is not different. Limitation and Implications for the development of the implementation of technology in teaching and learning are provided also the suggestion of future research.

Key word: e-learning, technology readiness, business students

I. INTRODUCTION

Today, e-learning more widely implemented in educational institutions. E-learning becomes a popular means to support the teaching and learning processes. There are some benefits of e-learning in supporting teaching and learning in Higher Education, i.e. e-learning organize the learning materials through various media. E-learning also provides benefits for learners in terms of ease of accessing material from various online sources like e-mail, chat, forum, assignment, quiz etc. In addition learners also can perform self-learning to encourage student involvement (student engagement) in teaching and learning (ling and Moi, 2007). Build a teaching system based on e-learning requires a substantial investment, therefore an educational institution must be sure that such system give the institution a lot of benefits.

Therefore, the implementation of the e-learning can not increase the quality of learning proses directly, Pituch dan Lee (2006). The benefit of e-learning can't be maximal until the learner use that. The disposition and the ability of students to use e-learning support the success of the implementation of e-learning system.

Some of research result found that technology readiness have impact on the extent of the e-learning used by the student.

The aim of this research is to explore the relationship between technological readiness constructs and the demographics variables of business college students in Surabaya who majoring in accounting and management field. Another aim of this research is to know the level of technological readiness in STIE Perbanas College.

II. THEORITICAL FRAMEWORK AND HYPOTHESES

Previous study shows that a combination of positive and negative beliefs about technology underlies the domain of

technology readiness. Dabholkar, 1994, said that individuals simultaneously have both positive and negative beliefs about technology. Also, positive beliefs cause a person to easily accept new technology, while negative beliefs make them difficult to accept new technology. Individuals with positive beliefs are more ready to use the new technology (Mick & Fournier, 1998). Parasuraman and Colby (2001) introduced the term technology readiness, which refer to the behavior process behind the adoption of technological products and services. According to them, that individuals who are ready to use technology are more likely to try it (Parasuraman, 2000).

There some concept for capturing the technology acceptance. Davis (in Elliot at all, 2008) developed the technology acceptance model (TAM). TAM measure the potential drivers and inhibitors of technology acceptance. In the other hand, Parasuraman (2000) proposed a Technology Readiness Index wich measures the “propensity to embrace and to use new technologies for accomplishing goals in home life and at work. Technology readiness index (TRI) can be divided into four constructs or dimensions, with two factors being motivators of new technology use and another two factors being inhibitors as following: (1) Optimism: the degree to which individuals believe that technology can benefit live and give them more control over their live, (2) innovativeness: a tendency to be the first in usinfg new technology, (3) Discomfort: a perception of lack of control over technology and feeling of being overwhelmed by it. and (4) Insecurity: distrusting of technology and skepticism about its ability to work properly (parasuraman 2000, Parasuraman and Colby, 2001).

This research use TRI, because several empirical satudies provide that TRI scale can capture the relationship between technology readiness and technology usage behaviour (Parasuraman and Colby, 2001). According to Paarasuramand and Colby (2001), technology readiness is an overall state of mind and not measured of technical competency or ability.

Although every individuals simultaneously have both positive and negative beliefs about technology, but the extent to which positive and negative attitudes they show will be different depending on several factors. In this research we examine whether a person's technology readiness will be different when seen from some of the demographic variables and to map the extent of technology readiness of students in STIE Perbanas Surabaya.

III. RESEARCH METHOD

A. Research Deasign

Research design is a framework or blueprint as the main guideline in conducting the entire series of activities in research (Maholtra, 2006). Research design can be viewed from many different perspectives. Based on objective perspective, this research is explanation research. (Sekaran, 2006). Acccording to the data collection method this research is survey research (Sekaran, 2006).

B. Population , Sample and Sampling

Population in this research is the students of STIE Perbanas Surabaya College. We use the non probability sampling to choose the respondent (purposive sampling). We set the sample member based on the criteria which is choosed by the researchers. The criteria is that the respondent has studied in STIE Perbanas Surabaya minimum for one yaear. There are 107 students involve as respondents.

C. Measurement

We asses the Students' Technology Readiness using the Technology Readiness Index subscale modified by Parasuraman (Parasuraman and Colby, 2001) The Technology Readiness Index measures: four dimensions: (1) optimism, (2) innovativeness, (3) discomfort (4) insecurity. The instrument consist of 32 items where measured on a 5-point Likert style scale.

IV. DATA ANALYSIS AND DISCUSSION

A Descriptive Statistical Analysis

Data analysis performed by descriptive statistical techniques and independent sample T test. We also measure the level of Technological Readiness of the student, by subtracated the negative attitude (discomfort and insecurity) towards the positive attitude (optimism and innovativeness). The Respondents Profiles are:

Table 1: Respondents Profile

Demographic Charateristics		Frequency	%
Gender	Male	37	34.36
	Female	70	65.4
Age	16 < x <= 17	1	.9
	17 < x <= 19	27	25.2
	19 < x <= 21	70	65.4
	> 21	29	8.4
High School Status	State	69	64.5
	Private	38	35.5
High School Subject	Social	59	55.1
	Science	48	44.9
Field of Study	Management	53	49.5
	Accounting	54	50.5

Source: Data Analysis

The respondents were 107 students in STIE Perbanas Surabaya College. 65.4% of respondents was female. The age of the students with is dominated by the student who age is

about 19-21. 55,1 of respondents have social background in senior high school. Then, 50,5% students choose accounting as field of study.

B. Reliability Test

The Cronbach's alpha was computed to determine the reliability of 32 measurement item used in measuring Technology readiness dimension. Table 2 show The Cronbach Alpha . According to Nunnally (1978) the level of reliability are satisfactory (> 0.6)

Table 2 : The Cronbach's Alpha

TR Dimension	Cronbach Alpha
Optimism	0.82
Innovativeness	0.74
Discomfort	0.69
Insecurity	0.66

Tabel 2 shows that Cronbach's Alpha for Technology Readiness dimensions ranged from 0.66 until 0.82.

Based on Table 3, respondents show optimism towards new technology with mean skor of 4. Respondent also show high Insecurity and moderate innovativeness and discomfort. The overall TRI score is 3.58. Show Moderate Technology Readiness.

Tabel 3. Summary Statistics

TR Dimensions	Mean	St. Dev
Optimism	4.00	0.98
Innovativeness	3.29	0.54
Discomfort	3.36	0.50
Insecurity	3.68	0.46

C. Mean Scores and t Test

The next step, we explore if there any differences between technology readiness and some demographic variable. The result show in following table 4 :

TR Dimension	optimism	Innovativeness	Discomfort	Insecurity
Mean male	3.8	3.30	3.4	3.67
Mean female	4.1	3.25	3.3	3.69
P-value	0.134	0.66	0.425	0.791
Mean state	4.0	3.3	3.39	3.66
Mean private	3.9	3.2	3.8	3.7
p-value	0.799	0.66	0.269	0.618
Mean sci	4.0	3.2	3.3	3.65
Mean sos	3.9	3.4	3.4	3.7
p-value	0.60	0.196	0.392	0.57
Mean mngt	3.9	3.4	3.5	3.8
Mean acat	4.0	3.2	3.2	3.6
p-value	0.73	0.062	0.002**	0.089

Based on table 4, there are significance differences between management student and accounting in discomfort variable. Another dimension of technology readiness are not different in some variables like gender, high school status, and the background of subject in economy.,

D. Discussion

Aim of this research is to explore the level of technology readiness of Student in STIE Perbanas Surabaya and whether there are differences in technology readiness of business students with the respect of demographic variables. some of demographic variable : gender, senior high school status, subject in high school and field of study. As expected, from the mean score the result show that dominantly the student have high level of technological readiness. In nowadays, people has a modern life, that make them very familiar with the use of new technology. In STIE Perbanas context, more than 60% respondent come from Java Island, the biggest and the most develop city in Indonesia, So it has impact on the technology readiness of the student. The high of Technology readiness index in turn will influence the adoption of e-learning by the student. Research which connected the technology readiness and the acceptance model should elaborate in the future.

Another research result is that there are not a significance differences in technological readiness in respect of demographic variables, except for discomfort dimension, that has differences in term of the field of study. So we can say that management student feel discomfort when use technology more than accounting student. Globally, technology readiness is influenced by the experience in past, so the people who growth in environment that encourage the use of technology has a high technology readiness. This research has implication, that to become a successful student of higher institution, especially in e-learning context, the student must be prepared to have technology readiness. In the future, the next researcher could explore the impact of technology readiness to the Technology Acceptance Model (TAM) to examine the student acceptance of e-learning.

V. CONCLUSION

The purpose of this research is to explore the level of technology readiness of Student in STIE Perbanas Surabaya and whether there are differences in technology readiness of business students with the respect of demographic variables. some of demographic variable : gender, senior high school status, subject in high school and field of study. As expected, from the mean score the result show that dominantly the student have high level of technological readiness. These

research result have implication that the development of e-learning system will be succesfull because the student have a high level of technology readiness. The board of leader must developed the e-learning system better in the future.

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Implementation of Student Centered Learning Model in Teaching Learning Process to Increase the Students' Performance and Core Competency

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Abstract - the low quality of the passing grade students of micro and macro economics is the main reason in formulating a new learning model. low passing grade is predicted as the subjects are less interesting to learn, beside that an understanding of the concept of learning among students is very low. based on observed present model of study applied is still teacher centrality, in which the students' activities are still less than lecturers, so that it is needed a model of student centrality. efforts in creating student centrality will be designed and implemented a learning model student centered learning (scl) by using the method of inquiry and methods of discovery. the implementation of this model is expected able to change teaching learning process in the classroom from teacher centrality to student centrality. the aims of changing the learning model to motivate and to give stimulation to students in order to increase the power of their contemplative faculties both hard skills and soft skills so they are able to increase their performance and core competency. We observed the data from the questionnaire and will use samples of students taking subject in micro economics and macro economics and then analyze it using the descriptive method of analysis. The results would contribute to the continuance of this program

Keywords - teacher centered learning, student centered learning, method of inquiry and method of discovery

I. BACKGROUND

Scientifically, economics knowledge is an important knowledge that must be mastered by students studying at study program of management and accountancy. Economics subject is very basic knowledge for other subjects of lecture in study program of management and accountancy. Subjects of lecture belonging to economics knowledge are micro economics and macro economics. The subject of lecture of micro economics, specifically studies about individual behavior in economy. Whereas, the scope of macro economics is to analyze aggregative elements in economy, the issues in macro economics include the instruments of macro economics and the government roles.

A. Present Applied Teaching Method

The present teaching method applied at Widyatama is dominated by speech method in which overall teaching learning process is still lecturer centered model. Critical responses and attitudes of the students toward lecturing material are relatively low and only centered to certain students, whereas most of other students are still passive. The present applied lecturing method can be categorized as teacher centrality with the activities patterns is centered to the lecturer.

B. Analyzed Problems Based On Results Of Study Achieved By Students

The misunderstanding of the learning concept becomes one of the reasons causing low quality score of passed students, other problems are; first, appearing from the students themselves (learners) including; motivations of study, imaginations / the ways of abstract thoughts, responses, initiation, critical and curious attitudes are generally still low. Second, the intention to enrich the information by literary study has not been appear by themselves. The low understanding of the students toward concepts of study leads to low quality of passing grade and great number of failed individual students for the subjects of lecture of economics. This condition can be seen from passing grade within the last two years, the data shows that average passing grade with alphabetical score of A is only : 10 %, B: 20%, C: 40%, whereas the average of failed score, the alphabetical scores of D and E are 30%.

II. LIMITATIONS OF PROBLEM

Based on the background of the problem above, new concepts and approaches are necessary to apply the strategy and method of teaching and learning aimed at *Student Centered Learning* (SCL). Thus, the limitations of the problem are as follows:

- A. What kinds of model and method of study are able to develop active role of students and the quality of teaching learning?
- B. What are the influences of the model and method of SCL toward the development of students' core competency?
- C. What are the impacts of the development of model and method of SCL toward the level of passing, academic performance, and students core competency?

III. OBJECTIVES AND BENEFITS

A. Objectives

The objectives of the implementation of SCL model are to motivate and to give stimulant to the students in order to increase the reflecting thinking of students and the level of passing students. Thus, this model can be planning guidance and the implementations of teaching learning process are expected able to increase students' performance and core competency.

B. Benefits

The benefits of implementation model and method of SCL are as follows:

- 1) To motivate the capability of the students to arrange self-direction
- 2) To motivate students' critical thinking and to increase their bravery to express their free opinion
- 3) To accustom the students to solve their problem together, so the function of encouragers arises
- 4) To give experience and deep impression, and contribute the development of both hard and soft skills of the students

IV. TEACHING AND LEARNING MODEL

SCL model in learning model is centered to students, but lecturers are still necessary to give material as short direction with shorter time.

Method of inquiry is a learning method in which the students actively propose questions to be answer and propose problem to solve in connection with finding problems. Problem solving based on module or teaching material provided by lecturer.

There are four impacts of method of inquiry [6]:

1. increasing the ability of critical thinking
2. increasing the self capacity of the students to solve problem
3. raising more responsibility toward their study
4. developing students intelligent

Method of inquiry significantly beneficial to increase : the academic performance (33%), critical thinking pattern (77%), skill in learning process (5%), and analyzing skill (14%) [10]. Furthermore, Method of inquiry influences to subject of study, opinion ability and creativity (18%), and for non-cognitive including the students attitude (39%) [9].

Method of discovery is a learning method in which the students are given questions to answer, problem to solve or cases to observe and to explain.

Method of inquiry and method of discovery are more effective when it is applied consistently with facilitation of learning, when the function of lecturers in class room tends to direct, their roles are more as facilitator than transmission of knowledge, so overall teaching and learning process is centered to students. Generally, both methods enable the event of increasing students thinking capacity that is beneficial to develop creative power, critical thinking, and self-estimation of the students.

Application of Method of inquiry and method of discovery in learning process in the classroom can be implemented in some stages [1], as follows:

Stage 1. Objectives (10 minutes)

Lecturer extends the objectives of material in the form of delivering the learned topic for each meeting with purpose to increase the capability of the student to master each learned topic.

Stage 2. Gearing up (15 minutes)

Students answer some questions given by lecturer related to lecturing material in form of topic. From this activity, it can be analyzed:

1. the level of students' basic knowledge of the material in the learned topic. This knowledge level will produce hard skill
2. the capability to give opinion, this capability will produce soft skill in form of Communication skill

Stage 3. Active Poll (60 minutes)

Students present material provided at home, delivered material has been previously determined by the lecture based on syllabus of the subject of lecture.

From this activity, it can be analyzed:

1. The students' mastery level of the learned material. This material mastery can produce hard skill
2. The capability to present material in front of class, this activity will produce soft skill in form of Communication skill

Stage 4. Active Concept Check (15 minutes)

This activity is in form of discussion or interview on the subject of material explained by the students. From this activity, it can be analyzed:

1. the students' mastery level of the material in learned topic. The material mastery can produce hard skill
2. the capability of questioning, answering and giving opinion or rejection in the class. this activity will produce **soft skill** in forms of Communication skill, interpersonal skill and decision making skill.

Stage 5. Active Application (40 minutes)

This activity can be in form of:

1. making conclusion or summary of learned material / topic
2. problem solving of cases from the learned material (it depends of the learned material)

From this activity, it can be analyzed:

1. The students' mastery level of the material based on the final conclusion they make in group. The activity of making conclusion from learned material can produce hard skill
2. Cooperative capability in group. This activity will produce soft skill in forms of problem solving skill, decision making skill and interpersonal skill

Stage 6. Information (10 minutes)

Informing lecturing activity and assignment for next week meeting.

V. IMPLEMENTATION OF SCL MODEL

The implementation of this SCL model is applied for one semester in the lecturing subject of macro economics and micro economics. The following activity is spreading questionnaires to students and lecturers of economics subjects to find out whether there are positive impacts of the improving teaching learning method. Then, evaluated in order to develop better teaching learning method.

At the end of lecturing semester, the questionnaires are spread to students and lecturers of macro and micro economics subjects applying SCL method.

Data of collected questionnaires are processed and analyzed to find out positive impacts toward the results of study.

VI. IMPLEMENTATION STRATEGY

Implementation strategy is carried out by applied planning method, that is "Student Centered Learning (SCL) by

implementation of inquiry and discovery methods" in some classes learning the subjects of macro and micro economics.

The success of SCL model implementation can be seen from the students' result of study. The result of study

can be in the forms of hard skill and soft skill. Hard skill is indicated by the existence of cognitive domain development whereas soft skill is indicated by the existence of affective domain development and psychomotor domain.

A. Cognitive Domain Development

Consistent implementation of SCL model in teaching learning process is expected enable to modify students' cognitive preference more to explore intrinsic factor, that is self- study motivation, it means that a student is really interested and needs lecturing material provided by the lecture so the students focus more attention to catch and comprehend the essence of lecturing material and begins thinking its application.

B. Affective Domain Development

Deep comprehension of students toward the essential meaning of lecturing material presented by lecturers will awake their affective proficiency.

C. Psychomotor Domain Development

The development of psychomotor proficiency of students is as the manifest of the development of creation and feeling domains, it means that the development of imagination power will motivate students' creativity to change creative power in teaching learning process in form of positive behaviors.

TABLE I
INDICATORS AND METHODS OF EVALUATION SCL MODEL

Performance Domains/ Aspects	Evaluated Variables	Evaluation Indicators	Evaluation Method	Expected Competency
A. Cognitive (creativity)	1. Observation	1. able to perform 2. able to compare C. able to correlate	1. oral test 2. written test 3. observation	Hard Skill is students' mastery toward all material in each learned topics
	2. Memory	1. able to mention 2. able to repoint Out	1. oral test 2. written test 3. observation	
	3. Comprehension	1. able to explain 2. able to define orally by themselves	1. oral test 2. written test	
	4. Application	1. able to give sample 2. able to use precisely	1. written Test 2. assignment 3. observation	
B. Affective (feeling)	1. acceptance	1. show acceptance attitude 2. show reject attitude	1. written test 2. attitude scale test 3. observation	Soft Skill: 1. Decision making skill 2. communication skill. 3. Problem Solving 4. Interpersonal Skill.
	2. Response	1. willing to participate / involve 2. willing to use	1. attitude scale test 2. assignment 3. observation	
	3. appreciation	1. regarding important and useful 2. regarding beautiful and harmonic 3. admiring	1. attitude scale test 2. assignment 3. observation	
C. Psychomotor	1. moving and action skill to produce a creation	Coordinate the movement of eyes hands, legs, and other parts of body	1. Observation 2. Action test	

	2. proficiency to express verbal and non-verbal	1. pronunciation 2. facial expression and gesture	1. Oral test 2. Observation 3. Action test	
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INSTRUMENTS OF THE SUCCESS OF SCL MODEL

A. Measuring Cognitive Performance

To evaluate cognitive development is applied the concept of standard reference assessment toward the students' capability in forms of: observation, memory, comprehension and application toward the lecturing material of macro and micro economics (table II)

B. Measuring Affective Performance

To evaluate affective development is applied the concept of attitude scale by proposing several questions to respondents by choosing one of the option as follows: absolutely agree, agree, hesitant, disagree, or absolutely disagree

C. Measuring Psychomotor Performance

To evaluate Psychomotor development is applied assessment toward various activities done by students in performing their learning activities (table III)

D. Measuring soft skill

To evaluate soft skill is applied by questionnaires spread to respondents by providing several statements by choosing one of the options: absolutely agree, agree, hesitant, disagree, or absolutely disagree

- Average grade is 38.2%. It means that 38.2% students own average affective development
- Good grade is 54.5%. It means that 54.5% students own good affective development
- Very good grade is 7.3%. It means that 7.3% students own very good affective development *Psychomotor Aspects*

The results of students' psychomotor aspects (based on table VI) are as follows:

- Low grade is 14.5%. It means that 14.5% students own low psychomotor development
- Medium grade is 35.5%. It means that 35.55% students own medium psychomotor development
- High grade is 50%. It means that 50% students own high psychomotor development

TABLE II
EVALUATION OF COGNITIVE PERFORMANCE

Final Score (Total All Components)	Grade	Credit	Qualification
≥ 80	A	4	Very good
70 – 79	B	3	Good
60 – 69	C	2	Average
50 – 59	D	1	Bad
< 50	E	0	Fail

TABLE III
EVALUATION OF PSYCHOMOTOR PERFORMANCE

	Kinds Of Activities	Activity And Creativity Level				
		Grades				
1	Making Summary of Lecturing material.(homework result)	A	B	C	D	E
2	Presenting lecturing material in front of class.	A	B	C	D	E
3	asking and answering questions in discussion.	A	B	C	D	E
4	Summarizing the result of lecturing material and solving problems in the forms of case study in group in the classroom.	A	B	C	D	E

VIII. OBSERVATION OF SUCCESS OF LEARNING MODEL

The objects of research of the implementation of learning model done for full one semester is the even semester in academic year 2010/2011, is

- the figure of cognitive, affective and psychomotor aspects of the students
- the influence of cognitive aspects toward hard skill competency, the influence of affective and psychomotor aspects toward soft skill competency

IX. THE RESULT OF LEARNING MODEL

The Implementation of learning model for the lecturing subjects of macro and micro economics in semester 1 and 2 academic year 2010/2011 at Faculty of Economy and Faculty of Managerial Business University of Widyatama, the respondents are around 300 students learning those subject Based on the table IV, it can be clarified that:

- the percentage of passed students achieving above 60 is 75.5%, with details: grade C = 16.4%, B = 21.8% and A = 37.7%
- the percentages of failed students is 24.5%, with details: grade D = 11.8%, and E = 12.7%. *Affective Aspects*

Based on the table V, it can be clarified that:

TABLE IV
THE RESULTS OF STUDENTS' COGNITIVE ASPECTS

Cognitive Aspects				
Students' Score	Qualification	Numerical score	Grade	Percentage
Under 50 = 12,7%	Very bad	< 50	E	12,7 %
Under 60 = 24,5 %	Bad	50 s/d 59	D	11,8 %
Above 60 = 75,5 %	Average	60 s/d 69	C	16,4 %
Above 70 = 58,2 %	Good	70 s/d 79	B	21,8 %
Above 80 = 37,3 %	Very good	> 80	A	37,3 %

TABLE V
THE RESULTS OF STUDENTS' AFFECTIVE ASPECTS

	Frequency	Percent	Valid Percent	Cumulative Percent
3.00 average	42	38.2	38.2	38.2
4.00 good	60	54.5	54.5	92.7
5.00 very good	8	7.3	7.3	100.0
Total	110	100.0	100.0	

TABLE VI
THE RESULTS OF STUDENTS' AFFECTIVE ASPECTS

	Frequency	Percent	Valid Percent	Cumulative Percent
1.00 very low	3	2.7	2.7	2.7
2.00 low	13	11.8	11.8	14.5
3.00 medium	39	35.5	35.5	50.0
4.00 high	36	32.7	32.7	82.7
5.00 very high	19	17.3	17.3	100.0
Total	110	100.0	100.0	

C. Regression

To find out the influences of cognitive aspects toward hard skill competency, and the influence of affective and psychomotor aspects toward soft skill, the regression statistic test is applied.

Based on regression calculation, it can be found out that:

- Regression coefficient (B) for affective and psychomotor indicates positive, it means that when the affective and psychomotor raise, so that the soft skill also raise
- The result of R^2 test is 32.20%, it indicates that variable model of soft skill can be influenced by affective and psychomotor variables as many as 32.20%, whereas the rests about 67.80% is influenced by other variables outside of the model
- Simultaneous test is pointed by sig F as many as 0.000 which is less than t table, it indicates that both affective and psychomotor influences soft skill
- Individual test pointed out by sig t, only affective influences soft skill as sig t of affective (0.000) less than t table; whereas sig t of psychomotor (0.160) does not influence as it is more than t table, even though psychomotor is not significant toward soft skill, however regression coefficient of psychomotor is positive, so that high psychomotor causes high soft skill
- There are no influences of psychomotor variable toward soft skill because the number of psychomotor variable is less, so that it is insufficient to regress with soft skill variable

The influence of cognitive aspect toward hard skill based on regression calculation test can be concluded as follows:

- Regression coefficient (B) for cognitive variable indicates positive, it means that when the cognitive raises (high), so that the hard skill also raises (high)
- The result of R^2 test is 30.47%, it indicates that variable model of hard skill can be influenced by cognitive variables as many as 30.47%, whereas the rests about

69.53% is influenced by other variables outside of the research model

- Individual test pointed out by sig t as many as 4.0713E-10 less than t table so that there is individual influences from cognitive toward soft skill.

SUMMARY MODEL

R	R ²	Adj R ²	Change Statistics				
			R ² change	F change	df1	df2	Sig. F Change
.568 ^a	.322	.310	.322	25.449	2	107	.0000

Predictors: (Constant), psikomotor, afektif, Dependent Variable: softskill

ANOVA^b

Model	Sum of Squares	Df	Mean Square	F	Sig.
Regression	1121.371	2	560.686	25.449	.000 ^a
Residual	2357.401	107	22.032		
Total	3478.773	109			

X. CONCLUSIONS AND SUGGESTIONS

A. Conclusions

- Low quality of passing subject of economic s lecture are caused by:
 - problems arises from students themselves (learner), including:
 - Motivation of study, imagination / abstract thinking, response, initiation, and critical attitude and curiosity are generally still low.
 - Low comprehension of the students toward concepts of study
 - the previous implementation of learning method is still teacher centrality
- Implemented SCL model has significantly succeed to form cognitive aspects (75.5% from passing students), affective (54.5% of the students are categorized good and 7.3% is very good) and psychomotor aspects (50% of students are high and 35.5% are medium)
- There are influences of:
 - Cognitive aspects toward hard skill of the students
 - Affective aspects to form soft skill
 - Psychomotor toward soft skill

B. Suggestions

- SCL model needs attention from every element of study program in order to sustainable. The sustain implementation of SCL at each subject will grow the students' habit of self study, critical and creative thinking, and appreciation to others, moreover, responsible toward job, at the end enable to graduate students possessing soft skill, hard skill and core competency.
- SCL model needs more supporting facilities, so that the provision of supporting facilities needs to be improved

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Students' Perceptions Regarding Ramkhamhaeng University's Social Responsibility Practices

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Abstract— Universities in Thailand are required to extend their responsibility towards the society. Hence, it is important to examine their practices regarding social responsibility. This research investigated the perceptions of MBA students at Ramkhamhaeng University regarding the university's social responsibility practices. Universities' responsibilities were classified into the responsibility towards students, personnel, suppliers, environment and the community. Moreover, they have to ensure the good governance practice. Students' perceptions regarding the aforementioned practices are categorized and compared based on demographic data. Data were collected from a group of samples consisted of 604 MBA students at Ramkhamhaeng University. T-test and One-way ANOVA statistical methods were used to test hypothesis based on demographic classifications. Results revealed students perceived that Ramkhamhaeng University extended responsibility towards the society at a high level. Students who had different demographic data had different perceptions regarding Ramkhamhaeng University's social responsibility.

Keywords — University, Social Responsibility, Thailand

I. INTRODUCTION

Sustainable development has become an important focus among organizations around the world. However, the economic development alone cannot provide sustainable development among nations. If other environmental and socio-cultural factors lagged behind, the economy advancement could be detrimental. The United Nations (UN) had suggested, in the World Economic Forum organized in 1999, The UN Global Compact which included ten principles in the areas of human rights; labor standards; environmental concerns; and anti-corruption for sustainable business and market development. With more than 8700 corporate participants and stakeholders from over 130 countries, The Compact has become the largest voluntary corporate responsibility initiative in the world [1]. The areas of human rights, labor standard and environmental concerns are the focus of this study. The corruption issue is rather sensitive and it is not appropriate for the objective of the current study. MBA students will become future business people who will have major roles in observing organizations' social responsibility. Hence, it is important to examine their perspectives regarding social responsibility. The aim of this research paper was to examine MBA students' perceptions towards Ramkhamhaeng University's practices in the areas of responsibility towards students, personnel, suppliers,

community, environment and good governance classified by demographic data.

II. LITERATURE

Reference [2] suggested that corporate social responsibility (CSR) could be divided into 4 levels: economic, legal, ethical, and philanthropic responsibilities. In the past, corporations aimed at satisfying only the economic needs mainly for the shareholders and consumers. The globalization and the development of communication systems have made organizations realized that only satisfying to the economic, legal and ethical requirements might not result in their sustainability. The illustration of company's philanthropic responsibilities could enhance consumers' perceptions towards the company. It was reported that company characteristics could create trust and acceptance among consumers [3], [4]. Hence, organizations are giving more importance towards corporate social responsibilities at all levels. As the recognition to the importance of CSR, the International Organization for Standardization has created the ISO26000:2010 as guidance on social responsibility to encourage the implementation of best practice in social responsibility towards main stakeholder groups [5].

"Corporate Social Responsibility (CSR) means that a corporation should be held accountable for any of its actions that affect people, their communities, and their environment" [6]. The "new social contract" theory suggested that corporations are related to various groups of stakeholders and that the relationships are dynamics [7]. Organizations must adapt and change in accordance to such dynamics in order to satisfy changing stakeholders' needs. Organizations should monitor and plan to respond to the changes in both the internal and external environment. Reference [8] reported that CSR created customer and employee trust, customer satisfaction, employee commitment and investor loyalty. Internal stakeholders such as the management, employees and labor unions could affect the operation and the value chain of the company. Treating them irresponsibly could create dissatisfaction and negative consequences to the delivery of goods and services to customers. Companies allow their actions to be more closely scrutinized by stakeholders than before. CSR has become a benchmark for organizations [9].

The Thai government is supporting universities to open up and create relationship with external parties to share knowledge with the society. University has complex involvements with other people, groups, and organizations in

society. As an education institution, university plays the role of educators who have the duty in creating responsible citizens for the society. As a knowledge hub, universities create and collect knowledge in order to share with students who, in turn, would share them to the society after their graduation. At the present time, the external stakeholders call for university to assist them not only through students but they call for more involvement of universities with the community. University Social Responsibility (USR) focuses on the areas of workplace, community, marketplace and the environment [10]. Corporate Social Responsibility Institute, a division of The Stock Exchange of Thailand (SET), supported that major stakeholders included customers, suppliers, personnel, community and environment as well as competitors and general population [11]. In summary, USR should encompass the responsibility of university towards stakeholders namely: students, personnel, suppliers, community, and the environment. Moreover, the Security Exchange of Thailand also suggested companies to show their social responsibility through good governance practices [12]. Hence, USR in this study comprised the above components.

III. METHODOLOGY

The aim of this research project was to assess the perceptions of MBA students at Ramkhamhaeng University regarding Ramkhamhaeng University's social responsibility. In Ramkhamhaeng University's context, the scope of this research project focused on 5 major stakeholders namely students, personnel, suppliers, environment and the community and to observe the university's good governance practice. Survey was performed through a 5-point Likert scale questionnaire to elicit MBA students' perceptions. The score ranged from 1=highly disagree to 5=highly agree. MBA students were incepted around their classes in the university. Altogether 604 sets of questionnaire were completed.

IV. RESULTS

Respondents consisted of 188 males (31.1%) and 416 females (68.9%). Majority of respondent aged between 26-30 years old (296 persons, 49%) followed by 31-35 years old (132 persons, 21.9%), less than 25 years old (92 persons, 15.2%), 36-40 years old (52 person, 8.6%), 41-45 years old (20 persons, 3.3%) and 12 persons were more than 46 years old (2%). The majority of respondents were single (504 persons, 83.4%). 84 were married (13.9%). Most respondents were entry level employees (460 persons, 76.2%). 112 were middle level managers (18.5%). 12 were business owners and 8 were top executives. A little more than half (53.6%) resided in Bangkok (324 persons), 204 or 33.8% resided in the provinces and 64 resided in the perimeters of Bangkok (10.6%). Mean values of students' perceptions towards each of the social responsibility practices are presented in table I.

TABLE I
MEANS OF RAMKHAMHAENG UNIVERSITY'S MBA STUDENTS' PERCEPTION
TOWARDS THE UNIVERSITY SOCIAL RESPONSIBILITY PRACTICES

Responsibility towards	N	Mean	Std. Deviation
Community	604	4.02	0.49
Students	604	3.89	0.44
Environment	604	3.85	0.53
Good governance	604	3.81	0.55
Personnel	600	3.68	0.49
Suppliers	600	3.50	0.57
Overall		3.79	0.38

In the overall level, MBA students reported that they perceived the university's social responsibility practices were at a high level (mean=3.79, SD=0.38). The means of responsibility towards the community was ranked the highest (mean=4.02, SD=0.49). The second was the university responsibility towards the students (mean=3.89, SD=0.44) followed by responsibility towards the environment (mean=3.85, SD=0.53). The fourth was the good governance practices (mean=3.81, SD=0.55) and responsibility towards the personnel (mean=3.68, SD=0.49). The last was responsibility towards the suppliers (mean=3.50, SD=0.57).

The means of the perceived differences between male and female and the t-test are presented in table II.

TABLE II
T-TEST RESULTS FOR THE DIFFERENCES BETWEEN THE
PERCEPTIONS OF MALE AND FEMALE

Means comparisons between genders

Responsibility towards	Male		Female	
	N	Mean	N	Mean
Students	188	3.8032	416	3.9287
Personnel	188	3.6560	412	3.6869
Suppliers	188	3.5106	412	3.4984
Environment	188	3.7447	416	3.8910
Community	188	3.9858	416	4.0417
Good governance	188	3.7340	416	3.8494
overall	188	3.7391	416	3.8173

T-test results for male and female perceptions

Responsibility towards	t-test for Equality of Means			
	t	df	Sig. (2-tailed)	Mean Difference
Students	-3.245	602	.001	-.12549*
Personnel	-.790	466.19	.430	-.03086
Suppliers	.246	598	.805	.01226
Environment	-3.009	324	.003	-.14634*
Community	-1.286	602	.199	-.05585
Good governance	-2.289	326	.023	-.11532*
Overall	-2.339	602	.020	-.07824*

Male and female students had different perceptions towards the university's social responsibility (USR) practices. In the overall level, female perceived that the university had practiced USR at 3.82 points while male's was 3.74 points ($t=-2.339$, $df=602$, $p < .05$).

In each of the USR dimension, differences existed between male and female towards the perceived responsibility towards the students ($t=-3.245$, $df=602$, $p < .05$); the environment ($t=-3.009$, $df=324$, $p < .05$); and the good governance practices ($t=-2.289$, $df=326$, $p < .05$). The differences regarding the USR towards the personnel, suppliers and the community were not statistically significant.

The means, ANOVA results and the mean difference comparisons of the perceptions between respondents in different age ranges are presented in table III.

TABLE III
ANOVA RESULTS FOR THE DIFFERENCES BETWEEN THE
PERCEPTIONS OF RESPONDENTS IN DIFFERENT AGE RANGES

Means of each age group							
Responsibility towards	<26	26-30	31-35	36-40	41-45	46+	Total
Students	3.8804	3.9189	3.8030	3.8718	4.0000	4.0833	3.8896
Personnel	3.7246	3.6836	3.5495	3.7885	4.0000	3.5000	3.6772
Suppliers	3.4783	3.5225	3.4271	3.6923	3.6000	3.0000	3.5022
Environment	3.9420	3.8829	3.6970	3.8974	3.8667	3.5556	3.8455
Community	4.1261	4.0608	3.9455	3.9154	4.0667	3.6111	4.0243
Good governance overall	3.9819	3.7804	3.7727	3.7115	4.2000	3.5833	3.8135
	3.8556	3.8082	3.7043	3.8128	3.9556	3.5556	3.7930

ANOVA

Responsibility towards	df	F	Sig.
Students	5	2.012	.075
Personnel	5	4.633*	.000
Suppliers	5	3.852*	.002
Environment	5	3.868*	.002
Community	5	4.088*	.001
Good governance	5	4.987*	.000
Overall	5	3.775*	.002

LSD Post hoc analysis for age groups

Responsibility towards	(I) age	(J) age	Mean Difference (I-J)	Sig.
Students	26-30	31-35	.11589(*)	.012
	31-35	46+	-.28030(*)	.036
Personnel	<= 25	31-35	.17516(*)	.008
		41-45	-.27536(*)	.021
	26-30	31-35	.13408(*)	.009
		41-45	-.31644(*)	.005
Suppliers	31-35	36-40	-.23898(*)	.003
		41-45	-.45052(*)	.000
	41-45	46+	.50000(*)	.005
	<= 25	36-40	-.21405(*)	.027
		46+	.47826(*)	.005
	26-30	36-40	-.16979(*)	.043
Environment		46+	.52252(*)	.002
	31-35	36-40	-.26522(*)	.004
		46+	.42708(*)	.011
	36-40	46+	.69231(*)	.000
	41-45	46+	.60000(*)	.003
	<= 25	31-35	.24506(*)	.001
		46+	.38647(*)	.017
	26-30	31-35	.18591(*)	.001
Community		46+	.32733(*)	.035
	31-35	36-40	-.20047(*)	.020
	36-40	46+	.34188(*)	.043
	<= 25	31-35	.18063(*)	.007
		36-40	.21070(*)	.013
		46+	.51498(*)	.001
Good Governance	26-30	31-35	.11536(*)	.024
		36-40	.14543(*)	.048
		46+	.44970(*)	.002
	31-35	46+	.33434(*)	.023
	41-45	46+	.45556(*)	.011
	<= 25	26-30	.20148(*)	.002
		31-35	.20916(*)	.005
		36-40	.27035(*)	.004
		46+	.39855(*)	.017
	26-30	41-45	-.41959(*)	.001
Overall	31-35	41-45	-.42727(*)	.001
	36-40	41-45	-.48846(*)	.001
	41-45	46+	.61667(*)	.002
	46+	<= 25	-.39855(*)	.017
	<= 25	31-35	.15126(*)	.003
		46+	.30000(*)	.010
	26-30	31-35	.10389(*)	.009
		46+	.25263(*)	.023
	36-40	46+	.25726(*)	.034
	41-45	31-35	.25126(*)	.006
		46+	.40000(*)	.004

The ANOVA test revealed that except for the responsibility towards the students, all other USR were perceived differently between students of different age groups. P-values were less than .05 for all dimensions except the responsibility towards students. Results from LSD post hoc analysis for difference between each age group revealed regarding the responsibility towards personnel students aged 41-45 vs. 46+ had the highest mean difference (mean difference = .50, $p < .05$) while 26-30 group and 31-35 group perceived the least difference (mean difference = .13408, $p < .05$). Regarding the responsibility towards suppliers, 36-40 and 46+ reported the most different (mean difference = .69231,

$p < .05$) and 26-30 vs. 36-40 reported the least different (mean difference = $-.16979$, $p < .05$). Regarding the responsibility towards the environment, < 26 vs. 46+ reported the highest different (mean difference = $.38647$, $p < .05$) while 26-30 vs. 31-35 reported the lowest difference. Regarding the responsibility towards the community, < 26 vs. 36-40 reported the highest difference (mean difference = $.51498$, $p < .05$) while 26-30 vs. 31-35 reported the lowest difference (mean difference = $.11536$, $p < .05$). Regarding the good governance practice, the highest difference was between 41-45 and 46+ groups (mean difference = $.61667$, $p < .05$) and the lowest difference was between < 26 vs. 26-30 groups.

The means, ANOVA results and the mean difference comparisons of perceptions among respondents who had different marital status are presented in table IV.

TABLE IV
ANOVA RESULTS FOR THE DIFFERENCES BETWEEN THE PERCEPTIONS OF RESPONDENTS WHO HAD DIFFERENT MARITAL STATUS

Means of each marital status group

Responsibility towards	Single	Married	Separate	Total
Students	3.8885	3.8810	4.0000	3.8896
Personnel	3.6594	3.8095	3.5000	3.6772
Suppliers	3.5000	3.5397	3.3333	3.5022
Environment	3.8373	3.9365	3.5556	3.8455
Community	4.0184	4.1190	3.6111	4.0243
Good governance	3.7920	3.9167	4.0000	3.8135
Overall	3.7837	3.8671	3.6667	3.7930

ANOVA

Responsibility towards	Df	F	Sig.
Students	2	.389	.678
Personnel	2	4.215*	.015
Suppliers	2	.725	.485
Environment	2	3.097*	.046
Community	2	5.865*	.003
Good governance	2	2.564	.078
overall	2	2.397	.092

LSD Post hoc analysis for marital status

Responsibility towards	(I) marry	(J) marry	Mean Difference (I-J)	Sig.
Personnel	single	married	-.15013(*)	.009
	married	single	.15013(*)	.009
Environment	married	separate	.30952(*)	.040
	married	separate	.38095(*)	.020
Community	separate	married	-.38095(*)	.020
	single	separate	.40726(*)	.005
	married	separate	.50794(*)	.001
	separate	single	-.40726(*)	.005
	separate	married	-.50794(*)	.001

The ANOVA test revealed that respondents who had different marital status perceived differences in the university's responsibility towards the personnel ($F = 4.215$, $df = 2$, $p < .05$), the environment ($F = 3.097$, $df = 2$, $p < .05$) and the community ($F = 5.865$, $df = 2$, $p < .05$).

The means, ANOVA results and the mean difference comparisons of perceptions among respondents in different job position are presented in table V.

TABLE V
ANOVA RESULTS FOR THE DIFFERENCES BETWEEN THE PERCEPTIONS OF RESPONDENTS IN DIFFERENT JOB POSITION

Means of each job position group

Responsibility towards	Employee	Middle	Top mgr	owner	Total
Students	3.8826	3.9762	3.3750	3.7500	3.8908
Personnel	3.6913	3.6790	3.0000	3.3333	3.6723
Suppliers	3.4841	3.6420	3.0000	3.1111	3.4989
Environment	3.8580	3.8095	3.3333	3.8889	3.8423
Community	4.0197	4.1071	3.6667	3.7222	4.0255
Good governance	3.8029	3.8839	3.6250	3.6667	3.8131
overall	3.7898	3.8537	3.3333	3.5787	3.7914

ANOVA

Responsibility towards	df	F	Sig.
Students	3	5.517*	.001
Personnel	3	7.279*	.000
Suppliers	3	6.478*	.000
Environment	3	2.737*	.043
Community	3	3.997*	.008
Good governance	3	1.246	.292
overall	3	6.155*	.000

LSD Post hoc analysis for job position

Responsibility towards	(I) job	(J) job	Mean Difference (I-J)	Sig.
Students	employee	middle	-.09358(*)	.044
		top	.50761(*)	.001
		top	.60119(*)	.000
Personnel	employee	top	.69130(*)	.000
		owner	.35797(*)	.012
		top	.67901(*)	.000
Suppliers	employee	owner	.34568(*)	.020
		middle	-.15792(*)	.009
		top	.48406(*)	.016
Environment	top	owner	.37295(*)	.023
		top	.64198(*)	.002
		owner	.53086(*)	.002
Community	employee	employee	-.52464(*)	.006
		middle	-.47619(*)	.015
		owner	-.55556(*)	.023
Overall	middle	top	.35304(*)	.044
		owner	.29749(*)	.039
		top	.44048(*)	.015
Overall	top	owner	.38492(*)	.010
		top	.52034(*)	.000
		owner	.27497(*)	.017
Overall	top	employee	-.45643(*)	.001

The ANOVA test revealed that respondents who had different job position perceived differences in the university's responsibility towards the students ($F = 5.517$, $df = 3$, $p < .05$), personnel ($F = 7.279$, $df = 3$, $p < .05$), suppliers ($F = 6.478$, $df = 3$, $p < .05$), the environment ($F = 2.737$, $df = 3$, $p < .05$), the community ($F = 3.997$, $df = 3$, $p < .05$), and the overall perceived responsibility ($F = 6.155$, $df = 3$, $p < .05$).

The means, ANOVA results and the mean difference comparisons of perceptions among respondents who resided in Bangkok, perimeter and provinces had different are presented in table VI.

TABLE VI
ANOVA RESULTS FOR THE DIFFERENCES BETWEEN THE PERCEPTIONS AMONG RESPONDENTS WHO RESIDED IN BANGKOK, PERIMETER AND PROVINCES

Means of each home town group				
Responsibility towards	Bangkok	Perimeter	Province	Total
Students	3.8714	4.0625	3.8726	3.8922
Personnel	3.6831	3.8167	3.6226	3.6751
Suppliers	3.5226	3.4667	3.4780	3.5011
Environment	3.8436	3.9375	3.8239	3.8467
Community	3.9547	4.0625	4.1308	4.0284
Good governance	3.7346	4.0625	3.8648	3.8156
overall	3.7683	3.9089	3.7988	3.7941

ANOVA

Responsibility towards	df	F	Sig.
Students	2	5.351*	.005
Personnel	2	3.774*	.024
Suppliers	2	.521	.594
Environment	2	1.127	.325
Community	2	8.544*	.000
Good governance	2	11.106*	.000
overall	2	3.653*	.026

LSD Post hoc analysis for hometown

Responsibility towards	(I) home	(J) home	Mean Difference (I-J)	Sig.
Students	bkk	Perimeter	-.19110(*)	.002
	perimeter	Province	.18986(*)	.003
Personnel	bkk	Province	.19403(*)	.007
	perimeter	Province	-.17609(*)	.000
Community	bkk	Province	-.32793(*)	.000
	perimeter	Province	-.13021(*)	.007
Good gov	bkk	Bkk	.32793(*)	.000
	perimeter	Province	.19772(*)	.011
Overall	perimeter	Bkk	.14051(*)	.007
	perimeter	Province	.11006(*)	.043

The ANOVA test revealed that respondents who had different marital status perceived differences in the university's responsibility towards the personnel ($F = 4.215$, $df = 2$, $p < .05$), the environment ($F = 3.097$, $df = 2$, $p < .05$) and the community ($F = 5.865$, $df = 2$, $p < .05$).

V. DISCUSSION

Generally, compare to male, female students perceived the university had higher degree of social responsibility in all aspects except for responsibility towards the suppliers. One of the suppliers that interact with students very often was food suppliers. They catered meals for students during lunch and dinner for classes that cover lunch and dinner times. Female students might develop acquaintance and had more empathy towards the food makers while male did not care much. Hence, female wanted the university to treat them better so they reported lower scores for the current practices.

Age seems to be a significant criterion influencing the perceptions towards the university's social responsibility. Students in different age groups reported different perceptions in all aspects except for the responsibility towards students in which they had similar perceptions that the university was responsible for them at the high level. This shows that the university was on the right track in treating students and they felt satisfied with the services. In fact, the means score for the responsibility towards the students was only second to the responsibility towards the community.

Those who were separated perceived that the university showed lower responsibility than students who were single and married. This reflects their demand for the university to take care of all stakeholders. They might have higher level of empathy for other people and felt that the university should be more responsible towards them.

Students who had different job position reported perceived differences in all aspects except for good governance, in other words, they agreed that the university was doing well in the good governance practices. It is likely that those in higher positions were more demanding than those in the lower positions. Top managers and business owners reported they thought the university was not doing well enough in social responsibility.

Students residing in Bangkok and in the province had similar perceptions regarding the university's social responsibility. Students residing in the perimeter of Bangkok reported higher scores than those in Bangkok and in the province. It is possible that people in Bangkok and in the provinces are more demanding than those in the suburb.

VI. CONCLUSIONS

In conclusion, MBA students at Ramkhamhaeng University reported that the university was performing social responsibility at the high level except in the category of responsibility towards the suppliers which was rated at the average level. The university should take this into consideration and plan for a better treatment to this group or better PR about the practices towards this group. Although the students reported they perceived the university was showing responsibility at the high level, the university should observe that the score was just a bit over the high cut point (mean=3.60). More consideration and planning should be performed to improve the responsibility towards these groups. Educating personnel to realize the significance of these stakeholders might be beneficial. Although the university wanted to treat stakeholders well, the personnel at the

operation level might not see the significance of this objective. Hence, they may not treat them as they should.

Moreover, future research should be conducted to assess the opinions of the above-studied stakeholders and compare them with the students' perceptions. Expanding the population to include students in other programs and degree might also provide an interesting insight into the university's social responsibility issue.

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Defining and Redefining the Graduates: The STMTCC Thrust on Institutional Development

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Abstract— The strong belief among Filipinos on education as a tool to alleviate the economic status of the family gives an opportunity to the educational institutions to offer myriad courses. In the same manner, it is a common knowledge that the industries in the new dynamic economy require smart workers. The responsibilities of the educational institutions as mandated by the Commission on Higher Education (CHED) in the Philippines are to provide quality education through instruction, research and community extension services. Most of the educational institutions focus on the provision of instruction. A tracer study aims to provide basis for the evaluation of the programs offered by the school (Zembere, 1996). It aims to investigate the whereabouts of the graduates since they completed their university or college studies, to gauge the graduates' work performance, extent of employment, unemployment and underemployment as well as further studies. This study gathered data through a Tracer Study Form. Based on the results of this study, several institutional policies and programs were implemented. Thus, conducting a tracer study is not only to monitor the graduates' employability but a gauge for instructional quality and the performance of social responsibility, more importantly leading towards institutional excellence.

Keywords — Tracer study, institutional development, St. Therese-MTC Colleges, graduates' performance, locating the graduates

I. INTRODUCTION

Education is no longer merely a priority for parents, teachers and a handful of education performers, but for the advanced sectors of business as well, since its leaders increasingly recognize the connection between education and global competitiveness (Toffler, 1990).

The St. Therese-MTC Colleges (ST-MTCC) aims to provide quality education through excellence in terms of administration, faculty, instruction, library, laboratory, facilities, social orientation, student personnel services, research and linkages in pursuance of the educational needs and developmental goals of the local, regional, national and international community through a competency-based system guided by desirable Filipino values and global standards that would

produce globally competitive graduates equipped with various skills that would enable them to have easy transferability of career (ST-MTCC Student Handbook).

It is a common knowledge that the new dynamic economy requires smart workers. Large numbers of unskilled workers are replaced by smaller numbers of highly trained workers and intelligent machines. It is in this premise that the students are often motivated by their elders to go to college and acquire higher level of learning.

The responsibility of the educational institutions like the STMTCC is to provide quality education through instruction, research and outreach programs. As observed, most of the educational institutions focus only on the provision of quality education.

A tracer study is conducted in order for an educational institution to know the employability status of its graduates and to further evaluate whether it has provided quality education to the students. The quality gained by the students is deemed good if the students acquired job after graduation while possessing the appropriate knowledge, skills and attitude.

II. OBJECTIVES OF THE STUDY

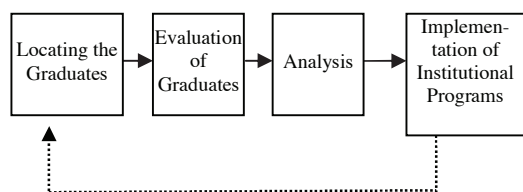
The tracer study was conducted to present the nature of work of the graduates, their employment status and performance.

Specifically, this study aimed to:

1. identify in what establishments do the STMTCC graduates employ
2. determine how many graduates are employed per establishment cluster

3. present the nature of work of the STMTCC graduates
4. present the employment status of the graduates
5. present the performance of the graduates in terms of attitude, knowledge and skills
6. present the other related skills, attitudes and knowledge that the graduates must possess as viewed by the employers

III. RESEARCH PARADIGM



The study is anchored on the Theory of Essentialism based on the work of William Bagley which states that schools should provide sound, practical training that will help learners become employed and contributing citizens (Armstrong, 1993).

Most students believe that graduating from college will lead to greater employment opportunities. In addition, the purposes of schooling are to prepare students for their later occupational roles (Sadovnik, et.al. 2006).

A regular evaluation of the alumni performance through their employer is done to continuously improve the institutional practices with the ultimate goal of preparing the future alumni in the real world of work. The results of the study serve as basis in providing improvements in the academic and co-curricular activities to help mold the students to become a wholesome member of the workforce after graduation.

IV. METHODOLOGY

This study utilized the descriptive design. This design was used in this study to gather information about the alumni and to trace where they are employed, type and status of employment and to monitor the level of their performance in terms of attitude, knowledge and skills.

The researcher gathered data by conducting a purposive sampling technique. Different establishments were visited mainly those which are under the cluster of hospitality management. The direct supervisors were asked to accomplish the research instrument. The Alumni Affairs Office of the school helped also in tracing the graduates through referrals. All the data were then forwarded to the Research and Development Office for the preparation of the Graduate Tracer Study.

The subjects/respondents of this study include the thirty-five (35) establishments which were identified as employers of the St. Therese-MTC Colleges alumni. The 35 establishments employed 220 alumni. The employment status of the STMTCC graduates were classified into casual and permanent. The RDO utilized the non-probability sampling specifically the quota, purposive and accidental sampling.

Thirty-one (30) out of thirty-five (35) respondents were from Iloilo City. The other four (2) came from Boracay, one (1) from Manila, one (1) Singapore and also one (1) from Brunei.

V. RESULTS AND DISCUSSION

A. Number of Graduates Working per Establishment Cluster

The establishments, as represented by their manager or supervisor were treated as the respondents of the study. Out of the thirty-five (35), establishments, twenty-nine (29) were classified under the cluster of hotel, restaurant, and travel agency. Two (2) establishments were classified under educational institutions and also two (2) establishment was classified under health care institutions and three (3) were classified under general classification "others" which specifically included a grocery store, insurance company and a car dealer.

As observed in the results, most of the establishments included in the table were hotel, restaurant and travel agency. This can be explained by the concentration of the student population which is on this area. This is so since the flagship program of St. Therese-MTC Colleges La Fiesta is Hotel, Restaurant and Tourism Management.

Out of the 220 graduates traced, 173 graduates were employed in the hotel, restaurant and travel agency, 30 graduates traced were employed in educational institution with the school itself, the St. Therese-MTC Colleges, La Fiesta as the highest hiring establishment. Eight (8) graduates were employed in health care institution. Lastly, nine (9) graduates were employed in the grocery store, insurance company or a car dealer. The large number of graduates are employed in Hotel, Restaurant and Travel Agencies since the flagship program of the college is Hotel and Restaurant Management (HRM). The Educational Institutions also employ HRM graduates while the healthcare institutions employ both HRM and health-related courses graduates.

B. The Nature of Work of the Graduates

In terms of the nature of work, eleven (11) traced graduates work as Office Clerk, thirty-six (36) work as Cashier/Teller, one hundred two (102) work as Service Crew, two (2) Front Office Staff, two (2) work as Faculty, five (5) work as Nursing Aide, eight (8) work as Sales/Mktg Staff, ten (10) work as Housekeeping Dep't Staff, eighteen (18) work as Kitchen Staff, five (5) work as Supervisor, and twenty-one (21) work as either HRM Laboratory Assistant, Bartender or Ticketing Staff.

The high number of graduates working as a service crew can be explained by the fact that the flagship program of the school is HRM which leads the graduates to be employed in the related service sector specifically as the service crew. Large portion of the graduates traced also work as cashier/teller in a restaurant or in a department/grocery stores. Iloilo City where the ST-MTCC is located houses several well-known restaurants since the city is known for its authentic

Ilonggo Cuisines. There are also big malls in the city such as two SM Department Stores and three SM Supermarkets (two Savemore Stores and a Hypermarket), Robinson's Mall and two Gaisano Malls, Mary Mart Mall, The Atrium and Amigo Mall. Thus, this explains why large portion of the graduates traced work as cashier or teller.

C. The Employment Status of the Alumni

The two major classifications of employment are permanent and casual. Permanent employment means that the employee was able to prove worthy of the job after his/her probationary period, usually within 5 months. Permanent employment also denotes an advantage in terms of pay and other monetary and non monetary benefits such bonuses, leave credits, insurance, etc. which tend to vary from one establishment or employer from the other.

On the other hand, casual employment refers to the status of the newly hired employees who are under observation for a certain period. The period of observation is referred to as the probationary period.

In the case of St. Therese-MTC Colleges, La Fiesta Site alumni who were traced, ninety (90) of them were classified as Permanent employees and one hundred thirty (130) were classified as casual employee.

D. The Performance of the Alumni in Terms of Attitude, Skills and Knowledge

The evaluation of the performance of workers is usually based on three areas which include Attitude, Skills and Knowledge.

In terms of attitude, all items were rated Excellent. The highest rating of the graduates were "Excellent" under item no. 6, "Work well with other employees" as well as in item no. 7, "Take the initiative to better the working environment" with a mean of 4.65. The lowest mean was item no. 3 (mean=4.20) stated "Receive constructive criticisms."

In terms of skills, the highest rating was Excellent. The highest rating was item no. 3, "Are courteous and helpful to guests and employees"

with a mean of 4.73. The lowest mean was item no. 5 (mean=4.10) interpreted as Very Good, “Effectively manage life-threatening situations: fire, bomb threats, illness, etc.”

In terms of knowledge, all items were rated Excellent. The highest rating was item no. 2, “Maintain professional and ethical standards” with a mean of 4.56. The lowest mean was item no. 1 (mean=4.35), “Identify the operational problems.”

E. Related skills, attitudes, and knowledge which the alumni must possess in order to be efficient and effective employees

The respondents from the different establishments were asked about their desired qualities of graduates. The respondents desire for employees who are patient with a frequency of 7. The industry also desire to have employees who have initiative, with a frequency of 5, willingness of the employees to learn or being open minded, honesty, friendliness, speed of work and good communication skills with a frequency of 4. Other qualities preferred were loyalty or commitment to work, compliance to organizational policies, positive disposition, promptness, marketing skills, flexibility, tolerance to multi-tasking, good in waitering skills, fast learner, good in bartending and good in cooking.

VI. SUMMARY, CONCLUSION, ACTION TAKEN AND FUTURE DIRECTIONS

A. Summary and Conclusion

The conduct of the tracer study was quite tedious but it is worthwhile that the institution must find time to come up with the said study at least once in every two years to monitor the employment status of the graduates as well as to be well informed regarding employers’ preferences.

The results of the study revealed that:

Out of thirty-five (35) establishments where the graduates employ, twenty- nine (29) were classified as Hotel, Restaurant and Travel Agency,

two were classified under the Educational Institutions, another two from the Healthcare Institutions and three were classified under “Others” which includes an insurance company, car dealer and grocery store.

The top four employers of the St. Therese-MTC Colleges La Fiesta Site graduates are Centennial Resort Hotel and Convention Center, with 35 graduates employed, Jollibee Foods Corporation (General Luna) with 30 graduates employed, Greenwich (Robinson’s Place) with 28 graduates employed and at St. Therese-MTC Colleges, La Fiesta Site 26 graduates employed. It is observed that one of the major employers of the graduates traced is the St. Therese-MTC Colleges, La Fiesta Site. This conforms to one of the practices of the college in hiring its own graduates.

Most of the graduates are employed in hotels and restaurants since the flagship program of the college is Hotel and Restaurant Management. It simply shows that most of the graduates traced are working in line with their course.

In terms of the nature of work of the graduates, most of them work as a service crew. This conforms to their qualification as HRM graduate since they were trained well by the school to provide excellent hotel and restaurant service. The data on employment status revealed that most of them were classified as casual employee. This can be attributed to the trend in hospitality management field in which the most of the graduates tend to go abroad after gaining reasonable experience.

Regarding the performance of the graduates, when evaluated in terms of attitude, skills and knowledge, most of the ratings were excellent. The lowest rating which was common to all subgroups was under item Skills stated as “effectively manage life-threatening situation: fire, bomb threats, illness, etc.” It simply means that the graduates are not equipped with skills on what to do during life threatening situation. There is also a tendency that their supervisors were not able to see them perform their life-threatening skills due to the absence of a life threatening situation.

For those who are working in the educational institutions, most of the ratings of the graduates are excellent except for items on conformance to instruction and capability to identify operational problems.

With this, there is a need to inculcate to the mind of the future graduates the importance of organization policies. They must be informed that each organization has its own policies. The policies of each organization might differ and the workers are obliged to follow the policies of the organization where they belong.

Another item in which the graduates were rated only Very Good is on their capability to identify operational problems. This might be brought about by the fact that the graduates traced does not occupy middle or higher management position or their work is very specific, thus they are not involved in identifying the operational problems. But this can serve as one of the bases in improving the curriculum to improve the problem identification skills of the graduates, whether they will become a middle level manager or just an ordinary employee.

The respondents of the study who were the establishment representatives, usually the manager were asked to enumerate other related skills, attitudes, and knowledge which they think the graduates must possess in order to be efficient and effective employees of their establishment. The most desirable qualities were patience in dealing with customers, second is initiative, third, willingness to learn; open minded, honesty, friendliness, good communication skills and speed of work. Thus, it is worthy for an educational institution to take time in developing the attitude of the students.

B. Practical Implications

The results of the study made changes at St. Therese-MTC Colleges on the following aspects:

1) *Improvement of the Instructional Guide and the Curriculum as a Whole.* The instructional guide serves as the complete system

for the instructor in conducting the day to day class. It contains the course code, course description, objectives, duration, topics included and the duration for each topic, pool of questions for the exam and all other specific details until the completion of a certain course.

With this study, the conduct of curriculum review during summer attended by the dean, program chair, subject chairs and librarians was intensified. After the curriculum review, the list of subjects is evaluated and subject for the improvement of the course to be taken by the students. In fact, the dean and the program chair have introduced improvements in the instructional guide by including the necessary core values to be inculcated to the students as part of the completion of a certain course.

2) *Implementation of the Discussion of Core Values during faculty Meeting and Students' Homeroom Consultation Using the Structured Learning Activities.* In order to improve more on the attitude of the students, the college implemented the observance of the ten core values. The ten core values include: Commitment to Work, Team Work, Accountability and Responsibility, Respect, Integrity, Moral Uprightness, Environmental Friendly, Personal Mastery, Promptness and Innovation.

It is the policy of the college that all personnel, academics and administrative staff and students must adhere to the code of conduct. An employee, administrative staff or student who violates any provision of the code of conduct shall be advised to amend his or her conduct in accordance with the code (Student Handbook, SY 2011-2012).

3) *Career Guidance and Testimonial Talk of the Successful Alumni.* Every year, the Guidance Office of the college conducts a Career Guidance Program for the graduating students in preparation for their future employment. The said activity is conducted during the month of February or March, just in time that the students who are in their final year are about to graduate. The activity also serves as a venue where the employers are gathered in the college in order to recruit. Aside from that, the employers shares information about their

establishment in order to induce the graduating students to apply.

For the alumni who visit the school, he/she is being accommodated by the Alumni Affairs Office. He/she is also invited to share to the graduating students his/her experiences which can also help the graduating students prepare themselves for their future employment.

4) *Enhancement of Major Students Activities Every Semester.* Every semester, a lot of activities are conducted in order to promote the over-all well-being of the students. Competitions inside and outside the school are being participated by the students. The main event conducted every year is the Culminating Activity wherein the students showcase their skills on various competencies. This kind of activity involved all the students. The major event participated by the students is the annual National Food Showdown which always held in Manila. It is the gathering of chefs and their apprentice to compete in several events. The thorough training of the students who compete for this really helps them a lot to possess positive attitude specifically their patience.

5) *Establishment of Linkages.* The school exerted much effort in establishing linkages with the possible employers of the graduates especially among the establishments in the hospitality and shipping industries to know their skills preferences and to place more graduates.

C. Future Directions

To the Guidance Office, the results of the study should serve as basis in providing students' services especially on the development of students' analytical skills as well as having a proactive attitude. Group counseling sessions and other related activities can be done to enhance the attitude of the students.

The Dean's Office must enhance the mechanisms in monitoring the conduct of classes especially on the different culinary laboratory to push for the skills development of the future graduates, to be suited to the desire of the employers. In addition, the said office must also find ways on how to enhance the skills of the

faculty in terms of industry exposure to be abreast with the current trends.

Since there should be an improvement on the total no. of graduates traced, it is suggested that the Alumni Affairs Office must conduct intensive survey within a specified duration. The duration of the survey should not be too long since the graduates may transfer from one job to another and it may affect the over-all results of the study. In addition, the said office needs to revive the association of the alumni to have a team who can help in locating the other alumni at the same time to plan for the programs for the alumni.

Out of this study conducted, the research and Development Office can develop other related topics for future endeavours. The over-all purpose of thorough research is for the identification of the new technologies and strategies as well as the ideal physical set-up in which the students can learn best in preparation for their future employment-as a whole for institutional development.

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University Social Responsibility: Training of Accounting to support Small and medium Enterprise (SMEs)

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Abstract - One of the problems currently being faced by SMEs in Indonesia is the difficulty in obtaining access to financing sources from the banks because most of SMEs are not bankable. Just because their failure in meeting the technical requirements of the bank, SMEs borrowers candidate lost the opportunity to obtain credit facilities from banks, consequently they lose the opportunity to grow. One of the bank requirement concern with SMEs accountability that needs knowledge of accounting, feasibility studies, making the bookkeeping and understand the business management (accounting basis and cost of goods sold). Unfortunately they have no longer opportunity to be involved in formal degree education system. Support from universities for entrepreneurs of SMEs necessary in conducting to have knowledge of accounting is probably in form of training programs. This report is conceptual in nature that aims to demonstrate the importance of training and knowledge of accounting for SMEs so that SMEs can become a bankable debtors and obtain capital to run its business. Growing SMEs are expected to reduce unemployment and poverty in Indonesia.

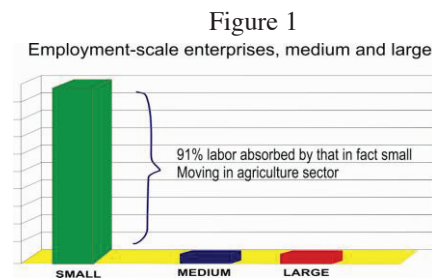
1. Introduction

Small and Medium Enterprises or SMEs are often known as a safety valve of the national economy. In the various discourses, seminars, and study, have been discussed and demonstrated that SMEs are a group or type of business that has a strong resistance to the crisis. SMEs also absorbed labor intensive. Data showed that the government and higher education, giving more attention and effort towards the development of SMEs.

Data from the Ministry of Cooperatives and Small and Medium Enterprises in 2006 showed that small businesses have absorbed 91 percent of the workforce and most of these small business ventures engaged in agriculture. Growing SMEs are expected to reduce unemployment and poverty in Indonesia.

Although the role of SMEs in the economy of Indonesia is central, but still many problems faced by SMEs make the ability of SMEs to take part in the national economy can not be maximal. The problems currently being faced by SMEs is difficulty in getting access to financing facility from the bank. The difficulty of obtaining access to financing SMEs

because of the complicated banking procedures and the profile of SMEs borrowers are less or even not bankable (failure in meeting the technical requirements of banks). Just because it does not meet the technical requirements of the banking, SMEs borrowers lose the opportunity to obtain credit facilities from banks.



Source: Bank of Indonesia (2006)

Another problems faced by SMEs is the lack of understanding of accounting and finance, and lack of access to gain knowledge related to production technology and marketing. Table 1 showed that the 33.75% education level were primary school and only 2.74% who are graduates from higher education. Unfortunately most of SMEs entrepreneurs have no longer opportunity to be involved in formal degree education system. Support from higher education for entrepreneurs of SMEs necessary in conducting to have knowledge of accounting is probably in form of training programs.

This study presented community service activities organized by Widyatama University. Community service activities are activities that include efforts to increase the quality of human resources, among others, in terms of expanding horizons, knowledge and skills-building undertaken by the academic society as the embodiment of dharma and devotion form of concern to actively improve the welfare and empower the general public especially for the community weak economy. This community service activities in accordance with the concept of university social responsibility.

Table 1. Education Level of SMEs

No	Education Level	Total	(%)
1	<i>Not Completed Elementary School</i>	4. 248. 622	18,87
2	<i>Elementary School</i>	7.597.595	33,75
3	<i>Junior High School</i>	4.741.328	21,06
4	<i>Senior High School</i>	4.803.897	21,34
5	<i>Diploma MI</i>	252.049	1,12
6	<i>Diploma III</i>	253.320	1,13
7	<i>University Degree</i>	616.741	2,74
8	<i>Total Total</i>	22.513.552	100

Sources: Central Bureau of Statistics Micro and Small Companies (2006)

Community service activities organized by the Widyatama University. There are 3 (three) faculty with different competence given training in accordance with the instructor. Training of accounting given by instructors from the accounting department. Marketing training provided by instructors from the faculty of business and management . Training basic accounting software used to prepare financial statements, given by lecturers from the IT faculty. In this paper, the authors will examine only the training of accounting.

The purpose of this study are: 1) Support for SMEs; 2) describe the training process of accounting which is a manifestation of the university social responsibility;

2. Research Methodology

This study using descriptive method, which analyzes and presents the facts in a systematic so it can be easier to understand and be concluded. Discussion of the problem by using primary data in the form of direct observation, secondary data and literature as a source of information.

3. Results and Discussion

3.1. Support to SMEs

Basically the problems of SMEs can only be resolved when the support of SMEs carried out in an integrated manner. As shown in Figure 2 there are 4 (four) things that will support the success of SMEs: 1) Financing facility for SMEs need supported by banks and financial institutions, at the time of financing to SMEs accounting knowledge needed to follow the technical requirement of banking and financial institutions. 2) Banking will certainly look at the feasibility of the business as a financing technical requirement. Feasibility of a business can be seen from the ability of SMEs to produce and market their products, so that the necessary knowledge about the production and marketing are needed. 3) The government should serve as guarantees of banking and financial institutions when providing financing to SMEs as well as setting up the infrastructure for the development of production and marketing of SME products. 4) Universities social responsibility support to SMEs by providing knowledge that can be implemented to overcome the problems of SMEs.

Figure 2. Support for SMEs in Indonesia



Source: Bank of Indonesia (2006)

This paper describe community service of higher education to support entrepreneurs of SMEs necessary in conducting to have knowledge of accounting is probably in form of training programs. Problems faced by entrepreneurs of SMEs is unable to meet the technical requirements of banks.

Technical requirements of banking consists of two things: 1) attach the documents that is the legality of administrative effort SMEs; 2) to attach documents or accounting records which are records of the company's operations. The following are the credit requirements of banking.

Table 2. Credit Requirement of Banking

No	DOCUMENT TYPE	NAME OF DOCUMENT	PLAFON
1	ADMINISTRATIF DOCUMENT	IDENTITY CARD	Rp 5 MILION – Rp 500 MILION
		FAMILY CARD	Rp 5 MILION – Rp 500 MILION
		CERTIFICATE FROM VILLAGE CHIEF / VILLAGE HEADS	Rp 5 MILION – Rp 500 MILION
		TRADING BUSINESS LICENCE	Rp 6 MILION – Rp 100 MILION
		PERMIT PLACE OF BUSINESS	Rp 100 MILION – Rp 500 MILION
		COMPANY REGISTRATION	Rp 100 MILION – Rp 500 MILION
		TAXPAYER IDENTIFICATION NUMBER	Rp 100 MILION – Rp 500 MILION
2	FEASIBILITY STUDY DOCUMENT	SIMPLE RECORDING	Rp 5 MILION – Rp 49 MILION
		FINANCIAL REPORTING	Rp 50 MILION – Rp 500 MILION
		BUSINESS FEASIBILITY STUDY	Rp 100 MILION – Rp 500 MILION

Sources: compiled from various sources

From table 2, we can conclude that the requirements to obtain financing from banks have the same requirements; preparation of financial statements and business feasibility studies. Accounting knowledge will lead how to prepare financial statements and feasibility aspects of business.

2.2. The Process of Widyatama University's Training Accounting

Training of accounting given to SMEs is a part of the University Community Service Activities Widyatama. Widyatama University invited SMEs (located in Bandung, Indonesia) to be a training participant at the Community Services Activity. Here is a table regarding the number of participants accounting:

Table 3. Year of Implementation and participants of Training

NO	YEAR OF IMPLEMENTATION	NUMBER OF PARTICIPANTS
1	2009	60
2	2010	119
3	2011	158

Sources: Widyatama University (2009-2011)

Community Service activities held two days without charge. This is because these activities are done as a form of social accountability Widyatama University to the community, particularly SMEs. From table 3 shows that number of participants increase every year. This is because the SME entrepreneurs are excited to add knowledge to improve business in the future. Accounting training provided the preparation of financial statements and business feasibility studies.

Accounting is the process of recording, classifying and reporting of financial transaction information. Accounting is also known as the "language of business" in order to prepare an accurate financial statements that can be exploited by managers, policy makers, and other interested parties, such as shareholders, creditors, or owners. To convey this information, it is used the report, known as accounting or financial reporting. Simple recording is the recording of financial transaction which involves four transactions: purchases, sales transactions, cash receipts, cash disbursements transactions. From simple recording then it can be compiled financial statements.

The financial statements of a company are generally provided consists of four types of statements: balance sheet, income statement, statement of changes in equity, and cash flows.

Balance Sheet, is a systematic list of the assets, liabilities and capital on a certain date, which is usually made at the end of the year. Balance particular order systematic. In the balance sheet can be known asset of the companies, the company's ability to pay obligations as well as the company's ability to obtain additional loans from outside parties. It can be known only after doing an analysis of the contents of the balance sheet. But they can also obtain information about the amount owed to the creditor company and the number of owners of existing investments in these companies.

The income statement, is a report on revenues and expenses of a company for a certain period, amount of the profit or loss by the company. Report of owners equity, is a report that shows changes in capital for a certain period, maybe a month or a year. Owners equity's report showed causes of changes in equity during a period. Statements of

cash flows, the existence of this report users of financial statements to evaluate changes in net assets, financial structure (including liquidity and solvency) and the company's ability to generate cash in the future.

Business Feasibility study is the research concerning various aspects of both the legal aspects, social, economic and cultural aspects of markets and marketing, technical aspects and technology to management and financial aspects. Feasibility study used for basic research and to decide whether a project or business can be done or postponed and does not even run. In this session, the instructor given knowledge of how to obtain documents that are administratiif banking requirements.

In accounting training sessions also presented the banking staff as a speaker that will provide knowledge about what the constraints of SMEs to meet the banking technical requirements. Here is a table of accounting training according to the needs of SMEs to meet the technical requirements of banks.

Table 4. Type of Training Accounting for SMEs

NO	TYPE ACCOUNTING TRAINING	MATERIAL
1	SIMPLE RECORDING	PURCHASE TRANSACTION SALES TRANSACTIONS TRANSACTION CASH RECEIPTS TRANSACTIONS OF CASH
2	THE PREPARATION OF FINANCIAL STATEMENTS	BALANCE SHEET INCOME STATEMENT STATEMENT OF OWNERS EQUITY STATEMENTS OF CASH FLOWS
3	BUSINESS FEASIBILITY STUDY	FEASIBILITY VIEWED FROM THE ASPECT OF BUSINESS: LEGAL, ACCOUNTING AND FINANCE, MARKETING, PRODUCTION, AND OTHERS.

Sources: compiled from various sources.

4. Conclusion

From the analysis it can be concluded that:
1) SMEs are the most effort to absorb labor force (91%), but has a low level of education, 33.75% were primary school graduates.

2) Low knowledge of accounting made it difficult to obtain bank financing SME entrepreneurs.

3) The role of university social responsibility to provide useful knowledge for SMEs.

4) University Community Service Activities Widyatama provide accounting training as an alternative means to gain knowledge SMEs.

5) Training is designed in accordance with the accounting needs of SMEs to obtain bank financing.

6) Increase in accounting trainee each year showing interest to gain accounting knowledge.

2. Suggestion

In the future, university community service activities Widyatama develop university social responsibility program,

which came into the process of accounting training assistance to SME businesses. The community service activity not only provide training of accounting regularly, but provide accounting and tax consultation. The entrepreneurs of SMEs can consult their accounting and tax problem.

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Good Governance Management Model for Ratchaburi Subdistrict Administration Organization

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Abstract— Subdistrict Administration Organizations (SAO) are domestic governmental units working closely with local people. They are established as legal entities with their own jurisdiction power. One of the major objectives of SAO is to draw local people to participate and jointly set educational and developmental projects as well as local policies together with government authorities under the budget allocated from the government to each SAO. This research project investigates the degree that the administration of SAOs in Ratchaburi province practice good governance principles. The researcher interviewed 21 purposively recruited experts who have been working in SAO for at least 4 years in their positions and possess fine knowledge relating to good governance practices. The information was compiled to develop a 5-point Likert scale questionnaire. Delphi technique was used to attest the validity of the questionnaire. This questionnaire was presented to these experts to assess their agreements for each item. The finalized version of the questionnaire was completed by 315 samples to investigate their opinions towards the good governance practices of SAOs regarding the juristic, moral, transparency, participative, accountability, and value principles of their local administration.

Keywords— Good Governance, Administration, Education, Thailand

I. INTRODUCTION

The centralization of governance system makes it difficult for the government to serve and facilitate the citizen all over Thailand in accordance to their various needs. Public administration decentralization process had started since the time of Rama V in which the first local administration was established in Samutsakorn province in 2440. Since then, the local governance system of Thailand was developed to promote domestic participation for the best benefits of the locals. Subdistrict Administration Organization (SAO) is a governmental unit established in order to better serve the local needs for development including the education and economy. Locals are empowered to participate in making local strategies and managing the budgets. In this process, educating both SAO's authorities and the locals is necessary. The authorities should learn a new paradigm that they cannot "govern" but have to be subjugated to lay people. At the same time, the locals must realize that they have power to manage and control the administration of their residences. The government has established that all governmental units must follow the good governance practice in order to promote the well-being of the citizen. This research paper aimed at investigating the management of good governance practices of SAO in Ratchaburi province.

Research Objectives

To assess the opinions of Ratchaburi's SAO committee members regarding the good governance practices at Ratchaburi province's SAO.

Scope of the Research

The scope of this research is limited to theories and practices relating to good governance practices. The population included SAOs' administration and personnel as well as committee members.

II. LITERATURE

The Subdistrict Council and Administration Organization Act 2537 B.E. was first implemented in 2538. The Act reformed the administration approach throughout the country (The Local Administration Development and Promotion Office, 2003, pp. 1-2). SAOs were established all over the country to replace to previous authorities appointed by the government to govern each subdistrict. Thailand Constitution 2550 B.E. suggested the government to decentralize the administration to the locals so that they are independent and can manage local issues (Department of Local Administration, 2009). SAOs are established as legal entities divided into the council and the administration. The SAO council includes the president, vice-president and secretary who are elected by the SAO committee members. SAO committee members are elected by the locals. The term of service is 4 years. Each SAO takes care of several villages. The members of each village elect altogether 6 committee members. Moreover, the administration consists of one Chief Executive of the SAO who is elected by the local people. The Chief Executive appoints 2 Deputy Chief Executive and one Secretary General.

Good Governance

Thailand Development Research Institute (TDRI) conducted research studies and recommend the government to develop good governance system so as to develop the country. The cabinet announced that all governmental units to follow good governance practices since 2 June 1999. Good governance was defined as the process in which political and administration practices are effective and transparent (Samuttavanich, 1998). Boonmee (1998, p. 2) defined good governance as a interrelationship process among the public, community, private sector and citizen that enable the public administration to be effective, ethical, transparent, fair and traceable. The Japan International Cooperation Agency,

(JICA) reported that good governance is the foundation for participatory developmental process. The government is responsible to promote such practices in order to create a sustainable development.

The objectives of good governance were posted as (The Commission for Citizen Participation and Phra Pok Klao Insitute, 2005, p. 110)

1. For the benefits of the people
2. To attain government's missions
3. To attain efficiency and economical in operations
4. To eliminate unnecessary procedures
5. To update governmental operations
6. To facilitate and satisfy needs of the population
7. To assess the results of operations

The Civil Service Commission, 2000, (pp. 2-3) devised 6 principles to be followed by the government. The first principle was the Public Participation Principle. The government must promote public participation and equity. Allow the public to hear and comment on the administration through public hearings and other approaches. The second principle was the Honesty and Transparency Principle. The administration must be honest and transparent. Clear regulations must be established. The public has the right to access to information effectively and appropriately. The third principle was Accountability Principle. All governmental units must be accountable to the public. Needs of various groups in the society must be considered. The fourth principle was the Political Legitimacy Principle. Administrators must be approved by the public. The fifth principle was Fair legal Framework and Predictability Principle. Justified legal framework and system must be established and enforced effectively. The sixth principle was Efficiency and Effectiveness Principle. All sorts of operation must be performed effectively and efficiently.

III. METHODOLOGY

This research is a descriptive research. Data were collected both quantitatively and qualitatively. Questionnaire was developed by the Delphi Technique. The population in this study was 1,494 SAO's administrators and personnel together with SAO committee members in Ratchaburi province. The researcher recruited 21 experts purposively in order to derive the questionnaire which contains the good governance practices of SAO in Ratchaburi province. These experts were involved with SAO in Ratchaburi for at least 4 years and have good understanding in the good governance practices. The researcher interviewed 21 experts about the good governance practices. The information was compiled and a set of questionnaire was drafted. The expert agreement on the items was assessed and the agreements were high.

The Good Governance Principles were concluded as:

1. Legitimacy
2. Etiquette
3. Transparency
4. Public Participation
5. Accountability

6. Efficiency Principles.

This first draft was presented to all experts in the second round for their comments and agreements. Medians and quartiles of each item were calculated and returned to the experts in the final round. The researcher adjusted the content of the questionnaire based on the comments from the experts. The final version of 5-point Likert scale questionnaire was completed by SAO committee members in Ratchaburi province. Interviews were performed with 10 SAO members to yield a better insight into the practices.

IV. RESULTS

Interviewed data revealed that SAOs emphasized brotherhood spirit in their administration. Personnel were stimulated to participate in the discussion and solutions to problems. They followed good governance practices and policies specified by the administrators. The focuses were on the development of standards of living of the locals, and promote the local economy. SAOs aimed to unify the locals and the governmental authorities.

SAOs' personnel were accurate in the procedures so that the operations were performed properly. The responsible areas were not too large so they could effectively develop the subdistricts appropriately. Locals earned satisfactory incomes through the development of the agriculture and economy.

The informants suggested that the budgets attributed were rather low. The incomes collected together with the budget received from the government were barely sufficient to develop the infrastructure. People residing close to the cities did not see the significance of SAOs. They received better services and assistance from the downtown governmental units rather than depending on the SAOs. Hence, the coordination with people around the urban areas was difficult. Moreover, the 4-year term introduced transitional problems between new and old administrators as well as the personnel. The SAOs administrators had to be tactful in handling the transitions and community leaders. There were also some problems arising from the nepotism system. Some personnel did not cooperate with others.

The locals in some areas did not understand the operations of SAOs and conflicts arose often for example in the area of environmental preservations. Usually, SAOs were flexible but had to maintain the regulations.

The cooperation among SAOs made the operations more effective. The SAOs between urban and suburban areas gained benefits from the urban economy.

It was reported that SAOs need assistance in the development of irrigation system for the agriculture in the areas. Another issue of concern was the garbage system. SAOs had limited capacity to manage garbage in their areas they need supports from other governmental units. Several informants reported that they realized the significance of human resources development and had various training and development plans for their personnel and community.

Quantitative results revealed that SAO committee members mostly perceived that their SAOs were following

good governance practices at the high level (mean=3.87, SD=.07). All principles were rated at high level. The highest scores were on the principles of Legitimacy, Transparency and Etiquette (mean=4.26, 4.19, 3.87; SD=.28, .17, and .15 respectively). The principle rated lowest was the Accountability Principle (mean=3.60, SD=.15). Perceptions regarding each principle were reported in Table I.

TABLE I
MEANS AND STANDARD DEVIATION OF GOOD GOVERNANCE
PRACTICES AMONG SAO

Good Governance Principles	Mean	Standard Deviation
Legitimacy	4.26	.28
Etiquette	3.87	.15
Transparency	4.19	.17
Public Participation	3.61	.17
Accountability	3.60	.15
Efficiency	3.80	.16
Overall rating	3.87	.07

Items in each principle were compiled and the good governance practices were summarized as follow:

1. Legitimacy Practices

Results regarding the perceived legitimacy were reported in table II.

TABLE III
MEANS AND STANDARD DEVIATION OF PERCEIVED
LEGITIMACY AMONG SAO

Legitimacy practices	\bar{X}	SD
1. Enforcement of SAO's regulations	4.73	.53
2. Participation of the local in the setting of SAO's regulations	4.47	.77
3. Appointment of committees to monitor SAO's operations	3.47	.68
4. Publicity of regulations to the locals	4.21	.78
5. SAO follows the regulations	4.90	.39
6. The locals agree to follow the regulations	3.79	.68
Overall	4.26	.28

The respondents agreed that SAO should educate the locals regarding the rules and regulations through the formal and informal education systems in the area. SAO should create and enforce subdistrict regulation as prescribed by law. The public should be allowed to participate and express their concerns or suggestions to the administration. A committee should be appointed to follow and assess the SAO's operations. All regulations and procedures must be clearly communicated to the public to create clear understandings of all rules. The SAOs and the locals must obey to the law.

2. Etiquette Principle

Results regarding the perceived etiquette practices were reported in table III.

TABLE IIIII
MEANS AND STANDARD DEVIATION OF PERCEIVED ETIQUETTE
PRACTICES AMONG SAO

Etiquette Practices	\bar{X}	SD
1. Outstanding personnel were rewarded	2.30	.46
2. Appointment of committees to manage the remuneration system	4.87	.34
3. Training and development for personnel	3.38	.54
4. Budgets and development plans were distributed to all areas.	4.40	.49
5. SAOs provide equitable services	3.95	.23
6. SAOs implemented the plan suggested by the community	3.71	.45
7. Information about activities were announced	4.10	.31
8. SAOs operated ethically	4.22	.41
Overall	3.87	.15

The SAO should recognize and reward the authorities who effectively perform their duties. There should be a remuneration committee to evaluate the salary and promotion of personnel to create fairness to all. Education and training must be provided for personnel to learn appropriate practices. Moreover, budgets for activities should be fairly distributed. All population must be treated equitably. Education and other projects suggested by the community must be included in the SAO strategy and implementation. Moral conducts must be followed strictly.

3. Transparency Practices

Results regarding the perceived transparency practices were reported in table IV.

TABLE IV
MEANS AND STANDARD DEVIATION OF PERCEIVED
TRANSPARENCY PRACTICES AMONG SAO

Transparency practices	\bar{X}	SD
1. Necessary information were released to the locals	4.40	.49
2. Procurements followed the regulations and could be monitored	4.80	.40
3. Procurements were announced for bidding	4.73	.52
4. Information regarding the annual budget, revenues, and expenses were released	3.90	.30
5. Procurement plans were announced to the public	3.30	.46
6. SAOs allow the public to participate in the procurement system	4.61	.62
7. Information were posted for monitoring	4.00	.28
8. Public comment and complaint centers were established	3.75	.43
Overall	4.19	.17

Important information e.g. regulation, budget, procurements, etc. should be opened to the public. The procurement system must be transparent and opened for scrutiny. Biddings or purchasing must be posted to the public. Annual revenues and expenditures budgets must be announced to the public. The public must be allowed to participate and witness procurements. A permanent location must be established so that the public can have access to the information regarding the operations of the SAOs. Mechanisms should be established so that the public can object or file their cases to the SAOs.

4. Public Participation Practice

Results regarding the perceived public participation practices were reported in table V.

TABLE V
MEANS AND STANDARD DEVIATION OF PERCEIVED
PARTICIPATION PRACTICES AMONG SAO

Public participation practices	\bar{X}	SD
1. Public opinions were accepted	3.07	.29
2. The public is allowed to attend SAO's meetings	3.68	.50
3. The locals were allowed to participate in development plan	3.23	.51
4. Public hearings were organized	4.25	.46
5. Outside services were available for accessibility of services	3.91	.29
6. Public satisfaction was assessed	2.85	.44
7. The locals were allowed to participate in SAO's activities	4.31	.50
Overall	3.61	.17

Channels to hear the public opinions must be established. The public must be allowed to observe the SAO councils' meeting. SAO must allow the population to participate in any of the education and developmental plans. Public hearings must be organized regularly to hear from the public. Mobile service units should be arranged so people in the remote areas gain access to the administration system. The population must be allowed to evaluate and assess the operations of SAOs. All activities must be opened to the public to join.

5. Accountability Principle

Results regarding the perceived accountability practices were reported in table VI.

TABLE VI
MEANS AND STANDARD DEVIATION OF PERCEIVED
ACCOUNTABILITY PRACTICES AMONG SAO

Accountability practices	\bar{X}	SD
1. SAOs included comments from the locals into practices	3.58	.49
2. Complaints were recorded and reported to the relevant people	3.10	.39
3. SAOs implement activities suggested	3.54	.50

by the locals		
4. SAOs responded to community problem and provide equitable services	3.95	.31
5. SAOs personnel's job descriptions were posted clearly	4.00	.28
6. Activity publicity documents and brochures were prepared and distributed	3.31	.59
7. Personnel structure was announced to the public	4.20	.40
8. Communication channels were opened for the locals to retrieve information	3.68	.50
9. Strategies for revenue collection were planned	3.00	.34
Overall	3.60	.15

SAOs must carry the comments or complaints from the public into practices. All comments or complaints must be filed appropriately and the results must be reported to those who file the cases to the SAOs. Community problems must be attended to. Public service should be performed fairly and to everybody. Systems, procedures and responsibility of each personnel must be clearly delineated. All SAOs' activities must be announced to the public. The human resources plans and structure as well as each personnel duty must be posted to the public. SAOs must open communication channels with the public.

6. Economical Principle

Results regarding the perceived economical practices were reported in table VII

TABLE VII
MEANS AND STANDARD DEVIATION OF PERCEIVED
ECONOMICAL PRACTICES AMONG SAO

Economical practices	\bar{X}	SD
1. The procurements were performed to save the budgets	4.40	.49
2. Preservation of resource programs were rallied	3.68	.59
3. Committees were appointed to follow the reimbursement of the SAOs	3.22	.49
4. The use of supplies were checked annually	3.94	.23
5. Timing for each service the locals were announced	4.12	.45
6. Procedures and steps in servicing were reduced	3.79	.51
7. Operation evaluations were performed	3.11	.31
8. Resource saving measures were implemented	4.23	.42
9. Training and development for personnel were organized	3.69	.57
Overall	3.80	.16

All procurements and other operations must be performed efficiently. Campaigns should be planned to convince personnel and population towards efficient usages of resources. Committees should be established to control the budgets of SAOs. Office supplies must be counted on an

annual basis. Procedures to service people must be shortened and services must be performed within short period of time. Training and education must be provided to personnel to enhance their skills for operations.

V. DISCUSSION

Education to the public and personnel in SAOs is an important part to establish the good governance system among SAOs. It was mentioned several times by the respondents that information must be clear and opened. The citizen's empowerment cannot be successful without educating them of their rights and duties. With good education system, people will be educated about all rules and regulations. They would know their rights and duties. Hence, they can effectively participate and support good governance practices of SAOs. SAOs must provide good education to the public.

It was reported that SAOs have followed the good governance practices especially on the Legitimacy, Transparency, and Etiquette Principles. This is because all SAOs must conform to the governmental procedures so everything must be reported and documents. Similar to all other governmental units, SAOs must comply with the bureaucratic systems. There are many regulations to be followed strictly. Moreover, the SAOs operate closely with the locals so it might be easy for the population to gain access to information and offer their comments easily.

One theme observed from the results was that SAO committees emphasized the importance of procurements system. In the discussion about transparency and participation, the respondents saw that these two principles were important in the procurement. Budget to develop the subdistrict comes from the government and usually in large amount. The utilization of such funds should be performed properly in order to distribute the development fairly throughout the subdistrict. Moreover, there is a chance for corruption in the issue so that procurements must be performed openly and could be traceable.

VI. CONCLUSION

SAO needs to develop and support sustainable education to the people under their governance. Good governance practices yield preferable results but without sufficient education, both SAO administrators and the locals would not realize their responsibilities and duties. All parties involved must first understand the process else they would not be able to follow the practices. With the government supports as well as rules and regulations that SAOs have to respond to, the infrastructure for good governance is provided. The remaining task is to educate people and empower them for the success of good governance practices.

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Mangrove Throughout the Years: Its Narrative Development and Social Relevance

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Abstract-- This study aims to describe the chronological development of the mangrove reforestation in the coastal area and intertidal area that was planted by the faculty members, administrative staff, students and parents' association of John B. Lacson Colleges Foundation, an academic unit of the John B. Lacson Foundation Maritime University in the Philippines, and its social relevance to the residents of Seaside Village, Barangay Tangub, Bacolod City, Province of Negros Occidental, Philippines, and the surrounding Barangays in Igang Bay. It utilized a descriptive-evaluative research design to describe the developmental growth of mangroves and its significant influence to the social life of its beneficiaries. The mangrove species were "Bungalon and Bakhaw" male and female, which were planted in various occasions since 1998 up to 2010 within an area of about 1.03 hectares along the shoreline of Seaside Village. Today, there are around 5,000 mangroves of about 30 to 33 feet as the oldest and the tallest among the surviving mangroves. Residents of village recognized the importance of mangroves to their economic status which has a great impact on their food sustenance being the breeding place for various marine species and serving as protection against bad weather. Additionally, the College has been tasked for the past three (3) years to continue reforesting, replanting and propagating mangroves in the forty hectares property of the University's Marine and Mangrove Sanctuary inclusive of about five hectares of mangroves in its intertidal areas at Villa Igang, Puerto del Mar, Guimaras Province, Philippines. Further, this study is hereby recommended in monitoring the growth of the mangroves and identifying the factors that may affect the growth of mangroves.

Keywords—*Mangrove, Mangrove Development, Social Relevance*

I. INTRODUCTION

Mangroves are part of the rich ecosystem providing a variety of economic and environmental functions and products. In the Pacific Islands, one of the earliest descriptions of the mangrove focused on the Botanical diversity of the swamps and their extreme beauty (Foberg, 1974). Mangrove ecosystems are resilient within a range of the environmental conditions (Lugo, 1983), yet, not all of the desired uses of

mangroves are compatible with the sustainability of the mangrove ecosystem.

Mangrove forests thrive in the brackish water margin between land and sea in tropical and subtropical areas. In the traditional subsistence economics, the exploitation of mangrove resources is usually not intensive and settlement is quite sparse. In South East Asia this was attributed to the scarcity of freshwater for domestic use and the sustainability of mangrove soils for long term agricultural exploitation. However, in recent years, the exploitation and settlement of mangrove forest have intensified as traditional economics have become increasingly market-integrated and modernized.

In the Philippines, the transition of utilization of mangrove forests dwelled on the conversion of mangrove area to brackish fishponds covering about 500,000 ha. (FMB, BFAR, 1997). Although a moratorium has been placed on harvesting of mangroves for timber in the Philippines, illegal conversion to fishponds is still taking place (Olsen, et al. 1997). It is often claimed that the decision to convert mangroves is caused by insufficient knowledge of the values of goods and services supplied by the mangroves. Insight into the value of these products and services as well as from alternative uses such as aquaculture and forestry is therefore important. Several studies that analyzed the environmental functions of mangroves have indicated the necessity to internalize these functions in environmental management (Constanza et al., 1989; Freeman 1991; Barbier et al., 1991; Ruitenveek, 1992; Dixon et al, 1994; Gammge, 1994; Melana et al., 2000).

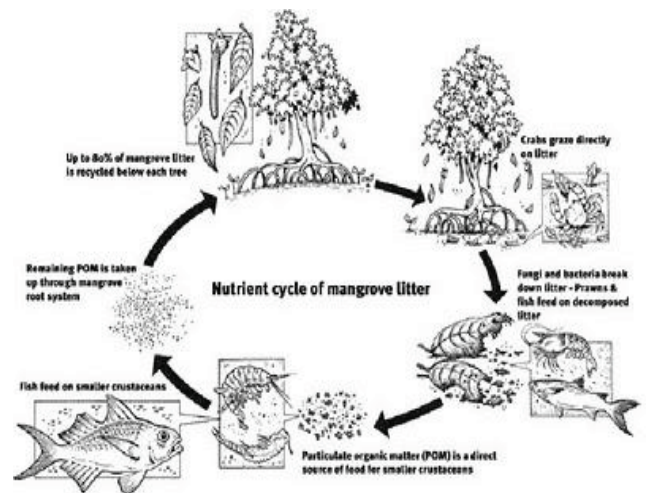
This study is anchored on Republic Act (RA) 7611 known as Palawan Council for Sustainable Development (PCSD), Resolution No. 06-316, a resolution promulgating the rules and regulations governing the conservation and protection of mangrove areas in the Province of Palawan, Philippines.

Moreover, this study is linked with Senate Bill No. 1185, introduced by Hon. Manny Villar. This is an act providing for the preservation, reforestation, afforestation and sustainable development of mangrove forests in the Philippines, providing penalties therefore and for other purposes.

This study describes the chronological development of mangrove trees planted by Faculty and students during the school year 1998-2011 (13 years). This paper also discusses the relevance of this mangrove plantation to the residents of Seaside Village Barangay Tangub, Bacolod City in the Philippines, an adopted coastline residential community of the school.

A. Conceptual Framework

Mangrove trees are an indigenous species to Florida and a major contributor to the state's marine environment. The mangrove tree is a halophyte, a plant that thrives in salty conditions. It has the ability to grow where no other tree can, thereby making significant contributions that benefit the environment. Their coverage of coastal shorelines and wetlands provides many diverse species of birds, mammals, crustacean, and fish a unique, irreplaceable habitat. Mangroves preserve water quality and reduce pollution by filtering suspended material and assimilating dissolved nutrients. The tree is the foundation in a complex marine food chain and the detrital food cycle. The detrital food cycle was discovered by two biologists from the University of Miami, Eric Heald and William Odum, in 1969. As mangrove leaves drop into tidal waters they are colonized within a few hours by marine fungi and bacteria that convert difficult to digest carbon compounds into nitrogen rich detritus material. The resulting pieces covered with micro-organisms become food for the smallest animals such as worms, snails, shrimp, mollusks, mussels, barnacles, clams, oysters, and the larger commercially important striped mullet. These detritus eaters are food for carnivores including crabs and fish, subsequently birds and game fish follow the food chain, culminating with man. Many of these species, whose continued existence depends on thriving mangroves, are endangered or threatened. It has been estimated that 75% of the game fish and 90% of the commercial species in South Florida rely on the mangrove system. The value of red mangrove prop root habitat for a variety of fishes and invertebrates has been quantitatively documented. Data suggest that the prop root environment may be equally or more important to juveniles than seagrass beds, on a comparable area basis. Discovery of the importance of mangroves in the marine food chain dramatically changed the respective governmental regulation of coastal land use and development.



The mangrove ecosystems are recognized as providers of a wide variety of goods and services to people including provision of plant and animal products (Macnae, 1974; Rosolof 1997; Spaninks and Beukering, 1997), sediment trapping and nutrient uptake and transformation (Furukawa et al., 1997); Hussain and Badola, 2008), protection from floods and storms (Maltby, 1986; Gilbert and Jansen, 1997; Semesi, 1998; Sathirathai and Barbier, 2001; Kathiresan and Rajendran, 2005; Dandouh-Guebas et al., 2005; Badola and Hussain, 2005) and stabilization of coastal land (Carlton, 1974; Wolanski, 1985). Ecosystem services like protection against floods and storms and reduction of shoreline and riverbank erosion sustain economic activities in coastal areas throughout the tropics (Moberg and Ronnback, 2003). Local communities in coastal areas are directly benefited from mangrove resources in terms of forestry and fishery products (Bandaranayake, 1998; Sathirathai and Barbier, 2001; Richman, 2002; Moberg and Ronnback, 2003; Hoq et al., 2006; Shervette et al., 2007). Food and beverages from the mangroves include fish, crustaceans, shellfish, sea cucumbers, other invertebrates, edible species of oysters, mussels, cockles and gastropods, wildlife, honey, condiments, tea substitutes and sugar (Gilbert and Jansen, 1997).

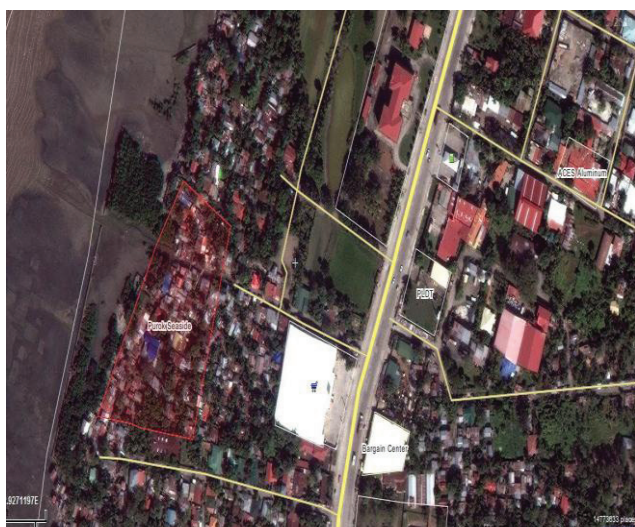
The estuarine and mangrove systems are good nursery grounds for economically important near shore fish and shellfish species (Miller et al., 1983; Little et al., 1988). Snedaker and Snedaker (1984) estimated that more than 90% of near shore marine species were found in the mangroves during one or more parts of their life cycles. There is positive correlation between mangrove area and prawn/shrimp landings (Primavera, 1995, 1998). In tropical developing countries, 60% of the people depend on fish for 40% or more of their protein demand. The majority of the world's fish catch (87%) comes from marine areas. In India, the largest fish production comes from the coastal capture fisheries of inshore waters (<50 m depth), which constituted about 82% of

the total marine capture fish production of 2.7 million tons in 1997 (Sudashana et al., 2000).

However, the consumptive contribution of mangroves to the livelihoods of coastal communities is often ignored and receives little recognition from the researchers, policy makers and practitioners (IIED, 1995; Narendran et al., 2001; Delang, 2006). One of the reasons is that little information is available on the types of goods and the quantity extracted, processed or sold. Collecting such information is generally time consuming due to high degree of spatial and temporal variability and price estimation in case of subsistence use (Eaton and Sarch, 1997). Furthermore, most of the products are consumed directly by the gatherers and do not enter the market. Therefore, when evaluating mangroves for contribution to food for coastal communities, these have to be viewed as dynamic ecosystems with non-linearities, thresholds and discontinuities (Costanza et al., 1993). Since the non-marketed non-wood forests products (NWFP) would disappear if the mangroves are clear cut, the value of these products should be included together with its value as a carbon sink (Twilley et al., 1992; Bouillon et al., 2008), as protection against storms and floods (Badola and Hussain, 2005), the value of its biological diversity and recreational and option values among others. Hence, any economic analysis trying to estimate the value of mangrove without recognizing their contribution to subsistence economies will be incomplete.

B. Scope of the Study

The Seaside Village is located in the West Coast of Bacolod City, Province of Negros Occidental, Western Visayas, Philippines. The position or coordinate is latitude 10° 38.0' N and longitude 122° 55' E. The estimated area is about 3 kilometers long open coastal system.



II. RESEARCH METHODOLOGY

This study utilized the descriptive-evaluative in the developmental growth of mangroves trees in Seaside Village, Barangay Tangub, Bacolod City, Philippines. The focus of this is on the significant influence to the social life of its beneficiaries, the shoreline residents.

Data-gathering was done by periodically monitoring the growth of the mangroves throughout the inclusive years of the study (1998-2010).

The dependency of local people on mangrove forests was estimated in 83 households situated in Seaside Village. These represent the residential community group. Using a structured interview guide, information on the relevance of mangrove resources was collected. The indicator of the interview guide was categorized accordingly as follows: protection from strong winds and waves, livelihood, and daily subsistence.

III. RESULTS OF THE STUDY

TABLE 1
CHRONOLOGICAL DEVELOPMENT GROWTH OF MANGROVES

Year Planted	No. of Mangroves Planted	No. of Mangroves Survived	Recent Monitoring Measurement in feet
1998	1200	995	30 – 33 feet tall
1999	1000	921	29 – 27 feet tall
2000	500	375	27 – 28 feet tall
2001	500	477	24 – 21 feet tall
2002	500	402	22 – 21 feet tall
2003	500	375	21 – 19 feet tall
2004	500	200	18 – 15 feet tall
2005	500	370	16 – 15 feet tall
2006	500	420	13 – 10 feet tall
2007	300	205	12 – 10 feet tall
2008	200	120	8 – 6 feet tall
2009	100	60	3 – 4 feet tall
2010	100	80	1 – 2 feet tall
Total		5,000	

In September 1998 the College conducted the first mangrove planting at Seaside Village, Bacolod City. The objectives of the project were as follows: 1) to plant mangroves at the shoreline; 2) to institute among the students a sense of environmental awareness and involvement in the community development; 3) to implement environmental advocacy program to the community residents of Seaside Village; 4) to provide wider breeding grounds for aqua denizens and for environmental protections.

There were 1,200 mangrove propagules planted at the shoreline of Seaside Village. The mangrove species planted

were “*Bungalowon (avicennia officinalis)* and *Bakhaw*” (male (*rhizophora mucronata*) and female (*rhizophora apiculata*). The activity was successfully done through the active participation of all JBLCF-Bacolod first year students and their class advisers, Administrative staff, Red Cross Youth, 824th NROTC Officers, Village Officials, and residents with the Provincial Environmental and Natural Resources Office (PENRO) that provided the technical assistance in the plantation of mangroves.

Guided by the same project objectives during the 1998 mangrove planting, an additional of 1000 mangrove propagules of the same species were planted in the adjacent side of the shoreline of Seaside Village in September 1999.

In September 2000, five hundred (500) more mangroves were planted. The activity was successfully participated in by the College Community.

During the successive years, follow-up and monitoring of the mangroves planted at the Seaside Village shoreline from school year 2001-2008 was done.

During the September 2001 monitoring, the growth of the mangroves planted in 1998, 1999 and 2000 in terms of their height was noted.

The College Community Extension Services Coordinator measured the planted mangroves together with the Maritime Program Students and Seaside Village President in 2002 to monitor the thriving mangroves.

A follow-up visit and monitoring by the College Faculty, staff and students in September 2003 was done to assess the growth and development of the planted mangroves.

It was observed that the mangroves were flourishing since the trees had already measured approximately four to five feet (4 to 5 ft) in height in 2004. The advocacy of the college lived on as the faculty and staff had conducted site visits every year to continuously monitor the growth of the mangroves.

The mangroves were about 15 feet tall during the first trimming and cleaning in September 2005 at the shoreline of Seaside Village. The canopy areas of mangroves were trimmed and cleaned from plastic garbage. During the same year, the Provincial Environmental Natural Resources Office and City Environmental Natural Resources Office awarded a Certificate of Recognition to the College Community Extension Program.

The thriving mangroves during the September 2006 and 2007 visits and the monitoring at the mangrove plantation at the shoreline of Seaside Village continued. The faculty and staff of the college continued to plant additional mangrove propagules during School year 2008-2009.

Present Status of Mangroves at Purok Seaside and Its Benefits to the Community Residents Living Beside the Shoreline

Through the joint effort of John B. Lacson Colleges Foundation and the community officials as well as the residents of coastal area, the mangrove planting project was made a success. Today, the mangroves stand at thirty feet (30’), with a total of five thousand (5000) fully grown mangroves within an area of about .7235 hectares along the shoreline of 1.4 hectares. Establishing the social relevance and contribution of mangroves to the 83 household of Seaside Village, this mangrove forest served as a buffer zone against the strong waves and winds to the residents living adjacent to the shoreline of Seaside Village during typhoon. In addition, this also helped prevent soil erosion in the shoreline as well as serve as breeding ground for different species of fishes, crabs, and shells in the shoreline area which served as an additional livelihood for community residents living beside the shoreline.

Additionally, the John B. Lacson Foundation Maritime University marine and mangroves sanctuary as part of a forty (40) hectares property inclusive of about five (5) hectares of mangroves with different species at Villa Igang, Puerto del Mar, Guimaras, has been assigned to the JBLC Campus in the past three (3) years to continue reforestation, replanting and propagating mangroves in its intertidal areas. JBLC PTA Officers had their share of mangrove plantation of about 200 propagules last April 23-24, 2010.

Social Relevance of Mangroves on the Economic and Social Life of the Shoreline Residents of Seaside Village, Bacolod City

The study revealed a wide extent of resources used by the local residents. The mangroves has made a remarkable relevance on the lives of the residents on the following aspects, expressed in the interview.

Protection

Mangrove trees served as buffer zone against strong winds and waves during bad weather thus protecting the houses and well-being of the residents in the area. A sense of protection was realized by the coastal residents’ household during bad weather. Houses made of light materials are not easily destroyed by strong winds with the presence of mangrove forest, flooding triggered by high tide is controlled by the huge roots of mangroves from reaching and penetrating houses of the residents, thus personal and households belongings are free from destruction.

Villagers were able to develop a sense of security that they are being shield by the mangrove forest. As they experienced the significant role of mangrove in their lives, it is an incidental complementary reaction of the villagers in taking extra care of the mangroves and vigilant enough to apprehend intruders who are cutting and destroying these mangroves. Apparently, a complementing protecting is given by the villagers to the mangrove forest.

Nutrition/Livelihood

Mangrove forest became the nursery and breeding ground for various marine lives which augmented the food supply of the shoreline residents. Moreover, it gave an opportunity for additional livelihood for the fisher folks. An estimated of 5% increase in their income everyday through a better catch of fishes and various seashells such as mussels, cockle, shrimps, crabs of different species and krill.

Preservation/Daily Subsistence

Mangroves have prevented soil erosion and provided cool temperature along the area. It served as a natural water filter and prevents pollutants such as household wastes from reaching deeper water.

Due to the tick mangrove trees, a well-defined shaded area that maintains a cool atmosphere is highly appreciated by the residents. It was also noted that various species of birds migrate in the area, indicating a balance ecosystem.

IV. IMPLICATIONS

The implication of this study as defined in the framework, is that, as public awareness improves in the trophic relationship and interaction and mangroves ecosystems, the villagers as well as the students, will be able to manage their behavior properly as they interact with the environment without causing harm.

A vital contribution of this study to society is the development of positive attitude toward mangrove system is very vital in the initiative of protecting them and the coastline in general.

Further implies that, the essence of the existence of the mangrove in Seaside Village throughout the years is a parallel growth of the physical structure of the mangrove forest, and growth on the level of awareness of the residents on the importance of mangrove in their well-being as they experienced it throughout the years. Relative to their social life, the degree of caring and valuing to mangrove increases, due to their experiences being protected by mangrove forest against bad weather. An incidental environmental education is a phenomenon by lived experiences among the villagers.

V. CONCLUSIONS

The researcher in this particular study concluded with certainty that the mangroves planted along the shoreline of Seaside Village have contributed much to the protection of the marine environment as well as to the protection of their houses and properties along the shoreline during bad weather. The mangrove project has also provided them a form of livelihood as determined by the result of the survey and the actual observations of the researchers during the interview. Apparently, mangroves are for indirect use among the shoreline residents which include value in terms of coastline protection and stabilization and value in terms of providing breeding ground for fish.

Furthermore, the mangrove forest project is relevant in the realization of the corporate responsibility of the school, in promoting positive impact to Seaside villagers through the yearly plantation of mangroves which is vital in the protection of their well-being, sustainable livelihood and a high level of awareness in protecting the eco-system. Finally, this project provided the students a learning experience of planting mangroves, which formed part in their environmental education.

Moreover, a concrete education among the shoreline residents was established, to protect and value the mangroves and environment in general, hence, life and well-being is dependent on the balance ecosystem.

V. RECOMMENDATIONS

It is recommended by the researcher that shoreline residents be involved in planting more mangroves and shoreline clean-up.

The Local Government Unit should take a serious look in the implementation of the law protecting mangroves.

Moreover, fishermen's organizations around the Philippines must include in their organizational agenda the importance of mangrove in order to improve their income due to increase of catch of fish.

People living very close to the shore must be educated about the good effects of mangrove to their lives and the marine environment so that it will be easy for the government to provide protection to this very important tree with their help.

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Promoting Developmental Outcomes for Children-in-Conflict with the Law: A DLSU-D Framework

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Abstract - The various ways on how universities can link with the government and the private sectors for their mutual benefit, have been the subject of increasing concern. Universities are also heeding to the call of its social responsibility by doing its role in value formation, not only of the students who are formally enrolled in the institution, but also those who are out of school who have been deprived of descent and normal life. They are those who have serious behavioral and emotional difficulties, and their upbringing and family situation are often problematic.

This paper presents a framework on how De La Salle University-Dasmariñas (DLSU-D) can intervene to improve the physical, social, emotional, mental, moral, economic, and spiritual life of the children-in-conflict with the law (CICL). Some literatures are reviewed to provide inputs to the framework. A collaborative effort with the government and civil society partners is seen to be an effective strategy to achieve the goals. It is believed that DLSU-D could best respond to the challenges while maintaining its main values and goals of touching the minds, touching the hearts, and transforming the lives of the youth.

It is hoped that through this framework, De La Salle University-Dasmariñas (DLSU-D) will be able to effectively sustain its mandate of promoting Christian values, life skills, and livelihood skills to its constituents. Improving their lives will increase their productive capacity and their communities gain indirectly.

Keywords — Children-in-conflict with the law, youth offenders, developmental outcomes, residents, value formation

I. INTRODUCTION

The Philippines has a relatively young population. The proportionate share of the youth 10 to 24 years old comprise 32 percent of the 76.5 million Filipinos reported in the 2000 Census of the Philippine population. The median age of the youth population remained the same from 1980 to 2000 at 20 years. This means that half of the youth population were between 15 to 19 years old, the other half between 20 to 24. With this population, a total of 5,825,425 children and youth are at risk, composed of 3,000,000 children with disabilities, 246,011 street children, 64,000 victims of armed conflict, 2,400,000 who are exposed to hazardous working conditions, 4,097 sexually abused, 11,317 children in conflict with the

law, 3,694 abandoned and neglected, and 100,000 commercial sexually exploited [1].

The increasing number of youth-in-conflict with the law in the Philippines has been quite alarming. "Child in Conflict with the Law" refers to a "child who is alleged as, accused of having committed an offense under Philippine laws" or "anyone under 18 who comes into contact with the justice system as a result of being suspected or accused of committing an offense" [2]. Among those considered "high-risk" are abandoned and neglected children who have not been taken in by existing DSWD facilities, children deliberately used in criminal activities and children of prostituted women. Such is the context of children who become vulnerable to circumstances where they come into conflict with the law. [3].

There are three major agencies that provide custodial or confinement facilities and services for the youth offenders these include the Department of Social Welfare and Development (DSWD), the Bureau of Jail Management and Penology (BJMP), and the Bureau of Corrections which is under the Department of Justice. The DSWD supervises the facilities and services for 6,991 youth offenders nationwide. About 1,340 youth offenders are confined in various regional rehabilitation centers for youth nationwide while 5,651 of youth offenders are under the community-based rehabilitation program. [4].

Because of the growing concern for delinquent youth, Republic Act 9344, also known as the Juvenile Justice and Welfare Act of 2006, was passed establishing a comprehensive juvenile justice and welfare system and creating the juvenile justice and welfare Council. It covers the different stages involving children at risk and children in conflict with the law from prevention to rehabilitation and reintegration.

The increasing number of CICL is not only true in the Philippines but in other countries as well. International standards require countries to promote the establishment of laws, procedures, authorities and institutions that respect the rights of children in conflict with the law and are directed towards their rehabilitation and reintegration into society. The

primary instrument guiding the development of juvenile justice is the United Nations Convention on the Rights of the Child (CRC), of 1989, which has been ratified by every country in South Asia. State parties are obliged to give effect to the Convention by means of laws, policies and practices designed to further its goals [5].

The UN Convention on the Rights of the child [6] emphasized that the “best interest of the child” must always be the primary consideration in all actions undertaken by any public or private institution/agency or individual concerning the child. It defines “best interest” as the “protection and care as is necessary for [a child’s] well-being, taking into account the rights and duties of his or her parents, legal guardians, or other individuals legally responsible for him or her, and, to this end, shall take all appropriate legislative and administrative measures”.

The De La Salle University-Dasmariñas (DLSU-D) in Cavite, Philippines is laying out the groundworks to fully operationalize the Bahay Pag-asa Youth Center (BPHYC). This is anchored on its mandate of promoting sustainable outreach projects catering to the needs of the youth and other beneficiaries, not only in Cavite but in the whole region as well. Along with this mandate, one of the University’s goals is to promote Christian (La Sallian spiritual formation) values, life skills, and livelihood skills to its constituents. The University has been playing a meaningful role in improving the quality of life of young and adults in the service areas and provide them equal opportunities to develop their human capacities. The growing concern of the University on youth development specifically involves social protection of the most vulnerable sector and communities through social welfare and assistance. The University firmly believes that improving their lives will increase their productive capacity and their communities gain indirectly.

This paper sets out a model or framework on how De La Salle University-Dasmariñas (DLSU-D) can play a major role in improving the physical, social, emotional, mental, moral, economic, and spiritual life of the CICL. Some literatures are utilized to gain insights and to provide inputs to the framework.

II. REFLECTING ON PAST RESEARCH LESSONS

Much has been written about the CICL not only in the Philippines but in other countries as well using various methodologies such as face-to-face interviews to survey of secondary data and case studies. In the Philippines, some of the studies and researches were limited to specific cities in Metro Manila while others had a nationwide coverage. This section summarizes the studies involving CICL which will give direction on the framework that this paper hopes to accomplish.

A UNICEF-commissioned study conducted by the Ateneo Law School [7] revealed that the Filipino child in conflict with the law is usually male; between the ages of 14 and 17; elementary graduate, middle child from a low-income family with four to six members; charged with property-related crimes (robbery and theft) and, exposed to drugs or gang.

The crimes committed by Filipino youth offenders include both index and non-index crimes. Statistics from the Department of Social Welfare and Development (DSWD) showed that crimes against property, including theft, robbery, qualified theft and carjacking, represent the majority of the cases. From 1995 to 2003, over 50,000 children in the Philippines have been arrested and detained. About 28 children get arrested everyday, or more than one child for every hour. On May 6, 2005, there were about 2,100 children in jails across the Philippines, 20 of them on death row. [8]

The most common types of offenses commonly committed by the CICL in Cebu are offenses against property, offenses related to drugs, and sexual offenses. Stealing is often a way of providing for themselves either by selling whatever they snatch or stealing food. Many children turn to drugs to forget about their problems or reduce their fear of committing other crimes. They also buy, sell and use other more potent—and expensive drugs—like marijuana or shabu (called the “poor man’s cocaine”) which are available in the black market. Sex offenses are, likewise, on the rise. Usually, if a sex offender is a child, the victim is also a child. Physical abuse, lack of discipline, and parental neglect lead to confused and wrong sexual behavior. [9] Other offenses identified involve physical injury and murder. Children are also more inclined to use violence under the influence of drugs because they lose control of their emotions and reason. [10]

Several studies show that the most common feature among the children is their poor economic conditions under which they came into conflict with the law. Ancheta-Templar [11] describes children and youth as “victim-survivors of the socioeconomically-rooted injuries of their families and communities”. It was also revealed that CICL are often from large families with 5 to 6 children with very low income, amounting only to Php5,000 (\$125) per month. In Davao City, children who find themselves in conflict with the law are either neglected or stow-away children from neighboring provinces. They are on the streets for survival. In many instances, these children’s circumstances of “neglect” stem from impoverished conditions rather than deliberate parental neglect or abandonment [12] .

The presence of having both parents to take care of their children proved to be very important in preventing them from doing crimes. In cases of CICL, the fathers are unemployed or they are living only with their mothers. Additionally, at least 60% of CICL do not live with any parent at all when arrested. Moreover, physical and sexual abuse at home is the cause of children taking to the streets where they find

“substitute families” in gangs. Gangs encourage violent behavior, theft, robbery and more serious crimes. [13]

In the Philippines, children in jails are detained in a small unventilated concrete cell together with convicted adult prisoners. There are no beddings or basic sanitary items; they are not given any change of clothes, and commonly wear rags. Children are reported to be underfed and hungry and diagnosed of hepatitis and TB. They are often sexually abused by other adult inmates or prison authorities and are sold as child prostitutes. They have been detained for months without charges, legal counsel or any regard for their legal rights. No arrest warrants were issued at the time of their arrest and no court order was given for their detention. None of these children has been provided with competent legal counsel, as required by Philippine law [14].

A research done by the Save the Children-UK (SC-UK) [15] in the three main population centers in the country—Metro Manila, Cebu and Davao, representing Luzon, Visayas and Mindanao noted how much the country is in need of an organized system of diversion, including a community-based restorative justice model of mediation. They emphasized the need to ensure that all offenders should be diverted from the court process through a graduated range of community-based options—from warning to mediation depending on the seriousness of the offense. A study of the Department of Sociology of the Polytechnic University of the Philippines [16] for example has also proven this. They observed disparities between the claims of the government institutions and the actual experiences of the children. The detention center does not function as a rehabilitation center, but a place for survival and a training ground for criminality.

Community-based family support projects that alleviate poverty are not reflected in the local government budget nor do these appear in the social welfare reports of the local social welfare officers. [17] Hence, more than one million children worldwide detained by law enforcement officials are often denied the right to medical care, education and individual development.

Because of the very depressing conditions of the CICL, Carlota, S. and Carlota, A. [18] recommended the creation of a program that incorporates systematic attempts to bring about personality and attitudinal changes, specifically, in moral standards; emotional stability and self-control, tolerance for frustration; and in self-concept. Likewise, the Singapore Children’s Society [19] asserted that the children have basic needs for their healthy growth and development. These include food and nutrition, safety, a nurturing environment, protection from harm, secure emotional ties, and education. They should be provided with a strong and healthy foundation for life. Services and programs must, therefore, promote and support the child’s physical, social, emotional and intellectual development, functioning, and well-being.

From the foregoing, it can be deduced that while the primary and most important pillar of the justice system is the community, community responses to issues relating to CICL remain inadequate. There is a need, therefore, for an intervention by an academic institution, as part of its social responsibility, as a means of providing options towards the best interest of the child and along the principles of restorative justice.

III. FRAMEWORK FOR PROMOTING DEVELOPMENTAL OUTCOMES FOR CHILDREN-IN- CONFLICT WITH THE LAW

Current efforts are geared towards the creation and institutionalization of DLSU-D-BPYC, a facility that will provide support systems for holistic transformation of the CICL. It seeks to introduce reforms in the administration of justice for CICL at the institutional level based on the principles as provided for in the Republic Act 9344. Various programs shall be provided for purposes of intervention and diversion, as well as rehabilitation of the child in conflict with the law, for reintegration into his/her family and/or community. DLSU-D believes that protection for CICL can be effected through diversion at the community, police and prosecutors’ level in the administration of justice. This is aimed at minimizing the CICL’s entry into the criminal justice system.

A. Maximizing Residents’ Engagement and Participation in Various Program Components

The residents should have compelling reasons to stay in the Center for rehabilitation and transformation. They are expected to show maximum commitment and determination to change through a package of programs such as (a) spiritual formation; (b) basic education (academic, nonacademic, and sports development); (c) livelihood skills training; (d) and post release (Fig. 1).

The spiritual formation component involves spiritual and moral development of youth offenders through the inculcation and putting into practice the Christian way of life. The activities shall include structured catechetical classes, Sunday masses, morning and evening prayers, recollections, and other special services.

The basic education sessions shall be designed for residents who have basically no formal to low level of schooling (Grade 0-Grade 3). The basic education activities shall include remedial reading, writing, simple arithmetic, and science. The knowledge advancement activity is a more advanced formal educational training. The residents will take formal classes in Mathematics, English, Science, Filipino, and Social Studies. The faculty members are volunteers from DLSU-D and other institutions in the locality. For nonacademic activities, the residents shall be given the chance to harness their potentials in arts such as music, dances, acting,

painting, and other cultural activities. They will also be given the free hand to form organizations and engage in other extracurricular activities.

While in the Center, the residents are provided with the opportunity to be trained to gain skills on income generating activities. The livelihood skills training programs will provide sufficient skills for the residents to practice a particular craft or sets of crafts to prepare them for gainful or self-employment. The trainings will be on product development and business management. The residents will be immersed in opportunities which would benefit them once they are released from the Center. The training areas are on , tailoring, backyard gardening/landscaping, candle making, automotive mechanic, poultry and livestock raising, soap making, high-speed sewing, basic electronics, refrigeration and air-conditioning carpentry/cabinetry, Christmas decors making, engraving, framing, food processing, garments, and tailoring.

Post-release programs are essential in assisting offenders to re-establish themselves within wider society. The matters that ultimately led to imprisonment may be unresolved and still capable of influencing the life of the newly released offender. Hence, the Center should provide the support services and networks necessary to monitor the progress of the residents once they are released from the Center. These can be realized through parent education, family counselling, home visitations, formation of cooperative learning groups and peer support groups, annual homecomings, continuous legal assistance, job referrals and placements, scholarship grants to the qualified, and guardianship for the orphaned, homeless, or abandoned. Part of the post-release program could be the alternative schools to help them further their academic skills and secure employment.

Community-based support services are designed to strengthen family life. These are provided to those reunited with their families/guardians from the evacuation/rehabilitation centers in order to facilitate the child's readjustment and reintegration into his family and the community.

The post-release program should be reinforced by family, peers, and the community. This is a major challenge because community norms may not value the skills and behaviors young people are trying to adopt, and many of the CICL come from poor families. This suggests the importance of providing guidance and moral support, reinforce progress, and help them recognize opportunities in the job market and beyond.

B. Developing Strategies to Promote Positive Youth Development

In the Center, there should be a presence of caring, committed adults who will provide moral and emotional support. There should be a personal, family-like atmosphere, a sense of camaraderie with peers and staff, and a sense of belonging.

Strategies must be developed to increase positive resident's engagement in several programs, social integration, building skills, inculcating a sense of belonging, and incorporating the elements that seem to drive the success of the most effective youth programs. These will lead to the development of their leadership skills, self-esteem, and resiliency to derive the best from and resist negative influences in their peer cultures.

C. Strengthening Public Support and Building Capacity

To further improve the services to the residents, active participation of the government and non-government organizations (NGOs) shall be strengthened. There is a need to coordinate with local officials and other stakeholders to develop clear, compelling goals. Recognizing the need for public and private sectors' support, a strong commitment from the volunteers must also be established. Trainors and resource persons will be sourced from DLSU-D, Technology Skills Development Authority (TESDA), Department of Trade and Industry (DTI), and other institutions/agencies. Local government units and other benevolent donors shall also be tapped for funding commitments to improve the facilities of the Center and to meet the needs for food, clothing, footwear, transportation assistance, school supplies, and medicines.

An orientation or a re-orientation seminar/workshop has to be designed from time to time for members of the PNP, social workers from the DSWD, officials from the barangays, or the LGUs so that going about the rather holistic approach to dealing with children in conflict with the law will at least be in accordance with the very conceptual framework upon which the law is built. Technical assistance from the DSWD relative to the implementation of the services and projects shall be sought.

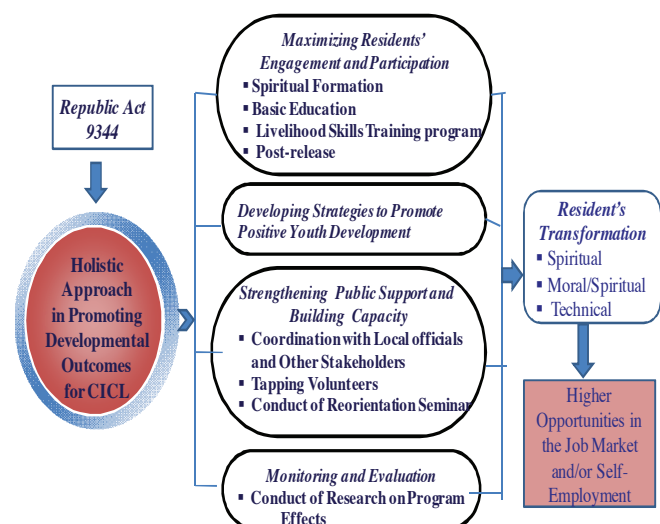


Fig. 1 A framework on promoting developmental outcomes for children-in-conflict with the law

D. Monitoring and Evaluation

A monitoring and evaluation component must be in place to build a record of effective approaches in promoting development outcomes for the residents. Researches can also be done to study program impacts. Gathering evidences on the effects of program components will support the broader goal of increasing the commitment of the university to continuously address the problems of the CICL.

IV. ORGANIZATION AND MANAGEMENT

The The DLSU-D-BPYC is proposed to be under the supervision of the College of Law Enforcement and Public Safety (CLEAPS) which is under the Office of the Vice Chancellor for Academics and Research (VCAR) (Fig. 1). [20]. Its direct supervision shall be under the Dean of CLEAPS who will at the same time be the Director. It will become a laboratory of the CLEAPS and the Department of Pediatrics of the DLSU Medical Center.

The training on livelihood skills will be coordinated with the Livelihood and Enterprise Development Center (LEDC), College of Business Administration (CBA) of the University and government agencies like Technical Education and Skills Development Authority (TESDA), Department of Science and Technology (DOST), Department of Trade and Industry (DTI), and the Local Government Units (LGUs).

The Director will oversee the operation of all the project components. He/She shall be assisted by the Administrative Assistant and Resident Supervisor. The Resident Supervisor will manage the house prefects, cook, and security staff of the Center. These staff shall be hired and paid on a fulltime basis. The Administrative Assistant will handle the faculty volunteers, foster parents, physician, and legal counsel who will work pro bono either from DLSU-D or DLS-HIS campuses. Also, under the Director are the House Prefect, Spiritual Adviser/Chaplain, and Counselor.

The full swing operation of the Center will start in early 2012. By this time, facilities of the Center might have been completed. Currently, initial planning and coordination with the concerned agencies and institutions such as the Department of Social Welfare and Development, Local Government Units, Regional Trial Court, academic institutions, and the like as well as screening and evaluation of qualified residents are being conducted.

V. SOURCES OF FUNDS

The establishment of the Center, including its facilities, is heavily dependent on donated funds. The BPYC building is already erected but the facilities are still inadequate. Several donors from the private sector as well as the academic

community of DLSU-D are being tapped for donation to complete the facilities.

As a mother institution, however, DLSU-D can also shoulder a significant chunk of the Center's operations, that is, the Salaries and Benefits Expenses – the same practice being done at USLS-BPYC. When donated funds and resources get exhausted and the mother institution has no available reserves as well to support the Center's operation, the last option probably is to make use of the University's loan facilities as follows:

1) *Science Foundation*, an internal source of financing for La Sallian institutions, where the University could seek any amount of loan principal at a fixed interest rate of 10 percent for a maximum of 10 years; and

2) *Development Bank of the Philippines*, an external source of financing for DLSU-D, where as much as 70 percent of a project's cost is loanable at a fixed interest rate of 9-10 percent and at a flexible loan term.

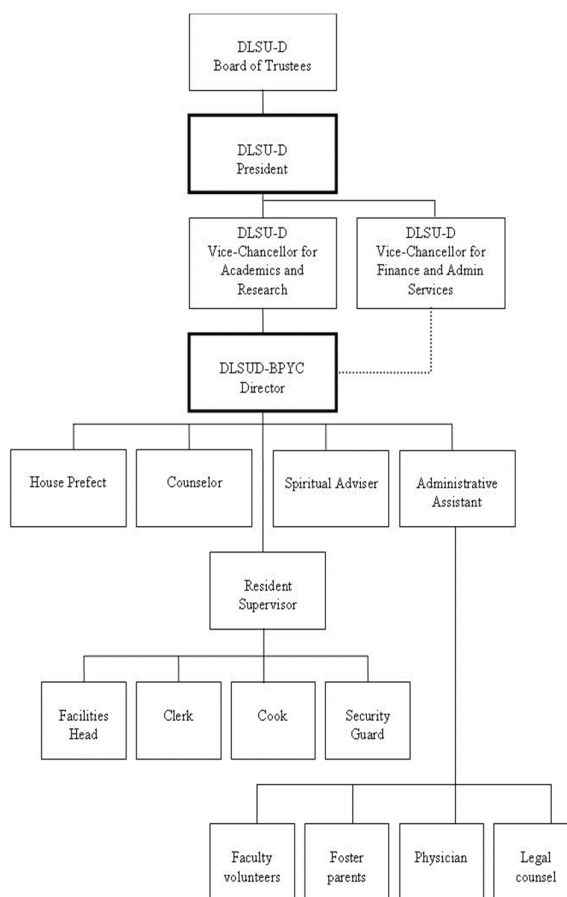


Fig.2 Proposed organizational structure of DLSU-D-BPYC

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The Lessons that Students Learned from their Engagement in Community Outreach Activities

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Abstract – This paper identified the various community outreach activities engaged in by the members of student organizations in De la Salle University-Dasmariñas and the lessons in life that they learned while engaging in these activities.

Documentary analysis of the records kept by the Student Development and Activities Office (SDAO) in terms of the community outreach activities engaged in by the different student organizations was used to gather the needed data for the study which was supplemented by the answers given by 45 student representatives who answered the open-ended questionnaire that was distributed for the purpose of identifying the activities which have impacted them most and the lessons that they learned from these.

Results showed that students engaged in numerous activities like blood-letting, house-building, tree planting, gift-giving, feeding program, giving workshops/ trainings, tutorial services, and the like mostly to children and out-of-school youth. Generally, the students learned to appreciate life more and be thankful for what they have, to be more giving and to share their blessings with others, to value more their family and friends, and to be more understanding of the plight of others.

Findings of this study may strengthen the community outreach program component of the student organizations as a requirement for accreditation and may direct the school authorities to emphasize not only cognitive and psycho-motor learning but also affective learning which completes the holistic education of individuals.

Keywords – community outreach activities, student organizations, life's lessons

I. INTRODUCTION

Tertiary institutions are tasked to perform the three-fold function of instruction, research and community service. Of the three functions, community service (also referred to as community outreach activity or community extension) is commonly regarded as the easiest since in most schools, it only entails giving out donations to the poor people or the unattended sector of society during a specific time of the year. What is normally done is to identify a recipient (a group

of persons or a community) then gather donations from the members of the school and distribute such. It is usually accompanied by much picture-taking and including a written account of this activity in the newsletter of the school to be shown to the accreditors or other guests.

What did the participants get from engaging in this kind of community extension activity? Usually none since this is completed in a one-shot deal that does not give the participants the opportunity to internalize the things that they have done. This is a very narrow concept of outreach since according to McKenna (www.science.ulster.ac.uk), outreach is not a one-way process. Rather, it is about engagement and partnership for mutual benefit.

In De La Salle University-Dasmariñas (DLSU-D), community service is given importance as seen in the creation of an office that is specifically charged with the task of helping the university's partner communities. The Lasallian Community Development Center (LCDC) is the lead unit of the university in implementing its community development activities. It is an important resource of social transformation by facilitating relevant and innovative community programs involving the university and its partner communities through training, service, research, and networking. In its 20 years of existence, the LCDC has garnered accolades for the various projects it has spearheaded involving thousands of individuals and hundreds of families.

The LCDC is not alone in its quest to achieve sustainable development among its partner communities. It has the support of the whole academic community of DLSU-D including the administrators, faculty, support staff, parents, and the students.

The students are strongly encouraged to participate in community outreach activities. Student councils and student organizations have to engage in outreach activities and submit a report of such to the Student Development and Activities Office (SDAO) before they can become a recognized group for a particular school year. The Constitution of the Council of Student Organizations (CSO) states that student organizations "are encouraged to sponsor/hold outreach activities designed to respond to the needs of less fortunate brothers and sisters in the community. Such projects may be in the form of livelihood programs, issue advocacies, and others. This is in accordance with the University's call for the promotion of communion in mission."

DLSU-D is not alone in advocating student participation in community outreach activities. Literature shows that in America, “colleges and universities provide college students - who represent a large and growing source of the nation’s volunteers - with opportunities to deliver valuable services to communities across the country” (Dote, et al. 2006). One research shows that “38 percent of youth, an estimated 10.6 million teenagers, have engaged in community service as part of a school activity, and 65 percent of these youth were engaged in service-learning related activities, such as planning or reflecting on the service project. What’s more, only 5 percent of youth attributed their volunteer activities to a school requirement” (Grimm, et al., 2005).

Why do students participate in community outreach activities as volunteers? Generally, this participation is “one requisite for graduation where students have to accomplish a specified number of hours in community service” (Craver, 2010 in <http://EzineArticles.com/4105869>). Another factor seems to be “the growth of school-based service and service learning. There has been a growing trend to include community service and service-learning in America’s schools as educators and school administrators realize the value of service for youth academic and personal development” (Grimm, et al., 2006).

What do students get from participating in outreach activities? “Participation in school-based volunteer service, and especially service-learning courses with several quality elements, was found to have a strong positive relationship with several measures of civic engagement, including their stated likelihood of future volunteering, their sense of personal efficacy, and their interest in current events and politics” (Spring, et al., 2006). Another research suggests that “youth who engage in volunteering and other positive activities are more likely to be successful at school and to avoid risky behaviors, such as drug and alcohol use, crime, and promiscuity” (Spring, et al., 2007).

In this connection, the researcher thought of investigating the reasons for the DLSU-D students’ engagement in community outreach activities, aside from it being a required activity, and the lessons that they learned from this engagement.

Specifically, the following questions were answered:

1. Why are DLSU-D students engaging in community outreach activities?
2. What community outreach activities have the students engaged in for the last two to three years?
3. Of these outreach activities, which has the most impact to them? Why?
4. What lessons have they learned from this engagement?
5. What recommendations can they give for the improvement of the students’ engagement in community outreach activities?

II. METHODOLOGY

This study was a descriptive/qualitative research that utilized documentary analysis of the records kept in the SDAO to determine the different community outreach activities engaged in by the student organizations. The data were supplemented by the responses of 45 members of student organizations who were asked to answer an open-ended questionnaire to identify their reasons for engaging in community outreach activities, the kinds of outreach activities they engaged in for the last two to three years, the activity that has the most impact to them, the lessons that they learned from these activities, and the recommendations that they can give to improve the students’ engagement in community outreach activities.

The 45 student-respondents represented 31 student organizations recognized by SDAO. Out of these 45 students, 12 have two years of engagement in outreach activity, 5 have three and four years of engagement each, 4 have one year of engagement, and another 5 have more than five years of engagement. This means that even before enrolling in college, 5 of these students have already participated in community outreach activities. Unfortunately, 14 students did not reflect the number of years that they engaged in this activity.

III. RESULTS AND DISCUSSION

From the analysis of the records of approved community outreach activities for School Year 2010-2011, it was found out that during the first semester, a total of 15 activities were proposed singly or jointly by 21 student groups. These benefitted 7 orphanages/children’s home, 4 communities, 1 jail, 1 drug treatment center, and 2 groups of out-of-school-youth. The activities that were undertaken were the following: tree-planting activity, donation/gift-giving, storytelling, tutorial service, feeding, and skills training.

During the second semester, 9 outreach activities were proposed singly or jointly by 13 student organizations that benefitted 5 orphanages/children’s home and 4 communities. The activities that were done were the following: tree-planting, medical mission, and donation/gift-giving.

To further clarify the students’ engagement in community outreach activities, a special meeting was called among the representatives of the student groups where they were asked to answer an open-ended questionnaire which yielded the following results:

A. Problem 1:

Why are DLSU-D students engaging in community outreach activities?

The students are engaging in community outreach activities, not only because it is a requirement for the

accreditation of their respective organizations but because it helps them get in touch with humanity. This engagement aids them to understand the status of life of the disadvantaged, to have a background in dealing with different people, to return all the blessings God has given them, to share themselves with others through their time, knowledge and other resources, to inculcate the true meaning of volunteerism, nationalism, patriotism and the Lasallian core values of faith, zeal in service and communion in mission, to promote love and kindness to others, and to help improve other people's way of living. It is also one way in which the students demonstrate their leadership skills, their role in nation-building and their love for their country. Sharing their time, talent and treasure brings a certain degree of happiness and contentment to these students.

B. Problem 2:

What community outreach activities have the students engaged in for the last two or three years?

Most of the activities undertaken by the students for the past years were tree-planting, donation/gift-giving to orphanages/children's homes/home for the aged, blood-letting, house-building, feeding program, giving workshops/skills trainings, tutorial services, relief operations for the victims of calamities, rescue and retrieval operations after the typhoon, coastal clean-up, child sponsorship/foster parenting, book donation, medical-dental mission, story-telling, entertaining children and adult through dances/performances, and teaching catechism.

C. Problem 3:

Of these outreach activities, which has the most impact to them? Why?

All the outreach activities engaged in by students have impacts to them but first in their list are the following: their encounter with the abandoned children/orphans because this makes them realize how lucky they are since they still have their parents with them who provide them with their basic needs. When they make these children smile because of a story told or a toy donated, this brings to them a certain kind of happiness for somehow making the otherwise dark world of this children a little brighter. Another is the relief operation that they participated in after the strong typhoons that hit the country. It made them feel important knowing that they were able to bring hope to these people by providing them with their basic needs like food, water and clothes that were swept away by floods and typhoons. The other one is their engagement in Gawad Kalinga activities where the students experienced building houses through "bayanihan." This activity oriented them to the importance of unity and team-building and made them realize that when people join hands together, the work becomes easier and more exciting. Somehow, engagement in community outreach activities helps the students realize that they are practicing what St.

John Baptist de la Salle preached – teach minds, touch hearts, and transform lives.

D. Problem 4:

What lessons have they learned from this engagement?

The different community outreach activities engaged in by the students taught them the following lessons: appreciate life more and be thankful for what they have, to be more giving/generous and to share their blessings with others, to value more their family and friends, to be more understanding of the plight of others, to save their resources (money or other material things) and preserve the environment because they can be lost in an instant, to love and help people even those that they do not know, to have a positive disposition that will help them face bravely life's challenges, and to continuously and sincerely take part in helping/building a community. This engagement helps them learn that they have a responsibility towards their fellow human beings and that no matter how big or small one's help is, the important thing is the sincerity to do it. Generally, the students found their engagement in community outreach activities as an enriching experience that teaches them valuable lessons about life.

E. Problem 5:

What recommendations can they give for the improvement of the students' engagement in community outreach activities?

The students gave the following recommendations:

1. There should be a clear communication and coordination with the LCDC for the sustainability of the community outreach activities.
2. All the students should be encouraged to participate in community outreach activities, not only the members of student organizations.
3. The information about the different outreach activities should be properly disseminated and should be made accessible to the students to make them more aware of these activities and to encourage them to participate.
4. Community outreach activities should be integrated in the classroom lessons so that the students' capacity to give something for the community and the nation can be inculcated in their minds.
5. Orientation programs should be done to explain well to the students that volunteerism is not just extending their care to the community during the time of crisis but also during favorable situation and that giving is not sharing only what they have in excess but sharing a part of themselves.
6. Reflection activities should also be done after each activity so that students would be able to verbalize and internalize their experiences.
7. Inspirational talks should be given in regular intervals to ensure that students will be able to sustain their zeal for volunteerism.

8. Student organizations should not be allowed to choose the location of their outreach activities, but should be assigned in places where they are most needed.
9. Proper planning should be done and an adequate budget should be allotted to ensure that the activity will be successful.
10. Appropriate school policies should be instituted so that majority of the students will engage in the conduct of community outreach activities. In this way, the affective domain of learning will be taken care of for the students' balanced development.

IV. SUMMARY

The members of the different student organizations in DLSU-D are strongly encouraged to participate in community outreach activities. Records show that various outreach activities were participated in by the students not only because they are required to do them but primarily to help other people, thereby contributing to the improvement of their lives and the society as a whole. It is through their engagement in these activities that they are able to demonstrate their leadership skills, their role in nation-building and their love for their country.

Of the outreach activities that they engaged in, those that have a greater impact to them are their encounter with the abandoned children/orphans, relief operations to the victims of calamities and their engagement in Gawad Kalinga activities where the students experienced building houses. Somehow, this engagement in community outreach activities helps the students realize that they are practicing what St. John Baptist de la Salle preached – teach minds, touch hearts, and transform lives.

Generally, the students found their engagement in community outreach activities as an enriching experience that teaches them valuable lessons about life. Primary among these lessons is the fact that they have a responsibility towards their fellow human beings. They also realized that no matter how big or small one's help is, the important thing is the sincerity to do it.

They also offered recommendations for the improvement of the students' engagement in community outreach activities. They suggested that these activities should be sustained by a close coordination with the LCDC, wide dissemination of information to encourage more students to participate, proper planning and adequate budget allocation, and through instituting appropriate school policies.

ACKNOWLEDGMENT

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Applying the Rational Unified Process (RUP) Approach to Implement eLearning at Saint Mary's University of Bayombong, Nueva Vizcaya

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Abstract

Purpose – The purpose of this study is to develop an eLearning system/LMS prototype applying the Rational Unified Process (RUP) approach for Saint Mary's University (SMU) of Bayombong, Nueva Vizcaya. The prototype is designed and developed to realize the University's eLearning system/LMS adoption and implementation plan.

Design/Methodology/Approach – The Input-Process-Output model is used to develop this study. Inputs are lifted from Commission on Higher Education (CHED) Memorandum Order on Policies and Guidelines for Distance Education. The Process involves the use of the Rational Unified Process (RUP) with the implementation of its four (4) phases namely; inception, elaboration, construction and transition. The output is an eLearning system/LMS prototype and its implementation plan.

Findings - The eLearning system/LMS can be designed and developed using the CHED Memorandum Order on policies and guidelines of distance education as its system requirement. The RUP four phases can also be applied to deliver an eLearning system/LMS prototype for its adoption and implementation. However, before the start of the development it is noteworthy to consider eLearning readiness assessment result to determine if the University is ready to implement online learning and distance education (OLDE).

Originality/value – The research will serve as a model or a prototype for the adoption and implementation of an eLearning system/LMS for SMU of Bayombong, Nueva Vizcaya. It will help realize the University's plan to adopt and implement eLearning. It increases the chance that eLearning systems adoption and implementation will be successful because the prototype is designed and developed using RUP which is a system development approach. Furthermore, the study can serve as a model for other Higher Education Institutions that plan to implement eLearning.

Keywords—eLearning system, LMS, RUP, system development, distance education

I. INTRODUCTION

Online learning is the solution to the limitations of the traditional form of delivering education. This is a solution to the many challenges that education sectors face not only in the Philippines, but practically in all countries all over the world.

However, researches show that the adoption and implementation of eLearning is not always successful. As a result of this, researchers proposed eLearning models to serve as a guide for its implementation. Researchers recommend the use of an evolutionary systems development approach to successfully address issues and problems in its implementation and successfully implement eLearning project (Hadjerrouit, 2007; Wilcox, Petch and Dexter, 2005). It is for this reason that the adoption and implementation of Saint Mary's University (SMU) eLearning system applying the Rational Unified Process (RUP) which is an evolutionary systems development approach is studied.

II. REVIEW OF RELATED LITERATURE

Researches show that eLearning or online learning in other countries became a global phenomenon (Gulati, 2008; Kastelic and Loncaric, 2005; Bose, 2003). Countries that aim to advance their economy and academic competitiveness rely on eLearning (Leem and Lim, 2007; Bose, 2003). HEIs need to adopt eLearning or online learning to survive the changing demands in education (Kirkwood and Price, 2006).

In the Philippines, the Medium Term Development Plan (MTDP) 2001-2004 of the Philippine National Economic Development Authority (NEDA) encourages the maximum use of ICT most especially in the education sector. Various projects to further ICT use is encouraged by the government and distance learning or online learning is one of these projects. A senate bill entitled, "Open Learning and Distance Education System Act" that aims to provide the mechanism for the establishment and propagation of the open and distance learning educational mode in the Philippines was submitted to the Senate for approval. Two (2) CHED Memorandum Orders (CMOs) number thirty five (35) and number twenty seven (27) series of 2000 and 2005 correspondingly was issued to serve as a guide in the implementation of distance education with the goal of educating not only its constituents but also other students who are geographically dispersed.

HEIs have to respond to pressing institutional, social and government demands. However, according to

researchers eLearning projects are not completely successful. This might be because the development of an eLearning project is complex, hence, a systems development approach should be employed or used in its development to successfully implement one (Hadjerrouit, 2007; Wilcox et.al., 2005; Neuhausser, 2004; Chong, Martinsons and Wong, 2004). Moreover, using a systems development approach in the development of eLearning approach will avoid faulty solutions, poor design quality and maintainability (Hadjerrouit, 2007; Woo, 2006; Wilcox et.al., 2005). With this in mind, the researcher made use of the Rational Unified Process (RUP) which is a software engineering process. It is a systematic approach to assigning and managing tasks and responsibilities in systems development. The advantage of RUP is that it employs best practices in modern software development and presents these practices in a tailorable or adaptive form that is suited for different types of information systems (Kruchten, 2003). Researchers, such as Wilcox, Petch and Dexter (2005), made use of the RUP to develop eLearning.

Projects in eLearning had been done and as a preliminary study some use to have a readiness assessment first before the decision to proceed with the eLearning project. In SMU, a study made by Chua, Lumines and Samson (2009) where the researcher is the adviser showed that SMU students, faculty and administration are ready for eLearning as per motivation, attitude, capacity to learn, and level of expertise. However, there is still a need to provide trainings for faculty and students on the use of eLearning.

III. METHODOLOGY

A. Design of the Study

The research used an input, process and output (IPO) framework to develop the study. Please refer to the figure below.

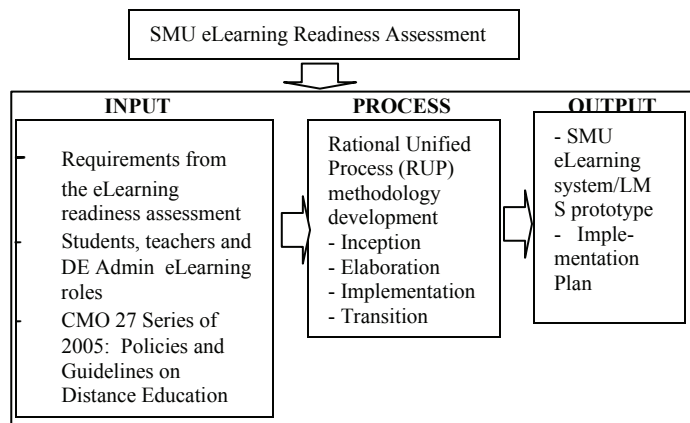


Fig 1. IPO Framework

Findings of the SMU eLearning Readiness Assessment showed that generally SMU teachers and students are ready with eLearning in terms of motivation to use eLearning, attitude towards computer-based education, users' capacity to learn, users' level of expertise and availability and access to computers and internet. However, the study showed that there is still a need for students and teachers trainings on the use of eLearning technology. The researcher made use of these findings to decide and determine the extent of the eLearning project's design. The requirements from the findings of the eLearning readiness

assessment, eLearning system users' role (Uță, 2006) and CMO 27 Series of 2005 where most of the requirements were derived were used as inputs to the RUP development methodology phases namely: inception, elaboration, construction and transition. Outputs of this study are the eLearning system/LMS prototype and implementation plan.

B. eLearning system development methodology

The study made use of RUP phases to develop SMU's eLearning system. Requirements from the eLearning Readiness assessment, eLearning system user roles and CMO on Distance Learning (CMO 27 Series of 2005) served as inputs for the development of SMU eLearning system. The Unified Modelling Language (UML) is extensively used to model the specifics of the system. The RUP phases with its corresponding disciplines and activities are as follows:

1. Inception Phase:

- 1.1 Business modeling - Draw an initial use case diagram for an initial understanding of business need.
- 1.2 Requirements - Review the initial use-case diagram and base it from the gathered eLearning requirements.
- 1.3 Analysis and Design - 1. Create use-case specification to detail use case; 2. Compare use case with the requirements of CMO 27 Series of 2005.
- 1.4 Implementation - List functions that will be included in the LMS base on the initial use case diagram
- 1.5 Test- Create an initial test plan for the succeeding phases of the project
- 1.6 Project Management - Create an initial project and iteration plan

The deliverables of this phase are SMU eLearning vision document, initial use case diagram, use case specification, list of functions, types of tests to be conducted, and initial project management plan.

2. Elaboration Phase

- 2.1 Business modeling - Draw the final use case diagram
- 2.2 Requirements - Further detail use cases by writing a sequence diagram that will show how the actors interact with objects of the system.
- 2.3 Analysis and Design - Translate use case and sequence diagram to classes.
- 2.4 Implementation - Create component and deployment diagram that will show where the different components of the system are located.
- 2.5 Test - Prepare test plans of the eLearning system/LMS.
- 2.6 Project Management - Include detail of project management plan.

The deliverables of this phase are final use case diagram, sequence, class, component and deployment diagrams, test plan, prototype and updated project management plan.

3. Construction Phase

- 3.1 Business modeling - Review use case diagram
- 3.2 Requirements - Review sequence diagram from elaboration phase
- 3.3 Analysis and Design – Review class and component diagram.
- 3.4 Implementation - Develop the eLearning system prototype
- 3.5 Test – Perform Usability Test
- 3.6 Project Management - Prepare project closure and initial implementation ation plan

Deliverables of this phase are eLearning system/LMS prototype, usability test result, and project closure and initial implementation plan.

4. Transition Phase

- 4.1 Requirements - Final review that will make sure all requirements are met
- 4.2 Analysis and Design - Refine class diagram based on the result of usability test
- 4.3 Implementation - Effect changes from the results of usability test (if any) and deliver SMU eLearning system/LMS
- 4.4 Beta Test - Beta test eLearning system prototype
- 4.5 Project Management - Incorporate beta test result and eLearning system/LMS prototype, implementation plan and user training plan

Deliverables: eLearning system/LMS, deployment or implementation plan and user manual and training plan.

IV. DATA ANALYSIS AND RESULTS

The development of the SMU eLearning system is borne out of the need of SMU. Hence, it has been included in the schools' development plan of 2006-2011. Furthermore, the result of the study on SMU's eLearning readiness showed that students, teachers and administrators are ready for eLearning in terms of motivation, attitude, capacity to learn and level of expertise.. A quick inventory of SMU's ICT resources also showed that SMU is equipped in terms of technological resources to implement eLearning.

A. Inception Phase

The inception phase is use to obtain the objectives that eLearning system project must accomplish.

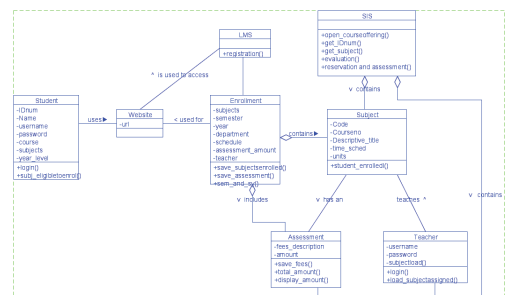
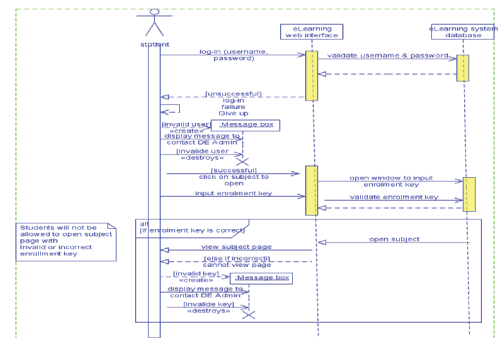
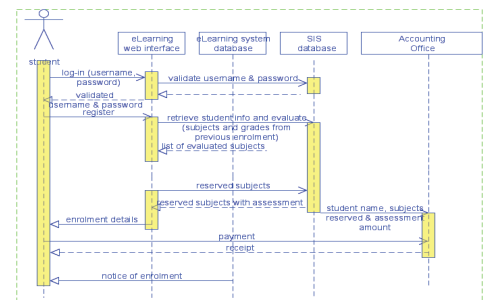
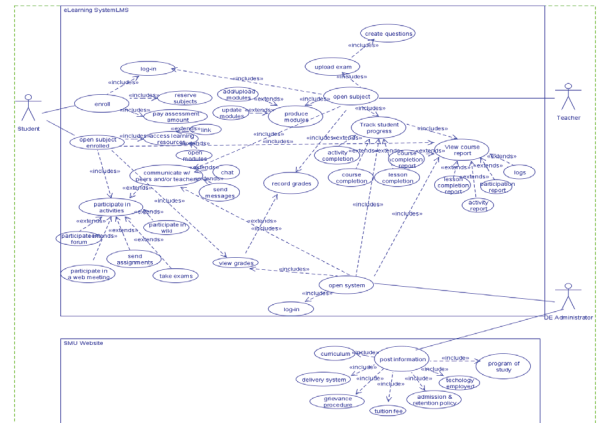
- 1) *Business Modelling*: An initial use case diagram was written. Use cases were derived from the eLearning users roles and requirements of CMO 27 Series of 2005. The usual teaching and learning activities, such as, lessons, exams, assignments, and generation of grades were also included. Actors identified were student, teacher and DE Administrator.
- 2) *Requirements*: Use cases from the diagram were detailed using the use case specification. The use case specification

was used to describe the use case, identify its pre-conditions, write the normal sequence of activities or the basic flow of events in realizing the use case, identify alternative flows, identify special requirements of the use case and write post conditions when the use case is performed. The requirement specification detailed the use case for better understanding and use for further analysis and design.

- 3) *Analysis and Design*: The researcher prepared a requirements-actors-use case matrix to compare identified use cases with the requirements from CMO 25 and check if identified use cases were all represented in the initial use-case. As a result of this, the researcher found out the use cases on posting of information on curriculum, delivery system, grievance procedure, tuition fee, admission and retention policy, technology employed and program of study were not included. These use cases were integrated onto the use case diagram in the elaboration phase.

TABLE 1
REQUIREMENTS-ACTORS-USECASE MATRIX

Component s of CMO 27 Series of 2005	Actor	Use case
1. Curriculum and delivery system	DE Admin	Post curriculum and information on the delivery system.
2. Instructional materials	Teacher	Upload and update instructional materials/ modules
3. Delivery mode	Teacher	Produce, upload and update instructional materials/ modules
3.a Provision of learning packages	Teacher	Communicate with students, teachers and other experts
3.b Support and interact between mentors and peers	Teacher	
3.d Faculty-student and student to student interaction or feedback on learning	Teacher	
3.c Student assessment	Student	Take exams
3.e Assessment and evaluation	Teacher	Create exams
3.f Examinations		Upload Exams
3.g Access to learning resources	Student	Access learning resources and read/open modules
4. Student support and services		
4.a Students shall be given full and clear information about the nature and expectations of the program of study, tuition fees and technology employed	DE Administrator	Post information about the program of study, tuition fees and technology employed
4.b Provide guidance on study skills, orientation on independent study, practice on the	Teacher a. b. c.	Communicate and send messages View course report Track student progress



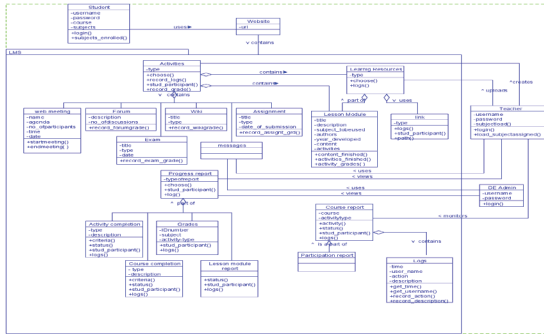


Fig. 6 eLearning system/ LMS class diagram

- 4) *Implementation:* The researcher drew a component and deployment diagram. This diagram contains classes from the class diagrams which were then treated as components grouped according to functions and nodes that represent where the components will reside. This diagram is the architecture design of the SMU eLearning system. The nodes or the device identified in the Fig 7 are the following: user PC, web server, LMS server and SIS server. These nodes are where identified components will be located.
- 5) *Test:* The researcher prepared a usability test plan. The purpose of this test is to test the eLearning system functions usability and users' satisfaction.
- 6) *Project Management:* The researcher updated the initial project management plan to achieve the objectives of the eLearning system project.

C. Construction Phase

- 1) *Business Modelling:* The researcher reviewed the diagrams created in the elaboration phase to check for missing requirements.
- 2) *Requirements:* The researcher repeated the review of requirements in the inception and elaboration phase to make sure that all requirements were included in the next discipline.
- 3) *Analysis and Design:* The researcher reviewed the class diagrams and component and deployment diagrams before the implementation of the system.

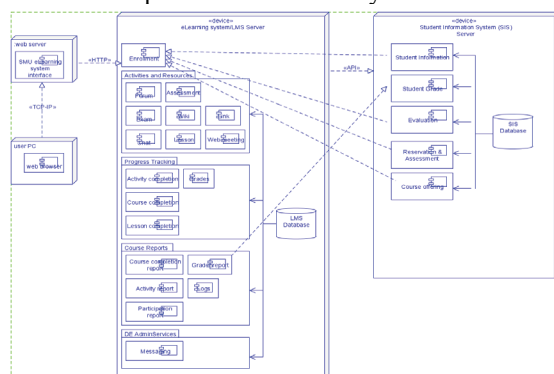


Fig 7. Component and Deployment diagram

- 4) *Implementation:* The researcher embedded the eLearning system design on the existing web site and CMS. The

identified functions from the inception and elaboration phase were included onto the system and tested.

- 5) *Test:* The researcher conducted usability test on the functionalities and design of the eLearning system. This test include completion rate, time on task, errors and mean satisfaction.

The overall satisfaction rating of the usability test showed that participants find that various eLearning system functions were well integrated. Hence, they would like to use the system frequently. However, only 50% agreed that they thought the system was easy to use and they still need to learn a lot of things before they could get going with the system. Using the result of the usability test, the researcher came up with a list of improvements that will be integrated onto the system for the transition phase. The need for a user manual and user training came out as a salient need in the implementation of the system.

- 6) *Project Management:* The researcher updated the project management plan base from the outcome of the deliverables of the construction phase to achieve the objectives of the transition phase

D. Transition Phase

- 1) *Requirements:* The researcher reviewed the model and detailed requirements that resulted from the usability test conducted in the construction phase.
- 2) *Analysis and Design:* The requirements reviewed from the usability test were analysed and results were integrated onto the design of the system.
- 3) *Implementation:* The researcher integrated the new requirements onto the eLearning system.
- 4) *Test:* The researcher conducted a beta test of the system to test the acceptability of the system.

The researcher conducted a beta test in a class of students in SMU. Most of the participants answered that they did not encounter any problem in manipulating the system. Three answered that their difficulty is the slow internet connection in their home, while two did not have an answer to the question. Only one from among the 18 participants said that he cannot participate in the wiki activity. All participants answered that they are interested in online learning and that they would like to pursue eLearning as a method of instruction delivery.

- 5) *Deployment:* The researcher finalized the eLearning prototype and implementation plan based on the previous phases. The

implementation includes a user manual to serve as a guide for users in the manipulation of the system. It also includes a training plan to equip users with the skill in manipulating the LMS and to address the need from the SMU eLearning readiness assessment.

V. R & D PROTOTYPE

Screen shots of the website where information about the program and online application will be conducted



Fig. 8. Screenshot of the SMU website

Fig. 8 shows a screen shot of SMU website where information about the program of study, tuition fee, admission and retention policies and technology employed will be displayed.

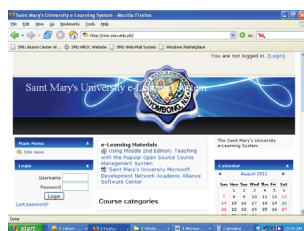


Fig.9. Screen shot of SMU eLearning system homepage

Fig. 9 shows the home page of the eLearning system where the design of the study will be integrated.

Subject reservation and enrolment will be conducted online. Once enrolled, students will be provided with instructional materials or subject modules and perform class activities through the LMS.

VI. CONCLUSION, DISCUSSION AND RECOMMENDATION

The SMU eLearning system is a need and to this effect it is included in the University's development plan of 2006-2011. Accordingly, a study was conducted to determine SMU's eLearning readiness. The findings of the study showed that SMU is ready for eLearning. To realize this, the proponent made a research on applying a Rational Unified Process (RUP) to adopt and implement the eLearning system of SMU also having in mind a model for other HEIs or other organizations which plan to adopt eLearning.

The RUP's four phases: inception, elaboration, construction and transition with its modelling, requirements, analysis and design, implementation, test, deployment, and project management disciplines were used to produce deliverables in each phase. The inception phase is use to understand the project. It is where vision is developed and requirements are identified. The elaboration phase made use of the deliverables in the inception phase and extensively used UML diagrams to illustrate and detail requirements' analysis and design. The SMU eLearning system/LMS architecture is developed in the elaboration phase and

is used for the construction phase. The construction phase main deliverable is a system prototype developed and tested. Results of testing used to refine the eLearning system were incorporated in the implementation discipline of the transition phase. It is also in this phase where the system's implementation plan is delivered. While the researcher had included all that is essential in the study of the system, the researcher recommends further study in the integration of the LMS with the existing SMU Student Information System (SIS) and other windows-based applications.

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The researcher wishes to acknowledge her husband Erwin for being supportive in her endeavour, her son Jethro and daughter Erin for being her inspiration. The author also wishes to thank her parents, siblings, friends and to the SMU VP for Academics and Finance and to the University President for being supportive in the course of her research writing.

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Non-Degree Program's Student Information System [NDP-SIS] A Development of a Student Life Cycle Management System for De La Salle-College of Saint Benilde

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Abstract— Students are the focal point of any educational institution. Data and information relating to students are the main focus of any information system developed to support all other activities that pertain to a student life cycle from their admission until their graduation. The student life cycle differs from one educational institution to another; even the schools owned and managed by a single entity could have different approach and procedures in providing support and service to their students. With the college's four (4) schools offering different non-degree program in different discipline, approach and methods in supporting the activities of students also varies.

This research shows the development of a generic student life cycle (SLC) management system for the different schools using open source technologies and its assessment using usability and other metrics. With the aim of empowering clients and users by enabling the SLC-activities be conducted online, the transition from an automated process to a user-centric information system has been achieved to utilize the current technology and infrastructure the school have. This study will serve as a vehicle to support the school's mission and vision with its innovative and relevant programs using cost-effective materials and technologies.

Keywords— information system, student life cycle, student information system, non-degree program, open source

I. INTRODUCTION

With the emergence of a networked society, institutions that are in the business of producing content are in the verge of collapse as they've lost their monopolies on the creation and delivery of content over the new and different business models of mass participation and the democratization of content production. This has been made possible with the rise

different process-centric technologies which comprises the bulk of its business process using online applications. Chief among them is its Student Information System (SIS) which allows the students, faculty, and personnel to conduct the activities of registration and enrolment, academic advising, and other student-centered activities online.

And while this has proven to be sufficient to accommodate the needs of the institution's with regard to its degree clients which follows the calendar-based trimester schedule, it has

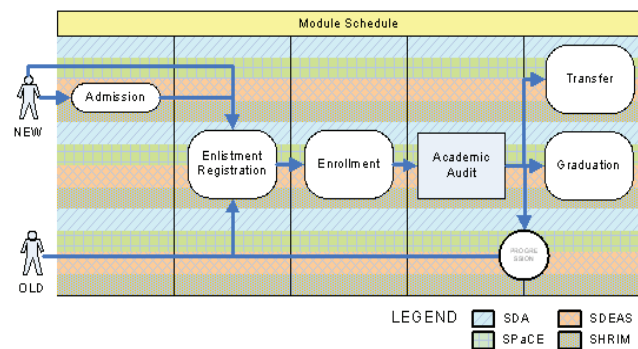


Fig. 1 Module based process flow

proven to be ineffective and difficult to accommodate the modular schedule that is required by its non-degree clients offered by the different schools within DLS-CSB contrasted in Fig. 1 and Fig. 2.

Even though both sets of clients follow the generic life cycle of a student, there are unique and varying business rules for accommodating the modular time-frame offered by each school as depicted in Table 1. These unique and changeable business rules make it difficult to be integrated to the existing

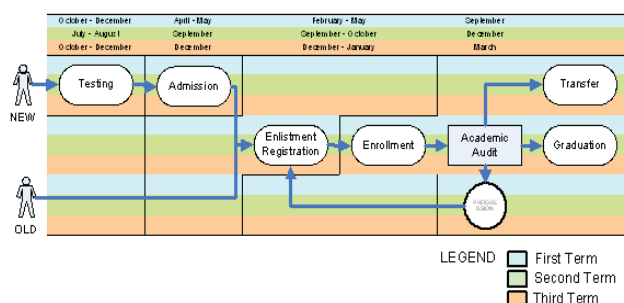


Fig. 1 Calendar-based process flow

of digital delivery channels which are all enabled by the Internet [5]. The De La Salle-College of Saint Benilde, attuned with the digital revolution taking place has ported

TABLE I
UNIQUE NDP BUSINESS PROCESS

Activity	Business Process
Registration	1. A student can enroll on different programs simultaneously. 2. Some programs can have partner institution while other have none (SDEAS).
Assessment	3. Discounts are given to alumni, early enrollment and group enrollment. 4. Schedule and computation of fees are different from SDA and SPaCE from those of SDEAS and SHRIM.
Enrollment	5. Required number of enrollees per program varies from each school.
Academic Audit	6. Generation of diploma is required in some schools (SDEAS/SHRIM) while SDA and SPaCE requires both certificate and diploma.
Admission	7. SDEAS/SHRIM requires stricter admission requirements with program requiring access rights similar to those of the degree programs.

and established SIS which leads the different schools to fork a separate system for their non-degree clients, thus creating an island of information systems.

II. FRAMEWORK

This project development is based on the premise that re-using the facilities and technological assets the school has and coupling it with open source technologies will capture the changing business process requirements of the non-degree programs of DLS-CSB **without** the cost requirement attributed to system development using proprietary tools.

The developed student information system has a central database where all the SLC modules, activities, and procedures will be based. The four (4) core modules that comprise the bulk of the system and are based on each

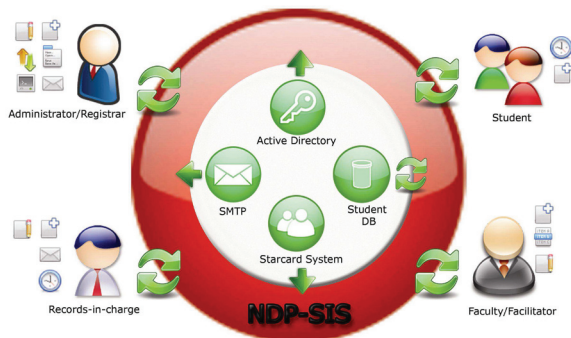


Fig. 3 Non-Degree Program Framework

person's role in SLC are the following: the administrator or registrar, the faculty, the records-in-charge, and the student module. In addition, there are also the three (3) main cohesion modules that were developed: the Active Directory, the SMTP, and Starcard., shown in Fig. 3.

Different persona-based activities are then developed with regards to their data, process, and access requirements that were laid out using the system development life cycle and prototyping stages.

A. System Development Life Cycle

Also referred to as the waterfall approach, the System Development Life Cycle is a time-tested approach in system development. According to [3], "SDLC is an iterative and multi-step process in developing information system solutions". SDLC has seven stages starting from Project Identification, Project Initiation and Planning, Analysis, Logical Design, Physical Design, Implementation, and Maintenance; with each phase laying the foundation for the next phase. This paper has focused on the analysis and the design phases, while the implementation and maintenance phases will be used to complete and test this work.

B. Prototyping

Prototyping as opposed to the SDLC method is the "method of building systems where developers get the general idea of what is needed by the users, and then build a fast, high level version of the system as the beginning of the project" [4]. The idea of prototyping is to quickly get a version of the software in the hands of the users, and to jointly evolve the system through a series of cycles of design. Any of these prototypes, whether paper-based or running software, can then

be evaluated to see whether they are acceptable and where there is room for improvement [1]. Fig. 5 depicts the different activities in prototyping. This study has used prototyping in the design of the interface features and its usability since the selection of the actual program interface would differ from each institution.

III. OBJECTIVES OF THE STUDY

This study aims to present that by espousing the open source tenets of collaboration, openness, sharing, integrity, and interdependence, vital applications can be constructed even with miniscule budget without loss of quality. Thus, the general objective of the research is to develop a generic student information system for the non-degree programs of the De La Salle-College of Saint Benilde with the use of open source materials and technologies.

IV. METHODOLOGY

A. Project Management

The TenStep Project Management Process in managing the software development project will be used. The TenStep process is divided into two major areas – the first two for definition and planning, and the next eight for managing and



Fig. 4 Ten-steps project management

controlling the work in developing the proposed system as depicted in Fig. 4. These processes entails that the first two should be done first, and the rest done in parallel all throughout the project, each with its required output.

B. Adaptive Development

The system was developed using the adaptive methodology

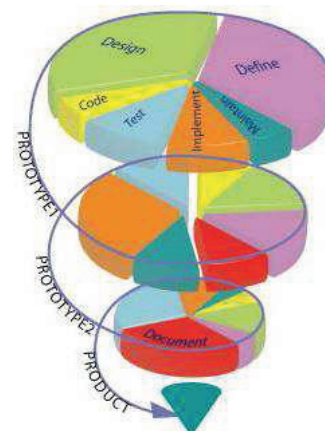


Fig. 5 Adaptive development process

that usually uses spiral development. This approach consist a series of iterations or revisions based on the user's feedback for a particular prototype. An adaptive approach requires intense interactivity between the users and developers, and does not typically begin with a well-defined final product. According to [4], the adaptive method develops a system incrementally by building a series of prototypes and constantly adjusting them to user requirements, and as the process continues, the developer revise, extend, and merge earlier versions into the final product as depicted in Fig. 5.

According to [2], adaptive methodology coupled with a proper documentation procedures embodied in project management (such as TenStep) will somehow address the problem of weak documentation, blurred lines of accountability, and little emphasis on the larger business scope that is inherent in any spiral methodologies. Table II

Spiral Development Activities	TenStep Project Management									
	1	2	3	4	5	6	7	8	9	10
Define	✓	✓								
Design			✓	✓	✓	✓	✓	✓	✓	
Code			✓			✓		✓	✓	
Test				✓	✓	✓	✓	✓	✓	✓
Implement			✓		✓	✓	✓	✓		✓
Maintain			✓			✓	✓	✓		

TABLE III

SPIRAL DEVELOPMENT FUSED WITH PROJECT MANAGEMENT

summarizes the fusion of both methodologies used in this study.

C. Testing Methodology

System users for the four schools were identified as the participants for the system evaluation which is comprised of the following testing activities:

1) *Unit Testing*: To identify and eliminate execution errors that could cause the program to terminate unwontedly, unit testing was done by the developer and the user for every program that was finished. Test data used were the actual student data coming from the old enrolment system.

2) *Integration Testing*: Link testing is done when a particular module is coupled with another module. Since all modules in the NDP-SIS were integrally connected, it follows that the result of the previous process should be available and correct when the student processes are followed. Scenarios with actual student data are matched against the output made using the old enrolment system.

3) *System Testing*: This test includes that all typical processing situations by the system are checked against the intended output for different users. Actual test data are fed into the system where the actual processing is simulated. Processing and outputs are verified by the users to ensure that the system is functioning correctly.

4) *User Acceptance Testing*: Results of the different testing made during the development of the system are culminated in the UAT by affixing their signatures on the form.

Consequently, the project closure document are prepared and accomplished.

D. Instruments

The metrics designed and used in evaluating the project in relation to the following test factors/criteria: correctness, ease of use, maintainability, coupling, performance, ease of operation, reliability, authorization, file integrity, audit trail, continuity of processing, access control, and methodology. As such, the major stake holders are asked to evaluate the systems and compare them using a 4-way Likert scale to denote the degree of agreement (e.g., 4 = strongly agree, 3 = agree, 2 = disagree, 1=strongly disagree) on the thirteen test factor presented.

V. RESULTS

Based on the summary of the results for the old enrolment system, there are a 38% of test factors where the respondents does not agree on the statement presented, chief among these factors are coupling, reliability, authorization, audit trail, and access control which are the problem areas of the old enrolment system.

On the other hand, the respondents have unanimously evaluated the NDP-SIS on all test factors in the affirmative. Table III and Fig. 6 summarizes the comparison of both systems for all test factors.

TABLE III
EVALUATION SUMMARY

TEST FACTORS	Old enrolment	Observation	NDP-SIS	Observation
Correctness	2.7	Agree	3.5	Strongly Agree
Ease Of Use	2.5	Agree	4.0	Strongly Agree
Maintainability	3.0	Agree	4.0	Strongly Agree
Coupling	2.3	Disagree	3.5	Strongly Agree
Performance	2.5	Agree	3.8	Strongly Agree
Ease Of Operation	2.5	Agree	3.6	Strongly Agree
Reliability	2.0	Disagree	3.3	Agree
Authorization	2.0	Disagree	4.0	Strongly Agree
File Integrity	2.5	Agree	3.8	Strongly Agree
Audit Trail	2.0	Disagree	4.0	Strongly Agree
Continuity Of Processing	3.0	Agree	3.5	Strongly Agree
Access Control	2.0	Disagree	3.0	Agree
Methodology	2.5	Agree	3.5	Strongly Agree

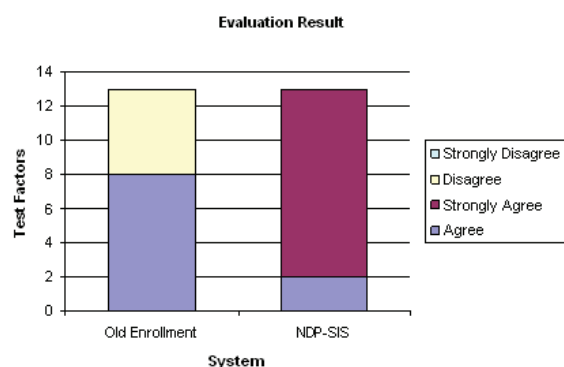


Fig. 6 Evaluation Results

By finding the average of the numeric evaluation of both systems, we can find the overall result of the evaluation by using the preset value scale summarized in Table IV. With the

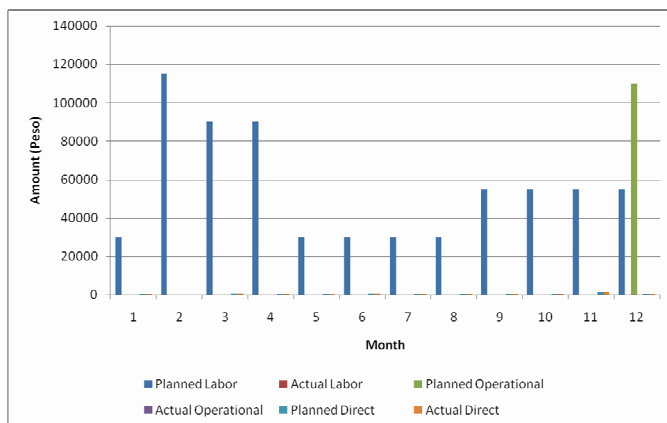
old enrolment system having an average of 2.42 as compared to the NDP-SIS' average of 3.64, we can safely surmise that the respondents strongly agree that the development of the

TABLE IVV
OVERALL EVALUATION RESULTS

Test Factor	Old System	NDP-SIS
Correctness	2.67	3.50
Ease Of Use	2.50	4.00
Maintainability	3.00	4.00
Coupling	2.25	3.50
Performance	2.50	3.75
Ease Of Operation	2.50	3.63
Reliability	2.00	3.25
Authorization	2.00	4.00
File Integrity	2.50	3.75
Audit Trail	2.00	4.00
Continuity Of Processing	3.00	3.50
Access Control	2.00	3.00
Methodology	2.50	3.50
Mean Score	2.42 (Disagree)	3.64 (Strongly Agree)

NDP-SIS has resolved the problems prevalent in the old enrolment system and that the specific goal of this study has been achieved. The projected and the actual costing for the system development is summarized in Table V which shows how the miniscule budgetary requirements when open source applications are utilized and used.

TABLE V
PROJECT DEVELOPMENT COST COMPARISON



VI. CONCLUSIONS

The development of the NDP-SIS has exposed some of the discrepancy in the design of the old enrolment system the registrar's office is using. In addition, flaws in the business rules the college is using when pertaining to the students of the non-degree program are remedied. With the system online and in place, inconsistencies that previously hound the registrar's office are now curtailed and minimized.

This study proves that even limited personnel and token budget, an institution can still provide quality information system solutions with the use of open source technologies. By bridging the information divide that was caused by the different application silos, any institution can reuse the data produced without going to the costly development and vendor-lock in to proprietary systems.

VII. RECOMMENDATIONS

Although the result of the evaluation for the development of the NDP-SIS was conclusive to be successful, there is no concrete and deep statistical evidence to back up the result of the study with respect to its performance with its degree program counterpart since no evaluation has been conducted to measure the latter's performance.

Complete guidelines and procedures must be put in place in any development project that is to be created in the college in the future. Business procedures must be documented in order to have a clear view on how process should be accomplished. Concurrently, an enterprise solution for the information need of the entire college must be designed to remove pockets of information system that tends to become a source of predicament in later time.

In order not to be locked in to a particular proprietary system, the college should consider using open source technologies in its system development as this will significantly lower down development and licensing costs without any loss in quality, functionalities, security, and usability.

Lastly, it would also help if the colleges make use or follow an industry standard on how system development are made and maintained. The use of project management software should be considered in order for the project documents to be readily available and to streamline software development and project management.

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USR – A Program Structure Approach

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ABSTRACT

It is inevitable that global standardization of many things is already happening. This is also the case with engineering education through mechanisms such as The Washington Accord and in a smaller scale the Bologna Accord and the Sydney Accord. University Social Responsibility in this case carries a rather special connotation beyond the normal social responsibility (SR) definition. This paper discusses this SR, by tracing the standardization of engineering programs structure across the world. In particular the introduction of non-engineering courses initially to meet the requirements of industry in ensuring the value of engineers to industry and later on to cater for engineers' responsibility to the society. Courses such as Management and Economics normally offered by faculties like Business Management or Economics were popular with engineering students. Now, perhaps still in conjunction with those faculties, many engineering schools offer mandatory courses like Engineers and Society and Law for Engineers. The paper explores further the impacts of such programs on SR.

INTRODUCTION

Observations show that technology generally and computer technology in particular had changed societies around the world (Cheng, 2001, Henshaw, 2008, Idrus, 2004). Moore's Law had helped in making the new technology affordable in societies which were traditionally not thought capable. In addition, low cost airlines had made people mobility a reality. Partly as a result of these, distinctions between societies are slowly fading. To be sure it will take several generations before such distinctions disappear and a global society appears.

The changeover however, needs to be well facilitated in order to minimize if not eliminate the *growing pains* of the developing global society. If not facilitated such transition may involve violence of sorts which may indeed lead to global tragedies. In fact many of us may have personal direct or vicarious experiences of such problems.

The engineering profession recognized these changes and the potential challenges that may come with the changes (Idrus, 2011). Given the nature of technology and engineering-based development in currently under-developed or developing countries, global standardization in many areas of the engineering profession is inevitable.

Impacts of engineering works, creation and failures on society are clearly observable by all. While engineers have changed societies for the good, they also have created things that some societies considered to be evil, such as the atomic bomb and pollution leading to global warming and the melting

of the arctic and antarctic. On the other hand, nuclear power which has significant advantages for societies is also considered dangerous by others. Recent disasters in Japan for example clearly exemplify such dichotomy. Other events involving nuclear power point to the fact that some global understanding of engineering abilities and their social responsibility had to be accounted for by all nations.

Education inevitably plays a very important role in attempting to reach world peace. Engineering education in particular is centre stage in this.

This paper describes social responsibility of university through the structure of the engineering program. It is proposed here that both analysis and planning of the program structure will help address the social responsibility requirements of engineering programs and thus the university's.

PROGRAM STRUCTURE

The Vision and Missions of the planned program determine the scope of the program. That is what courses are to be taught. While thoughts on the *how* the contents are going to be taught are an imperative, at the program structure it is equally important to have a *helicopter view* of the program. The program structure should reflect the Vision and Missions of the program. It is of course important that those involved in developing the curriculum know and understand not only what the vision and missions are of the program but are knowledgeable in engineering curricula and are well informed about what the future promises.

One manifestation of program structure can be a block diagram as shown in Figure 1. This manifestation allows comparisons between programs

and shows the building blocks of the program in broad outlines.

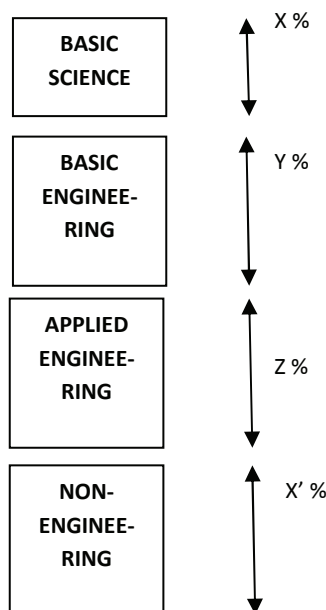


Figure 1 – A program structure showing the coverage and the amounts in percentage

This representation also indicates how much of each of the elements make up the whole program. The percentages allow curriculum developer to discuss how much of a particular element should be included in the program and for what reasons. This stage of curriculum development is very similar to an architect designing a building. It is only after this stage that the engineers (structural, civil and mechanical) would do their parts to realize not only the building but also its functionality.

It seems an acceptable assumption that if this stage of the curriculum development is well determined and agreed to by the expert group as well as by stakeholders and those who will be involved in the further steps of curriculum development, the resulting engineering program will be relevant to industry and meet its social responsibility. This representation of a program is not limited only to engineering of course.

IMPLICATIONS OF PROGRAM STRUCTURES (PS)

To be able to see the forest from the woods, as the English proverb says, provides curriculum developers

with a potent tool to get the *big picture* right first before delving into details. As can be seen from Fig 1, the PS also provides boundaries of the program scope.

It is also at this stage that curriculum developers could map the proposed contents of the program to the vision and mission of the university. Any corrections and amendments made at this stage would prove more cost-effective than if the details of the Program had been finalized.

As shown in Fig 2, the use of PS will also facilitate the proportioning of the different sections of the program and through it will help plan the details better. In the process this is particularly assisted by expressing the intentions in a measurable way (Anderson et al, 2001, Bloom et al, 1956).

By doing so it does not mean *over-standardizing* any particular sections of the program nor does it reduce the probability of creative inputs. Indeed creativity will also be enhanced, for everyone could see both the limitations of each section and the potential to introduce new subject matter without succumbing to

traditional courses. If a *new* course is to be introduced, the course developer is then more aware about the big picture and the directions s/he is to take in order to meet the big picture requirements.

Importantly of course is the fact that if the PS is used for reviewing existing courses and programs it is able to show the impacts of changes in one section of the program on other sections of the program directly. Again this capability will ensure the meeting of vision and missions of the respective faculties and the university as a whole. It will also avoid getting bogged down with details that may derail the direction of the program.

Last but certainly not least is the fact that program structuring forces curriculum developers to identify at the outset the four or five critical areas of a program. This would provide a focus that would be absent if we were to delve into the details straight away. In this paper engineering is used as an example and ABET's standardized areas provide the foci (ABET, 2011).

It is possible also that the engineering *model* may be used to generate the foci in another profession where basic knowledge, advanced knowledge and practical applications are required to be fulfilled.

PS also sits well with the measurements of outcomes for outcomes at different levels could be facilitated. For example, outcomes at the program level and outcomes at the course level could be mapped out to see how much of the course outcomes indeed contribute to the program outcomes. The ability to do this eliminates uncertainty.

THE ENGINEERING PROGRAM

It seems logical in designing anything, such as illustrated in the previous section, that the outcomes of or the expectations from the design are known at the outset. Outcome-based Education or OBE is now fundamental in curriculum design (MMU, 2011)). In engineering the outcomes expected of course are professionally qualified, critical thinking and creative engineers who will not only resolve society's problems but importantly continually improve the quality of life throughout the world.

Given that then, an engineering program must consolidate the scientific knowledge, introduce the fundamental laws that affect engineering works and provide ways and means to apply these laws to produce new things that can be sold, make profits and are beneficial to societies.

What is left to do in this case is to determine how much of each element do we need to make a good engineering program. This is where the percentages as shown in Figure 1 play a role. Obviously justifications are needed for each of the program blocks.

To discuss and debate a program at this stage is not only logical but useful and effective in generating the best program possible.

EVOLUTION OF ENGINEERING PROGRAM STRUCTURE TO ADDRESS SOCIETAL NEEDS AND RESPONSIBILITY

The need to include *new* subjects in engineering program arose from various reasons. Although no history was written about the evolution of such needs, personal involvement in engineering shows that self-discovered shortfalls in graduate engineers' capability in practice and industry's feedback on deficiencies of engineering graduates in practice formed an impetus for the changes. It is through stakeholders' feedback and observations of the effects of engineering products and services around the world that engineering social responsibility consideration becomes inevitable. At its roots, this of course goes back to engineering education and the contents of engineering programs. These will then involve non-engineering subjects such as communication skills, people management skills, environmental protection, sustainable development, ethics and so on.

Similar arguments may be advanced in programs other than engineering with similar end results.

THE WASHINGTON ACCORD

In engineering the Washington Accord (1989) is the mechanism by which global aspects in engineering and the global standardization of engineering education programs are made possible. It provides for engineers graduating in one signatory country to work in another without the need to fulfill any special academic and professional practice requirements.

In order to do so, the engineering education programs in those signatory countries will need to be very similar if not the same as that espoused by the Washington Accord. This is done through each country's professional engineering agencies accrediting the engineering programs there using the Washington Accord's requirements. At least in the first instance, this will be well facilitated by comparing program structures although the roles of

program structures continue to be pivotal throughout the process of curriculum development.

The program structure used by the Washington Accord is that of the Accreditation Board for Engineering and Technology (ABET)'s of the USA and is shown in Figure 2.

Therefore the composition of an engineering program according to ABET and approved by The Washington Accord is 25% Maths and Basic Science, 37.5% Engineering Science, 25% Engineering Practice and 12.5% Complimentary General Education. It is the last 12.5% component of the

engineering program structure that would determine its and hence the university's social responsibility. Personal experiences of the author's having been involved in engineering education in five different countries as an academic, an international higher education quality assurance consultant for The World Bank and the Asian Development Bank, an engineering accreditation auditor and a higher education quality auditor, show that within this section of the engineering programs an evolution from *meeting industry requirements* to *meeting sustainability development* on the one hand, and from being *elective* to being *core courses* on the other is clearly observed.

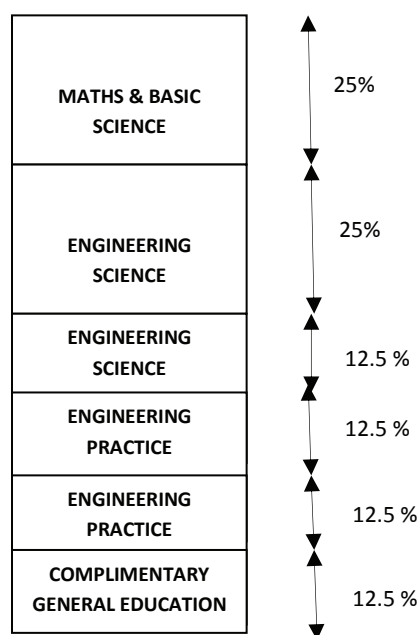


Figure 2 – The program structure of ABET

For example, the following are courses being currently offered under this category in some

universities. The information is available in public domain from their universities' websites

TABLE 1 – A SELECTION OF ENGINEERING CORE COURSES IN SOME UNIVERSITIES TO MEET THE WASHINGTON ACCORD REQUIREMENTS

No.	Multimedia University, Malaysia	Monash University, Australia	Universiti Malaya, Malaysia	University of Canterbury, New Zealand	National University, Singapore
1	Engineers & Society	Engineering Profession	Information skills	15/120 points Special Topic	General Education Modules

No.	Multimedia University, Malaysia	Monash University, Australia	Universiti Malaya, Malaysia	University of Canterbury, New Zealand	National University, Singapore
2	Law for Engineers	Professional Practice <i>which includes roles of engineer in society, contract law, ethics, innovation and OHS</i>	Law and Engineer		Elective Education Modules
3	Basic Law	<i>A range of courses from Business Law to Asian Management</i>	Thinking skills and Communication		
4	Islamic studies/Moral & Ethics		Islamic and Asian civilizations		
5			Economy, Financial and Engineer		
6			Moral and ethics in the Engineering profession		
7			Ethnic relations		

While the above shows a plethora of courses with different names, careful observation points to the fact that they are all reflecting if not directly espousing social responsibility of the engineering graduates and hence that of the university itself. For example, the course Engineers and Society at MMU makes engineering students aware of the impacts of engineering works, services and products on sustainable development, while the course Law for Engineers makes them aware of the potential breaches of various laws of the land by engineering works, services and products. Through such awareness better engineering graduates and hence better and more informed engineering works, services and products would materialize.

This also clearly shows that program structure helps to manifest the vision and missions of the university in the courses of engineering programmes. By the same token it facilitates any changes to accommodate such thing as university social responsibility.

CONCLUSION

- Social responsibility of universities is an imperative for a sustainable world
- Program structures bring out the *helicopter view* of the vision and mission of both the university's and the program's

- Current engineering curricula around the world are governed by the Washington Accord which recommends 12.5% of non-engineering courses in an engineering program. This allows universities to plan for and practice their social responsibilities through their courses and programs.
- As no work is yet being done to explore the effectiveness of this, indications are that at least engineering graduates should now be more aware of their social responsibilities and through that the universities' own responsibilities are discharged.
- Future works/research:
 - Correlation between inclusion of non-engineering courses in engineering program and the graduates' level of social responsibility which is a longitudinal research
 - How to anticipate future social responsibilities of engineers and thus engineering programs
 - Convincing engineering schools to be leading the flexibility required

in order to ensure responsible engineering teaching and development

- Program structure facilitates determining impacts of changing programs in order to meet social responsibility requirements

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A Comparison of the Achievement of First Year Students in English II (222102) Class via Student Teams-Achievement Division (STAD) Method and Lecture Method

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Abstract— A large class with mixed-ability students causes major problems in language learning and teaching in higher education. Teachers sometimes use a traditional approach for teaching reading skills of English. Hence, this paper aims to investigate two types of language teaching: Student Teams-Achievement Division (STAD) and Lecture Method (LM) for teaching reading skills of English within Thai contexts. The subjects in this study were 154 Thai undergraduate students studying an English fundamental course at Burapha University in the 2010 academic year. For the STAD group (N = 82), the teacher was a facilitator and observer to encourage teams of students to complete reading activities. Students in each team had to work together in the reading tasks in order to win other teams. In the LM group (N = 72), the teacher was the most dominant person in the classroom. In both groups, data were collected and analysed through comparing pre-post test means, categorizing students' attitudes towards language learning and teaching, and teacher's diaries. The results show that the English reading scores of the LM group were slightly higher than those from the STAD group. However, the results obtained from the teacher and students report positive attitudes towards STAD in terms of class participation and collaborative learning. In contrast, even the LM group satisfied with this traditional method, they suggested that class participation and interaction should be improved.

Keywords— Student Teams-Achievement Division (STAD); Lecture (LM); Reading Skills; EFL

I. INTRODUCTION

In Thailand, language teachers, especially at a tertiary level, have encountered difficulties of teaching large classes with mixed-ability students and classroom management. These are problematic for not only the teachers but also the students. To deal with this situation, language teachers use a 'lecture method (LM)', focusing on teaching students to memorize grammatical structure and meanings of vocabulary rather than language use. LM seems to be effective in teaching a large number of students in order to make them understand the lesson in the limited time [1]. University students seem to become passive learners and have little opportunity to practice English skills in the classroom.

Similar to other universities in Thailand, these difficulties have been considered how language teachers and educators at Burapha University should handle these problems in English language teaching and learning. Therefore, the Student Teams-Achievement Division (STAD) method, which is suitable for a heterogeneous-ability class [2], [3], [4], was introduced in the present study. The STAD method can build a strong relationship among students [4] and can help students to learn together as a teammate [5]. In addition, the STAD method is easy to use and applicable to any age level or any curriculum that students are grouped to work together [6].

II. LM VERSUS STAD

The differences in using both teaching approaches can be summarized in the following:

A. Time Consuming

For a large LM class, a teacher may spend less time preparing the lesson [5]. On contrary, classroom activities in STAD class are normally time-consuming.

B. Mixed-Ability Students

Both LM and STAD can be well applicable for mixed-ability students. LM is flexible and can be applied to virtually all content areas. [5]. STAD allows mixed-ability groups of students working together and being responsible for each other learning [7].

C. Roles in Classroom

LM promotes passive learning and encourages students to listen and absorb information [5] while STAD persuades students to engage in the classroom activities and become active learners [4]. It can be said that in LM class, a teacher would be dominant in the classroom while student-centeredness is a concept for a STAD class.

D. Classroom Activities

On one hand, assigning students to doing exercises and translation are some of the activities in LM class checking students' understanding [8]. In STAD class, on the other hand,

to check student's comprehension, discussing and sharing among members in sub-groups are promoted [7].

STAD method seems to be an alternative solution in teaching a large class with mixed-ability students; yet, there is a little information available on using STAD method with EFL university context as summarized in Table 1.

TABLE I
RESEARCH ON EFL CONTEXT USING STAD METHOD

Author	Class size	Class level	Course
Charoensuk (2006) [9]	28	Grade 9	Writing
Jalilifar (2010) [10]	30	College	General English (reading)
Ghaith (2001) [2]	61	Grade 7	English as EFL
Moyadee (2001) [11]	39	Grade 5	General English
Mulmanee (2009) [12]	16	Grade 7	Writing
Norman (2005) [3]	35-38	Grade 6	General English

III. RESEARCH QUESTIONS

This study, therefore, investigates the effectiveness of STAD and LM for teaching reading skills for Thai university students. So three research questions were addressed in the following:

1. Does using STAD yield different results from using LM in teaching reading skills for Thai university students?
2. What are the students' attitudes towards STAD and LM for teaching reading skills at Thai university level?
3. What are the teacher's attitudes towards STAD and LM for teaching reading skills at Thai university level?

IV. METHODOLOGY

A. Subjects

This study was implemented for seven weeks starting from December 2010 to February 2011 with undergraduate students studying English II (222102). It was a foundation English course at Burapha University. The subjects were considered to have low-level proficiency in English, according to their English Ordinary National Educational Test (O-NET) scores, which ranged from 0 up to 45 [13]. The subjects consisted of two classes of 154 Thai students. The subjects were divided into two groups, experimental group (STAD) and control group (LM) as shown in Table 2.

TABLE II
NUMBER OF STUDENTS IN TWO SUB-GROUPS

	Female	Male	Total
STAD	60	22	82
LM	63	9	72

LM was employed in the control group and students in the experimental group studied reading via STAD method. In the experimental group, students were divided into 10 sub-groups comprising mixed-readability students under the STAD criteria as stated in the next section.

B. Employing STAD Method in the Classroom

The classroom was prepared using the outline of five phases based on Slavin's guideline [7] as follows:

1) *Class Presentations*: The main textbook is English for Life [14]. Five teaching plans for each teaching methods were prepared in according to the course syllabus. Three lessons were taught in a three-hour English II class which was scheduled once a week.

2) *Team Study*: In week 10 of the second semester, the pre-test was administered at both experimental and control groups to categorize students' readability levels of English: high, mid, and low. Students in STAD class were grouped into ten sub-groups under the 1:2:1 ratio of their English performance, high: mid: low. There were eight to nine students in one sub-group.

3) *Quizzes*: At the end of the class the twenty-item quiz was distributed to students to review what they had just learned each day.

4) *Individual Improvement Scores*: The researcher had an agreement with students that there would be the competition among the ten sub-groups.

5) *Team Recognition*: The reward would be prepared for the student in two steps, namely, *Champ of the Week*, the rewards for the winning team from reading activities each week and the scores then were accumulated until the last week of the experiment and the highest-score team would be announced as the *Champ of the Champ* [5], [7].

C. Data Collection

The whole process of data collection and timeline in this study can be explained in Figure 1.

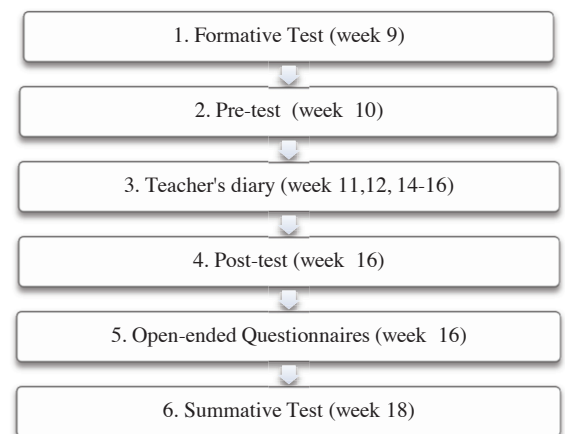


Fig. 1 Six Steps of Data Collection

D. Instruments

There were four instruments utilized in this study as follows:

1) *Pre-test and Post-test*: The tests used in this study were the free Penguin Readers' Placement Tests [15]. The pre-intermediate level was selected in relevant to students' readability [13]. This 30 multiple-choice-item test was administered twice. On Week 10, the pre-test was used to categorize readability level of English and to group the students into ten sub-groups. The post-test was used after class on Week 16. The mean scores from pre-test and post-test were compared to evaluate the reading achievement of the students.

2) *Formative Test and Summative Test*: These tests were administered to the students in both groups at Week 9 and Week 18, respectively (See Fig. 1). The tests contained 20 multiple-choice items and could be divided into two sections; seen passages and unseen passages. The mean scores of the formative test and summative test were utilized to compare the achievement of students as well.

3) *Open-ended Questionnaires*: Two sets of open-ended questionnaires were distributed to the subjects at the end of the last class or Week 18. These questionnaires consisted of four items. Students' responses obtained from questionnaires were analysed to examine students' attitudes towards the two teaching methods of English reading skills. In questionnaires, *Question 1* (What do you think about teaching reading with method you learned?) was designed to ask students' attitudes towards the teaching method they learned for reading. *Question 2* (Do you like reading activities with the method you learned? Why or Why not?) was for students to express their reason why they liked or disliked the reading activities during the experimental period. *Question 3* (What are the advantages and disadvantages of teaching reading with the method you learned?) was for students to explain advantages and disadvantages of the teaching methods when they were taught reading. *Question 4* (What are your suggestions about teaching reading with the method you learned?) was for students to suggest about teaching reading through these methods. The questions were presented in the following:

The responses from students were categorized into positive and negative answers and presented in percentage to show students' attitude in term of quantity.

4) *Teacher's Diaries*: Teacher's diaries were written at the end of the teaching day. Jeffrey [16] said that the use of teacher's diary can help improve professional development. In addition, it can help teacher build self-awareness, responsibility and a confidence in one's own teaching ability as well. The teacher's diary was analyzed and grouped to reflect teacher's and students' experience, problems found in the classroom and the use of classroom activities.

V. RESULTS

A. Does using STAD yield different results from using LM in teaching reading skills for Thai university students?

The scores from pre-test and post-test before and after treatment including the scores from Formative Test and Summative Test were also calculated to evaluate the reading achievement of students. After the data analysis, the results

from the scores on pre-test and post-test can be reported as shown in Table 3.

TABLE III
RESULTS OF PAIRED SAMPLE T-TEST FOR THE GROUPS' PERFORMANCE ON PRE-TEST AND POST- TEST

Group	Test	N	\bar{X}	SD	t-value	df	Sig. (2-tailed)
STAD	Pre-test	82	14.06	6.04	-.292	81	.771
	Post-test	82	14.25	4.08			
LM	Pre-test	72	16.15	3.27	-0.69	71	.945
	Post-test	72	16.18	3.38			

The results of the study revealed that there were no statistically significant differences between the mean scores (14.26) on pre-test (SD = 6.04) and the mean scores on post-test (14.25) in the STAD group at the .05 level of significance, (SD = 4.08), $t(81) = -2.92$, $p > .05$. For LM, there were no statistically significant differences between the mean scores on pre-test (16.15, SD = 3.27) and the mean scores on post-test (16.18) at the .05 level of significance (SD 3.38), $t(71) = -.069$, $p > .945$.

Moreover, the reading scores on formative test and on summative test were also calculated by using paired sample t-test, as shown in Table 4.

TABLE IV
RESULTS OF PAIRED SAMPLE T-TEST FOR THE GROUPS' PERFORMANCE ON FORMATIVE TEST AND ON SUMMATIVE TEST

Group	Test	N	\bar{X}	SD	t-value	df	Sig. (2-tailed)
STAD	Formative	82	9.63	3.47	1.144	81	.256
	Summative	82	9.23	3.89			
LM	Formative	72	11.22	2.62	-2.835	71	.006**
	Summative	72	12.12	2.62			

* $p < .05$

The results of the study in Table 4 presented that there were no statistically significant differences between the mean scores from the formative test (9.63, SD = 3.47) and the mean scores from the summative test (9.23) in the STAD group at the .05 level of significance, (SD = 3.89), $t(81) = 1.144$, $p > .05$. In addition, for LM, there were statistically significant differences between the mean scores from the formative test (11.22, SD = 2.62) and the mean scores from the summative test (12.12) at the .05 level of significance (SD 2.62), $t(71) = -2.835$, $p > .006$.

The results indicated that the students' performance in STAD class was not significantly different before and after treatment. In fact, mean scores in summative test were lower than in formative test. On the other hand, students in LM class performed slightly better than STAD class. Mean scores from summative test were nearly one point higher than mean scores in formative test.

B. What are the students' attitudes towards STAD and LM for teaching reading skills at Thai university level?

The researcher categorized the students' responses from the open-ended questionnaires into positive and negative answers in order to examine the students' attitudes towards STAD and LM for teaching reading skills at Thai university level. The percentage of frequency of students' answer was summarized in Figure 2 for STAD group and Figure 3 for LM group below.

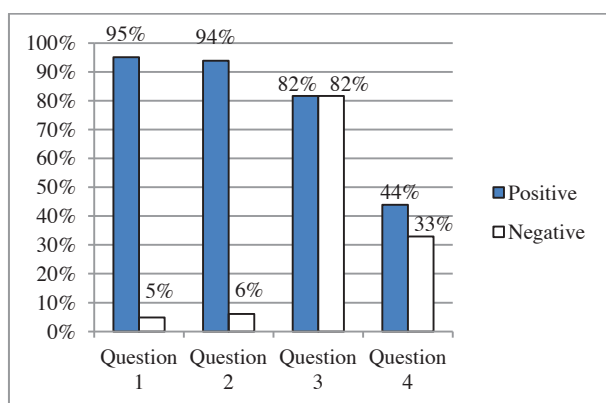


Fig. 2 Analysis of Students' Attitudes towards STAD

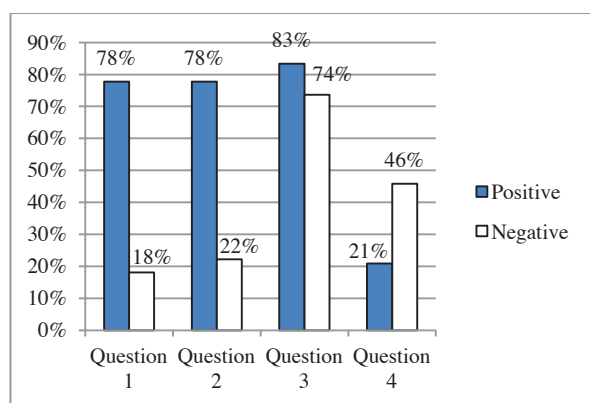


Fig. 3 Analysis of Students' Attitudes towards LM

These two figures illustrated the students' attitudes towards the two teaching methods. In Figure 2, it should be noted that STAD method was successful in terms of positive thinking with only few negative feelings towards this new teaching method comparing with the ones in LM group. LM, however, was still popular among students as shown in Figure

3. In fact, the students' responses in control group still reflected the students' positive attitudes towards this traditional method as well.

From the students' questionnaire, it revealed that students in both groups enjoyed their class. According to the responses from students in STAD group, it clearly supported that STAD had positive effects on students in many ways, that is, classroom participation and their partnership. The student-student interaction developed positively and increasingly. In the meantime, it should be noted that the students in LM group that the students still enjoyed learning with this traditional method. The explanation of this phenomenon may be the familiarity of the student to the traditional teaching method - LM. They said they were still happy to learn by memorizing words and grammar rules. However, the considerable number of students suggested that the participation and student-teacher interaction and student-student interaction should be improved.

C. What are the teacher's attitudes towards STAD and LM for teaching reading skills at Thai university level?

In the teacher's diaries, there were four main categories: teacher's experiences, students' experiences, problems and activities. The attitudes of teacher towards the teaching methods written in the teacher's diary were reported in Table 5:

TABLE V
TEACHER'S ATTITUDES TOWARDS STAD AND LM

	STAD Class	LM Class
1. Teacher's experiences	<ul style="list-style-type: none"> - Teacher worried about the time management. - Teacher worried about students' roles and their group distribution. - Teacher was not confident in some activities. 	<ul style="list-style-type: none"> - Teacher worried about students' roles and their contribution for their class.
2. Students' experiences	<ul style="list-style-type: none"> - Students' participation in class increased. - Interaction among students developed. - Students learned to aware of some common mistakes. 	<ul style="list-style-type: none"> - There was lack of classroom participation. - Students copied everything on the screen. - Students were familiar to being passive learners.
3. Problems	<ul style="list-style-type: none"> - The students were sometimes late. - Reading activities were time-consuming. - Students copied answers from other classes. 	<ul style="list-style-type: none"> - The students were sometimes late. - There were the difficulties to manage the class. - The class activities were interfered by loaded assignments from other subjects - Students were unwilling to share with the class.
4. Activities	<ul style="list-style-type: none"> - The variety of reading activities attracted students' attention. - The use of rewards can get students' attention. 	<ul style="list-style-type: none"> - The use of translation is necessary.

In STAD class, the teacher's anxiety clearly showed in the diary. It is common for activities in cooperative learning to consume time. In fact, with the limitation of time, classroom management may be the problem. STAD method can increase students' participation in the class and also improve student-student interaction as students had an opportunity to share ideas and discussed among team members before submitting the exercises. Students' copying answers from other classes was one of the problems in STAD class. The students wanted to finish the exercise faster than other groups to gain the extra points or rewards.

In addition, the teacher's diary for LM class indicated that students' learning style was passive learning. They were familiar to listening passively. Students' unwillingness to participate in the class was one of major problems. They were familiar to being good listeners but not to speaking. Class participation means taking risks in their classroom. Students were familiar with the use of translation. Even they understood the passages, they asked the teacher to translate those passages again.

VI. DISCUSSION AND CONCLUSIONS

Both STAD and LM could raise students' reading score; however, the performances on the scores of students from LM group were slightly higher than those from STAD group. One possible explanation is that LM - learning by memorizing vocabulary, grammar and translating the reading passages into L2 or Thai language - can help students whose target is to pass the exam. Yet, it can be called passive learning method. The responses of students from LM group indicated that they needed participation and interaction among their peers in contrast, reflected their attitudes towards this learning method. After analysing the students' responses from STAD group, the results revealed that these students enjoyed this active learning method. They perceived that learning is teamwork. The teacher facilitated in their learning activities and also the students together with the group helped each other to understand their lessons. Sharing knowledge and discussing learning exercises with the group helped improving the view of studying English from students' perspective. The reflection from the teacher's diaries could help teacher to have self-awareness that she could develop the new teaching method. The problems found in the diaries not only reminded the teacher to prepare the next class, but also raised confidence to use the new classroom activities.

In conclusion, STAD method can encourage the students' class involvement, raise students' motivation and attitudes towards learning English, and increase the class participation in terms of the interaction among students themselves and between students and teacher. One of the limitations in this study is time duration so further studies should observe the results over the semester and use multiple data sources: teacher, classroom observation, and students' attitudes towards learning tasks. Factors that might influence the study were: (1) the size of sub-group in the experimental group, (2) time-consuming activities, and (3) the objective of the students to learn English in this class. Teacher also reported

that arranging 8-9 students in a group may cause unexpected problems among the group members, such as the responsibility distribution. Teacher also needed to take time management into considerations for engaging students in learning activities. The analysis of teacher's diaries shows the anxiety of time management and lack of confidence in some tough activities. To be aware of the problems can help the teacher develop her teaching career by using cooperative teaching in a large class. However, the findings of the study suggest that using STAD within Thai contexts is most likely to be productive. The researcher, therefore, intends to further investigate using STAD with other language skills.

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What Fundamental Lawyering Skills do Law Students of Chiang Mai University Need to Improve Their Legal Practice Ability?

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Abstract— The number of law students in Thailand has seen a continual and sharp increase. Despite this significant increase in the number of law students, the quality and achievement of legal education is sometimes questionable. Law graduates who are well prepared to be competent novice lawyers are the best indicator of the quality of law curriculum and lawyering skills are essential to becoming a successful lawyer. However, questions exist regarding the proficiency of recently graduated lawyers in Thailand, which suggests that law graduates lack confidence and capability in fundamental lawyering skills. This paper aims to investigate what these fundamental lawyering skills are via research at the Faculty of Law, Chiang Mai University (CMU). The methodology comprises two sections. Section one interviews qualified legal experts from major law career paths to identify the fundamental lawyering skills for law students of Chiang Mai University. Section two investigates the type of lawyering skills law students of CMU require to improve and become satisfied and competent in their lawyering practice. The study found that there are eight fundamental lawyering skills for law students of CMU. In addition, results reveal that there are four significant lawyering skills which have a high rate of dissatisfaction, which are: negotiation, litigation procedures and alternative dispute resolutions, counselling clients and, lastly, factual investigation. The paper indicates that these particular four lawyering skills are not provided for all law students because fundamental skills were taught mostly via elective courses, rather than compulsory ones. Moreover, internship programs did not maximize the potential of law students in relation to learning lawyering skills. To conclude, there are significant reasons within this paper, which support changing the law curriculum to enhance teaching and learning of lawyering skills learning.

Keywords— legal education, knowledge management, tacit knowledge, fundamental lawyering skills, serious game

I. INTRODUCTION

Legal education in Thailand is a significant area of academic research [1]. Apart from the attraction of high earning potential, becoming a lawyer is considered an honourable career path, due to a Lawyer's duties in serving not only individual interests, but also protecting and preserving the best interests of the public. Several articles have defined a lawyer's role as "*lawyering for social change*",

which is a form of advocacy that consciously strives to alter structural and societal impediments to equity and decency [2]. A lawyer's role involves deliberate efforts to use law to change society or alter allocations of power [3]. In addition, graduates with a law degree are accepted by governmental agencies or private organizations on the basis that the individual will have the skills necessary to work effectively in other fields (e.g. governmental officers, human resource staff in private sectors). However, questions exist regarding the proficiency of recently graduated lawyers in Thailand, which suggest that law graduates lack confidence of capability in fundamental lawyering skills. This paper aims to investigate what these fundamental lawyering skills are, via research at the law faculty of Chiang Mai University (CMU), one of the top five law schools in Thailand.

II. BACKGROUND AND LITERATURE

Legal education has become popular for the new generation of students in Thailand. Since 2004, when the Rajabhat University Act was passed, any former "*Rajabhat*" college can transform itself to become a university. Consequently, Rajabhat Universities have established a law curriculum to serve local people throughout Thailand. Currently, there are at least 77 academic institutes, 15 Governmental Universities, 25 Private Universities, 21 Rajabhat Universities and 16 College Institutes or others providing undergraduate law curriculum throughout Thailand [4]. Moreover, in 2000 and 2001, the rules for Judiciary of the Law Court Act [5] and the Salary and Position Allowance for Public Prosecutors [6] were amended. This ensured the principal of freedom for judges and prosecutors, as well as the basic salary and other benefits for judges and prosecutors, which have steadily increased to an attractive standard, and are generally higher than other legal career paths.

While an accurate total of the number of law students in Thailand cannot be ascertained, it is notable that during Thailand's 2011 university admission process, there were more than 2000 high school graduates who applied for seats at the law faculty of CMU, while the capacity is 220 seats. The Thai Bar Associate plans for approximately 20,000 graduate law students per semester each year. The number of law students in Thailand has seen a continual and sharp increase.

However, the significant number of law students in Thailand does not reflect the achievement of legal education; in contrast, law graduates who are well prepared to be competent novice lawyers are the best indicator of the quality of law curriculum. However the competency of these newly graduated lawyers is questionable in specific areas of practical lawyering skill. These skills are important in legal education because the privilege and pleasure of practicing law comes with important responsibilities to serve the public from unfair treatment by other parties ethically, diligently and competently [7]. Currently, law graduates in Thailand are graduating without the necessary skills, which are considered fundamental to a career in law. Prior to designing a solution to this problem, there is a need to identify and understand what these fundamental lawyering skills are. This research aims to address this need by identifying and understanding these lawyering skills through a case study at the Faculty of Law, CMU.

Law practitioners are engaged in constant day-to-day problem solving in legal areas and specific problems and events are therefore a reality. They also work within the constraints and resource limitations of real world law practice [8]. To become an effective lawyer, a person needs to develop not only the appropriate knowledge and attitude, but also master specific abilities, which include appropriate lawyering skills [9]. Mastering lawyering skills is intrinsically difficult, as demonstrated by the definition of skill which refers to an ability and capacity acquired through deliberate, systematic, and sustained effort to smoothly and adaptively carryout complex activities or job functions involving ideas (cognitive skills), things (technical skills), and/or people (interpersonal skills) [10]. Therefore effective preparation in lawyering skills should be systematically implemented for law students at an early stage in law school.

Law school has often been criticized by the perennial argument of theoretical *versus* practical training in the university law school [11]. However, In 1952, Arch Cantrall, a practitioner and member of the West Virginia Bar stated in the American Bar Association Journal that, “*Society’s contract with the law schools is to train lawyers, not to produce half-lawyers, taught some of the theories of the law but not how to put those theories into practice*” [12]. Additionally, a survey of 5,000 law school graduates echoed the same sentiment; that law school teaching is too theoretical and unconcerned with real-life practice [13]. In addition, in 2006, Irish described that the drive to reform legal education has origins in certain dissatisfaction with the theoretical nature of legal education that has failed to properly prepare graduates for productive entry into the legal profession [14]. Without a proper learning process, mastering lawyering skills is time-consuming with frequently inconsistent outcomes.

Fluency in lawyering skills is of the utmost importance to lawyers as the legal profession is currently being influenced by societal changes [15]. For instance, in the marketplace where legal customers expect high quality services in complicated legal cases, both fundamental and new lawyering skills must be appropriately applied to serve these new

challenges. Well-educated clients are more concerned with their legal rights, forcing lawyers to rethink the scope of diligent representation and professional decision-making. Last but not least, as the general practice model becomes less viable in today’s contemporary society, lawyers will need to practice in specialized fields of law, and competent practice will require new skills for all but basic commodity services [15]. Lawyers must not simply sit back and wait for the future to happen.

Inevitably, law schools or faculties of law must take responsibility to provide the fundamental skills needed for the purpose of turning law students into competent novice lawyers for effective practice within the contemporary professional environment they will enter. In order to enhance skills, law students should receive meaningful legal education, and lawyering skills training is currently an often-discussed area of legal education reform and development. Law schools from leading universities around the world have been changing their legal content and doctrine oriented curriculum to a curriculum based on lawyering skills. This has been exemplified in Japan, where dissatisfaction with the abstract nature of legal education resulted in major efforts to introduce American-style skills-based courses into graduate levels of legal education. In the same study, Taiwan and South Korea were shown to have concerns about an excessive emphasis on theory and not enough attention to practical skills training [14].

Approaches to lawyering skills have been introduced and shared at official conferences or symposiums [16]. For example, in 1992 the American Bar Association presented a report suggesting that lawyering skills can be learnt in the classroom and from legal clinics through case based learning [17]. Some universities are using such courses to teach substantive law and professional skills via special techniques, for example, a course in contract law can also be a vehicle for project based learning or legal writing exercises [14]. It has been strongly suggested that lawyering skills can be learnt by internship activities or through working experiences outside law school [18]. Some introduced simulations to enhance student learning of substantive law, professional skills and personal development [9]. Law schools in some instances implemented a comprehensive lawyering curriculum to enhance law students’ ability [19], or have utilized the *CaseArc* integrated lawyering skills program [20]. These approaches or techniques have been implemented into the law curriculum of leading law schools from many countries. The effectiveness of these approaches is still being discussed.

In general, apart from legal clinic activities, the law curriculum of CMU is legal-content oriented and does not promote clear ideas of the fundamental lawyering skills required by law students. There are a relatively small number of lawyering skills courses, mostly elective courses with limited seats per class, and which lack qualified and appropriate teachers. There are also limitations in terms of the internship program towards lawyering skills training. Unlike the American Bar Association, which stated ten fundamental lawyering skills required by a new lawyer [21], legal

education in Thailand has never clearly established a foundation of lawyering skills for law students. Similarly, the law faculty of CMU has seldom focused or officially discussed which basic lawyering skills should be embedded into its law curriculum. As a result, students are lacking opportunities and direction when learning lawyering skills. Without a carefully planned learning process, mastering lawyering skills is time-consuming, with frequently inconsistent outcomes. As a result, law students graduate without the fundamental lawyering skills required in the application of real-life law practice. The law faculty of CMU should therefore assess and respond to this imbalance between legal content and lawyering skills within the law curriculum. The law faculty of CMU should consider the introduction of qualified learning approaches for lawyering skills with a clear direction. This research suggests new learning techniques may be appropriate mechanisms to promote and develop fundamental lawyering skills, but initially focuses on the identification of what these fundamental skills are, before considering how they may be implemented into a new learning approach at the Faculty of Law, CMU.

III. METHODOLOGY

The ultimate goal of this research is to identify and understand the fundamental lawyering skills required for successful law practice within Thailand. The methodology focuses on the following key question with regards to increasing lawyering skills at the Faculty of Law, CMU:

What fundamental lawyering skills do law students of CMU need to improve and become satisfied and competent in their lawyering practice?

To answer this question, two stages of analysis were completed. The first step (Stage One) involved, 'Domain Knowledge Identification'. This objective of this stage was to identify the fundamental lawyering skills required by law students of CMU and was achieved through interviews with experts. The second step (Stage Two) involved an evaluation of the skills identified in Stage A by analysing current law students' competence and confidence in these skills.

A. Stage One

Thailand's legal education does not have a clear definition of what constitutes the basic skills required by law students. Additionally, one size does not fit all law students in Thailand, who are high school students with a relatively small amount of real-life experience and may require different types and/or levels of lawyering skills from law students studying in the United States, who have already completed their first bachelor's degree.

To achieve the objective of Stage One, the ten fundamental lawyering skills of the American Bar Association [ABA] (1992) were assessed in relation to Thailand. These skills are shown in Table I.

An in-depth interview approach was applied to selected qualified legal experts from major law career paths. All

experts' opinions towards fundamental lawyering skills required by the law students of CMU were analysed by a statistical software package to show the frequency rate in percentage form (%). Lawyering skills required a minimum of 60% of all legal experts in agreement to be considered as fundamental lawyering skills for CMU students. Additionally, to guarantee the validity of opinions, before interviews began, all experts were informed about the meaning or details of each lawyering skill of the ABA (1992).

1) *Target groups*: 16 experts from major law career paths were interviewed. These were the Dean (1), professors of governmental and private law faculty (2), judges (2), prosecutors (2), governmental lawyers (2), lawyers in private sectors (2), and independent litigating lawyers (2).

2) *Required Qualifications*: all legal experts (identified above) must have real-life working experience in their career of at least ten years and be accustomed to being guest lecturers, keynote speakers, full legal course lecturers in any law faculty, taking care of internship law students for certain periods of time, or at least a recruitment interviewer for new lawyers in organizations.

TABLE I
TEN FUNDAMENTAL LAWYERING SKILLS OF AMERICAN BAR ASSOCIATION
(1992)

Number	Type of Lawyering Skill
Skill 1 (SK1)	Problem solving
Skill 2 (SK2)	Legal analysis and reasoning
Skill 3 (SK3)	Legal research
Skill 4 (SK4)	Factual investigation
Skill 5 (SK5)	Communication (oral and written)
Skill 6 (SK6)	Counseling clients
Skill 7 (SK7)	Negotiation
Skill 8 (SK8)	Understanding litigation procedures and alternative dispute resolutions
Skill 9 (SK9)	Organization and management of legal work
Skill 10 (SK10)	Recognizing and resolving ethical dilemmas

B. Stage Two

With regards to the result of Stage One, the target groups were asked to complete a self-confidence evaluation by scoring from 'Best' to 'Not at all' [5, 4, 3, 2, 1 and No] in relation to the fundamental lawyering skills. Raw data will then be analysed to discover weak points among those lawyering skills.

To answer the key research question, the study must also investigate those fundamental lawyering skills where law students have low self-confidence and satisfaction. The outcome of this analysis could imply problems with existing law curriculum. Therefore senior law students and recent law graduates were designated as target groups. However, it would be inappropriate to let these students evaluate their own lawyering skills performance, as they are not yet seriously entering the arena of legal practice. Theoretically, to be

skillful or not, could be evaluated by an individual's expression of self-confidence. Therefore, in the survey, senior law students and law graduates of the Faculty of Law, CMU were evaluated in terms of their self-confidence towards the ten fundamental lawyering skills of the ABA (1992). Example questions from this evaluation are shown in Fig.1.

How much self-confidence do you have in the ten fundamental lawyering skills, ABA (1992)?

Skill 1 Problem solving

5 4 3 2 1 NO

Skill 10 Recognizing and resolving ethical dilemmas

5 4 3 2 1 NO

5 = Best, 4 = Good, 3 = Fair, 2 = Poor, 1 = Very Poor, and No = Nothing

Fig. 1: Example of self-confidence evaluation in the questionnaire

Additionally, to guarantee the validity of the self-evaluation outcome, the target groups were provided with documentation to inform them of the detail associated with each ABA lawyering skill, so there was no misunderstanding or difference in definition between individual respondents.

All raw data was analyzed by a statistical software package to describe the survey outcome in the form of a percentage (%) to ascertain how self-confident students are towards the ten fundamental lawyering skills. Each lawyering skill was classified into one of two levels according to its outcome, which were:

Satisfied level = the total percentage of students who self-evaluated "5 = Best" and "4 = Good" in each skill.

Unsatisfied level = the total percentage of students who self-evaluated "3 = Fair", "2 = Poor", "1 = Very Poor" and "No = Nothing" in each skill.

Following each stage in the methodology, the two lawyering skills which were identified as being most unsatisfactory were selected as the basis of a development plan. This plan will subsequently be used to create an effective learning tool to deliver the tacit knowledge required by these lawyering skills.

IV. RESULTS

The results of the research are presented according to the two stages set out in the methodology, which are based firstly on experts' opinions as to which ABA skills are fundamental, and secondly on an evaluation of students' self-confidence with these skills.

Firstly, all legal experts agreed with the notion of how important lawyering skills are to legal practice. Moreover, most also confirmed that, in general, law curriculum in Thailand does not have clearly defined lawyering skills. The 16 legal experts from major law career paths were encouraged to contemplate and identify the basic lawyering skills for law students of CMU by using the ABA (1992) lawyering skills

guidelines. Results show there is some difference of opinion as to which skills constitute core and non-core skills, but most experts agreed with the ABA's guidelines, as shown in Table I.

TABLE II
RESULTS OF LEGAL EXPERTS' VIEWS TOWARDS FUNDAMENTAL LAWYERING SKILLS OF LAW STUDENTS, CMU

Skill	16 Legal experts' views	
	Core Skill	Non-Core Skill
SK1	15	1
SK2	16	0
SK3	7	9
SK4	16	0
SK5	16	0
SK6	12	4
SK7	10	6
SK8	11	5
SK9	6	10
SK10	14	2

Eight out of ten fundamental lawyering skills received a minimum of 60% agreement from the 16 legal experts in this study. To be more specific, 100% agreed that skill2 (legal analysis and reasoning), skill4 (factual investigation) and skill5 communication (oral/written) were core lawyering skills. More than 80% agreed that skill1 (problem-solving) and skill10 (recognizing and resolving ethical dilemmas) were core. Lastly, 60% agreed that skill6 (counseling clients), skill8 (understanding litigation procedures and alternative dispute resolutions) and skill7 (negotiation) were core. The majority of legal experts were not in agreement with skill3 (legal research) and skill9 (organization and management of legal work). They described skill3 (legal research) as an academic, not practical skill and skill9 (organization and management of legal work) as necessary for admirable lawyers who take care of many legal cases, or those managing their own law firm. To summarise, among the ten ABA lawyering skills, eight are considered important as fundamental lawyering skills for Thai law students. Additionally, one legal expert added a multi-disciplinary skill; the ability to accommodate a legal case requiring many lawyering skills.

In terms of evaluating students' self-confidence, 84 senior CMU law students with a mean GPA of 3.02 and 64 recently graduated students with a mean GPA of 2.86, were given a questionnaire describing their level of self-confidence on the eight fundamental lawyering skills agreed by legal experts and highlighted in the results of Table 1. These results attempted to identify any significant dissatisfaction in terms of skill competency among the eight fundamental lawyering skills.

TABLE III
COMPARISON OF TWO TARGET GROUPS TOWARDS SELF-CONFIDENCE
EVALUATION IN RELATION TO EIGHT LAWYERING SKILLS

The eight skills listed in this table are based on the level of dissatisfaction with regards to each skill, as captured by the self-evaluation.

Lists	Fundamental lawyering skills	Senior Law Students (84)		Recently Graduated Students (64)	
		Satisfied Level (*)	Dissatisfied Level (**)	Satisfied Level (*)	Dissatisfied Level (**)
SK7	Negotiation	26.5%	73.5%	31.3%	68.8%
SK8	Litigation procedures and alternative dispute resolutions	36.9%	63.1%	50%	50.0%
SK6	Counseling client	41.7%	58.3%	53.1%	46.9%
SK4	Factual investigation	55.9%	44.1%	52.5%	47.5%
SK5	Legal communication	63.1%	36.9%	64.1%	35.9%
SK1	Problem solving	64.3%	35.7%	65.7%	34.4%
SK2	Legal analysis & reason	73.8%	26.2%	75%	25%
SK10	Recognizing & resolving ethical dilemmas	84.5%	15.5%	71.8%	28.2%

(*) Satisfied Level = total percentage of respondents who self-evaluated in "Best, Good" in each skill

(**) Dissatisfied Level = total percentage of respondents who self-evaluated in "Fair, Poor, Very Poor and No" in each skill

From the overview in Table III, the percentage of satisfaction or dissatisfaction with each skill shows similar trends for both groups. For example, both senior students and law graduates have strong self-confidence in skill1 (Problem-solving) with high satisfaction percentages of 73.8 and 75 respectively. Approximately one quarter of total respondents have weak self-confidence in skill1 with 26.2% and 25% of each group reporting they were dissatisfied with their competence. However, there is a small difference in skill8 (Litigation procedures and alternative dispute resolutions) where the dissatisfied percentage of senior law students is higher than recently graduated students (63.1% and 50%) but both figures also show a relatively low confidence in this skill.

Additionally, the percentages of dissatisfaction from both groups are at least 25% in skill 1 from recently graduated students which rises sharply to a peak of 73.5% in skill 8 from senior law students. Senior law students have self-confidence in only one skill (skill10) with 84.5% having self-confidence in this skill.

The goal of this study was to discern the fundamentals of lawyering skills, which law students particularly need to improve and which are provided by the law curriculum of CMU. After raw data analysis from the senior and recently graduated law students, the results revealed that there are four lawyering skills, which have a significantly high rate of dissatisfaction (44.1% to 73.3%). These are as follows: skill7 (Negotiation), skill8 (Litigation procedures and alternative

dispute resolutions), skill6 (Counseling clients) and, lastly, skill4 (Factual investigation).

The study also explored what activities were learnt within the law program in relation to the four identified lawyering skills. This final section of the paper shows how students currently learn these four lawyering skills. In the surveys, respondents were allowed to mark more than one choice from five activities, which are shown in Table IV and consist of: compulsory courses, elective courses, internship, extra curricula activities and no activities.

TABLE IV
TWO TARGET GROUPS DESCRIBE ACTIVITIES THEY LEARNED IN RELATION
TO THE FOUR LAWYERING SKILLS

SK	Groups	1 st Rank	2 nd Rank	3 rd Rank	4 th Rank	5 th Rank
7	Senior students	Elective 51.6%	Internship 31.3%	Compulsory 15.6%	Extra-curriculum 12.5%	Non-provision 10.8%
	Graduated students	Elective 56.1%	Internship 31.7%	Compulsory 23.2%	Extra-curriculum 11.0%	Non-provision 8.5%
8	Senior students	Elective 49.2%	Internship 46.2%	Compulsory 27.7%	Extra-curriculum 9.2%	Non-provision 3.1%
	Graduated students	Elective 52.4%	Compulsory 46.3%	Internship 42.7%	Extra-curriculum 8.5%	Non-provision 1.2%
6	Senior students	Elective 43.1%	Compulsory 13.8%	Internship 35.4%	Extra-curriculum 27.7%	Non-provision 6.2%
	Graduated students	Elective 47.6%	Internship 39.0 %	Compulsory 23.2%	Extra-curriculum 20.7%	Non-provision 4.9%
4	Senior students	Compulsory 46.9%	Elective 43.8%	Internship 29.7%	Extra-curriculum 18.85%	-
	Graduated students	Elective 59.3%	Compulsory 55.6%	Internship 30.9%	Extra-curriculum 11.1%	Non-provision 1.2%

Overall, the results in Table IV have shown that participants learned four lawyering skills from elective courses. Surprisingly, although internship activities should be useful resources for learning lawyering skills, participants ranked them second. Furthermore, according to questionnaire respondents, compulsory activities do not play an important role in learning lawyering skills and are ranked third out of five. Additionally, the results of this study show that the four lawyering skills where students are not satisfied, are also those skills which are not taught to all law students as results indicate compulsory courses are not the main activity for lawyering skill learning approaches. Not all law students learned the fundamental lawyering skills because these skills were provided mostly in elective courses rather than compulsory ones.

The internship program has a purpose to widen students' opportunities for learning lawyering skills with practitioners in governmental or private organizations. Despite this, results show that participants did not gain maximum potential from

the internship program. This warrants further investigation in future research.

Fundamental lawyering skills learnt through extra-curricular activities should be fully leveraged to effectively learn lawyering skills.

IV. CONCLUSIONS

Evidence shows that legal educators have the difficult task of preparing students for practicing law. However, legal educators are obligated to help students acquire core foundational skills [22]. Therefore, it is necessary to revise the existing law curriculum of CMU in order to make it clearer and enhance its effectiveness towards learning approaches for fundamental lawyering skills. There were four lawyering skills where participants voiced particular concern over not having enough teaching or learning. This requires intensive monitoring to assure both process and outcome of learning before students move into real-life legal practice. Lastly, the current activities for teaching lawyering skills are not functioning properly. Those approaches cannot effectively and consistently provide the fundamental lawyering skills needed for all law students.

The authors believe that there are significant reasons within this article, which support changing the law curriculum to enhance the learning of lawyering skills. A remaining challenge is how to develop an effective learning tool for delivery to at least a hundred law students of CMU. Serious games with new technology may be an appropriate choice. Serious games can more formally be defined as an interactive computer application that has a challenging goal, is fun to play and/or engaging, incorporates some concept of scoring, and finally, imparts to the user a skill, knowledge, or attitude that can be applied to the real world [23]. Serious games can provide a wide variety of challenging scenarios to learn skills, for example flight simulators for pilots in the airline industry. These skills are available for effective self-learning; have high accessibility, are easily repeatable, give timely feedback and are easy deployment to mass audiences.

Further research will aim to answer the next key research question in the development of legal education in Thailand and more specifically, CMU:

How can a serious game be applied to learn the fundamental lawyering skills for law students of CMU?

Due to the creative approaches to learning lawyering skills, which have been introduced by many international law schools, it is empirically evident that traditional teaching approaches are no longer appropriate for transferring tacit knowledge like lawyering skills to law students. Moreover, there is potential to apply the idea of a serious game as a new solution with high accessibility and mass participation, to meet the needs of a new generation of law students, and overcome the existing obstacles in learning lawyering skills at the Faculty of Law, CMU. Future research in this project will capture tacit knowledge with regards to lawyering skills

required by legal experts to design a serious game. At this point Bloom's Taxonomy, learning theories and game theories will be blended to achieve the ultimate goal of improving fundamental lawyering skills of students at the Faculty of Law, CMU.

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Interpersonal Skills Learning in Information System Department for Developing Soft Skills and Caring Attitude

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Abstract— Over the last ten years, Information technology has been developed in Indonesia. However, as a developing country, Indonesia has a problem, that is soft skill for the human resources. This issue has concerned many companies, be it private or government, leading to the massive unemployment of Information Technology Graduates. This problem is widely experienced by some companies (private and government) in Indonesia, leading to the massive unemployment of Information Technology Graduates. This phenomenon is still increasing year by year. It is therefore, interpersonal skills play an important role in educating the students. Interpersonal skill learning provide the students not only how to manage themselves, but also the way to treat other in a good manner in order to develop networking. By educating the students with interpersonal skills, enable them to have a good coordination with each other, not only on their computer or IT project, but also helps them to control their emotion and to have better personality. In this paper, it is described how the Interpersonal skills learning are implemented in the Information System Curriculum, the result, and the recommendations for improving soft skill graduates. With this new learning curriculum, which is given in the first semester in Information System Dept., it is predicted that they will gain soft skills and become their foundation in the long run.

Keywords — Soft Skills, Interpersonal Skills, curriculum

I. INTRODUCTION

In the latest education trends, not all of IT graduates are welcomed by companies. This issue becomes a major problem in Indonesia. Indonesia as the biggest five in the world population obviously produces larger quantity of university graduates.[1] However, one of the critical problems faced by IT graduates is their interpersonal skill problem. This problem has become worse and worse because an interpersonal skill has not yet been considered important in curriculum in many higher educations. Students are given the hard skills in their learning process. They rarely know how to

interact with one another, and this will create a gap among students. In higher education with a goal to achieve good quality graduates, this issue is not being seen as an important issue because the higher education still judges their students quality just based on their marks. When the students have graduated, they are shocked due to the real job environment that is different from that in their college they have got in touch with.

Interpersonal skills mainly educate the students how to interact with one another and to work together as a team to achieve same goal/goals. The main reason of this learning is to prepare the students for their future working environment and to build a better personality for them. In the short term, the result of this education cannot be seen instantly. It takes several steps and experience to learn and apply the interpersonal skills.

Stake holders would be astonished if IT graduates could exhibit their interpersonal skills better than before. This situation will lead to a good chance to get into prestigious companies. For Indonesia, many people think that an IT job is only working in front of their computer rather than working and doing project alone, without having the ability to understand others. In other words, interpersonal skills lead and encourage the students to have empathy and sense of being social.

Unfortunately, most of the students are not welcoming this interpersonal skills learning and neither are they enthusiastic with it. Even when the higher education make this as the main subject in their Universities or Colleges, students prefer to get hard skills education. They think this process of learning interpersonal skills would not have a good effect be it on the short run or on the long run. Some of them also think that Interpersonal skills learning are a waste of time as they can learn this education by reading and implementing soft skills directly.

This problem is not as big as it appears. In order to make the students think that this learning is important for them, this course has to be redesigned and re-evaluated based on the students opinion and the goal of giving Interpersonal skills learning to them. This course should get a positive

image from the students and, therefore, it will require some research attempts to develop the learning plan, learning process, learning method, and the evaluation. This is why interpersonal skills here are divided to three subjects of learning, such as, 1) team building, 2) Study Acceleration, 3).Written Communication skills.

II. LITERATURE REVIEW

A. Interpersonal skills

Interpersonal skill, as the main topic of this paper, been defined in many ways. According to Honey (1988), Interpersonal skills refers to interactive skills as the skills people use in face-to-face encounters to arrange their behaviour so that it is in step with their objectives [2]. But, in a normal communication rather than interaction between people, there are some purposes on making communication with others, Communication used to define or achieve personal goals through interaction with others [3]. Practically, interpersonal skills show how to treat others with care and empathy but it also achieves the goal when the communication is delivered between people. There are many strategies how to interact with one another. According to Brown and Levinson, politeness theory clarifies how we manage our own and others identities through interaction, in particular, through the use of politeness strategies.[4] This is why, Interpersonal skills is not a rigid knowledge but it is flexible and can be adjusted as the time goes.

In Indonesia, interpersonal skills are seen as important skills, and whoever has it, will be considered and respected by others. This happens for a reason, people with interpersonal skills rather than communicating without ethics, they communicate with respects and politeness. This way, they gain popularity with their work mate or their team mate which will help broaden their connections. Interpersonal skills also can blends with any other knowledge, as it is different from hard skills. The true meaning of studying and giving this learning to the students is to help them combine between hard skills and soft skills and increase their opportunity to have a job or to make one.

There are few reasons why there should be interpersonal skills in the curriculum of Higher education especially in Information Technology, as depicted below [5,6,7]:

- 1) To prepare the students to enter the society and be part of it. The reasons why IT students, don't get respected by their colleagues be it on their team or on the workplace, are because they are too individualistic and don't have empathy towards others. With this given in the first Semester, it will help them to understand and strengthen the bond in each student.
- 2) To develop students to prepare knowing yourself, maintaining control, maintaining motivation and communicating flexibly as the basic skill for working. These five skills are the main fundamental in the soft skills development in higher education. In this course and

curriculum, students are expected to learn this fundamental in the classroom by communicating and using soft skills to others. There are facilitators who will help them to learn new things about interpersonal skills as they also teach them by doing it. This will create a good habit and will affect students' behavior and personality from being pampered to mature.

- 3) To enhance IT graduates opportunity to apply job easily. Communications skills can't be studied in one night. One note that students and people judge how their interpersonal skills is developing can be shown in their communication skills, be it negotiating, interviewing, or in a speech. IT graduates, usually don't have this kind of skills. The best way to communicate well is to train endlessly and experience it directly. As time goes on, there will be a different and new method in the way of communicating that is why this knowledge is essentials to learn. In the higher education, to apply communication skills learning, there is an intensive class which educate and press them to talk to the audiences. There is a supervisor who evaluates their communicating skills.

B. Interpersonal skills Frameworks

In the Thinking Skills and Personal Capabilities (TS and PC) framework, there are there are two main points to develop, working with others and self management. These two points will lead to managing information and thinking creative, and finally combining these will be a way to thinking, problem-solving and decision making [8]. Furthermore, they explained that there are four steps to deliver the purposes on the students; this step is taken from the first until the end serially to make this method works, these four steps are lesson introduction, thinking actively, thinking about thinking and applying thinking.

Geoff Petty (2007) introduced ICEDIP Model and mix this with TS and PC frameworks, ICEDIP stands for inspiration, clarification, evaluation, distillation, incubation, and perspiration, this model explain that there is no correct order to the process and every stage has its own mind set, so in order to maximize this framework, every learning aspects must have different way to deliver according to the model. This frameworks has been researched and implemented for classroom practice which have quite good results such as: 1) TS and PC develop the tools, habits and dispositions for lifelong learning, 2) The TS and PC framework brings together different types of thinking skills along with personal and interpersonal skills, 3) The different strands that make up the framework overlap and interact with each other, 4) Few of these skills and capabilities are new, but if we are going to develop them explicitly, this will have implications on the pedagogy [8].

Another framework, which is generally used in Indonesia is Interpersonal Skills Cycle. In this model, there are: 1) understanding and working with each other, 2) understanding and working with teams, 3) leadership, and 4) Interpersonal skills.[9] Each of these cycles are checked and evaluated with psychological quiz which determines what

point do the students need to improve. This model note, important principle which have to be known and implemented with, there are openness, empathy, helping each other, positive relationship, equality, and trust. Rather than delivering the way to communicate with Interpersonal skills, this model is not separated with the active listening method. Active listening is the art of the receiver to decode message. [10]. Burkill, et al. also noticed that listening and interpersonal skills are fundamental to the process of learning itself.[11]

C. Interpersonal Skills within Higher Education

Not only in Indonesia, in some other countries, education curriculum was dominated with subject content learning, this happens in all major degrees.[12]. Dearing report, NCIHE publication, results to the change of curriculum in the British, which was followed and modelled by other countries after them.

In the year of 1960's there were many ideas about interpersonal skills and how important it is in the business and commercial environments. When recruiting staff and officer from management graduates, Buckley, Peach and Weitzel compare that the findings of two different studies to find out which attributes employers valued most highly are their technical skills. But this event has changed since 1983 when, in 1975 research was revealing that communication and interpersonal skills were the most valued skill to the employers.[13]

Interpersonal skills in higher education are not yet taken seriously in Indonesia; this phenomenon is predicted by some authors.[11]. Based on their research the lack of emphasis on the development of such skills came from an assumption that interpersonal skills would develop naturally without the need for direct instruction. Yet from the surveys of employers have indicated that the qualities they consistently rate most highly in graduates relate to their communication skills, their ability to work together in teams and their technical writing skills, besides their basic technical knowledge. Even though knowing that, students are also not welcoming the educational of interpersonal skills in higher education, they should learned and practiced in class and other activity. The problem is, they thought that learning interpersonal skills can be directly applied in the real life situation not in the class. Based on this condition, higher education should change their negative attitude and make them aware with interpersonal skill.

III. METHODOLOGY

The objective of this research is to develop interpersonal skills learning which is applicable in the Information System Department (Dept). The subjects of the research are all students who have entered the first semester. This course is a must to them and roughly a total of 130 students are involved. The observation doesn't take a lot of time, because all of the students in semester one are involved. The following are the steps of implementing the interpersonal skills learning in Information System Dept.

A. Preparation Stage

1) Syllabus of the course

Lecturer prepared the syllabus of interpersonal skills learning by review many model of learning, mainly from IMB. The main model has been taken from IMB, which is using TS and PC framework, but with some modification through student's opinion, change of culture, and goals. In this development process, there are many factors which are considered as important; they are students, teachers, and methods, teaching kits, psychological atmosphere and class room situation (Johnson, 2002). Learning objective of this course, according to the syllabus is e.g., students able to work in team and capable of leading other and him/her self based on good interpersonal relation and able to solve problem with their own team.

2) Method of learning

Interpersonal model learning is used as the method of learning. There are some considerations for using this method, such as:

- a) Students find difficulty to express what in their mind freely, as an information system dept student, would not have much time to interact with each other ; this is the place where they can meet with all of their friends and getting to know them better. But, some students tend to be shy, holding back, and not interested with some of this course programs because they don't think that soft skills will help their future career.
- b) By using the model of learning, students learn how to work together in team. How to communicate with each other; develop empathy, respect and awareness. This will boost their interpersonal skills learning. The teams are divided in to four team where in one team there are 10 students member, with one leader which is changed and elected in the beginning of the course. The leader has the right to organize the group and the final decision making will be taken by the leader. The leader also has a full responsibility towards his/her members.
- c) Few students are not interested with interpersonal skills learning in the class. They think it's a waste of time because the teachers taught them what they already know. This problem, are being countered by giving the students ice breaking or mini games which happens to be the subject lessons that delivered to them. Because to have this course welcomed, they have to think that this course is enjoyable even though they think negatives at first, this may change in the further development.

3) Learning evaluation

This step is important for measuring the goal or objectives and also measuring the effectiveness of the learning method. Here there are two types of evaluation: Daily evaluation and final evaluation. Daily evaluation are conducted to the students which is report assignment

including new things that they have learned from the course. This will help them to express their own creativity by writing it out in the paper, and also notices the teachers what is the progress of the students. This evaluation is far different with the final evaluation which emphasize on a big project. These projects are divided into three projects. One is team building, two is digital interpersonal skills and the last is making a mind map. With this three evaluation, teachers can measure the achievement of the objective learning. Yet, for the purpose of comprehensive evaluation, questioners will be needed and distributed toward the students to gather their opinion and ideas about this course development.

B. Learning Design of Implementation Stage

The implementation spends 16 weeks for usual meeting, examination will be held on weeks 17 until weeks 18. In the first meeting, the teachers will explained the students about the syllabi which include the goal of course, benefits for IT graduates in their future activity, and the references, material, resources learning, evaluation system and the rule of lecturing. Every week there are two meetings, outdoor and in class. The different between indoor and outdoor is in the learning scope, outdoor focuses on practical rather than in class which focuses on soft skills theories.

In the learning process there are five facilitators who will help the teacher delivering the essential of interpersonal skills learning. The facilitators were chosen from the students who have finished interpersonal skills course in the first semester, they will be given some qualifications and have to take an interview to determine their qualification, with this, and teachers can control their facilitator's quality.

Facilitator qualifications are determines by their communication skills. Effectual communication engages the choice of the best communications channel, the technical know-how to use the channel, the presentation of information to the target audience, and the skill to understand responses received from others. They have to be qualified and skilled with managing the overall process of communication, expressive skills, listening skills and emotional skills. All of the communication skills have such benefit as:

- 1) Expressive skills are required to convey message to others through words, facial expressions and body language.
- 2) Listening skills are skills that are used to obtain messages or information from others. These help to clearly understand what a person feels and thinks about you or understand the other person closely.
- 3) Skills for managing the overall process of communication help to recognize the required information and develop a strong hold on the existing rules of communication and interaction.

From the first week, the teachers encouraged the students to write an assignment about their activity in the outdoor class, students are asked to note every good things related to soft skills that they learned and experienced in that week course. The formats of the assignment are given below:

- 1) Writing essays about their activities

- 2) Identifying the lesson goals from every activities
- 3) Soft skills Analysis
- 4) Write about how to implement the soft skills in their daily lives
- 5) Comparing how the lessons effect the students

To encourage the students, in every week the teachers will choose the best assignment and reward them with an honour to give a presentation to all of the students and teachers as the audiences. Whoever can deliver and tells the audiences and get a standing applause, will be guaranteed to have a great mark in this course.

IV. RESULT AND DISCUSSION

To judge and identify the method it is essential to summarize the observations and to review the students learning output. With this observation, the model can be studied and judged which programs or learning process will work well and which did not. This observation and experience analysis helps the teachers to organize the future planning of the course.

In the end of the semester, the teachers will spread questioners and surveys to the students about this course. The result was excellent; it is indicated through two things, first was by the high rate of students' attendance and second is based on the survey. Students' attendances were counted excluding sick student's who have doctor permit to leave the course. In the survey there are important point which were asked, those are 1) opinion towards this course, 2) soft skills before and after entering this course. 3) Benefits of this course for them.

All the programs and learning process really affected the students. All students competed to each other enthusiastically, and they didn't complain about being the loser team, because the teachers already prepared the punishment game, this punishment includes students to do what the audience (students, teachers, and facilitators) requested for example: dancing or singing, which is actually well received by some students. Every aspects of learning will be discussed by the facilitators to show the students what they actually learn from one program, they also have a time to discuss it with the other students. This will encourage them to know each other's and learn to anticipate different opinion.

Based on the student's academic performance, it was shown that students who are serious in class, who have high attendance, having involved and participated in all the course programs, get some benefits such as having good communication skills, better moral and personality, and having learning experience. It is shown that more than 50 percent of the students got high grades; only small amount of students got fair and low grades. They got fair and low grades because they didn't focus on class and were frequently absent in the class. This indicates that this method are working and improving their academic performance.

TABLE 1 EFFECTS OF THE INTERPERSONAL LEARNING ON SKILLS

Dimension of skill	Score/ Grade			Δ
	Before taking	Daily Assign	End	
Study acceleration	2,5	3,5	3,5	1
Oral communication	2,5	3	3,5	1,25
Written communication	2,5	3	3,5	0,25
Team Building	2,5	3,5	4	1,25
Leadership skill	2,5	2,5	3,5	1
Self-confident	2,5	3	3,5	0,75

Note:

4: A (Excellent), 3, 5: AB (Very good), 3: B (Good), 2,5 : BC (Average) , 2 : C (Fair)

On the table 1, it is indicated that students who have been taught interpersonal skills have better Soft skills and attitude particularly in many key of dimensions of skill, and they have increased their skills significantly. Quick reading, oral and written communication, team building, leadership skill , self confident, and mind mapping are fundamental skills in the Interpersonal skills. These skills are achieved by practicing and experiencing it regularly. That is why every week in groups with the help of facilitators and teachers, students can improve these skills.

The highest improvement of the dimension skill is team building which is emphasizes on team work assignment and cases. Here all the students who have been in one team understand their own roles and system for their teamwork. Hoevermeyer identified the following five areas as significant to team building effectiveness: 1) team mission, 2) goal achievement, 3) empowerment, 4) open, honest communication, and 5) positive roles and norms.[14] This value was observed by the facilitators as they were working together in a team. They also receive feedback of the performance, individually and as a team. However, students tend to choose one leader at a time, and nobody bothers to change their leader, this cause a lack improvement in the leadership skills dimension. Students are reluctant to be dominant in the team, rather than that, they mutually agreed to choose one person either it can be their leader or not to be the team symbol. This event affect the team, as if the person the students chooses are great, the team will become a great team and vice versa.

Written communication also increased, even though it was the least significant. It was hard to improve students' ability to write their assignment in a report. Comments on how to improve students writing skills are only given in the paper which usually didn't get to be seen by the students. They only look at their mark, and didn't bother to read the suggestion given by the teachers. In this case, improving written communication might seem difficult. Other than that, students also think that this writing assignment is not as important as other course assignment. They are not working on the writing assignment seriously. So far, some actions have been taken to improve the learning process such as

encouraging the students to write a report and opinion in the local newspaper which will be compensated them with excellent mark. Other advices are to have a program which focuses on written communication, which will be delivered by the teachers before the students have to write their report, and then for the follow up, teachers and facilitators will help the students to correct their mistakes, by having discussion on a team. With this solution it is predicted that in the next terms, the students will get good marks in written communication.

V. CONCLUSION

Interpersonal skills' learning is a great method for IT students especially in Information System dept to improve their soft skills and apply it directly by having better communication skills. The results indicate that almost all dimension skills of interpersonal skill are getting better, they are study acceleration, oral communication, written communication, team building, leadership skills, and self-confident. Although the learning method was not perfect, feedback is appreciated from the students and teachers to redesign and renew some programs which are not working properly to deliver the knowledge. Based on the evaluation and observations, students are achieving the main objective of the course by having improvements in their interpersonal skills which can be seen in the academic record, about half of the students got very good marks.

Interpersonal skills learning could be maximized if there is an IT topic that is combined with interpersonal skills learning, this way students will be interested more. Other than that, one program that makes the student active was soft skills discussion. The topics are simple but have good effects to the students. Yet, in this learning method there was one vital point that is not getting well received by the students, it is written communication. Written communication which is being students daily homework, have a less improvement that the predicted result. Meanwhile, leadership skills also contribute less improvement. With this weakness, it is advisable that facilitators and teachers can encourage the students by using academic rewards for students who have applied to become the leader of the team. To improve written communication skills, it is required a follow up of the paper assignment. Furthermore, in the latest discussion, it would be better if written communication skills are delivered around 20 minutes program to focuses on the improvement.

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Exploring Undergraduate Students' Learning Difficulties Through Multiple Intelligence Theory

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Abstract- Learning is a continuous process throughout one's life. However, some students face difficulties during the process and this affects their academic performance. This study investigated students' learning difficulties and the usage of multiple intelligence theory to explore this problem. Thirteen undergraduates were randomly selected from educational faculty in one of public university in Malaysia. These respondents were asked to describe the problems they face in their learning process. The problems were then categorized as external and internal factors. External factors are divided into subject and teacher factors, while internal factors are divided into learning styles and individual matters. For external factors, many undergraduate students stated that the subjects were boring and the teacher was not friendly. As for internal factors, it was found that most undergraduate students had difficulties in memorizing and understanding the subjects. To overcome the learning difficulties, students used various learning methods. In terms of multiple intelligence theory, every individual has his/her own preferred learning preference. In learning process, students should first understand their learning preference before acquiring the learning method to improve their weaknesses. Therefore, undergraduate students should understand and adapt the learning strategies to make their learning more effective.

I. INTRODUCTION

Learners may use different learning styles to deal with different information learning tasks. Every individual has his/her own preferred learning style. In learning process, learners should by first understand their learning preference before controlling the learning method, and then improve their weaknesses (Lisle, 2007). For example, auditory learners can learn better when they listen to information or talk about it. Visual learners like to present information in text, symbols, charts, diagrams or pictures. Kinaesthetic learners prefer practical tasks when hands-on approach is conducted (Barbe, 1985; Gardner, 1993; Rose and Nicholl, 1997, Smith, 1996). Each learner may use all these learning styles but he/she will conduct his/her learning based on one modality more often compared to the other learning styles (Lisle, 2007). We cannot judge that a certain learning style is better than the other as each person has different way in processing information.

According to Lacey (2000), 'learning difficulties is a multi-professional, multidisciplinary topic' and 'people with learning difficulties find learning difficult by definition'. For Naparstek (1995), learning difficulty is a process whereby student fails to achieve as teacher, parents, or oneself expected. Woolfson and Brady (2009) refer the term 'learning difficulties' as intellectual disabilities. Hence, learning difficulties happens when the student meets obstacles in learning or incapable in adapting to the study environment and this result in declined assessment scores or negative effects in the learning outcome.

There were 80% students identified to have problems in learning have reading difficulties in a study by Loudon et al. (2000). For individuals with reading difficulties, they are found to have problems in phonological sensitivity, and/or rapid naming and related skills (Schatschneider et al., 2004; Wolf et al., 2000) as well as underachieving academically, normally in literacy (Elkins, 2007). Thus, teachers expect students with learning difficulties to have poor performance in class (Clark and Artiles, 2000; Wood and Benton, 2005) and they see the causes of such difficulties as intrinsic to the students (Brady and Woolfson, 2008). These beliefs may affect teachers' behaviors (Kagan, 1992) and give direct or indirect impact to their students (Kurtz et al., 1990).

Student learning difficulties are found to be negatively correlated with learning attitudes (Vallerand & Bissonnette, 1992; Resnick, 1987). Based on the findings, factors that lead to learning difficulties can be described in personal, family, institutional and social aspects. Personal factors involve individual's intelligence, physical and emotional condition, self concept and learning purpose. Compared to their peers, students with learning difficulties often show lower academic self-concept in reading and writing (Haager and Vaughn, 1997). Family factors cover learning atmosphere at home, social and economic status, parents' expectation, education level, vocation and attitude. Institutional factors include school environment, facility and curriculum, as well as teacher's personality, attitude, teaching contents, pedagogy and assessment. Social factors involve community

environment and culture, deviation and confusion at social value.

Besides, gender, year in university and academic performance are found to be related to students' learning difficulties as reported by Heyneman (1975) and Amuge (1987). According to Van Kraayenoord (2008), difficulties in literacy happen because students are given unclear instruction, lack of exposure to literacy as well as motivation. Furthermore, less motivation in students with learning difficulties and these students doubt about the factors that leads to success and failure. The questions being asked are related to respondents' background information, experiences and achievements as well as motivation factors. The purpose of this study was to identify the problems in the students' learning process. This study focused on the following research objectives;

- Determine undergraduate students' learning difficulties
- Determine creative learning style used by undergraduate students

II. METHODOLOGY

A case study was done to investigate students' learning difficulties. The respondents were randomly selected from Educational Faculty of University Putra Malaysia. All the respondents are 7 female and 6 male students from Year 1, Year 2 and Year 3. The researcher had adopted an interview method to gather data for this study. The selected students were interviewed and the informed consent had been signed by those who agreed to participate in the tape recorder interviewed. They were asked to describe their problems in learning process. The learning difficulties that the respondents listed were then being divided into external factors and internal factors. External factors were difficulties related to the subjects and their teachers whereas internal factors were related to the respondents themselves.

A. Data Collection and Analysis

The process of data collection was initiated after obtaining the approval from the experts and the validation of the interview questions. The selected students were then being contacted to ask for confirmation and approval for the interview. A confirmation contract has to be signed before conducting the interview to ensure that all information provided is true and valid. The respondents were given an orientation before hand to ensure that they understand the objectives of the study and that they are required to provide the needed information.

The questions for the interview are divided into two sections. A pilot study had been conducted to examine the extent of the effectiveness of the interview questions. The recording of the interview was carried out after the respondents were ready and have studied the interview questions a day earlier. All the recordings of the interview

were transcribed and then sent back to the respondents for correction and validation purposes. The data gathered from edited transcripts will be analyzed by content analyses.

All of the interview transcripts and findings were read, analysed and checked thoroughly. Then, they were categorized and arranged according to the information obtained and were gathered under general themes, main themes and opinions given by the students. From this information, the researchers were able to identify the significant themes used by the students in their learning methods. The frequency obtained from the analysis indicated the significant of the factor influence in their learning difficulties.

A. Undergraduate Students' Learning Difficulties

Table I shows the respondents' learning difficulties related to external factors. These external factors were divided into two aspects, namely subject factor and teacher factor.

TABLE I
RESPONDENTS' LEARNING DIFFICULTIES RELATED TO
EXTERNAL FACTORS

Learning Difficulties	Respondent
Subject factors	
The subject is boring/ Feel bored by the subject	Respondent 1, Respondent 6, Respondent 7, Respondent 9, Respondent 11
Not interested in the subject	Respondent 1, Respondent 2, Respondent 5, Respondent 7, Respondent 10, Respondent 11, Respondent 13
The subject is complicated	Respondent 1, Respondent 3, Respondent 5
Language usage	Respondent 2, Respondent 3
Too much facts	Respondent 1
Hard to master the subject	Respondent 1
Facts are presented merely in sentences	Respondent 10
Teacher factors	
Not interested in the teaching approach	Respondent 7, Respondent 11
The teacher is fierce	Respondent 5
Often been scolded and insulted	Respondent 5
Inappropriate time for teaching and learning	Respondent 9
Do not use teaching assets	Respondent 11

In subject factors, one of the highest ranked learning difficulty reported was that the students were not interested in the subject. The students said that;

Difficulty in understanding events and memorizing dates and facts in the textbooks makes me lose focus. This lessens my interest in learning History (R1)

Students are not interested to know about events that had occurred centuries ago (R2)

I honestly don't like the facts that I have to remember and memorize (R5)

I'm not interested in facts or figures (R7)

The teacher's boring teaching methods make me disinterested to learn (R10)

The difficulty in remembering facts makes me disinterested in learning about History more than other subjects (R11)

Difficulty in forming a mental picture and to delve into historical events makes me not interested to learn History (R13)

The second ranked learning difficulty that the respondents reported was they think that the subject was boring or they feel bored by the subject. For example, the respondents stated that;

When the subject of History is mentioned among students, undoubtedly the term 'boring' comes to mind (R1)

Mathematics always bores me every time I study or memorize it (R6)

The teacher's teaching methods are lame and this makes me feel bored and disinterested in learning that subject (R7)

Other situations or environment also matter like History being taught during inappropriate times such as in the afternoon. This is the time I feel bored, sleepy and not focused (R9)

I easily get confused with all the facts taught; this makes me bored and less attentive in class (R11)

In teacher factors, the highest ranked learning difficulty was the respondents were not interested in the teaching approach. The respondents reported that;

The teacher's boring teaching methods make me easily bored and not interested to learn the subject (R7)

My teacher does not use teaching aids like other teachers who use gadgets and computer software while teaching and this influences my interest in History (R11)

There were twelve factors listed by the respondents (7 subject factors and 5 teacher factors). Most of respondents were not interested in the subject. As for the teacher factors, many respondent were not interested in the teaching approach.

Table II shows the respondents' learning difficulties related to internal factors. These internal factors were divided into two aspects, namely learning matter and personal matter.

TABLE II

RESPONDENTS' LEARNING DIFFICULTIES RELATED TO INTERNAL FACTORS

Learning Difficulties	Respondent
Learning matter	
Difficulties in memorizing	Respondent 1, Respondent 3, Respondent 4, Respondent 5, Respondent 6, Respondent 7, Respondent 8, Respondent 9, Respondent 10, Respondent 11, Respondent 12, Respondent 13
Difficulties in understanding the subject	Respondent 1, Respondent 2, Respondent 3, Respondent 4, Respondent 7
Difficulties in paying attention	Respondent 1, Respondent 5, Respondent 9, Respondent 11, Respondent 12
Drowsy when learning	Respondent 7, Respondent 9, Respondent 12
Confused with the facts	Respondent 3, Respondent 11
Difficulties in reading	Respondent 1
Difficulties in making notes	Respondent 7
Difficulties in elaborating facts	Respondent 8
Difficulties in recalling facts	Respondent 9
Difficulties in imagining events	Respondent 10
Personal matter	
Lack of enthusiasm	Respondent 1, Respondent 11
Scared to attend class	Respondent 5, Respondent 6
Low mastery level	Respondent 5, Respondent 9
Feel burden/stressed	Respondent 9, Respondent 12
Lack of self-confidence	Respondent 9, Respondent 12
Do not like to read	Respondent 1
Do not like to memorize	Respondent 2
Mentality unprepared	Respondent 9
Narrow-minded	Respondent 12
Stubborn	Respondent 12
Easily influenced by friends	Respondent 12

For learning matter, almost all the respondents face difficulties in memorizing. Stated below are some comments from the respondents.

I find it hard to memorize all the important facts about ethnic relationships, global music culture and such (R1)

My learning style or previous education cannot help me retain information given by the lecturer (R3)

I find it hard to memorize facts such as names of important people, places and years. (R4)

Among my problems with the subject is memorizing all the historical facts (R5)

My problem becomes more intense when the subject requires me to memorize and to remember all the dates from inferred events (R6)

I have a problem with subjects that require memorizing (R7)

Among problems that I face is difficulty in memorizing facts (R8)

I find it difficult to remember formulas even though they have been taught (R9)

I cannot memorize all that I have learnt about Chemistry (R10)

I always have problems understanding and memorizing what has been taught (R11)

I have difficulty in learning Literature as it requires me to remember so many facts (R12)

I have difficulty understanding and remembering facts and dates contained in textbooks (R13)

About personal matter, some respondents lacked enthusiasm to study. They reported that;

My low achievement in History makes me less enthusiastic to appreciate the subject (R1)

I become demotivated when this subject is taught (R11)

Besides, some respondents were scared to attend class. They claimed that;

I'm always nervous and scared to attend my Chemistry class (R5)

I become nervous and scared when called or questioned by the teacher about a particular chapter of this subject (R6)

Meanwhile, some respondents had low mastery level in their studies. They reported that;

I become demotivated when this subject is taught (R5)

It is difficult for me to have to learn and re-trace all the facts from Forms 1 up to 3, only to be tested during one major examination (R9)

Moreover, some respondents felt burden or stressed in the learning process. They stated that;

I become stressed when I have to read up on other subjects while trying to improve my grasp of this particular subject (R9)

Even though the teacher has given me clear instruction and guidance patiently, my personal stress and lack of confidence have narrowed my mind and hardened my heart (R12)

Further, some respondents were lack of confidence in their academic. They reported that;

Poor results on the subject has lowered my confidence level (R9)

Even though the teacher has given me clear instruction and guidance patiently, my personal stress and lack of confidence have narrowed my mind and hardened my heart (R12)

There are twenty one factors listed. As shown in the above finding, there can concluded for learning matter, almost all the respondent face difficulties in memorizing whereas the personal matter, most respondent felt burden or stress studying the subject.

B. Creative Learning Style

Table 3 shows the respondents' creative learning style in order to overcome their learning difficulties.

TABLE III
RESPONDENTS' CREATIVE LEARNING STYLE

Methods	Respondent
Usage of different colours or symbols in notes	Respondent 3, Respondent 4, Respondent 7, Respondent 9, Respondent 12
Mind mapping	Respondent 3, Respondent 6, Respondent 7, Respondent 8, Respondent 11
Make songs from the notes	Respondent 1, Respondent 5, Respondent 9, Respondent 13
Group study	Respondent 2, Respondent 6, Respondent 10
Make notes/footnotes/pocket notes	Respondent 4, Respondent 7, Respondent 9
Graphics (static or animation)	Respondent 3, Respondent 6
Memorize	Respondent 6, Respondent 7
Acronyms	Respondent 7, Respondent 8
Abstract thinking/ Imagine	Respondent 12, Respondent 13

More focus to lecturers	Respondent 2
Ask questions	Respondent 2
Repetition	Respondent 6
Make stories from notes	Respondent 10
Overall review	Respondent 11
Study with music	Respondent 13

Many students used different colours or symbols in their notes. This helps them to identify the key words even more clearly. The respondent stated that;

I used a lot of colours in the mind map (R3)

My pocket notes are written using many colours because they stimulate my mind to memorize more of what I've read (R4)

I also use various colouring techniques to spark my interest in reading those notes (R7)

The footnotes I made also use colour games (R9)

The use of various markers and colours help stimulate my mind and memorizing power; any important facts that are colour coded are easily traceable and easy to understand. It also aids in speedy correction (R12)

There were also many respondents using mind mapping when they were studying. These respondents reported that mind mapping assisted them to remember the facts as well as train their brain for both left and right. They reported that;

I have used the mind map technique to ensure that I am able to memorize important facts (R3)

I've used the mind map technique in memorizing facts and it has enabled me to use both sides of my brain (R6)

I use mind maps to make short notes (R7)

To tackle problems during learning, I use the mind map technique (R8)

Using the mind map has helped me to take down notes and remember what I've learnt easily (R11)

The third highest ranked method to overcome learning difficulties was making songs from the notes. This helped them in memorizing the facts. The students commented that;

Converting facts to songs is among my favourite creative learning method (R1)

I have used all the facts that I have to memorise and converted them using all the current tunes. (R5)

To help me memorize and remember facts of the subject, I have written the foot notes in the form of song lyrics (R9)

"Song notes" was designed so it would be easier to remember facts. (R13)

To overcome the learning difficulties, the students used various learning style. From the findings, there are fifteen learning styles were listed. The common learning styles are the usage of different colours or symbols in notes and mind-mapping.

III. CONCLUSION

This case study was used to determine undergraduate students' learning style through multiple intelligence theory. There were 13 students involved in this study, which has been selected randomly. The study used an interview method where the questions are related to the students.

Three aspects of learning problems were examined in this study. These three aspects were the learning difficulties related to external factors, the internal factors and the creative learning methods used to overcome the learning difficulties. As for the learning difficulties related to external factors, all respondents adopted the difficulties which emphasize on subject factor and teacher factor. For the subject factor, many think that the subject was boring or they feel bored by the subject (Johnstone & Kellett, 1980). In addition, for the teacher factor, the respondents were not interested in the teaching approach (Shulman, 1986, p.9; Cornu, 1991).

As for the internal factors, most of the respondents reported that they have difficulties in memorizing (Johnstone & El-banna, 1986). About personal matter, Resnick (1987) found that some respondents lacked enthusiasm to study, felt burden or stressed in the learning process and were lack of confidence in their academic.

The third aspect examined was the creative learning method used by the respondents (Hartley, 1998). Learning styles are the ways in which individuals characteristically approach different learning tasks. Based on the findings, many respondents used different colours or symbols in their notes. This helps them to identify the keywords even more clearly. Furthermore, there were also many respondents used mind mapping when they were studying (Ackerman & Humphreys, 1990). It assisted them to remember the facts as well as train their brain for both left and right. Lastly, many of them were making songs from the notes which help in memorizing the facts thus helping to overcome their learning difficulties.

To be a better learner, one should first improve their linguistic skills by practice more on listening, speaking, reading and writing. Stories play an important role here. One can listen to stories, read stories aloud, tell stories and even write stories. Hence, learners need to know when and where to pay attention, and to what to pay attention.

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Developing Hardskill and Softskill for Improving Students Performance in Accounting Department at STIE PERBANAS SURABAYA

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Abstract—Universities are considered the educational institutions that are expected to have competent and qualified students, and especially the departments of accounting. Besides the skill of the discipline of science, soft skill is also important to acquire by the students. In fact, the university graduates are not ready yet for job placement. This study tries to reveal the hard skill and soft skill and their effect on the students' ic performance (GPR). It also tries to reveal the difference of the skills between the genders (male and female). This study is quantitative in which the data taken from questionnaires distributed to the students of the final semester: 63 male and 144 female. Data normality and validity with regression linear, as well as the t-test were conducted for data analysis. It was found that the students' soft skill is increased because it is induced by the culture building of soft skill in the college, STIE Perbanas Surabaya. These consist of responsibility, concern, emotional control, and team work. However, the development of the hard skill is not yet the priority due to the emphasis on report writing that must be done by them in finishing their accounting practice, this is considered obligatory. Therefore, this study is expected to make the accounting department and the college as well digests the hard skill again so that it can also improve the students' performance.

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Keywords—Hard skill, soft skill, performance

I. INTRODUCTION

The high quality of human resources has become the main demands for entering the global marketplace. Higher education (HE) as an institution that produces graduates should be able to meet such a demand. By having a good education; students are prepared to become qualified human resources, skillful to work in the future. So, they must be also able to compete in global markets. This also applies for students of accounting their future job. Accounting field in Indonesia is now considered one of the subjects which are much in demand. This is proved by the large number of students majoring in accounting at the university nowadays. The number of companies that begin making financial

statements, insist the accounting personnel that they need both derived from internal company or from outside the company called public accountants (auditors). According to journal of [1], the graduates of education do not currently have appropriate competencies as expected by the real work in the field. The graduates have only a diploma but do not have the competence.

Such a condition above shows that there is still a gap between education and the workplace. Therefore, universities must be able to produce graduates in accordance with user expectations. Competencies that are expected not only competence in accounting alone (hard skill), but also soft skill competencies. Graduates do not only have the skills the ability to prepare financial statements, but high discipline, communication skills, able to socialize with the environment, a high innovation and creative so as to meet the expectations of the parties concerned.

Besides the issue of gender in the recruitment of accounting staff, the soft skill is still a warm issue today. In any process of recruitment of accounting staff, almost all of the users of accounting personnel tend to consider gender of male and female. Results of research conducted by [2], [3], [4] show that gender issues in the field of accounting is still a critical consideration. The results also show that the competencies possessed by men and women are different. Based on the description above, the formulation of a problem that can be raised in the research is as the following. First, do hard skill and soft skill capabilities have a significant influence on the performance of students majoring in accounting? ; Second, are there any differences by different gender with hard skill and soft skill?

II. THEORITICAL FRAMEWORK

A research conducted [5] also revealed descriptions about soft skill and hard skill of the economics graduate students in Java with the respondents from college graduates. The results show that expectations of the graduates of the users have the response both to the hard skill or soft skill which is still quite low. According journal by [1] hard skill elements can be seen from thinking intelligence quotient (IQ) that have the ability to calculate the indicators, analyze, design, insight and vast knowledge, model making and being critical. In jornal by [1]

also states that hard skill is related to the enrichment theory that becomes the foundation of analysis or a decision. Hard skill can be gained by the students through integrated courses. Soft skill refers to indicators such as creativity, sensitivity, intuition, and others which are focused on the personal qualities behind a person's behavior (stated in [6]). It is a special ability that includes social interaction, technical and managerial skills. The students must have all those skills when entering the world of work [10]. In journal of [1], stated that soft skill is needed through the experience by the students so that they can be more mature. With such skill, they can be ready to work when they have graduated from their universities.

In the global era, all companies require qualified human resources not only cognitively but also spiritually and socially. This means that a technical skill is not enough for the students. They should be equipped with soft skills. These skills refer to a particular personality, social level, and language skills living habits, friendship, and optimism, the ability to work ethically, civility, cooperation, discipline and self-confidence and communication skill, stated in [10]. Beside, soft skill can also refer to adaptability, communication, leadership, decision making, problem solving, conflict resolution, etc. Last of all, it refers to the cluster of personality traits, social graces, and facility with language, personal habits, friendliness and optimism that mark people to varying degrees. Hard skill complements soft skill as well, in which they consists of the technical requirements of a job.

Next is performance. It can be defined as one's existence in contributing to the organization to achieve organizational goals as in [7]. It can succeed or fail based on an assessment contrary to certain criteria. In other words, performance is achieving the goal in running activities and it is generally a high level of competence in working. Having very high demands is not only imposed on hard skills and soft skills, but also a moral commitment as responsibility, seriousness, discipline and personal integrity. Reference [8] states that performance can be seen from several approaches e.g., the comparative approach to compare the performance of individuals working within individuals, assessing the attributes approach by looking at the attributes needed for company's success, such as by initiative, leadership, and competence, which assesses behavioral approach by looking at attitudes and behavior. It is an approach that assesses the results by looking at the output, or total quality approach which is a combination of attributes approach and results.

In connection with gender, research of [3] determined the gender bias in the determination of qualification of employees in accounting and finance in the recruitment process. It revealed that graduates who are recruited mostly tend to be accounting. Yet the requirements also entail gender matter, e.g., female and male consideration. Thus it is a specific job qualification related to gender. Similarly, research by [4] uses respondents not only the internal auditors but also external auditors. It shows that female auditors have higher ethics than male auditors.

Based on the theory described above, it can be figured out the following

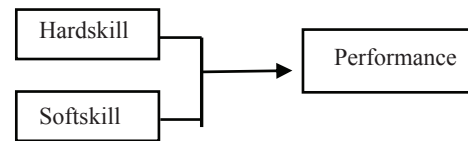


Fig. 1 Framework

The first hypothesis is that the students' hard skill and soft skill influence the students' performance significantly. The second hypothesis is that there is a difference between hard skill and soft skill in terms of gender for the students majoring in accounting

III. RESEARCH METHOD

This institutional research uses the students of graduate program (S1) of accounting as respondents. The place is at STIE Perbanas Surabaya. Tests were performed using a statistical test tools and test multiple linear regression t-test with different variables of soft skill and hard skill with the student performance (GPA). Hard skill is related to skills e.g., calculation, knowledge of new issues and accounting practice, transaction record, company systems and procedures, financial analysis, preparing financial statements, resolving accounting cases based on computer, and auditing.

Soft skill variables are the quality of individual such as responsibility, sociability, self-management, integrity or honesty. It also entails interpersonal skills such as: participating as a team member, educating others, serving clients, leadership, negotiation, working with cultural differences. The variable is the output or performance of the work has been done. This study measured the performance of students GPA, which is correlated to the hard skill and soft skill.

To simplify the tabulation process, the researchers use a Likert scale ranging from "strongly disagree" with a score of one to "strongly agree" with a score of five. The variables measured by this scale include hard skill and soft skill as independent variables. Interval classes and categories of assessment variables can be described that this employs questionnaire as done in the previous studies. The questionnaire is divided into two parts: 1) The first part of the list of statements about the identity of respondents, 2) and the second contains statements about hard skill and soft skill as shown in Table I.

TABLE I
VARIABLES AND INDICATORS

No.	Variables	Indicator
1.	Respondent identity	<ul style="list-style-type: none"> Name Reg No Sex Study program GPA

2.	<i>Hard skill</i>	<ul style="list-style-type: none"> ▪ Ability to calculate mathematically ▪ Knowledge of new issue ▪ Knowledge about practical ability of accounting ▪ Ability to record transaction ▪ Understanding system and procedure of a company ▪ Ability of financial analysis ▪ Ability to make financial statement ▪ Ability to solve cases in accounting ▪ Ability to arrange computerized financial statement ▪ Ability to audit financial statement
3.	<i>Soft skill</i>	<ul style="list-style-type: none"> ▪ responsibility ▪ self management ▪ sociable ▪ Integrity or honesty ▪ Participation as member ▪ Educate others ▪ Serve clients ▪ negotiation ▪ Work in different cultures

The population consists of the students majoring in accounting at Perbanas Surabaya. The sampling of this study is done by means of the techniques of probability sample retrieval method carried out on a systematic random (systematic random sampling). The data are then primary data obtained from questionnaires directly then tested by means of the validity by calculating the Product Moment correlation (r), of each item (item) with the total. The criteria is if the probability (p) r count $\leq a = 0.005$, it was concluded that the clause is valid. According to book of [9], an instrument is said to have excellent reliability in predicting a phenomenon that is measured when grouped instruments tested have a high alpha (α).

To simplify the calculation of test reliability correlation coefficient, then used SPSS ver. 11.0 for windows. How to test the reliability of the questionnaire in this studies the researchers use measurement approaches to calculate the interval consistency reliability coefficient alpha (α). These alpha coefficients are ranged between 0-1, if the alpha coefficient is < 0.6 , it indicates that the item measurements are not reliable. This study uses statistical regression testing tool with the following equation:

$$Y = a + b.X_1 + b.X_2 + \dots + e$$

Testing criteria:

If significance is $< \alpha$ (5%), then H_0 is rejected, meaning hard skill and soft skill have a significant influence on the performance of students majoring in accounting. If the significance is $> \alpha$ (5%), then H_0 failed to be rejected, meaning hard skill and soft skill do not have a significant influence on the performance of students majoring in accounting.

The test of the second hypothesis is done by looking at the difference in ability between hard skill and soft skill of the gender. This is by using a different test t-test. Testing criteria: If significance is $< \alpha$ (5%), then H_0 is rejected, meaning hard skill or soft skill among male and female respondents are different. Thus, when the significance is $> \alpha$ (5%), then H_0 failed is rejected, meaning hard skill and soft skill among male and female respondents and women are equal.

IV. RESULT AND DISCUSSION

The data collected consist of 207 respondents. When viewed from gender, it consists of 65 male respondents (30%) and 144 female respondents (70%) with the average of the GPA of 3.51. The description of the variables of hard skill shows that the average score is 3.13 with the highest score of 3.27 and lowest 2.95. It shows most students agree that the skills they got are built from the hard skill related to accounting practices which is a practical skill that should be owned by students majoring in accounting. Accounting practices as the capabilities that will lead to the core competition of students majoring in accounting. On the other hand, students majoring in accounting largely agree that hard skill is the ability to calculate without a calculator. Students still rely on calculators/ computers to help solve all the jobs/accounting practices.

The description of soft skill variables shows that the average score is 3.41 and the highest score of 3.57 and the lowest 3.15. It shows most of the students majoring in accounting agree that to be a competent, they should have responsibility for his work of accounting which requires a great responsibility. This is because the end result in accounting requires several other interested parties.

One-sample Kolmogorov Smirnov shows that the Kolmogorov Smirnov value is 0.759 and the significance value is 0.612. This proves that the data is normally distributed. Validity test results on 11 items of hard skill variable of 14 soft skill variables show that there is only one item statement of hard skill variable (H_1) is invalid, so it is not included in the subsequent reliability testing. Further results on variable of hard skill reliability test show the value of Cronbach's alpha is 0.88 and top soft skill variables show Cronbach's alpha value is 0.90. Cronbach's alpha value is above 0.60 and therefore, it indicates that it means a statement of variables and soft skill hard skill is reliable. The results of the model performed the F test shows a significance value of 0.021 under 0.050 which translates that the model is fit. The model form is as follows:

$$Y = 2.723 - A.0, b.0 + 019, 197$$

When seen from the results of the t test for each variable, it indicates that the significance value is 0.257 above 0.05, which means the variables of hard skill is 0.001 or it shows variable effects on the performance of students hard skill is only one percent, while 99 percent are influenced other variables. When viewed from the soft skill variables, it shows that the significance value is 0.006 under 0.05, which means

that soft skill variable has a significant effect on student performance. The magnitude of effect seen from the value of Adjusted R Square is 0.032 or 3.2 percent on soft skill variables influence student performance.

Based on the results above, it indicates that not all the variables previously are thought to have a significant influence on student performance. The following is a discussion for each variable. Hard skill is technical or practical skills that should be owned by students such as the ability to calculate, analyze, design, model making. When associated with the actual accounting field, hard skill ability should be higher as this to support the core competencies of students majoring in accounting. However, the results of this study indicate that student performance is not affected by hard skill. It is thought to correspond to that of students majoring in accounting, such as the following.

First, it is other variations that lead to student assessment to obtain the highest value, the value of the task, the paper, quiz grades, the soft skill, and test scores. The assessment of lecturers does not yet measure the actual student ability. It also has not measured the students' practical skills in solving accounting practices.

Second, the assessment of lecturers tends to be done in groups (the number of students that formed small groups and lecturers do not perform an independent assessment). It certainly has a positive impact on students because they have not measured the value of achievement of individual ability. Third, the increasingly widespread technology shows that a lot of information help students find solutions for their assignment and exercises. This will certainly reduce the practical ability/skills that are useful for the development of students themselves, e.g. numeracy, record, analyze and so on. Fourth, the problems presented in the classroom tend to be simple and partial so that it is considered easy by the students.

TABLE III
RESULTS OF STUDENTS COMPETENCY IN ODD SEMESTER 2010

Score of Section	Description	Mini mum	Maxi mum	Mean
1	Logical ability	0	75	31.61
2	Analytic and mathematic ability	20	80	54.76
3	Journal arrangement	0	80	27.91
4a	Basic price arrangement for production	10	100	55.76
4b	Arranging Income statement	0	196	60.45
Total Score		89	420	230.49

Therefore, the ability of students majoring in accounting is still in basic stage, which just understands the basic concept that has not reached the ability in resolving cases, analyzing or preparing financial statements. Fifth, the knowledge/insights

gained in the lectures by students have not focused on current issues. Students tend to use other sources to enrich the information/insight to the performance increase. The research was also supported by the results of competency tests for graduates majoring in accounting in the odd semester of 2010 with 158 students, as presented in Table II.

It indicates that the average ability of students' hard skill approaches the minimum value. It means the ability of students in the field of accounting with hard skill on average is still low. The low of students' hard skill is also supported by the teaching methods, teaching material delivered by lecturers who have not led to the practical ability of individual achievement. So, the performance of students whose average is above 3.51 could not be measured by the ability of individual hard skill, although the students hope that hard skill was instrumental in the achievement of their performance. This is evidenced by the average student perception associated with them in producing hard skill assessment is high enough. The soft skill and student performance are the elements of quality dealing with such as individual responsibility, sociability, self management, integrity or honesty as well as interpersonal skills such as: participating as a member of the team, serving clients, leadership training, the ability to negotiate, working with cultural differences.

The performance of students majoring in accounting who demonstrate high average (3.51) is affected by these soft skills. They are currently established in the classroom or campus environment through lectures and student extracurricular activities. It was found as the following. First of all, the attitude of having responsibility for each job submission can be demonstrated in terms of the discipline and accountability reports of activities. In addition, the attitude of caring for others is seen in the work assignment in groups or extracurricular activities which are carried out to help others. Finally, the habit of working as a team, respect the opinion of friends in the discussions, managing team members have become part of the lives of students majoring in accounting.

Next, it is the support by the academic community, especially in soft skill learning implemented in order to create a high capacity, although it increases student performance. In another case, the students' experience gained during internship/work specifically demands the ability of soft skill. This soft skill causes the students to think that the ability of a work culture should be improved. Furthermore, some activities at the campus that direct the students' activities to have good achievement of soft skills. For example, the soft skill can also be gained through the campus orientation called Harmony, although its contribution is still low.

The results of this study also support research by [5] showing that hard skill possessed by the students and graduates majoring in accounting is still low. However, the results of this study do not support research conducted by [1] which states that the competence taken from the subjects studied is actually able to measure student achievement in their hard skill. This proves that the competency from courses majoring in accounting has not been achieved. When viewed from the other side of the results of this study, it supports the

research conducted by [6] stating that the special skill outside the classes can increase students' performance. On the other hand, according to research of [1], soft skill can students experience their lives as a person that has the intuition and ability to work more effectively and efficiently.

The field of accounting is considered important in a company. The demand of such skill in the job is really high. Therefore, there must be changes in the accounting field so as to provide their personnel capabilities. The real job also demands that graduates of accounting department should have both hard skill and soft skill. However, the condition that exists in college still causes gaps between the colleges and the real world of accounting practices in the companies.

V. CONCLUSION

The conclusion of the research result are as follows, firstly, the students' performance is still heavily influenced by the presence of variations in teacher assessment component in the classes. These variations of assessment help students gain a better performance due to the soft skill points. Secondly, the increasingly widespread information technology is considered to help students to have understanding of all courses given to them but this does not lead to an increase in the practical skills of students, which is the ability to calculate, logic, compiling and analyzing financial reports in which all these are still low. Thirdly, the existence of student learning or activity carried out in groups can enhance the students' soft skill through teamwork, responsibility, communication, discipline, respect for others, etc. Yet, it does not increase the students' achievement of being independent so that it appears there have been no dominant individual skills. The fourth, the lecturers mostly emphasize on the learning process entailing hard skill but the hard skill of their students is below average. This implies that achievement of competence through courses is not yet optimal. Last of all, the soft skill oriented culture is deemed to have contribution develop the campus environment capable of forming a responsibility for the graduates' job field. Some soft skill possessed by individual students is considered to influence the result in better performance, although it is still coercive.

VI. LIMITATIONS OF RESEARCH

There are some limitations as depicted in this research results. For one thing, the difficulty of obtaining respondents especially from the graduate majoring in accounting because they are already working outside of town, difficult to contact, and so on. Beside, when distributing questionnaires, it was supposed to be not precise. Therefore, some were not returned. Finally, the research was only done by distributing questionnaires without exploring further information or in depth on the respondents because of time constraints by both researchers and respondents.

VII. SUGGESTIONS / RECOMENDATIONS

It is suggested that for further research, the researchers can develop the items as written in the questionnaires in depth to measure the students' actual ability. In addition, this study should be conducted in a survey focused on students and graduates for better generalization. For the institution, especially the place of this research, the study program can incorporate elements of other soft skills for the students Next is that the study program further enhances the review of the achievements of the course competencies. In this case, the college can test the competency of students' in particular hard skill in planned action and/or continuously.

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Opportunities and Challenges in Solid Waste Management

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Abstract-- The aim of this study is to determine the extent of implementation of Solid Waste Management at John B. Lacson Colleges Foundation based on the implementing guidelines of Republic Act 9003 or the Ecological Solid Waste Management in the Philippines of 2000. The guidelines cover the six (6) strategies such as Advocacy (Education and Information Campaign), Collection and Transfer of Solid Waste, Waste Reduction, Composting and Recycling, Solid Waste Handling and Final Disposition assessed by the students. This study employs descriptive-correlational method of research. The respondents of the study were the 347 students of JBLCF, during the academic year 2010-2011, who were randomly selected from different year level using Raosoft Sample Size Online Calculator. The findings showed that according to first, second and third year student's assessment on the implementation of the Solid Waste Management is more than half-way implemented with an obtained, weighted mean of 3.9, 4.1 and 4.1 respectively. On the other hand, the fourth year obtained a weighted mean of 4.33, interpreted as fully implemented. Generally, the extent of implementation of the six (6) strategies showed a weighted mean of 3.5, interpreted as more than half-way implemented. Further, the findings showed that there is no significant difference in the implementation of the Solid Waste Management Program in terms of its strategies as assessed by four different year levels. It is recommended further that there should be a conduct of evaluation after three years prior to this study to determine the efficiency and effectiveness of the Solid Waste Management Program.

Keywords: Solid Waste Management, Waste Management, JBLCF

I. INTRODUCTION

Solid waste is an environmental, technical and administrative problem in most cities with continued growing population. This complex task is still carried out with insufficient statutory, institutional, organizational, technical and social context (Palabyik, 2002). There is no great need of participatory and applicable management practices in implementing a sound Solid Waste Management Program.

Solid waste management system involves technologies, processes and operations dealing with waste generation, storage, collection, transport, treatment and disposal. One side of the problem pertains to the volume of waste segregation at various sources and the manner of segregation and storage.

There are three main concerns in solid waste management and waste resource recovery. One is the magnitude of the problem of waste generation, collection and disposal; the second pertains to the prospects of recovering resources from waste discarded by its original user; and the third raises the imperative for lifestyle changes – in values, attitudes, and

behaviors at the center of human activity. Considerably, changing attitudes and behavior has contributed to the rising volume of wastes.

In accordance with Republic Act 9003 or the “Ecological Solid Waste Management in the Philippines of 2000”, the public is advised to promote environmental awareness and action among others. RA 9003 mandates the creation of necessary institutional mechanisms and incentives, declaring certain acts prohibited and sanctions for any violations be implemented.

Instilling the importance of waste management is feasible through education. Teaching the people regarding the unprecedented scale and speed of environmental pollution and degradation and how they can and are going to contribute in enhancing the environment's present condition is imperative.

Waste management in JBLCF is one of the most serious concerns of the institution. As a maritime school, it is firm in its Environmental Protection advocacy. The intensive implementation of waste management is in progress, thus monitoring and evaluation of the program is of the essence as basis for continuous improvement based on the mandates of RA 9003. This principle requires a long, hard second look on the implementation of the strategies devised by JBLCF which is meant to bring an end to the perennial garbage problems. Hence, this study was conducted.

A. Research Objective

This study aimed to find out the extent of implementation of Solid Waste Management at JBLCF, based on the implementing guidelines of Republic Act (RA) 9003 or the Ecological Solid Waste Management Act and determine the opportunities and challenges for continuous improvement. Moreover, it sought to answer the following questions:

1. What is the extent of implementation of Solid Waste Management when categorized according to strategies at JBLCF as assessed by the maritime students when grouped according to year level?
2. Is there a significant difference in the extent of implementation of solid waste management at JBLCF as assessed by the maritime students when grouped according to year level?
3. What insights reveal in the opportunities and challenges in solid waste management?

B. Hypothesis

There are no significant differences in the extent of implementation of Solid Waste Management (SWM) as assessed by the maritime students when grouped according to year level.

C. Theoretical/Conceptual Framework

This study is anchored with the “Solid Waste Disposal Act of 1965”. In its original form, it was a broad attempt to address the solid waste problems confronting the nation through a series of research projects, investigations, experiments, training, demonstrations, surveys and studies. The decade following its passage revealed that the SWDA was not sufficiently structured to resolve the growing mountain of waste disposal issues facing the country. As a result, significant amendments were made to the act with the passage of the Resource Conservation and Recovery Act of 1976 (RCRA).

Besides the RCRA, the SWDA has been significantly amended by the Hazardous and Solid Waste Amendments of 1984 (HSWA) and the Federal Facilities Compliance of 1992 (FFCA). This change was congress’s response to the Supreme Court ruling in *Doe V. Ohio* (1992), and required federal facilities to pay fines and penalties for violations of hazardous and solid waste requirements.

This study is guided by the concept and guidelines on the proper implementation of solid waste management program as stated in Republic Act (RA) 9003 or the Philippine Ecological Waste Management Act, signed as law on January 26, 2001. This defines ecological waste management as “the systematic administration of activities which provide segregation at source, segregated transportation, storage, transfer, processing, treatment and disposal of solid waste and all other waste management activities which do not harm the environment.”

There are several environmental laws on solid waste management foremost among which is the “Philippine Environment Code” or Presidential Decree No. 1152. This Code provides for the enforcement and guidelines relative to waste management. It gives the Department of Local Government and Community Development the task of promulgating guidelines for the formation and establishment of waste management programs. Further, it mandates each local government unit to provide measures to facilitate the collection, transportation, processing and disposal of waste within its jurisdiction in coordination with other government agencies concerned. The methods of solid and liquid waste disposal are likewise provided.

Several studies on technological solutions to solid waste problems have already been undertaken, but these attempts have proven to be unsuccessful due to the lack of solutions for the sociological dimensions of the problem (Dela Peña, 2003). Recent developments in waste management have emphasized the importance of people participation through educational institutions in waste management endeavors in order to ensure the success and sustainability of such programs.

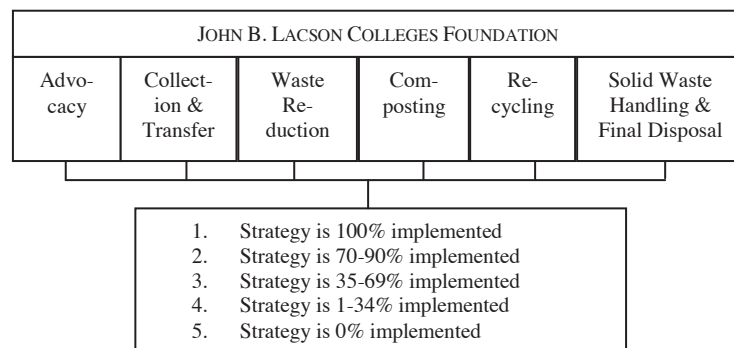
This willingness to participate was, however, influenced equally by the administrative interventions, which served to convert their willingness to participate into action through institutional policy of enforcement and support mechanisms for the solid waste management program of the community. Environmental and social responsibility as an advocacy of educational institution drives more to be proactive and more environmentally-concerned and tend to have a higher awareness, a more positive perception, and a more positive attitude toward solid waste management and the activities attached to it.

In response to the social responsibility of the College, it continuously charts its course as an educational organization through the most appropriate and well executed solid waste management plan. It is keen in holding on to its best experiences, norms and practices which characterizes its corporate entity and sharing these not only its own people but with the rest of the local and global communities.

In its intense propensity for continuous improvement, the school took its initiative to seek certification under ISO 14001, in order to in- place an effective Environmental Management System (EMS).

As shown in the schematic diagram of the conceptual framework, the different variables in the study was assessed.

Various strategies in the implementation of SWM in the school campus is given due consideration. This is the actual involvement of the students and employees in the efficient management of waste, thus contributing in the ecological balance of the environment.



D. Significance of the Study

This study is conducted to determine the extent to which solid waste management is implemented inside the school campus. The data gathered in this study may have a significant impact in promoting solid waste management in the campus and provide an avenue for students to internalize the culture of proper waste management. This is very vital in the practice of their profession onboard and in promoting a healthy environment on the high seas and on solid grounds.

II. REVIEW OF RELATED LITERATURE

Environmental scientist have set out a waste management protocol that defines the disposal methods that benefit the environment. Their protocol declares the following: reduce, reuse, recycle, compost, bury, and burn. The most effective

way to decrease the amount of trash is to reduce the amount produced in the first place. The second most effective way is to reuse materials. These actions would lengthen the useable lives of landfills and lessen the load on incinerators. Some ways to reduce consumption include: reducing the amount of packaging; reducing the number of individual packages; using less material to make a product and buying only what you can consume. Reusing materials multiple times or for another purpose can also save on solid wastes. Some example of these include: reusing newsprint as a paper towel to clean items and soak up liquids; refilling a water bottle rather than buying a new one; using reusable cloth napkins instead of paper as scratch paper, and reusing grocery bags for garbage collection (http://www.eoearth.org/article/AP_Environmental_Science_Chapter17-Solid_Waste).

With regards to solid waste, in the study “Assessment of Solid Waste Management in Liberia”, one of the key factors necessary to ensure the success of the sustainable waste management initiatives, is the involvement of the civil society. This would mean enhancing the communities’ contribution to the operational processes; strengthening educational programmes on waste-health related issues at school, and examining the proper role of women within the waste management sector. Such a large-scale public awareness campaign could go through multiple channels, including: to use the media and talk-show programmes to diffuse the information to better waste management practices; to install information boards on roads; to conduct an education campaign on waste management and related health issues in school (best sanitary practices, safe handling of human and household domestic waste); and to provide extra professional technical training to the staff organizing and operating waste management systems from public authorities (http://postconflict.unep.ch/publications/Liberia_waste.pdf).

Moreover, as explained in the study of Visvanathan and Glawe (2006), public awareness and public participation are major steps in effective implementation of the solid waste management system. Therefore, cooperation from the citizens is a vital aspect in managing solid wastes of a city. Habits and attitudes of inhabitants of a city largely affect waste management system. Therefore, environmental education from schools to develop the awareness of the general public becomes important. In addition, the community based organization is an essential element in ensuring the effectiveness of the solid waste management project in developing countries and increasing the likelihood of its sustainability.

(<http://www.faculty.ait.ac.th/visu/Prof%20Visu%27s%20CV/Conference/25/3R-MSWM.%20Visu.pdf>).

Furthermore, problems on solid waste management continue in urban cities in four Asian countries (China, India, Sri Lanka and Thailand) because waste collection service does not reach the entire population. This hampers the overall collection process as up to 50% of the trucks might not be working due to land of spare parts or continuous breakdown. Storage bins are either in short supply or collection is not adequate to cause spilling and littering about. There are

hardly any transfer stations, which can collect and handle the waste for systematic disposal. The basic problem emanates from the lack of technical expertise that is able to direct the MSW collection and transport systems (Visvanathan and Trankler, 2010).

On the part of the Philippines, the 1987 Philippine Constitution provides the basic legal framework for the protection and preservation of the country’s marine wealth with the ultimate control and ownership of its natural resources in its archipelago waters, territorial sea and exclusive economic zone. Likewise, the Philippines has numerous environmental policies, laws and regulations that prevent, abate, contain, control land and sea-based sources of pollution and conduct environmental monitoring programs to protect marine habitats and resources from marine pollution (<http://www.rsis.edu.sg/publications/workingpapers/wp182.pdf>).

Waste segregation at the household level is not widely practiced and waste recycling is minimal. Past efforts to promote waste segregation at source have failed despite the issuance of city and municipal ordinances providing for sanctions and penalties for non-compliance. Some reasons that have been cited for the non-compliance include: indifference of local residents to participate in community waste management-related activities, non allowance of local government services for segregated waste collection, attitude of the residents that government has the sole responsibility over garbage management and lack of information and education campaigns (Bennagen, et al., 2002). The survey results of the present study indicate that mandating households to segregate their wastes through local ordinances are important to promote compliance. In addition, it is necessary that the community residents are made aware of the benefits of waste segregation for them to engage in a waste management program. It is important too, that the problems in implementing waste segregation and resource recovery are considered when designing community programs. A major obstacle to the proper implementation of waste segregation is the unreliable and inappropriate garbage collection services provided by the LGUs. Segregated wastes are collected and dumped in the same garbage truck with all other wastes (Bennagen, et al., 2002).

The RA 9003 introduces measures to “merge environmental solid waste and providing schemes for waste volume reduction, resource recovery, recycling and reuse”. It goes beyond cleanliness and anti-littering programs to bring solid waste management into the home and workplace of every Filipino, and shifts 3R into a national strategy. To help the Philippine government effectively implement this law the NGOs like the Recycling Movement of the Philippines have popularized an approach they call Zero Waste Management – an “ecological method of handling wastes that facilitate their sanitary retrieval, reuse or recycling through a combination of techniques or procedures which aim at maximum, if not total, use of wastes into healthful, beneficial, productive and aesthetic purposes.” There are three basic steps to follow: segregation at source, labeling for efficient handling, and ecologically friendly use and disposal adopting

Many institutions/industries have also adopted solid waste management as priority areas for their members. They have mounted environment awareness sessions and seminars on solid waste management to help their member companies to design and implement environment programs and waste reduction programs that would also eventually reduce their operational costs (<http://www.eria.org/pdf/research/y2008/no6-1/Chapter8.pdf>).

III. RESEARCH METHODOLOGY

The descriptive-correlational research design was used in this investigation.

The respondents of the study were the 347 students of John B. Lacson Colleges Foundation, Bacolod City, during the academic year 2010-2011, randomly selected. The respondents of the study representatively taken from different year levels specifically, there were 149 from the first year; 110 from the second year; 77 from the third year; and 11 representatives from the fourth year college. Raosoft Sample Size Online Calculator was used to determine the sample size.

The researcher used the standardized survey questionnaire based on the implementing guidelines of R.A. 9003, and implemented through City Ordinance Number 18, series of 2005, hence, its validity and reliability were established.

SCALE FOR INTERPRETING THE EXTENT OF IMPLEMENTATION OF THE ECOLOGICAL SOLID WASTE MANAGEMENT (SWM)

Scale	Categorical Responses	Verbal Description
4.20 – 5.00	Full Implemented	Strategy is 100% implemented
3.40 – 4.19	More than half-way Implemented	Strategy is 70-90% implemented
2.60 – 3.39	About half-way Implemented	Strategy is 35-69% implemented
1.80 – 2.59	Less than half-way Implemented	Strategy is 1-34 % implemented
1.00 – 1.79	Not Implemented	Strategy is 0% implemented

The data gathered for the study were subjected to certain computerized statistics.

The frequencies were used to determine the distribution of respondents in terms of year level, the frequencies and percentage analysis were used.

For Problem number 1 which sought to determine the extent of implementation of SWMP, the mean was used.

Analysis of Variance (ANOVA) was employed to determine the significance of the differences in four-level categories. The significance was set at .05. For Problem number 2 which sought to find if there is significant difference in the extent of implementation of SWMP.

IV. RESULTS OF THE STUDY

The data gathered in this study were presented in tabular forms to provide a logical analysis and reliable interpretations, thereby providing accurate answers to the specific problems of this study. Conclusions were derived from the findings of this study.

A. Extent of Implementation of SWM Program in terms of Implementation of Strategies

The data in this part of the study were taken from the responses of the data-gathering instrument on the implementation of the strategies.

The responses were recorded, analyzed and interpreted in Table 2. These strategies are: 1) Advocacy or education and information campaign; 2) Collection and transfer of solid waste; 3) Waste reduction; 4) Composting; 5) Recycling; and 6) Solid waste handling and final disposal.

The average mean scores and the weighted mean of the strategies was computed via Statistical Package for Social Sciences (SPSS).

TABLE 2
EXTENT OF IMPLEMENTATION ACCORDING TO YEAR LEVEL

Year Level	Weighted Mean	Interpretation
1 st Year	3.9	More than half-way implemented
2 nd Year	4.1	More than half-way implemented
3 rd Year	4.1	More than half-way implemented
4 th Year	4.3	Fully Implemented
As a Whole	4.1	More than half-way implemented

As shown in Table 2 the obtained weighted mean of first year was 3.9 for second and third year 4.1 which is interpreted as more than half-way implemented. The obtained weighted mean of 4.3 which was evaluated by fourth year college interpreted as fully implemented. It can be noted from the statistical data that among the four (4) year levels, first year group had the lowest evaluation of the solid waste management practices, while the highest evaluation was rated by fourth year level. Further, analysis shows that the first year students being neophytes and in the transition period have lesser experiences in the waste management in the school environment, compared with the 2nd, third and fourth year. This implies that deployment of strategies involving all the first year students in waste management practices was not fully implemented.

TABLE 3
EXTENT OF IMPLEMENTATION ACCORDING TO STRATEGIES

Strategy	Strategies of the Plan	Weighted Mean	Interpretation
1	Advocacy	4.7	Fully Implemented
2	Collection and Transfer	4.3	Fully Implemented
3	Waste reduction	3.4	More than half-way implemented
4	Composting	4.2	More than half-way implemented
5	Recycling	4.6	Fully Implemented
6	Handling and Final Disposal	3.5	More than half-way implemented

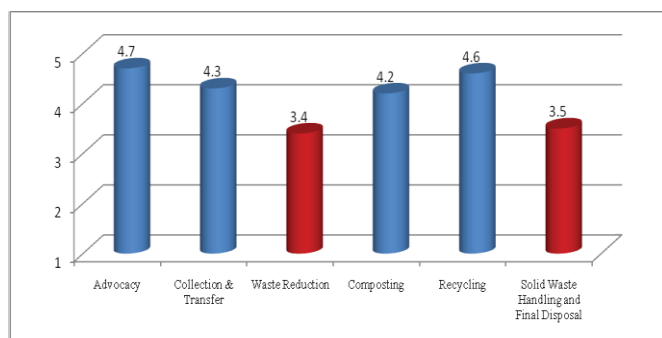


Fig. 1 Graphical Presentation of the Extent of Implementation According to Strategies

The finding shows that among the six (6) strategies, waste reduction has the lowest mean for the extent of implementation as assessed by the students from first year to fourth year. This implies that this area needs improvement as to the intensity of implementation.

B. Significant Difference on the Extent of Implementation of Solid Waste Management when the respondents were grouped according to Year Level

The differences in the assessment among the four levels were determined by getting the variances in terms of implementation of the plan strategies. These variances were then subjected to F-test to determine the presence or absence of significance via Statistical Package for Social Sciences (SPSS). It should be noted that the Analysis of Variances is the analysis of all the variances among groups and within each group. Hence, F-tests is computed as the quotient of Mean-Squares among groups and Mean-Squares within groups.

Table 3 showed the probability value $p = .471 > .05$; $F_{(3,343)} = .842$; $M^2_{(BG)} = .223$; $M^2_{(WG)} = .265$. The null hypothesis based on this finding denied the existence of significant differences in the assessment among the various year levels as to the implementation of strategies and was therefore not rejected. The findings signified that all students have similar observation on the manner and practices in the implementation of the different strategies of the Solid Waste Management Program.

C. Qualitative analysis on the opportunities and challenges of Solid Waste Management is presented by themes captured from the insights of the participants during the interview.

OPPORTUNITIES

“Vast Area is an Ideal Environment”

The wide area of the campus (8 hectares) can easily accommodate composting of bio-degradable garbage. The scheme will produce compost which is an organic fertilizer. This will be used to fertilize ornamental plants in the school's landscape, or can be marketed to farmers in the nearby communities.

“Belief in the Mind and Demonstrated by the Body through Curricular Training”

The school curriculum has environmental protection related subjects such as: Marine Pollution (MARPOL), and the sciences. These subjects complement the awareness and advocacy among students, staff and faculty on the importance of solid waste management to our environment. The integration of this topic on these subjects as part of the instruction guide is utmost desirable.

“Institutional Agenda is the Pillar of Extensive Implementation”

The school advocacy and program on solid waste management can extend even outside the campus like the adjacent communities in the vicinity of the school and to adopted communities.

To sum it all, doing its own effort of promoting and implementing solid waste management is the institution's share of contributing to the attainment of national goals to protect the environment.

CHALLENGES

“Enculturation and Acculturation is of the Essence in Waste Management”

Changing the mindset of a great number of students, faculty and staff on the importance of practicing proper waste disposal, segregation, recycling and waste reduction is a big challenge. The sustainability of the program is anchored on the persuasiveness of the people spearheading the implementation and the attitudes of the problem participating in the program. Implementation, monitoring and evaluation of the program should address the “undesirable attitude” a factor which is the main cause of failures for most projects similar to this one. The attitudes and practices of people in the surrounding communities towards garbage disposal affects the program. Improper disposal of plastics for example in adjacent communities clogs water channels and might flood composting sites thus generating unsanitary flood water in the campus.

“Determination and Destination”

Initial investment on equipment, tools and supplies such as wood chipper, lime, garbage receptacles, material recovery facility shed, etc., requires a budget or chunk of the school's resource allocation.

The support of the City Government in the collection of residual garbage is a vital component that would reduce operating cost of the program. Else, JBLCF spends additional budget for private haulers to haul and dump residual garbage at approved dumpsite.

V. IMPLICATIONS OF THE STUDY

From the foregoing discussion on the results of the study, the following implications are established.

First, the experiences of the students in the implementation of Solid Waste Management Program is intensive, in such a way that it is implemented through a “learning by doing” principle. The daily practices in the interaction of proper waste disposal specifically in the classroom, is integrated in various subjects by Instructors. These exercises, formed part in the realization of the College Institutional Agenda and the initiative of the school in complying with the ISO 14:001.

A second implication of the study, is that the school, is the prime mover in its organized efforts for environmental education and the only tool for providing the students in today’s generation, an understanding of the consequences of their actions and behavior patterns in order to increase sensitivity and concern in the surroundings.

Analysis of the success in the internalization of the waste management culture is through curricular education which is centered on the translation of theory to practices. This study demonstrates a principle the experiential learning in waste management education. To mention a few, deploying color coded receptacles in strategic areas of the campus, contest on the reduce, reuse, recycle initiative, daily monitoring of trash per classroom, among others.

Finally, this study implies, that JBLCF as a maritime educational institution in the Philippines, has started in its long journey to foster attitudes, motivations and commitments with the students to manage their behavior and ecosystem in order to live sustainably.

V. CONCLUSIONS

The Solid Waste Management Program is more than half way implemented. This may be due to the fact that the different year levels in the college were well represented. Students were more observant as to the practices in Solid Waste Management in the campus.

As a whole, the extent of implementation of the six (6) strategies was rated more than half-way implemented. This is an indication that somehow the school is responding to its seventh (7th) institutional agenda which is social/environmental responsibility. Moreover, the students are slowly internalizing the values of protecting the environment through practicing the different strategies embodied in the SWM program. The result of this study will likewise provide the school community a valuable feedback as to the extent of implementation of the program.

The findings on SWM program as to the extent of implementation on its strategies showed that there is no significant difference of the different year levels of college students.

The prevailing concern articulated during the implementation of the program are: waste reduction, and transfer and disposal.

VI. RECOMMENDATIONS

Based on the findings and conclusions drawn, the following recommendations are presented:

1. The general findings of this study which showed that the extent of implementation of the SWM program was rated as either more than half-way or about fully implemented shows the need for a more focused, determined, and a stronger political will, in harnessing the capabilities, commitment, and cooperation of all concerned, (all admin. staff, faculty members, students, parents, visitors and other stakeholders).
2. A further study on the volume of uncollected and collected garbage; and the advantages in the reuse and recycling of solid waste from stakeholders point of view.
3. An impact evaluation to be conducted 3 years after this study to determine the efficiency and effectiveness of the SWM Program.

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Analysis of Community Service Implementation in Supporting the Growth of Micro and Small Enterprise

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Abstract— One of the role of a University as a Higher Education Institution is as the centre of research and development of science and technology. This is described in the three roles of Higher Education Institutions; those are education, research, and community service. The community service is a form of awareness of a university towards the community.

Training for micro and small enterprise entrepreneurs is one program of the community service in the University. The goals were to increase their knowledge in business through management trainings and to increase their capability in preparing financial reports. The business training provided them with business knowledge so that they would be able to run their business effectively. The reporting training provided them with the skill to prepare simple financial reporting, in hope that the reports would help them in joining any business development programs organized by the government and to help them in searching for financial funding for their business.

The prospect of food and beverages business of the micro and small enterprise entrepreneurs in the city was promising; they contributed to the non-oil and gas national industry growth for 34.35%, therefore, we included them in the trainings. This research analyzed the responses from the entrepreneurs regarding the trainings, to evaluate the outcome of the program, and to identify necessary training subjects. We observed the data from the questionnaire, and then analyze it using the descriptive method of analysis. The results would contribute to the continuance of this program.

Keywords: MSE Entrepreneurs, Social Responsibility, Community Service, Trainings, MSME.

I. INTRODUCTION

The attention towards the implementation of social responsibility is growing, not only in the social aspects, but also in increasing the level of life of the environment society. The University, as one kind of Higher Education Institutions in Indonesia, could take part in the implementation of this social responsibility through one of the three roles of the Higher Education Institution. The Indonesia Ministry of Education set three roles, which a Higher Education Institution should accomplished, those are the education, research, and community service. The social responsibility

activity could be one of the community service activities. The activity could be in the forms of trainings or development program for the micro, small and medium business. Those kinds of activities would be more valuable than engaging a short-term social activity such as donations or grants. The social responsibility activity should be comprehensive. It means there should be a shift from social activity (i.e.: donation/grant) to social responsibility activity, which focus on sustainable community development. If every companies make an effort toward the comprehensive approach in social responsibility activities, there would be a great contribution to the community development. The members of community who directly involved in social responsibility program would experience an increase in their wealth [10].

According to the government regulation [12], the social and environmental responsibility is a company's commitment to involve in the sustainable economic development and to increase the life and environment quality, which is useful for the company, local community, and society as a whole. The social responsibility is described as the commitment to do the business ethically, to operate legally, and to contribute to the economic system. Those acts would increase the quality of life of the employees and their families, local community and wider society [3]. According to Hopkins [5], Corporate Social Responsibility (CSR) related to ethical or responsible acts of a company toward its stakeholders and environment, in an acceptable manner. CSR includes a responsibility in economic sector in achieving better standard of life while maintaining the company's profitability.

The government regulation regarding the Cooperation Program of Government Enterprises toward the Small Business and Environment Development stated that the social responsibility activity could be in the forms of education fund, training, on the job training, marketing, promotion, and other things that related to the productivity of the "business partner" (the micro/small/medium enterprise which become the target of the program) [8]. According to the government regulation [11], every government enterprises have to involve in providing guidance and aids to the micro economic sector, cooperation, and community. Furthermore, the activities of social responsibility should involve the Micro, Small, and Medium Enterprise (MSME) to achieve the community development [14]. Although those regulations are restricted to

the government enterprises, the government is continuously developing the legal facility to spread the responsibility in implementing social responsibility to other parties. The effort is to realize the economic development goals based on the togetherness principle, efficiency, justice, sustainability, environmental insights, and independency. It also to maintain the balance of national economic progress and unity, in achieving the community wealth [4].

The definition of Micro and Small Enterprise (MSE) according to government regulation [13] is an independent economic productive business, managed by an individual or an entity that is not serve as a subsidiary and not as a branch of a medium or a large-scale business, with the sum of assets specified in the regulation.

The thriving MSEs in Indonesia means that the micro economic of the country is beginning to leap up. The government see it as a very good sign in accelerating the macro economic development. The government think that the MSE is a business which is able to widen the job vacancy, able to serve the community widely, and important in the process of distributing and increasing the community's income. It also accelerate the economic development. In the end, it will be a part of the national security through sustaining the national stability. The government realizes that the MSEs are becoming an important part of the national economic; therefore, they had to be given the primary chances: back up, protection, and chance to expand their business. To nurture the business condition in empowering the MSEs, the government had issued government regulation regarding the MSEs [13]. Article 5, section 7 stated that the central and regional governments should set regulations and policies regarding the fund, facilities, business information, partnership, business license, business opportunity, promotion, and institutional support for the MSEs. The industry and society should actively help to nourish the business climate in empowering the MSEs.

As a growing industry, the MSEs still face various hindrances. MSEs have to overcome internal problems such as production, marketing, human resources, design and technology, and also capital. External condition such as business climate, loan interest rate, and global competition are also a burden to them. To increase the opportunity, capability, and protection for the MSEs, the government had set a policy regarding the capital resources and development. However, the policy had not yet provided the MSEs with the protection for sustainable business and sufficient facility to enable them to grow. The central government need helps from the regional governments, the business industries, and the society to enable MSEs to grow sustainably and in synergy. The ways to empowered the MSEs are: 1) to nurture a business condition which support the entrepreneurship and 2) to build and develop the MSEs as a "business partner".

Therefore, the society social responsibility could improve the community wealth through providing training for the MSEs. In the end, a company that works on a consistent social responsibility program would evolve a sense of belonging in the local community regarding the presence of the company.

In the fast stream of social dynamics, the government roles would decrease, leaving the private sectors to become dominant parties in the development of the country [9].

In previous years, the government pushed the banking industry to facilitate the MSMEs in funding the business. The banking industry had to separate some percentage of funds to lend the MSMEs. The program ran quite well, but the spread of the lending programs were not quite fairly. Some of the small and medium industries enjoyed the program first; however, the micro industries are still having difficulties in borrowing money from banks. One of the major hindrances is that most of micro industry entrepreneurs do not know how to make an accountable financial report, not to mention tax report. Without a proper and accountable financial report, a bank could not lend the money, because they had to be responsible for the fund they lend. Preliminary survey to 30 MSE entrepreneurs in Bandung area revealed that 90% of them stated that the main problem which prevent them to expand was caused by the difficulties in getting capital fund from banks, and the primary factor was the lack of financial records of their business activities.

These phenomenon emerged and Widyatama University felt oblige to lend a hand to the surrounding community. In 2009, the Management Business Faculty arranged a series of program that involved the MSE entrepreneurs in Bandung City area. The program consisted of seminar and training for the MSEs. The training was part of the community service activity of the Research and Community Service Department. The training divided into two days; the first day theme was about entrepreneurship. Lecturers from Management Business Faculty carried out the trainings. Day two training was regarding how to prepare simple financial statements and tax report. The lecturers from the Economic (Accountancy) Faculty carried out the day two training. The purpose of the training was to aid them in managing their business effectively and to help them in preparing simple financial statements in order to open the chances for them to join any development programs held by the government. Through the training program, the MSE entrepreneurs would have a better attitude toward managing their business. They would be braver and more confident in managing the business, having a high motivation to develop their business, bolder in bearing the calculated risk, easier to be in harmony within the business group, and capable of using the opportunity [6].

In commensurate with the development of Bandung City as a tourism city, the food and beverage industries are having a fast increasing growth. The increasing rate of food consumption in 2010 were at the average of 10% to 15%. In the Ied'ul Fitr Season, the increase reached the number of 50%, with the sales up to Rp 100 trillion (approx. US\$10,000,000); whereas in Christmas and Year End Season, the growth reached 30%, which was equal to the sale of Rp50-60 trillion. In 2010 the increase of food and beverages industry was 10% with the sales at Rp 600 trillion, compare to 2009 which was at Rp 550 trillion [16]. Therefore, the Widyatama University targeted the MSME in food and beverage industries as the focus of the program.

The purpose of this research was to evaluate the community service program, which were the seminar and training for MSE entrepreneurs; and to analyze what kind of training that they expected to support their business. The result would be a valuable input for the next plan of similar trainings for them.

II. METHODOLOGY

We used survey method in this research. The survey method explained the correlation between certain variables from the sociology or psychology of the entire population [1] and question them in the form of written questionnaire. The object of the research was the implementation of training in the service community program carried out by Economic Faculty and Business and Management Faculty of Widyatama University. The sample taken was using accidental sampling from the population of participants of the training, which were 73 MSE entrepreneurs. There were 52 respondents answered the questionnaire; therefore, they were the sample of this research.

The variables were measured using Likert scale, with the scale value of 2, 1, 0, -1, and -2 [15] and it was the observation on the actual behavior [1]. The attitude variables towards the behavior were stated in 5 questions, consisted of the evaluation of the participants' behavior toward actual attitude in developing their business. The values of respond used were as follows:

2 = very much agree

1 = agree

0 = no opinion

-1 = do not agree

-2 = very much not agree

Those values reflected the respondents' opinion toward each of the statements in the questionnaire. The analysis technique used was the descriptive analysis, using SPSS ver.18.00 for the data processing.

III. FINDINGS AND DISCUSSION

The 52 respondents were the micro and small food and beverages industry entrepreneurs. Table 1 showed the answers from the respondents of some items questioned. From all the responds, we analyzed each items by calculating the proportion of the "agree" and "very much agree" answers. The proportion used to analyze it was the Likert scale intervals. The class interval of the 20 questions was 0.8. The score 2 was the maximum respond value; the score -2 was the minimum respond value, while the value of 5 was the sum of the class interval. The interval values of each items was in table 2. Table 3 showed the percentage of the "agree" and "very much agree" answers from the respondents on 19 items of the questions. Referring to table 2, table 3 showed that items regarding the social responsibility activity of the University have "no opinion" responds from the respondents, those were P1, P3, and P4. This indicated that the University did not well publicly announced the social responsibility activity, therefore the society did not aware of the implementation of it through the community service program. The responds for the ethical behavior reflected in the

community service program were mostly "agree", and so were the responds regarding the training for the SME entrepreneurs through the community service program (item number 5 through 15), except for item number 10, which answers were "no opinion". Item number 5 through 9 and item number 11 showed that the community service program was in commensurate with the objectives and the goals they expected before they took the training. The training was exercised by using the tutorial process. The training regarding the bookkeeping and management used modules, which were easily absorb by the participants. The responds for item 10 regarding the time of the training was "no opinion", because the University prepared the timetable considering the availability of the trainers and the needs of the participants. The responds of the impact of the trainings and the change of participants' attitude, which were questions number 12 to 19, were "agree". It meant that the training contributed to the development of self-capability of the entrepreneurs, in order to up grade their level of life. All responds regarding the business plan preparation (except item number 17), were "no opinion". This probably because the MSE entrepreneurs had not any preceded comprehension of how to prepare a business plan. This situation could become the reason for the University to give trainings regarding how to prepare a business plan.

TABLE 1.
THE COMPOSITION OF RESPONDENTS' RESPONDS

Item	Very much agree	Agree	No opinion	Do not agree	Very much not agree
Score	2	1	0	-1	-2
P1	4	13	12	23	0
P2	5	44	1	2	0
P3	7	10	19	16	0
P4	5	9	23	15	0
P5	15	34	3	0	0
P6	25	21	6	0	0
P7	20	26	5	1	0
P8	14	29	7	2	0
P9	15	29	2	7	0
P10	1	3	3	23	22
P11	6	32	7	7	0
PS12	12	31	7	2	0
PS13	28	23	1	0	0
PS14	28	18	6	0	0
PS15	27	21	4	0	0
PS16	19	24	5	4	0
PS17	3	4	11	27	7
PS18	21	31	0	0	0
PS19	21	28	1	1	1

TABLE 2
INTERVAL CLASS VALUE FOR EACH ITEM

-2	to	-1.2	=	Very much not agree
-1.21	to	-0.4	=	Do not agree
-0.41	to	0.4	=	No opinion
0.41	to	1.2	=	Agree
1.21	to	2	=	Very much agree

TABLE 3
COMPOSITION OF THE ANSWER
"VERY MUCH AGREE" AND "AGREE"

Item	Interval Value	Item	Interval Value	Item	Interval Value	Item	Interval Value
P1	0.33	P6	0.88	P11	0.73	PS16	0.83
P2	0.94	P7	0.88	PS12	0.83	PS17	0.13
P3	0.33	P8	0.83	PS13	0.98	PS18	1.00
P4	0.27	P9	0.85	PS14	0.88	PS19	0.94
P5	0.94	P10	0.08	PS15	0.92		

The evaluation of the community service program, which was the training for the MSE entrepreneurs, was then connected to the change of attitude of the participants in developing their business. These changes of attitudes showed by the increasing of motivation to work harder, increasing of self-confidence, increasing capability in developing the business, enabling them to have a network and taking opportunities. On the other side, the implementation they did after the training, which include the preparation of business plan and proposing credit fund to bank, were the indication that they were bolder in taking risks. It was also a form of success. They were able to get the fund to increase their productivity and therefore increasing the sales. Based on the data processed showed in table 4, the participants had implemented the knowledge they had got from the trainings. This was shown by the difference of attitude before and after the training. From the table we concluded that there was a significant difference in attitude changes of the participants before and after the training.

TABLE 4
ONE-SAMPLE TEST ON THE CHANGES OF ATTITUDE
BEFORE AND AFTER THE TRAINING

	Test Value = 0					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
PS_Before	57.778	72	.000	3.56164	3.4388	3.6845
PS_After	50.778	51	.000	4.19231	4.0266	4.3581

The implementation that the MSE Entrepreneurs had done included the recording of transaction or the bookkeeping, the preparation of business plan, the submission of funding proposal to bank and the success in obtaining fund from bank. The results of the implementation of those four aspects were shown in Table 5. There was a difference between the group of entrepreneurs of age >41 years (group 1) and the group of age 31-40 years (group 2) regarding the implementation. It turned out that the percentage of entrepreneurs of group 1 had done more implementation than had the entrepreneurs of group 2. It showed that the level of age contribute to the level of implementation. The result of data processing in Table 6 showed that there was a significant difference in implementing the knowledge from the training. We also divided the participants into two groups regarding the period of business, group 1 consisted of the participants with the

period of business of 1 to 5 years, and group 2 consisted of the participants with the period of business more than 5 years. It turned out that group 1 had done more implementation than group 2 (Table 5). The result showed that the longer the business had run the less was the motivation to develop the business. Table 7 showed there was a significant difference between the two groups regarding the level of implementation. Therefore, there was a correlation between the training provided for the participant with the changes of participants' attitude towards managing their business. Table 8 shown that there was a strong correlations between the training provided for the MSE entrepreneurs with their changes in attitude in implementing the knowledge from the training.

TABLE 5
THE IMPLEMENTATION BETWEEN GROUPS

Implementation	Entrepreneurs' age		Business period	
	>41 years	31-40 years	6-10 years	1-6 years
Bookkeeping	48%	35%	31%	52%
Business plan	8%	6%	13%	8%
Submit credit proposal	58%	42%	38%	62%
Obtain credit from bank	54%	40%	35%	60%

TABLE 6
ONE-SAMPLE TEST BASED ON PARTICIPANTS' AGE

	Test Value = 0					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
PS_31	34.631	21	.000	4.13636	3.8880	4.3848
PS_41	37.036	29	.000	4.23333	3.9996	4.4671

TABLE 7
ONE-SAMPLE TEST BASED ON BUSINESS PERIOD

	Test Value = 0					
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
PS_1_5	43.181	31	.000	4.21875	4.0195	4.4180
PS_6_10	27.667	19	.000	4.15000	3.8360	4.4640

TABLE 8
CORRELATIONS

		Training	Changes in Attitude
Trainings	Pearson Correlation	1	.603**
	Sig. (2-tailed)		.000
	N	52	52
Changes in attitude	Pearson Correlation	.603**	1
	Sig. (2-tailed)	.000	
	N	52	52

**. Correlation is significant at the 0.01 level (2-tailed).

The changes in attitude showed that the participants of the trainings wanted to develop their business in order to increase their level of life, not only for their-own sake but also for the sake of the employees. Based on the survey we did after the training, the MSE entrepreneurs had implemented the knowledge they had got from the training, although the implementation of the bookkeeping or the financial transaction recording was still in a simple way. On the other side, they tried to implement the management functions, which they studied from the training. They hoped it would increase their business performance, which would affect the increase of sales. From the survey, we gathered information that more or less they had been able to increase their business performance, although not in a significant amount, considering the tight competition of the business condition. From the 52 respondents, 60% of them stated that they had increase their sales less than 5%, 34% of them stated the increase reached 5% to 10%, and the remaining respondents stated the increase was 11% to 20%. They were expecting more trainings, especially regarding the tips and tricks in increasing the sales. There were 65% of respondents' stated that they need training regarding how to make a website, the marketing, and the business consultation; and 35% of them expecting the next training would be the computerized accounting and tax reporting. They wished that Widyatama University would continue to hold the trainings as a part of the community service program and to contribute more to the national economy development. Through this kind of social responsibility activity, the university politically could earn a social contract, which was a voluntary deal to realize the society's wealth. The society economic aspect would increase through the economic development while the institution aspect would increase through tutoring [6].

IV. CONCLUSION

The conclusion from this research was that through the training in the community service program, the university contributed to the development of MSE entrepreneurs' capability in increasing their level of life. From the result of the data processing, there was indication that the MSE entrepreneurs did not have enough capability in preparing their business plan. In fact, preparing business plan is a very important part to map the business path, so that they could develop the business in a more orderly way. This condition pushes the university to be prepared for the next community service training, that is focusing on the preparation of business plan.

The evaluation showed that there was a correlation between the community service program for the MSE entrepreneurs and the changes in their attitude to implement the knowledge in order to increase their business. The result of the evaluation showed that there was a significant change in attitudes before and after participating in the trainings, based on the ages of the entrepreneurs and the long period of their business. Group 1 consisted of entrepreneurs of age more than 41 years. They did more implementation of the knowledge

they got from the training into their business than group 2, which consisted of entrepreneurs of age between 31-40 years. Group 1 consisted of the 1 to 5 years of business period and group 2 consisted of entrepreneurs with the period of business of 6 to 10 years. It turned out that group 1 did more implementation towards their business than group 2. It showed that the entrepreneurs with shorter period of business had higher motivation to enlarge their business.

From all the discussions above, we concluded that there was a significant correlation between the training activity of the community service program and the implementation carried out by the participants, who were the MSE entrepreneurs. This was in accordance with the data processing, that there was a significant correlation between the training given to them and the changes of attitudes of the MSE entrepreneurs. Therefore, the training activity in the community service program contributed well enough to the MSE entrepreneurs, and they expected to get more continuous training, especially regarding the marketing and creating a website.

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The Development Concept of Service Quality at Student Affairs Department of Widyatama University Using Factor Analysis

Tezza Adriansyah Anwar and Ayuningtyas Yuli Hapsari

ABSTRACT

Student Affairs Department is one of the departments that relate directly to students in the extra-curricular activities service. The improvement of service quality to students is the major policy of this department. Continuous improvements are always done by the department both in terms of service facilities and service quality. However, such efforts are felt not optimal because there are still some complaints about the services that performed. Therefore, it is necessary to know the factors of service quality that should be addressed so that the improvement efforts could in line with the students' expectations.

The objective of this research is to find out factors that shaped the service quality concept. This research used exploratory method. The primary sample data took 115 student of Widyatama University as respondent. The scale used in this research is Likert scale which is later transformed into interval scale using Method of Successive Interval. Factor analysis is used to find out any factors that shaped the service quality concept in terms of services that provided by the Student Affair Department.

The results of this research proved that there are five factors that shaped service quality concept in Student Affair Department. Those five factors is called convenience, accuracy, accessibility, communication and attitude.

Keywords : Service quality, Factor Analysis, Student Affair Department.

INTRODUCTION

In business, the product or services provided, has strong relation with the quality offered by the company. Kotler defines that quality is all character from a product or services that influenced their ability to satisfy the stated or unstated needs [2].

Tjiptono also defines the same definition of service quality where service quality is concentrated in the effort to fulfill the customer needs and wants and accurate delivery to gain customer expectations [6]. So, the provided services have to fulfill and satisfy the customer needs.

Gronroos also defines service quality as a perceived judgment, resulting from an evaluation process where customers compare their expectations with the service they perceive to receive [1]. Wong also suggests that service quality issues can be split into technical quality (what is done) and functional quality (how it is done) [7].

The service quality issues are also faced by the Student Affair Department of Widyatama University (UTama), Bandung, Indonesia. UTama is one of well and respected private university in West Java, Indonesia. In its development UTama, primarily uses the tagline "Friendly Campus for Future Business Pro", the value that wants to be delivered to students as customers.

As consequences of the tagline, Student Affair Department as one of the Department in UTama that has direct relation with the student in terms of extracurricular activities and many others, tries to give the best services for the students. Continuous improvement has always been conducted to enhance student satisfaction.

The Improvement efforts do not seem in line with students' expectation. The indicator is that there are still some complaints from the student about the performed services.

Based on the descriptions above, the purpose of this research is to describe the development concept of service quality in terms of services provided by the Student Affair Department by using factor analysis. The results of this study are expected to contribute and to give additional useful information for Student Affair Department in conducting an innovation and service quality improvement.

Literature Review

The definition of service quality, concentrated their efforts on fulfilling customer needs and wants as well as accuracy of delivery to meet customer expectations [6]. And according to Wyckof as written in the [6]:

"Quality service is the expected level of excellence and control over the level of excellence to meet customer desires. In other words there are two factors that

affect the quality of services they are expected service and perceived service. If the services received or perceived as expected, then it will be perceived better service quality and satisfaction. If the services received exceed customer expectations, then the quality of service perceived as an ideal quality. Conversely, if the services received is lower than expected, then the perceived poor quality of services. Thus whether or not the quality of service is considered as good one depends on the ability of the service providers in fulfilling customer expectations consistently. "

Further Zeithaml and Bitner [8] argued that:

"Service quality is a focused evaluation that reflects the customer's perception of specific dimensions of service: tangibles, empathy, reliability, responsiveness, assurance."

Same with them, Lovelock [3] also says there are five dimensions of service quality, namely:

- Tangibles, including the company's physical facilities, equipment, performance personnel/employee, website and communication facilities.
- Empathy, including the ease in the relationship, good communication, and personal attention, and understanding of personnel / employees to the needs of customers (understanding the customer's) because the consumer is unique and special.
- Reliability, is the company's ability to provide services promised immediate, accurate, and satisfying (dependability). Besides this dimension also includes the consistency of performance so the company must also provide his services in a timely manner since the first moment (right at the first time).
- Responsiveness, including the willingness, preparedness and alertness of personnel / employees of companies in assisting and providing services needed by consumers to respond.
- Assurance, includes the knowledge, ability, skill, friendliness, courtesy, and honest and trustworthy attitude of the personnel / staff who are given when using the services of the company, free from danger, risk or doubt (competence, credibility, courtesy, and security).

In a study conducted by Berry, Parasuraman, and Zeithaml in 1993, they argued there are two levels of customer expectations on service, which is adequate service and desired service. Adequate service is a minimum service of performance level that can be accepted with no dissatisfaction impression [3]. They are based on estimates service about what that might be received and depending on the available alternatives. While the desire service is the level of service performance that customers expect to receive, which is a combination and expectation of what can and should be received [8]. These include two levels of explicit and implicit promise of service providers, the comments from word of mouth and past experiences of consumers within the company. If the performance is below of adequate service it will create the frustration and dissatisfaction, while if the performance exceeds the level of desired service it will make customers happy and surprise.

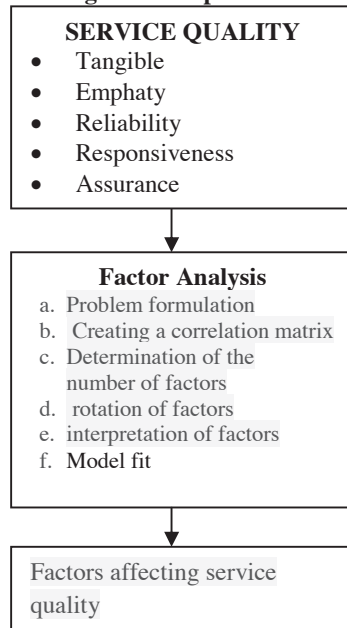
And then, the area between the two levels of expectation is called zone of tolerance. Lovelock [3] says that the zone of tolerance is the extent to which customers are willing to accept service delivery variation. In this zone the consumer not paying attention to the performance of services. This zone can expand and shrink depending on various factors such as competition, prices, interest and service attributes, and different for every individual, companies, situations and aspects of service [6].

In general, consumers will have less tolerance for services that are not reliable, like as not keeping appointments. Similarly, for the most important dimension of service then the consumer will be less tolerance and desired and adequate service levels will be higher. While the degree to which consumers anticipate to receive the so-called predicted service, which directly affects the adequate service.

RESEARCH MODEL

Based on the preceding literature, the research model for this study, shown in Figure 1, focuses on the factor that can influence the service quality.

Figure 1. Proposed Research Model



METHOD

Factor analysis is a technique for analyzing the interdependence of several variables simultaneously in order to simplify the form of the relationship between the variables studied to be a number of factors that fewer than the variables studied, which means it can also describe the data structure of one study [4].

The unit of analysis is the student of 2006-2010 Class. The restrictions on this respondent is the assumption that the students have felt the impact of the services offered by Student Affair Department that are expected to have had its own views on these services. The spread of respondents conducted in classes that have students with those forces. The research sampling is selected subjectively by the researchers of a population [5]. The reponndents are 115 people. The data collection was carried out by two techniques namely field research through questionnaires, interviews and observation, and library research.

RESULTS AND ANALYSIS

Descriptive statistics of the dimensions of service quality to be presented is the the average and standard deviation is a measure of trend data and data distribution. The average

value (mean) response data showed a tendency of respondents in each dimension of service quality indicators.

Table 1.
Descriptive Statistic of Service Quality Indicators

INDICATORS	MEAN	STANDARD DEVIATION	N
Room appearance of Student Affairs Department	3.4348	0.88981	115
Student Affairs Department room comfortness	3.4087	0.95418	115
Availability of information board/announcements for the necessary information	3.4174	0.83753	115
Ability to communicate with the staff of Student Affairs Department	3.0696	1.04059	115
Student needs and wants understood by the staff of Student Affair Department	3.4348	0.88981	115
The accuracy of the service provided by the Student Affair Department	3.4087	0.95418	115
Reliability of service provided by the Student Affair Department	3.8957	0.87232	115
Knowledge about University policies related to student services	3.7913	0.89340	115
Readiness services provided by staff of the Student Affair Department	3.4174	0.83753	115
The speed of service provided by the staff of Student Affair Department	3.8957	0.87232	115
Responsiveness services provided by staff of the Student Affairs Department	3.0609	1.07023	115
Ease to obtain services from the Student Affairs Department	3.4087	0.95418	115
Ease in obtaining information related to student welfare	3.4174	0.83753	115
Honesty staff of the Bureau of Student Affairs	3.0696	1.04059	115

Source: field data processing, August 2011

Indicators Correlation in Service Quality

From the calculation, the determinant value of 0.011 was obtained. Determinant of this figure is close to zero, It indicated that there is a correlation between the indicators. To determine whether factor analysis feasible or not, it is necessary to see the Kaiser-Meyer-Olkin measure of sampling adequacy was. Factor analysis is used if the value of KMO worth is greater than or equal to 0.5. From the calculation results, obtained KMO value of 0.751, this means taking a sample into the category of somewhat good/moderate is

according to the size classification accuracy of KMO by Subhas Sharma. While the Bartlett test of sphericity test showed that the value of chi square value of 492.391 while his table is 315, 749. Because Bartlett's test value is greater than table value, then this shows the correlation matrix tested is not an identity matrix so that it can be concluded that the correlation matrices tested had levels of inter-related indicators in the variable sufficient.

The testing of indicators of service quality variables are also made through the MSA approach to see if the indicator concerned feasible or processed using factor analysis should be considered for elimination. MSA has a sense of value equal to the value of KMO, was only partial (per item/indicator). If the item / indicator has a value of the MSA is smaller than 0.5, then the item is excluded from the selection of indicators.

Table 2.
MSA Value for Service Quality Indicators

INDIKATOR	MSA
Indicator 1	0,755
Indicator 2	0,842
Indicator 3	0,794
Indicator 4	0,674
Indicator 5	0,800
Indicator 6	0,763
Indicator 7	0,829
Indicator 8	0,657
Indicator 9	0,748
Indicator 10	0,834
Indicator 11	0,698
Indicator 12	0,755
Indicator 13	0,672
Indicator 14	0,636

Source: field data processing, August 2011

From the table above can be seen that all indicators which had MSA values greater than 0.5. Thus the 14 indicators of service quality variables declared eligible to participate in the subsequent factor analysis.

Table 3.
Value of Commonalities

	Initial	Extraction
tang1	1.000	.655
tang2	1.000	.657
tang3	1.000	.672
emph1	1.000	.696
emph2	1.000	.670
relia1	1.000	.562
relia2	1.000	.565
relia3	1.000	.778
respon1	1.000	.628
respon2	1.000	.635
respon3	1.000	.726

assu1	1.000	.688
assu2	1.000	.719
assu3	1.000	.775

Extraction Method: Principal Component Analysis.

Source: field data processing, August 2011

From the table can be interpreted things as follows:

1. Initial value is a variant of the variable prior to the extract. All the initial value is 1, this means that prior to extraction, the variable is 100% form factor, because prior to the extraction of factors is equal to the indicator. Thus, there are 14 factors.
2. Extraction value describes the percentage of variant of an indicator which can be explained by factors that will be formed. For indicator P1 (tangible indicator), the extraction is 0.655. This means that 65.5% of the variance of the indicators of P1 can be explained by factors that will be formed. Similarly so for 13 other indicators.
3. The greater the commonality value indicates the stronger relationship with the factors that will be formed. From the table can be seen that the highest value there is commonality in the three indicators of reliability of 0.778 which means that 77.8% of the variance of reliability indicators can be explained by three factors that will be formed.

Total Variance

Total variance explained table will be used to determine many factors that shape. Factors that are formed should have eigen values > 1. From the calculation results can be seen that there are five components that have a value of eigenvalues greater than 1. This means, the factors that will be formed in this factor analysis of five factors with a cumulative score of 67.331%. This means that 67.331% of all existing indicators can be explained by five factors that are formed.

Factor Rotation

The rotation of factors was carried out to show the distribution of indicators that have been extracted into the factors that have been formed based on its factor loadings after the rotation process. Terms used in the analysis of these factors are indicators that had factor loadings <0.4 are considered to have a weak contribution to the form factor and should be reduced from the formation factor [4].

Based on the results of the rotation matrix can be seen that all the indicators have a loading factor value is greater than 0.4. Results factoring into fourteen indicators based on the rotation matrix shown in the following table:

Table 4.
Result Factoring of The Service Quality Indicators

FACTOR	INDICATORS
Factor 1 (Convenience)	<ul style="list-style-type: none"> • Appearances room of Student Affair Department • Leisure room of Student Affair Department • Availability of information boards / announcements for the necessary information to students • Ease in obtaining information related to student welfare
Factor 2 (Accuracy)	<ul style="list-style-type: none"> • Accuracy of services provided by the Student Affair Department • Reliability of service provided by the Student Affair Department • Knowledge of the staff of Student Affair Department regarding university policies related to student services • Readiness services provided by staff of the Student Affair Department
Factor 3 (accessibility)	<ul style="list-style-type: none"> • Responsiveness of services provided by staff of the Student Affair Department • Easy to get service from the Student Affair Department
Factor 4 (communication)	<ul style="list-style-type: none"> • Communication ability of Staff of Student Affair Department • Speed of service provided by staff of the Student Affair Department
Factor 5 (attitude)	<ul style="list-style-type: none"> • Honesty of staff of Student Affair Department

Interpretation of Factor Analysis Results

From the results of factoring there are five factors that make up the concept of service quality in the services provided by the Student Affairs Department. The five factors in sequence were then called as factors:

- Factor 1 is the convenience. This capability includes appearances room of Student Affair Department, leisure room of Student Affair Department, availability of information boards / announcements for the necessary information to students, ease in obtaining information related to student welfare. In this factor, the Student Affair Department needs to create the convenience atmosphere in the services so the student as the customer could feel comfortable. Beside that, this convenience is needed to create in the sense of the availability of the information related to them.

- Factor 2 is accuracy. It is important to be noticed by Student Affair Department that in providing services to student, accuracy is one of the important thing for them. In gaining information from the department, they really need accuracy so it can reduce unnecessary effort. This includes accuracy of services provided by the Student Affair Department, reliability of service provided by the Student Affair Department, knowledge of the staff of Student Affair Department regarding university policies related to student services, readiness services provided by staff of the Student Affair Department.
- Factor 3 is accessibility. The accessibility is referred to responsiveness of services provided by staff of the Student Affair Department, and easy to get service from the Student Affair Department. An easy acces to get the services from the department is one of the things that they want. Not only easy acces, but they also need the prompt responsive action from the staff.
- Factor 4 is communication. This factor is referred to the communication ability and speed of service provided by staff of the Student Affair Department. In gaining service or information from the department, the student should receive brief information so they can clearly understand. But sometimes, bad communication skill from the staff becomes the barrier to the brief information.
- Factor 5 is attitude. It is important to be noticed by department that the attitude from the staff especially honest manner is one the thing that the student need.

Model Accuracy Test

To determine the accuracy of the model of the factors that form, the use of the test-accuracy based on the table reproduced correlation matrix. To determine this seen from the residual value (difference) between the reproduced correlation observed, in which a model is good if the difference is not more than 0.05 [4]. From the data have been processed can be seen that there is a 59% residual on a diagonal line that changed. This suggests that the model formed from the analysis of the factors that have been done otherwise not good enough because the change is above the 50%.

DISCUSSION AND MANAGERIAL IMPLICATIONS

From the results of the research found that the factors that shape the concept of service quality consists of the convenience factor, accuracy,

accessibility, communication and attitude. These factors are obtained after conducting research that is exploratory using factor analysis. The initial stage is carried out by distributing questionnaires to obtain primary data to be processed further. Before conducting factor analysis, first conducted a series of tests to ensure that factor analysis is an appropriate method to use. Preliminary test results prove that the proper factor analysis to proceed. From the test results of factor analysis, it appears that the factors mentioned above have a value of eigenvalues greater than 1, the following order (from largest to smallest) : 4,511 for convenience factor, 1,634 for accuracy factor, 1,217 for accessibility factor, 1,062 for communication factor, and 1,003 for attitude factor. When it was viewed from the eigenvalue, the convenience factor is the most dominant factor in formed the service quality concept.

- a. For department, although the results showed that the service quality concept has good responses from the respondents, but the department must continue to improve existing concepts.
- b. It is important to build a convenience atmosphere around the department not only in services term but also in physical term. To be comfortable, the student also need a representative room in terms of wider room, completed with air conditioner and many others. So they can enjoy while they are waiting for the services or when they get the services.
- c. It is important to have a good communication skill and quick response from the department staff. Because sometimes it becomes a barrier to provide an accurate service for the student. This accuracy also depends on the knowledge ability from the staff and the good attitude or manner of the staff when they were providing the services.
- d. Building a wider access is also required for the student to get the important information. On-line information could be built to provide broader and wider information for the student.

LIMITATIONS AND FUTURE RESEARCH DIRECTIONS

In interpreting the results, the limitations of the study have to be considered. First, the use of a specific student (i.e. student that active in student board) as the respondent is has become a limitation of this study. Future research should accommodate the other group of students that

are not active in student board, because, they are customers of Student Affair Department as well. Second, only small sample of respondents have been taken in this study. Future efforts should have a wider sample of respondent. This study need to be followed up by subsequent researchers using a more complete literature, and a longer time and using a sample of a wider and deeper study in order to produce better research. In addition, further studies could be conducted with the experiential marketing variabel.

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Students' Perception On Attraction And Service Satisfaction In STIE Perbanas Surabaya

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Abstract - The success of universities to get students attracted to register is due to their attracting power. When searching such factor, it will lead to the clues related to the universities' attracting power and service performance as has been provided for their students. This research attempts to explore the students' perception towards the factors of attracting power, services performance, and the priority of servicing. The population consists of STIE Perbanas students in which the sample taken was the students of graduate program of accounting and those of the graduate program of management of the year 2008-2010. The total sample is 200 students, taken by means of stratified random sampling. The data were gathered by questionnaires and the descriptive and multivariate statistics analysis is by factorial analysis. The students were requested to respond using their opinion on the attracting power of STIE Perbanas Surabaya College, including its service performance and services being prioritized. The parameter uses 17 indicators for the attracting power and 19 indicators for the service performance and services being prioritized. This research is expected to provide benefits for marketing improvement by the college in the future, as a study for service satisfaction aspect and especially evaluating the low-quality services. There are two basic factors of Perbanas College' attractiveness. They are the prospect of employment opportunities after graduation and Perbanas image in the community. The average values for each variable either importance or performance lies in quadrant II, which implies that these factors are very important and good service performance. There are some important things to ponder. The prospect of employment opportunities after graduation and image in the community college are considered an important consideration by the prospective students and parents to establish a university as a place of advanced study, supported by qualified lecturers, room facilities, curriculum offerings, programs of study according to specialization and building one's own.

Keywords: perception, attraction power, performance

I. INTRODUCTION

It is clear that the global era has an impact on business competition not to mention higher education (HE) recently. Therefore, many products and services that are considered in one category are trying to meet consumer needs. Such a condition makes the consumers become a very strong position because of the availability of many alternatives for meeting their needs. Beside, it also makes them confused because of having many choices. In addition, companies of both products and services are also continuously bombarding consumers with advertising and other forms of marketing communications, which are accompanied by claims and

promises. In general, consumers are willing to pay more for an item or service that is above the type of product or service because it is perceived to have more value than others.

The condition above has even penetrated the education sector, especially higher education (HE) as service institutions to their customers: their students. Recently, in Indonesia there is a phenomenon that there is a very tight competition among public universities with private colleges. This is indicated by the various efforts to attract prospective students. The impact of such competition is, on many colleges, especially private universities are experiencing a decrease in students in take. Thus, as the overall effect on the operations of private colleges has changed drastically. In addition to marketing communication efforts undertaken by universities, public awareness about the importance of HE today makes society more intelligent in choosing the institution that exists because the decision to continue and choose the educational institution is considered a long-term investment on human resources. The decisions of which colleges will be selected by the prospective student, as a potential customer, tend to be very interesting and also problematic. The decision to purchase involves decision-making process that starts from the recognition of needs, an investigation prior to purchase, develop alternatives, and determine the best option.

The alternatives to purchase goods or services could have followed the path of thinking and stages of making a decision. Yet, it is unusual thing to many consumers who make buying decisions without a careful planning or making a purchase spontaneously, irrationally, and even emotionally affected by some factors. These factors are such as the company's marketing effort or environmental influences social culture, with which the priority is no longer considering the precedence. But, whether determining the choice of college is just as the process of purchasing goods or services generally. Certainly, such decision requires a rational process to achieve possible objective, as it will result in long-term and is related to the great sacrifices such as it is made by starting from the time, preparation, funding, and the mental attitude of the students.

Since education is constrained by long-term investment, it means that consumers will be more rational in choosing a college and considering which ones will be selected. Such considerations involve many factors for example, places, college tuition, the availability of facilities and infrastructure, the lecture, accreditation, reputation is generally known as a good private universities, graduates have no difficulty in finding a job or absorption of graduates in the labor market,

and many other factors. STIE Perbanas Surabaya (A College of Banking and Business) is one of the private educational institutions that have engaged in the service of education by focusing especially on banking science. The last few years, this college has shown an increase in students in take during the admissions. Thus, it indicates that the public perception of Perbanas is quite good. Such an achievement is followed by the recognition from the government that gives the award in 2010. In this occasion Perbanas received an award from Kopertis (Private University Regional Coordinator) VII as a leading college of five non-university group. This college, in 2011, received an award from Kopertis VII as a superior college of non-university groups in the field of institutional, governance, research and community services, student affairs services. In same year, this college also received an award from Kopertis VII as a leading group of five universities of non-university field of institutional, governance, research and community services, and student affairs activities.

From the evidence above, Perbanas has got achievements with good the result of an effort and therefore it requires a sustainable effort and commitment from the academic society and stakeholders in the management, so as to provide optimal service to all the needs of the stakeholders. Perbanas has always tried to serve well all the needs of students, as also proved by the expectations of students in which they feel satisfied. This has an impact on establishing a good image towards Perbanas. Based on the tract of the best practices and experience above, the researcher in this occasion tries to reveal and identify the reasons and factors making the students remain choosing Perbanas Surabaya for their knowledge investment.

II. LITERATURE REVIEWS

A. Consumer Behavior and Decision Making.

It is assumed that a thorough understanding of consumer behavior is dealt with several things: that consumer behavior is essentially a complex process that includes a variety of activities, roles, and involvement of people in various circumstances of the influence of environmental factors. According to Schiffman and Kanuk [1], consumer behavior is the behavior which is defined as the consumers' display in searching for, purchasing, using, evaluating, and disposing of products and services they think they will satisfy their expected needs. Consumer behavior focuses on how individuals' make-decisions to spend their available resources (time, money, effort) on consumption related item.

According Ristiyanti and Ihalaaw [2], there are several things that can be expressed from the definition asserted by Schiffman and Kanuk. Consumer behavior is a process that consists of several stages (1) the acquisition phase (acquisition): find (searching) and buying (purchasing); (2) consumption phase (consumption): using (using) and evaluate (Evaluating), (3) post-purchase stage of the action (disposition): what is done by the consumer after the product is used or consumed. Decision-making process can be in view of the three distinct phases, but related to each other, ie the

input stage (input), stage of the process, and the output stage (output).

B. Understanding Perception

The term of perception is usually used to reveal perceptions about the experience of some objects or events by the customers. For that reason, perception is a process by which individuals organize and interpret their sensory impressions in order to give meaning to their environment, Robbins [3]. In addition, perception is a mental process that produces an image on the individual self, so it can recognize an object by specific memory associations on something both senses of sight, the sense of touch, and so forth which ultimately it creates an image that can be realized. Thus, perception is the process by which people select, organize, and interpret information to form a meaningful picture of the world, Kotler and Armstrong [4]. In this case, people can form different perceptions with the same stimulation as the three perceptual processes (related to sensory stimulation: selective attention, selective distortion and selective retention). In general, perception includes the acceptance of a stimulus (inputs), the organization of the stimulus and the translation or interpretation of the stimulus that has been organized in a way that can influence behavior and shape attitudes, so that people tend to interpret the behavior of others according to their own circumstances. Gibson [3].

C. Attractiveness of Higher Education.

Higher Education (HE) seems interesting to be studied in connection with its attractiveness and customers perceptions. It is related to the ability to attract attention (the audience) target that is their students. According Ramlan Ruvendi and Ismulyana Djan [5], HE attractiveness concerns all factors which the person decide whether to buy a product (in this context, to choose HE for their study). According to Bob Julius Onggo (in Ramlan Ruvendi and Ismulyana Djan,[5], there are two factors that determine the buying decision, namely: the first is a factor like or dislike to the seller. Similarly, colleges, stately buildings and air-conditioning alone are not sufficient to guarantee the good teaching and learning process. Not only is it an educational facility but also the facilities such as laboratories (computer, accounting, language, etc.), workshops, studios and a library indispensable to the success of students.

The HEs are not only required to make their students master the scientific insights, but also apply such insights in the real field. From various references or literature, it is known that the most determining factor in selecting is on the students' fundamental reason of being interested or attracted by their Hes. It is known that a person's decision to determine the choice often happen very quickly, even sometimes less than half a minute and is influenced by the factors of being like and trust. In a study reported that approximately 71% of the consumer's decision to buy a product based on the trust factor between the seller and prospective buyer. Pasaribu Baharuddin [6].

Suggest that development of a college most clearly is seen from the development of students. It's very important for

universities, because students are generally the primary source of university revenue sources, especially private colleges. From their college, the students intake can be said the factor that makes HEs sufficient to finance the operations of education, building, adding educational facilities, including paying the salaries of lecturers and employees. Hence, there is a tendency to explore college as much as possible of this potential; both in quality (increase building fees and tuition) and quantity (accept as many students).

D. Satisfaction Services

According to Kotler [7], "Satisfaction is a person's feeling of pleasure resulting from or disappointment comparing a product perceived in relations to his or her expectations." Customer satisfaction is the feeling of perceived performance of buyers of companies that meet their expectations. When viewed from the perspective of consumer behavior, customer satisfaction is considered something complex. The behavior after the purchase will lead to complacency or dissatisfaction by the consumer. Thus, the consumer satisfaction is a function of expectations of the buyer for the product or service with the perceived performance.

According to Tse and Wilton [8], it is stated that satisfaction or dissatisfaction of customers is the customer response to the evaluation of the perceived dissatisfaction between previous expectations and the actual performance of the product after its use and satisfaction. It is then a function of expectation and performance. For that reason, customer satisfaction is the result of evaluation of the sale and purchase of the selected alternative that delivers results, equal or exceeding the customer expectations.

III. RESEARCH METHODOLOGY

A. Draft of the Research

This research is considered descriptive research and also that of verifying. Therefore, the research method in this case is using survey, to get information from the majority of population or sample of respondents collected directly from the research setting empirically, with the aim to find the opinion of some populations of the studied object.

B. Research Subjects and Objects

The objects are composed of the pull-factor, and service satisfaction and aspects of interest. The subjects of this study were students of Perbanas College Surabaya with all the courses and the classes of 2008 to 2010 batch.

C. Variables and Operational Definition of Variables

The variables being studied are attractiveness and satisfaction service developed by Ruvendi and Ismulyana Djan [5] and Baharuddin Baharuddin [6] as well as several other factors that researchers adjust to the conditions. Also variables are gained from field observations and input from various parties. While the operational variables of the

attraction are a set of rational and emotional reasons, these are perceived differently by the attraction of other universities.

The attractiveness consists of factors to be considered as the basis for students to choose Perbanas with a number of indicators that is 17. The scale of measurement of these variables is by means of Likert scales used to measure attitudes, opinions, and perceptions of a person or group of people about social phenomena, Sugiyono [9]. Variable of service satisfaction is a set of services and resource factors that Perbanas College provides for the students and is rated as satisfaction with the number of indicators of 19. The response of each item indicating the factor of attractiveness (appeal), service satisfaction and importance is by means of Likert scale. This eventually has gradations from very positive to very negative and generally use five ratings for each answer ranges, i.e. 1-5. Figures 1 shows a not very good, and 5 showed very good.

The population in this study was students Perbanas college and samples in this study were students taking the courses in S1 (undergraduate) Accounting, Management S1, D3 (bachelor degree) and D3 (bachelor degree) of Accounting Banking of Batch 2008-2010 totaled 200 students. The sampling technique is by means of the method of Random Sampling Stratified. Data Collection Techniques and Procedures are as follows. Data collection is done by spreading the questionnaire, interview, and observation.

D. Analysis Method

Descriptive statistical analysis of the frequency distribution is done in order to obtain the number and percentage of the attractiveness presented. Multivariate statistical factor analysis I s by using SPSS software version 17.0. Thus, it can be reduced to a few factors. After this the calculation of the average scores of each variable is also done. Important factors and performance such as describing an average score of important variables and performances is done in importance and performance matrix.

IV. RESULT AND ANALYZIS

A. The Attractiveness of Perbanas College

There are two variables/factors of Perbanas basic attractiveness which is proportionally above 50% and approaching 50%, namely: (1) prospects for employment opportunities after graduation with the statement is "strongly considered" by 56%, (2) image of Perbanas College in the community with the statement is "strongly considered" by 49%. Responses by respondents who explained there are 15 variables factors Perbanas college's basic attractiveness is that that the proportion is less than 49% (1) room facilities is "reasonably considered" by 38%, (2) faculty qualifications is "considered" by 39%, (3) building self-owned "is considered" by 39%, (4) curriculum which is offered "considered" by 44%, (5) courses of study in accordance with the request "considered" by 41%, (6) strategic campus locations "are considered" by 34% (7) cheap tuition "is considered" by 38% (8) the registration of service" consideration "by 38% (9)

scholarships offered" considered "by 36% (10) team presentation in schools "consider" is 36%; (11) recommendation of a friend or family "reasonably considered" by 41% (12) information from the banner "considered" by 36% (13) leaflets / brochures received "consideration" by 38%; (14) ad / news Perbanas on television "considered" by 27% (15) locations close to the residence "considered" by 28%.

B. Satisfaction of Services

It is known that there are 11 variables/factors of Perbanas college's basic service of satisfaction that is above 50% i.e. (1) atmosphere of the lecture with the statement is "good" by 56% (2) the comfort of the lecture hall with the statement "good" by 59% , (3) section of the library with the statement is "good" by 55%, (4) the course material / lab with the statement "good" by 64%, (5) the presence of a lecturer with the statement "good" by 59%, (6) teaching techniques lecturer with the statement "good" by 55%; (7) elements of leadership with the statement "good" by 62% (8) lecturer guardian with the statement "good" by 58% (9) school facility with the statement "good" by 55 % (10) counseling and services supervisor with the statement "good" by 54% (11) e-learning with the statement "good" by 51%.

C. Factor of Interest

It is known that there are 7 variables/factors of Perbanas college's basic interests which is accounted for being above 50% i.e. (1) section of the library with the statement that it is "important" by 52.5% (2) the elements of leadership with the statement that it is "important" by 53, 5%, (3) school facilities with the statement "very important" by 54%, (4) building campus with the statement "very important" by 53.5%, (5) cheap tuition fees with the statement "very important" by 60% , (6) hotspots with the statement "very important" by 50.5%, and (7) ICT with the statement "important" by 50.5%.

D. Analysis of the Pull-Factor

In this case, all existing variables are seen to be clear (inter-dependent relationships between variables). Thus, it can produce exactly the grouping or abstraction of many variables to a few new variables or factors. Of the seventeen factors studied, it can be reduced to three factors, each of which has several sets of variables: Factor 1, i.e., there is a group of students who choose to enter Perbanas college because it is based on faculty qualifications, room facilities, curriculum offerings, Perbanas image in the community, the prospect of job opportunities after graduation, according to the study program and building one's own specialization. Therefore, the positive correlation of the value is, the greater the value of the variables the higher the interest is. Factor 2, which is a group of students who chose Perbanas College because of the team presentation to their schools, advertising or news on TV Perbanas, leaflets or brochures received for recommendations from friends or family and the registration service. Therefore, the positive correlation value is, the greater the value of the variables the higher the interest in Perbanas college is. Factor 3, which is a group of students

who chose Perbanas College because of the location, which is close to the residence, and the strategic location of the campus. Therefore, the positive correlation value is the greater the value of the variables the higher the interest in Perbanas college is. This can be demonstrated in Table 1.

TABLE. 1.
VARIABLES IN EACH FACTOR

Factor 1	Factor 2	Factor 3
Lecturer qualification	Marketing presentation in their high schools by marketing team	Location is close to their home
Room facilities	Advertisement and news	Strategic location of the campus
Curriculum offered	Leaflet/brochures	
Image of STIE Perbanas in the society	Friends and relative recommendation	
Prospect for job opportunity	Admission services	
Study Program suitable for them		
The campus building		

E. Service Satisfaction Analysis

Of the 200 questionnaires returned and after the analysis the average score of students' perceptions of service satisfaction can be seen in Table 2.

TABLE. 2.
AVERAGE SCORE OF STUDENTS' PERCEPTIONS OF SERVICE SATISFACTION

Factor	Average
Learning atmosphere	3,73
Class room convenience	3,925
Library availability	3,76
Library unit	3,67
Learning materials/ laboratory	3,78
Lecturer presence	3,755
Lecturer technical of teaching	3,765
Leaders Elements	3,785
Advisory lecturers	4,015
Student department	3,34
Academic administration	2,995
Finance department	3,075
Class Rooms	3,745
Campus building	3,52
Cheap school fee	2,91
Guidance and counselling	3,625
E-Learning	3,66
Hotspot	2,92
ICT	3,33
Total	67,305
Number of variables	19
Average score	3,54

F. Analysis of the factors of interest

Students' responses to the factors concerning the services concerned can be seen in Table 3.

TABLE 3.
FACTORS CONCERNING THE SERVICES CONCERNED

Factor	Average
Learning atmosphere	4,215
Class room convenience	4,34
Library availability	4,3
Library unit	4,025
Learning materials/ laboratory	4,27
Lecturer presence	4,225
Lecturer technical of teaching	4,305
Leaders	4,14
Advisory lecturers	4,2
Student unit	4,01
Academic administration	4,01
Class room	4,01
Lecture facilities	4,47
Campus building	4,39
Cheap fee	4,435
Guidance and counseling	4,245
E-Learning	4,28
Hotspot	4,32
ICT	4,14
Total	80,33
Number of variables	19
Average score	4,23

A. Important-Performance Analysis Matrix

If the performance of services by Perbanas college is associated with factors that necessitated by the student, it can use analytical Important-Performance Matrix as shown in the following image: The average score of Performance and Importance for all variables depicted by dotted lines on performance scores and scores Importance is 4.22 and 3.54 which falls in quadrant II, where students consider the factors analyzed which is "important" and performance in Perbanas college level of service is "good." So, this performance should be maintained and even enhanced to be close to the average importance. However, the average score of performance is still smaller than the respective scores importance by the students. Thus, Perbanas still can enhance its service with the advanced aspects of the value that is still low and they should maintain the existing high scores.

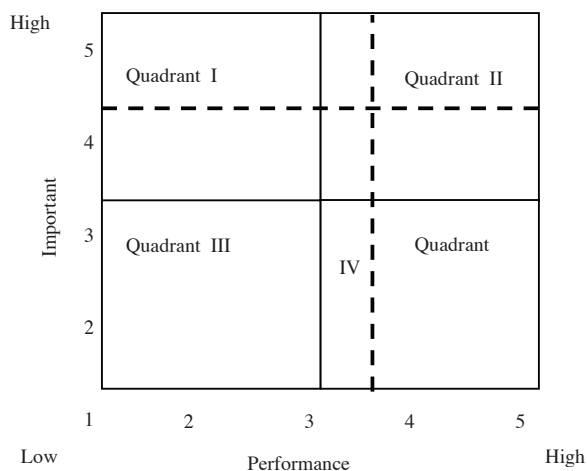


Fig. 1 Important-Performance Matrix

V. IMPLICATION

It is known clearly that students have positive perception. There are two main factors of Perbanas College' attractiveness. They are the prospect of employment opportunities after graduation and Perbanas image in the community. relationship between service satisfaction with level of interest reflected from the average values for each variable either importance or performance lies in quadrant II, which implies that these factors are very important and good service performance. In addition to factor analysis, there is a group of students who choose to enter Perbanas because it is based on the qualifications of faculty, room facilities, curriculum offerings, programs of study according to specialization and self-owned building. Therefore, it is important for universities in particular to have not developed a curriculum based on the needs of the workforce and continue to manage the link and match with the workforce and enhance the image in the community of the college.

VI. CONCLUSION

There are some important things to ponder. The prospect of employment opportunities after graduation and image in the community college are considered an important consideration by the prospective students and parents to establish a university as a place of advanced study, supported by qualified lecturers, room facilities, curriculum offerings, programs of study according to specialization and building one's own. In addition, it also provides added value to students by continuously improving service quality and can lead to pride in the learning process. For any institution, such as STIE Perbanas Surabaya, company's image and the prospect of job opportunities available for its graduate is the main selling point in designing the future marketing strategy. The relatively low quality of services, namely academic administration and hot spot, perceived by students need to improve continuously. The prospect of job opportunities available for graduate as well as good corporate image, academic administration, and hot spot will lead student, lectures, and staff to recommend the institution to prospective students and their parents.

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PACUCOA Level IV Accreditation of Marine Engineering Program: Response to Quality Education and Training in the Philippines

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Abstract— The study was conducted to capture the following objectives: (1) to discuss briefly the institutional profile and history of the school, and (2) to capture the accomplishments, achievements, and development brought about by the PACUCOA accreditation in the marine engineering program of John B. Lacson Foundation Maritime University (JBLFMU)-Molo, Iloilo City. The primary method of investigation for this study was case study design. This design focuses on the data analysis of one phenomenon, which the researcher selects to understand in depth regardless of the number of sites, participants or documents for a study and provides a detailed description and analysis of processes of themes voiced by participants in a particular situation (Macmillan & Schumacker, 1986). The quintessential characteristic of case studies is their holistic understanding of a phenomenon (Feagin, Orum & Sjöberg, 1990). The study focuses on the “Marine Engineering Program of JBLFMU-Molo” – the only marine engineering education that has straightforward stance in its pursuit of excellence in all facets of maritime training and education, creating culture of professionalism and humanistic approach through the process of accreditation. Data collection was done through the process of “case study” to look into the collective efforts of marine engineering students, faculty members, departmental heads, administration, stakeholders and partners to attain excellence in education through PACUCOA accreditation. This study showcases the significant imprints of PACUCOA accreditation in the pursuit of sustaining quality in maritime education and training, particularly in the Marine Engineering Program offered by the only maritime university in the Philippines – John B. Lacson Foundation Maritime University-Molo, Iloilo City.

Keywords— accreditation, marine engineering program, quality, maritime education, and training

I. INTRODUCTION

Accreditation is also the formal recognition of an educational program as possessing high level of quality or excellence based on the analysis of the merits of its

educational operations in attaining its objectives and its role in the community that it serves [1]. Accreditation is often defined as the act of granting credit or recognition to an educational institution that hopes to sustain appropriate standards for education. It is also a system used to determine if institutions of higher education meet acceptable levels of educational quality. With Philippine Association of Colleges and Universities Commission on Accreditation (PACUCOA) as an accrediting body, it is ensured that the institutions awarded accreditations have met the rigors of evaluation criteria measured through patented evaluation procedure.

Historically, accreditation is a practice that began with institutions of higher education in North America. It has also been a voluntary activity in which institutions hold themselves mutually accountable to agreed-upon standards of educational quality. Thus, schools invite an accrediting body and adopt a set of standards and procedures for evaluating the educational quality of schools accredited by that body. Traditionally, each school is evaluated according to the standards in a three-part process: (1) the school evaluates itself by conducting a self-survey; (2) a committee of peers from other accredited institutions visits the school to evaluate the institution and, on the basis of its findings, prepares a narrative report with recommendations to the accrediting body; (3) the accrediting body considers reports from the various accreditation committees and, in the context of the formally adopted standards, makes decisions about the accredited status of the schools. Accreditation, at its most basic level, is the practice of engaging these activities as a means by which autonomous institutions hold themselves and each other accountable to mutual understandings of educational and institutional quality.

The researcher highlights the role of accreditation in the development of certain academic organizations [2]. The study mentioned that: It is imperative that an institution undergoes

periodic evaluation through accreditation in order to address the two majors concerns such as (1) improvement of the quality of education, and (2) assurance to the public that institution has met established standards. The administrators believed that through accreditation, the school's curriculum is carefully tested and assessed based on certain standard.

Accreditation is basically a test for quality. Accreditation is designed primarily to encourage and assist the institution to evaluate itself objectively, and the accrediting body to validate the institution. It is an instrument of quality control [3].

II. STATEMENT OF THE PROBLEM

The present study was conducted to answer the following questions:

- (1) What is the institutional profile and history of the school?
- (2) What are the captured accomplishments, achievements, and development brought about by the PACUCOA Level 4 Accreditation in the marine engineering program of John B. Lacson Foundation Maritime University (JBLFMU)-Molo, Iloilo City?

III. METHODOLOGY

The primary method of investigation for this study was the case study. Case study design focused on the data analysis of one phenomenon, which the researcher selects to understand in depth regardless of the number of sites, participants or documents for a study and provides a detailed description and analysis of processes of themes voiced by participants in a particular situation [4]. The quintessential characteristic of case studies is their holistic understanding of a phenomenon [5]. The study focused on the "Marine Engineering Program of JBLFMU-Molo" – the only marine engineering education that has straightforward stance in its pursuit of excellence in all facets of maritime training and education, creating culture of professionalism and humanistic approach through the process of accreditation. Data collection was done through the process of "case study" to look into the collective efforts of marine engineering students, faculty members, departmental heads, administration, stakeholders and partners to attain excellence in education through PACUCOA accreditation [6].

IV. RESULTS AND DISCUSSION

The results and discussion focus on the following: (1) brief institutional profile and history of school, and (b) accomplishments, achievements, and developments brought about by the PACUCOA accreditation on the following areas such as: (a) philosophy and objectives, (b) faculty, (c) instruction, (d) library, (e) laboratories, (f) physical plant and facilities, (g) student personnel services, (h) social orientation and community involvement, (i) organization and administration.

A. JBLFMU-Molo Profile, History, and Achievements

As a higher learning institution and the only maritime university in the country, John B. Lacson Foundation Maritime University-Molo adheres to the objectives cited in this study. Through these objectives, the JBLFMU has achieved many recognitions and achievements such as the Full Autonomous Status given by CHED in 2001, accreditation by the Det Norske Veritas (DNV) an international accreditation group, and accredited by PACU-COA as Level 4 in Marine Engineering Program [7].

But still, JBLFMU-Molo has its own interwoven history as it grows and dreams of its future. The study of Alimen (1999) attests to the achievements that JBLFMU-Molo is enjoying all these years. To reiterate, this maritime institution has its humble beginning. In 1948, Captain Juan B. Lacson founded the Iloilo Maritime Academy (IMA), offering a course and review classes for Third Mate Licensure, for Merchant Marine Officers as well as reserved Naval Officers in the Philippine Navy. In 1964, the government granted the recognition for the second year of the two-year Associate of Marine Engineering. In 1976, the administration acquired a 3.6 hectare lot at M.H. del Pilar, Molo, Iloilo City which became the seat of the Marine Engineering Program. In 1984, the self-survey accreditation was started and in 1985, IMA was granted the status of a "foundation." In 1986, PACUCOA granted Levels I and II Accredited Status of the program. Basic computer subjects and acquisition of computer laboratory were accomplished. In 1992, the government granted the recognition for the two-year Certificate in Marine Engineering Course. The Norwegian International Shipregistry (NIS) was implemented. The government granted recognition for the three-year BS Mar-E (Marine Engineering) was in 1994. The Level II Re-Accredited status of BS Mar-E was granted and an enriched CHED Curriculum incorporating the IMO Model Course 7.02 and 7.04 were adopted. Within the same year, Level III Accredited Status was granted by PACUCOA. Preliminary Audit by the Norwegian Maritime Directorate was achieved. Quality Assurance Manuals were made and inclusion of Navigational Trip in the practical training of marine engineering students was observed. In 1996, the training of teachers for IMO Model Course 6.09 was done. In the year 2000, DNV certified the school for complying ISO 9001:1994 standard and government granted recognition of BS Mar-E for the compliance to the SCTW Requirements. In 2001, the PACUCOA granted the Marine Engineering Program the Level III Re-Accredited Status and CHED granted also the school the Full Autonomous Status. Engine Simulator Familiarization Course (IMO Model Course 2.07) was implemented to the BS Mar-E Faculty and students [8].

In February 2007, the school achieved the University Status as John B. Lacson Foundation Maritime University given by CHED.

At present, the Marine Engineering Program was attained the certificate from Bureau of Veritas and evaluated for the Level IV status by the PACUCOA Commissioners. [9].

B. Philosophy and Objectives of JBLFMU as a Maritime University

All units of the JBLFMU system adopt the same mission statement, viz; Quality maritime education through, Unrelenting quest for, Excellence for Sustained supply of global Technical manpower.

In this study, the researchers introduced some of the best features of the JBLFMU as maritime university. Firstly, the Vision of the JBLF System – the vision of the institution shall be the leading institution in quality education and training through Total Quality Assurance and shall be a major global supplier of competent, qualified, and morally upright professionals and leaders in loyal to God, country, and company. As socially responsible corporate citizen, JBLF shall advocate environmental and community concerns.

The mission of this university is inculcated in the hearts and minds of the faculty, students, and non-teaching staff as clearly stated below: Quality education and training through instruction, research, and extension, in its unrelenting quest for excellence as major global supplier of world-class technical and professional manpower. Furthermore, the succeeding discussions focused on the improvements, development, and innovations brought about by the PACUCOA accreditation.

C. Faculty

The general faculty members and allied instructors acquire their skills in educational research, test construction, analysis, and interpretation through the knowledge and experience they acquired in their graduate and post graduate studies while the marine engineers (professional instructors) learned these principles and methods from IMO (International Maritime Organization) Model Course 6.09 (Trainers Training) and Model Course 3.12 (Assessors' Training) in their day-to-day classroom activities. Faculty members are being sent to various seminars/workshops on textbook, workbook, module, and CBT (Computer-Based Teaching) making.

D. Instruction

The Marine Engineering Instruction at JBLFMU-Molo is closely implemented by the provisions required by PSG (Programs, Standards, and Guidelines) for Maritime Education in 2005 by CHED particularly in Marine Engineering Program, based on STCW (Standard, Training, Certification, and Watchkeeping) competency requirements, and on the use of ERS (Engine Room Simulator). The marine engineering teaching, learning, and activities are supported by

a competency-based instruction. In the different academic activities, seafarers' training are included such as Orientation on Tankering, Ship Security Awareness, Engine Room Simulator (ERS), Basic Safety Courses which includes Elementary First Aid (EFA), Personal Survival Technique (PST), Personal Safety and Social Responsibility (PSSR), Fire Prevention and Fire Fighting (FPFF). The teaching-learning activities of faculty members are supported by teaching devices such as workbooks, modules, CBTs (Computer-Based Teaching), and prototype to enhance students' learning to attain the desired outcomes. These learning materials are pilot tested, evaluated, revised, and re-tested before being used by the faculty members. Innovations in teaching-learning process are regularly evaluated through conduct of research studies to determine their effectiveness and impact to the academic performance of marine engineering students.

E. Library

With respect to Library resources, new and professional books are purchased by the administration based on the PSG requirements. Internet connection and facilities are improved.

F. Laboratories

The laboratory equipment and apparatuses are based on STCW 1995 standards. These apparatuses are calibrated, checked, and maintained for the skill-based competency assessment of AAO (Academic Assessment Office) and AAC (Academic Assessment Center).

G. Physical Plant and Facilities

With respect to the facilities and equipment, the following improvement were observed: (1) increase number of multimedia, (2) number of computers intended for the students was improved, (3) library books and Internet Center were enhanced, (4) laboratory apparatuses and equipment were purchased, (5) ventilation and classrooms were monitored, (6) simulator room was given importance, (7) different offices were repaired and improved.

H. Student Personnel Services

The vision of the marine engineering department to be a major supplier of competent, qualified and morally upright can be attained through the different services and programs of the Student Personnel Services (SPS). SPS is a support service of the marine engineering department for the development and enhancement of the marine engineering students' skills, attitudes, and knowledge needed for the job acquisition and retention. It also helps the marine engineering students to develop the ability and the competency as seafarers by creating industry linkages for onboard training, providing training and seminars to the students, and establishing partnership with shipping companies in terms of scholarship and placement opportunities.

I. Community Extension

The residents at the adopted barangays become responsible citizens to their environment and to their neighbors because of the learning and skills provided by the faculty members, students, and staff of the maritime university.

J. Organization and Administration

The Marine Engineering Department uses systemic organization and administration which is composed of the following: (a) Board of Trustees, (b) Members of Executive Council, (c) Administrator, Dean, Subject Area Heads, and Department Heads, (d) internal stakeholders, comprising of the students, faculty, and staff, (e) external stakeholders such as people in the maritime industry, shipping and manning agencies, regulatory bodies, alumni and parents.

V. CONCLUSION

This case study showcased the significant imprints of PACUCOA accreditation in the pursuit of sustaining quality in maritime education and training, particularly in the Marine Engineering Program offered by the only maritime university in the Philippines – John B. Lacson Foundation Maritime University-Molo, Iloilo City. As mentioned by one faculty

member on accreditation: “One best way to fully equip the university and the people behind it is to fully update themselves and maintain quality education.”

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The Sertec Legacy: What Were the Quality Assurance Practices Perceived to be Most Effectiveness in Former Technikons?

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ABSTRACT

Over the past decades the context in which higher education operates has changed considerably due to a number of factors such as the emergence of market tools of public policy, the rise of the new public management policy. Higher education institutions (HEIs) in many countries have taken up the challenge of assuring accountability and improving performance.

The study aimed to (a) identify key structures and best practices within internal quality assurance mechanisms used by the surveyed institutions, consequently, gaining a good understanding of what needed to be done in the institutions to promote and assure quality.

Conceptually, the study was looking at the extent to which self evaluation is being utilised and whether its practices do indeed assist the Universities of Technology in building its quality model. The study made use of a survey research designs and support it with the qualitative approach. The target population were all Universities of Technology in the Republic of South Africa. All academic heads of departments (HoDs) and quality assurance section, in this study referred to as Quality Assurance Managers (QAMs) in the four participating institutions, constituted the research sample. A researcher-designed questionnaire and an interview schedule were used to collect both quantitative and qualitative data. Hence, both primary and secondary data were collected. A structured is proposed of pertinent recommendations are made.

The study, therefore, looked at the state of readiness of these institutions as a result of their self evaluation as well as the process and procedures used in developing self evaluation. The thesis of the study was that Universities of Technology would exhibit a good state of readiness for the HEQC by way of established a well developed self evaluation which is prepared by a team of academics.

Keywords: quality assurance, best practice and quality leagacy

I. INTRODUCTION

Although the South African higher education (HE) system, as a whole, did not have a systematic and comprehensive system of QA, the technikon sector (now referred to as Universities of Technology) had a system of external QA in place from 1986. In the main, this took the form of

some professional Councils engaged in periodic QA in relation to professional programmes and qualifications (CHE, 2004: 143). As the CHE (Ibid: 144) further points out:

Approaches to quality differed between the university and the technikon sectors. In the university sector, the University Technikons Advisory Council (AUT) was responsible for the offering of new programmes by universities, and it used the criteria laid down in the NATED-02-116 to consider the structure and content of new programmes, as well as the suitability of the applying university to offer them. In practice, it tended to treat each university as a certification or QA body in its own right, as was in line with the growing autonomy which universities has achieved in apartheid years.

The situation with regard to the technikon sector (Universities of Technology) was appreciably different, both in structure and intent. The Certification Council for Technikon Education (SERTEC) came into existence by way of an Act of parliament (Act 88 of 1986) to:

ensure equal standards and to certify on that basis ... Furthermore, the SERTEC council had developed a view of the body's role as a quality monitoring one in addition to certification, focusing on programme accreditation via broad peer group evaluation and employing minimum, rather than equal, standards to satisfy employers and professional bodies. (CHE, 2004: 144).

It is in view of this background that this study sought to find out the extent to which Universities of Technology were already established, in terms of an enabling infrastructure to enhance QA. Such a state of readiness would enable these institutions to easily accommodate the incoming HEQC modalities which, broadly speaking, signalled requirements similar to those earlier spelled out by SERTEC – such as the adequacy of teaching / learning resources and facilities, staff qualifications, course content, research productivity, the fitness of and of purpose with regard to institutional aims, goals and strategic objectives. Within the aegis of institutional audits and programme reviews, the HEQC was also calling for self-evaluation reports as a critical step in QA.

RESEARCH PROBLEM

Accordingly, this study set out to critically examine whether or not the SERTEC experience had assisted Universities of Technology to develop and establish QA

mechanisms by the time the CHE modalities were kicking in, in the early 2000's.

Jacobs (1996: 64) argues that historically Technikons were not autonomous and they reported to the National Department of Education. Central control was the main problem. To attain some level of autonomy, the Committee of Technikon Principals felt that the Council would assist them. This was done within the process of benchmarking Technikon with Polytechnics in the United Kingdom. According to Jacobs (1996:5) the increasing external pressure for accountability in HE, required urgent attention to be placed on the internal quality assurance processed followed by all HEI's. A traditional system of external examiners or monitors; although necessary, was no longer sufficient as the only means of ensuring quality.

RESEARCH OBJECTIVE

The specific objective of this study was to establish whether or not:

- (a) there were identifiable best practices in the internal QA mechanisms of former technikons.

II. RESEARCH METHODS

This was a historical study, using questionnaires and interviews as the main data / information-collection approaches. Legacy and historical studies ensure that our history and past contributions in specific endeavours of life are remembered, and serve as building blocks for our future. As Hérubel (2008, 241) argues:

Historical research and scholarship are predicated upon continual activity and discovery, be it reformulation of previous historiographical concerns, emerging technical discoveries and innovations, or the discovery of new evidence.

It was also envisaged that within the "technikon" sector, one would possibly find the experience and expertise required for driving the new system being introduced (i.e. the CHE/HEQC), lying with people who had become accustomed to the ethos and practices of the SERTEC.

The target population were all former technikons in the Republic of South Africa. The research sample comprised six technikons selected on the basis of stratified random sampling based on the Provinces that had technikons at the time of the study. Stratified sampling was used to ensure appropriate representation across the provinces. All academic heads of departments (HoDs) and people responsible for quality assurance (in this study referred to as Quality Assurance Managers (QAMs) in the 6 participating institutions constituted the research sample.

A researcher-designed questionnaire and an interview schedule were used to collect both quantitative and qualitative data. Overall, the methods of study were designed in such a way as to persuade the respondents to supply the information that would assist the author in addressing the problem outlined above. A covering letter accompanied the questionnaires sent to the respondents, explaining the

context of the study and requesting the participation of the targeted respondents. Permission for data collection was requested and obtained from the participants.

III. RESULTS AND DISCUSSIONS

A summary of the major findings is presented below under the sub-headings corresponding to the themes of the research objectives.

Key criteria for best practices

The research objective concerned the identification of key structures and criteria in place for best practices within internal quality assurance mechanisms employed by the participating institutions. A number of factors were investigated in this regard, and the findings are presented below.

Translating institutional mission statements into quality service outcomes

The first key question in institutional self evaluation is normally to answer the question as to what the mission of the particular institution is. More specifically, this question endeavours to elicit information concerning the institution's medium and long-term strategic objectives and the appropriateness of these objectives to the overall developmental trajectory of the institution. Thus, it is a question of how the institution sees itself in its specific response to local, national and international challenges.

This question can be regarded as a central one: its answer defines the organization and the strategic decision-making ethos of the institution. The institution sets itself objectives and works towards achieving those objectives. The main focus in quality management is, therefore, to ascertain the extent to which the institution has put processes and procedures in place to pursue its own mission and objectives. In this regard, even external quality evaluation is relevant mainly in-so-far-as it assists the institution to further sharpen its mechanisms for attaining a higher level of success in addressing its mission and strategic objectives. As Jacobs (1996:67) observes, it should be the firm intention of the external quality provider to assist the HEI's in developing their internal quality mechanisms, with a view to eventually conducting voluntary quality monitoring by external peers, based on the HEI's Mission statement.

An introductory question was included in order to determine how many institutions had a mission statement. According to Strydom (2000:30), many academics were not aware of their institutions' mission statements or how to translate the institution's mission statement into quality service/output. This added further justification for the researcher to include the question on the mission statement so as to ascertain the extent to which these middle-management officials – charged with the task of promoting and assuring quality, interfaced with their institutions' mission statements. In this study, just over half of the respondents agreed (55%) that their programmes were in line with their institutional mission statements. The respondents believed that it was very important that the programme objectives were linked

to the institutional mission statement. They added that the external quality assessor should evaluate the institution according to what was stated in the mission statement.

The findings of this study on this issue was that the majority of the HOD's (66%) believed that they had appointed suitably qualified and competent lecturers as internal examiners, in line with SAQA requirements. The HOD's believed that this matter was adequately addressed initially in the academic planning stage when subjects were allocated to academics. However, 34% of the respondents reported that they did not necessarily take note of the qualifications of the internal examiners when they were appointed. If a person was appointed to teach a certain subject he/she would be appointed to act as examiner for that subject. This raises concern on whether the SAQA requirements were observed in all cases.

Key Structures and Best Practices

- Starting with the positions held by the Quality Assurance Managers (QAMs), as the main focal point for driving both quality promotion and quality assurance, most of the respondents reported that they held academic positions before they got appointed to their current positions. However, most of the incumbents' job descriptions spread their tentacles fairly broadly – i.e. they combined the responsibilities of QAM with many other responsibilities. Quite commonly, they found themselves dealing with strategic planning issues, academic development, as well as tasks related to organisational development – amongst other responsibilities. Two of the six institutions did not have permanent appointments for QAM.

IV. CONCLUSION

The above findings suggest that, generally, the former technikons had enabling QA infrastructures and environments for them to easily accommodate the incoming CHE / HEQC QA regime. However, some of the participating institutions were still grappling with the basics, such as appointment of dedicated staff to promote and monitor QA, and others. A robust movement of staff across the now integrated HE system, with a fair number of academic staff moving from the university sector to the technikon sector inevitably led to a degree of loss of the ethos and essence of technikon education – including its SERTEC tradition. It is possible therefore, that these movements may have diluted, to some degree, the strength of the SERTEC legacy in at least some of the participating institutions.

This study aimed to (a) identify key structures and best practices within internal quality assurance mechanisms used by South Africa's Universities of Technology. The findings has presented and discussed the major findings of the study with regard to this research objective.

V. RECOMMENDATIONS

The recommendation flowing out of the major findings of this study are given below:

- The substantive appointments of QAMs, on a fulltime basis, is no longer "a nice to have", but a necessity. The HEQC is heading towards institutional self-regulation regarding quality. This requires that all institutions have on their permanent, full-time staff compliment, people whose responsibility is to continually promote and quality-assure all aspects of the university business. Appointing people on a 'time-share' basis (i.e. having the same individual performing many other tasks, concurrently), as was found to be the case in some institutions, will not satisfy the quality requirements of HEIs.

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Higher Education Readiness to Implement International Financial Reporting Standard (IFRS) and Changing International Environment

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Abstract— Higher Education Institutions (HEIs) should always be ready to respond to any changes of international environment. This is in relation to the effort of producing the best graduates who are suitable for the industries' need. In addition, IFRS implementation in 2012 will give impact on HEIs' readiness to respond to such changes. This paper attempts to provide preparation for curriculum design and students' competence related to IFRS implementation. The research instrument was developed by questionnaires and distributed to selected respondents by means of purposive sampling method. The criteria of this sampling are as follows: the student should have taken international accounting course and from accounting department. The triangulation technique was conducted to get validity and reliability test and get the answer of questionnaires favourably. The result shows that the students' competence and curriculum design have significantly influence to implement IFRS in Indonesia 2012, but curriculum design in accounting department should be adjusted when they want to focus on preparing IFRS implementation. Another result also shows that seminar, workshop and training related to IFRS implementation should have developed by HEIs as HEIs' responsibilities to solve any changes of international environment

Key words : accounting curriculum design, IFRS and higher education responsibility

I. INTRODUCTION

Higher education has been recognized to prepare environmental change in accounting education. Global issue in International Financial accounting Standard may soon need to teach International Financial Reporting Standards (IFRS) to all Indonesian accounting students. While IFRS are now used in about 100 countries around the world, they are also coming to Indonesia. In 2009, the Indonesia Securities & Exchange Commission decided to accept foreign corporations' financial statements prepared in accordance with IFRS as published by the International Accounting Standards Board (IASB). Generally Accepted Accounting Principles (PSAK). The SEC is also considering whether to allow or require Indonesia corporations to use IFRS. Many influential organizations in Indonesia support this proposal. If the SEC lets U.S. corporations use IFRS, it will force major changes in how

financial accounting is taught and practiced in Indonesia. So many Indonesian students will need a good basic knowledge of IFRS. Besides Indonesia accounting educators need to plan how to incorporate IFRS into their accounting courses.

Regardless of the timing, Indonesia accounting students will have careers where global transactions and interactions are common, so they will need to be familiar with IFRS and sensitive to the rapidly changing accounting environment. Whether many countries either require or allow the use of IFRS, current Indonesia accounting students will likely begin their careers in a framework still largely dominated by Indonesia GAAP (PSAK) and where Indonesian professional licensing examination content will, in the near term, likely remain heavily weighted toward U.S. standards. Larson and Brady said that as a first step in preparing U.S. accountants for IFRS, college and university accounting programs need to incorporate coverage of the rationale and current status of the convergence process in their principles and other courses. One of the approaches might be to incorporate recent articles from Strategic Finance that discusses the current status of convergence for example, "IFRS in Indonesia—When?" Students could be assigned to find information about convergence on the websites listed at the end of the article, such as the international section on the FASB's website that has the Board's formal commitment to convergence with IFRS. Faculty might also want to integrate related material designed to acquaint students with the cultural, legal, political, and economic differences that explain why accounting practices differ among countries. This might facilitate discussion in an intermediate financial accounting or accounting.

II. THEORITICAL FRAMEWORK AND HYPOTHESES

A. Previous research

Barth (2008) has observed the Global Financial Reporting: Implication and Impact to Higher Education in U.S. This research was aimed to identify changing and opportunity global financial reporting for higher education and result of this research was that higher education should have been

prepared with international change in accounting standards, knowledge, and necessary items that International financial reporting adjusted has been integrated in the curriculum design. Higher education and FASB make alliance strategic to prepare the students understand this point so they have good ability and comprehensive knowledge in international financial standard. The impact of the need to teach students about the global financial reporting includes increased focus on teaching the underlying concepts of financial reporting. Although the framework is changing, it is expected that students understand the conceptual framework and will have a lasting knowledge, but when the students focus only on the rules, they will fail to understand the key points from lessons accounting because the regulation will become obsolete because it is always changing. Regulatory standards in complementary and operating principles with specifying what entity should do can meet those principles. Thus when students understand the framework, they would not be surprised if faced with a case or a different topic.

B. Reed and Pence (2009)

Reed and Pence have investigated information technology IEG 11 (*International Education Guideline 11*) that was published by International Federation of Accountants in 2003. This would be integrated in accounting education curriculum. This research has distributed 768 accounting faculties as respondent that have information technology in their learning process. Result of this research was that the accounting faculty supports IEG 11 to implement accounting education as a basic course for the students to learning accounting information system. In this case, higher institution of education must have positive responses in any environmental change that affected learning process.

C. Students Readiness to Implement IFRS

Readiness is crucial to starting a job, because it can resolve problem, so that it can make the students work smoothly. According to James, Marianne and Blaszyński (2009) suggested that readiness is a prerequisite to learning the next one to be able to interact in some way. Readiness is the overall condition of a person or individual who prepared him to provide a response or answer in a certain way to a situation. Conditions of individuals include at least three aspects:

- a. Physical, mental and emotional
- b. Motive and goals
- c. Skills and knowledge

Readiness can also be said as internal factors such as mental, attitude, ability and knowledge of someone before they do their activity. Those factors interact with their experience. In addition experience has positive relation with readiness by the students in order to prepare implementing international financial reporting standard.

D. Student Competence

Based on the decree of The Minister of National Education regulation 045/U/2002 number of Core Curriculum of Higher Education suggests that "competence is a set of intelligent

action, a person has full responsibility as a condition to be considered capable by the society in carrying out tasks in a particular field of work". Law no. 20/2003 on National Education System explanation of Article 35 (1): "Competence is a graduate qualification graduate capability that includes attitude, knowledge, and skills in accordance with nationally agreed standards". Association K.U. Leuven defines the notion of competence is integrating of knowledge, skills and attitudes that enable to carry out an effective way.

E. Curriculum in Higher Education

The curriculum is the course given by an institution that contains a draft education providers of learning that will be given to students in one period of education. The curriculum is intended to be directed toward education and its intended purpose in the overall learning activity. Higher education curriculum is a set of plans and arrangements regarding the content and study materials and lessons and ways of delivery and assessment that are used to guide the teaching-learning activities in college. (Article 1, Clause 6 the Minister of National Education rule No.232/U/2000 *Guidelines for Higher Education Curriculum Development and Assessment of Student Learning Outcomes*).

The curriculum is the idea expressed in the practice of education. Currently the definition of curriculum is growing, so that the intended curriculum is not only the idea of education but also includes the entire planned learning program from an educational institution. The National Curriculum for undergraduate courses in Economic Science by decree of the Minister of Education and Culture of Republic of. 0313/U/1994 deemed no longer suitable for the needs of users graduates. Since it was issued by The Minister of National Education No. 232/U/2000 on *Guidelines for Higher Education Curriculum Development and Assessment of Student Learning Outcomes*. Higher education curriculum became the basis of the implementation program of study consists of a core curriculum and institutional curriculum.

F. Adoption and Harmonization International Financial Report Standard in Indonesia

Implementation of the IFRS adoption for each country in the world is not easy. Therefore, the implementation of the adoption can go through several levels. Levels or stages of adoption of IFRS can be done through the 5 phases (Media Accounting, 2005), namely: 1) full adoption, which adopt the IFRS products and translate word for word, 2) adapted, namely to adopt the IFRS, but adapted to the conditions in a countries, 3) piecemeal, which is partially adopted IFRS numbers, numbers of certain standards and choose only certain paragraphs, 4) referenced, namely as a reference, the standard applied only to certain IFRS refers to the language and paragraphs are compiled by the standards-making body, 5) not adoption at all, it means that a country does not adopt IFRS at all. Adoption, harmonization, and convergence is not necessarily similar but the quality is above full harmonization to IFRS which is inevitable to demands for countries in the

world, besides a concern is also for the institutions in the world such as the World Bank, WTO and other institutions. Indonesia is a full member of IFAC and a member of the WTO. Indonesia Accounting Community responses to implement IFRS in the field of professional standards

G. Research Framework

Existing framework of thought underlying this study can be described as follows:

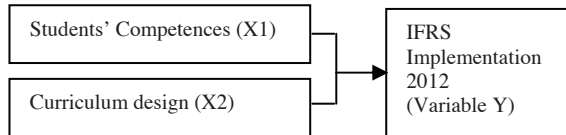


Figure.1 Research Framework

H. Research Hypothesis

H1: Students' competence has significant effect on the readiness of IFRS implementation in Indonesia in 2012.

H2: Curriculum design has significant effect on the readiness of IFRS implementation in Indonesia in 2012

III. RESEARCH METHOD

This study is to test hypothesis and describe phenomenon in the form of relationship between several independent variables that influence the dependent variables. Independent variables are students's competence (X1) and Curriculum design (X2) while dependent variable is IFRS implementation. Research instrument have been developed by questionnaires and distributed by selected respondents on accounting department accounting students that have studied international accounting course. Technical analysis is by means of classic assumption test while using multiple linier regression, several basic assumptions can be asserted that includes such as: normality test by statistical analysis of one-kolmogorov smirnov test with a significant level 5%, multicollinearity test, autocorrelation test and heteroscedasticity test. Regression equation is to examine the effect of students' competence and curriculum design:

$$Y = a + b_1.X_1 + b_2.X_2 + e$$

Y : IFRS implementation

a : Constant

b₁, b₂: Regression coefficient

X₁ : Students' competence

X₂ : Curriculum design

e : error

IV. DATA ANALYSIS AND DISCUSSION

A. Data Analysis

The students under accounting department are gained in this study is of 120 respondents. Female respondent is 73 % while the female respondent 27% it means female students mostly are interested in accounting major, all the respondents are graduates from accounting department that have studied international and intermediate accounting course. Those courses are mandatory course for accounting students to get

information international financial reporting standards (IFRS). There are 35 % respondents recognize that they have taken related IFRS workshop or seminar

Table. 1 Coefficient (a)

Mo del	Unstandardized Coefficients		T	Sig.	Collinearity Statistics	
	B	Std. Error			Tolerance	VIF
(Constant)	,750	,224	3,353	,001		
Kompmean	,468	,113	4,160	,000	,482	2,077
Kurmean	,346	,091	3,807	,000	,482	2,077

a. Dependent Variable : Konvmean

120 questionnaires were used to measure the influence of students' competence and curriculum design on IFRS implementation, the result of validity test of 30 items overall statement that declared valid and reliability test has shown that overall reliability of instruments are reliable. Classical assumption test has also shown that overall variables contain no multicollinearity (VIF value is 2,077), regression model does not contain autocorrelation as appears in Durbin Watson Value 1,840.

Table. 2 Model Summary (b)

Model	R Square	Adjusted R Square	Durbin- Watson
1	,492	,484	1,840

a Predictors: (Constant), kurmean, kompmean

b Dependent Variable: konvmean

Hypothesis test has shown that F test or regression model which are students' competence and curriculum design have an influence on IFRS implementation. The following result is as shown in table 3. Adjusted R Square is 0.484 indicating that students' competence and curriculum design as the dependent variables can only be explained by the variables of student competence and curriculum design that is of 48,4%. In other words 51,6% is influenced by other factors which are not investigated. In addition based on t test results can be partially explained that students' competence and curriculum design have significantly influenced IFRS implementation. In Indonesia students' competence and curriculum as a significant factor that board of Indonesian accounting to make policy when IFRS will be implemented.

Table 3. ANOVA(b)

Sum of Squares	Df	Mean Square	F	Sig.
8,064	2	4,032	56,702	,000(a)
8,319	117	,071		
16,383	119			

a Predictors: (Constant), kurmean, kompmean

b Dependent Variable: konvmean

B. Discussion

Based on research investigation has shown that students' competence has positive significant impact on HE readiness to implement IFRS. It is consistent with the previous research as by Barth (2008) and James, Marianne and Blaszyński (2009). When students' competence becomes readiness to implement IFRS, the impact is that they have more ability and confidence to implement it. It is known that Competence is a graduate qualification graduate capability that includes attitude, knowledge, and skills in accordance with nationally agreed standards. This paper has discussed that students' competence of accounting department that have less knowledge and experience how to implement IFRS and prepare financial reporting as consequences international environment changed in international financial reporting standard rules. This investigation become important information to higher education to prepare and support students readiness to implement IFRS and international environment change through enhancing student capability to access IFRS literature at the class room and library, enhancing learning capability through increasing teacher competence who teach international accounting course and also has initiative to cooperation with Indonesian Accounting Community to make and held IFRS seminary or workshop in the faculty. Further more, this paper has investigated that students need ability to prepare financial reporting as international financial reporting when they are preparing their career. This ability can increase their performance to get a good job.

Curriculum design has positive significant influence on IFRS implementation. It is supported by Barth (2008); Reed and Pence (2009), states that IFRS implementation would be integrated in accounting education curriculum and Higher education should have prepared with international changed in accounting standards, knowledge and necessary items that International financial reporting adjusted has been integrated in the curriculum design. The findings in this study also discusses the design of the curriculum should lead to the needs of students and users (companies) to introduce and provide a strengthening of understanding and knowledge of IFRS implementation. Curriculum design becomes paramount for educational institutions in policy making as the impact of changes in the international environment, so with a curriculum design that is able to give confidence to the student's readiness to implement their accounting knowledge in the international community and also would help to accelerate the absorption of graduates in the industries. The role of peer group such as accounting practitioners, Indonesian Institute of Accountants, graduates and faculty with universities in designing curriculum that suit with their needs must always be maintained. Higher education institution can develop internal peer group to assist in curriculum design.

V. CONCLUSION

Research on student readiness to implement IFRS implementation in Indonesia in 2012 is very important. Students who are the candidates for professional in accounting should have to prepare for these changes, when they graduated

from accounting department they have more ability and confidence to compete in the world of work as specially in the firms who implemented IFRS in their financial reporting. The results of hypothesis testing to prove student competency variables that student competency variable may affect the implementation of IFRS in Indonesia in 2012 significantly. However, competence to the understanding of IFRS accounting students is still low in which this can be known from the answers by the respondents who said that most of them have not been able to prepare financial accounting report in accordance with IFRS standards, rarely attend seminars related to the IFRS and they do not always follow the development of IFRS either through the internet, reading books, journals and other media information. Hypothesis testing of the accounting curriculum design also has a significant effect on the implementation of IFRS in Indonesia in 2012, it can also concluded that the results of this research was teaching methods to learning IFRS should be improved by focusing on curriculum design.

A. Suggestion and Implication

Further research can develop variables and questions in the research instrument that can be used to measure the readiness of students in the implementation of IFRS in Indonesia in 2012 and carry out measurements on the implementation of curriculum that have adopted the international environment changes. The implications of this research is that the role of higher education is needed for the new international environment changes that affect the competency needs of students and design curriculum that is able to adapt and respond to those changes. Cooperation between universities and professional institutes into a strategic alliance is required to help improve student competence and relevance of curriculum to the needs of the graduates' users. The adoption of IFRS crates oportunities for universities to stucture curriculum in accounting departement and incentives facilitating the students' learning of IFRS.

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Entrepreneur Self-Efficacy Influence of Interest to Students For Entrepreneurship The Role of Gender Differences Moderation

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Abstract— Phenomenon at present shows that students who choose a career as an entrepreneur is very high, self-efficacy as a determinant that predispose a person to perform certain tasks without considering whether the destination is reached or not be the basis of student choice of a career as an entrepreneur. This study aims to find and explore the influence of entrepreneur self-efficacy against interest of students of economic faculties in Surabaya and how the role of moderating variables of gender differences in the relationship to the two variables. This research includes is (X) entrepreneurial self-efficacy as independent variable, interests entrepreneurship as dependent variable (Y) and gender differences as moderator variable (Z). 314 students as respondents have been sampled by the method of purposive sampling. The results showed that there was a significant effect on the entrepreneurial self efficacy interest of students and gender differences proved to be moderating variables that influence these relationships. The implications of this research are needed as a student entrepreneur development unit of media and communication forum for students in preparation for career development as an entrepreneur. Design curriculum that facilitates entrepreneurship courses more focused on the creation of community and communication between entrepreneurs and students. The learning process in the entrepreneur classroom, especially students of economic faculty's necessary effort to change their mindset-oriented aspects of a career in the company.

Key words : entrepreneurial self-efficacy, student interest, gender and higher education

I. INTRODUCTION

Recently, there has been a phenomenon showing that there is an increase of women choosing their careers as an entrepreneur (De Bruin, Brush and Welter, 2006, in Gupta, et. al 2009). However, the data were found empirically that in various countries the number of male entrepreneurs is still doubled or greater than that of female entrepreneurs (ACS, Arenius, Hay and Minniti, 2005 in et. al Gupta (2009). It is based on the existence of society knowledge that entrepreneurship is the work for masculine. Therefore, it is more suitable for male than for female.

There have been various studies conducted to explore the various factors that can influence and encourage the person to get involved in the entrepreneurial world. Referring to the results of those studies, there are several variables that can

affect a person to be interested in entrepreneurship, including the self perception. One of the concepts which is believed to affect perception of self interest for self-employed person include self-efficacy (Kristiansen and Nurul, 2004; Boyd and Vazikis, 1994; Zhao, 2005 in Mueller and Dato-On, 2008, Linan and When Cen, 2006). Self-efficacy is a psychological statement that describes a person's belief in executing a particular task (Bandura, 1977 in Kristiansen and Nurul, 2004).

On the contrary, Ryan (1970) in Kristiansen and Nurul, 2004 state that self-perception affects the interest of someone to do something. In addition, it is also argued that self-efficacy affects a person to perform certain tasks without considering whether the goals/objectives are achieved (Cromie, 2000). It can be concluded that a person acts as driven by the belief that he has the ability/competence to carry out the task, not because of whether they have ability/competence they have.

Besides the self-perception, the study of interest for entrepreneurship is often associated with gender differences. As elaborated in earlier, the choice of entrepreneurship is more dominated by men than women. Scherer (1990), Mueller, 2004, in Mueller, 2008 stated that women who decide to set up a business are still far below men. It can be explained that men have the confidence that they are able to carry out tasks as entrepreneurs, such as developing unique ideas, increase venture capital, hiring/coordinates employee. Thus, it can be explained that the perception of self, especially the belief of having the ability to perform a task between men and women are different and it can affect one's interest to entrepreneurship. Based on the results of the previous researches, many researchers have been involved in doing the analysis of Entrepreneur Self-Efficacy Influence of Interest to Entrepreneurship, as conducted by the faculty of Economics in Surabaya. The research is related to Role of Gender Differences Moderation.

In connection with the effort of the study related to gender and perception, this study attempts to explore whether entrepreneurial self-efficacy affects the interest of entrepreneurship and how the role of moderating variables on gender differences have a relationship with these two

variables in the context of the economics faculty students in Surabaya.

II. THEORITICAL FRAMEWORK AND HYPOTHESES

A. *Self Efficacy*

It can be described that self-efficacy is part of social learning theory that refers to a person's perception of confidence to perform tasks in a certain extent. In addition, self-efficacy is one of self-perception of factors that influences the achievement of tasks (Bandura, 1992 in Schmitt, 2008). Referring to the opinion of Bandura, it can be implied that self-efficacy does not only describe the beliefs of a person but even more broadly, it is a component of one's own motivation, which in turn, can encourage a person's desire to achieve goals in accordance with their competence. Individuals with high self-efficacy will be confident of his ability and look at the difficulties faced as a challenge rather than as a threat. For that reason, they have a high commitment to completing tasks and responsibilities. On the contrary, a person who has low self-efficacy tends to have low commitment in completing tasks and responsibilities.

Finally, self-efficacy can affect several things such as 1) the task chosen to be implemented; someone will likely do the tasks which are believed capable of doing. (2) The effort and attention given to a person when finish the task (3) the extent to which a person does not easily give up when faced with various difficulties and (4) the achievement of the work (Bandura, 1982 in Pollack and Lilly (2008).

B. *Indicators of Self Efficacy*

According to Bandura (1997) cited by Eka Adyitawati (2001), the dimensions of Self Efficacy is described as the following.

Magnitude: an understanding of the extent to which a person has the ability to complete difficult tasks. If someone has a high magnitude, he will perceive that he is able to cope and carry out a difficult task. On the other hand, when someone's magnitude is lower, he will perceive that he is only able to perform simple tasks.

Generality: it is the extent to which a person's ability when solving problems in all conditions. Individuals who have high-generality are able to perform tasks and solve problems in all conditions. As for individuals who have low generality, they will perceive that they are only able to carry out the task with certain conditions.

Strength: the extent to which respondents' belief in the ability to carry out the task. Someone with high strength will have a high level of self confidence. For that reason, they are not easily frustrated when faced with difficult problems. On the contrary, individuals who have low levels of strength will have a low level of confidence.

C. *Career Self-Efficacy*

Actually, the concept of self-efficacy can be implemented in the context of individual career development and career

choice differences between men and women. For example, Hackett and Betzz (1981) in Mueller (2008), in their study, stated that the expansion of self-efficacy theory into the domain of career can explain how a person's efficacy expectations can be developed differently between men and women. In fact, career self-efficacy differences between men and women are caused by differences in social roles between men and women. Last of all, it is described that self-efficacy differences between men and women can explain the reason why women become "under-represented" jobs in fields dominated by men.

The results of recent research show that among women, career self-efficacy is higher for occupations. Such occupations are traditionally for female compared to jobs that are traditionally for male Layton (1984) in Mueller, 2008. In the same time, Clement (1987) in Mueller (2008) explains that the student career self-efficacy was lower than students for jobs that traditionally female jobs.

D. *Entrepreneurial Self-Efficacy*

Some experts claim that self-efficacy influences the process of establishing a new business. According to the Boyz and Vizikis (1994) in Mueller (2008), the shaping of interest in entrepreneurship is actually based on the individual's perception of the results of his efforts, whether it will succeed or fail. Individuals who have high entrepreneurial self-efficacy will certainly have high interest in entrepreneurship as well. Even, Mueller and Goic (2003) stated that entrepreneurial self-efficacy is very useful for measuring how high the confidence of one's ability of someone, believes that he will successfully perform the tasks as an entrepreneur.

There are several factors that influence the entrepreneurial self-efficacy. These can be indicated such as a person's personality, values - values and economic conditions. Furthermore, entrepreneurial self-efficacy is influenced also by the various local or regional aspects that will ensure individuals to gain experience and both positive and negative role models. By doing so, they can either increase or decrease the confidence to try (entrepreneurial self efficacy).

E. *Entrepreneurial Self Efficacy Dimension*

The dimensions of entrepreneurial self-efficacy were developed based on the tasks that must be performed by an entrepreneur. For example, Mueller and Goic (2003) developed a dimension of entrepreneurial self-efficacy by looking at the duties of an entrepreneur from the process model. According to them, the task of an entrepreneur includes four phases of activities as follows:

First of all, searching that is the task of entrepreneurs to develop innovative and unique ideas as well as identify the various opportunities that exist to establish a business. Planning is an entrepreneurial task that involves planning in a comprehensive new business establishment. At this stage entrepreneurs are trying to bring innovative ideas into a business plan that is deemed feasible. This includes: business location, market size, product specifications, establishment

costs, operating costs as well as identification of resources needed for established businesses to expand.

Secondly, marshaling that is an entrepreneurial task of obtaining and combining the resources necessary to establish a new business. At this stage, it combines entrepreneurial workforce, customers, and capital to established businesses in which all these still exist.

Last of all, implementing that is the entrepreneurial tasks associated with managerial decisions. At this stage, entrepreneurial managers are acting as a corporate executive who conduct activities such as managerial, planning, management, decision making and problem-solving.

F. *Entrepreneurial Intention*

Entrepreneurship has been studied using some methods that have been altered from time to time. First of all, some experts thought that interest in entrepreneurship is a function of variable characteristics and demographic characteristics that differentiate one's self-employment and entrepreneurship. For example, David Mc Clelland (1961, 1971) in Kristiansen and Nurul (2004) argued that theory of entrepreneurship is one that sees that the motivation for entrepreneurship. It is, therefore, is a function of individual characteristics and attitudes.

Other factors in the studies are the locus of control, confidence and self-efficacy. Some studies also suggested that interest in entrepreneurship is influenced by personal experiences such as level of education and experience in the past as well as demographic characteristic variables such as age and gender (Krueger, 2000; Mazarrol, 1999; Ryan, 1970 in Kristiansen and Nurul (2004). In addition, Kristiansen (2001) in Kristiansen and Nurul (2004) also explained that the environmental variables such as availability of information, formation of social networks and open access to resources are a variable that affects the interest for entrepreneurship.

The measurement of interest argued that entrepreneurial intention can be done by using a single dimension. This study implements EIQ (Entrepreneurial Intention Questionnaire) as an instrument for measuring interest in entrepreneurship. In reality this instrument has been widely used to determine the extent of one's desire to establish a new business (Linan and Chen, 2006). EIQ consists of six statements had been developed by Linan and Chen (2006).

G. *Differences among Factors*

In connection with differences among the factors in entrepreneurial analysis, Ryan (1970) in Kristiansen and Nurul (2004), stated that perception of oneself is the social factor that has a major role in influencing a person's interests. Thus, entrepreneurial self efficacy refers to the individual's perception of confidence to be able to carry out duties as an entrepreneur (Kristiansen and Nurul, 2004). From this, it can be indicated that the higher a person's beliefs on his ability to perform duties as entrepreneurs, the higher the interest for entrepreneurship and vice versa.

In fact, Linan and Chen, 2006 and Kristiansen and Nurul (2004) support the above statement. Therefore, it can be

generalized that there is a positive relationship between Entrepreneurial Self-Efficacy and Entrepreneurial Intention. Entrepreneurs are assumed to be a job that suits men (Mueller, 2009; Gupta, et.all, 2009, Kristiansen and Nurul, 2004; Linan and Chen, 2006). Based on the results of several studies proved that women have an entrepreneurial self-efficacy lower than men when faced with the choice of a career as an entrepreneur intention. This is caused by the limited role of women so that they appear social barriers that limit the activity of women when choosing entrepreneurship. It can be concluded that gender differences would strengthen or weaken (moderating) effect of entrepreneurial self-efficacy on entrepreneurial intention.

Based on the theoretical framework described above, this research raises the hypotheses as the following. First, it is hypothesized that entrepreneurial self-efficacy significantly influences student's interest in entrepreneurship. Secondly, it is hypothesized that gender differences significantly moderate influence the entrepreneurial self-efficacy of student's interest in entrepreneurship.

III. RESEARCH METHOD

A. *Population, Sample, and Sampling*

The population consists of all students of economic faculties in Surabaya in which they were taken by means of non-probability sampling, purposive sampling, where sample members selected in accordance with the criteria. They were in their last year of their study. The advantages of such a method are the speed, ease of information collection and use of cost and less time. The weakness of these methods lies in the ability of this method in generalizing conclusions.

The variables used consist of independent variable, dependent variable and moderating variable. For example the independent variables (X) are entrepreneurial self-efficacy, a respondent's perception of how strong the belief in one's ability to perform duties as an entrepreneur. The indicators used are as follows (Mueller, 2008): Searching, Planning, marshaling, and implementing. To facilitate understanding and further clarify the definition of research, the variables are operationally defined as the following. Independent variables (X), namely: entrepreneurial self-efficacy, a respondent's perception of how strong the belief in one's ability to perform duties as an entrepreneur. Mueller (2008) suggests some variables as the following:

- a. Searching: respondents' perceptions of confidence in his ability to develop new businesses include: the creation of innovative and unique ideas as well as identify the various opportunities that exist to establish a business.
- b. Planning: respondents' perceptions of confidence in the ability of his ability to plan the new venture include: planning a business location, market size, product specifications, establishment costs, operating costs as well as identification of resources needed.
- c. Combine or marshaling: respondents' perceptions of confidence in the ability to acquire and combine the resources needed to establish the ability to combine new

business that includes workforce, customers and capital to established businesses still exist.

- d. Implementing (Application): respondents' perceptions of confidence in the ability of managerial duties.

On the contrary, the dependent variable of interest in entrepreneurship (Y) is an attitude of a person's statements about his desire to develop a career by establishing his own business. In this case, interest in entrepreneurship is measured by a single dimension with the item statement as the following.

- 1) I am ready to do anything in order to become an entrepreneur.
- 2) The choice of my professional career is to become an entrepreneur.
- 3) I will intent to be able to establish and run our own business.
- 4) I desired to establish a business in the future.
- 5) I have serious willingness to establish a new business.
- 6) I have a strong interest to establish my own company someday.

Last of all, they are the moderating variables (Z), namely the gender difference, a difference between the sexes: male and female.

Based on the theoretical background, the research model is built and presented in Figure 1.

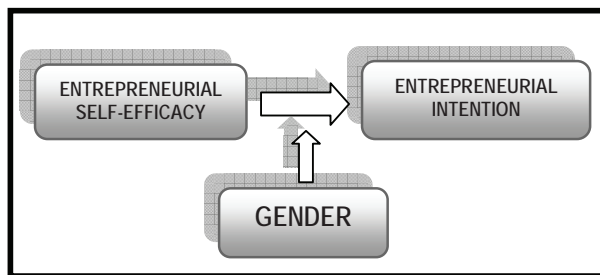


Figure 1 : Research Model

IV. DATA ANALYSIS AND DISCUSSION

A. Data Analysis

The research instruments of Entrepreneurial Self-Efficacy and Entrepreneurial Intention were valid. The correlations of each item to total score were more than 0,40. The research instrument were reliable. The Cronbach alphas were more than 0,60 (Entrepreneurial Self-Efficacy was 0,88 and Entrepreneurial Intention was 0,84).

Based on the questionnaire, there is general description of respondent's profile as shown in Table 1. The Majority respondents have sex female with percentage 51 percent, while the remaining percentage is man. Most of the respondents came from the management department of achieving 53 percent.

T test based on test results proved that gender differences do not affect the interest in entrepreneurship research respondents. Both women and men do not have differences in terms of interest in entrepreneurship. Although women have multiple roles in society, this does not have a cognitive influence in the decision to become entrepreneurs.

Table 1
Respondent's Profile

	Frequency	Percent
male	154	49%
female	160	51%
Total	314	100
Departement	Frequency	Percent
Accounting	83	26%
Economics Development	4	1%
Economic	28	9%
Business &Economic	8	3%
Marketing Management	2	1%
Tourism Management	1	0%
Management	165	53%
Business Management	7	2%
Economic Management	4	1%
Financial Management	6	2%
Marketing	6	2%
Total	314	100

. Respondent who participated in this study a number of 314 students of the Faculty of Economics and Business from the private university in Surabaya. Demographic data that can be presented are as follows:

1. Based on the majors, 52.5% of respondents came from the department of management, 26.4% came from the accounting department and the rest coming from the majors manajmen tourism, business management, economics and development studies
2. Based on the semester that followed, the majority of respondents were students sixth semester of 8th semester sejumlah 38.2% and 36.3% number. The rest are students who are disemester 4, 10 and 12.
3. Based on Gender, 51% of female respondents and 49% of respondents male sex. proves that today's woman no longer has when I have to run multiple roles in society. Although entrepreneurship is identical to men's work, in this study that women's ability to self-confidence (self efficacy) to be run as a business activity which affects the entrepreneurial intention.

University of respondent presented in figure 2.

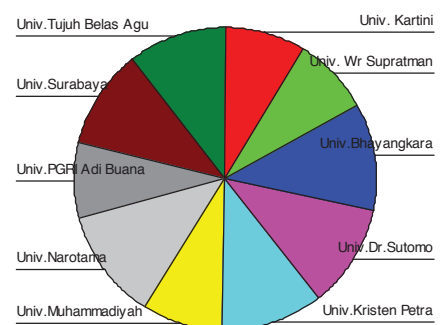


Figure 2 : University Background of Respondent

Statistical analysis techniques used in this study were: Regression analysis with dummy variables to test the role of gender as a variable that affects the relationship between Entrepreneurial Self-Efficacy variable of interest in entrepreneurship. Testing this hypothesis using SPSS software Ver. 12.0

Simple linear regression results show that the Entrepreneurial Self-Efficacy significant effect on the Entrepreneurial Intention, this means that the higher a person's beliefs on his ability to carry out duties as an entrepreneur, the higher the interest for entrepreneurship and vice versa. Further test results with a dummy variable regression shows that gender does not affect the relationship between Entrepreneurial Self-Efficacy and Entrepreneurial Intention.

Table 2
Regression Analysis Result

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
(Constant)	1,004	,221		4,537	,000
MEANX	,802	,060	,603	13,344	,000

Based on simple linear regression results proved that entrepreneurial self-efficacy significantly influence student interest in entrepreneurship faculty of economics and business in Surabaya. This is reflected in the magnitude of the F test score of 178.068 with a significance level below 0.05. Similarly, the t test with a score of 4.357 with a significance of 0.000 (<0.05).

Furthermore, after the different test average independent sample t-test produced scores nilat t for 0453 with a significance level of 0.651 (above 0.05). This shows that the gender issue does not affect the interest of students for entrepreneurship.

B. Discussion

The research report a significant finding. As hypothesized in hypothesis H1 that entrepreneurial self-efficacy significantly influences student's interest in entrepreneurship.

As hypothesized that gender not differences significantly moderately influence the entrepreneurial self-efficacy of student's interest in entrepreneurship.

Based on the results of statistical analysis, it is evident that the entrepreneurial self-efficacy significantly affect the interest for entrepreneurship. Entrepreneurial Self Efficacy refers to the individual's perception of confidence to be able to carry out duties as an entrepreneur (Kristiansen and Nurul, 2004). The higher the respondent's belief in his ability to perform duties as entrepreneurs, the higher the interest for entrepreneurship and vice versa. The results of this study support the claim. This study is also in line with the results of research conducted by Linan and Chen, 2006 and Kristiansen and Nurul (2004) Thus hipotesi 1 which states: there is a positive relationship between Entrepreneurial Self-Efficacy with Entrepreneurial Intention (interest in entrepreneurship) attested.

T test based on test results proved that gender differences do not affect the interest in entrepreneurship research respondents. Both women and men do not have differences in terms of interest in entrepreneurship. Although women have multiple roles in society, this does not have a cognitive influence in the decision to become entrepreneurs. This proves that today's woman no longer has ketratasan when I have to run multiple roles in society. Although entrepreneurship is identical to men's work, in this study terbukti that women's ability to self-confidence (self efficacy) to be run as a business activity which affects the entrepreneurial intention.

V. CONCLUSIONS

Based on exposure to the above discussion can be explained that gender issues do not affect one's interest to entrepreneurship. The Entrepreneurial self-efficacy significantly affect the interests entrepreneurship. Thus, whether women or men if you have high self confidence towards entrepreneurship skills will positively affect the interest in entrepreneurship.

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Advancing Genuine Development through University Social Responsibility

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Abstract – The academe is considered to be one of the major social institutions that can push for societal change. Aside from developing graduates who are responsive to the needs of the society, it is also challenged to directly contribute to the resolution of major social issues, particularly through the university's social responsibility efforts. More often, a university's standing is measured through its academic and research offerings. However, global concerns, such as poverty, exclusion, ecological degradation, etc., challenge the academe to go down the ivory towers and instead make concrete application of knowledge by addressing such social malaise. This paper presents how a university can help improve the quality of life of its immediate community through its social responsibility endeavors. An analysis of the impact of De La Salle University – Dasmariñas' extension programs, particularly educational outreach, among some of the partner-beneficiaries showed that their involvement in the programs initiated change within their families and communities. In effect, the program contributed to the larger process of bringing forth genuine development. With this, the university, as a relevant social institution, is able to contribute in liberating individuals from the poverty, which is beyond its usual mandate of providing formal education to those who can afford it. By ensuring that its social responsibility efforts are more than dole outs, the academe can create the necessary social capital that will push for genuine social development. A development that is brought about by mutually empowered and life affirmed individuals and communities.

Keywords – university social responsibility, extension, social development, volunteerism, alternative learning system

CONCEPT OF A UNIVERSITY

The idea of a university had, perhaps, originated in Greece when Plato founded the first university in the world, which is the *Academe*. Plato brought the Socratic discourse on metaphysical, epistemological and ethical issues from the *Agora* to the four walls of a university. University, understood from the idea of the *Academe*, was a place where people gather together aimed at discovering the universal forms through the process of dialectics. The goal was not the study

of the particulars but the contemplation of universal ideas or essences.

Such an idea of a university is also found in the thoughts of modern thinker John Henry Newman who claims that the essential function of a university is to propagate knowledge of the principles and laws governing man and the world. Teaching is a university's main function. Research, according to Newman, must be a function of a separate institution. He believes that a university should not be concerned about specialized knowledge produced by researchers but in general and all-embracing knowledge as contemplated disciplines like theology, philosophy, and humanities. This does not mean, however, that other subjects should not be taught. This means instead that other subjects, all possible subjects, must be taught in the light of a bigger perspective of theology, philosophy and humanities. From this perspective, then, a teacher cannot afford to devote his time on specialized disciplines. Hence, a teacher should focus on teaching and leave research to others [2].

However, the development in the field of science would later give rise to the idea that old ideas must be subjected to scrutiny. Their validity must be tested through researches, giving rise to the idea of a university as having a two-fold function, namely: research and teaching. Propagation of knowledge can no longer be separated from its generation. In fact, in the contemporary period universities all over the world are now evaluated and ranked using research and teaching outputs as criteria. The Times Higher Education Supplement System and The Jiao Tong System, two leading systems of evaluating and ranking universities in the world, both put premium on research and publication and academic performance as criteria for assessing the level of excellence of universities [3]. This means that research and teaching have become the defining characteristics of a university. Teaching must be based on new researches and findings of researches have to be communicated, shared, and subjected to discourse by the academicians in the university. The university has become a place where both old and new ideas are subjected to critical evaluation by means of researches. The professor has then become also a researcher.

However, the following questions may be asked. Should the function of the university be limited to teaching and research? Should the university be confined on the four walls of its classrooms and laboratories? Can it afford to be indifferent to the worsening condition of the environment, to the degrading quality of the life of the marginalized who are victims of war,

injustice, poverty and oppression? Can the institution, which is the repository of ideas, limit its functions to research and teaching silent about the socio-political concerns, economic and environmental issues? Should the university's resources be left unused or should they be tapped for the greatest good of the greatest number of people as the utilitarian would advocate?

Plato in his book *The Republic* recognizes the role of education in the *Utopia* which he envisions. Justice, which he defines as the harmonious coordination of all the individual members in the society, can only be attained employing education as the method by which rulers, soldiers, and workers in the society are classified. Karl Marx, on the other hand, declares in his famous statement that philosophers, that is, educators too, have just interpreted the world. The point, according to him, is to change it. Paulo Freire in his book *Pedagogy of the Oppressed* also affirms the importance of education in social reconstruction. Freire believes that education has the function and power to liberate the consciousness of the people which have been oppressed by economic and socio-political structures. Plato (an ancient Greek philosopher), Marx (a modern German philosopher), and Freire (a contemporary philosopher) believe that education—the university for that matter—cannot remain in the ivory tower contemplating on theoretical ideas. These three philosophers believe that genuine social development can only be achieved if those ideas discovered and invented in the laboratories of the universities are brought to the farm, to the street, and to the marketplace in order to promote the welfare of the people. No other institution is in the better position to respond to the call of the society than the university, considering its intellectual resources. The university is, thus, morally expected to engage in social responsibility.

The foregoing idea of a university may serve as a philosophy of university social responsibility, a phenomenon which has changed the way universities in the world function. In United Kingdom, for instance, the "Universities that Count Index, has been considered as UK's benchmark for measuring Environmental and Social Responsibility (ESR) not only in business organizations but as well in the Higher Education Sector. A recent study also showed that even leading universities of the world also began taking steps to concretize social responsibility in what they do [4]. In the Philippines, similar endeavors of measuring university's social responsibility have been launched. Recognizing academic institutions with the Best Extension Programs, having the most sound and eco-friendly practices and initiatives, and the likes have been done. State universities have also been mandated to allocate certain portion of their annual budget to extension programs. The enactment of the National Service Law called the National Service Training Program (NSTP) mandates all tertiary educational institutions to integrate in their curricula active participation of students in extension and community development initiatives. Such a law affirms the responsibility of universities to the society. It encourages universities to take cognizant of the "needs of the Filipino

people and their aspirations for social progress and transformation," [6]. All of these developments show that universities have to go down from the ivory towers and start taking concrete steps in realizing genuine development through social responsibility.

But how does a university realize the real essence of social development? As it is, social development involves major areas of concern. It is not simply addressing economic poverty, environmental degradation, rapid population growth, major health concerns such as AIDS. Instead, it also seeks to address issues on accessibility, equality, justice, peace and integrity of all creations. With this, genuine development calls for major, integrative and collaborative strategies of all factors in the society. For the purpose of this discussion, the means to genuine development will be possible through the individual. It supports that genuine development begins by *effecting liberating actions* [6] to individuals. This means that the development process capitalizes on the individual's capacity to change his/her condition, improve his/her family's welfare, making a ripple effect of development in the succeeding levels of the society. This process of change that begins from the individual will pave the way for genuine development to be realized.

EDUCATION IN PURSUIT OF GENUINE DEVELOPMENT

A major concern of the development process is alleviation of poverty. The Asian Development Bank defines poverty as a lack of income as well as deprivation and lack of access to essential assets. The essential assets include human, physical, natural financial and social capitals. In 2000, the United Nations Educational, Scientific Organization (UNESCO) considers education as "key to wealth creation", therefore is greatly contributory in reducing poverty. In the same manner, the United Nations Millennium Declaration seeks to ensure that all will have equal access to all levels of education by 2015. Further, it also hopes to make all children complete full course on primary education. This is part of the major goal in order to eradicate poverty in the world.

Addressing poverty through education guarantees the sustainable creation of the necessary human capital that will push for societal change. It is in this light that the university can actually realize its social responsibility. However, this should not be limited only in educating its students. The university can directly contribute in addressing poverty by effecting liberating action to its community. This is where the challenge to realize social responsibility is greater.

Social responsibility entails the university to contribute to the welfare of its community. By this, as presented in ISO/DIS 26000, the university is regarded as one of the stakeholders in the development process of the community. It means that the university has common interests and aspirations with that of the community [4]. Furthermore, whatever happens within the community, the university is also directly or indirectly affected. The university is also at stake and therefore should take cognizant of its contribution to the development process in the community. It is essential that the

university's initiative should not be in contrast with the community's needs and resources. As a basic tenet of community development, all efforts should be based on the community's need. For the university to be truly effective in its social responsibility, it should implement with the community programs that are integrative, inclusive and context sensitive.

DE LA SALLE UNIVERSITY-DASMARIÑAS' SOCIAL RESPONSIBILITY

As a response to the growing number of out of school youth in its vicinity, De La Salle University - Dasmariñas implemented a non-formal education program called "Balik Aral Program" (BAP) in 1993. BAP provides regular learning sessions to out of school youth and adults covering core competencies in Mathematics, Science, Social Studies, Filipino and English. The regular sessions, being facilitated by volunteer teachers and students of DLSU-D, were conducted in the evening inside the university. Learners who attended the learning sessions based on the modules prescribed by the Department of Education, Culture and Sports were expected to take the Philippine Educational Placement Test (PEPT) that measured the level of their functional literacy. Learners, based on the results of the examinations, can either be promoted to a higher level of basic and secondary education. Eventually, the PEPT based non-formal education was enhanced recently to become the Alternative Learning System - Acceleration and Equivalency (ALS - A&E). Learners here still attend learning sessions based on modules covering the same core competencies. After ten months or so of reviewing, the learners take the A&E examination being administered by now Department of Education (Dep Ed). Those who pass the exams can acquire their elementary or high school diplomas.

In a similar model, DLSU-D also implements ALS in their partner communities through the "Hatid Aral Program" (HAP). This is a replication of BAP. A modification was made wherein, the learning sessions are conducted in the community. In addition, HAP relies also on volunteer facilitators from the community. The university organizes group of volunteers from the community to become learning facilitators of the program. In support of this, teachers and students from the university are also enjoined to volunteer as facilitators of the program. Various capacity building activities related to the program are being given to community volunteers to help them become effective facilitators of the learning sessions. At present HAP is being implemented in ten local communities in the province of Cavite, Philippines. The program is also co-implemented with a Catholic Foundation and supported by various beneficiaries.

For the degree program, DLSU-D also implemented the College of Business Administration Free Evening Program starting 1999. The Bachelor's Degree in Business Administration major in Management was initially offered to working, economically disadvantaged undergraduates in the province of Cavite. The evening program is also being taught by volunteer teachers of the university. The volunteer

teachers do not receive any monetary compensation such as allowance or honoraria. Their involvement was part of their community service. Just recently the program was revised and is now a Bachelor's Degree in Business Administration major in Human Resource Development.

Aside from relying on voluntary services of learning facilitators and teachers, all programs also integrate formation and other capacity building activities. These are being done in order to support intellectual development of the learners through the review and regular classroom discussions. The programs believe that formation is very much contributory to the holistic development of the students. The work of education is recognized as a formative process, giving equal relevance to emotional, social and spiritual development of the learners.

EFFECTING LIBERATING ACTION.

All educational outreach programs prove to be effective in carrying out its goals of liberating individuals through education. The main goal of the three educational outreach programs is to create greater access to education among the out of school youth and adults. The university believes that through this, it will be able to help enhance the capacities of individuals. This is with the hope that such initiative will pave the way for self-propelled actions toward individual and societal change. An analysis of its impacts to selected beneficiaries of the program reflects that they were given opportunities to improve at the personal/emotional, social and professional levels. The study conducted by Petil reflected that almost 50% of the BAP learners surveyed were employed after participating in the said educational program, [10]. This was supported by Cabrera, et al, sighting that learners of both BAP and HAP recognized that they were able easily find a job and were able to support their personal needs and somehow made their lives easier. In a similar manner, HAP learners also believe that the ALS program will help them find decent jobs, even if they only finish secondary education. On the other hand, interviewed graduates of the Free Evening Program believed that the said program contributed in honing their skills, which eventually contributed to their success in their job. For instance, one graduate were promoted to a higher post, another in rank. With this, all educational outreach programs contributed in making the learners become more productive. This productivity is a contribution to human capital which is a factor in addressing economic poverty. In terms of the personal level, all three education outreach programs provided opportunities for the learners to recognize their self - worth and made them hopeful about their future. Learners of HAP began to have a positive outlook in life because through the program, they will be able to find a decent job. Such job will help them address their poverty. This made them hope for a better future, [9]. Finally, as to the social aspect of development, respondents of the outreach programs realized that they can not live on their own, instead, they need to co-exist with the other members of the community. Because they already regained their self-worth, the learners have been more confident in interacting with other

people. Furthermore, the learners were also encouraged to become more participative on the development of their respective communities [10]. A graduate of the free evening program admitted that because of his involvement with the program, he was encouraged to do service to his community. In fact, the graduate had already volunteered to be a facilitator of BAP.

The impact of the programs to the learners showed that the program is consistent with the philosophy of human capital. The students were able to enhance their skills, improve their personality and encouraged them to have better aspirations in life. This is a direct contribution to the developmental process happening in their respective communities, with the hope of finally addressing poverty.

CONCLUSIONS AND RECOMMENDATIONS

Based on the analysis, university as a major social institution, can directly effect liberating action to its communities through education. Education, with the interplay of all other factors, can be a means to address poverty. Furthermore, education helps an individual to be liberated from any barriers to his development. The programs also maintain that it did not only develop its learners intellectually, but it also developed the personality of its learners. This is evident in the impact of the formation activities when the learners regained their self-worth and had better aspirations in life. This paves the way for the learners of the educational outreach to improve their quality of lives as it helped them imbibe values and attitudes, as well as develop necessary skills toward the fulfillment of their aspirations. These are relevant factors in addressing personal and familial concerns of the learners, which would possibly impact the immediate communities where the learners belong. Human development, therefore, is a factor in addressing poverty issues.

The programs also present that volunteerism is still a relevant and effective means of effecting liberating action. This is one area that a university can capitalize on in terms of performing its social responsibility. As an institution of learning, the university is a major source of capable human resource that can advance genuine development through volunteerism. Performing social responsibility need not be exhausting and expensive. Instead, members of the university can greatly contribute in the success of outreach programs using their expertise, as well as financial and non-financial resources. However, necessary support mechanisms should also be in place in order to ensure sustainability of involvement of volunteers. All of these endeavors prove that a university can directly contribute to genuine development beyond its functions of instructions and research. The university can advance such goal by seriously fulfilling its social responsibility. Therefore, all these three functions should be seen as equally contributory to the university's goal towards excellence. While instruction is the primary function of a university and research is a means to sustain it, the social responsibility function should be considered as an integrative and complimentary role. The latter is a direct application of knowledge taught through instruction and generated through

research. More than image building, social responsibility should be part of what makes a university truly relevant and excellent.

It is suggested that further studies focusing on the contribution of the beneficiaries of the education outreach programs, and on a larger scale, similar social responsibility endeavors, to the development process is being suggested. This is to examine more in details the impact of developing individuals through the university's social responsibility. Follow up studies can also look into the depth and sincerity of social responsibility endeavors of universities and their abilities to sustain such effort. Finally, as presented in the discussion, exploring on the possibility of including social responsibility as a major criterion in evaluating and ranking universities in the world is also being proposed in future studies.

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The Impact of Promotional Mix to Widyatama University's Brand Image in the District of Cinajur (Research at High Schools in the District of Cianjur)

Adam Faritzal and Sri Wiludjeng Sp

One strategy that can be done here is the promotion implementation through the elements of promotional mix such as: advertising, sales promotion, event, public relations, personal selling and direct marketing. With the optimal promotional elements implementation, the brand image is expected to be improved. The research is conducted at high schools in the district of Cianjur. The objectives of this research are: to determine the effective promotional elements applied by Widyatama University in improving its brand image in the district of Cianjur, to know people's response and perspective to the brand image of Widyatama University in district of Cianjur, and also to see how much the promotion implementation can improve the brand image of Widyatama University in the district of Cianjur. The research method used in this research is descriptive method. The data collection is done by making and spreading questionnaire, doing interview, and reviewing some relevant literatures. Based on the data processed by using SPSS (12.0) and the discussion which has been conducted, the results obtained are as follows; that the response of prospective students in Cianjur to the promotional mix implementation of Widyatama University, can be said to be quite good, because it is on the 2.60 - 3.39 interval. However, from the five promotional elements done by Widyatama University, the sales promotion element has the best result, which resulted 4.45. The second place is for the advertising element, showing the result of 3.17. Furthermore, the response of the prospective students in Cianjur to the brand image of Widyatama University is also quite good, regarding to its position on the 2.60 - 3.39 interval. Based on the results obtained, the research hypothesis can be significantly accepted. Regarding to the results listed above, writer can conclude that the promotional mix implementation of Widyatama University, especially in Advertising and Sales Promotion, has been good enough. Then, writer recommend to Widyatama University, that in doing promotion in Cianjur, it's better to use sales promotion element. It can be conducted in various ways, such as exhibitions, prize (such as laptop prize), scholarship, coupon, vouchers, buy one get one, cash back, installment of tuition fees, tuition fees discount, and other facilities provided. In addition to sales promotion, writer also recommend promoting activity through the advertising mix element, because it is still quite interesting for the prospective students in Cianjur. Advertising activities can be done through leaflet, brochure, magazine, banner, billboard, signage (gate) mounted in Cikutra

Street, etc. Whereas, the electronic media of advertising can be done through internet, facsimile, etc.

Key Word : Promotion, Promotional Mix, Brand Image

CHAPTER I INTRODUCTION

1.1 Background

University of Widyatama has produces 12.451 graduates since it was founded. (source : University of Widyatama LDE : graduate data from 1985 to 2008). Based on the data collected concerning with graduate's total, University of Widyatama is deserved to be well- known university, especially by Bandung people. However, University of Widyatama has been being promoted by the marketing bureau (Zulganef, 2009).

University of Widyatama has also carried out the promotion by advertisement. This promotion has been conducted by both electronic and printed media such as newspaper with once in certain period – frequency. This promotion has also been promoted by brochure, leaflet, poster, baligo, banner and street banner. University of Widyatama has spread twenty banners with standard size throughout the targeted city. (data source: Public Relation and Marketing of University of Widyatama, 2008-2009). The other promotion done was sales promotion by organizing several events, expo, and road show or targeted high school-visiting in several cities of West Java.

Another promotion was by public relation and publicity. It was by conducting gathering and making some news on media. The one-year total target of news reached 100 to 150 news. (data source: public relation and marketing of University of Widyatama, 2008-2009).

Meanwhile, the personal selling promotion was conducted by get member and mailpost. University of Widyatama has also conducted direct marketing promotion activity. This promotion involved presentation activity in targeted high school class rooms, mailing, campus-visiting and website (data source: public relation and marketing of University of Widyatama, 2008-2009). The whole University of Widyatama promotion activities has been an promotion attempt in order to reach specified objectives by University of Widyatama. Those promotion activities haven't been optimal yet.

This could be seen according to Table 1.1. It showed

that Cianjur region just reached the 4th position, this was caused by the data collected which showed that the students to be in Cianjur haven't known the university yet, and this was showed by comparing the students to be data in all regions.

Tabel 1.1
The Recapitulation of Students to be
from 2007 to 2009

Asal SMA (Daerah)	Jumlah	Persentase
Sukabumi	73	18.86
Cirebon	73	18.86
Tasikmalaya	53	13.7
Cianjur	44	11.37
Kuningan	34	8.79
Sumedang	35	9.04
Majalengka	21	5.43

Sumber data : Marketing Universitas Widyatama.

Cianjur actually has the most residents that reach 2.179.306 of the other cities, like Kuningan 1.073.172, Sumedang 1.043.340, and Majalengka 1.184.760.

Tabel 1.2
Students to be Data in West Java

No	Regency/City	Region width (Km2)	Total Residents	Density (Inhabitant/Km2)
1	Bogor Regency	3.440,71	3.945.111	1.147
2	Sukabumi Regency	3.934,47	2.210.091	562
3	Cianjur Regency	3.432,96	2.079.306	606
4	Cirebon Regency	988,28	2.084.572	2.109
5	Indramayu Regency	2.000,99	1.749.170	874
6	Kuningan Regency	1.178,58	1.073.172	911
7	Majalengka Regency	1.204,24	1.184.760	984
8	Bekasi Regency	1.484,37	1.917.248	1.292
9	Karawang Regency	1.737,53	1.939.674	1.116
10	Purwakarta Regency	969,82	760.220	784
11	Subang Regency	2.051,76	1.406.976	686
12	Bandung Regency	2.000,91	4.134.504	2.066
13	Sumedang Regency	1.522,21	1.043.340	685
14	Garut Regency	3.065,19	2.260.478	737
15	Tasikmalaya Regency	2.680,48	1.635.661	610
16	Ciamis Regency	2.556,75	1.522.928	596
17	Depok City	200,29	1.353.249	6.756
18	Bogor City	21,56	833.523	38.661
19	Sukabumi City	12,15	278.418	22.915
20	Cirebon Regency	37,54	276.912	7.376
21	Bekasi City	210,49	1.931.976	9.178

22	Bandung City	167,27	2.290.464	13.693
23	Cimahi City	48,42	482.763	9.970
24	Tasikmalaya City	471,62	579.128	1.228
25	Banjar City	1.135,90	166.868	147
Jumlah		34.816,96	39.140.812	125.689

Source : Region Economy Social Survey in 2004

According to the background above, the writer is interested in conducting the research titled: "THE INFLUENCE OF PROMOTIONAL MIX TOWARD UNIVERSITY OF WIDYATAMA BRAND IMAGE IN CIANJUR REGENCY" (A Study Case at High Schools in Cianjur Regency)

1.2 The Problem Identification

According to the background above, the writer identified the research problems are:

1. How the Cianjur Regency students to be responds toward PROMOTIONAL MIX by University of Widyatama in Cianjur Regency are?
2. How the Cianjur Regency students to be responds toward University Of Widyatama Brand Image are?
3. How deep the influence of promotional mix toward University Of Widyatama Brand Image in Cianjur Regency is?

1.3 The Research Purpose

The Research Purpose is to expose:

1. How the Cianjur Regency students to be responds toward PROMOTIONAL MIX by University of Widyatama in Cianjur Regency are?
2. How the Cianjur Regency students to be responds toward University Of Widyatama Brand Image are?
3. How deep the influence of promotional mix toward University Of Widyatama Brand Image in Cianjur Regency is?

1.4 The Significance of research

The Significances of research are:

1. Institution :
For the implementation and development of promotional concepts in increasing University Of Widyatama Brand Image, hence the University Of Widyatama is able to support government in enhancing the nation perspicacity and human resources skill upgrading.
2. Practitioner:
As the basic consideration of promotional implementation program in creating higher education brand image.

1.5 Thought Framework and hypothesis

Promotion is one of the essential variables in marketing mix in communicating the products to society. The definition of promotion defined by William J. Stanton was: "Promotion is one of element in the company marketing mix which used for informing, persuading, and reminding company products". There is promotion purpose defined by **Saladin dan Yevis (2002;126) is to build (Awareness); (Interest); (Desire); (Action)**. And the medium used in promotion complementation is : **Advertising; Sales Promotion, Public Relation dan Publicity, Direct marketing dan Personal Selling (Philip Kotler ;2007;204-205)**. So that the management must arrange and manage the fee for supporting promotion implementation. Promotion activity established by the University of Widyatama is one of the marketing strategies which is able to introduce to their students to be, and is able to affect the students to be attitude toward the University of Widyatama brand image.

The purpose of this promotion strategy is to create positive image toward the promoted brand, and to introduce and implant the brand image of the University of Widyatama on the students' mind.

According to Kotler (2006;256), Brand definition is:

"Brand as a name, term, sign, symbol, or design, or a combination of them, intended to identify the goods or services of one seller or groups of sellers and to differentiate them from those of competitors".

According to *American Marketing Association (AMA)* cited by Freddy Rangkuti (2002;1), brand definition as follows:

"Brand as a name, term, sign, symbol, or design, or a combination of them, intended to identify the goods or services of one seller or groups of sellers and to differentiate them from those of competitors".

Meanwhile, Kotler (2006;268) defined brand image as follows:

"Brand Image is the perceptions and beliefs held by consumers, as reflected in the associations held in consumer memory".

According to Leon Schiffman, brand image's definition is:

"A collection of association concerning with the brand which is kept on consumers' mind and memory".

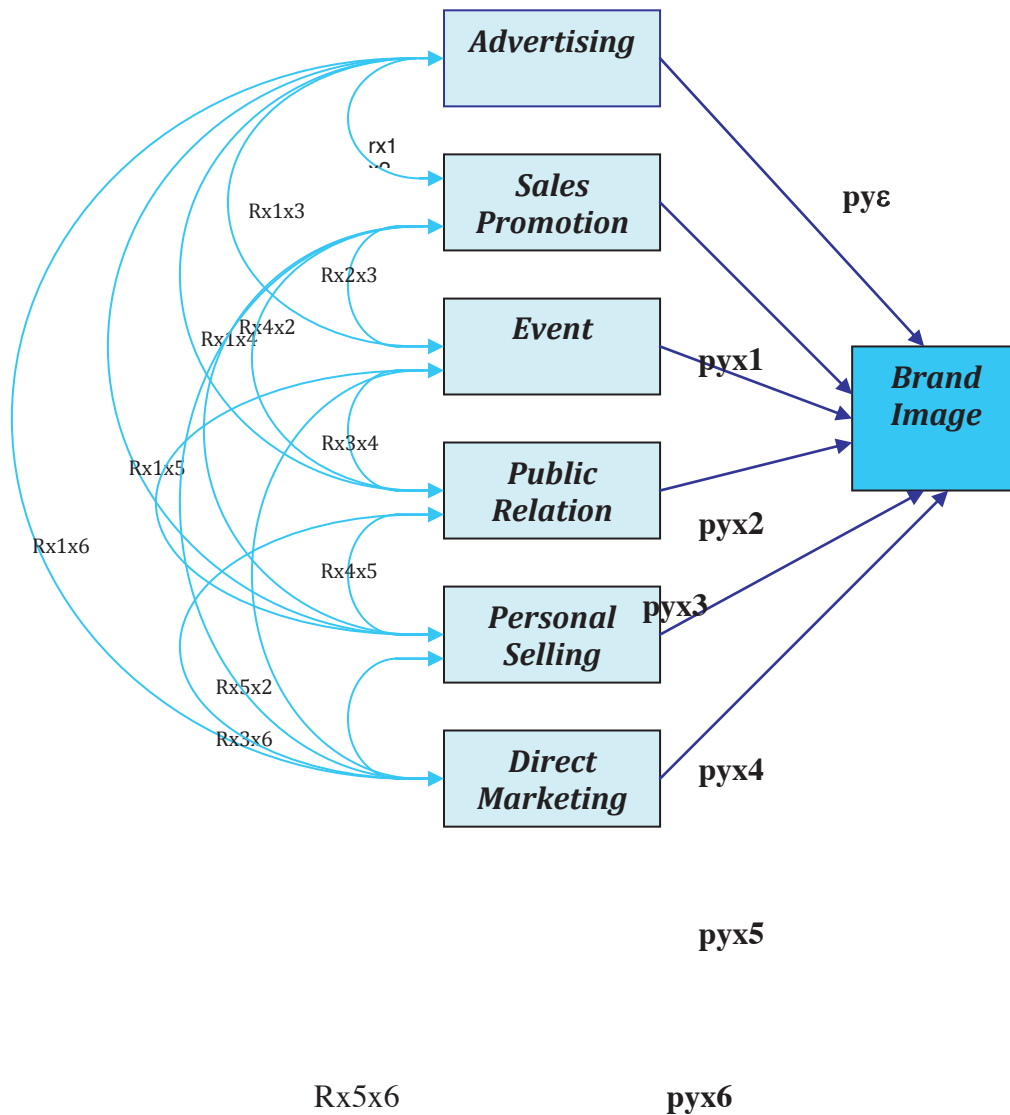
So, the elements should be paid attention in one brand are:

- a. Recognition is how the brand well-known is
- b. Reputation is a brand level which can be proved by having the good record
- c. Affinity is how big the emotion relationship between the brand and its costumers is.
- d. Domain is how big the scope of a product which like to use certain brand is.

This brand-giving on product needs enough budgets, especially for promotion. However, by using the correct marketing strategy, it would build the positive image of the brand on costumers' mind. Positive image on one brand is enable the consumers behave loyal on one product.

According to Philip Kotler (2007:204-205), the influence of promotion on brand image is: **"Promotion is always an essential part in selling the goods or services in rapid time. The company not only sells its instant goods or services, but rather focused on sturdy brand image implantation"**. Based on the theory above, it can be seen that the promotion purpose is to increase brand image, not just selling the goods or services.

Figure 1.1
Thought framework



Source: the writer's analysis

Based on the thought above, the writer stated the hypothesis that:

"The promotional mix has positive influence toward the University of Widyatama brand image in Cianjur Regency".

1.6 The Research Time and Location

To get necessary data, the writer conducted the research at Cianjur Regency high schools. The time period was on January 2010 until it's finished.

1.7 The Review of Related Literature

The actual marketing function is to identify the needs of consumers, develop the appropriate product, specify the price, hold distribution and hold effective promotion.

According to AMA (American Marketing Association) cited by Kotler (2006;6) as follows :

"Marketing is an organization function and a set of processing for creating, communicating, and delivering value to customer and for managing customer relation-

ship on ways that benefit the organization and it's stake holders".

Meanwhile, Prof. DR. H. Buchari Alma (2005;179) stated that :

"Promotion is kind of communication that gives explanation that convince the consumers about the goods or services.

1.8 The Research Object and Design

The research objects were promotion activity and brand image. The data collected were from high school students' perceptions in Cianjur consist of 13 state high schools and 29 private high schools.

1.9 The research design

a. The used method

This research used descriptive and explanatory method. According to Moh Nazir (2003;54), descriptive method is:

“A method that observes human group status, object, condition setting, thought system or events in the present time.”

Meanwhile, Dr. Zulganef, Drs., M.M defined explanatory method as follow:

“A research aimed to discuss causality of variables that explains certain phenomena”.

b. Data Collecting Technique

The data collection is necessary in this research. So the writer collected the data by conducting field research with questionnaire, interview and observation.

c. The research variable

To get the research organized, it is necessary to determine observed variables:

- Independent Variabel

A variable affects another dependent variable. The variable is intended to promotion (x).

- Dependent Variabel

A variable affects another independent variable. The variable is intended to brand image (y).

d. Variable Operation

The variable and the indicator can be operated as follows:

Variable	Concept	Sub Variable	Indicator	Size	Scale
Promotion (Variabel X)	“Promotion is kind of communication gives convincing explanation to consumers to be about goods and services” Alma (2005;179)	Advertising	Media	Media selection is proper	Ordinal
			Message	The presented message can be accepted	Ordinal
			Advertisement Design	Represent product image	Ordinal
		Promosi Penjualan	Attracting	Anxiety level on product	Ordinal
			Persuading	Is able to direct or guide society to be a consumer	Ordinal
		Event	Expo	Is able to give description to consumers about Widyatama University	Ordinal
		Public relation	Product Publication	Traction level of product publication	Ordinal
		Personal selling	Seller Ability	Consumer is able to know the product deeper	Ordinal
		Direct marketing	Complete Information	Complete information availability	Ordinal
			Convenient and Broad Information Network	Consumer is easy to get the information about Widyatama University	Ordinal

Variable	Concept	Sub Variable	Indicator	Size	Scale
<i>Brand Image</i> (Variabel Y)	“Brand as a name, term, sign, symbol, or design, or a combination of them, intended to identify the goods or services of one seller or groups	<i>Recognition</i>	Dikenal	Fame level	Ordinal
			Brand name	Facilitation level of consumer to say and remember the brand	Ordinal
			Familiar brand	Consumer often hears Widyatama University brand	Ordinal
			Logo	Facilitation level of consumer to recognize the logo	Ordinal
	of sellers and to differentiate them from those of competitors”. Kotler (2006;256)		Slogan	Facilitation level of slogan to remember	Ordinal
		<i>Reputation</i>	Quality	Product quality level	Ordinal
			Achievement	Achievement level	Ordinal
		<i>Affinity</i>	<i>Life style</i>	Brand Suitability level on lifestyle	Ordinal
			User’s Image	Give conviction of Widyatama brand	Ordinal
		<i>Domain</i>	width scope of one brand product	Widyatama brand use level with another product	Ordinal

e. Data resource, population and sample

The data used in this research consisted of premier data and secondary data. The research population was 17.085 spread out at high schools in Cianjur Regency. The sample taken in this research was 100 people, as it was considered homogeny. The population homogeneity shown were the third grade of students of high school in **Cianjur**.

e.1 Data Tabulation Technique

The data collected was processed and analyzed immediately. The data analysis was held by both quantitative and qualitative, the qualitative data held by describing respondent answers, and then it was presented in table form, whereas, the quantitative data analysis was held by using statistic calculation.

a. Path analysis

This technique requires some data requirements with at least interval in measurement level; hence it is necessary to convert the ordinal data to be interval data first from the questionnaire by using *Methods of Successive Interval (MSI)* with the steps as follow:

1. Take note of each question.
2. For each item, count on the answer frequency (f), how many the respondents who get score on 1,2,3,4 or 5.

3. Determine the proportion (p) by dividing the frequency by respondent total.
4. Count on cumulative proportion (cp)
5. Find out Z value for each gained cumulative proportion by using normal table.
6. Determine the scale value for each Z value with formula:

$$\text{Scale Value} = \frac{(\text{Density at lower limit}) - (\text{Density at upper limit})}{(\text{Area below upper limit}) - (\text{Area below lower limit})}$$

After that, change the smallest scale value into similar with one and transform each scale based on the smallest scale change, so it will be gained transformed Scale Value (TSV).

a. Prepare the paired data of independent variable and dependent variable from all research samples for hypothesis testing.

An analysis is used to determine how big one variable influence toward the other is. The effect bigness of one independent variable toward dependent is called path coefficient and symbolized P_{xyi} . The data processed comes from one sample sized n.

To determine the effect bigness of one variable toward the other, it needs some requirements as follow:

- The variable correlation should be linear and additive correlation.
- All residue variables do not have correlation each other.
- The correlation pattern on variables is reclusive
- The measurement scale on both dependent interval and independent interval is at least interval.

If the requirements filled, the path coefficient can be calculated by work step as follow:

- Draw the path diagram for the correlation on variables completely.
- Count on how big the direct effect of exogenous to endogenous is, it is stated by the bigness of numeric value of path coefficient from exogenous variable.
- According to the data existed, count on the simple correlation coefficient by using formula :

$$r_{yx_1} = \frac{n \sum_{i=1}^n x_i y_i - \sum_{i=1}^n x_i \sum_{i=1}^n y_i}{\sqrt{n \sum_{i=1}^n x_i^2 - \left[\sum_{i=1}^n x_i \right]^2} \sqrt{n \sum_{i=1}^n y_i^2 - \left[\sum_{i=1}^n y_i \right]^2}}$$

- Count on path coefficient by using formula:

$$P_{xyi} = \sum_{j=1}^k CR_{ij} r_{yxi}$$

Information :

P_{xy} = coefficient path of X_i variable toward Y variable

R_{yxi} = correlation between Y variable and X_i variable

CR_{ij} = the element part on the 1st row and 1st column and j column of correlation inverse matrix

Then, we can count on how big the effect of all independent variables toward dependent variable resembling by using formula:

$$R^2_{yx1\dots} = \sum_{i=1}^k P_{yx1} r_{yx1}$$

After the calculation gained, it can be counted on how big the other variable not in the research ($P_{y\epsilon}$) is by using formula:

$$P_{y\epsilon} = \sqrt{1 - R^2_{yx1\dots k}}$$

After the path correlation calculated, the next step is conducted by hypothesis testing for proving whether independent variable observed is influencing significantly toward dependent variable.

G. Hypothesis Test

It is used to test whether there is significant influence between X variable and Y variable, so it uses Z statistic Test by using formula as follow:

$$z = r_s \sqrt{n-1}$$

In this case, the writer used conviction level on 95%, so that the probability of faulty level was 5% with α symbol. To test whether the effect of X variable (promotional mix) and Y variable (brand image) are significant or not, so it used hypothesis as follow:

$H_0 : r_s \leq 0$ Promotional mix influenced negatively on brand image.

$H_a : r_s > 0$ Promotional mix influenced positively on brand image.

Next, Z count result is compared with Z table with following testing criteria:

If $z_{\text{count}} \geq z_{\text{table}}$ so H_0 will be denied and H_a is accepted

If $z_{\text{count}} < z_{\text{table}}$ maka H_0 will be accepted and H_a is denied

1.10. The Research Result

The collected data tabulation resulted that the respondent responses on promotional mix by the University of Widyatama totally can be viewed in the table below:

The Recapitulation of Respondent Reaction on Promotional mix by the University of Widyatama

No	Statement	VA	A	QA	LA	D	Total	Average	Info
Advertising									
1	I think, Widyatama University has chosen the proper promotional media (Brochure, Banner, Poster, News, Radio)	11	47	32	8	2	357	3,57	B
2	I think the commercial meaning held by Widyatama University is understood	2	42	45	9	2	333	3,33	CB
3	I think the commercial design made by Widyatama University is interesting	3	37	48	11	1	330	3,3	CB
Sales Promotion									
4	The information I got about Widyatama University attracts me	0	23	41	26	10	277	2,77	CB
5	The information about Widyatama University can be persuasive, So I choose Widyatama University to continue my higher education	3	8	32	46	11	246	2,46	TB

6	I got Widyatama University preview from expo events or other promotions	4	11	31	24	30	235	2,35	TB
Public Relation									
7	My school has been visited by Widyatama University by road show event.	2	11	12	24	51	189	2	TB
8	I think the marketing division of Widyatama University has done well in promoting and presenting information about Widyatama University	1	15	38	36	10	261	1	TB
Personal Selling									
9	I think the information presented by Widyatama University is clearly complete,	1	18	45	31	5	279	2,79	CB
10	I can easily get the information about Widyatama University via internet or another promotion	5	33	33	22	7	307	3,07	CB
Σ Average X								28,14	
Average X								2,814	CB

Source: The writer's tabulation

Based on the table above, it can explain that the promotional mix implementation held by the University of Widyatama is good enough, as it is on interval 2.60 to 3.39.

It clearly explain that the promotion was carried out around new students selection.

B. The Respondent Reaction on Brand Image of Widyatama University in Cianjur Regency

Whereas, The Respondent Reaction on Brand Image of Widyatama University can be viewed on the table below.

The Analysis of Respondent Statement on Brand Image of Widyatama University in

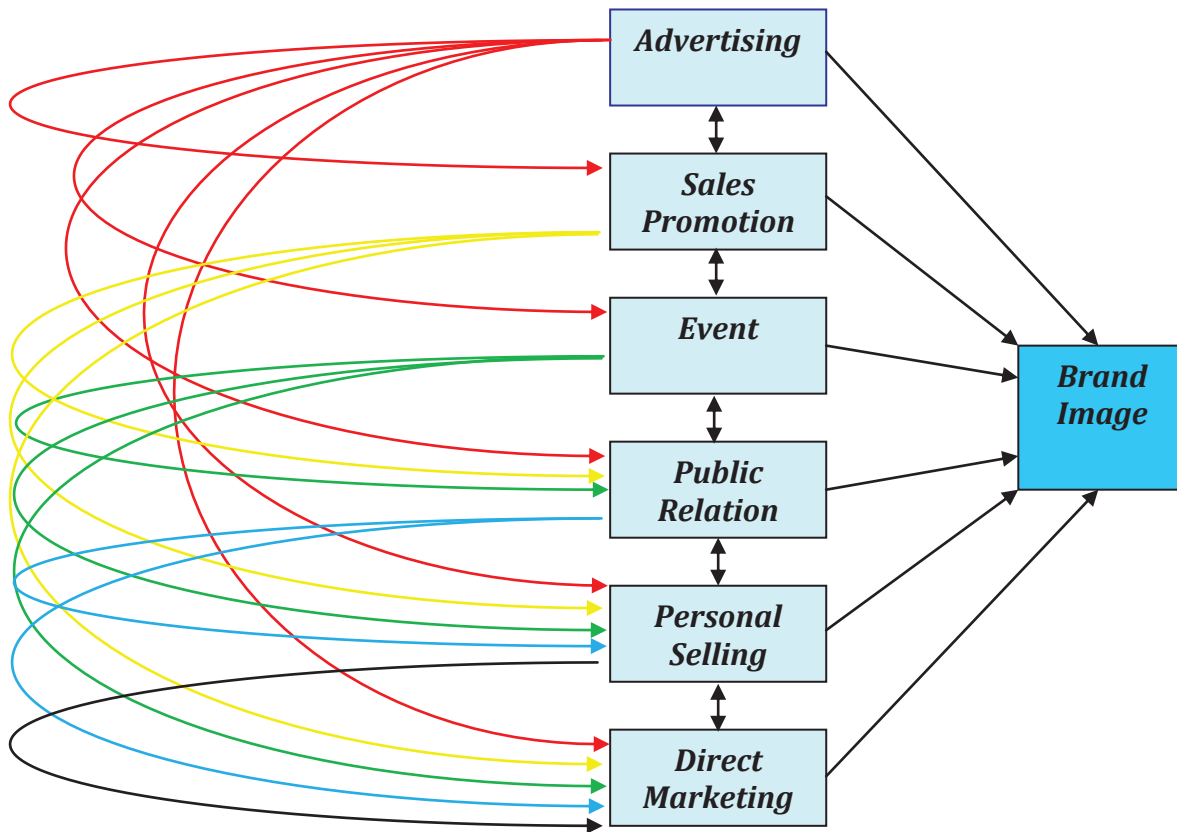
No	Statement	VA	A	QA	LA	D	Total	Average	Info
Advertising									
1	I think, Widyatama University has chosen the proper promotional media (Brochure, Banner, Poster, News, Radio)	11	47	32	8	2	357	3,57	B
2	I think the commercial meaning held by Widyatama University is understood	2	42	45	9	2	333	3,33	CB
3	I think the commercial design made by Widyatama University is interesting	3	37	48	11	1	330	3,3	CB
Sales Promotion									
4	The information I got about Widyatama University attracts me	0	23	41	26	10	277	2,77	CB
5	The information about Widyatama University can be persuasive, So I choose Widyatama University to continue my higher	3	8	32	46	11	246	2,46	TB

	education								
6	I got Widyatama University preview from expo events or other promotions	4	11	31	24	30	235	2,35	TB
Public Relation									
7	My school has been visited by Widyatama University by road show event.	2	11	12	24	51	189	2	TB
8	I think the marketing division of Widyatama University has done well in promoting and presenting information about Widyatama University	1	15	38	36	10	261	1	TB
Personal Selling									
9	I think the information presented by Widyatama University is clearly complete,	1	18	45	31	5	279	2,79	CB
10	I can easily get the information about Widyatama University via internet or another promotion	5	33	33	22	7	307	3,07	CB
Σ Average X								28,14	
Average X								2,814	CB

Source: The writer's tabulation

Based on the table above, it can explain that the brand image held by the University of Widyatama is good enough, as it is on interval 2.60 to 3.39. It clearly explains that the promotion was carried out around new students' selection.

- a. The influence of promotional mix toward the University of Widyatama Brand Image in cianjur regency. In analyzing the influence, the writer used path analysis with the result amount of occurring correlation as follow:



The amount of variable correlation presented on the table as follow:

The correlation between x variable and y variable

	Y	X1	X2	X3	X4	X5	X6
Y	100%	43%	47,1%	13,1%	9,7%	20,2%	17,3%
X1	43%	100%	37,6%	21,2%	25,5%	34,2%	23,5%
X2	47,1%	37,6%	100%	42,1%	39,9%	47,4%	23,4%
X3	13,1%	21,2%	42,1%	100%	41%	34,4%	22,2%
X4	9,7%	25,5%	39,9%	41%	100%	38,1%	14,3%
X5	20,2%	34,2%	47,4%	34,4%	38,1%	100%	43,6%
X6	17,3%	23,5%	23,4%	22,2%	14,3%	43,6%	100%

Source : tabulation data of SPSS

Based on SPSS calculation and table above, it can explain as follow:

a. Direct Influence

Variable Influence X1 (advertising) toward Y (brand image) = 31,7%
Variable Influence X2 (sales Promotion) toward Y (brand image) = 44,9%
Variable Influence X3 (Event) toward Y (brand image) = -6,4%
Variable Influence X4 (Public Relation) toward Y (brand image) = -11,5%
Variable Influence X5 (Personal selling) toward Y (brand image) = -7,8%
Variable Influence X6 (Direct Marketing) toward Y (brand image) = 5,9%

b. Indirect Influence

Variable Influence X1 toward Y by X2 = $(0,317 \times 0,376) = 0,119$
Variable Influence X1 toward Y by X3 = $(0,317 \times 0,212) = 0,067$
Variable Influence X1 toward Y by X4 = $(0,317 \times 0,255) = 0,081$
Variable Influence X1 toward Y by X5 = $(0,317 \times 0,342) = 0,108$
Variable Influence X1 toward Y by X6 = $(0,317 \times 0,235) = 0,074$
Variable Influence X2 toward Y by X1 = $(0,449 \times 0,376) = 0,169$
Variable Influence X2 toward Y by X3 = $(0,449 \times 0,421) = 0,189$
Variable Influence X2 toward Y by X4 = $(0,449 \times 0,399) = 0,179$
Variable Influence X2 toward Y by X5 = $(0,449 \times 0,474) = 0,213$
Variable Influence X2 toward Y by X6 = $(0,449 \times 0,234) = 0,105$
Variable Influence X3 toward Y by X1 = $(-0,064 \times 0,212) = -0,014$
Variable Influence X3 toward Y by X2 = $(-0,064 \times 0,421) = -0,027$
Variable Influence X3 toward Y by X4 = $(-0,064 \times 0,410) = -0,026$
Variable Influence X3 toward Y by X5 = $(-0,064 \times 0,344) = -0,022$
Variable Influence X3 toward Y by X6 = $(-0,064 \times 0,222) = -0,014$
Variable Influence X4 toward Y by X1 = $(-0,115 \times 0,255) = -0,029$
Variable Influence X4 toward Y by X2 = $(-0,115 \times 0,399) = -0,046$
Variable Influence X4 toward Y by X3 = $(-0,115 \times 0,410) = -0,047$
Variable Influence X4 toward Y by X5 = $(-0,115 \times 0,381) = -0,044$
Variable Influence X4 toward Y by X6 = $(-0,115 \times 0,143) = -0,016$
Variable Influence X5 toward Y by X1 = $(-0,078 \times 0,342) = -0,027$
Variable Influence X5 toward Y by X2 = $(-0,078 \times 0,474) = -0,037$
Variable Influence X5 toward Y by X3 = $(-0,078 \times 0,344) = -0,027$
Variable Influence X5 toward Y by X4 = $(-0,078 \times 0,381) = -0,030$
Variable Influence X5 toward Y by X6 = $(-0,078 \times 0,436) = -0,034$
Variable Influence X6 toward Y by X1 = $(0,059 \times 0,235) = 0,014$
Variable Influence X6 toward Y by X2 = $(0,059 \times 0,234) = 0,014$
Variable Influence X6 toward Y by X3 = $(0,059 \times 0,222) = 0,013$
Variable Influence X6 toward Y by X4 = $(0,059 \times 0,143) = 0,008$
Variable Influence X6 toward Y by X5 = $(0,059 \times 0,436) = 0,026$

The next step is hypotheses testing calculation, as it used the formula as follow :

$$z = r_s \sqrt{n-1}$$

$$z = 0,568 \sqrt{100-1}$$

$$z = 5,6229$$

To test whether there is significant influence between X variable (promotional mix) and Y variable (brand image) or not, hence, the hypothesis as follow:

Ho : $r_s \leq 0$ Promotional mix influenced negatively toward brand image.

Ha : $r_s > 0$ Promotional mix influenced positively toward brand image.

After that, the result of z_{count} was compared with z_{table} and we get 5.6229 compared with 1.645, it means that $z_{\text{count}} \geq z_{\text{table}}$ hence, Ho will be denied and Ha is accepted, therefore, the hypothesis stated "The promotional mix has positive influence toward the University of Widayatama brand image in Cianjur Regency" is acceptable.

1.11 Conclusion

According to the research explanation which was conducted, we may conclude that:

1. The Cianjur Regency students to be respond toward PROMOTIONAL MIX by University of Widyatama was good enough, for it were in the interval of 2.60-3.39. However, of the five promotional mixes, the sales promotion sector had a good result, as it showed 4.45 rating and the second position was advertisement promotion sector with 3.17 rating.
2. The Cianjur Regency students to be respond toward University Of Widyatama Brand Image was good enough, for it was in the interval of 2,60 – 3,39.?
3. The influence of promotional mix in sales promotion sector toward University Of Widyatama Brand Image reached 44.9, it can be explained that sales promotion had a higher effect than the other promotional mixes. The second chart of promotional mix influencing the brand image was advertising with 31.7 rating.?

1.12 Suggestion

According to the conclusion above, the writer gives suggestion to the University of Widyatama that the promotional mix in sales promotion sector in Cianjur is better attempts than the others. It can use several methods such as exhibition, reward (laptop), scholarship, coupon, voucher, buy one get one program, cash back, school fee installment, college fee discount, and other facilities.

In addition to sales promotion, the writer suggests that the promotional mix by advertising event is effective. For it's still interested by students to be in Cianjur. Advertising activity can be implemented by advertising brochure, leaflet, magazine, banner, ballyhoo, name board gate put on Cikutra Street, etc. Meanwhile, the electronic media can use internet, facsimile, etc .

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Institutional Research Capabilities of a Maritime University in Asia: Pathway towards Global Excellence in Maritime Education

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Abstract — The study examined the institutional research capabilities of a maritime university, specifically, John B. Lacson Foundation Maritime University, as a higher education institution and the only maritime university in the South East Asia. This study used descriptive research design by utilizing survey, interview, and documentary analysis. The instrument was submitted to the experts for validity and the reliability by the researcher. The study showcased the different research practices, achievements, developments, and collaborations of the University with other research agencies in the Asia as pathways towards global excellence in maritime education. Results revealed the research outputs of the faculty members and staff at maritime university. The study also highlighted the research outputs presented at the national and international conventions and conferences. Comments and suggestions to further strengthen and sustain the research capabilities were captured, specifically the support of the administration, research incentives, and publication. In terms of networking and collaboration, the maritime university showed a very strong connection with the different agencies that demonstrate better research capabilities in this part of Asia. The interactions and responses with neighboring higher learning institutions had contributed to the aim of building strong and dynamic research capabilities of JBLFMU-Molo, Iloilo City as a maritime university in Asia.

Keywords— institutional research capabilities, practices, achievements, development, collaborations

I. INTRODUCTION

Research is the defining character that differentiates a higher education institution from basic education institution. Knowledge creation is the primary mandate of higher education in order to propel national development through a cadre of professionals imbued with new knowledge, skills, and attitudes that will make them global Filipinos [1].

Using research as a tool towards excellence is one of the aims of every higher education institutions. The research leads to the attainment of global competitiveness in education. Research objectives are the same with education; these are aimed to develop the knowledge, skills, and character—to lead a man in the condition of continually asking questions. Education and research have purposes and functions. The purposes are the fundamental goals of the processes – an end to be achieved, while functions are the outcomes that may occur as a natural result of the process – products or consequences. To achieve the goal of a university, education plays an important role.

The challenge of globalization demands critical attention to research in order to generate knowledge and discover new strategies for improving the quality of human life. Colleges and universities are look up to for research that generates new knowledge and technologies [2].

Another comment on academic excellence in relation to research is summarized in the statements below:

Academic excellence must be viewed in terms of excellence in practical or applied learning. Learning theories and concepts is not enough. Application and practical use of these theories and concepts will make the learner a productive member of society. It is not the quantity of knowledge but more important it is how much knowledge can be put to good use. We need graduates whose lives will be full of action and not with heads of facts. The degree of the utilization of new knowledge is quite low and new knowledge is not transmitted and disseminated effectively. A mechanism that will facilitate the dissemination of new knowledge should be put in place and more research on the utilization of new knowledge urged [3].

Moreover, Tom Peters reminds the educators and researchers of the passage that “What gets measured, gets done.” This means that content of assessment drives education. Research, in this regard implies a way of assessing the quality of education an institution has. It is also a gauge in which an institution boosts its strength. Thus, this led the researcher to present the capabilities needed by the university to address global issues and formulate alliances with different research entities. Research is also considered as the lifeblood of every university as one of the major functions of higher education institutions aside from instruction, extension services, and production [4]. Peters further states the importance of research by stating that:

Research serves as the backbone of university in uplifting the education of its students as its students form for global competitiveness. It enhances the usefulness of education in its function as a producer of individuals in its holistic dimension. It should be pragmatic in its approach by stressing the controlling dominance of practical over theoretical reasons produced in classroom instructions. Research should not be taken as a means of fact finding or gathering of facts and writing them down in documented paper. It is simply a systematic quest for undiscovered truth, a search for an answer to unresolved and perplexing question [5].

Tan in her study entitled, “Toward a High Impact Research Undertaking: A Synergy of Utilization and Evaluation,” emphasized that research in universities has been given more attention and support by both the administrators and faculty members. This attention to engage in more researches is brought about by the desire of most universities to gain higher level of recognition in society and by their desire to respond to the changing needs of the students and the society. She added that “innovations and changes in higher education can therefore be attributed to the quality and impact of research undertakings, validity, and reliability of research tools and data, and institutional research capability; when the quality outputs are utilized appropriately, innovations and changes shall be beneficial to the discipline, institutions, and people concerned” [6].

Santos has of the same opinion when he stressed that “research and development is a must in this time of rapid information and technology expansion. Therefore, a university must do its role of being the partner for the sustained development of the country. Through research, knowledge is created. It is through research that experts and authorities in specialized fields of study are developed” [7].

More specifically, the present study elucidated the research capabilities of a maritime university in the Philippines. To further understand the focal point of this investigation, the researcher analyzed the research capability of the university by studying its “research culture.” The institution’s research culture plays an important role in the realization of research objective as discussed in the study entitled “Research Culture of Private Higher Education Institution” conducted by Quilang. The study stressed that:

Research Culture exerts an important influence on academic institutions and the people who work in them. Indicators of research culture are research infrastructure, research capability, research budget, research linkages, and research productivity in the academe. In line with this, research training to enhance research capability is needed. Research seminar-workshop aimed to build research-related knowledge and competence. Forum as an avenue for disseminating research findings and project outputs and publication are highly recommended. Research officers’ general knowledge, qualification, and experience also are important factors to consider in proving and leading the delivery of outstanding discharge of research function [8].

In another study entitled, “The Central Bicol State university (CBSU) Research Division 1985-2009: An Assessment”, the researcher explained the necessary elements needed in attaining research capability. The elements mentioned are the following: (a) sponsoring research capability development training and workshops, (b) in-house review and proposal presentations, (c) establishing linkages with national and international institutions that gave funding support, (d) development of training modules, assessment, and monitoring, (e) encouraging faculty and students to participate in the excellence awards and competitions [9].

The dramatic involvement of faculty in Research and Development were crafted well from incentive, credits, grants, de-loading, support, and equivalency [10], [11], [12]. In many universities in the Philippines, incentives in conducting research are already institutionalized.

Research capability is also considered as essential element in the function of attaining the university’s goals and objectives. How about in a maritime university? Are research capabilities, practices, and collaborations needed to respond to global demand in maritime industry in Asia and in the whole world at large? In line with these assumptions, this study was conceived.

II. THE PROBLEM

The present study examined the research capabilities of a maritime university, specifically, John B. Lacson Foundation Maritime University-Molo, Iloilo City, Philippines. To understand the study better, the following specific questions were advanced:

- (1) What are the different research activities and practices of JBLFMU for the last three (3) school years (SY 2008-2009, SY 2009-2010, & SY 2010-2011)?
- (2) What are the research achievements and developments through international presentations for the last three (3) school years (SY 2008-2009, SY 2009-2010, & SY 2010-2011) as the only maritime university in the Asia?
- (3) What are the developments of research outputs of this maritime university?
- (4) What are the collaborative studies/research activities of the maritime university with other research agencies, colleges, and universities?
- (5) What are the different collaborations of JBLFMU-Molo in the following levels: (a) regional level, (b) national level, and (c) international level?
- (6) What are the implications of JBLFMU's research activities towards research capability in response to Global Excellence in Maritime Education in Asia?

III. CONCEPTUAL FRAMEWORK OF THE STUDY

The conceptual framework illustrated in Figure 1 of this study showed the institutional research capabilities and priorities of JBLFMU and research collaboration in order to address the global excellence in maritime education in Asia. Any institution for that matter had to determine the certain priorities to be competitive in this part of Asia. The research capabilities and collaborative activities/relationships with different research institutions, agencies, and associations were conceptualized in this study to address global excellence in maritime education.

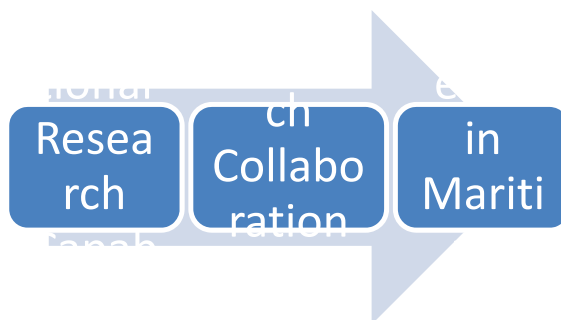


Figure 1. Global Excellence in maritime education as influenced by institutional research capability and collaboration in Asia

IV. THEORETICAL FRAMEWORK OF THE STUDY

The present study was anchored on the theory advocated by Reyes (2003) in his study entitled "Establishing and Maintaining Research Unit-Research Perspectives, Framework, Goals and Policies." Relative to the research advocacy, this theory focused on the role of research in the developmental progress of certain institutions. This theory adhered to the "reason that the university/academe as being the seedbed of excellence must put more premium on research to keep abreast of current trends and developments and to have proper connections to future and global situations." Moreover, this theory was grounded on "developmental" – it means that research aims for the development of the potential of an individual as a contributing member of the society. Development means equipping man with proper knowledge and full potential to become highly competitive.

It was in this premise that this study was conducted. This investigation led to showcase the different research activities, developments, and collaborations towards global excellence in maritime education in Asia. This served as theoretical framework of how the research capabilities addressed the perplexing issues of educators, students, and stakeholders towards global excellence in maritime education in Asia and to supply the demand in international shipping companies of competent and qualified officers and seafarers. This theoretical framework served as compass to draw research capabilities of maritime university (JBLFMU-Molo) in Asia.

V. METHOD

The method employed in this study was quantitative-qualitative to address the questions mentioned in the present study. The quantitative data were captured through documentary analysis taken from the reports of the Research Department of JBLFMU-Molo, Iloilo City, Philippines.

The research practices, achievements, and collaboration with different research agencies and entities were introduced in the study. Inputs were derived from the reports, journals, and documents submitted by the department heads, researchers, chairpersons of research activities, and heads of various accreditation committees.

The qualitative data and information were captured by using the utilized texts – both written and oral. The respondents were chosen by the researcher because of the reason that their condition of engaging in research capability was a very challenging and unique case. Interviews with the faculty members were employed as part of the oral document.

VI. RESULTS AND DISCUSSION

This particular section deals with the results and discussion as the researcher attempted to achieve the objectives of the present investigation. With this, the researcher presented the research capabilities, research practices, collaborations, and

connections of the maritime university with other agencies in order to draw strategic alliances in Asia.

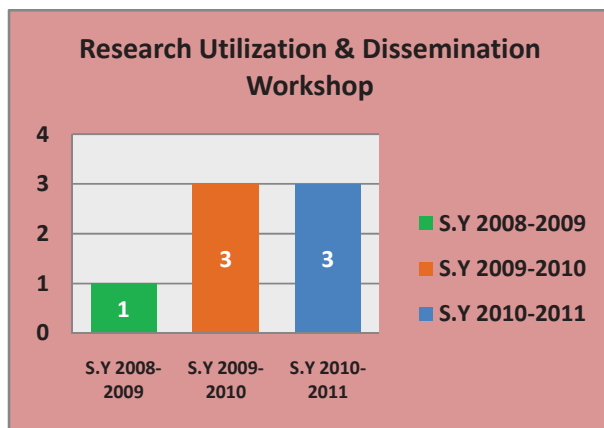
A. Research Activities and Practices of Maritime University

The Research Department of JBLFMU-Molo had the following activities and practices: (1) research utilization, (2) research colloquium, and (3) textbook development program. The data and discussion are presented in the next section of this paper.

1) *Research Utilization of Maritime University*-Some research outputs were presented in the research utilization at JBLFMU-Molo, Iloilo City, Philippines. During SY 2008-2009 only one (1) study was utilized, SY 2009-2010 had three (3) studies being utilized, and SY 2010-2011 has three (3) studies being utilized.

TABLE 1

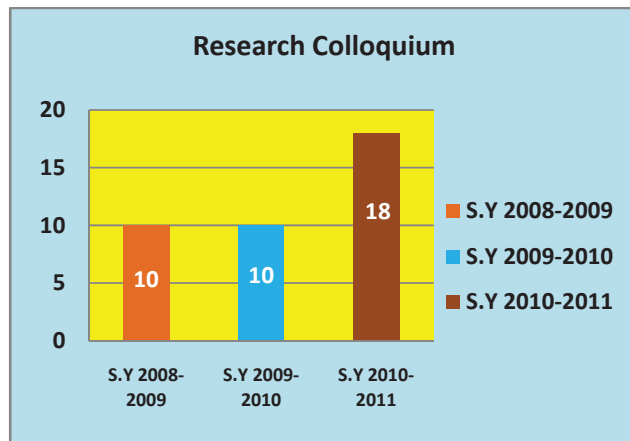
RESEARCH UTILIZATION AND DISSEMINATION



2) *Research Colloquium*-In the Research Colloquium, faculty members and students had presented 10 studies during SY 2008-2009, last SY 2009-2010 the research colloquium generated 10 research presentation, and SY 2010-2011 has 18 research presentations.

TABLE 2

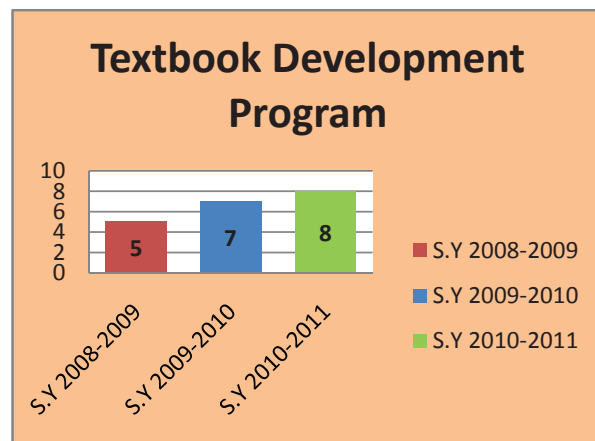
RESEARCH COLLOQUIUM



3) *Textbook Development Program*- The faculty members of JBLFMU-Molo had written five (5) instructional materials for SY 2008-2009. Last SY 2009-2010, there were seven (7) instructional materials, and for this year SY 2011-2012, the faculty members submitted eight (8) instructional materials.

TABLE 3

TEXTBOOK DEVELOPMENT PROGRAM



4) Research Publication

TABLE 4

RESEARCH PUBLICATIONS OF MARITIME UNIVERSITY IN ASIA

Research Activity/Publication	Frequency	Focus
Refereed Review Journal (System Journal)	Twice (2) per semester	Research Dissemination
Refereed Journal of faculty members	Twice (2) per semester	Research Dissemination
Research Journal of Students	Once (1) per year	Research Dissemination
Research Newsletter	Twice (2) a year	Research Dissemination

B. Research Achievements/Awards

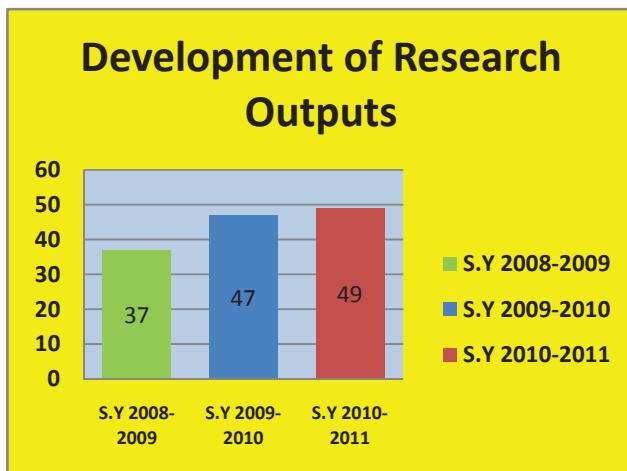
Last SY 2008-2009, not any of the faculty members received an award in research, Two (2) awards for SY 2009-2010 were given to the faculty members of JBLFMU-Molo such as; (1)“Third Place Best Oral Research Presentation” received by Engr. Gene Lee Navarra, and (2) “One of the Ten Outstanding Filipino Researchers” received by Dr. Rolando A. Alimen given by Philippine Association of Institutions for Research (PAIR) at Boracay Island last December 2009.

For SY 2010-2011, five (5) awards are received by the faculty members of JBLFMU-Molo in Research. These awards are the following: (1) Global On-Line Journal Award received by Dr. Rolando A. Alimen, (2) Platinum Award in Oral Research Presentation received by Dr. Victor B. Jaleco, (3) Silver Award in Oral Research Presentation received by Dr. Rolando A. Alimen, (4) National Research Leadership Award 2010 given to Dr. Rolando A. Alimen, (5) Third Best Paper Award in Disaster Preparedness given to Dr. Ralph L. Pador, Engr. Cicero D. Ortizo, and Dr. Rolando A. Alimen. The awards were given by Philippine Association of Institutions for Research (PAIR) at Cagayan de Oro last August 2010 and Environmental Educators Network in the Philippines (EENP) last February 2011.

B. Development of Research Outputs

TABLE 5

DEVELOPMENT OF RESEARCH OUTPUTS



For SY 2008- 2009, ten (10) faculty members presented studies in the International Conferences. For SY 2009-2010, thirteen (13) faculty members presented at International Conferences. For SY 2010-2011, twenty four (24) faculty members presented their studies at International Conferences. Data are shown in Table 6.

TABLE 6

DEVELOPMENT OF INTERNATIONAL CONFERENCES



Table 7 showed the research outputs of the faculty members in terms of the different research agencies. Seventeen (49 percent) of the papers were presented at the Philippine Association of Institutions for Research (PAIR); Four (11 percent) of the research papers were presented in the Asian Congress for Media and Communication (ACMC); six (17 percent) of the papers were presented in the Environmental Educators Network in the Philippines (EENP); three (9 percent) at the Association of Teacher Educators at Texas USA; three (9 percent) were presented in the Transportation and Navigation at Poland; and two (5 percent) were in the International Conference in Finland.

Obviously, JBLFMU's collaborations are international and national in nature as shown in the evidences of the research outputs.

To attain different collaborations/accreditations/certifications of JBLFMU-Molo returned good development to the faculty members, students, and staff. Through these organizations and agencies, many activities in research were drawn just to satisfy the level of accreditation and certification. Thus, ushered building research capability and forming strategic alliances not only in research but also in other functions of university in Asia.

C. F. Implications of JBLFMU's Research Capabilities Global Excellence in Maritime Education in Asia

Global competence/excellence is the product of both education and experience. In this initiative, it is characterized by a graduate's proficiency in his/her course; knowledge about comparative international relations, the world economy, and the socio-political systems and culture of at least one other country or world region; and ability to practice his or her discipline within an international context.

Brustein has clearly stressed that global competence, as defined in the recently-published National Association of State Universities and Land Grant Colleges (NASULGC) report, A Call to Leadership: The Presidential Role in Internationalizing the University, is the ability "... not only to contribute to knowledge, but also to comprehend, analyze, and evaluate its meaning in the context of an increasingly globalized world." The skills that form the foundation of global competence include the ability to work effectively in international settings; awareness of and adaptability to diverse cultures, perceptions and approaches; familiarity with the

major currents of global change and the issues they raise; and the capacity for effective communication across cultural and linguistic boundaries [13].

‘Educating for Global Competency’ has concluded that networking among teachers is one of the ways to develop global competency. Through this network teachers are linked with peers in other parts of the world to collaborate either joining structured projects or designing their own. It is because of this linkage that teachers are able to share their practices and learn from others [14], [15].

Neil Ellis of the Seafarers International Research Centre sheds some light on the role of maritime researchers at SIRC’s website: www.sirc.cf.ac.uk. He emphasized that seafarers are encouraged to formally take part in research studies that take place in their sector, no matter who conducts them. It is only by actually taking part in research that their voices can be heard, and that they have some very valuable contributions to make to the range of debates in which maritime sector members engage. Based on the data generated for this purpose, the researcher decided to tackle the transformation of the marine officers into educational researchers with implications to global educational competence.

VII. CONCLUSIONS

In conclusion, the research capabilities of maritime university in terms of research activities, practices, developments, outputs, and collaborations/accreditations have exhibited in this study. The faculty members and staff who have been strengthened by the research capabilities of this maritime university were captured also in the results of the study through their research presentations and publication.

The research capabilities as illustrated in this study were connected to research practices, achievements, development, networking, collaboration, and presentation. The inter-connectivity of these priorities in maritime university was utilized to achieve the aims of the study towards global excellence in maritime education in Asia. The research capabilities of this maritime university in the Philippines were with the same vein with the results of the studies of Baluscary & Gutierrez [16], [17]. The fact that incentives, credits, de-loading, and support are parts of building research capabilities of maritime university. Support of the administration, research development, research presentations, and utilizations are evidences of highly visible research culture and play an important role in achieving the objectives of research capabilities [18].

In terms of collaboration, accreditation, certification, the maritime university showed a very strong connection with the different agencies that demonstrate better research capabilities in this part of Asia. The interactions and responses of the maritime university with neighboring higher learning institutions had contributed to the aim of building strong and dynamic faculty and staff who shared their studies to the stakeholders and constituents of different communities.

The percentages of national and international research presentations of the faculty and staff of this institution showed

that indeed the human resources, technical expertise, and financial status were contributing factors in research capabilities. The inter-relationships of these three (3) elements were utilized in this study as strong evidences towards building “niche” in maritime education through research capabilities, strategic planning, and alliances in this particular part of the world.

The theoretical theory was utilized to capture the focal point of the study and arrive at the objectives of demonstrating the research capabilities of the maritime university and forming strategic alliances among different research agencies in Asia.

VIII. RECOMMENDATIONS

Based on the findings of the present study, the following recommendations are advanced by the researcher:

The administration of JBLFMU-Molo should sustain the skills, enthusiasm, and drive of the instructors towards sustaining the research capabilities to achieve the global competence in maritime education. This can be done through in-house training and seminars, reviews, colloquia, research presentation in national and international conferences.

Continuous training and exposure of these faculty members and marine engineers in research and related activities here in the country and abroad in order to prepare them to become competent contributors to the research capabilities of the University.

Experiences and issues shared by the respondents shall be captured in the next study by the Research Department in re-channeling them to build “strong research capabilities” and to achieve the agenda of the maritime university towards global educational competence.

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An Exploratory Study of University X's State of Readiness in Scholarship of Teaching, Shared Governance and Change Management

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Abstract - This is a study on the way higher education lecturers in University X perceived their university's state of readiness in scholarship of teaching, shared governance, and change management. The 50 participants involved in this study were lecturers from University X. A mixed method design is used in this study. The study was conducted in two phases: exploratory qualitative study followed by quantitative study. Overall, the findings revealed superficial level of readiness of this particular university's practice of shared governance in term of varied involvement, scholarship of teaching and learning, whereby they lacked the essence of it and, change management that involve individual level only. In sum, it lacks the autonomy as an institution of higher learning in these three interrelated areas.

Keywords: *university, scholarship of teaching, share governance, change management, readiness*

I. INTRODUCTION

The quality of teaching and learning in universities has received much attention over the past fifteen years and there has been much debate about what sort of teaching encourages effective learning (Biggs, 1996, 1999; Ramsden, 1992; and Prosser and Trigwell, 1999). More recently, however, a slightly different issue has arisen. This issue focuses not just on teaching per se but on teaching as scholarship in relation to some aspects of shared governance of University X. As the demand for higher education continues to grow and as governments acknowledge their role in promoting economic development, it becomes increasingly important to ensure that higher education systems are managed in an effective way. Higher education now finds itself in a new era and environment in which it is confronted with an array of challenges and forces for change. To change means making things different or simply to be different from what one used to be. The dynamic and changing environments that organizations face today require adaptation, calling for deep and rapid responses. As a result, the model of total control from a central ministry of higher education (MOHE) is proving unsustainable in the long term and should be replaced by other models. Neave and Van Vught (1994). have

described a continuum at one end of which is the "state control model" where the centre seeks to control its universities, and at the other end is the "state supervising model" where it monitors and regulates them. As far as higher education is concerned, a few issues may arise such as the relationship between higher education institutions and the MOHE, a right to autonomy given to higher education institutions, the nature and extent of 'shared governance' in higher education institutions and impact of the market on governance (Goedegebuure & Hayden 2007). Another issue that may arise is that who should be responsible to govern the higher education?

As more universities are moving from the control model to the supervisory model in all aspects of their relationship with their lecturers. The pressures in higher education systems have been caused by the growth in numbers of institutions due to the inexorable increase in shared governance (and the demand for change is to continue in the context of the knowledge economy). Giving the universities autonomy recognizes that their roles needs are different and allows them full exercise of their institutional freedoms in term of Scholarship of teaching, Shared governance and the direction of managing change. The constraints of centrally managing a system that needs to be flexible and responsive have become an issue.

It is the pertinent aim of this paper to explore the ambiguity existing in these three interrelated areas. In this study we are concerned with the way lecturers in University X revealed their state of readiness in these areas namely; scholarship of teaching, shared governance, and change management in University X. The term "readiness" is used here to describe all those structures, processes and activities that are involved in the planning and direction of the University X and its stakeholders.

II. RESEARCH METHOD

A mixed method design (Creswell, 2005) is used in this study. The first phase is an initial phase of exploratory qualitative data collection and analysis using interview

method, followed by the second phase of quantitative data collection and analysis employing self designed questionnaire. The finding of the first phase study was used to develop quantitative survey questionnaire for the second phase.

Research Objective

The objectives of this paper are as follows:

- a) to explore the general view and commitment towards scholarship of teaching among the academic staff in the social science disciplines;
- b) to determine the practice and extent of shared governance in University X; and
- c) to identify the level of readiness and capacity for change management.

Three main research questions were used as a guide to this study. They are as follows:

- a) How does scholarship of teaching being practice in University X?
- b) What is the practice of shared governance in University X?
- c) To what extent University X is ready for change management?

Participants

The participants in the first stage are made up of 10 academic lecturers from five social science groups of schools at University X located on an island, namely School of Business and Economics, School of Education, School of Science Social, School of Psychology and School of Fine Arts. Purposive sampling technique was employed. They made up of junior, senior, associate professors and professors. The participants were selected based on the criteria below:

- a. Lecturers who have taught at least at the undergraduate level.
- b. They should have served at least a year as academician.

In the second stage, a sample of 50 lecturers in tenure at University X from the five schools mentioned earlier competed a self designed questionnaire, aims to gather information on subject experience as university lecturer. A 5-point Likert scale to respond to the questions, with five indicating 'strongly agree' and one 'strongly disagree' was used.

Demographic Background

The demographic information below indicated differences in participants' educational backgrounds, and teaching experience.

Their educational qualifications were as follows: 14.6% of the participants with B.A.s, 72.9% with an M.A., and 12.5% with Ph.D degree.

As far as their teaching experience in the academia was concerned, 16.7% of the participants had taught for five years, 14.6% for six years, another 14.6% for 9 years, and 12.5% for 8 years.

In essence, the entire participating academician in the study had taught for less than 10 years, indicating the current teaching workforce in University X to be a young force. In essence, since the participants were from five schools in University X, the demographic information was revealing. It showed a varied difference in participants' educational backgrounds, and teaching experience.

III.DISCUSSION

Based on the results of the empirical study conducted to determine the extent of the variation in the University X readiness scholarship of teaching, shared governance and change management, two approaches were used to analyse the data. They were 'general concern' and 'specific concern' respectively. Both approaches were mutually complimentary and were used both during data collection and data analysis stages. They were in agreement to Yin (1984) analytic strategy. However, we used 'general concern' more frequently at the initial stage of the data collection while 'specific concern' was employed more at the analysis stage especially in this mixed method analysis. Based on the qualitative and quantitative empirical evidences, the discussion was based on the three specific concerns namely; the practice of scholarship of teaching, practice of shared governance and ready for change management in University X.

The Practice of scholarship of teaching (SoT) at University X

The empirical evidence on the understanding of SoT reveals that majority of the academic staff has little understanding of the concept of SoT. Yet the responses showed that they are willing to find out and learn more about SoT. The responses of those who know partially of SoT relate it to teaching or teaching something scholarly or refer SoT to with specific characteristic or element. Hence, the level of understanding of SoT can be divided into four categorized, namely the "no idea at all", "relate it to teaching", "something scholarly" and "specific characteristics and elements of scholarship of teaching." The interview response also shows SoT is not widely practiced at University X. In term of practice and level of commitment, the responses indicate that those who know SoT may not necessary practiced SoT totally as it is subjected to individual commitment and the creativity of the person. It was found that the commitment level is varied among those of SoT knowledgeable academic staffs as emerged from the interview responses. Overall, the responses suggest that the commitment level of SoT need to be improved and a proper mechanism needs to be in place. The following verbatim are the empirical evidence on understanding of SoT mined from the interview responses to illustrate the level of understanding of SOT, the practices and commitment level of SOT from the academic staff's perspectives.

"Seriously, I don't know about definition of SOT and anything about SOT." (Respondent no 4)

"I think most of lecturers are not aware of how to conduct SOT." (Respondent no 1)

"Not clear as to what is meant by SOT, but am willing to learn more about it to better improve my teaching..." (Respondent no 2)

"I relate it to teaching.... That's all (Respondent no 7)

"I think it is related to teaching something scholarship ..."
(Respondent no 9)

"or ...I guess SOT must have some specific elements or characteristics that make it so distinctive such as use of latest materials, research output and current issues..." (Respondent no 10).

"I think not many people practice SOT since most many are not aware or understand SOT... so chance is they are not going to practice it (Respondents no. 1, 2, 3, 4, 5, 6)

"I guess the practice of SoT is depending on individual's commitment." (Respondents no. 1, 2, 6)

"The practice of SoT and the commitment level is varied among the academic staff... I know few academic staff very committed, others not really think about it ... for some even though they know SoT, they may not practice or committed to implement SoT." (Respondents no. 2, 8, 9, 10)

In sum, we have identified five qualitatively different ways in which University X lecturers say they lack or have minimal ideas of the scholarship of teaching and learning. They range from ideas of the elements of integration, teaching and learning aspects of SoT applied, improving teaching, teaching element, and the varied personality and commitment concerning scholarship of teaching and learning to the structure of knowledge within a discipline.

The finding of this study seems to conclude that SoT as not deeply practiced at University X due to the lack of understanding of the importance of SoT. However these academicians are keen to find out what SoT is and how it can be applied in their teaching. In the same vein, the finding also indicates the practise of SoT is subject to individual personality and commitment level. It is found that the commitment level of practising SoT varied as evidenced from the interview data. In term of practice, it was found that only few academicians at the level of associate professor and professor post tend to practice SoT to some extent. Majority of the respondents seems to relate the concept of SoT from teaching to scholarly teaching; a simple interpretation of SoT. This finding can be linked to the level of pyramid of teaching

and scholarship by Boyer (1990). The finding clearly shows that the level of practice of SoT is just at the first level (teaching) and second level (scholarly of teaching) in the pyramid teaching and scholarship. This suggests that efforts should be taken to promote the practice of SoT and subsequently to improve the commitment level. It seems that majority of academic staff perceived SoT as a teaching element; as scholarship to some extent. It seems to conclude that the practice of SoT at University X needs to be enhanced. There's the need to create the awareness and understanding of SoT concept, then relevant efforts should be taken in order to promote and enhance the practice of SoT among the academic staff within University X.

The practice of shared governance in University X

The interview responses show a range of interpretation and meaning on shared-governance from the data. Majority of the respondents seem to report that the roles of shared governance means to get everyone participate and achieving vision, mission and getting thing done and at the same time to monitor or as auditing process and make everyone accountable for actions, decisions and steps taken on every level. The empirical evidence seems to indicate limited participative of decision makings and lack of open system in the system of shared governance. As pointed out by majority of the respondents, as the academics staff they have limited participation in term of decision makings and often found that there is limited of awareness and open system at University X. The following are some of the interview responses to illustrate the meaning and the key elements of shared governance from the academic staff's perspectives.

"Getting all stakeholders to involve in University X agenda."
(Respondent no. 4)

"It is there to hold us accountable for actions, decisions and steps taken on every level" (Respondent no. 3)

"I think we can make the staff realize that governance is not only in the hands of the top management." (Respondent no 5)

"It is about policies, procedures and regulations which are monitored by the top management and their representatives such as School Deans & Deputy Deans, and the various programme coordinators." (Respondent no 2).

"The shared -governance is to make sure all activities and departments functions are reflected in University X vision, mission, and objectives." (Respondent no 8)

"Ensure there is a culture of shared governance at all a level of management." (Respondent 10)

"To make sure that whatever it is that we plan will be achieved at the end of the day... and also to make sure that rules and regulations are being followed by the staff."
(Respondent no 7)

The Extent of University X's Readiness for Change.

It is evident that higher education institutions worldwide are facing constant change and confronted with an array of challenges and forces for changes (Storberg- Walker and Torraco, 2004). Indeed the effect of globalization, ICT and knowledge economy have shaped the management of higher education significantly. In addition, higher education organizations just like any other business organizations are influenced by controllable and uncontrollable variables within the economic and societal environment. Leadership and governance structure of higher education are deemed as key factors that will substantially shape any change process. It is noted that higher education today is facing a new era and environment in which it faces a variety of challenges and forces for change. From the empirical evidence, there are six types of change management emerged from the responses. These changes are: system of communication, university system, leadership style, transparent and reliable human resource system, perception towards core customers (students) and staff attitudes. These changes consist of tangible and intangible elements of change management. The empirical evidence shows that the types and forces of change management are relating to its internal factors, namely the internal system, internal stake holders' perception and attitudes and , organizational culture, as presented in Table 2 below. These changes reflect the good policies and practices of University X and are more of the management perspective of change than human resource and economic perspective of change.

In term of readiness of change, majority of the respondent agreed that University X is ready for change management based on the types of recommended changes. Majority of the respondents stated that University X has the capacity for making such changes for example; *"to ensure transparent communication at all times between the top management and staff, we need to change and we -University X had the capacity for this change, what we is education and right human capital to in place, we have the resources... education and attitude of the people at large... attitude and commitment of staff toward responding to effective communication"* (Respondent no 1) ; another respondent shown that *"University X has the capacity to convert those none-performing lecturers in term of research or publication with the talent to manage to fill in as directors or heads of human resource without academic expectations on them."*(Respondent no 3); *"Because I am confident that certain individuals within the management structure is essentially receptive to changes, if they feel it is for the better."* (Respondent no. 4).

The empirical evidence shows that the readiness for the above change management must be supported with resources such as education and training, relevant information pertaining to changes, the right people and attitude, the policies and procedures, the concept of "ordered" or "directed" to change. More importantly, the effective leadership style that is able to transform the changes and sustained the change management

is most crucial. Thus, these changes are associated with to organizational development and people. The changes aim to transition individuals, teams and organizations from a current state to a desired future state that is to a better system of performance. In this context, it includes that change of attitude and behaviour at individual level and changes in policies, leadership style and culture at organizational level.

Obviously, the change management emerged from the data involve both individual and organization level. These changes need the commitment from both parties. In term of key elements of change management, only four key elements out of six change management emerged from the responses. These key elements include the readiness, communication, education and training and system. The elements such as sponsorships, coaching by managers and rewards and reinforcement were not evidenced. This seems to suggest that human factor in term of staff commitment and attitudes, transformational leadership and system affect significantly the readiness and effectiveness of change management. Simply, the change management in higher education providers is transformational in scope and impacts every level of the organization (Storberg-Walker and Torraco, 2004).

In the same vein, the data shows that there are three different levels of involvement in the shared-governance at University X. First level is a direct involvement as an administrator. It seems that academic staffs with administrative posts are directly involved often in decision makings. The second level of involvement is based on the committee capacity; and its involvement and participative level is varied and subjected to their capacity from time to time as a committee member for different task force. The third level of involvement is related to the university or school/departmental level. The following interview responses show the level of involvement from the academic staff's perspectives.

"As a Postgraduate Coordinator at school level, I was involved directly in setting up the school postgraduate committee that decides on the acceptance of prospective postgraduate students and the potential supervisors. It is also my job to ascertain the existing postgraduate students fulfill their requirements of the school before they can graduate." (Respondent no 3)

"... as a committee member for quality, I involved in quality improvement – e.g. programme restructuring and review, MQA workshops, audits by Malaysian Institute of Accountants & ISO." (Respondent no 2).

"... my involvement as a middle man/intermediaries between University X and outsiders to internationalize University X." (Respondent no.1).

"... in term of involvement in decision -making, I would say it varies and also subject the capacity as well as the level, weather is it at school or university level ." (Respondent no. 8)

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In term of readiness of change, majority of the respondent agreed that University X is ready for change management based on the types of recommended changes. Majority of the respondents stated that University X has the capacity for making such changes. For example, *"to ensure transparent communication at all times between the top management and staff, we need to change and we -University X had the capacity for this change, what we is education and right human capital to in place, we have the resources... education and attitude of the people at large... attitude and commitment of staff toward responding to effective communication"* (Respondent no 1) ; another respondent shown that *"University X has the capacity to convert those none-performing lecturers in term of research or publication with the talent to manage to fill in as directors or heads of human resource without academic expectations on them."*(Respondent no 3); *"Because I am confident that certain individuals within the management structure is essentially receptive to changes, if they feel it is for the better."* (Respondent no. 4).

The survey results on staffs' opinion concerning readiness of University X and the capacity of University X engaging herself in change management showed that 56.3% agreed that University X has all elements for change, 45.8% agreed that University X is ready to improve its performance, and finally 54.2% agreed that the employees are committed to change.

In term of shared governance, there is a need to improve and change of existing practices. There should be more effective ways to do things or get things done through better and open communication system and procedures. For examples, in the form of official communication, standardization and linking them to University X vision, missions, and objectives. This means shared-governance at University X need to incorporate the five good governance principles – openness, participation, accountability, effectiveness and coherence. The culture of shared governance practices at all levels of management is vital. Academic staff's pparticipation at all levels and different disciplines and open system facilitate better shared governance at University X. At the same time, it must ensure that everyone in University X is responsible to making sure that University X mission is accomplished. There is a need to create awareness and to ensure the strategic guidance of the University X (University X strategic plan) to be effectively communicated and an effective monitoring by the management and administrators. This requires the effort to instill shared culture value from the vision, mission and objectives of University X as well as the good principles of shared –governance. More importantly, due to the complexity of its internal structures, the external relationships between institution and its external stakeholders and the nature of higher education provider need to be viewed as business and corporate (based on its constitution), thereby University X need to reexamine the relevancy of its' concept of shared governance; and to think of the next emerging concept of

shared governance known as corporate governance, which has been widely suggested by researchers (Kezar and Eckel, 2004; Lapworth 2004, Middlehurst, 2004)

Appalling University's X State of Readiness

Overall, the reality of University's X state of readiness revealed an appalling state of readiness among the participants in term their scholarship of teaching practice in University X, the practice of shared governance in University X, and the extent University X change management. The main outcome of this exploratory study can be seen from the interplay of four main categories discerned from the study in terms of the most distinctive characteristics of the variation in the range of readiness of the implementation (diagram 1).

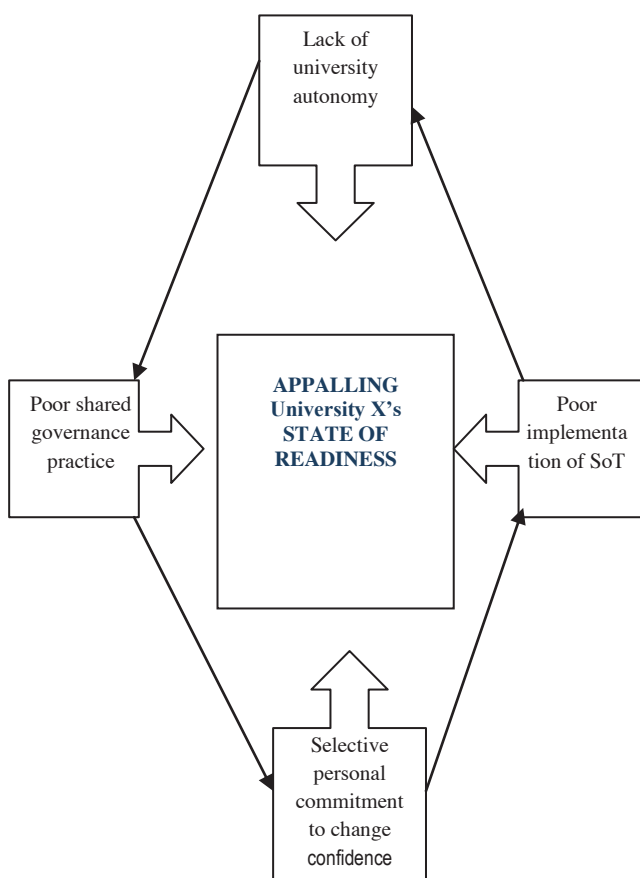


Diagram 1. University X's state of readiness

- The perception of the practice of shared governance in University X is lacking or at minimal level of readiness, and commitment level is varied.
- Scholarship of teaching and learning among University X lecturers show that only the elements of integration, teaching and learning aspects of SoT is being applied is about improving teaching. Generally, it is perceived by majority of academic staff as transmission element of specific knowledge

c. The extent University X is ready for change management is subject to individual personality and commitment about improving student learning and one own teaching.

IV.CONCLUSION

In conclusion, the qualitative preliminary finding evidently point out the lack of practice on SoT and shared governance. This is largely due to the lack of understanding of the respective concepts, human factor (attitude, commitment) and inadequate effective system and system of communication that should prevail in an institution of higher learning. The change management finding shows the consistency of the needs to these changes. It has been highlighted these two factors - human and system need to be changed and point out that University X is ready and has the capacity of change. The improvement of practices of SoT and shared governance as well as readiness for change within University X is subjected to the good policies and procedures that entails an effective system of communication and right human resource system (education and training, right people for the right job) at the organizational level, while the change of attitude and behavior are crucial at the individual or people level. Above all, the transformational leadership style ensures change management is sustainable.

In order for the change to take place, it requires a transformational leadership that emphasis on intellectual stimulation with regard to new ideas and empowerment, charisma and inspiration to overcome resistance to change and individual consideration in term of motivation and encouragement. These are three central elements of transformational leadership (Nahavandi, 2006).

In this context, it suggests that University X should not only focus its organizational change management that involve its policies, procedures and culture, equally important is the changes on attitude and behaviour of people, thus its extent of change management is subjected to people centred implementation at individual and organizational level.

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Quality of Physical Service and Environment Provided for Students Learning in Chandrakasem Rajabhat University

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Abstract— The purposes of this research were: 1) to examine students' perceptions towards the learning environment regarding the university's service and physical facilities. 2) to compare the perceptions towards the learning environment of students in different levels of study, faculties, and faculty structure. 3) to investigate the needs for organization transformation. 390 sample units were drawn from Chandrakasem Rajabhat University, using Stratified random sampling. Data collection was conducted by using questionnaires. Percentage, mean, standard deviation-test and F-test were used for data analysis. The finding revealed that: 1) the opinion of library service and source of learning was highest level, inferior to physical service and the lowest level was facilities service. 2) the opinions of physical service and environment provide for students learning in Chandrakasem Rajabhat University comparing between faculty organization and year level of students were different on the items of physical service, facilities, public utility and security at statistically significant 0.05. 3) the opinion between faculties were different on the items of quality of library and learning service, physical service, facilities service, public utility and security at statistically significant 0.05. 4) the suggestions from students were service staff improvement such as: student registration, finance, center staff, cleaning toilet and equipment and other facilities.

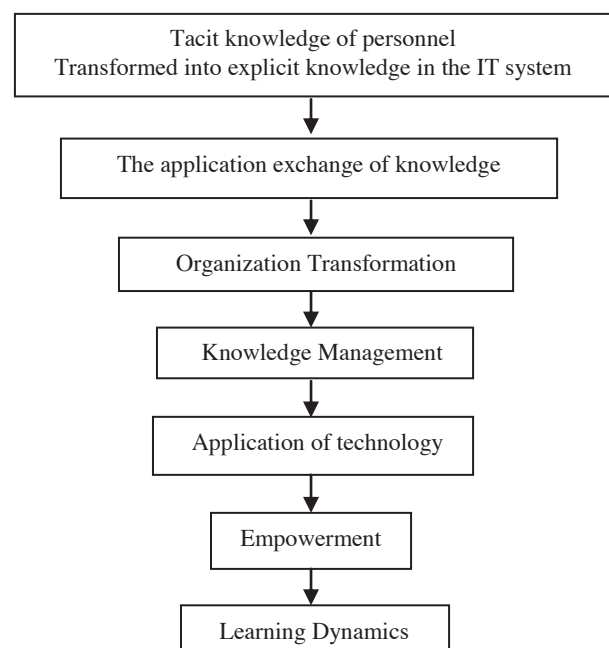
Keywords— Perceptions, Learning facility, Environment

I. INTRODUCTION

Learning environment is important to students because it can enhance quality of learning. Universities need to arrange environment that support and promote students' development to their full potential so that the learning process can attain desired objectives (Prayuth, 2007). The objective of education quality is to assess higher education institutions' system and mechanisms. So that institutions would realize the quality of their operations. The assessors and institutions have to plan their roles in accordance with the Standard and Criteria for Education Quality Assessment Act 2553 B.E. The learning facility and environment of Chandrakasem Rajabhat University is one part of education quality reflecting service quality and strategy for further development

The learning environment refers to the surroundings related to education which can promote education quality. Marquardt's (1994) suggested a model of Knowledge Management that can

structure organizations so as to promote the quality of operations as follow:



According to Marquardt (1994), the organization transformation, knowledge management, knowledge application, empowerment, and learning dynamics needs supporting environment. This main research's objective was to assess the physical environment of Chandrakasem Rajabhat University.

II. RESEARCH OBJECTIVES

1.To examine students' perceptions towards the learning environment regarding the university's service and physical facilities.

2.To compare the perceptions towards the learning environment of students in different levels of study, faculties, and faculty structure.

3.To investigate the needs for organization transformation.

III. RESEARCH HYPOTHESIS

Students in different years of study, faculties, and faculty structure have different perceptions towards the university's learning environment.

IV. SCOPE OF THE RESEARCH

Environment investigated were physical facilities which include library, classroom, laboratory, registration process, IT system, nursing, cafeteria, stadium and infrastructure. The population was students registered in 2010 in 7 schools, namely Agriculture and Biotechnology, Education, Humanity and Sociology, Management, Science, Alternative Medicine, and Graduate School. Total population was 16,414 students. Samples consisted of 390 students. Moreover, 14 students and instructors responsible for Student Affairs were interviewed.

V. RESEARCH METHODOLOGY

The methodology of this research was mainly quantitative. Data collection was conducted by questionnaires. The population was students registered in 2010 in 7 schools, namely Agriculture and Biotechnology, Education, Humanity and Sociology, Management Science, Alternative Medicine, and Graduate School. Total population was 16,414 students. Samples consisted of 390 students from 7 faculties recruited through stratified random sampling and 14 student leaders and instructors responsible for Student Affairs were purposively selected. Data analysis was done by percentage, mean, standard deviation, t-test, F-test and content analysis.

VI. RESEARCH FINDINGS

The samples included 270 female (69.23%) and 120 male (30.7%). Aged 21 years (41.3%), 23 years (21.5%) and the lowest were 18 years (1.0%). The levels of study were classified into 141 third year students (36.2%) and 117 second year students (30.0%). 152 were in the Faculty of Management Science (39.0%), 78 were in the Science Faculty (20.0%), 22 were in the Graduated School 22 (5.6%) and 4 were in the Faculty of Agriculture (1.0%).

Perceptions towards learning resources and library service

The respondents reported "Fast book searching system" as having the highest quality level (mean = 3.81, SD = 0.900) follow by "Fast service process" (mean = 3.79, SD = 0.980) and "Library and IT training program" was rated as the lowest (mean = 3.52, SD = 1.013). Data were presented in table 1

TABLE I
PERCEPTIONS TOWARDS THE QUALITY OF LEARNING
RESOURCES AND LIBRARY SERVICE.

Learning resources and library service	Mean	S.D.	Quality level
1. Text book with in library is enough for learning	3.77	0.953	Much
2. Amount of text book at requirement	3.62	0.924	Much
3. Library arrangement is easy for searching	3.70	0.910	Much

Learning resources and library service	Mean	S.D.	Quality level
4. Fast book searching system	3.81	0.900	Much
5. Proper borrowing and returning time	3.65	0.905	Much
6. Fast service process	3.79	0.980	Much
7. Ability to search external database	3.63	0.927	Much
8. Accessibility to E-Learning, e-book, text book and learning resource	3.69	0.907	Much
9. Library and IT training program	3.52	1.013	Much
Total	3.68	0.691	Much

Perceptions towards physical service.

The respondents reported "Sufficient light" at the highest quality level (mean = 4.11, SD = 0.853) followed by "Clean building" (mean = 3.74, SD = 0.938) and "Enough white board and pen" was rated as the lowest (mean = 3.33, SD = 1.073) as presented in table 2.

TABLE II
PERCEPTIONS TOWARDS THE QUALITY LEVEL OF PHYSICAL
SERVICE AND ENVIRONMENT

Physical service	Mean	S.D.	Quality level
1. Clean building	3.74	0.938	Much
2. Enough and complete table and share	3.70	1.123	Much
3. Enough (visualize)and (overhead projector)	3.66	0.999	Much
4. Complete white board	3.68	0.963	Much
5. Enough white board and pen	3.33	1.073	Medium
6. Air condition and fan	3.71	1.101	Much
7. Sufficient light	4.11	0.853	Much
8. Enough laboratories.	3.42	0.995	Medium
9. Internet linking throughout university.	3.34	1.337	Medium
Total	3.63	0.811	Much

Perceptions towards physical facility

The respondents reported that "Fair food price" was at the highest quality level (mean = 3.73, SD = 0.969) followed by "Fast exam room information" (mean = 3.71. SD = 0.973) and "Enough white board and pen" was rated as the lowest. (mean = 3.15, SD = 1.144) as presented in table 3

TABLE III
PERCEPTIONS TOWARDS THE QUALITY LEVEL OF
PHYSICAL FACILITY

Facility service	Mean	S.D.	Quality level
1. Fast online registration system.	3.54	1.084	Much
2. University grade checking system.	3.53	1.023	Much
3. University fast record system.	3.55	1.004	Much
4. Classroom checking system.	3.65	0.962	Much
5. Fast exam room information	3.71	0.973	Much
6. Register section connection in fast process.	3.45	1.067	Medium
7. Certificate connection	3.52	1.087	Medium
8. Clinic fast service.	3.55	1.055	Much
9. Standard Medical doctor service.	3.58	1.005	Much
10. Cover university staff and student.	3.59	1.054	Much
11. Enough Cafeterias.	3.45	1.154	Medium
12. Fair food price.	3.73	0.969	Much

Facility service	Mean	S.D.	Quality level
13. Various foods.	3.50	1.140	Medium
14. Clean cafeteria.	3.40	1.028	Medium
15. Comfortable Cafeteria.	3.54	1.038	Much
16. Enough gymnasium and stadium.	3.15	1.144	Medium
17. Complete gymnasium.	3.25	1.085	Medium
18. Clean and comfortable gymnasium.	3.32	1.119	Medium
Total	3.50	0.795	Medium

Perceptions towards the university's infrastructure and security.

The respondents rated that "Enough fire equipment in all building" was at the highest quality level (mean = 3.76, SD = 1.034) followed by "Standard and clean water supply system" (mean = 3.66, SD = 0.967) and "Normal water supply system in toilet" was rated as the lowest (mean = 3.29, SD = 1.203) as presented in table 4

TABLE IVV
PERCEPTIONS TOWARDS THE UNIVERSITY'S
INFRASTRUCTURE AND SECURITY

Public utility and security	Mean	S.D.	Quality level
1. Enough Litter bin in university.	3.44	1.056	Medium
2. Classify and recycle waste.	3.37	1.063	Medium
3. Waste Hygienic condition management.	3.45	0.984	Medium
4. Normal Electricity system work.	3.65	0.960	Much
5. Safety electricity system.	3.56	1.012	Much
6. Safety Electric wire.	3.63	0.987	Much
7. Standard and clean water supply system.	3.66	0.967	Much
8. Normal water supply system.	3.49	1.023	Medium
9. Clean and safety toilet.	3.31	1.084	Medium
10. Facilitate toilet.	3.31	1.187	Medium
11. Normal water supply system in toilet.	3.29	1.203	Medium
12. Public telephone service.	3.46	1.123	Medium
13. Efficiency security system.	3.54	0.958	Much
14. Enough Fire equipment in all building.	3.76	1.034	Much
15. Safety building.	3.63	1.028	Much
Total	3.50	0.834	Medium

TABLE V
COMPARATIVE PERCEPTIONS OF STUDENTS IN
DIFFERENT LEVELS OF STUDY

Service	Sum of Squares	Df	Mean Square	F	Sig.
Learning source and book service.	2.484	3	.828	1.741	.158
	183.583	386	.476		
	186.068	389			
Physical service for teaching and learning.	8.643	3	2.881	4.488	.004*
	247.746	386	.642		
	256.388	389			
Facilitate service.	7.087	3	2.362	3.818	.010
	238.829	386	.619		
	245.917	389			
Public utility and security service.	6.950	3	2.317	3.389	.018
	263.852	386	.684		
	270.802	389			

*p 0.05

Students' perceptions regarding physical facilities and environment provided for students learning at Chandrakasem Rajabhat University were compared based on faculties they were in. The statistical results reported a difference on the items of Learning Source and Book Service, Physical Service, Facilitate Service, Public Utility and Security at 0.05 significance level as shown in table 6.

TABLE VV
COMPARATIVE PERCEPTIONS OF STUDENTS IN
DIFFERENT FACULTIES

Service	Sum of Squares	Df	Mean Square	F	Sig.
Learning source and book service.	10.188	6	1.698	3.698	.001
	175.880	383	.459		
	186.068	389			
Physical service for teaching and learning.	20.542	6	3.424	5.560	.000
	235.846	383	.616		
	256.388	389			
Facilitate service.	18.392	6	3.065	5.160	.000
	227.525	383	.594		
	245.917	389			
Public utility and security service.	20.316	6	3.386	5.177	.000
	250.486	383	.654		
	270.802	389			

*p ≤ 0.05

Students' perceptions regarding physical facilities and environment provided for students learning at Chandrakasem Rajabhat University were compared based on the structure of their faculties. The statistical results reported a difference on the items of Physical Service, Facilitate Service, Public Utility and Security at 0.05 significance level as shown in table 7.

TABLE VIVII
COMPARATIVE PERCEPTIONS OF STUDENTS IN
DIFFERENT FACULTY STRUCTURE

Service	Organization	N	Mean	S.D.	t	Sig.
Learning source and book service.	In	371	3.69	.693	1.410	.159
	out	19	3.46	.642		
Physical service for teaching and learning.	In	371	3.66	.802	3.763	.001
	out	19	3.05	.674		
Facilitate service.	In	371	3.52	.788	3.065	.006
	out	19	2.97	.762		
Public utility and security service.	In	371	3.52	.836	2.627	.016
	out	19	3.09	.680		

The results from the interviews were summarized in table 8.

TABLE VVIIIIX
SUGGESTION FROM QUESTIONNAIRES
AND INTERVIEW DATA

Suggestion from questionnaires	Interview data
1.To improve officer service in register finance and center office 24%	1. To improve continuous internet and wireless system to cover all building, information technology, the number of text books and complete library service.
2. To improve toilet and facility 16%	2. To improve the register system.
3.To improve register and university record system 12%	3. To improve the classroom-time table and exam- time table were late.
4.To improve internet system 12%	4. To improve complete classroom and drinking water service.
5.To improve teaching aid, table, chair and security system 12%	5. To improve sport activity and clinic service.
6.To improve cafeteria Muslim food and dining table 8%	6. To improve learning organization culture in university.
7. Other: gymnasium, exercise equipment, landscape and new text book.	-

The university should develop continuous information technology system for student learning, learning organization culture, class-room and laboratory, toilet, student activity and staff development plan for efficiency service.

VX. CONCLUSION

The opinion of library service and source of learning was highest level, inferior to physical service and the lowest level was facilities service.

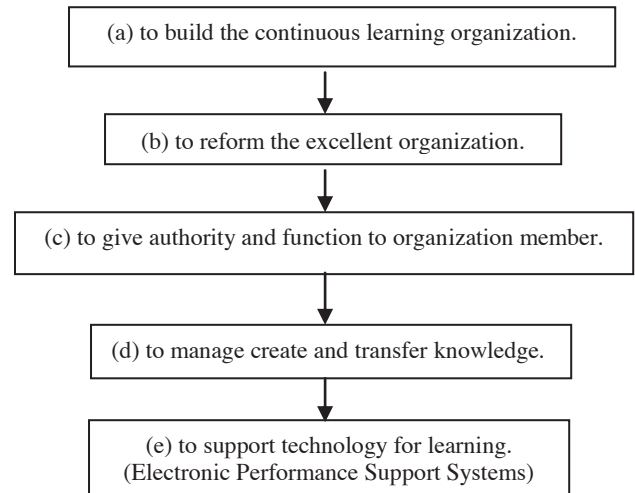
The opinions of physical service and environment provide for students learning in Chandrakasem Rajabhat University comparing between faculty organization and year level of students were different on the items of physical service, facilities, public utility and security at statistically significant 0.05 .

The opinion between faculties were different on the items of quality of library and learning service, physical service, facilities service, public utility and security at statistically significant 0.05.

The suggestions from students were service staff improvement such as: student registration, finance, center staff, cleaning toilet and equipment and other facilities.

The interview data suggestions about continuous developing information technology system and learning organization culture for student learning, class-room and laboratory, student activity and staff development plan for efficiency service were in group of physical environment in four items of research questionnaires as: Learning source and book service. Physical service for teaching and learning.

Facilitate service and Public utility and security service. If the university can change that four physical environment service it can be done with organization transformation, knowledge management and technology application. Conform to information system and human experience that can apply to use in learning organization. (Nawanno, Nattika. 2006). Building the Learning Organization (Marquardt, 1994).



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Music Therapy for Physically Disabled Children

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Abstract— Purpose: To apply music components as a therapeutic tool for improving muscle strength, spasticity, lung capacity, self-esteem and learning capability among physically disabled children at Srisangwan school for special children.

Design: The children were assigned to play therapeutic songs, parts of which were selected to match his or her instrument, physical capacity and music capability. Therapeutic musical notes were designed to improve children's capability by means of regular practices.

Findings: Increased self-esteem and improved lung capacity was obvious after 18-month program. The musical arrangement for melodeon players using multiple long duration notes to perform corresponded with improved lung capacity. Not only did this musical therapy program provide holistic healthcare for the disabled children, but it also returned such a great marvelous perception to the healthcare providers about how to overlook their inferiority.

Practical implications: Music therapy for improving physical function is very new in Thailand. Networks of music therapy and inclusion of certified music therapists may be necessary if a standard practice in medical settings is to be established in the future.

Social implications: The children's courage and positive thinking attitude incredibly raised the spirit of healthy people who had a chance to know them.

Keywords— Music therapy, children, disability, physical, musical instrument

I. INTRODUCTION

Research has shown that music has a profound effect on body and psyche, and it can be applied as a therapeutic intervention. Music therapy has been used with persons of all ages and with many types of disabilities [1]-[7]. With musical skills and experience, Dr. Jakkrit Klaphajone, collaborated with Dr. Lakkana Thaikruea, Annette Janine George, a registered music therapist from USA and Anuruk Tantong to establish the Music Therapy Group (MTG) in order to conduct research and provide music therapy programs for patients. In Thailand, research on the effects of music therapy on physical functions of disabled people was very limited, and the majority of music activities and music-related investigations involved emotional and mental aspects of patients or people. Therefore, in this study, the MTG will focus on effects of active music therapy program on both physical functions and emotional aspects of physically disabled children.

II. PARTICIPANTS AND INTERVENTIONS

The prospective cohort study was conducted between May 2009 and September 2010. The target population was physically disabled students from Srisangwan Chiangmai School where most children were diagnosed with cerebral palsy or spinal cord injuries. The MTG recruited physiatrists, physical therapists and occupational therapists to evaluate physical and mental functions, music preference and music capability of 45 eligible students in terms of basic rhythm and pitch perception, and music notation. The eligible students who could not play any instrument due to painful conditions, severe physical or mental disabilities, attention deficit disorder, or could not follow practice schedule were excluded. Included participants were then divided into three groups based on determined instruments which were keyboard, percussion, and wind instruments.

The participants were assigned to play easy therapeutic songs at the beginning of the study with the songs gradually increasing in difficulty. Parts of songs were selected to match physical capacities, musical capabilities, and the instruments of each participant [1]. Specific musical notes were chosen for the participants to use in order to improve each individual's targeted goal. For example, whole notes (semibreve) were applied frequently in the pieces for melodeon players with tempo of 75 for participants to play three-second notes via exhalation, assuming that multiple sessions would promote their lung capacity, as shown in Fig. 1.



Fig. 1 A boy with spastic hemiplegia holding and practicing his melodeon with one arm. The arrow indicating whole notes (semibreve) to be played with the melodeon for respiratory training objective.

Other specific musical notes were also inserted and rearranged with the aim to improve finger dexterity [8] and eye-hand coordination for keyboard players and percussion players, as shown in Fig. 2.



Fig. 2 Notes inserted and rearranged with the aim to improve finger dexterity and eye-hand coordination.

Most of the songs were simplified and split into parts to be played in separate lines by each student. Colored note charts were used to replace standard notes for those keyboard-playing students who could not read notes on a standard five-line musical staff. The MTG applied each of seven colors for each of the white keys in the middle octave of the keyboard instrument and then a colored note chart was created using colored blocks substituting musical notes (pink, gray, red, yellow, green, blue and orange for A, B, C, D, E, F and G notes, respectively), as shown in Fig. 3. The underlying reason for that specific color notation was according to Thai pronunciation of standard note names. The MTG found that these colorful charts stimulated enthusiasm and liveliness during practice.



Fig. 3 Colored note chart. Seven rectangular stickers were attached on the white keys of the keyboard to signify each musical note, with upward arrows indicating one octave above and downward arrows one octave below (left). The therapist pointed at each color block on the colored note chart corresponding to the melody note in the song to guide participants to play accordingly (right).

As a music band, participants had to play in harmony with others and a conductor was necessary. In addition, the conductor was responsible for organizing the band rehearsals. The duration of each practice session lasted for two hours on average. The participants practiced three times a week during the term and rehearsals with the Music Therapy Group were set. During the study, performances were organized for the participants to perform with or without the Music Therapy Group members to encourage social interaction [9] and increase motivation to practice, as shown in Fig. 4 and 5. In addition, the MTG arranged a trip to an amusement park after a show in Bangkok, as shown in Fig. 6.



Fig. 4 The band show in the National Hospital Accreditation conference 2010 with the Music Therapy Group.



Fig. 5 The first show of the band with the Faculty Dean, Music Therapy Group and abled-bodied dancers at the hospital on 50th year Anniversary of Faculty of Medicine, Chiang Mai University in 2009.



Fig. 6 The students had a relaxing time in an amusement park

III. ASSESSMENTS

The physical and emotional assessments were performed at baseline, ninth month, and 18th month. The assessments included finger and hand dexterity by Minnesota manual dexterity kit set, as shown in Fig. 7, handgrip strength by Jamar dynamometer, as shown in Fig. 8 and finger strength by pinch gauge, as shown in Fig. 9, lung capacity by spirometer, as shown in Fig. 10, spasticity by modified Ashworth scale, limb strength by manual muscle testing, and body balance by Berg balance scale. The other assessments included quality of life (QOL) by World Health Organization Thai brief version (WHOQOL-BREF-THAI) [11], Modified 10-QOL questionnaire and emotional quotient (EQ) [12]. The QOL included 4 domains, which were physical, psychological, social relationships, and environment.



Fig. 7 Assessment of finger and hand dexterity using Minnesota dexterity test



Fig. 8 Assessment of handgrip using Jamar dynamometer



Fig. 9 Assessment of finger grip using pinch gauge



Fig. 10 Assessment of lung capacity with spirometer

IV. DATA ANALYSIS

Descriptive analysis included proportion, mean (\pm standard deviation), or median (or range), depending on data distribution. To determine factors that might attribute to physical improvement, Chi-square test, Fisher's exact test, Student T test, and 95% confident interval were applied. The physical improvement overtime was analysed using regression model with a generalized estimating equations (GEE) with robust variance estimation that allowed for repeated measurements in the same individual. Epi Info for Windows version 3.5.1 (Centers for Disease Control and Prevention 2008. Centers for Disease Control and Prevention, Atlanta, GA) and STATA version 11 (Statacorp. 2009. Stata Statistical Software: Release 11.0 College Station, TX: Stata Corporation) software was used for data management and analysis. Significant level was set at p -value = 0.05.

V. RESULTS

There were 25 participants (17 boys and 8 girls). A mean age was 16.52 ± 2.85 years). Analysis of generalized estimating equations of Modified Ashworth Scale over 2 consecutive periods of 9 months revealed a significant reduction in spasticity of bilateral finger flexors ($p = 0.025$ Lt, $p = 0.001$ Rt), right finger extensors ($p = 0.009$), right elbow flexors ($p = 0.017$), left hip flexors ($p = 0.001$), right knee flexors ($p = 0.004$), left knee extensors ($p = 0.004$) and left ankle dorsiflexors ($p = 0.002$), as shown in Table 1.

There were no significant changes in muscle strength by manual muscle test, as shown in Table 2, however, a subgroup analysis did show more improved muscle strength of bilateral finger extensors in melodeon group and improved muscle strength of the right wrist and finger extensors in keyboard group. The Thai flute and recorder groups had no change in strength of their upper limbs.

There were no increase in 14 items of Berg balance scale but significant decreases in balance features of sitting unsupported, sitting to standing, transfers, tandem standing and stool stepping. The lung capacity was increased only in the wind instrument group (average vol = 0.050 L) between baseline and at 9th month, however, a subgroup analysis with GEE showed a predilection for the melodeon group (coef. = 0.018, SE = 0.192, $p = 0.090$) over the period between 9th and 18th month. The Minnesota dexterity test revealed no significant changes in all tasks ($p > 0.05$).

TABLE 1
ANALYSIS OF GENERALIZED ESTIMATING EQUATIONS (GEE) OF MAS (MODIFIED ASHWORTH SCALE) OF MUSCLES

Muscle groups	Side	Coef.	Std. Err.	95% Confidence Limits		Z	P-value
				Lower	Upper		
Finger flexors	L	-0.1250	0.0560	-0.2346	-0.0154	-2.24	0.025*
	R	-0.1272	0.0398	-0.2052	-0.4932	-3.20	0.001*
Finger extensors	L	-0.1875	0.1008	-0.3850	0.0100	-1.86	0.063
	R	-0.1563	0.0598	-0.2735	-0.0390	-2.61	0.009*
Wrist flexors	L	0.0000	0.1990	-0.3900	0.3900	0.00	1.000
	R	-0.1875	0.1008	-0.3850	-0.0100	-1.86	0.063
Elbow flexors	L	0.0615	0.1116	-0.1573	0.2802	0.55	0.582
	R	-0.2243	0.0936	-0.4078	-0.0409	-2.40	0.017*
Elbow extensors	L	N/A	N/A	N/A	N/A	N/A	N/A
	R	-0.1546	0.1004	-0.3514	0.0421	-1.54	0.124
Shoulder abductors	L	-0.0419	0.0309	-0.1024	0.0187	-1.35	0.176
	R	-0.0934	0.0514	-0.1941	0.0072	-1.82	0.069
Hip flexors	L	-0.2689	0.0784	-0.4226	-0.1152	-3.43	0.001*
	R	-0.0023	0.1518	-0.2998	0.2952	-0.02	0.988
Hip extensors	L	0.1922	0.1372	-0.0767	0.4612	1.40	0.161
	R	0.0450	0.1154	-0.1811	0.2711	0.39	0.696
Knee flexors	L	-0.1667	0.1054	-0.3733	0.0399	-1.58	0.114
	R	-0.2835	0.0991	-0.4778	-0.0893	-2.86	0.004*
Knee extensors	L	-0.2715	0.1293	-0.5249	-0.0180	-2.10	0.036*
	R	0.0448	0.1619	-0.2725	0.3621	0.28	0.782
Ankle plantar flexors	L	0.1714	0.1984	-0.2175	0.5602	0.86	0.388
	R	0.2492	0.1926	-0.1283	0.6266	1.29	0.196
Ankle dorsiflexors	L	0.5566	0.1840	0.1960	0.9171	3.03	0.002*
	R	0.1943	0.1389	-0.0779	0.4664	1.40	0.162

TABLE 2
PERCENTAGE OF PARTICIPANTS WITH CHANGES IN UPPER LIMB MUSCLE STRENGTH BY MANUAL MUSCLE TEST (MMT)

Muscle groups	Side	% with improved strength	No changes	% with decreased strength
Finger flexors	L	10.5%	63.2%	26.3%
	R	15.8%	47.4%	36.8%
Finger extensors	L	15.8%	63.2%	21.1%
	R	15.8%	57.9%	26.3%
Wrist flexors	L	5.3%	57.9%	36.8%
	R	5.3%	52.6%	42.1%
Wrist extensors	L	5.3%	57.9%	36.8%
	R	10.5%	52.6%	36.8%
Elbow flexors	L	21.1%	63.2%	15.8%
	R	15.8%	63.2%	21.1%
Elbow extensors	L	N/A		
	R	42.1%	42.1%	15.8%
Shoulder abductors	L	31.6%	52.6%	15.8%
	R	21.1%	57.9%	21.1%

Analysis of GEE for grip strength by instrument (melodeon and other instrument groups) revealed significant increase in lateral pinch grip strength of bilateral hand (2.796 ± 0.840 Kg, $p = 0.005$ Lt, 2.981 ± 1.019 Kg, $p = 0.003$ Rt) and pulp pinch grip of the left hand (2.418 ± 0.626 Kg, $p < 0.001$) in the melodeon group. In the other groups, there were also significantly increased strength in the left handgrip, lateral pinch grip of the left hand and pulp pinch grip of bilateral hands, as shown in Table 3.

Regarding WHOQOL-BREF-THAI and emotional aspects, the participants reported that the QOL scores in all domains (physical, mental, social, environment) were in moderate level at both baseline and the 9th month without significant difference. However, an assessment with a modified 10-QOL questionnaire (invented by Dr. Lakkana Thaikruea with more relevant questions particularly for the children in school age) revealed that most of the participants reported their QOL in all items at the 18th month better than that before participating the study, as shown in Table 4. The majority of the participants had emotional quotient (EQ) in normal levels in all aspects both before participating and at the 9th month. The "emotional control" score was also high at both periods.

VI. DISCUSSION

The discipline of using music as a therapeutic tool for improving the lives of persons with disabilities developed in the USA when it was found that traumatized soldiers returning from World War II responded more positively to music activities than other avenues of treatment. Since then, music therapists worldwide have been designing music activities intended to ameliorate mental or physical pain, stimulate learning of new behaviors, encourage expression of emotions, teamwork and improvement of self-esteem. The music is used as a motivator for repetitive speech or muscle exercises that would otherwise be boring or painful and as an encourager for participation in group work that might otherwise seem threatening to the clients.

The music therapist carefully designs the activities, whether they involve singing, dancing, listening, playing instruments or discussing song lyrics, with the specific needs of the clients in mind. The choices of music (styles, tempos, moods, modes and contents of the lyrics) are also carefully planned in consideration of the client's preferences, physical capabilities and emotional maturity. In behavioral therapy, the music making privilege or use of a musical instrument may be the reward, but in many music therapy activities, the music making activity also functions as the reward as the clients take pleasure in the music they are producing and sometimes performing.

At first, Dr. Jakkrit Klaphajone and Dr. Lakkana Thaikruea, leaders of music therapy project, came up with the concept of using music to improve muscle strength, finger dexterity and reduce spasticity. Besides these physical objectives, they also thoroughly planned to include mental and social interventions as a holistic approach.

It was a big challenge at that time since music therapy was very new in Thailand where core principles were necessary for setting up a standard music therapy application and assessment. Without adequate knowledge in this matter, they established "Music Therapy Group" (MTG) by inviting colleagues and volunteers which they thought would be an

expedite measure to achieve their objectives. Unfortunately, there had been no professional credential of music therapists in Thailand, although "Therapeutic Uses of Music" certificate programs had been developed at Mahidol University in Bangkok, therefore, Dr. Jakkrit used a targeted volunteer recruitment strategy to gather a group of energetic occupational therapists and physical therapists who had a common interest in music and were willing to be trained by Annette Janine George, a registered American music therapists. Volunteers within non-profit public sector coupled with changes in the nature of the volunteer workforce had combined to make volunteer recruitment a challenge, however their ambitious attitude and competitiveness to improve routine rehabilitation services by adding values of music interventions had driven the music therapy project to success.

The MTG had learned essential knowledge which finally became a fundamental guideline for music therapy practice and research at that time. Our study revealed that music was a marvelous tool to stimulate learning capability, increase self-esteem, improve muscle flexibility, increase lung capacity, reduce muscle spasticity, and improve muscle strength among the disabled children if used appropriately. Having joined the music therapy program as the players in the band, these students felt more happy and joyful than they did when participating in the regular therapy program. Able-bodied people who had the chance to know them and see their fabulous performances were remarkably touched by their efforts and braveries, which led to a spiritual boost and improved self-perception for the audiences also.

Because of the success of the program, the MTG energetically continues to provide useful information and create practice guidelines of musical rehabilitation for other healthcare providers that take care of disabled people, cancer patients and patients with anxiety or pain. The MTG has also established music therapy networks with major hospitals in the Northwestern part of Thailand and with community groups and leaders to provide knowledge and share experience for continuous quality improvement of their rehabilitation services with music interventions. Although implementations in each setting seemed to be cumbersome at first, ultimately it would be a cost-effective integrative and holistic therapy.

TABLE 4
MODIFIED 10-QOL SCORE AT BASELINE AND 18TH MONTH

Items	% of participants		
	More	Same	Less
Satisfaction in life	88.9	11.1	0
Concentration in study or playing music	83.3	16.7	0
Self satisfaction	61.1	38.9	0
Bad feeling (lonely, sad, anxious)	0	61.1	38.9
Satisfaction in music capabilities	77.8	22.2	0
Satisfaction with assists from others	66.7	33.3	0
Feeling that my life is invaluable	61.1	38.9	0
Ability to get along with others	83.3	16.7	0
Overall perception of my living	50.0	44.4	5.6
Other players getting along with people	66.7	33.3	0

TABLE 3
ANALYSIS OF GEE FOR GRIP STRENGTH IN THE MELODEON AND OTHER INSTRUMENT GROUPS

Strength	Side	Instrument [#]	Coef.	Std. Err.	95% Confidence Limits		Z	P -value
					Lower	Upper		
Handgrip	L	Melodeon	8.2606	5.2033	-1.9377	18.4590	1.59	0.112
		Others 1	2.6010	0.8616	-0.9122	4.2897	3.02	0.003*
		Others 2	-4.5289	1.5001	-7.4691	-1.589	-3.02	0.003*
	R	Melodeon	N/A					
		Others 1	-0.8624	2.4186	-0.56031	3.8778	-0.36	0.721
		Others 2	0.7591	3.6391	-0.63733	7.8916	0.21	0.835
Lateral pinch grip	L	Melodeon	2.7961	0.8400	1.1498	4.4424	3.33	0.001*
		Others 1	0.8628	0.3060	0.2631	1.4624	2.82	0.005*
		Others 2	-0.0234	0.6994	-3.7667	-0.2802	-2.28	0.023*
	R	Melodeon	2.9808	1.0186	0.9844	4.9772	2.93	0.003*
		Others 1	1.7075	1.0284	-0.3081	3.7232	1.66	0.097
		Others 2	-2.7793	1.7429	-6.1953	0.6366	-1.59	0.111
Pulp pinch grip	L	Melodeon	2.4181	0.6262	1.1909	3.6453	3.86	0.000*
		Others 1	1.1431	0.2766	0.8710	1.9552	5.11	0.000*
		Others 2	-2.0127	0.5065	-3.0054	-1.0199	-3.97	0.000*
	R	Melodeon	1.2538	0.7882	-0.2910	2.7987	1.59	0.112
		Others 1	0.9105	0.3080	0.3068	1.5142	2.96	0.003*
		Others 2	-1.4675	0.4852	-2.4186	-0.5165	-3.02	0.002*

[#]Others 1 = comparison for the other instruments between baseline and at 9th month
Others 2 = comparison for the other instruments between baseline and at 18th month

VII. CONCLUSION

This study revealed that the music therapy program designed by the MTG could improve grip strength and reduce spasticity by using targeted muscles of the physically disabled children in playing music instruments. Melodeon seemed to be more effective than the other instruments in improving finger and wrist extensor strength, and lung capacity as well. The arrangement of songs using multiple prolonged musical notes was the key factor for improved lung capacity. The quality of life by a modified 10-QOL questionnaire was higher in most of participants after 18 months of the program and the EQ was already high both before and after participating in the program.

Volunteer recruitment and network creation were key factors contributing to the success of our music therapy project. Although implementations in the hospitals and institutions might take time and energy, music therapy is considered as a cost-effective holistic therapy when cost-saving measures are a priority in healthcare.

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Community Service based Learning as USR Program and the Impact for Marketing University

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Abstract— Less research in universities focused on teaching and learning activities as part of University Social Responsibility (USR). Teaching and Learning actually should be related to community service. This study discusses how to do community service based learning in consumer behaviour class and the impact for marketing university. This study was conducted in two classes of consumer behaviour and involved 63 students and 9 Small and Medium Enterprises (SME) located around Campus with different product and services. 63 students were divided into 9 groups and every group has responsibility to solve marketing problem in SME based on their consumer behaviour research. Data collected by questionnaire and interview to students and SME. Based on evaluation, SMEs feel satisfied because they can improve the quality of products, distribution systems, pricing and payment methods, and promotional tools which the student's suggestions. Students also perceived that by following this course, they can improve their skill such as: interpersonal skill, presentation skill, teamwork, managerial skill and apply their knowledge in business practices. Their activities contributed benefits for improving SMEs marketing strategy like in product design, distribution, pricing, and promotion strategy. Most of student's recommendation is adopted by SME. Based on evaluation of this program, SME satisfy with this program because their product become better than before, their customers more satisfy, and their selling increase more. Beside it, society around SME knows further about University and its USR program. It means this program also as promotional tools for marketing of HE.

Key words:

Community service based learning, SME, USR

I. INTRODUCTION

Generally, the objective of teaching and learning process is for academic purposes only, not for other pillars of university function such as research and community services. As one of the pillars of universities function, teaching and learning processes can, actually, be integrated with community services, specifically through University Social Responsibility program (USR).

Community Service based Learning (CSL) is a new method of learning that is not only for achieving learning objectives, but also for providing benefits for community simultaneously. In contrast to the Student Community Engagement (SCE) that involves students in local projects within a community setting, CSL in this research is characterized by the application of knowledge and skills to develop the community simultaneously during learning[1]. Students provide services to the community based on the problems they face and offer many alternative solutions to solve their problem. Like other method of learning, CSL will be effective if combined with various methods of students-centred learning such as small group discussion, project-based learning, and other methods that involve students more actively during learning. Any kind of method is applicable as long as facilitating students to apply their knowledge and skill for community services.

Designing CSL for consumer behaviour course is very important for marketing students, because, on the one hand, they found difficulty to practice their knowledge, attitude, and skills in real life. On the other hand, small and medium enterprises around campus faced marketing problem during executing their business. By creating the new design of learning, this course can enhance their technical competences in marketing and facilitating SMEs to understand their customers. Referring to Bennett, et al, it is stated that the key determinant of absorption of graduates such as content knowledge, technical competence, and core competencies have not been optimally developed.[2]. Thus, it creates new method of learning consumer behaviour class will overcome this problem.

There are five reasons why CSL is important to be delivered. First, it can facilitate students to accelerate transfer of learning. Graduates often have difficulties in applying the theory in practice because they never gain experience to apply it in the real world. Consequently they require a long time to adapt in order to use the knowledge and skills in the community. Second, students as community members need to learn about a variety of social skills and awareness as well as responsibilities to the community. Third, it can integrate university learning with social responsibility program. USR

programs are generally designed specifically from the cost, so it becomes expensive and involves fewer students to study social life. Fourth, it extend university cooperation with community. Fifth, it can enhance the sustainability of institutions of learning programs that can provide benefits to the community, thus enhancing the recognition and public trust in universities.

II. THEORITICAL REVIEW

A. Community Service based Learning (CSL)

The concept of CSL has not been widely used in teaching and learning. However, the concept of service based learning has been widely applied to courses that give priority to the competencies of services to the consumer and to achieve learning goals, particularly in the service for others. According to Learn & Serve America (nd) Service learning is teaching and learning that integrates meaningful community service with interaction and reflection to enrich the learning experiences, teach civic, responsibility and strengthen communities [3]. In another study service learning is viewed as combination of educational activity (Academic) and the communities in which learners are directly tied to activity in community-based organizations. Contrast with service based learning, CSL focus on community services during learning.

In this research, CSL is viewed as learning that provides opportunities for learners to apply knowledge and skills to repair and improve the welfare of society as structured. In CSL, students also learn how to serve community or a group or people in society. In order to deliver a good service to community, students will identify the problems faced by a group or community members based on the courses which is being learned, then provide recommendations for solutions to overcome problems faced by society.

The use of CSL is as part of the implementation of community services and USR due to the benefits that effect directly to society. Referring to the opinion of Millican regarding the Student Community Engagement (SCE)[4], the CSL concept is like the SCE provides important benefits of learning include: (1) can expand the knowledge of students through a learning which can increase the awareness of society and the environment, (2) enhance social self-efficacy, (3) provide a source of learning especially practices in different societies with the theory, (4) enhance students employability through the development of social skills, (5) Improving academic performance, (6) assist the development soft skill such as interpersonal skills, social skills, and managerial skills, (7) be a means of obtaining self-knowledge, (8) expanding the capacity to make reflective thinking and reflective learning.

In CSL, there are several methods that can be used in addition to lectures, discussions, and Project-Based Learning (PBL), problem based learning, and other methods. Using PBL allows students to work on a project whose goal is to help community members or certain group of community to

get better their quality of life as a result of the implementation of students learning. Like other Students-Centered Learning methods, students are required to be capable of completing the project by developing skills, applying theory into practice, actualising their skills to contribute to the society.

B. Community Services based Learning as part of University Social Responsibility

Universities as part of the community have a social responsibility. Most universities in many countries have three important functions of the education and teaching, research and community service. The third function is ideally implemented in a balanced, interrelated and relevant so as to strengthen the other functions. According to Millican and Bourner, there are four important things in the role of the company such as: (1) as part of the community, the company has a social responsibility to all stakeholders, especially the government, (2) to face the complex global challenges, universities have a social responsibility to be superior and better understand the various social issues, economic, cultural and sustainability the problem and respond wisely[1]. Universities supposedly able to lead society in generating knowledge to face the global challenges, (3) Universities which have three main functions: teaching, research, and community service, have academic freedom and autonomy in carrying out its functions, and should provide critical thinking and active as part of the community, (4) universities are required to produce graduates who are qualified in accordance with the needs of today's society and future as well as educating people to good citizens who uphold moral values and ethics.

The concept of CSR, referring to Silberhon and Warren is viewed as a normative concept, multi-level concept, which means depending on a variety of perspectives and relationships, the company changed according to the response of social change [5]. Defining CSR is relatively difficult, because there is no definition that can be universally accepted. [5, 6]. In the marketing context, CSR should be perceived as equilibrium of corporate social responsibility, principles and marketing activities (processes), allowing satisfying or surpassing expectations of stakeholders, their groups, and society [7]. In the implementation, there are various forms of CSR approaches that can be created to build the optimum value added such as: (1) efficient and ethical pursuit of core business activities, (2) social investment and philanthropy, (3) contribution to the public policy debate [8].

CSL can be used as an effecient and ethical pursuit of core business activities, social investment and philanthropy approach. University doing learning and teaching deliver business consultancy and facilitate public specifically small and medium entrepreses to improve theis business.

C. The Benefits of CSR for Marketing

Several previous research explore the benefits of CSR for marketing and other business performance. CSR activity has positive contribution for building corporate image and the

brand [9]; and strengthen corporate reputation [10]. The more activities conducted for public, the stronger corporate image in that society. Building awareness can be built, if the corporates continuously do activity that contributes to public. So, if universities often deliver business consultancy, and support promotion tools by promoting the identity of university, public will be more aware of the university brand.

The indicator of marketing success is from marketing performance. It can be measured by sales volume, brand awareness, customer loyalty, customer satisfaction, etc. From higher education institution perspective, marketing performance can be measured from public awareness about their institution, the number of new students enrollment, and the employability, and the income generating from non students resources fund.

Even though CSL is conducted only in specific area in community, if the program executed continuously and extend covered from time to time in the long run, the huge effects will be risen. The multiplier effect of communication becomes wider from word of mouth [11]. The effect of word of mouth is stronger than marketing communication from corporate. It's understandable because word of mouth more objective and credible because free from corporate interest. It means that if public feel the benefits of CSL, they will tell others about the positive side of university.

III. METHODOLOGY

This research objective is to develop community service based learning, specifically in consumer behaviour course as a part of USR program and to evaluate the effects for marketing university. The subjects of the research are 65 students, with response rate 57 who take consumer behaviour and 9 owners of small medium enterprises which involved in project-based learning during CSL applied. The owners are from many kinds of business such as foods, shoes, travel agency, laundry services, and computer rental.

Data collected by questionnaire for evaluating the CSL and by interview for evaluating the marketing impacts. The evaluation of CSL methods based on student perspective and the indicator of evaluation covered the design of e-learning, students' satisfaction to CSL models, the benefits of CSL to enhance interpersonal communication skill, presentation skill, self confidence, team work, managerial, problem solving, applying theory in real situation, technology expertise, and making report. The marketing impact of CSL is evaluated based on entrepreneurs perceived about the University (the understanding).

Data was analysed by descriptive statistic and qualitative methods. Descriptive statistic is used for describing the evaluation of e-learning as supporting tools for SCL and the benefits of the SCL methods from student perspective. Besides it, descriptive statistic is also used for evaluating the marketing awareness and the benefits of CSL from owner of SME perspective. The criteria for categorizing means with 5 point rating as follow Table 1:

Table 1 Criteria of Evaluation

Point rating	Categories
1,0 - 1,80	Very bad/very low
1,80 - 2,60	Bad/low
2,61 - 3,40	Enough/ average
3,41 - 4,2	Good/high
4,21 - 5	Very good/very high

Qualitative method is used for knowing further about the perception of SME owner on CSL for improving their business performance.

Research was conducted for eight months, two month for preparation and six months for implementing. The stages of designing CSL are:

Preparation Stage

During this stage, the lecturer prepared many components before implementing CSL in Consumer behaviour course.

a. Syllabus of the Course

This syllabus contains materials which are delivered in the classroom. In this stage, the teacher should consider not only the goal of the objective of the course, the students, and other factors, such as methods, teaching aids, psychological atmosphere and class room situation [12], but also the university social responsibility program. The learning objective should be synchronized with USR mission.

b. Material for learning

Material for learning is very important for lecturer and also the students. There were many materials which were prepared by the lectures such as: game tools, interview guide, a root cause business analysis guide, presentation guide, documenting the project guide, and learning evaluation form.

c. Method of learning

There are three main methods for executing CSL, namely: lecturing, small group discussion, and project based learning based on team work. This PBL method also completed by *e-learning* in order: (1) allows active students to achieve the planned learning objectives, gather information, learn to construct and solve problems in a context close to reality that will be faced after graduation [13], (2) make a more effective form of soft skills: discipline, work in teams, communication (soft skill attributes of the institution), and learn about self-confidence and solve the problem (attribute soft skills Study Program Management S1), (3) make learning more interesting, (4) quicken transfer of learning [14], and (5) permit students discuss, make a written communication, and self study to complete the project through a e-learning anytime, with little cost and directly familiarize students with IT.[15]

Implementation Stage

It spent 14 weeks for meeting, except examination. In the first week, the teacher explained the students about the syllabi (the goal of course and the benefits for marketer in the future when executing their activity, and the references, material, resource learning, guide line for executing projects, evaluation system and the rule of lecturing, the assignment).

The teacher also offered some methods for analysing root cause of business in SME. Students must establish group and act as marketing consultant whose expertise in consumer behaviour. As a marketing consultant, every group should make the marketing consultant profile and organize their group as professional consultant. In the second week student looked for object for project, in this case SME around campus and proposes to the Department for signing Memorandum of Agreement for this project. In the third week, they identified the SME problem related the topic until the seven weeks. After this, they gave recommendation and offer solutions. The recommendation should be relevant to the subject of course, marketing strategy and tactic.

For facilitating students to do self learning any time, lecturers set e-learning management system. Thus, system is uploaded in university website (www.kuliah.perbanas.ac.id). This system permits students to interact with the lecturers and their friends and their group. Most materials for conducting project in community services are available in e-learning.

IV. RESULTS AND DISCUSSION

Evaluation of the effectiveness of implementation of CSL learning model is essential to measure the success of learning. There are two kinds of evaluations that will be conducted: evaluation of the implementation of CSL from students' perspective, and evaluation the benefits of CSL implementation for SME.

Evaluation for CSL implementation covered media e-learning for supporting CSL, and the benefits of CSL for developing students' soft skill. Evaluation was conducted through a questionnaire to all participants of consumer behaviour course. There are 57 questionnaires that the contents are complete and valid analysed in this study.

The evaluation of e-learning as part of CSL consists of seven aspects for measuring the quality of e-learning, such as: 1) the design, 2) contents, 3) assignment related to the project for community services, 4) accessibility, 5) the benefits, 6) learning evaluation system, and 7) forum facility/ discussion. Based on evaluation of the implementation of teaching and learning, the result showed that for e-learning system for supporting the teaching and learning in CSL is good with overall means for all aspect of e-learning (4,087 from 1 – 5 points).

From 7 aspects of e-learning, students perceived that the assignment related to the project and the benefits of e-learning is very good. The score of project in learning 4, 40 and the benefits is 4, 33. During the lecturing and executing project in SME many communications (including instruction weekly) were conducted by forum in noodle of learning

management system. Function of learning in this case is a tool for providing material any time can be accessed, and facilitate students to interact with teacher and other to discuss about project. Like other function of e-learning in teaching and learning, e-learning in this SCL also has function to complement and enhance the traditional instruction. The mean score of other aspects of e-learning such as design of e-learning 4, 14, content 3,89, accessibility 3,77, evaluation method of CSL 4,01, and the forum facility/ discussion 4,05. The lowest score is the accessibility because during implementation the system was not running well, and made the students take long time to access.

Students are also satisfied with e-learning it's indicated by the score of overall satisfaction. Mean score for overall satisfaction is 3, 77. It means that e-learning as a supporting tools have important role to facilitate CSL. It makes the students easier to learn any tome without depend on the lecturers. In learning student satisfaction is very important. Satisfaction will increase learning motivation, and develop positive behaviours that contribute to success in learning. From marketing perspective, customer satisfaction has positive effect for students' retention. Besides it, referring previously research found that customer satisfaction also has positive effect on corporate image, corporate reputation, and brand reputation, [16,17], in higher education context, these consequences also happened. Students who are satisfied generally have positive experiences about their university, and they have a positive image. They will think that their university have good reputation, and talk to others about their perception towards the universities.

The effectiveness of CSL is measured based on the learning objective achievement of this course for supporting student's soft skill development. Referring to the grand soft skill university policy, the main soft skill attributes will be developed are communication, teamwork, discipline, self confidence, problem solving, ethics commitment. Every course in curriculum must develop some soft skill attributes and evaluate them integrated with the objectives of learning course.

Based on benefits evaluation (Table 2), students perceived that SCL provides high benefits for improving their interpersonal skill, presentation skill, self confidence, teamwork, discipline, information technology, and making report.

TABLE 2. THE BENEFITS OF CSL

DIMENSIONS OF BENEFITS	mean
Interpersonal communications skill	3,98
Presentation skill	4,02
Self confidence	4,09
Team work	4,16
Managerial skill	4,40
Problem solving	4,22
Discipline	3,65
Application theory in real situation	4,58
Information technological skill	3,68
Making report skill	3,77

The lowest score is the benefits for improving information technology, because using e-learning in this university is a common. Students use IT only for access e-learning; submit their assignment, and making promotion tools. Students can also make report well because the lecturers provide template for reporting.

The highest benefits of SCL for the students are for improving managerial skills. During SCL implementation, students practice to set project community service. They plan their activity for delivering marketing consultancy based on consumer behaviour understanding. As a marketing consultant they designed the structure of organizational and job description. For setting this organizational structure, job description, business mission, and the strategy for achieving their goals, they need coordinate and manage their group like business professional organization. They also did all aspect in management function, such as planning, organizing, actuating, and controlling in order to achieve their goals and objectives.

Managerial skill for graduates is very important when they entry the supervisor and manager position level. Not all university can develop students' managerial skill because it needs management to create many projects or activities that involving students for practising management function (planning, organizing, actuating, and controlling).

Students should also manage presentation assignment about the progress report of CSL and do many activities with SME as a partner. Due to competition to get the best predicate of marketing consultant, every group did seriously by managing their activity and groups.

Students also perceived that they got high benefits for: problem solving and applying theory in real situation. Problem solving analysis is one of the soft skill attribute objective for the graduates of this department.

Referring to the results, it proves that CSL generates many benefits for developing managerial skill and much soft skill attributes. This finding is relevant to Millican that CSL provide a source of learning especially for practicing the theory, enhance students employability through the development of social skills, and assist the development soft skill such as interpersonal skills, social skills, and managerial skills.[1] Considering the benefits of SCL for developing managerial, technical competences and soft skills, it is necessary for university to facilitate it. Employability will be better if graduates have a good soft skill, managerial competences, and technical competences which relevant to industry requirements.

The other evaluation to measure the effectiveness of CSL is based from the benefits for community, especially for SME and also the impact for marketing university. There are 9 owner of SME involved in this evaluation. The result indicated that that actually only two person (22,2%) of them know the brand of university, and 77,8 SME owner didn't know. But after CSL, they know further about the university. They knew not only the brand, but also the services, the quality (especially related with the students services), and also the concern university to contribute for society development.

Based on means score, it indicates that SME owner stated strong (very much) agree that by this CSL, they know well with the university. It means that this CSL can promote the university.

CSL in that case can be used as a promotional tool for marketing university. This promotion also a kind of soft marketing and the effects more power full than advertising. Most of owners of SME are opinion leader because of their position in society. According to Suryani, opinion leader has strong impact because their opinions more objective, and can be utilized for strengthen brand awareness and make consumers feel secure from the risk.[11] Opinion leader in Indonesia society also has important role for influencing others. People will refer their thinking and behavior to opinion leader. So, actually the effect of promoting is not only for nine people, but to many people due to the word of mouth effects.

SME owner's opinion is that SCL has positive contribution to society development, and this program part of the concerning university to public, it means that university has conducted the community services program. It also perceived as part of university social responsibility. If the program will be extended in amount and area covered continuously, it can built strong reputation and image of university. Previous research about corporate social responsibility proved that CSR has positive contribution to building corporate image and the brand [9], and strengthen corporate reputation [10]. This result is also possible for university. Universities need recognition from public, and it will be realized if they have good reputation and strong brand image. People believed to enroll in certain university because they knew and trust with university.

The analysis also found that SME perceived that they got many benefits for improving their business. Table 3 presents the SME owner perceived about the benefits of CSL

Table 3 THE BEEFITS OF CSL FOR SME

BENEFITS	Mean
Product strategy	3
Promotion strategy	4,44
Understanding consumers	4,11
Pricing strategy	3,56
Business development	4,22
Selling	3,11
Process and services improvement	4

The highest benefit is for improving their promotional strategy, and followed by business development. In this CSL, students help SMT to create promotion tools. By many kinds of promotional were produced by the students, like name card, brochure, banner, and product catalog.

SME also perceives that CSL help them in improving business development, understanding their customers, process and service improvements. The contribution CSL for

improving pricing, selling and product strategy is enough high. Students just recommended, but for the strategy the SME owner didn't change their policy in that case in the end of the program.

III. CONSLUSION

CSL will become an alternative for university to improve the quality teaching and learning and to do community services as part of university social responsibility. Based on this research, CSL can facilitate students to transfer of learning in real cases, develop many soft skills attributes and technical competences. CSL also permit university to extend cooperation with community.

CSL is also very important for university sustainability. By conducting CSL, the recognition, reputation, and brand awareness of university will be stronger. For improving the contribution to university sustainability, CSR should integrate with community services program. The effect of CSL for university marketing will become stronger if universities conduct it continuously and wider covered.

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Waste Segregation in De La Salle University – Dasmariñas

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Abstract— This study aims to assess the knowledge and frequency of students and faculty in Waste Segregation in De La Salle University – Dasmariñas. The study involved 69 participants, 47 of which were students and the remaining, faculty, all of which are bona fide residents of DLSU-D for the summer term of Academic Year 2010-2011. The researcher employed the use of questionnaires to collect data. The knowledge in waste segregation was measured through the use of an exam to determine the familiarity of the respondents with the university's waste segregation color coding scheme. The research data returned information suggesting that faculty members have a better knowledge on waste segregation than students, notwithstanding all respondents lacking sufficient knowledge in waste segregation. Parallel to these findings, it appears that faculty members practice segregation more frequently than students, implying a positive correlation between knowledge in segregation, and frequency of such.

In lieu of such data, it may be well advised to promote education of waste segregation in order to increase the likelihood that an individual will practice it. No data suggests that this may be isolated in the respondent pool, and may be applicable to an external population as well.

Additionally, it helps into fulfilling the vision and mission of De La Salle University, to create (environmentally) responsible graduates.

Keywords— Waste segregation, Color Coding, Environmental awareness

I. INTRODUCTION

De La Salle University-Dasmariñas is hailed as one of the most beautiful campuses in the Philippines (DLSP), housing a Spanish motif for its structures, while being surrounded by nature [1].

Additionally, in April of 2009, DLSU-D was granted the Dark Green status by the Environmental Education Network of the Philippines, the highest status they have to offer, signifying the school's "effective integration of environmental concerns in its academic programs and its continuing efforts to improve the environmental situation within its community" [2].

In light of this, an inference on the knowledge of the people in the school would prove useful in determining if the school has kept up its standards with regard to the dark green status, and the Lasallian values as well.

II. STATEMENT OF THE PROBLEM

The study aims to answer the following questions:

1. How knowledgeable are the students and the members of the faculty with the university's waste segregation program, particularly on the color coding scheme?
2. How often do students and faculty members practice waste segregation in the university?
3. What are the causes behind the non-participation of students and faculty in waste segregation in the university?

III. SCOPE AND LIMITATION

The focus of this study is limited to the knowledge on the color coding scheme and practice of the students and faculty members in waste segregation in De La Salle University-Dasmariñas.

The sample of interest for this study are students and faculty of De La Salle University-Dasmariñas who were present on the 19th and 20th of May on Summer term 2010-2011.

The small sample size increases the margin of error for the results, but is unavoidable due to the time constraints of the requirement for the study.

IV. METHODS

De La Salle University-Dasmariñas is hailed as one of the most beautiful campuses in the Philippines (DLSP), housing a Spanish motif for its structures, while being surrounded by nature.

Participants included in the study were 47 students chosen by a random-chance sampling method. The same applies to the 22 faculty members included in the study.

Surveys were executed in faculty rooms for the faculty members on their convenience, and students were surveyed all across school grounds, to ensure that at least one representative from each college and department would be taken in consideration.

This study is descriptive and inferential in nature, to determine the knowledge on the color coding scheme of the waste segregation program, and the practice of such by the respondents.

Part 1 of the questionnaire is a 5-item test used to measure the knowledge of each respondent regarding the waste

segregation program in campus. The questionnaire asked to which color trash bin will 5 example wastes will be put. Three of the wastes are listed on the garbage bins in campus whereas the other two are not. Scores were calculated on the number of correctly matched waste and colored bins out of the possible 3.

Part 2 of the questionnaire measured the practice of waste segregation with the use of a Likert scale (5-Always, 4-Sometimes, 3-Seldom, 2-Rarely, 1-Never), and an open ended question to determine why their answer is such.

The following steps were taken to maintain the integrity of the data gathered:

1. Respondents were disallowed to collaborate with others.
2. Respondents were disallowed to view the colored bins during the survey.

V. RESULTS AND DISCUSSION

The students registered a weighted mean of 1.04 out of 3 on the knowledge test. On the part of the faculty the registered mean was 1.59 out of 3. This indicates that, even though the faculty scored higher than the students, the population lacks sufficient knowledge on the color coding scheme of the waste sorting program in De La Salle University – Dasmariñas.

The results of the practice test show that the faculty practice waste sorting more frequently than the students (4.09 out of 5 versus 3.59 out of 5). Indolence is the primary reason for non-participation in waste sorting (51% for the students and 41% for the faculty).

The results on the frequency of waste segregation in students were similar to the results of the study conducted on the College of Business Administration students of De La Salle University-Dasmariñas on the practice of waste segregation [3].

One of the findings of the study is that faculty members that have more knowledge on the color coding scheme tend to practice waste segregation more often.

VI. CONCLUSION

In conclusion, it has been observed that knowledge on the color coding scheme of waste sorting is correlated to the practice of waste sorting.

VII. RECOMMENDATION

The university should make ways to promote environmental awareness on students and faculty members. Forums and talks on waste management should be conducted regularly and implementation of environmental awareness programs in CWTS would not only benefit the university but also the city of Dasmariñas.

Another recommendation is that a more in-depth study on the relationship between knowledge on the colour coding scheme and the practice of waste sorting should be conducted. In conclusion, it has been observed that knowledge on the color coding scheme of waste sorting is correlated to the practice of waste sorting.

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Environmental Hazards in the housing of older people from the academic staff of AMS, CMU

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Abstract— In Thailand, as in much of the developing world, rapid declines in mortality and fertility are now leading to rapid population ageing increases in the proportion of older people in the population. Falling and its consequences are an important public health problem for older adults. The environment is a contributory factor in most falls of older people. The aim of this pilot study was to evaluate the environmental hazards in senior citizens' homes to reduce risks associated with falling or sustaining injuries. The participants in the study were academic staff from the Faculty of Associated Medical Sciences (AMS), Chiang Mai University, aged over 55 years. Knowledge management was used in this study to enable people to improve their way of life by capturing, sharing, and using knowledge. In this research, three case studies were used to find information using qualitative and quantitative techniques. A structured interview completed with each participant included questions on demographics and knowledge about the environment of senior citizen's housing. The homes were evaluated using room by room observation technique following the home hazard questionnaire. All homes of subjects had at least one hazard and 1 home had many hazards. The environmental hazards found while inspecting the housing suggests a need for further research to create a systematic strategy. Information from the assessment of environmental hazards can be useful to apply to the course training of Faculty. One objective of this course should be focusing on appropriately assessing the homes of the elderly in order to effectively reduce risk of injury and increasing self-reliance.

Keywords— Environmental hazards, Older people, Housing, Academic staff, Environment

I. INTRODUCTION

The Thai population is ageing rapidly due to declines in fertility and mortality. Thai fertility began falling in the late 1960s, and reached replacement level (2.1 births per woman) in the early 1990s. Life expectancy is now around 70 years. As a result, the proportion of Thais aged 60 or over increased from 4.8% in 1960 to 10.5% in 2005, and is likely to reach about 25% by 2040 [1]. Since, however, most of the current older Thai population established their families when fertility was much higher, they commonly have numerous adult children, e.g. in 1995 Thais aged 60 and more years had on average 5.3 living children, and only 15 per cent had two or fewer [2]. Driven primarily by fertility decline, the share of the Thai population aged 60 and more years rose from 5.5 to 9.5 per cent between 1980 and 2000 and, according to UN

projections, will reach a quarter of the population shortly after 2040 [3,4]. Older people (i.e. aged 60 years and over) are vulnerable to injury (sometimes fatal) from falls. Falls are the leading cause of injury related visits to emergency departments in Ireland [5]. Up to 15% of falls result in injuries, the most serious of which is hip fracture and up to half of all people who have a hip fracture never get back to their previous level of independence; a quarter die within 6 months of the fracture and a similar number are discharged to a nursing home [6]. The physical environment component of senior friendly housing has an immense impact upon the safety and functional level of older people. Understanding about risk factors of housing is very important to plan implementing ageing friendly standards.

Ageing is not merely the passage of time. It is the manifestation of biological events that occur over a span of time. It is important to recognize that people age differently. The ageing body does change. Some systems slow down, while others lose their "fine tuning." As a general rule, slight, gradual changes are common, and most of these are not problems to the person who experiences them. Sudden and dramatic changes might indicate serious health problems. In 1990, the UN General Assembly designated 1 October as the "International Day of Older Persons". In 1991, the Assembly adopted the "United Nations Principles for Older Persons" (resolution 46/91), encouraging governments to incorporate them into national programs whenever possible. The Principles call for action in many areas, among them [7]. With respect to national policies, the Proclamation on Ageing, contained in that same resolution, proposes that "the entire population" be engaged in "preparing for later stages in life", and that "old and young generations cooperate in creating a balance between tradition and innovation in economic, social and cultural development". The environment is perceived to play a significant role in many falls experienced by older people [8]. The World Health Organisation [9] has highlighted that falls can result from environmental hazards and Todd et.al [10] promote a broad environmental definition encompassing the community in which the older person lives and the environmental challenges they face. Using this interpretation, environment includes buildings, places and spaces: it is the personal place we call home (house/residential/nursing home etc.); the places we visit (shops, post offices, health care facilities, parks etc.), and the connecting spaces between these places (bus-stops, footpaths and road crossings etc.).

The risk factors for falls among older people can be classified into three categories: intrinsic, extrinsic and exposure to risk [8]. Intrinsic factors include age, gender, living alone, medicine, medical conditions, impaired mobility and gait, nutritional deficiencies, impaired cognition, visual impairments, and foot problems. Extrinsic factors include poor lighting, slippery floors, uneven surfaces, footwear and clothing, inappropriate walking aids or assistive devices. Exposure to risk is related to levels of activity and inactivity. Intrinsic factors are considered more important among people aged 80 and over (suggesting they are less active) and extrinsic factors more important among older people under 75 (suggesting they are more active).

The aims of the study were to evaluate environmental home hazards to reduce the risk of older people falling or sustaining injuries through falling and explore the socio-demographic characteristics of older people (quality of life and life style). This study is a pilot project to support course design in curriculum development using the objectives model of curriculum design whose content is based on specific objectives [11]. A short course specifically on a supportive living environment for older people would be of value. Health education must be for life. It should be part of the daily school curriculum. The concept of curriculum in education is always changing to suit the needs of society.

II. METHODOLOGY DESIGN AND DATA COLLECTION

A. Subject Recruitment

Three subjects were academic staff from the faculty of Associated Medical Sciences, Chiang Mai University by using convenience sampling to recruit housing of older people. The sampling method was non-probabilistic. We used theoretical sampling [12]: this sampling approach has the purpose of developing a rich understanding of a concept. We selected knowledgeable key informants [13]. All respondents held a course management position and directly lived in their own houses. Subjects were selected from three age ranges 55-60 years old, 61-70 years old and 71-80 years old. All subjects who agreed to participate in the study were interviewed before visiting their homes. Home environments were inspected and assessed for hazards.

B. Procedures of data collection

Data collection was obtained by face to face interviews at their homes and direct observation of home environments.

C. Measures

1. Socio-demographic information was collected on age, marital status, education level, income, living conditions, and frequency of contact with family or social support.

2. The participants completed a Thai version of the brief form of the WHO quality of life assessment instrument (WHOQOL-BREF-THAI). The WHOQOL-BREF-THAI is the Thai version of a brief form (WHOQOL-BREF) of a generic and transcultural QOL assessment instrument

developed by WHO (WHOQOL-100) [14]. It is a 26-item scale with 5-point Likert responses, having four subscales measuring physical health, psychological well-being, social relationships and satisfaction with the environment (Table I).

TABLE I
SUBSCALE AND OVERALL QOL SCORING CRITERIA
OF WHOQOL-BREF-THAI

Subscales	Items	Bad	Average	Good
Physical health	7	7-16	17-26	27-35
Psychological well-being	6	6-14	15-22	23-30
Social relationship	3	3-7	8-11	12-15
Satisfaction with the environment	8	8-18	19-29	30-40
Overall	26*	26-60	61-95	96-130

* Another 2 global subscales for overall QOL and general health condition are included in overall scores.

3. To determine the home evaluation Observation tool was used the home hazard questionnaire [15] with room assessment technique to evaluate the features of hazard. Seven categories of home evaluation were shown in Table II.

TABLE II
HOME HAZARD EVALUATION ITEMS

Items	Home areas
1	Entering the home
2	Getting around
3	Kitchen
4	Bathroom
5	Bedroom
6	Living / Dining room
7	Laundry

Each item includes a subscale of hazard assessment (figure I).

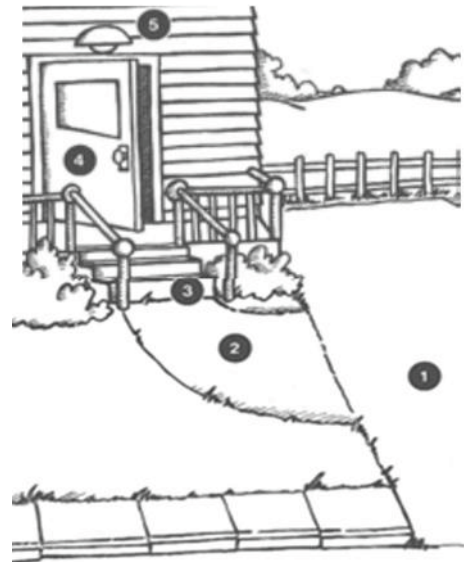


Figure I Subscale of the entering the home item [15].
Entering the home item contains 5 topics;

1. Adequate space to enter/exit car?
2. Clear level walkway?
3. Steps well maintained /railings?
4. Doorway with large threshold?
5. Adequate lighting?

III. RESULT

A. Subject characteristics

Three subjects came from academic staff at the faculty of Associated Medical Sciences who were 55- 80 years old; their characteristics are shown in Table III.

TABLE III
SUBJECT CHARACTERISTICS

Characteristics	Subject 1	Subject 2	Subject 3
1.Age	59 years	65 years	74 years
2.Gender	female	female	male
3.Weight	64 kg	80 kg	48 kg
4.Height	152 CM	164 CM	163 CM
5.Body mass Index	27.70 Overweight	29.74 Obese Class I	18.06 Normal
6.Religion	Buddhism	Buddhism	Buddhism
7.Marital status	Married	Widow	Married
8.Income	70,000 Baht/month	30,000 Baht/month	32,000 Baht/month
9.Health condition	Hypertension	Hypertension	Hypertension

B. Quality of life

The scores of patients with categorized levels of each subscale and overall QOL scores are shown in Table IV.

TABLE IV
QOL SCORES AND LEVELS OF THREE SUBJECTS

Subscales	QOL levels		
	Subject 1	Subject 2	Subject 3
1.Physical domain	Good	Good	Good
2.Psychological domain	Good	Good	Good
3.Social relationship	Good	Good	Average
4. Environment	Good	Good	Average
Overall	Good	Good	Good

C. Home hazard evaluation

The results of home hazard evaluation were shown in Table V according to the home hazard questionnaire [15].The home visit evaluation usually took about 1 hour to complete.

TABLE V
HOME HAZARD EVALUATION

Subscales	Home hazard		
	Subject 1	Subject 2	Subject 3
1.Entering the home			
-Adequate space to enter/exit car?	yes	yes	yes
-Clear level walkway?	yes	yes	no
-Steps well maintained /railings?	yes	yes	yes
-Doorway with large threshold?	yes	yes	yes
- Adequate lighting?	yes	yes	yes
2. Getting Around			
-Hallways free from obstructions?	no	yes	no
-Extended railings?	yes	yes	yes
-Carpet secure?	no	yes	no

YES= NO RISK NO= RISK

Subscales	Home hazard		
	Subject 1	Subject 2	Subject 3
3.Kitchen			
-Appliances easy to access?	yes	yes	no
-Counters with open space to work / sit?	yes	yes	no
-Room to navigate around table?	yes	yes	no
-Storage heights minimize bending?	yes	yes	yes
- Flooring free of trip hazards?	no	no	no
-Adequate ambient and task lighting?	no	yes/no	no
4. Bathroom			
-Ease of access to sink, toilet and tub?	yes/no	yes	yes
-Sturdy grab bars?	no	yes	yes
-Towel rack as grab bar?	no	yes	no
-Accessible storage?	yes	yes	yes
-Space to move around?	yes	yes/no	yes/no
-Adequate lighting? (day and night)	yes	yes	yes
5.Bedroom			
-Ease in entering /exiting bed?	yes	yes	yes
-Items accessible in closet?	yes	yes	yes
-Space to get around / access to bathroom?	yes	yes	yes
-Adequate lighting? (day and night)	yes	yes	yes
6. Living / Dining Room			
-Controls / outlets within easy reach?	yes	yes	yes
-Storage within easy reach?	yes	yes	yes
-How is furniture arranged for use?	yes	yes	yes/no
-Adequate task lighting?	yes/no	yes/no	yes/no
-Room to get around?	yes	yes	no
-Floor clear of clutter?	no	no	no
-Adequate lighting?	no	no	no
7.Laundry			
-Appliances easy to reach / use?	yes	yes	yes
-Storage easily accessible?	yes	yes	yes
-Room to get around free of clutter?	yes	no	no
-Adequate lighting?	no	no	no

YES= NO RISK NO= RISK

Thirty seven features divided into 7 subscales: entering the home, getting around, kitchen, bathroom, bedroom, living/dining room and laundry. All hazards appeared at least once in every area except the bedroom. These results about home hazards are important because the information obtained does not rely on self-report but on direct observation using an assessment tool that has been shown to be reliable.

IV. DISCUSSION

Analysis of the main findings revealed that houses of all subjects had hazards. There are two possible interventions of these data. The academic staff of AMS CMU could have (i) made changes to their home to eliminate hazards, (ii) been living in propose-built accommodation specially designed to meet their needs. However, all 3 homes had one or more hazards, and multiple hazards were found in rooms and areas where they perform complex daily routines (kitchen, bathroom, living/dining room and laundry). This study is one strategy for improving understanding by identifying the home hazards and home evaluation process, and evaluates the home environment by using a diagnostic tool (the home hazard evaluation). Application of the findings to course development will equip students with evaluation skills that enable them to be a practitioner. Instructors of this course should collaborate on course content, assignments, and evaluations to develop a model curriculum that follows an active learning-centered approach to course design.

Hazards; floors or surfaces being slippery, uneven or obstructed, and the absence of appropriate grab or handrails to hang on to were the most prevalent in this study. Both these types of hazards could be direct contributors to falls. There is a need to develop strategies to increase older people's willingness to make changes to improve the safety of their homes. Some relationship between quality of life in 2 subscales (environment and social relationship) and home hazards of subject number 3 was explored: quality of life in subscales environment and social relations in average and high risk of home environment. There is also some evidence that environmental hazards may be particularly important fall risk factors only among frail older people who are at high risk of falling because they have mobility but instability [16]. However, two studies showed that environmental hazards involved falls in healthy ageing older people more than more frail elders [17, 18]. Some aspects of housing seem to be more important to the elderly people themselves. Housing accessibility problems are currently overlooked but are important to future public planning concerning housing for the elderly. This study is useful for the design of a course training in friendly housing environment for older people. This design will be based on the known general problems of their environment associated with their independent living.

Chiang Mai University is a Leading University with Academic Excellence in International Standards, focusing to become a research-oriented institution of higher education and producing graduates with high moral and ethical standards. CMU is committed to our research mission to build bodies of knowledge able to contribute to relieving social problems and develop our society further. Our graduates will be ready to feed back such knowledge to develop the curriculum further and produce future graduates who are responsible citizens and will become the driving force of country's development. CMU is ready to build a culture of research focusing on our personnel and our environment to develop our university to become a center of academic excellence [19]. The growing number of elderly in Thailand will continue to increase the

demand for this area. Age-friendly built environments can benefit individuals through improved health and overall well-being, increase independence and greater social interaction. This study can provide an understanding about home hazards of older people for developing curriculum ideas.

The implications of these findings widen the perspective when striving for barrier-free building standards, to encompass a holistic approach that takes both objective and perceived aspects of housing into account. Home modification and relocation should not be prescribed, but need to be negotiated with older adults to take into account their personal preferences.

This curriculum should be focus more on specific educational objectives for training in professional areas that can be summarized as follows: identify those impairments and functional disorders that often complicate diagnosis and therapy; acquire an understanding how physiologic changes in ageing affect normal laboratory and radiologic values; develop knowledge of drug side-effects and interactions in this population; understand and treat the group of diseases peculiar to the elderly; recognize diseases and injuries that present a different clinical picture in old age; and differentiate and treat common psychosocial problems in the elderly. These educational objectives are further defined using a specific interlinked framework of didactic presentations, journal clubs, case conferences, therapeutic audits, formal rotations, and consultants. Professional careers can benefit from the same features, as well as the increased self-care capabilities of the care recipient. In order to create appropriate dwellings for older adults with dementia, all aspects of the living environment should be addressed in a holistic manner.

V. CONCLUSIONS

The findings of this case study about environmental hazards in the housing of older people are consistent with other studies [20, 21] and suggest a need for further research to create a curriculum. The objective of the curriculum should focus on decreasing hazards in the homes of older people and increasing their quality of life according their physiology changes in later life (old, very old age). Education managers should understand the process of curriculum development and implementation in order to provide effective professional guidance in specific area.

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Using Knowledge Management To Drive Creative Cities in Thailand

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Abstract— Creative city is an urban complex where cultural activities of various sorts are an integral component of the city's economic and social functioning. Such cities tend to be built upon a strong social and cultural infrastructure, to have relatively high concentrations of creative employment, and to be attractive to inward investment because of their well-established cultural facilities. Local people are one's crucial resource. Creativity is replacing location, natural resources and market access as a principal key to urban dynamism. Now Thailand promotes 10 Creative Cities Model to enhance creative economy in Thailand. Each city has different kind of creative product from their cultural and lifestyle. This research aims to study analyze, synthesize, and formulate structural knowledge of Creative City using SECI model (Socialization, Externalization, Combination, Internalization). This paper describes the interplay of explicit and tacit knowledge generated, transferred, and recreated in city, socialization or transfer of tacit knowledge. Knowledge Management (KM) can assist in promoting innovation and creativity; sharpen ideas from concept through reality. This paper presents a model in which to promote continued competitiveness in an increasingly interlinked and interdependent global marketplace. The model distinguishes between a tacit knowledge and an explicit knowledge as well as suggests areas for research within the context of this model.

Keywords — Knowledge Management, Creative City, Thailand

I. INTRODUCTION

In the past 30 years creativity has become a major factor in national development in over 100 countries. Creativity uses culture, knowledge and talent to instigate change and drive innovation. These trends are encapsulated in the term 'creative economy' which brings together creativity as a source of personal well-being and of economic growth. It marks a break with previous economic systems which tended to devalue the individual's personal involvement in their work (Howskins).

Thailand has a long history of culture and creativity in arts, crafts, performance and design. The Government's 9th and 10th five year plans mentioned creativity as well as innovation. The Office of Knowledge Management and Development (OKMD) was established in 2004 and the Thailand Creative and Design Centre (TCDC) was established under OKMD's auspices in the same year.

The conceptual framework for The 11th National Economic and Social Development Plan (2012-2016) said a

creative economy would 'promote economic structural adjustments particularly in production and service sectors for more value-added, thereby creating new business using the hidden potential of Thai society'. This top-down analysis is correct but under previous plans the government seems to have failed to connect its strategic ambitions with what happens at the level of individuals and markets.

Creative Economy pays attention to tacit knowledge. Then, the important mission to create value add to Creative Economy is looking for tacit knowledge and change to explicit knowledge.

Creative Thailand Projects aimed to develop Thailand to a creative industry hub in ASEAN and increases the country's proportion of creative economy value from 12 percent to 20 percent of GDP by the year 2012. The development of Creative Thailand became a model for other developing countries trying to boost the creative economy.

Thai Government pays attention to Creative Economy, such as Ministry of Industries funded Creative Lanna Project for 4 provinces in the upper north of Thailand, Ministry of Cultural will promote 3 cities in Thailand to be the Creative City Network of UNESCO (Phuket: City of Gastronomy, Pattaya: City of Film, and Chiang Mai City of Crafts and Folk Art), and Ministry of Commerce enhances 10 Creative City Prototypes.

Creative City of imagination must identify, nurture, attract and sustain talent of it is able mobilize ideas, talents and creative organizations in order to keep their young and gifted (Landry, 2006).

Creative city is an urban complex where various sorts of cultural activities are integrated into the city's economic and social functions. Such a city is built upon a strong social and culture infrastructure to have relatively high concentrations of creative employment. Moreover, creative cities tend to be attractive to an inward investment due to its well-established culture facilities. In such a city, creativity, rather than location, natural resources and market access, is a principal key to urban dynamism. Thus, this research aims to analyse, synthesize, and formulate structural knowledge of creative cities.

II. CREATIVE ECONOMY IN THAILAND

The National Economy and Social Development Board (NESDB) defines a creative economy as ‘an economic system that mixes cultural assets, local wisdom, and the uniqueness of Thai with proper knowledge and technology in order to produce unique and diverse products and services. In this way, intrinsic economic value will be added. It will create jobs, generate revenue, and boost competitiveness which will enhance the quality of life.’ It defines creative industries as ‘those industries which use *Thai-ness*, culture, heritage, and local wisdom, as well as technology, for economic development.’

The scope of creative economy in Thailand is divided in to 4 groups.

Group 1: Includes the inheritance and culture which is a variety of biodiversity. These include cultural tourism traditional medicine, herb, spa, and food.

Group 2: refers to skilled labor and cultural industry (including arts and culture). This also includes wood, craft, sculpting, ceramic, silver and gold, and jewellery.

Group 3: means creative works and design which cover fashion, architecture, advertising, and software.

Group 4: is the modern media or entertainment and digital content.

The effort to move the country forward with the creative economy was a major change in Thai society. This development model is in line with Thai culture and lifestyle. The model also reflects the great potential of the country to stand on its own feet. Moreover, it is also in line with “Sufficiency Economy” philosophy, initiated and developed by His Majesty the King.

III. KNOWLEDGE MANAGEMENT TOOLS

Knowledge has a high level of marginal utility, in that the more it is used the more it gains in value. It gains if it is used, shared and diffused. Easy, cheap access to other people’s ideas in a sector is therefore a major contributor to sector growth. Thailand’s knowledge diffusion has several weaknesses. Researchers are not motivated to share knowledge and do not consider knowledge diffusion as important; companies have limited capacities to absorb new knowledge; the complexity and lack of integration of R&D bodies causes duplication and ambiguity; cooperation between government, private sectors and academics is low (NESDB).

In this paper, using the tools of Knowledge Management as follows;

A. SECI Model

The theory of organizational knowledge creation developed by Nonaka and his colleagues (Nonaka 1994; Nonaka et. al. 1994; Nonaka & Takeuchi 1995; Nonaka et. al. 2000; 2001a) originated in studies of information creation in innovating companies (Nonaka 1988a, 1988b, 1990, 1991b) and appears to have undergone two phases of development. Initially a two dimensional theory of knowledge creation was proposed (Nonaka 1994; Nonaka & Takeuchi 1995). The first, or “epistemological”, dimension is the site of “social

interaction” between tacit and explicit knowledge whereby knowledge is converted from one type to another, and new knowledge created (Nonaka et. al. 1994; Nonaka 1994). Four modes of knowledge conversion were identified (Figure 1): tacit to tacit (Socialization); tacit to explicit (Externalization); explicit to explicit (Combination), and explicit to tacit (Internalization). After internalization the process continues at a new ‘level’, hence the metaphor of a “spiral” of knowledge creation (Nonaka & Takeuchi 1995) often referred to as the SECI model.

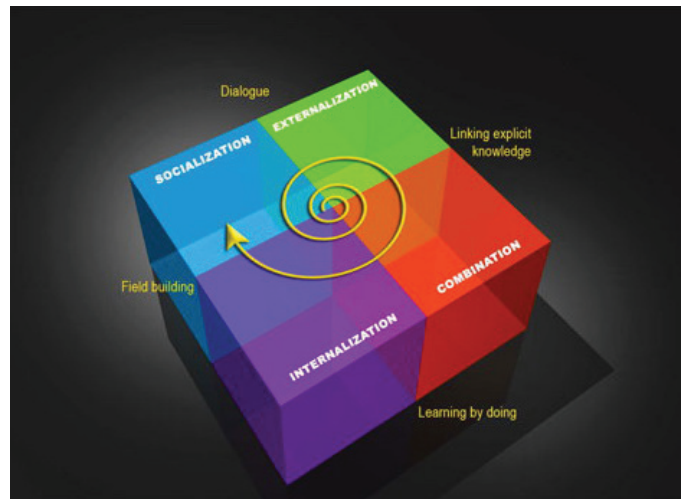


Fig. 1 The SECI Model

(Adapted from Nonaka & Takeuchi 1995)

B. Tacit and Explicit Knowledge

Tacit and explicit types of knowledge are not opposite concepts, rather they are complementary. Explicit knowledge requires tacit knowledge to enable its understanding, interpretation and absorption. Explicit knowledge provides benefits such as the ability for efficient dissemination, its use of asynchronous delivery, and the freedom from collocation. Explicit knowledge is also easier to store and replicate. In an organizational sense, tacit knowledge is difficult to store and replicate, its utility is inversely a product of staff turnover. Where tacit knowledge is confined to the individual, and thus is not appropriately explicated, it is lost when staff leaves their organization (Droege & Hoobler 2003). Explicit knowledge is, on the other hand, more reliable and consistent than the knowledge embedded in a human being. This fact on its own has been motivating creativity throughout history, as artists feel the need to explicate their thoughts so that their creations live on. Explicit knowledge, however, has its drawbacks, as described by Stenmark (2000). These include individual difficulty and resistance, vulnerability of explicit knowledge, and the static nature of it. In addition, the easy replication of explicit knowledge renders it easy to obtain, and thus more difficult to protect from theft. Finally, explicit knowledge is limited by nature, and lacks the integration of the objective

knowledge, the skill and the capabilities that come with it. It also lacks the dynamism of its tacit counterpart.

Knowledge itself has many dimensions, as described by Alavi and Leidner (2001) that knowledge can exist as a collection of data and information, as an object, as a state of mind, as access to information, as a capability, and as a process. In a tacit sense, knowledge resides in the mind of a person. It can be shifted from one form to another dynamically, as is required by the circumstances. From this dynamic form rises the source of creativity and innovation (Mascitelli 2000), which are crucial to the success of projects in AFI. There are major difficulties in the process of explicating knowledge. One of these results from the knowledge owner not being aware or conscious that they possess the knowledge. Another from the difficulty people have in communicating the knowledge in an articulate form (Gertler 2003). Therefore, acquiring tacit knowledge can sometimes only be done via experience, and not via absorption of an explicit form of knowledge. This means some types of knowledge are easy to explicate, some are more difficult, and some are impossible. Degrees of codifiability have been previously described by Johnson and Lundvall (2002) as the extent to which it is possible to transfer the knowledge in question to a coded form. We suggest a model stating tacit knowledge has an explicability zone, as described in Figure 1.

IV. DESIGN/METHODOLOGY/APPROACH

Using a case study approach, this study employs the SECI model (Socialization, Externalization, Combination, and Internalization) to understand the role of knowledge management in order to support creative cities.

Ten Thai Creative City Prototypes as samples explored in this study, whose creative products derived from their cultures and lifestyle are different.

A. 10 Thai Creative City Prototypes

Department of Intellectual Property (DIP), Ministry of Commerce implemented Creative City Prototypes and selected “10 Thai Creative Economy Prototype Cities in 2011”.

Different regions have different needs. The northern region’s ethnic diversity means the main activities are tourism, food, and art/craft, particularly by small and medium-sized enterprises. In the upper northern region (Chiang Mai, Chiang Rai, Mae Hongson, Lampang and Lamphun), art/craft, tourism, and software (science and technology) are potentially dominant. In the north-east region, culture, performing art/music and software are the main industries. In the south, several industries have potential: historical and cultural sites (tourism); festivals, ritual and lifestyle (cultural); food; arts and crafts; local knowledge; performing arts and music; and local costume. The structure of each creative cities has different kind of creative idea and product from their cultural and lifestyle. Ten cities recognized as a creative city prototype received more support and funding from the Ministry of Commerce.

Criteria to select the Creative City Prototypes are as follows;

- Potential of intellectual capital as a factor in developing the creative economy,
- Potential of the city as Creative Economy,
- Management and planning for sustainable development, and
- Participation of those involved as the driving force to transfer of knowledge in the city, especially the academic institute.

Selected 10 prototypes for development as Creative Cities are as in Table 1;

TABLE I
10 CREATIVE CITIES OF THAILAND

<i>Cities</i>	<i>Creative Of</i>
Chainat	Rice Seed City (Tanang-Lea Chai)
Chiang Rai	Development City (Doi Tung)
Chiang Mai	Creative Craft City
Nan	Alive Old City
Petchburi	Sweet City
Maha Sarakham	Learning City towards Community Development
Yala	Bird City
Lopburi	Innovation Renewable Energy
Lam Pang	Ceramic City
Ang Thong	Eakaraj: Community of Drum

Sources: Department of Intellectual Property, Ministry of Commerce, 2011.

B. Methodology

This is a conceptual paper and collected data from documents and observed in the 10 Creative City Prototype seminars that organized by Department of Intellectual Property in July 2011.

From the study found that most of creative city prototypes have not good management on their knowledge and information. They don’t know how to transfer the knowledge from important wisdom to explicit knowledge. Using Knowledge Management (KM) will help to capture knowledge from tacit knowledge to explicit knowledge.

SECI model shows as tacit knowledge is the source of new knowledge. New tacit knowledge is also generated by internalization, and if reading and writing are both instrumental in tacit knowledge formation, and then knowledge creation might also begin with the creative synthesis of explicit knowledge (“combination”). Externalization could form a starting point since all required some source activities, and thus associated tacit knowledge, already exists.

V. ROLE OF UNIVERSITY IN CREATIVE CITY

Since creative city becomes the trend of city development in the word and important regenerating the city. The provinces and cities need many creative graduates to support and to drive local industries. Then, famous university play an important role in attracting the creative class and contributes

much to the city economy prosperity and growth. They plan to teach and to research about creative economy and other related creative.

As Chiang Mai case, the Chiang Mai Creative City aims to put in place the people, connections, marketing and infrastructure to develop and promote Chiang Mai as Cultural Creative City in Crafts and Folk Art. Its initial focus is on cultural. It is collaboration between universities, private sector companies and associations and government agencies. Chiang Mai University established to assist the existing sectors, especially tourism and handicraft industries. Students from Chiang Mai University have been developing their skills in marketing online, or e-commerce.

The infrastructure of Chiang Mai allows graduated and the new generation to do business as entrepreneurs working with investors and international traders. There are currently some mega-projects in the province that offer opportunities for high-technology entrepreneurs, designers, and other creative people.

VI. CONCLUSIONS

This paper found the interplays between explicit and tacit knowledge generated, transferred, and recreated in the cities as well as those of socialization or transfer of tacit knowledge. Knowledge management was found to be able to assist a promotion of innovation and creativity by sharpening conceptual ideas to the real practices. People are most important in creative city elements and university can play important role as University Social Responsibility (USR) by supporting graduated students and knowledge to drive Creative Cities in Thailand.

This paper originally applies the model to promote continued competitiveness in an increasingly interlinked and interdependent global marketplace. Moreover, the model offers the values in which knowledge are distinguished between those of tacit and explicit one. This paper also suggests future research arenas on knowledge management and creative cities.

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USR – A Pedagogy Dilemma in Asia

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Abstract

To effect social responsibility measures requires an understanding of what the social needs are and how the responsibilities are to be discharged. In academia, these are not the only factors that need to be considered. Given the functions of a university, namely teaching, research and community service, social responsibility must exist in each of these three functions. Community service appears to be directly related to social responsibility. Research again could be angled to explore and honor the society's needs. It is teaching that poses a challenge that increasingly appears to be critical not only in terms of social responsibility but even to ensure the survival of pedagogy itself. These have been brought about to a large extent by the rapid and pervasive development of technology with its multiplying factors that indelibly pushed education generally and higher education in particular to a new and unknown boundary. USR therefore is intertwined with the required improvements in pedagogy. This paper discusses pedagogy management in universities in Asia generally and shows why current pedagogy is a dilemma for both teachers and students. If these are not addressed urgently, USR cannot happen.

Introduction

The globalization of communities around the world invites conscious standardization in many areas. At the same time the ready infusion and adoption of technology globally had given rise to a new generation who are not only technology-savvy but having characteristics and abilities which are different from those of previous generations (Innovate, 2007; Linden, 2009; Cheng, 2001, Barnes et al, 2007, Idrus, 2004, Perlmutter, 2011).

As a result it is logical to expect that their learning is different and their expectations are also different from those of previous generations. Idrus (2011) showed that there are 12 distinct characteristics of the network generation (net-gen) in North America. Surveys in three countries in Southeast Asia indicated that only five of the 12 characteristics are matched by the Southeast Asian net-gen thus indicating variations between net-gens in North America and in Southeast Asia. As a result the measures taken and being implemented in North America to align the teaching methodology and the students' characteristics may not be totally appropriate for implementation in Southeast Asia at the moment. However, looking at the effectiveness of higher education around the world it would seem inevitable that Southeast and other parts of Asia will need to change its education policy if they wish to achieve the sorts of educational effectiveness that the developed countries have to date.

Research is currently on-going on the possible reasons for these differences. It is somewhat facilitated by the fact that differences between the results of survey in the three Southeast Asian countries is statistically insignificant.

The pedagogy dilemma

A seven-year observations in Southeast Asia show that *rote learning* is prevalent. Analyses (Idrus&Koh, 2007, Idrus et al, 2007) pointed to the efficacy of a more empowered learning, whether called *student-centered* or *transformative* learning, which is essentially the learning mode in developed countries. In a nutshell, rote learning by definition is learning through repetitions without understanding, at a time when advances in technology and consequent pedagogy are rapid. To be left behind in this case means being left behind in the acquisition and infusion of knowledge in the community. This has direct impacts on the USR for one aspect of USR must be the service to the community in the area of knowledge. This infusion is best done through changes in the way students learn and teachers/lecturers teach. Rote Learning is antithesis to self- or empowered-learning which is regrettably too slowly being recognized in Asia (Cheng, 2001; Idrus, 2004). Hence the dilemma.

The question now is how should HEIs strategize in order to resolve this grave dilemma.

The Table below shows the results of comparing the 12 identified characteristics of the net-gens in North

America and in Southeast Asia (Idrus, 2010). Owing to the lack of space in this paper, details of method

TABLE 1 – COMPARATIVE ANALYSIS OF NORTH AMERICAN AND SOUTHEAST ASIAN NET-GENS

NO.	NET GEN CHARACTERISTICS	NTH AMER	M/I/P
1	They have a great facility for technology and an eagerness for change	√	√
2	They assume that information is to be shared, not hoarded	√	√
3	They have a lack of patience with bureaucracy	√	?
4	They have a passion for service, and a desire to make a (big) difference	√	?
5	They are multi-skilled and able to do up to four different things at the same time	√	×
6	They tend to teamwork, prefer experiential activities and use technology	√	√
7	They prefer to be involved in creating rather than being passive recipients	√	×
8	Students coming to college expect a 'transformative education'	√	×
9	They are ready for multimedia learning to be delivered on a flexible learning schedule, one that is not tied to a set time and place	√	×
10	They would want faculty members to use information technology to communicate knowledge better	√	?
11	They preferred instructors to make moderate use of information technology	√	√
12	Social networking is the basis of net gens characteristics – Facebook is used by students extensively and is beginning to be used by faculty members	√	√

M/I/P = Malaysia/Indonesia/Philippines

and correlations between the Southeast Asian universities will be given at the conference presentation. Suffices to say here that the correlations between the four Southeast Asian universities results are between 0.951 and 0.998, which is exceedingly high, while between them and the North Americans lie within 0.27 and 0.58 with F-Test results lying between 0.12 and 0.35. F-Test results indicate the probability that the two series of data are significantly similar. The figures above clearly show that the probability in this case is very low indeed.

Similarities between North Americans and Southeast Asians are only found in five out of 12 identified characteristics, i.e. in about 42% of the identified characteristics, with some “?” in three.

Brief Analysis

Table 1 shows that similarities between the North Americans and Southeast Asians are in terms of technology use, sharing information, teamwork, moderate use of technology in class and in social networking. While significant differences are in the area of multiskilling, creating, the objective of attending university and e-learning. Uncertainties are

in the area of treating bureaucracy, passion for service and knowledge communication.

Preliminary analysis on the above seems to group them into technology use, pedagogy preference and impacts respectively. The first group is dependent on the availability of the hardware. Given that technology dissemination and dissipation is rapid and deep globally, differences in the characteristics of the two net-gens cannot be expected to be significant and hence the similarities.

Pedagogy preference on the other hand is complex. This involves the deep-seated enculturation of the education system from Kindergarten to university level. It affects the teachers, the lecturers, the professors and of course the students. Changes in this would not only take a long time, even generations, to achieve but also force people to change their beliefs, in this case on the efficacy of the education system that had brought them good in the past.

The third group involving passion for service and knowledge communication is determined to a large extent by the community standards and ability to choose. If the choice is not available for example,

service standards will not be able to be upgraded. By the same token, if the community does not demand service quality, then it will also never be realized. This reflects the community's lack of understanding of quality in general. Some even think that quality increases the price of the goods. Like the first group this one is also much easier to address than the second group.

How the pedagogy dilemma contributes to USR shortfalls

A major problem with the education system in Southeast Asia at least if not in the whole of Asia is that students learn by rote, defined as learning by repetition with little or no understanding. Teachers and lecturers were trained by rote as well before they became teachers and lecturers. As they say, *old habits die hard* and in education system this adage applies aptly in Asia. There are cases where learning by repetition appears to have proven to be good. But conditions, environments and situations changed, especially with the proliferation of the computer and new technology (Idrus, 2004) which had changed a lot of other things impacting on our life.

In developed countries it would seem that the community system encouraged by freedom of speech and the like is able to influence education in order to ensure its appropriateness for the ever evolving world. Free range discussions led to various Education Reforms which seem to be happening regularly in the developed world.

Such inertia had also made it difficult for universities to improve and change their pedagogy, ending up therefore in their failure to help the community achieve comparable education level as in the developed countries. Hence contributing to the USR shortfalls.

In turn, such failure prevents graduates to be self-initiated, to find knowledge and practices on their own to upgrade themselves amidst the rapid technological advancements. Inability to do so could easily doom the graduates in their career for no career is not affected by the technological changes. This could easily be blamed on universities failure to offer the appropriate pedagogy. In the end, whole societies will be victimized.

Some promising efforts that in the end helped change the pedagogy

Equipped with the information obtained and derived from research investigations, the author initiated changes in pedagogy at two universities in Malaysia. For confidential reasons the names of the universities cannot be revealed at this stage.

a. Changing pedagogy through implementing "Transformative Learning"

Transformative Learning is a term coined by Harvey (2002) to alert people of the need to enhance students' understanding in their learning. Rote learning has to be changed to one that espouses *understanding* so that students do not only regurgitate what they had consumed educationally, but they go one step deeper by knowing and understanding what they had learned. In this way they therefore do not only use their memory but their other intellectual ability to internalize what they consumed educationally. This has a more lasting effect on the students than simply memorizing.

Coupled with a second dimension of *re-conceptualizing* juxtaposed on the first dimension of moving towards *understanding* indeed completes the move towards transforming education (Idrus, 2004). Figure 1 shows this diagrammatically.

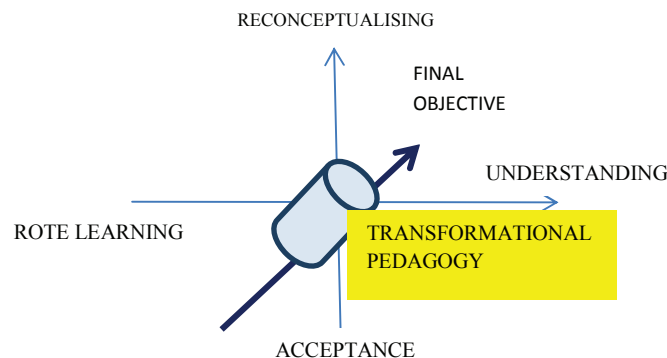


Fig. 1 Diagrammatical representation of *transformative Learning*

The question remains as to what this Transformation Pedagogy is. In this case the roles of the teachers/lecturers will need to be redefined (Idrus and Koh, 2007) and the method of teaching changed. The Malaysian Qualifications Framework (MQA, 2006) in fact provides some avenues through its Code of Practice for Program Accreditation, in which a variety of learning methods are supposed to be used rather than just one. This requirement eases the change somewhat.

In essence, the teachers/lecturers should stop spoon-feeding the students, modify their teaching method to boost both understanding and reconceptualization and in the process these should be amply manifested in the way exam/test questions are worded. Exam questions should be written so that they test knowledge and not memory. This in turn means a much broader and open answers from students and to some extent requires open-ended marking scheme. This could be seen by teachers/lecturers as being too cumbersome to do and hence if there is any change at all it will be implemented extremely slowly.

b. Changing pedagogy through students' empowerment

Observations showed that there are two types of caring, one that appears to be caring because in this case the teachers/lecturers basically hand-hold the students even to the extent of paralysis, and the other seemingly harsh but in the long term builds the students' self-worth. In the latter students will be able to seek appropriate resources to solve problems on their own while the former will forever doom the students to a life of dependency, at the university on the teachers/lecturers and when they go out to work, on their bosses.

The case in point here is the teaching of a core subject in Engineering to meet the Washington Accord's requirements. Due to the large number of students and the lack of space for big numbers at the university, the class was divided into two. An agreement was reached between the two lecturers concerned that one will teach the *normal* way, i.e. currently existing method of

lectures and students listen, while the other will teach using students' empowerment.

In the latter, the lecturer acted as a *learning manager*, with students grouping themselves into groups of 5 or 6. A schedule for the 14 weeks course was uploaded on the university's learning system accessible by students in both classes. The class was scheduled as a 2-hour and 1-hour classes. During the 2-hour class a group of students would do a presentation in front of the class, another group would be preparing themselves to *dispute* whatever claims made by the first group while a third group was given the task of evaluating both the presenter and the disputant groups.

As part of the empowering mechanism, the lecturer restrained himself from hand-holding the students. Each time students asked for guidance on how to present, or dispute or evaluate, the lecturer would respond by asking them to discuss amongst themselves, come out with the solution and then and only then would the lecturer comment. It was found that the *evaluation panel* had their tasks cut out, because the lecturer also refused to give these groups criteria for evaluation. They were told to come up with the criteria and their justification to get any marks.

Midway through the semester a survey was carried out on the efficacy of the teaching method. The survey instrument consists of 15 questions and the results of almost 60% responses are that they realized that the teaching method used is different from what they have been exposed to; that there is predilection towards the norm but by the same token they prefer the empowered learning; they recognized the power of understanding rather than memorizing; that the teaching method had significantly improved their soft skills in team leadership, team work, research, reading, communication, debating although on average they did not think that they have improved their writing skills.

Clearly, empowering students will produce graduates who are useful to society, while teacher/boss dependent graduates will not. Regrettably this is what is observed normally in Southeast Asia and Asia in

general when *Rote Learning* continues and reconceptualization not practiced.

The above changes are still on a small scale and had not gained recognition as yet university-wide. This is expected as the teachers/lecturers appear to not want to lose the privilege of easier marking schemes nor the risks of lower students' assessments of them as students are no longer being spoon-fed nor hand-held.

Conclusion

If Southeast Asian countries wish to see their universities and graduates to be acceptable by the global community, fundamental changes to the teaching and learning methods need to be significantly introduced. Rote Learning has to be replaced by methods that espouse understanding and humble acceptance be replaced by the ability to reconceptualize. But these are very difficult to change given that interested parties such as the teachers/lecturers and parents (especially of students in private universities) are already comfortable with the current system.

A large part of USR must be the graduating of students who will be useful to the community in general and in their place of work in particular, but when the university is unable to change the teaching/learning methodology to suit then it has failed to deliver its USR. Such dilemma requires persistence and better strategic planning by top university's officials.

A glimmer of hope is however on the horizon with the successes reported earlier in terms of *Transformative Learning and Empowered Learning*.

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Collective Efficacy Amongst Secondary School Teachers in Kota Belud, Sabah

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ABSTRACT

The purpose of the study was to determine the pattern of collective efficacy among teachers, based on their demography, namely post of teaching, teaching experience and teaching option with collective efficacy. Using the purposive sampling, a group of 171 respondents was selected from five secondary schools in the district of Kota Belud in Sabah. Collective Efficacy Scale (CES) 12 items by Goddard was instrumentalised for data collection, which consist of two dimensions of teachers' collective perception, namely task analysis and general competency. The Alpha Cronbach was .94. Pearson's Correlation and One-Way ANOVA were used to test the research hypotheses. Frequency, percentage and mean used as to describe data. The result showed that there was no significant relationship between post of teaching and collective efficacy among secondary school teachers. Meanwhile, teachers with more than 23 years of teaching experience were more efficacious compare to those with less experience in teaching. A similar finding showed as well that pure science teachers were significantly different in collective efficacy compared to non-pure science teachers. The implications of the research findings were meant to be discussed.

Keywords- Demography, post of teaching, teaching option, Head of Department, Head of Committee, excellent teacher, Language, Social Science, Applied Science, Pure Science, teaching experience, collective efficacy, secondary school teacher, Kota Belud, Sabah.

Introduction

Teaching career started on the first step out of training colleges or universities and face the real world in teaching profession which is relatively different in terms of theories learnt and practical in actual classroom (Marso, Pigge, 1987). This professional journey, acquiring the beginner teachers to explore teachers' development in many perspectives as in orientation, socialization, training and development as stated by Omar, K.Wai Bing, (2005). These opportunities were to established teachers' proficiency by attending courses organized by Ministry of Education. The ongoing professional development is a measurement tools to ensure teachers' excellence and in return teachers will experience the upgrading scale from an ordinary teacher

become head of committee, head of department and as well as excellent teacher in their perspective schools.

Previous research revealed teachers whom feel unprepared facing with difficulties in teaching and learning used to label themselves as inexperienced and lacking pedagogical training (Buell et al. 1999; Cains & Brown 1996; Martin et al. 1999). Teaching experiences and teaching options are two separated values in teaching profession. Teaching experience is connected to empirical knowledge meanwhile teachers training is theoretical knowledge (Khalid, Zurida, Shuki & Ahmad, 2009). Goodwin (1999) stated teachers' option and teaching experience were the essential basic qualifications in effective teaching. Whilst, teaching experience is knowledge emerged from interaction exists in workplace.

The main purpose of this paper is therefore to shed light on the pattern of collective efficacy among secondary school teachers in Kota Belud district, based on teachers' demography, in post of teaching, teaching option and teaching experience.

Research Purpose and Hypothesis

This study was to determine the influence of post in teaching, teaching experience and teaching option on collective efficacy. The research purpose was depicted in two main hypothesizes, that teachers' demography has no relationship with collective efficacy, and teachers' demography has no influence upon collective efficacy.

Collective Efficacy

In the Social Cognitive Theory, self-efficacy forms the basis of the concept of 'Reciprocal Determinism'. Through this concept, the experience formed as a results of interaction between individual (as agent) and with personal constructs, behavior and environment. Previous meta-analysis studies confirmed the influence of self-efficacy constructs as a base in the context of human adaptation and change (Fernandez-Ballesteros et al. 2002). This theory expanded the concept of a causal role of self-efficacy to practice functions through the sharing of collective efficacy. Individuals gaining knowledge, competencies and resources, supporting each other, forming a coalition and work together to solve problems and improve their lives. Goddard and Goddard (2001) hold the belief that efficacy is essential constructs of individuals and organizational behavior towards changes.

Goddard and Hoy (2002) stated the mastery experience is the dominant factor contributing the formation of

collective efficacy. Researchers agree to claim individuals whom undergone mastery experience in any condition, would set-up self-confidence and belief which formed as collective efficacy at organizational level. Goddard and Hoy (2000) define collective teacher efficacy is the construct to measure teachers perception on their capabilities and collective effort to influence students' achievement. Collective efficacy refers to beliefs shared by a group of organizations in combining the ability to plan and implement actions needed to produce a performance (Bandura, 1997). According to Bandura (2000), collective efficacy is not the sum of the individuals in the group, but it is a characteristic that exists at the group level. Therefore, although a group has members who is knowledgeable and skilled but group achievement is not as expected. This occurs because the members groups cannot work as a unit (Bandura, 2000). This shows that groups' effort not only depend on the skills and knowledge each member groups, but depends on the interaction and interconnection between others.

According to Bandura (2000), collective efficacy may influence members of the selection of the types of tasks to be achieved collectively and not easily deterred in any situation. Efficacy at the organizational level, can be measured using efficacy of two methods, focuses the confidence of individuals with knowledge, ability and skills possessed to achieve goals. The second method focuses on the confidence or beliefs that are shared within the group to achieve a goal. Collective efficacy is formed from four main sources – the mastery experience, vicarious experience, social persuasion and affective condition (Bandura, 1986,1997).

Professional Qualification and Collective Efficacy

Social Cognitive Theory to explain the level of confidence in the ability of individuals to perform certain tasks. Through this theory, the concept of '*Reciprocal Determinism*', the cycle of interaction between cognitive, and behavioral environment generating the required based on prior knowledge they posses.

According to Welch (1995) success achieved could improve efficacy. Conversely, failure can decrease teachers' efficacy due to negative judgments in their teaching ability. Research done by Tschannen-Moran and Hoy (2000) showed the higher efficacy of experienced teachers (more than five years experience) compared to novice teachers (less than five years experience). Looney (2003), stated teaching experiences can influence teachers' efficacy and there were a weak significant relationship between the experience with teachers' efficacy.

Tschannen-Moran and Hoy (2002) also pointed out that highly efficacy teachers to have the opportunities through daily teaching duties for a prolonged period compared with novice teachers to develop skills in classroom management and teaching strategies. Experience is one of the personal characteristics used to distinguish teachers' expertise (Cheung, 2008). According to Soodak and Podell (1996), there was an existence of the contribution of teaching experience on teachers' teaching efficacy. Nevertheless teacher efficacy

study done by Woolfolk Hoy (1993), showed that teaching experience did not influence teachers' efficacy statistically.

Previous studies concerning collective efficacy was highly concentrated on the implications, as well as related to trainee and novice teachers. However, research done to revealed differences in patterns of teachers' collective efficacy based on personal factors still need to be done (Giallo & Little 2003; Goddard 2002). Despite several studies connected to teacher efficacy to the teaching experience, but the differences obtained findings demands more research to be conducted. In addition, studies that related to the teachers' option are relatively unexplored, particularly in the context of education in Malaysia, as a well as studies conducted by Rahmah, Mohd Majid, Habibah & Foo (2006). Theoretically, each public higher institution that conduct education programs in Malaysia are under the purview of the Ministry of Higher Education to ensure quality programs, although teachers' effectiveness in teaching still open to discussion (Ingersoll, 2007).

Methodology

The approach used in this study was a quantitative research method using questionnaires. The questionnaire consists of two parts. Part A was designed to get basic information about respondents. Part B consists of 12 items of Collective Efficacy Scale (CES) instrument adapted from Goddard (2002). The sample size of this study was 171 and the populations were all trained secondary school teachers excluded principals, senior assistants and counselor. Determination of the relationship between variables is referring to the correlation index by Borg & Gall (1983) of .05 significant level.

Table 1: Pearson Index Correlation

INDEX	DESCRIPTION
0.70 or more	Very Strong Correlation
0.50 to 0.69	Strong Correlation
0.30 to 0.49	Medium Correlation
0.10 to 0.29	Low Correlation
0.01 to 0.09	Correlation that can be ignored

Sources: Adapted from Borg and Gall (1983)

Data collected using Collective Efficacy Scale (CES) instrument with twelve items developed by Goddard (2002). Items in CES measured using six-point attitude scale. Lowest scale is '1' which means 'Strongly Disagree' and the highest scale is '6' which refers to 'Strongly Agree'. Nunally (1978), considers that the scale is often used and malleable, credibility is high and has managed to measure the characteristics of effective individual (Sulaiman, 1996).

CES instrument was used in Adam & Forsyth (2006), Eggar (2006), Caprara (et al. 2003) Knolbloch and Whittington (2002) research. In terms of reliability, CES has gone through rigorous experiments involving a large sample size through studies conducted by Goddard (2002b). Goddard purified the instrument 'Collective Teacher Efficacy' (CTE) which was built in 2000 (Goddard, 2000a). As a result Goddard introducing 'Collective Efficacy Scale' (CES) which

is more accurate and simple balancing items in the general competency and task analysis.

Goddard's findings (2002b), showed the alpha reliability for the twelve items was .94. Khalid (2009), found the alpha reliability of twelve items collective efficacy was .75 ; while the alpha reliability in general competency was .77 and task analysis at .81. Previous findings showed the measurement of twelve items of collective efficacy which have been purified is the best predictor than school demography. Pilot study conducted on 30 respondents in daily secondary school in Kota Belud district which has same unit criteria and actual respondents. The pilot study was to determine the level of reliability in Malaysia's context which was adapted and localize in terms of geography, culture, values and socio-economy.

CES instrument consists of six items using a negative scale and to be converted to a positive scale before doing the test reliability. Results of the analysis found that collective teacher efficacy constructs are at .767. Values obtained for each dimensions, general competency is at the alpha .702, .509

value for the task analysis. Results of reliability analysis for the two instruments used in this research showed the appropriate alpha level to use (Nunnally, 1967, 1978, Pallant, 2005).

Respondents were secondary schools teachers in Kota Belud district. The number of male teachers was 69 (40.4%) meanwhile female teachers were 102 (59.6%). Teachers' option was 66 (38.6%) in Language, Social Science was 171 (41.5%), Applied Science was 3 (1.8%) and Pure Science was 28 (16.4%).

Respondents based on their teaching experience were mostly comes from length between 9-13 years of experience 56 (32.7%), 14-18 years of experience 40 (23.4%), 4-8 years of experience was 28 (16.4%), below 3 years of experience was 21(12.3%), 19-23 years of experience was 19 (11.1%), and over 23 years of experience was 7 (4.1%).

Whereas in teachers position, mostly were an-ordinary teachers 115 (67.3%), head of committee was 42 (24.6%), head of department was 11 (6.4%), and excellent teacher was 2 (1.2%).

Table 2: Respondents' demography

		<i>Frequency</i>	<i>Percent</i>	<i>Mean</i>	<i>SE</i>	<i>SD</i>
Gender	Male	69	40.4			
	Female	102	59.6			
	Total	171	100.0			
Teaching option	Language	66	38.6			
	Social science	171	41.5			
	Applied science	3	1.8			
	Pure science	28	16.4			
	Total	168	98.2	1.96	.08	1.04
Teaching experience	<3 year	21	12.3			
	4-8 year	28	16.4			
	9-13 year	56	32.7			
	14-18 year	40	23.4			
	19-23 year	19	11.1			
	>23 year	7	4.1			
	Total	171	100.0	3.17	.10	1.30
Post in teaching	Excellent teacher	2	1.2			
	Head of department	11	6.4			
	Head of committee	42	24.6			
	Teacher	115	67.3			
	Total	170	99.4	3.59	.05	.67

Descriptive analysis in Table 3 showed mean level of general competency was 4.93 (SD=.739), task analysis

was 4.13 (SD=.784) and collective efficacy was 4.54 (SD=.664).

Table 3: Mean Teachers' Collective Efficacy

	<i>Mean</i>	<i>Std. Deviation</i>	<i>N</i>
General competency (gc)	4.9268	.73920	164

Task analysis (ta)	4.1342	.78386	159
Collective efficacy (ce)	4.5369	.66384	158

Results

The relationship between teachers' demography and collective efficacy

Pearson Correlation analysis conducted to determine the level of relationship between post in teaching with teachers' collective efficacy found there was no significant relationship at level $p < .01$ ($r = .05$). Similarly, the relationship between

post in teaching and in general competency dimension ($r = -.003$, $p < .01$); and task analysis dimension $r = .017$ ($p < .01$). Among those three demographic factors, the Pearson's correlation had found that only teaching experience shows significant relationship with general competency individually ($r = .193$, $p < .05$).

Table 4: Relationship between teachers' demography and collective efficacy

		<i>gc</i>	<i>ta</i>	<i>ce</i>
Post in Teaching	Pearson Correlation	-.003	.017	.015
	Sig. (2-tailed)	.969	.829	.854
	N	163	158	157
Teaching Option	Pearson Correlation	.010	-.003	.003
	Sig. (2-tailed)	.899	.972	.966
	N	161	156	155
Teaching Experience	Pearson Correlation	.193*	.094	.150
	Sig. (2-tailed)	.013	.241	.060
	N	164	159	158

The effect of teachers' demography on teachers' collective efficacy

a) Collective efficacy based on post in teaching

Descriptive analysis shows (Table 5) mean level of expert teachers was 5.25 (SD=.59) the highest of two dimensions of

collective efficacy as in general competency and task analysis mean 4.25 (SD=.12). Meanwhile the lowest mean was at the head of panel 4.86 (SD=.71). The mean level of collective efficacy as a whole for the post of excellent teachers recorded the highest mean of 4.75 (SD=.24).

Table 5: Descriptive Analysis of Collective Efficacy Based on Post in Teaching

		<i>N</i>	<i>Mean</i>	<i>Std. Deviation</i>	<i>Std. Error</i>
General Competency	Excellent Teacher	2	5.25	0.59	0.42
	Head of Department	11	4.97	0.70	0.21
	Head of Committee	41	4.86	0.71	0.11
	Teacher	109	4.94	0.76	0.07
	Total	163	4.93	0.74	0.06
Task Analysis	Excellent Teacher	2	4.25	0.12	0.08
	Head of Department	11	4.12	0.53	0.16
	Head of Committee	41	4.08	0.88	0.14
	Teacher	104	4.15	0.78	0.08
	Total	158	4.13	0.78	0.06
Collective Efficacy	Excellent Teacher	2	4.75	0.24	0.17
	Head of Department	11	4.55	0.54	0.16
	Head of Committee	41	4.47	0.73	0.11
	Teacher	103	4.55	0.66	0.06
	Total	157	4.53	0.67	0.05

ANOVA analysis shows in Table 6 found that the post in teaching does not influence on these two separate dimensions of collective efficacy, general competency dimension ($F=.252$

[$df = 3, 162, p = .859$]) and task analysis dimension ($F=.084$ [$df = 3, 157, p = .968$]); and overall collective efficacy ($F=.220$ [$df = .3, 156, p = .882$]).

Table 6: Collective Efficacy Differences Based on Post in Teaching

		<i>Sum of Squares</i>	<i>df</i>	<i>Mean Square</i>	<i>F</i>	<i>Sig.</i>
General Competency (gc)	Between groups	.422	3	.141	.253	.859
	In group	88.639	159	.557		
	Total	89.061	162			
Task Analysis (ta)	Between groups	.158	3	.053	.084	.968
	In group	96.432	154	.626		
	Total	96.590	157			
Collective Efficacy (ce)	Between groups	.297	3	.099	.220	.882
	In group	68.746	153	.449		
	Total	69.042	156			

b) Collective efficacy based on teaching option

Descriptive analysis showed in Table 7, mean level of Pure Science teachers in general competency dimension 5.051 ($SD=.633$) were the highest of two dimensions of collective

efficacy as in general competency and task analysis mean 4.153 ($SD=.697$). Meanwhile the overall mean collective efficacy for Pure Science teachers was 4.597 ($SD=.602$).

Table 7: Descriptive Analysis of Collective Efficacy by Teaching Option

ANOVA analysis in Table 8 shows that teaching option does not influence on the two separate dimensions of collective efficacy, general competency ($F = 1.308$, [$d = 3, 160, p =$

.274]) and task analysis dimensions ($F = .112$, [$df = 3, 155, p = .665$]).

		<i>N</i>	<i>Mean</i>	<i>Std. Deviation</i>	<i>Std. Error</i>
gc	Language	66	4.9798	.71761	.08833
	Social science	66	4.8232	.79576	.09795
	Applied science	3	4.3889	.76980	.44444
	Pure science	26	5.0513	.63381	.12430
	Total	161	4.9161	.74165	.05845
ta	Language	64	4.1406	.77221	.09653
	Social science	65	4.1154	.82439	.10225
	Applied science	3	3.8889	.82215	.47467
	Pure science	24	4.1528	.69664	.14220
	Total	156	4.1271	.77785	.06228
ce	Language	64	4.5560	.63152	.07894
	Social science	64	4.4922	.71897	.08987
	Applied science	3	4.1389	.70874	.40919
	Pure science	24	4.5972	.60226	.12294
	Total	155	4.5280	.66323	.05327

Table 8: Mean Differences of Collective Efficacy by Teaching Option

		<i>Sum of Squares</i>	<i>df</i>	<i>Mean Square</i>	<i>F</i>	<i>Sig.</i>
gc	Between Groups	2.146	3	.715	1.308	.274
	Within Groups	85.861	157	.547		
	Total	88.007	160			
ta	Between Groups	.207	3	.069	.112	.953
	Within Groups	93.577	152	.616		
	Total	93.784	155			
ce	Between Groups	.701	3	.234	.527	.665
	Within Groups	67.039	151	.444		
	Total	67.740	154			

c) **Collective efficacy based on Teaching Experience**
An analysis of collective efficacy by teaching experience in Table 9, showed in general competency dimension, teachers with more than 23 years of teaching experience was at the highest mean 5.278 (SD= .728). Meanwhile in task analysis dimension,

the mean of teachers in between 14-18 years of experience was 4.31 (SD= .803) and mean of collective efficacy showed teachers with more than 23 years of teaching experience recorded the highest mean of 4.72 (SD=.769).

Table 9: Descriptive Analysis of Collective Efficacy by Teaching Experience

		<i>N</i>	<i>Mean</i>	<i>Std. Deviation</i>	<i>Std. Error</i>
gc	<3 years	20	4.7917	.73523	.16440
	4-8 years	27	4.5988	.76132	.14652
	9-13 years	53	4.9780	.73164	.10050
	14-18 years	39	5.0299	.77031	.12335
	19-23 years	19	5.0702	.56469	.12955
	>23 years	6	5.2778	.72776	.29711
	Total	164	4.9268	.73920	.05772
ta	<3 years	19	4.0263	.70331	.16135
	4-8 years	28	3.9464	.80259	.15167
	9-13 years	51	4.1634	.77063	.10791
	14-18 years	38	4.3070	.80308	.13028
	19-23 years	18	4.0741	.83670	.19721
	>23 years	5	4.2000	.84492	.37786
	Total	159	4.1342	.78386	.06216
ce	<3 years	19	4.4298	.62931	.14437
	4-8 years	27	4.2685	.74224	.14284
	9-13 years	51	4.5948	.63575	.08902
	14-18 years	38	4.6689	.64068	.10393
	19-23 years	18	4.5602	.63259	.14910
	>23 years	5	4.7167	.76965	.34420
	Total	158	4.5369	.66384	.05281

ANOVA analysis shows in Table 10 found there was a significant difference in teaching experience by general competency dimension ($F= 1.86$ [$df = 5, 163$, $p = .104$]). While, task analysis dimension significantly does not

influence teaching experience ($F= .80$ [$df = 5, 158$, $p = .551$]). Overall collective efficacy significantly influenced by teaching experience ($F= 1.46$ [$df = 5, 157$, $p = .207$]).

Table 10: Mean Differences of Collective Efficacy by Teaching Experience

		<i>Sum of Squares</i>	<i>df</i>	<i>Mean Square</i>	<i>F</i>	<i>Sig.</i>
gc	Between Groups	4.954	5	.991	1.861	.104
	Within Groups	84.113	158	.532		
	Total	89.066	163			
ta	Between Groups	2.473	5	.495	.800	.551
	Within Groups	94.609	153	.618		
	Total	97.082	158			
ce	Between Groups	3.166	5	.633	1.458	.207
	Within Groups	66.021	152	.434		
	Total	69.187	157			

Discussion

Null hypothesis tested there was no significant relationship between post in teaching with teachers' collective efficacy, results also showed there was also no influence of in post of teaching and teachers' option toward collective efficacy. Previous study by Dewi (2010) and Mohd Syariff (1997) has found there was no significant influence between teachers' position and collective efficacy, whilst in teachers' option, pure science teachers showed the highest level of collective efficacy. Whereas, study conducted by Khalid (2009), had found social science teachers was in the highest level of collective efficacy.

Teaching experience showed there was a significant difference in collective efficacy. The influence in teaching experience upon teachers' collective efficacy revealed teachers with experiences over 23 years were more efficacious in terms of confidence in their ability to promote students' learning. The findings are also broadly consistent with those reported by Khalid (2009); Giallo and Little (2003); Imants and De Brabander (1996); Lin and Tsai (1999); Looney (2003); Penrose, Perry and Ball (2007); Soodak and Podall (1996); Welsh (1995) and Tschannen-Moran and Woolfolk-Hoy (2002). In contrast, findings by Hoy and Woolfolk (1993) showed experience was no significant influence to teachers' collective efficacy.

Research Implication toward Theory

Some suggestions were made in terms of exploring the importance of teachers' collective efficacy in Malaysia's Education System. These studies was focusing specifically on the extent of the influence post in teaching, teaching experience and as well as teaching options with teachers' collective efficacy. The conceptual model in these studies also tested the theory of 'Reciprocal Determinism' by Bandura (1997), claims the interactions between environment with personal elements (cognitive and physiological changes) to produce a particular action or behavior to fit the events encountered. The context has led to the formation of collective efficacy.

Collective efficacy beliefs serve as a mediator that coordinates the shared belief among teachers in secondary schools. Efficacy belief also was the main constructs that dominate the social cognitive theory. A multi-dimension nature of efficacy's construct enables factors to be influenced (Bandura, 1986). Therefore, the levels of efficacy beliefs in general are not consistent in many aspects. Oriented nature of the specific efficacy beliefs make it vary by field, activity and time.

Implication on Research

Purposive sampling used in this research was focused on the population in five secondary schools in Kota Belud district. The main reason for using purposive sampling was because the factors of low academic achievement and lacking facilities in teaching and learning in rural schools.

The use of a relatively small sample size (n=171) was a major factor in this study that distinguishes the findings derived from the findings of previous studies. In addition, number of available sample size is still higher than minimum sample size for the entire population of secondary schools in Kota Belud, amounting 583 teachers.

Therefore, future studies should consider the following factors to ensure the efficacy can be exploited further in strengthening the teaching profession in Malaysia. There is no doubt that the context of teaching experience requires a broader and deeper analysis. Several dimensions in experience teachers have not been studied in relation to efficacy, particularly in the local context. However, researchers who wish to study the efficacy constructs need to expand the dimensions of the factors of 'antecedents' rather than focusing on the context of teachers position, teaching options and teaching experience.

Previous studies in Western countries found factors of antecedent concerning behavior, interaction and motivation were relevant to the efficacy among students. Factors exists in schools are also used as a predictor of efficacy. Factors have been noticed by efficacy's researchers such as teaching experience, environment, emphasis on school rules and goals,

culture and organizational properties were related to teachers' efficacy.

However, research on teacher's efficacy is encouraged not to narrow the criteria unit of analysis to certain categories instead of on teachers itself. Bandura (1997,2000) asserts teachers' personal efficacy is a key pillar of teachers' collective efficacy. Teachers as members of school organizations must compliment and support each other as a team. Therefore, in general teachers' criteria should be used to learn the difference between teachers efficacy belief by certain groups.

Research concerning efficacy contribute indirect knowledge and open up new routes to parties involved to implement the best approaches to improve teachers' efficacy through teachers training programs as well as professional development courses.

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Non-Completion of Degrees in the College of Education Graduate Studies: Causes and Recommended Solutions

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Abstract— The College of Education Graduate Studies (COEGS) of De La Salle University-Dasmaringas (DLSU-D) offers graduate programs to prepare the education professionals to become effective school managers. This is the university's response to the felt needs of the province and the region to help the public and private school teachers maintain quality education.

However, not all who enrolled in the graduate programs were able to finish their degrees within the residency period of 5 years for master's and 7 years for doctorate levels. Through a survey questionnaire, this study investigated the causes for the students' failure to finish their degrees and offered recommendations for the completion of their studies.

The findings revealed that work factors topped the reasons for the non-completion of graduate degrees since the respondents are busy with their work and found difficulty in combining work and studies. This was followed by financial factors since the respondents' budget is not sufficient anymore to continue their studies. From these findings, the COEGS can regularly sponsor seminar-workshops on time management so that the respondents can balance their work and studies. It can also offer scholarship/financial grants/loan programs to help augment the small budget of the graduate students. Through these, the COEGS can improve its student services and would be able to help more students finish their degrees.

Keywords — graduate programs, graduate students, non-completion of degrees, work factors, financial factors

I. INTRODUCTION

In today's competitive world, a college degree is not a guarantee of a stable job or promotion. The challenge to continue studying is high. The need to attain a graduate degree is great. Marcus (<http://www.gradstudies.fsu.edu>), Hill (1985), and Perez (2004) emphasized the importance of obtaining graduate degrees to ensure that professionals are ready to face

the challenges of global competitiveness by discovering and acquiring new knowledge.

Because of this, higher education institutions offer graduate programs across disciplines to help college graduates and professionals to continuously update themselves with the latest in the field and to start engaging in research to add to the pool of human knowledge. De La Salle University-Dasmaringas (DLSU-D) is one of these institutions.

The College of Education Graduate Studies (COEGS) of DLSU-D specifically offers the following programs to hone the skills of the public and the private school teachers and administrators: Master of Arts in Education major in Educational Management, Master of Arts in Education major in Guidance and Counseling, Master of Arts in Education major in Religious and Values Education, Doctor of Philosophy major in Educational Management, Doctor of Philosophy major in School and Community Counseling, and Doctor of Philosophy major in Language Education. Records show that the enrollment statistics of COEGS increased through the years.

However, the COEGS administrators should not only be concerned about the number of students who come in but also the number of students who are able to finish their degrees. It is noted that through the years, there are a number of students who stop their schooling. What is alarming is the fact that most of these students are already in their last phase of studying – that of writing their research paper as a requirement for graduation. It is just one step to earning the degree. Why do these students not able to complete their degrees? What are the reasons for their non-completion? What can the school administrators do to help these students graduate? These were the questions that the researchers answered in this study.

A review of literature reveals that other researchers did similar or related studies. Both Recopuerto (1995) and Lim (1998) investigated the factors affecting the non-completion of graduate degrees of selected respondents. Recopuerto found out that the subject handled was related to the personal, financial and administrative difficulties experienced by the teachers in San Jose, Occidental Mindoro, and that graduate

course enrolled was moderately related to their financial difficulty. Lim, on the other hand, revealed that the following affected the non-completion of graduate degrees of the students enrolled in the graduate school of Tarlac State University: personal factors like thesis writing needs a lot of preparation, too much time is needed, and gathering data for the thesis/research is difficult; factors on workload like too much work assigned by superior, lack of extra time, too much community service, and too busy with job; economic factors like low salary, too many dependents, high cost of living, financial inadequacy, and too expensive thesis writing; health problems like physical or mental defect/handicap acquired, uncontrolled/unexpected pregnancy, mobility to stay late at night, and high blood pressure; family responsibility like being the breadwinner in the family, having small children to take care of, and too much household chores; motivation/aspiration factors like no chance of being promoted, small chance of salary increase, no moral support from the family, lack of determination to finish the degree, promoted already in one's job, and degree is not needed; factors related to place of residence like living far away from the school, change of residence, and lack of regular transportation from house to school; school factors like inadequate number of thesis adviser, conflict between advisers/critic/ panel, little time for individual consultants, thesis adviser is not helpful, adviser not always available, unsympathetic attitude of administrators, and failure of the graduate school professor to sustain interest in the students; and other factors like lack of determination, lack of time to conduct one's research, lack of materials or references, inavailability of books, and poor method of research background. On the other hand, Datu (2000) probed both the motivational and deterrent factors in the pursuit of graduate education of elementary school teachers in Palayan City District, Division of Nueva Ecija. He found out that teachers were moderately motivated to pursue graduate studies but the common factors that motivated them were to grow professionally, to upgrade their competencies in teaching, to increase dedication to teaching, to become more efficient in their chosen field of endeavor, and to improve their attitudes toward their work. They were, however, slightly affected by the following problems in their pursuit of graduate education: amount of salary received was just enough for their family needs, lack of time due to family responsibilities, schooling of dependents, poor prospect of salary increase, and civil service eligibility which gives security even if one does not study. Cervillon, Mercado and Silveo (2011) found out that the reasons of the COSGS students who stopped during the period of studying master's degree are as follows: time management, family problem, financial shortage, conflict of schedule with work. Other factors which were mentioned by the respondents during the conduct of the study are: family commitments, financial shortage, wrong choice of field of study, and no topic for thesis. Lastly, Pareja and Lee (2011) found out that majority of their respondents cited financial strain as reason for not pursuing their graduate studies or taking a leave from school. Workload is another major reason for the respondents' inability to finish their degrees. Graduate

school requirements such as assignments, reports, research papers, and projects become more difficult to comply with because of heavy workload in the various institutions where the respondents work. Personal matters such as health, accident, completion of requirements, and personal problem and priorities were also considered by respondents as reasons for not pursuing their studies.

This study was based on the following legal documents which emphasized the need for education professionals in the Philippines to take graduate education: CHED Memorandum Order (CMO) No. 53, s. 2007 which states that "Graduate education is at the apex of the educational system. In the field of education, graduate studies is one of the more effective means of improving the capacities of education professionals who aim to contribute to the continued improvement of teaching and learning in the classrooms, delivery of student services, and management of educational programs. Graduate education is also one of the most effective means of developing capacities related to doing research that will improve educational theory and practice in the many different aspects of the educational process" and the Code of Ethics for Professional Teachers, based on Republic Act No. 7836 or the Teachers' Professionalization Act, which states that "Every teacher shall participate in the continuing professional education (CPE) program of the Professional Regulation Commission and shall pursue such other studies as will improve his efficiency, enhance the prestige of the profession, and strengthen his competence, virtues, and productivity in order to be nationally and internationally competitive" (Article IV, section 3). Further, "school officials shall encourage and attend to the professional growth of all teachers under them such as recommending them for promotion, giving them due recognition for meritorious performance, and allowing them to participate in conference and training programs" (Article VII, section 3).

The following were the variables used in the study:

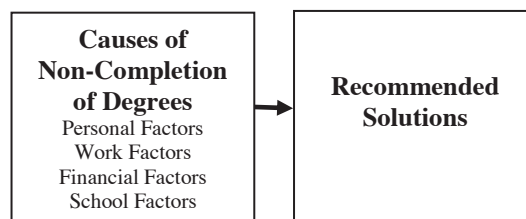


Fig. 1 Variables of the study

This study looked into the causes of the non-completion of degrees in the College of Education Graduate Studies with the end in view of recommending solutions for these problems so as to help these students finish their degrees.

Specifically, the following questions were answered:

1. What are the causes of the non-completion of degrees of the respondents classified into the following: personal, work, financial, and school factors?

2. Are there significant differences in the causes of the non-completion of degrees when the respondents are grouped according to their profile?
3. What possible solutions can be recommended to help these students finish their degrees?

II. METHODOLOGY

This study was a descriptive research that used a validated self-made questionnaire as the main instrument to gather the needed data. There were 835 students in the master list who failed to finish their degrees within the required residency period of 5 years for master's and 7 years for doctorate levels. Using Slovin's formula, 321 were identified as the intended respondents. There were 326 students who were contacted. However, only 141 were able to answer and return the questionnaire while 185 did not return the questionnaire due to various reasons, majority of which is the failure of the intended respondents to return the questionnaire.

Of the 141 respondents, 37 were 32-36 years old, 31 were 37-41 years old, 21 were 27-31 years old, 13 each for ages between 42-46 years old, 47-51 years old, 52-56 years old and 57-above. Majority of the respondents, 108, were females while only 33 were males. Majority also of the respondents, 95, were married while there were 36 who were single and 10 who were widowed. Further, majority of the respondents, 110, were regular/permanent in their jobs while 12 each were probationary and self-employed and 7 were unemployed. In terms of the nature of work, majority of the respondents, 72, were teachers and the rest have various jobs: 17 have other work ranging from human resource personnel (2), pastor (1), psychometrician (1), customer service representative (3), academic service faculty (3), store/branch manager (2), businessman/woman (3), gym manager/owner (1), to discipline officer (1). There were also 14 guidance counselors, 12 office employees, 9 school staff, 7 school administrators, 5 school principals and 5 school owners.

The following statistical tools were used in this study: mean and ranking were used to describe the causes of the non-completion of degrees and ANOVA was used to test the significant differences in the causes of the non-completion of degrees when the respondents were grouped according to their profile.

III. RESULTS AND DISCUSSION

This study yielded the following results:

A. Problem 1:

What are the causes of the non-completion of degrees of the respondents classified into the following: personal, work, financial and school factors?

TABLE I
CAUSES OF THE NON-COMPLETION OF DEGREES

Factors	WM	VI	R
A. Personal			
1. I have no interest to finish my degree and have lost my motivation to continue studying.	2.18	LE	11
2. I have no time to go to school or to do my course requirements.	3.09	ME	4
3. My health affects my studying.	1.79	NA	18
4. I have my parents/small children to take care of in addition to pressing family obligations.	2.61	ME	7
5. I got married and just starting my family.	1.83	LE	17
6. I had a transfer of residence/ My house is far from DLSU-D.	1.68	NA	19
B. Work			
7. I am busy with my job.	3.48	HE	1
8. It's difficult to combine working and studying.	3.17	ME	3
9. My new work assignment prevents me from going to school.	2.41	LE	8
10. I cannot take a leave from my work to do my course requirements.	2.77	ME	5
11. There is no chance of promotion/salary increase even if I finish my degree.	1.89	LE	15
12. My school/office administrator is not concerned about my professional growth.	1.86	LE	16
13. My school/office administrator does not provide assistance and support (financial, workload, scheduling, etc.) to my studying.	2.33	LE	9
C. Financial			
14. My budget is not sufficient anymore to continue studying.	3.35	ME	2
15. I still have loans/outstanding balance from my previous enrollment.	2.11	LE	12
16. I have a financial problem in the family.	2.65	ME	6
17. I have a new business opportunity / attractive work.	1.99	LE	13
18. Graduate Studies is not a top priority considering my financial capabilities.	2.25	LE	10
19. I am planning to go / I went abroad to earn more.	1.90	LE	14
D. School			
20. The graduate school faculty are not helpful and does not provide me with the motivation to continue studying.	1.60	NA	21
21. The curriculum is not functional/and the quality of instruction is not good.	1.52	NA	23
22. DLSU-D facilities are not conducive/not suited for graduate studies.	1.39	NA	25
23. Research and other reference materials are not available in the library.	1.64	NA	20
24. Other graduate students distract me from concentrating in my studies.	1.35	NA	26
25. The graduate school administrator/s is/are not accommodating and encouraging.	1.57	NA	22
26. Graduate studies has not provided me with additional knowledge and leadership skills that I need in my job.	1.41	NA	24
Average Weighted Mean	2.15	LE	

Table 1 presents the different causes of the non-completion of degrees of the COEGS students. Ranked first among the causes is item number 7, *I am busy with my job*, with a mean of 3.48 and is interpreted as *to a high extent*. Ranked second is item number 14, *My budget is not sufficient*

anymore to continue studying, with a mean of 3.35 and is interpreted as *to a moderate extent*. The third is item number 8, *It's difficult to combine working and studying*, with a mean of 3.17 and is interpreted as *to a moderate extent*. The fourth is item number 2, *I have no time to go to school or to do my course requirements*, with a mean of 3.09 and is interpreted as *to a moderate extent*. The fifth in the list is item number 10, *I cannot take a leave from my work to do my course requirements*, with a mean of 2.77 and is interpreted as *to a moderate extent*.

From these first five ranking causes, three items belonged to work factors, one belonged to financial factor and another one to personal factor. These findings are similar with the results of the studies of Lim (1998), Datu (2000), Cervillon, Mercado and Silveo (2011), and Pareja and Lee (2011).

It can also be noted in the table that all items belonging to school factors were rated by the respondents as not applicable and they had the lowest ranks. This means that the conditions in the COEGS did not cause the non-completion of degrees of these students.

B. Problem 2:

Are there significant differences in the causes of the non-completion of degrees when the respondents are grouped according to their profile?

1) *Hypothesis 1*: There are no significant differences in the causes of the non-completion of degrees when the respondents are grouped according to their profile.

TABLE II
ANOVA COMPUTATION FOR PERSONAL FACTORS

Profile	F	P-value	F crit	Ho	Decision
Age	0.45	0.84	2.37	Accept	NS
Gender	0.01	0.91	4.96	Accept	NS
Civil Status	1.53	0.25	3.68	Accept	NS
Employment Status	1.99	0.15	3.10	Accept	NS
Nature of Work	0.85	0.56	2.25	Accept	NS

The results of the ANOVA computation point to the acceptance of the null hypothesis. This means that there are no significant differences in the personal factors as causes of the non-completion of degrees when the respondents are grouped according to their profile.

TABLE III
ANOVA COMPUTATION FOR WORK FACTORS

Profile	F	P-value	F crit	Ho	Decision
Age	2.11	0.07	2.32	Accept	NS
Gender	0.12	0.74	4.75	Accept	NS
Civil Status	0.37	0.69	3.55	Accept	NS
Employment Status	8.56	0.00	3.01	Reject	S
Nature of Work	1.04	0.42	2.21	Accept	NS

Table 3 shows that significant differences only occur in the work factors as causes of the non-completion of degrees

when the respondents are grouped according to employment status while there are no significant differences when the respondents are grouped according to age, gender, civil status, and nature of work.

TABLE IV
ANOVA COMPUTATION FOR FINANCIAL FACTORS

Profile	F	P-value	F crit	Ho	Decision
Age	1.65	0.16	2.37	Accept	NS
Gender	0.00	0.99	4.96	Accept	NS
Civil Status	0.02	0.98	3.68	Accept	NS
Employment Status	1.56	0.23	3.10	Accept	NS
Nature of Work	0.87	0.54	2.25	Accept	NS

Table 4 also shows that the null hypothesis of no significant differences in the financial factors as causes of the non-completion of degrees when the respondents are grouped according to their profile is accepted.

TABLE V
ANOVA COMPUTATION FOR SCHOOL FACTORS

Profile	F	P-value	F crit	Ho	Decision
Age	8.61	0.00	2.32	Reject	S
Gender	0.06	0.81	4.75	Accept	NS
Civil Status	0.13	0.88	3.55	Accept	NS
Employment Status	1.41	0.26	3.01	Accept	NS
Nature of Work	6.17	0.00	2.21	Reject	S

As reflected in Table 5, significant differences occur in the school factors as causes of the non-completion of degrees when the respondents are grouped according to age and nature of work. The rest of the profile did not yield significant differences in the school factors as causes of the respondents' non-completion of degrees.

C. Problem 3:

What possible solutions can be recommended to help these students finish their degrees?

After looking at the causes of the non-completion of degrees of the COEGS students, the following solutions are recommended:

1) *For the work-related factors*: (a) Organize seminars/lectures about balancing work and studies; (b) Send correspondences to the school/office administrator of the graduate students to give them updates on the performance of their teachers/ employees so that they can give the necessary encouragement/incentives to their employees; (c) Conduct seminars/workshops in the graduate students' place of work as part of the community service of the Graduate Studies to motivate the school/office administrator to support the studies of their teachers/employees.

2) *For financial factors*: (a) Facilitate student's referrals or endorsements to funding organizations (government or NGO) for their research and/or other academic needs; (b) Make arrangements with the school/office administrator for

salary deduction scheme/ study now, pay later plan; (c) Offer scholarship/financial grants/loan programs for graduate students.

3) *For personal factors:* (a) Plan motivational activities/fora for the students to enhance their self-esteem and their interest in their studies; (b) Conduct seminars/lectures about stress management, fitness and health; (c) Provide an extension campus that is near the student's residence/place of work or plan for distance education/correspondence courses.

IV. CONCLUSIONS AND RECOMMENDATIONS

The following conclusions are drawn from this study: (a) Work factors are the main causes of the non-completion of degrees of the COEGS students; (b) Generally, there are no significant differences in the causes of the non-completion of degrees of the respondents when they are grouped according to their profile; (c) The COEGS administrators can come up with several solutions to address the causes of the non-completion of degrees of the graduate students.

From the findings and conclusions of the study, the following are hereby recommended: (a) The COEGS administrators should assign mentors as early as the first year of enrollment of the students who will supervise their studies. In this way, problems can be minimized since guidance can be offered as early as possible; (b) The enumerated solutions should be considered for immediate implementation by the COEGS administrators so that they could help their students in addressing their problems that hinder them from finishing their degrees.

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Role Play Method of Teaching for Improving the Students Academic Performance in Banking Laboratory Course

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Abstract - To improve the students' academic performance in considered vital in education institution. This is especially when the teaching method applied is effective. The students in Banking Laboratory course should also be motivated by the lecturer in the process of teaching and learning. This study attempts to reveal the effectiveness of role play, as the method of teaching that involves the students in more practical strategy. This is also intended to see whether their academic performance is also increased when they are treated by using role play in the banking laboratory course. The ample consists of 90 students in banking laboratory course during one semester of the academic year 2010/2011. The data for academic performance was related to the score of the test before and after the role play method was implemented. The analysis is by comparing the means between the means of the test result before the role play and after the role play was implemented. The result shows that the mean of the test after the role play proves to be higher than that of the test before the role play. Therefore, it can be inferred that role play as the method of teaching in banking laboratory course is found effective.

Key words: role play, method of teaching, banking laboratory course, effectiveness.

I. INTRODUCTION

This research relates to measuring the academic performance of students who are taking the Bank Operations Laboratory (BOL) Course. This course is part of the courses taken by students especially when they are majoring in Banking Management. Each semester, this course is always offered to the students of three-year study program (undergraduate) and also and Strata 1 (graduate). Thus, the students who are taking the BOL the college of STIE Perbanas Surabaya is really important to be researched.

The curriculum of Banking Management major has been designed for the students in order that they can get sufficient competence in banking. Besides

that, the curriculum is intended to provide the students with the science not only theory but also practical management, especially in banking and finance. In order to improve the performance and achievement as well as the students' competence STIE Perbanas Surabaya have conducted some efforts in such a way that students who are majoring in Banking Management can be equipped with the qualification and increase their performance. This can be achieved by the process of teaching and learning not only in the theoretical discussion in classical classes but also in the laboratory with some practical knowledge.

From the efforts and the goal as depicted above, it is of high value when the researcher tries to reveal how effective the class of Bol is. Therefore, it is also interesting to see the students' achievement before and after they take the BOL especially after the role play program This role play program is considered crucial because this type of classroom interaction demands the students to be fully involved in the bank operation activities with some process as happening in the real banks. Furthermore, the students academic performance in achieving their competence in the field of banking is expected to increase when they have been processed through BOL course.

So far, there has been no research revealing whether the BOL with the specific course of role play [program is effective or not. In the college of STIE Perbanas Surabaya, such endeavor is really needed for exploring whether the curriculum and the process of teaching and learning that have been designed contribute to the achievement of the students in banking management department. More importantly, Perbanas (the acronym of *Perhimpunan Bank Bank Swasta Nasional* / the association of national Commercial Banks) has become the specific "icon" of the college. This represents the banks and their operations image.

The name of "Perbanas" symbolizes that the science of banking is a compulsory subject for students. Because such an acronym, society or public has the image that the college name is the symbol of the center for the banking study and

practice of banking. For that reason, doing the research for revealing the effectiveness of the curriculum design and the teaching and learning process in this college is needed. Thus, research on improving subject will give a lecture with some input to redesign the learning contract at the Laboratory Course Bank or the curriculum and teaching-learning process. Such effort is also considered good for the college especially when they can find that the education program they designed is proved effective. Therefore, this study attempts to find out whether the role play program implemented in BOL course is really effective. The problems to be stated here are as follows: follows: 1) how effective is the achievement of students on teaching and learning course for Bank Operations Laboratory Course as a compulsory subject in Perbanas Surabaya; 2) What should be done by the college based on the students achievement as the result of the role play program when this program is proved to be effective.

II. THEORETICAL FRAMEWORK

The process of teaching and learning can be said to be able to increase the students' academic performance when it the students have achieved their performance in accordance with the objectives outlined in the Learning Contract, Brown [1]. Therefore, achieving the the goal, we should define the specific objectives so that this objective can be measured over a specific period such as during one semester. When students take courses in one semester, and they have finished achieving their performance, they can be measured and judged whether the process of learning is effective. The period can be during a semester after the students are considered to have achieved their desired performance.

Furthermore, the goals that must also be defined and achieved by students in accordance with the learning contract as it has been specified in the early session. From this, they can plan to learn and therefore participate in the teaching and learning process. This requires not only the design of curriculum but also the class activities. In reaching their respective objective during the process, the students are ultimately intended to achieve during the learning process by using the effective method. Therefore, designing good method of teaching is also important. Role Play as one of teaching methods is also important to be implemented so that the students are expected to achieve their performance as desired in the goal and objectives in the learning contract.

A. Teaching and Learning Measurement

In the education system, teaching-learning process consists not only of the curriculum and

materials, but also a test of the measurement process or class. Hammond [2], states that the test or assessment in education can provide information about the nature of teaching and learning are made available to students in schools or programs. In addition, the test can help departments identify support needs in developing opportunities for learning, reviewing practices such as curriculum, the nature of teaching and learning. Hammond [1] also suggests that teaching practices to be associated with educational attainment of students' learning. Thus, the test can provide timely information to improve program implementation. This is also one of the components in education process beside the method of teaching. In order that the students' achievement can be measured, a test should also be designed. This test is the measurement for revealing the students learning achievement. According to Kupermintz [3], students' test scores can be used for measuring the objective of the learning process as well as the students' achievement to achieve the goal and objectives of the learning process. e of value added contributed by the school for teacher education and student learning. It is said that if teachers are effective then it will lead to effective student learning. Thus, the advantages of student test or measurement in education is really promising for policy makers at the school or college.

B. Learning Contract (Syllabus Design)

It is clear that any subjects to be taught to students are always concerned with the design syllabus or learning contracts. This syllabus contains materials that should be developed in the classroom so as to serve students with materials required in the learning activities. When talking about the development of materials based on the syllabus that has been designed by the instructors or lecturers, we must consider not only students but also other factors, such as methods, teaching aids, and even the psychological atmosphere that relates to classroom situations, Johnson [4]. In addition, the materials, whether commercially developed or teacher-produced, is an important element in the curriculum and often the most tangible aspects and looks it (Richards and Rogers, 1986).

According to Richards and Rogers [5], while the syllabus defines the goals and objectives, content experiences, instructional materials can put flesh on the bones of this specification. Instructional materials can provide detailed specifications about the content, even in the syllabus. As stated, instructional materials can provide guidance to teachers in both the intensity and amount of coverage required by the attention to particular content or pedagogical task. Furthermore, they can help define the objectives of the syllabus, and the role of teachers and students in the learning process. Thus, the best material can be a useful tool and professional development.

C. Evaluation Criteria Materials

In addition to understanding contract design and development of learning materials, criteria for evaluating the material is also important for the teaching and learning process.

Some criteria are as follows: 1) general knowledge or subject matter contained in the materials, 2) views about the nature and acquisition of knowledge; 3) views about the nature of the material for the needs of students; 4) the role of relationship that is implicit in the material; 4) opportunities for the development of cognitive abilities; 5) value values and attitudes inherent in the material.

- 1) General knowledge or subject matter contained in the materials.
- a) the content areas covered in the material including the use of fictional characters and events, public interest (which may reflect a guess about what the author of the material that may interest students. b) Academic course material, focusing on science and life skills associated with banking practices.
- 2) The nature and acquisition of knowledge of banking .
 - a) how materials are organized and presented. b) the type of content and activities, which help to form a view of student knowledge of banking (as an example applied skills in banking practices).
- 3) The nature of the science of banking .a) It can be concluded from the examination of teaching materials. b) They relate to the technical theory and practice of banking that would be obtained by the students. c) They may be explicitly in the foreword of materials.
- 4) The role of relationships implicit in the material.
 - a) The amount of initiative and control that allowed learners to exercise or practice. b) The extent to which they are active participants in the learning process. 5) Opportunities for the development of cognitive abilities. a) the "empty bucket" (emphasis on the accumulation of knowledge banking). b) a more active approach, where students are encouraged to engage in problem-solving activities (challenging their cognitive and affective).
- 6) The values and attitudes inherent in the material.

Several studies with the test as a measurement of the teaching program and its implications has been done by several researchers. Anggraeni [6], research on 3 Diploma students who took a series of management courses banking concentration showed that the process of learning in 3 Diploma Program in Banking Management Concentration has shown effective results. Scriven [7], has conducted research on student evaluations as a measurement to indicate that the evaluation of educational institutions in the educational programs provide information for quality improvement. This increase involves the quality of programs in the majors. It is also supported by research related to

human resource development with Orsburn [8]. This suggests that there is a correlation between the involvement of lecturers teaching and program effectiveness. This engagement is shown by the results of measurements or tests. The test results said the involvement of teachers in the program overview lectures. Other studies on the measurement as an instrument for the improvement of educational programs by Richard et al [9], suggest that there is a correlation between classroom teaching practices and achievement in introductory algebra. It is said that teaching practices should be linked to educational achievement of students learning.

III. RESEARCH METHOD.

The test materials are designed for testing the students after they both joining the classical class and bank operation laboratory with role play. The sample of this research consists of the students who were taking the subject of BOL, in the even semester 2010. The number of students who were used in this study is of 85 students.

First, the treatment is conducted in the BOL course which is designed as follows: (1) classical class and (2) BOL with role play. The former took 30 sessions while the BOL role play 40 sessions. Thus totally, there were 70 sessions. The instructional materials in BOL are adopted from the real work process in the banking industry. All learning material is designed so that the learning process can equip students with banking system and its operation. They are intended to be bankers.

A. Teaching Materials

In general, it can be said that the teaching materials is an important component in the curriculum, and often the most visible component and 'visible' in teaching. While the evaluation of teaching materials can be done outside the classroom (such as the task was greatly facilitated by the instructor and evaluative questions presented in class. For that reason, the data derived of the classroom should be taken into account when improving the teaching-learning process of BOL at Perbanas College. For example: it should also be done in such a way that it becomes more effective in the sense that there is improvement, Burke [10]. Therefore, tests have been designed in accordance with the materials being taught to the students, therefore, it should represent the syllabus and the specification of the materials as described earlier. This is intended that the test specification represents the learning measurement of the students' achievement.

B. Contract of Learning in BOL

In order to see the effectiveness of teaching and learning process, the students should be tested or measured using test items. This is important when considering the construction of test items. It is expected that the test items are designed based on the materials stated in the syllabus used in the classroom sessions during a semester. Here are the materials specified in

Surabaya Perbanas in relation to the learning program of role play in BOL.

First of all, it relates to the learning goal where the contract has a purpose in teaching Role play is expected after the students complete this session within a semester. It consists of the following goal as determined for example, "After the learning process during a semester, students are expected to be ready to work in the banking industry with an adequate view of banking. The goal is then divided into several objectives as follows: 1) to become practitioners in the field of banking administration, 2) to become a practitioner of financial administration in addition to the industrial bank; 3) to become a marketer for bank services and products.

Based on the objectives as above, and then in the course of learning contracts of BOL is carried out by the students in a role play which is designed as follows:

- 1) Front Officer such as: customer service, which handles teller transactions include: savings accounts, depositing cash, payments clearing service, transfers of foreign currency, bank notes, bank drafts, traveler's checks. Practicing the behavior of a Customer Service with Banking etiquette such as customer service, major service, duties, responsibilities customers service, the introduction etiquette and Service Excellence;
- 2) Back Office such as: transfer, bank guarantee, credit, loan, sundries, students are expected to obtain competencies such as understanding and explain the transactions made in the back office that is in the banking industry. Other materials are overseas transactions such as Letter of Credit and Bank Audit. Students act as auditors, so it must have a good understanding of the financial statements of the Bank; such as Understanding Accounting, Banking Accounting, Accounting Process, Understanding Financial Statements, Balance Sheet, and Income Statement. As such, they are expected to actually understand the duty of a banker.

C. BOL in Perbanas College

The Bank Operation Laboratory process is designed as the following. First of all, before the implementation of the role play is done, it is initiated by classical methods, where students receive a series of theories on banking activities. Materials provided include: introduction to the Banking (bank overview), Customer Service, Teller, Giro, Deposits, Clearing, Transfer, Credit Administration, Loan Officer, Credit Cards, Export by using the L / C, Import by using the L / C, Sundries, Accounting and Auditing closed with the

bank. This material is given in order to help students before the students perform role play activity in laboratory bank. After that students are tested by a team of teachers.

Second, the next activity is the activity of Role play. Students must enter the laboratory in a bank laboratory which is designed like a real bank with its real practice. Thus, they play roles such as serving a customer transaction, handling customers' service, savings, deposits, transfers and the like. After the students play a role in the transaction Role Play, then the next stage is the student's test with the same problem when they finished doing the activity in the classical classes. Both in the classical classes and BOL, the students are tested.

Thus, based on values taken from the two tests, the researchers aimed to determine whether the process of teaching and learning in role play in the Laboratory Operations are currently running the Bank have been effective. We say effective if there is an increase in the sense that students, after completing this role play in the bank operation laboratory, they have reached a higher test result than before joining the Bank's Role Play in the laboratory.

IV. FINDINGS AND DISCUSSION

From the total number of the students of 87 students, there were 85 students who finally took the exam or final test. These 85 students were from four classes, Class A, 22 students, Class B 35 students, and Class C 28. The mean score before joining the role play program is 64,17 while the mean score after joining the role play is 78,05. This can be seen in Table 1. Thus, in terms of the effectiveness of the role play class, it can be said that there is an improvement after the students get the process of the role play program.

TABLE 1.
RESULTS OF MEANS SCORE
BEFORE AND AFTER JOINING ROLE PLAY

		Mean	N	Std. Deviation	Std. Error Mean
Pair 1	VAR00001	64,1765	85	6,49024	,70397
	VAR00002	78,0471	85	4,13437	,44844

As it is argued that the teachers and the teaching learning process can be effective when it really changes the students' achievement after the students undergo the process of teaching and learning with the lecturers (Kupermintz (2003). This also implies that the test used is also effective as well. This can be also indicated by the result of this research with the different mean score, in which the students get higher mean score after they get in touch with the role play program. More importantly, the students in this analysis can be said that they can get more benefits from the process of teaching and learning better with the role play program.

In terms of syllabus design which is designed in this Bank Operation Laboratory (BOL), according to Johnson (2022:23), can be generalized effective when it can also change the students' behavior in teaching and learning process. Due to such statement, therefore, this role play lass can also be said to be effective because the change of behavior has already been proved by the different mean score before and after the process of role play program. Thus, this is also an argument that can be asserted for supporting the evidence that role play program is effective.

V. CONCLUSION

It can be generalized that the BOL with the role play is effective for the students in their learning process. This also implies that the materials in the curriculum that have been designed can be said effective in sense that these materials can be reflected in the results of the students learning activity. The materials were designed based on the real world of the bank operation and therefore, it can also be said to be good.

More importantly, the process of teaching or learning using the method or role play can also be conducted for helping the students to acquire their knowledge and practical skill in bank operation. This can be supported by the evidence that there is an increase the students' academic achievement after they joined the role play in BOL. The content validity of the materials can be said in a good validity as the test was designed based on the materials as specified in the curriculum and the syllabus given to the students.

However, this study is considered to have some weaknesses for some reasons. Since the test items have not yet tried out by the lecturers before it was used for testing, it could also be interpreted that such test items still needs improvement. This is intended that the next researchers for further research still need to pay attention to such test instrument.

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The Influence of the Graduate Faculty's Habits of Mind On the Relationship Between Their Core-Self Evaluations and Adult Learning Practices: Implications to Graduate School Teaching

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Abstract. The intricacies of teaching-learning situations in graduate education are complex and unpredictable owing to the dynamics of adult learners pursuing graduate studies. Adult learning literatures suggest that students in graduate schools need teachers who could address the dynamics of classroom uncertainties brought about by the diversity of students' multifaceted roles and at the same time maximize the richness of their life experiences as learning resources. Costa and Kallick (2000) emphasized that when people are confronted with uncertainties, the use of intellectual behavior called *habits of mind* is found to be most effective probable actions to address these challenges; teachers need to possess these intellectual behaviors to be able to empower students to develop mental habits. Based on Marzano's (1997) Model, a scale on critical, creative and self-regulated thinking was used to measure habits of mind. This study aimed to establish a model that would explain the influence of the graduate faculty's habits of mind on their core self-evaluations and adult learning practices. It sampled forty-one graduate school professors from three non-sectarian universities in Northern Philippines. Using Baron and Kenny's (1986) Mediation Model, multiple linear regressions established the degree of interrelationship between and among the variables. Results show that *habits of mind* arbitrate the relationship between how the teachers regard self and their adult learning practices. Based on the findings, the study concludes that habits of mind play a dominant role in the instructional decisions of the graduate school faculty especially in facilitating adult learning. Theoretical and practical implications of the study were drawn for the non-sectarian universities involved in the study.

Keywords: *habits of mind, adult learning, core self-evaluations, graduate school faculty.*

I. INTRODUCTION

In recent years, teaching and learning have re-emerged as key issues in educational research. Many educators believed that this interest is reinforced with the prevailing beliefs that a good teacher makes good students. However, the intricacies of teaching-learning situations, together with the unpredictability of classroom learning environment, often hinder good

teaching (Bustos-Orosa, 2008). In graduate education the intricacies of teaching-learning situations are more complex and unpredictable owing to the nature of adult learners pursuing graduate studies.

Basically, adults give attention to learning activities where they could personally find more profound sense in addressing problems. Knowles's (1980) andragogy explained that adults enter education with the hope of seeking improvement in their ability to cope with life's problems.

It is, therefore, fundamental for the faculty to be aware that graduate classes are conducted differently from the usual pedagogical point of reference. It is crucial for teachers to be conscious that adult learning is "more than just cognitive processing and that it is a multidimensional phenomenon that takes place in various contexts" (Merriam, 2008). Significant patterns in research and theory development differentiate adult education to be more than just individual, cognitive understanding of learning. It was further reported that recent scientific inquiries into adult learning disclose that the mind, body, spirit, emotions, and society are not themselves merely locations of learning. It also happens in the intersections of these components (Merriam, 2008).

In the classroom dynamics uncertainties emerge in the multidimensional intersections and can spawn dilemma for the teacher, restraining good teaching. Costa and Kallick (2000) emphasized that when people are confronted with uncertainties, the most effective probable actions to address such would need the use of certain patterns of intellectual behavior called *habits of mind*. Habits of mind provide a set of behaviors that discipline intellectual processes.

Neo and Cheung (2005) cited Facione, Facione, & Giancarlo (1997) and said that even if a person has the necessary skills or knowledge to act, he or she may not be disposed to do so without the appropriate mind behavior. Without the habits of mind, people may not even use their skills or abilities extensively. Habits of mind represent dearth

of study in the academe according to Cheung & Hew (2008). Their study involved graduate students as facilitators; there is little attention and very little is known about habits of mind within the context of graduate educators.

Certainly, graduate school teachers exercise thinking behaviors as persons and as professionals in practice of adult learning principles. Thus, this study investigated how graduate faculty-respondents assessed their habits of mind in relation to their core self-evaluations and their practices of teaching adults.

II. FRAMEWORK

This study maintains that habits of mind of adult educators in graduate schools can influence the manner that instructional decisions are generated especially in their adult learning practices. This paper further theorized that the practice of habits of mind bear on their classroom dynamics and is also influenced by the teachers' sense of self.

A. Habits of Mind

Costa and Kallick (2000) defined intelligent thinking behavior as "habits of mind" and further described it as having a disposition toward behaving intelligently when confronted with problems, the answers to which are not immediately known. Habits of mind come in handy when teachers need to be creative and critical to respond to classroom decisions from the very basic choosing the appropriate activity to deciding to change the day's activity plan when learning environment so demands.

Similar to the view of Costa et al., Marzano, Pickering and McTighe in their *Dimensions of Learning* (1997), emphasized that teachers need to possess these intellectual behaviors to be able to empower students to develop mental habits. They further underscored the need to generate the kind of climate to foster positive attitudes and perceptions so that learning could take place. Having healthy sense of self and sensitivity to adult learners' idiosyncrasies allows the graduate faculty to generate healthy learning climate for authentic exchange with the students. It is presumed that adult learners' participation could be maximized using faculty's decisions as a result of intelligent thinking or habits of mind. They identified habits of mind as the final aspect of learning and "perhaps the most important." In this current study, Marzano's et al. (1997) model was used to determine the habits of mind of the graduate faculty-respondents. It included critical thinking, creative thinking, and self-regulated thinking.

B. Core Self-Evaluations

Many educators agree that the salient portions of the teacher's dispositional traits are functions of good teaching. In fact in the earlier discussion, Marzano et al. (1997) argued that a necessary backdrop of learning are positive attitudes and perceptions. Murphy et al. (2004) as quoted by Bustos-Orosa (2008) likewise mentioned that good teaching emphasizes the value of the interpersonal aspects first before the academic goals of teaching. It is important to know that facilitating good teaching are predictive of what one knows and what one is.

The dispositional traits in this study refer to core self-evaluations, which were derived from the conceptual paper of Judge, Locke, and Durham (1997) as cited by Bono and Judge (2003). Diverse researches have treated self-evaluations along dimensions of efficacy, esteem, locus of control, and emotional stability. After going through a series of studies, they consistently found that *self-esteem, locus of control, emotional stability and generalized self-efficacy* are highly interrelated traits. They also noted that there are common strands that ran across these dimensions that can be termed *core self-evaluations*. After more than five years of series of studies, Judge and Bono (2003) noted that these dimensions load on a single, higher order factor, but they also show convergent validity with other personality traits. They concluded that core self-evaluations appear to be an important concept for researchers who seek to explain and predict job-related attitudes and behaviors.

Individuals in all walks of life are likely to accomplish more if they feel competent in what they do, are self-confident, and feel positively about themselves. There is a need to think and feel positively about oneself considering the profound benefits of these positive cognitions on choice, planning, and subsequent accomplishments according to Bandura, (1986, 1997) as cited by Möller, Pohlmann, Köller & Marsh (2009). Thus, teachers who feel positively about themselves that they could competently deliver the call for graduate school teaching are likely to accomplish more. This is also similar to Marzano's et al. *Dimensions of Learning* where a crucial requisite element for effective learning is positive attitudes and perceptions.

Thus, for this present study, it is accepted that core self-evaluations influence graduate school professors' practice of adult learning activities in the context of their field of discipline. The teachers' skillful decisions to carry on instructional activities facilitative of adult learning could be influenced by their assessment of themselves, the world and others. Bono et al. (2003) said that core self-evaluations are valid predictors of both affective and objective work outcomes.

With this premise, this study further assumed that the faculty's core self-evaluations can influence their cognitive processes and could be manifested in their adult learning practices and their intellectual behaviors or habits of mind. With this premise, this study further recognized that the faculty's core self-evaluations can influence their cognitive processes manifested in their adult learning practices and their intellectual behaviors or habits of mind.

C. Adult Learning Practices

Considered as a template for designing adult learners' instruction, *andragogy* was used as the major theme for adult learning practices in this current study. This present investigation recognizes that there are more recent developments that attempts to explain adult learning. These include transformative learning, spirituality and adult learning, embodied knowing, the neuroscience of adult learning, and narrative learning (Merriam et al., 2009). However, these new adult learning proponents collectively agree that andragogy is still at the center of the heart of adult learning theory (Taylor,

2009). Literatures in the adult learning invite graduate school professors to examine their practices of adult learning. Andragogy has its own principles of facilitating adult learning that are different from pedagogy - the art and science of teaching children.

The idea that teachers of adults should use a different style of teaching is based on the widely espoused theory of andragogy, which suggests that "adults expect learner-centered settings where they can set their own goals and organize their own learning around their present life needs" (Donaldson, Flannery, and Ross-Gordon 1993, as cited by Imel [1994]). The key themes of andragogy suggest that in the graduate school, professors need to facilitate activities that would allow them to evaluate their work goals and objectives in their academic life. Allowing them to evaluate their own work is just among the numerous learner-centered activities that recognize the adult learners' self-worth which in turn can entrench intrinsic motivation to learn as suggested by Conti (1998) and cited by Gailbraith (2004).

In Conti's framework, the following adult learning practices were cited: they are facilitating learner-centered activities, personalizing instruction, relating lesson to experience, assessing student needs, climate building, participation in the learning process, and flexibility for personal development. Adult learning in the graduate school requires professors to be more open-minded and sensitive to the diversity of their professional students. Unless students see the relevance of the classroom activities in terms of their own needs and personal experiences, they may find these activities less important. In creating varieties of instructional processes, graduate school faculty need to be ready to get out of the mold and, with the graduate students, discover new insights and possibilities.

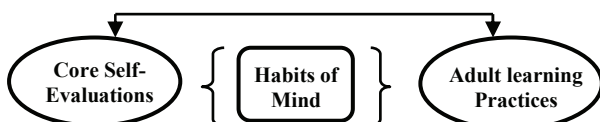


Fig. 1 The Research Paradigm

Figure 1 presents the research model showing the interaction of the variables of the study: habits of mind, core self-evaluations, and adult learning practices. From the previous discussions, it is construed that core self-evaluations influence the graduate faculty's adult learning perspectives measured in terms of practices. Supporting this assumption is the argument that "core self-evaluations are fundamental, bottom-line evaluations that individuals have of themselves, the world and others", where these could show how people unconsciously assess themselves, the world and others (Bono et al., 2003). Thus the so called 'situation specific appraisals', such as evaluation of what one does are affected by these deeper and more fundamental self-appraisals. Core self-evaluations are valid predictors of both affective and objective work outcomes.

Hypothesis 1: Core self-evaluations is significantly related to adult learning perspectives.

Hypothesis 2: Core self-evaluations is significantly related to habits of mind.

The figure also shows that habits of mind could mediate the influence of the faculty's core self-evaluations on their views of adult learning practices. Even if a person possesses the necessary skills or knowledge to act, he or she may not be disposed to do so. It is, therefore, assumed that without the habits of mind, people may not even use their skills or abilities extensively. Costa and Kallick (2000) referred to habits of mind as the *characteristics of what intelligent people do and think when they face an issue or a problem, and thus may play an important role in influencing the degree of learner participation*. This means that the graduate faculty as adult educator "need to have the disposition of behaving intelligently when dealing with the adult learner most especially when confronted with uncertainties" (Costa and Kallick, 2000)

Hypothesis 3: Habits of mind is significantly related to adult learning perspectives.

Hypothesis 4: Habits of mind mediate between core self-evaluations and adult learning practices.

The hypothesized model is shown in Figure 2 below.

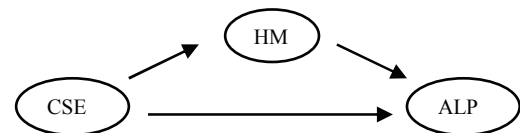


Fig.2 The Hypothesized Model

III. OBJECTIVE

This study aimed at establishing a model showing the mediating effects of the graduate faculty's habits of mind on core self-evaluations and their adult learning practices. Thus, it ascertained the faculty's self-regard through their core self-evaluations and associated this with their self-report of their habits of mind and their adult learning perspectives. The main hypothesis of the study is as follows: "The habits of mind of the graduate faculty mediate in the relationships between their core self-evaluations and their adult learning practices."

IV. METHODOLOGY

A. Research Design

This study used the descriptive research design utilizing both quantitative and qualitative methods of data collection. Key informant interview with graduate students complemented the quantitative data gathered through the survey instruments. Based on the gathered data a model for adult learning in graduate education was constructed.

B. Participants

Three graduate schools of non-sectarian universities in Northern Mindanao, Philippines, were identified as research settings. Forty-one respondents were chosen purposively based on the two criteria. First, they are currently teaching social science, business and education subjects in the master's or doctoral level. Second, they have been teaching in the graduate school for at least three years. It is assumed that by then, the graduate faculty has been inducted to graduate school teaching and has more or less gained a kind of

paradigm in dealing with adult learners in the graduate school. More than 80% of the graduate faculty bearing the above criteria participated in the study.

C. Instruments

Three instruments were used to data gathering and these included the following:

- 1) *The Core Self-Evaluation Scale*. This scale was adapted from Judge, Erez, Bono, and Thoresen (2002) who completed a meta-analysis of the relationship between the traits and validly established conclusions regarding core self-evaluations: This present study, used the four-point scale: 4 for “strongly disagree”, 3 for “disagree”, 2 for “agree” and 1 for strongly “agree.” Thus, a low score suggests a high level of self-esteem, internal locus of control, emotional stability, and general self-efficacy.
- 2) *A Self-Report on Mind Behaviors*. This instrument was generated by the researcher based on the paper of Cheung and Hew (2008) as well as that of Marzano’s et al. (1993) who culled their paradigm from cognitive psychologists. It consists of the following dimensions critical thinking, creative thinking, and self-regulation. The responses reflected the frequency of practice as always (4), very often (3), sometimes (2) and rarely or not at all (1).
- 3) *Adult Learning Practices*. The Principles of Adult Learning Scale (PALS) of Gary Conti (1990) was used in this study to determine the practices of the graduate school faculty. The higher the score, the greater is the tendency towards being learner-centered. Thus, scores between 0-145 are indicative of a “teacher-centered” teaching style while scores ranging from 146 to 220 are indicative of “learner-centered” teaching style.

All the instruments were validated and tested for reliability using the Cronbach’s Alpha Reliability Coefficient.

D. Data Organization and Analysis

The design of this study was patterned after the statistical model of Baron and Kenny (1986) and studies that used Baron and Kenny’s statistical model. To support the research hypothesis, three strategies were employed. First, an analysis of zero-order correlation was done to examine internal relationships among the research variables. Second, a standard multiple regression analysis was conducted to test for the effect of core-self evaluations on the faculty’s habits of mind and adult learning practices. The adult learning practices variable was also regressed against habits of mind. Finally, an additional standard of multiple regression analysis was used to examine the effect of core self-evaluations on the adult learning practices.

V. RESULTS

Table 1 shows the descriptive statistics in terms of core self-evaluations, habits of mind, and adult learning practices. Generally, the graduate faculty-respondents had high core self-evaluations, meaning that the extent of their self-esteem, locus of control, emotional stability, and general self-efficacy were high. They practiced habits of mind *very often*. More than 56% of them were teacher-centered while 44% were learner-centered.

TABLE I
FREQUENCY AND PERCENTAGE DISTRIBUTION OF GRADUATE FACULTY-RESPONDENTS’ CORE SELF-EVALUATIONS, HABITS OF MIND AND ADULT LEARNING PRACTICES (N=41)

	Scale	Frequency	Percent
Core-self Evaluations Mean = 21.71 (High)	very high	17	41.5
	high	16	39.0
	moderate	8	19.5
	Total	41	100.0
Habits of Mind Mean = 50.4 (very often)	Scale	f	Percent
	always	7	17.1
	very often	20	48.8
	sometimes	14	34.1
	Total	41	100.0
Adult learning perspectives Mean = 135.51 (teacher centered)	Categories	f	Percent
	learner centered	17	43.9
	teacher centered	24	56.1
	Total	41	100.0

Learner-centered activities were disclosed from a series of interviews with significant number of students sampled from the three universities. The pattern of student responses that gave credence to classroom activities that could engage them to their great advantage included group work or discussions and other activities that involved them to ask and answer their own questions. Small group assignment for task that needs collection of information outside class schedule was also preferred. Non-interactive approaches, such as long lectures, reporting, and non-response to online requirements, were found to be the least preferred approaches used in the graduate classes. Activities that are learner-centered facilitate not only critical thinking but also gave opportunities for the social component of learning. Interview results also reveal that their teachers used a mixture of these classroom activities in combinations including the least preferred ones.

Table 2 presents the mean and standard deviations, zero-order correlations and reliabilities of the research variables. As revealed, the habits of mind evinced significant relationships with core self-evaluations and adult learning practices. Correlational analysis reveals that *habits of mind* was significantly related with *core self-evaluations* (-0.59; $p < .01$) and *adult learning practices* (0.60; $p < .01$). *Adult learning practices* variable was positively related with core self-evaluations (-.71; $p < .01$).

TABLE 2
MEANS, STANDARD DEVIATIONS, RELIABILITIES AND
INTERCORRELATIONS OF THE VARIABLES

Variables	Mean	Sd	Cronbach's α	Core-Self Evaluations	Habits of Mind
Adult Learning Perspectives (alp)	135.5	14.1	0.80	- 0.71**	0.60**
Habits of Mind (hm)	54.1	4.24	0.68	- 0.59**	
Core-Self-Evaluations (cse)	21.1	5.14	0.84		

** Significant at the 0.01 level (2-tailed). The negative core self-evaluations' r-values imply that the lower the mean score, the higher would be the core self-evaluations

These findings supported the first three hypotheses of the study and were very much in line with the expected direction of relationships as suggested by H1 and H2. The results show that "very often" practices of the *habits of mind*" led to higher core self-evaluations and an increase in the adult learning practices scores. The scales used in this study had good psychometric properties in terms of reliabilities since the values ranged from 0.68 to 0.84.

TABLE 3
TESTS OF MEDIATION

Model	Dependent Variable	Predictor Variable	Beta (β)	Adj. R ²	F-value
1	Adult Learning Practices	Core Self-Evaluations	-0.71	0.486	38.75**
2	Adult Learning Practices	Habits of Mind	0.60	0.349	22.35**
3	Habits of Mind	Core Self-Evaluations	-0.59	0.326	20.38**
4	Adult Learning Practices	Habits of Mind	0.30	0.530	23.58**
		Core Self-Evaluations	-0.54		

** Significant at the 0.01 level (2-tailed). The negative core self-evaluations' r-values imply that the lower the mean score, the higher would be the core self-evaluations

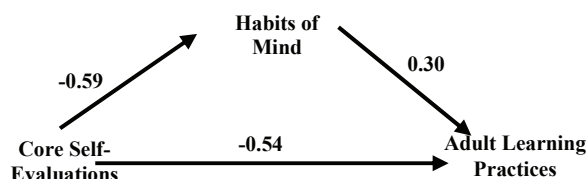


Fig.3 Results of Multiple Regression Analyses on Habits of Mind as a Mediator between the Relationships of Core Self-Evaluations and Adult Learning Practices

Table 3 presents the results after a series of regression analyses on the habits of mind as mediator in the relationship between core self-evaluations and adult learning practices. *Model 1* shows the unmediated effect of *core self-evaluations* on *adult learning practices* ($\beta = - 0.76$, $p < .001$). As revealed, *core self-evaluations* could directly increase *adult learning practices* scores towards being learner centered. *Model 2* shows that *habits of mind* could likewise directly influence

adult learning practices ($\beta = 0.60$, $p < .001$). In *Model 3*, core self-evaluations could also directly affect habits of mind ($\beta = - 0.59$, $p < .001$).

Finally, *Model 4* shows that *habits of mind* influenced the relationship between *core self-evaluations* and *adult learning practices* in that the strength of relationship was lessened. When unmediated, the impact of *core self-evaluations* on *adult learning practices* was $\beta = - 0.71$. However, this was reduced to $\beta = - 0.54$ after the dependent variable was regressed on habits of mind, controlling for the core self-evaluations, the independent variable. The results show that *habits of mind* partially mediates the relationship between *core self-evaluations* and *adult learning practices* since the independent variable affected the dependent variable upon regressing the dependent variable on both the independent variable and the mediator.

Figure 3 presents the test of mediation as summarized by *Model 4*. The results indicate that while core self-evaluations could directly influence the graduate faculty's manner of facilitating adult learning experiences, they could also affect the practice of habits of mind, which in turn could help increase the faculty's disposition towards becoming more learner-centered.

VI. DISCUSSION

The study focused on habits of mind as natural dispositions or tendencies to employ one's skills or knowledge in deciding what to do in any circumstance. The findings established that habits of mind have mediating effects on the relationship between core self-evaluation and adult learning practices. Graduate faculty with high regard of self (high core self-evaluations) tended to practice habits of mind more frequently, consequently, tending them to be more learner-centered in facilitating adult learning activities and in dealing with the adult learners in graduate education. Facilitating good teaching is a function of what one knows and what one is.

Faculty-respondents with high core self-evaluations or having high emotional stability, self-esteem, locus of control, and general self-efficacy practice habits of mind more often and they are more likely to espouse learner-centered approaches in their classes. These interrelated traits find support when Dirkx's (2008) emphasized the increasing recognition of the powerful role which emotions and affect play in adult learning process among adult educators. He also cited treatment of the interrelationship of emotions and learning that suggested "emotions can have a considerable effect on the way we think, on motivation and on beliefs, attitudes and values" (Jarvis [2006] as cited by Dirkx, 2008).

Viewing a more holistic paradigm of adult learning and seeing the person's interconnectedness in mind, heart and spirit, the teacher as facilitator of adult learning should be disposed to spontaneously practice habits of mind (critical thinking, creative thinking and self-regulation). The more frequent the practice of habits of minds the more the teacher becomes learner-centered and graduate students preferred and found more meaning in learner-centered activities in their classes. Generally, the findings reveal that habits of mind as a

core variable have prominent effects on the adult learning perspectives and the core self-evaluations of graduate faculty. Clarified as the affective aspects of thinking, these mind behaviors occur with emotional dimensions and these could naturally be influenced further by their personal regard of self (Marzano, Pickering and McTighe [1993], Neo & Cheung, [2005]).

What are the implications of these findings? Theoretically, the most prominent finding is the mediating role of habits of mind in the relationship between how a faculty regards self and his/her adult learning practices. The data found for all the hypotheses raises the questions regarding the *type* of relationship that exists between and among core self-evaluations, habits of mind, and adult learning practices. Could the teacher's adult learning practices be a significant influencing variable in the dynamics of teaching-learning situations in the graduate education? Or, is it the habits of mind that command "what to do when faced with uncertainties" (Costa et al.)? If it has reduced only the direct effect from -0.71 to -0.54, what other variables could mediate between core self-evaluations and adult learning practices?

This study has established *only* the strength of relationships between and among the variables of the study and has opened more avenues for these relationships to be explored further. Adult learning continues to be a dynamic area of research and theory building. According to Merriam (2009), adult learning is a complex phenomenon that can never be reduced to a single and simple explanation.

There are also practical implications of this study that are worth considering beyond the theoretical meaning as earlier explained. It appears that the universities involved in this study need to address the question of habits of mind considering that more than 56% of the faculty-respondents tended to be more teacher-centered and about 34% practiced habits of mind only "sometimes." There is a strong implication that many of the graduate classes still experience non-interactive approaches that inhibit student participation in many aspects of graduate studies that directly affect them.

Several limitations of this study should be noted. First, a significant limitation of the present investigation was the small sample size. The results reported here may only be generalized to the graduate faculty teaching social sciences, education and business courses in the non-sectarian universities of the Region who are in the master's and doctoral levels. Caution is exercised in generalizing this sample to other graduate faculty in other non-sectarian universities in other regions. Second, the inferences of this study were drawn from self-reported data. Although there were attempts to gather qualitative data from students, these were conducted to only inquire about the students most and least preferred classroom practices.

VII. CONCLUSION

Habits of mind play a central role in the instructional decisions of the graduate school faculty in facilitating adult learning. Considering the influence of thinking behavior on adult learning practices, it would be good for graduate schools

to aggressively generate opportunities where faculty's habits of mind could further be enhanced. These opportunities could include more stringent and regular requirements for faculty research in service to their respective disciplines. Engaging in faculty research nurtures the faculty's critical thinking, promotes creative thinking, and makes for a strong foundation for self-regulated thinking. Conducting research cultivates intellectual mastery and lifelong learning, which mark the defining qualities of faculty in institutions of higher learning.

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Redefining the Sunset Years: The Lived Experiences of Retired University Educators in Bridge Employment

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Abstract— This paper digs into the lived experiences of retired university educators who are engaged in bridge employment at University of St. La Salle (USLS) in Bacolod City, Philippines. This is a phenomenological study on nine previously-retired faculty and administrators who have returned to the University for paid-work. Twenty themes emerged from the data generated through in-depth interviews. Among the major impetus for bridge work include the monetary and non-monetary gains of the job. Non-monetary and intrinsic values came out like the need for generativity, socialization, service, continuity and purpose. Insights of the participants reveal that doing bridge work in USLS is a highly therapeutic and spiritual experience. The work has propelled them to strive for higher-order needs that go beyond the practical, day-to-day considerations for survival. The final insights reveal that these bridge workers have painted a new face of work in their sunset years. This study hopes to contribute to the almost non-existent literature on bridge employment in the country. It also aims to provide an empirical data for schools and other industries to take a closer look on their retirees and to exercise social responsibility in ensuring that these prized workers are taken care of and their expertise is put to good use. The data generated from this study can help develop strategies, specialized training, support systems, programs and laws that can protect the welfare of the aging population whose expertise, maturity and experience can benefit a lot of people if they returned to work.

Keywords— bridge employment, retirement, sunset years, phenomenological research, University of St. La Salle

I. INTRODUCTION

According to a study, “Current demographic trends, which reflect an aging population, are now widely recognized throughout the industrialized world. There is also a broadly accepted assumption that societies need older workers to stay in the workforce longer.” (Paul & Townsend, 1993; Peterson, 1999; Dychtwald, 2004 cited in DeLong, 2006).

Bridge employment is a term used by researchers to describe the type of employment that retirees take on after official retirement and prior to the onset of a complete withdrawal from the workforce (Novak 2006; Weckerle and Shultz 1999 cited by Walajtys, 2007).

In the last few years, there have been a small but steady number of employees in University of St. La Salle (USLS)

who have gone back to teaching after formally retiring from paid work. Very little is known about this population of bridge employees who are still active with teaching after having formally retired.

This study hopes to shed light on this relatively new and under-researched phenomenon in the Philippines called bridge employment and based on the results, to make recommendations to the Lasallian community in terms of reviewing the retirement policies and the eventual preparation of employees for retirement. Consequently, this study will help open a whole new world of understanding on the subject of bridge employment and its implications to the future, since many have not even heard of it as a possible career option after retirement.

A. Research Objective

This study explores, describes and analyzes the lived experiences of retired university educators of University of St. La Salle who are engaged bridge employment. Specifically, it aims to answer the following questions:

1. What significant reason motivates retired university educators of USLS to engage in bridge employment?
2. What insights, meaning and inspiration for the retired educators emerge from these experiences?

II. REVIEW OF RELATED LITERATURE

Several theories provide a solid foundation for a study of retirement and bridge employment. One of them is the *role theory* which posits that the loss of roles accompanies the aging process and this creates a lot of impact both on the lifestyle and self-esteem of older workers (Novak, 2006 cited in Walajtys, 2007). Consequently, the *continuity theory*, builds on the premise of the role theory posits that “people who age most are those who carry forward the habits, preferences, lifestyles and relationships from mid to late life-in this case, from pre-retirement to post-retirement (Novak, 2006 cited in Walajtys, 2007).

Hall and Mirvis (1995, cited in Ulrich, 2007) claim that “protean careers should replace the traditional organizational careers. This career concept incorporates the dimensions of flexibility and autonomy, which might be fit the situations and conditions of older workers who have fewer external

constraints (e.g. parenting responsibilities) and internal drives (e.g. desire for advancement)."

They further added that this model is "driven by the person's search for self-fulfillment which means an older worker's work boundary can extend beyond the organization and can connect to the worker's personal life."

Bridge employment is seen by many authors as an option for retired persons to extend their productivity and to make their lives after retirement more productive. It is defined as work that one does after he or she formally retires from his career. Many studies (Ulrich, 2007; Walajtys, 2007; Kendrick, 2007) have explored bridge employment and its significance in the lives of older workers.

Bridge work is a widely accepted concept of employment in the Western countries. In fact, a lot of studies have been done on the subject in those countries (Ulrich and Brott, 2005, DeLong, 2006, Walajtys, 2007, Kendrick, 2007). However, in the Philippines, this is a relatively new concept and not too many studies have been done on the subject. The dearth and scarcity of local literature on bridge employment is one of the reasons that prompted the researcher to do an inquiry on the subject in order to fill the knowledge gap in the literature.

III. RESEARCH METHODOLOGY

This study utilizes the phenomenological approach as research design. The study uses purposeful sampling, more specifically, criterion sampling, wherein only the participants who met the criteria set by the researcher were included in the study. The participants of the study are nine previously retired faculty and administrators who have returned to the University for paid work.

Data were gathered using semi-structured in-depth interviews that were recorded, transcribed, validated, analyzed and interpreted by the researcher following Moustakas' approach in analyzing lived experiences. Figure 1 represents a summary of the steps in analyzing the data:

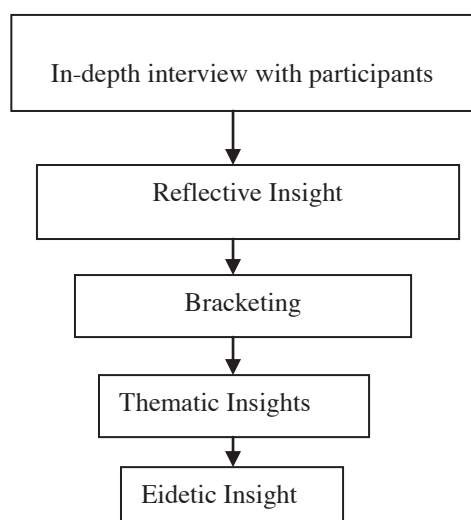


Fig. 1 Steps in Analyzing Lived Experiences

IV. RESULTS OF THE STUDY

On the significant reason why retired University educators of USLS have decided to engage in work after retirement

The study delved into the reasons why some retired university educators of USLS have decided to work again. From the in-depth interview conducted with nine participants, nine significant themes were culled by the researcher:

Money does matter: One never outgrows the basics

The practical monetary and financial considerations figured as a major reason. This time though, money is seen by these workers as a direct result of doing one thing that makes them happy—bridge work. Ulrich (2007) and Walajtys (2007) cited desiring additional income as a major reason why retired workers return to paid work. Saba and Geurin (2005) also affirmed this when they noted that the individual characteristics of workers are the main causes to retire or extend employment; among them is their financial situation. Cahill (2005) also supports this finding when he found out that a certain group of respondents, especially those in the lower wage category, take on a bridge job due to financial necessity.

On being prepared and independent

In relation to earning their own money, results show that these workers want to be independent in earning for themselves and want to take away the burden from the children to support them in times of need, especially if health contingencies arise. This theme was gleaned from the fact that older workers seem to depend less and less on their children and family and more on their personal savings and their capacity to generate income even in their twilight years.

The "busy ethic": on working and keeping occupied

This theme is about a worker's innate need to be busy and to fill his time with activities that are productive and worthwhile. Even in old age when there is a sense of slowing down for these bridge workers, there seems to be an incessant need to keep busy in order to avoid the emptiness and idleness of non-activity. Studies of Kendrick (2007) and Ulrich (2007) have the same findings along the lines of the busy ethic. These studies affirm the importance of keeping busy and staying active as significant motivating factors that propel older workers to continue their present bridge jobs. Most, if not all of the participants claim that they have more time to spare and having the leisure of spending them on activities that they wanted.

Less is more: the flexibility of having more time and fewer responsibilities

The fourth theme that emerged is the older workers' creative use of time. Having more time to spare in their schedules to take care of other personal things and at the same time doing a bridge work, is a formula for a balanced life for these workers. The degree of flexibility that the retirees are enjoying seems very important in this stage of their lives. They seem to value the benefits of having a job where they have the power to influence the terms, how much task and what they are willing to put in on the job. If the element of flexibility is not there, the older workers are most likely to leave it (Walajtys, 2007). This flexibility of schedule was also

affirmed by another study of Pengcharoen and Schultz (2010) that said “what determines late career employment status is the interplay of work-related factors like flexibility of schedule and non-work related factors like certainty of retirement plans. Weckerle and Shultz (1999) found out that among the best predictors of identifying people who are considering retirement and bridge employment is job flexibility.

Generativity: an incessant need for usefulness and purpose

The fifth theme deals with the universal need of people for generativity, usefulness and purpose. Innately, humans strive to do something for the next generation, to feel important, to contribute to posterity and to extend one’s boundaries to cover not just the self and family, but also the community. This job allows these workers to achieve a sense of purpose and usefulness for themselves that is why they keep their present jobs. A Canadian study of Saba and Guerin (2005), found out that one of the most powerful values of these workers is the need “to be useful.” For most men whose identity is largely determined by the work that they do (Frieze, Oson, Murell and Selvan, 2006, cited in Walajtys, 2007) doing bridge work may increase their sense of meaning, of being important and being wanted.

La Salle in my mind: My comfort zone

The theme pertains to the older workers’ natural tendency to hold on to something familiar, seeing La Salle as a comfort zone that is difficult to leave. This theme emerged as a direct result of the workers’ predilection to see USLS as their second home and as such, find comfort in it. Saba and Guerin (2005) found out in their study that one of the most powerful work values of older workers is “the need to work in a pleasant environment.” Walajtys (2007) noted that familiarity drives older workers to value a new job. They feel that is important that they should be comfortable to do a job when they enter it. They tend to choose jobs that are similar to the ones they had before and those that require almost the same skills to perform.

Keeping the routine: the need for continuity

This theme epitomizes the inherent human tendency to maintain the continuity and the structure of his life. In the arena of work, the patterns, habits and routine are important in the lives of these older workers and doing a bridge job ensures the continuity of the reality they once knew. Workers who usually survive longer tend to be those who are able to continue the structure, habits and relationships of their past jobs. Human beings are predisposed to holding on to the familiar and will do anything to keep the structure and shun the unfamiliar. According to Meyer and Allen (1991 cited in Kendrick, 2007), “one of the three factors what affects a person’s desire to work again is the need for continuance. This is because of the need to do something or the costs that employees perceive and associate with leaving the organization.

“Dress up, make up, go up”: Looking and feeling good

In the minds of these bridge workers, dressing up and preening themselves goes a long way in enhancing their enthusiasm to do their jobs. Power dressing and commanding the respect and attention of students seems to be a great

motivation for these retired workers to work again. A part of what really makes these older workers happy is the opportunity to look good and feel good about themselves. This creates a huge boost on their self-esteem knowing that they look their best and feel ready to face the world.

No retiree is an island: The importance of social interaction

Part of the strongest reasons why they have decided to go back to paid work in the University is the chance to maintain the social network that they have developed on-the-job prior to retirement. Most bridge employees find it hard to let go of the comfort and security old friends and colleagues can give. Enjoying the companionship that comes from working and being with people is indeed a strong motivation for older workers to return to the workplace (Doeringer, 1990, Feldman, 1994 cited in Kendrick, 2007).

Eidetic Insight: Work as a continuation of who I am

In essence, the bottom line of all these reasons to return to paid work appears to be a revisit to how these older workers define work in relation to who they are. They can’t accept not working. A big part of who they are and how they feel about themselves, as well as how others see them, is defined by these jobs that they are doing. It is difficult for these bridge workers to let go of this image of themselves because it is in essence, their deep-rooted self-definition, that their identity is largely dependent on their work. Doing a bridge job therefore is an affirmation of this self-concept which provides a continuation of who they are. Their bridge job seems to provide that assurance and certainty that they get to keep and maintain their identity and self-concept as “workers.”

On the insights, meaning and inspiration of older workers from their bridge job experiences

Redefining and re-inventing work: Updating the map of reality

Bridge work in La Salle is a phenomenon that redefined and re-invented the traditional concept of work. They also have to constantly revise their map of reality so they can avoid the natural pitfalls of aging: feelings of irrelevance and obsolescence. According to Novak (2006, as cited in Walajtys, 2007), “the loss of roles accompanies the aging process and this creates a lot of impact on then lifestyle and self esteem of workers.” They have to continually adapt to these changes by learning to discard old roles and taking on new ones that come along.

Continuous learning in old age: On being relevant and updated

The openness and the willingness for new ideas and the possibility of training for new skills appeal to the older workers of USLS. In the case of these older workers, new things are viewed as rare opportunities to improve their craft so that they can combat the ill effects of obsolescence and irrelevance. In the study of Saba and Guerin (2005), it was found out that in order to keep their bridge work, respondents need to see that this present job allows them to acquire new competencies and transfer knowledge. If they see this aspect

of their lives fulfilled, they are more likely to stay and defer retirement.

“Retirement” is a misnomer: Changing tires and charging forward

Retirement for them is just merely a “changing of tires,” and moving onwards to continue the quest for meaning and relevance in this changing world. In reality, retirement is really a misnomer. Once does not retire from being a worker because he has to continue working in different capacities throughout his life. He simply moves on to different stage or arena of life but stopping work and not being productive is never an option.

The existential angst: The anxiety of aging, searching for meaning and spiritual growth

These bridge workers in USLS are seeing their work not just as an ordinary employment that they do but something that gives them more meaning and spiritual growth. Lavretsky (2010), she cited some theories in psychology that may also explain the movement of older workers into the realm of spirituality. One theory is socio-emotional selectivity theory which proposes that as one becomes more aware that death is inevitable and that life is short, his goals shifts to more emotion-related. She even cites the great Carl Jung who proposed that man’s life becomes more beautiful and meaningful as he reaches the middle age and old age because of the inward movement for introspection.

Opening the floodgates of possibility: Creativity unleashed in old age

There is always room for creativity even in old age. The challenge of how to teach an old subject in a different and creative light in order to sustain the interest of the students is one important aspect of this bridge job. Zausner (2009) claims, bringing creativity into older adults’ worlds is magical. With guidance and encouragement, creative inspiration can transform a life, filling it with confidence, enthusiasm and social engagement.” She added that creativity also inspires and heals because it can ward off depression and other ill effects of the normal emotional “wear-and-tear” inherent on the job.

One never outgrows the classroom affirmation: An incessant gratification

Being teachers who have spent most of their productive years in the classroom, these bridge employees have a natural affinity to work with the youth and enjoy the benefits a classroom affirmation can give. For them, the best part of their work is the opportunity to see these young peoples’ faces and making them learn the lessons and the right values of living. If they see that what they are doing makes a dent in the performance and value-formation of the youth, this validation is the strongest drive that propels them to continue what they are doing—working after retirement.

There is life outside of La Salle: Working till I can’t work no more

Stopping work at once is never an option for these bridge employees. The fact that they have accepted the challenge to work again after being invited by the administration is proof

of their insatiable need to work and to be productive. They don’t see retirement as the end of their working lives.

Despite being self-confessed workaholics, they are also aware of the reality that the school will not be needing their services forever. Majority of them have expressed the certainty of finding another work in a different organization should USLS eventually close its doors on them

Keeping the ministry alive: the De La Salle charism of service

Majority of the participants affirmed that their work is an opportunity share in God’s vineyard by rendering service to others in need. The zeal for service is an embodiment of St. John Baptist De La Salle’s core values. Teaching is seen as a ministry and vocation, more than an employment.

The Primacy of Relationship in Bridge Employment

For many of these bridge workers, part of the meaning and inspiration of doing this bridge job is the assurance that one is forging very valuable and meaningful relationships with others. These workers consider relationship as a cornerstone of their work in general. Thus, many have placed a strong premium on forging healthy and meaningful ties with other people.

Happiness: A by-product of loving what you do and doing what you love

All the participants of the study exuded enthusiasm and happiness in their present jobs. This is not to say that they have found the perfect job but instead, it is a kind of feeling that one gets when he knows that what he is doing is something that he loves to do in the first place. Anderson (cited in Zausner 2010) explains how a positive outlook in life can affect a person’s grasp of things, “with a positive mood, you actually get more access to things you would normally ignore,” he says. “Instead of looking through a porthole, you have a landscape or panoramic view of the world.”

Health as an important barometer in bridge employment

Bridge workers in USLS feel that if their bodies signal them to stop working, they will do it. But in the meantime, for as long as the organization needs them and they are in a state of good health, they are here to stay. Benoit and Luong (2008), Saba and Guerin (2005), Cahill (2005) and Ulrich (2007) pointed out that health is a very important factor in bridge work. When workers feel a general sense of well-being, there is a greater the likelihood that they will pursue work after retirement.

Eidetic Insight: Realistic acceptance of self and work

It appears that these bridge workers are more realistic of the changes that are taking place in their lives in terms of the work that they are doing. Older workers are now more accepting of these external and internal factors that are impinging on them as they continue their work in USLS and that they are more accepting of their own strengths and limitations as individuals.

In the light of all the themes that emerged in the study, the researcher advances this final eidetic insight:

FINAL EIDETIC INSIGHT: PAINTING A NEW FACE OF WORK IN THE SUNSET YEARS

Participants define part of their identity by the present work that they do. This is why they still continue doing it. But

in the light of the realistic changes that are happening within and outside of themselves, they have to redefine their concept of work: Work should be something flexible that they can do as long as they are still able to do it. It should give them meaning, purpose and an opportunity to continue the Lasallian charism of service. “Retirement” is a misnomer. One only changes his worn out tires and continues to move on to another field or arena of life; but he never stops.

The following figure summarizes the main insights of the study.

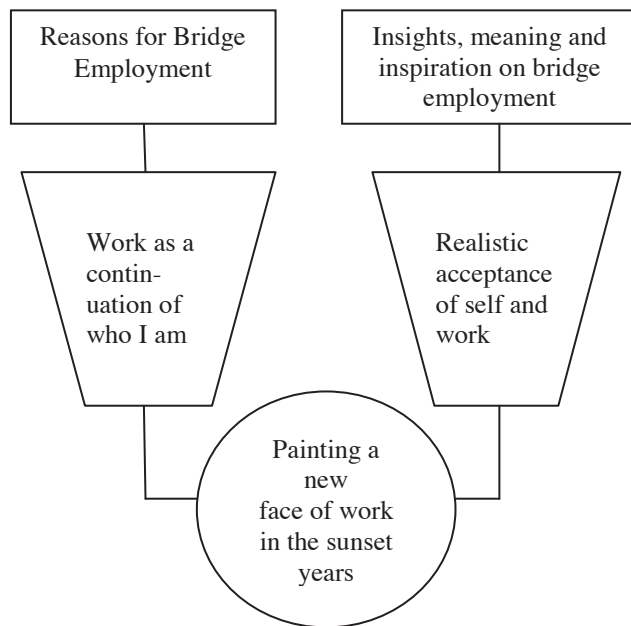


Fig. 2 USLS Bridge Employment Framework

Conclusions

Bridge employment in USLS: A redefinition of work and retirement

The concept of bridge work is new in the Lasallian and Negrense context, and not too many people understand what it is. The participants have eloquently expressed in their sharing that their present bridge work is not the same as their last full-time career before retirement. They seem to enjoy the flexibility, the freedom and the relevance of their jobs. Working in bridge job allows the participant to explore more possibilities and break new grounds in their twilight years.

An opportunity for continued learning and constant preparation for older workers

The older workers' insights reveal a very imperative need to prepare for retirement with the optimism that there are good and realistic options that are waiting for those who look and think forward. There is a need for older workers to be more open and less resistant to learn new things and to grab every opportunity to update and align their skills with the changes in the workplace demands in order to avoid obsolescence and irrelevance.

A relatively novel career path and a relevant and practical career option for future retirees

Career-pathing and planning does not end in retirement. Even older workers have to constantly reinvent themselves in order to be in sync with the demands of the ever changing and highly volatile workplace.

A therapeutic way of coping

For many participants, doing a bridge job is a therapeutic experience. It is seen as a way to cope with the boredom of retirement, the routine and predictability of domestic life and in essence, a good distraction to forget one's problems.

An answer to real needs

Bridge jobs in USLS seem to be answering a need. To the participants, these needs are varied. Whatever type of need these bridge jobs are fulfilling, the participants are very thankful that their present jobs provide them with the necessary stimulation and inspiration to strive for continuity routine and purpose.

A challenge of a realistic self-assessment for retirees

The bridge jobs in USLS are also a barometer of what the participants in the study can and cannot do due to the obvious signs and symptoms of aging. These jobs are a simplified version of their original career and a realistic embrace on the part of the workers to their changing realities,

A Call to live the Lasallian zeal for service and communion in mission

In the Lasallian context, this modern-day phenomenon called bridge employment is a continuation of the mission espoused by the Founder of the Brothers of the Christian School, St. John Baptist De La Salle.

Bridge employment is a viable option to keep older workers

Bridge employment is a relatively new concept in the Philippines but it can be a good management option to answer the shortage of very experienced and trained workers. Based on the experiences shared by the participants in the study, working in bridge jobs can be both beneficial to the employees and management.

Recognizing that the academe benefits by hiring older workers

This work option must make management be more realistic with the fact that the workforce is aging and older workers are increasing in number. Because of this reality, management has to seriously consider letting these trained and experience personnel go right away after retirement because they have the skills and the expertise in their respective areas of specialization.

It is therefore a great opportunity for management to utilize and maximize the wealth of potential, wisdom and experience of its older workers by keeping them employed longer.

A logical and practical management prerogative

Hiring some retirees to do bridge jobs may be a smart management move. The benefit can translate in terms of these employees needing less training and possessing valuable skills and the wisdom with the least amount of supervision.

An administrative lens in looking at existing retirement policies and practices

Hiring older workers for a job after retirement may provide the management reliable and valid information on the actual

situations and experiences of these employees. They can be good sources of feedback in terms of the organization's policies and programs for retirees, their areas of improvement, and their major strengths as well.

A Christian and humane service to older workers

Taking care of the older generation is as vital to the existence of any organization as securing the welfare of its younger members. Bridge employment is like a way of "honoring one's parents" in order to achieve balance and happiness in life.

Recommendations

There is a need for the administration to review its policies for bridge employment and make it a viable option for all prospective retirees. Keeping older workers is vital to the survival of the organization since the supply of really competent and dedicated younger teachers is limited and the cost of training them is very high.

Since many of these workers see their bridge work as transcending the practical and economic aspects of work, workers need to be given the opportunity to strengthen their interpersonal and social networks even before retirement.

More solid pre-retirement, retirement and post-retirement programs that cater to the integral development of the workers should be planned in order to prepare the senior members of USLS for the eventuality of retirement and the life outside of the institution.

Because of its perceived therapeutic and practical implications both for the employees and the organization, it is recommended that USLS should seriously consider bridge employment as a possible career option for its retired employees.

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Emotional Intelligence and the Work Performance of the Fulltime Faculty of a Sectarian Institution: Implications to Personal and Social Competencies

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ABSTRACT

The ability to manage feelings of faculty is manifested in their personal and social competencies as an important factor for institutional excellence. Personal and social competencies are significant considerations for faculty work performance. The research aims to investigate into the implications of emotional intelligence to the work performance of the full-time faculty of a sectarian institution in Northern Mindanao, Philippines. Personal competencies and social competencies are the specific dimensions of the theory of Daniel Goleman's Emotional Intelligence.

Using the one-way Anova, the mean differences of both the personal and social competencies of the full-time faculty when grouped by grade school, high school and college have been found highly significant at .05 level of significance.

The results of the regression analysis indicates that only the personal competencies explains 30.3% the positive correlation to the improvement in work performance. Enough evidence that an improvement on the level of personal competencies of the full-time faculty is likely to improve the mark of their work performance rating by 3.4% as shown in the regression equation.

This study concludes that personal competencies have significant implication and larger influence to the work performance of the full-time faculty of the school as an educational organization.

Thus, the result of this study has implications on the basic issues for bringing the workplace effectiveness and in helping attain higher levels of the school organization growth and excellence.

Keywords: Emotional Intelligence, Personal Competencies, Social Competencies, Work Performance

Theme: IR Responses and Responsibilities

Category: Research Paper

INTRODUCTION

Emotional Intelligence (EI) according to Daniel Goleman in his book (1995) states that *"it strongly links with concepts of love and spirituality: bringing compassion and humanity to work, and links to multiple intelligence theory which illustrates and measures the range of capabilities people possess, and the fact that everybody has a value"*.

In the last decades of 20th century and at the beginning of the 3rd millenium, different researches suggested that, IQ is not the only factor of organization's success and performance improvement, but also there is another factor called emotional intelligence that results in outstanding performance at work (Nooraei, et.al.,2011).

The paper is anchored on the Emotional

Intelligence Theory (Goleman, 1995). Generally, there are five domains of emotional intelligence, namely: Knowing your emotions, Managing your own emotions, Motivating yourself, Recognising and understanding other people's emotions and lastly, Managing relationships, ie., managing the emotions of others.

The five domains of Emotional Intelligence are categorized into two approaches: First, the Personal Competencies that focus on self-awareness, self-regulation and self-motivation. Second, the Social Competencies that focus on social-awareness and social skills.

In view of these theory, this study sought to investigate the emotional intelligence in terms of personal and social competencies of full-time faculty and how does personal and social competencies have significant implication to the work performance of the sectarian

institution in Northern Mindanao, Philippines.

Moreover, it will further investigate how personal and social competencies largely influence to the work performance of the full-time faculty of the school as an educational organization and how does it bring to the workplace effectiveness and help attain higher levels of the school organization growth and excellence.

THEORETICAL FRAMEWORK

Emotional Intelligence - EQ - is a relatively recent behavioural model, rising to prominence with Daniel Goleman's Book (1995) called 'Emotional Intelligence'. The early Emotional Intelligence theory however, go back to the time of Darwin, who posited that emotional expression was essential for survival (McPheat, 2010) and later on, it was originally developed during the 1970s and 80s by the work and writings of psychologists Howard Gardner (Harvard), Peter Salovey (Yale) and John 'Jack' Mayer (New Hampshire). EQ principles provide a new way to understand and assess people's behaviours, management styles, attitudes, interpersonal skills, and potential which is increasingly relevant to organizational development and developing people.

Goleman further state that behaviour is based on consideration of more appropriate options. Our emotions have a 'wisdom' of their own that we should learn to use more, particularly in terms of the intuitive sense they offer.

Emotional Intelligence links strongly with concepts of love and spirituality: bringing compassion and humanity to work, and also to 'Multiple Intelligence' theory which illustrates and measures the range of capabilities people possess, and the fact that everybody has a value.

The EQ concept argues that IQ, or conventional intelligence, is too narrow; that there are wider areas of Emotional Intelligence that dictate and enable how successful we are. Success requires more than IQ (Intelligence Quotient), which has tended to be the traditional measure of intelligence, ignoring essential behavioural and character elements. We've all met people who are academically brilliant and yet are socially and inter-personally inept. And we know that despite possessing a high IQ rating, success does not automatically follow (McPheat, 2010).

Different approaches and theoretical models have been developed for Emotional Intelligence. This summary article focuses chiefly on the Goleman interpretation.

The Emotional Intelligence Competencies Framework

Personal Competence

1. Self-Awareness: Emotional awareness: Recognizing one's emotions and their effects. People with this competence: Know which emotions they are feeling and why; Realize the links between their feelings and what they think, do, and say; Recognize how their feelings affect their performance; Have a guiding awareness of their values and goals.

Accurate self-assessment: Knowing one's strengths and limits. People with this competence are:

Aware of their strengths and weaknesses; Reflective, learning from experience; Open to candid feedback, new perspectives, continuous learning, and self-development; Able to show a sense of humor and perspective about themselves.

Self-confidence: Sureness about one's self-worth and capabilities. People with this competence: Present themselves with self-assurance; have presence; Can voice views that are unpopular and go out on a limb for what is right; Are decisive, able to make sound decisions despite uncertainties and pressures.

2. Self-Regulation

Self-control: Managing disruptive emotions and impulses. People with this competence: Manage their impulsive feelings and distressing emotions well; Stay composed, positive, and unflappable even in trying moments; Think clearly and stay focused under pressure.

Trustworthiness: Maintaining standards of honesty and integrity. People with this competence: Act ethically and are above reproach; Build trust through their reliability and authenticity; Admit their own mistakes and confront unethical actions in others; Take tough, principled stands even if they are unpopular.

Conscientiousness: Taking responsibility for personal performance. People with this competence: Meet commitments and keep promises; Hold themselves accountable for meeting their objectives; Are organized and careful in their work.

Adaptability: Flexibility in handling change. People with this competence: Smoothly handle multiple demands, shifting priorities, and rapid change; Adapt their responses and tactics to fit fluid circumstances; Are flexible in how they see events.

Innovativeness: Being comfortable with and open to novel ideas and new information. People with this competence: Seek out fresh ideas from a wide variety of sources; En; certain original solutions to problems; Generate new ideasTake fresh perspectives and risks in their thinking.

3. Self-Motivation

Achievement drive: Striving to improve or meet a standard of excellence. People with this competence: Are results-oriented, with a high drive to meet their objectives and standards; Set challenging goals and take calculated risks; Pursue information to reduce uncertainty and find ways to do better; Learn how to improve their performance.

Commitment: Aligning with the goals of the group or organization. People with this competence: Readily make personal or group sacrifices to meet a larger organizational goal; Find a sense of purpose in the larger mission; Use the group's core values in making decisions and clarifying choices; Actively seek out opportunities to fulfill the group's mission.

Initiative: Readiness to act on opportunities. People with this competence: Are ready to seize opportunities; Pursue goals beyond what is required or expected of them; Cut through red tape and bend the rules when necessary to get the job done; Mobilize others through unusual, enterprising efforts.

Optimism: Persistence in pursuing goals despite obstacles and setbacks. People with this competence:

Persist in seeking goals despite obstacles and setbacks; Operate from hope of success rather than fear of failure; See setbacks as due to manageable circumstance rather than a personal flaw.

Social Competence

4. Empathy: Sensing others feelings and perspective, and taking an active interest in their concerns. People with this competence: Are attentive to emotional cues and listen well; Show sensitivity and understand others' perspectives; Help out based on understanding other people's needs and feelings.

Service orientation: Anticipating, recognizing, and meeting customers' needs. People with this competence: Understand customers' needs and match them to services or products; Seek ways to increase customers' satisfaction and loyalty; Gladly offer appropriate assistance; Grasp a customer's perspective, acting as a trusted advisor.

Developing others: Sensing what others need in order to develop, and bolstering their abilities. People with this competence: Acknowledge and reward people's strengths, accomplishments, and development; Offer useful feedback and identify people's needs for development; Mentor, give timely coaching, and offer assignments that challenge and grow a person's skills.

Leveraging diversity: Cultivating opportunities through diverse people. People with this competence: Respect and relate well to people from varied backgrounds; Understand diverse worldviews and are sensitive to group differences; See diversity as opportunity, creating an environment where diverse people can thrive; Challenge bias and intolerance.

Political awareness: Reading a group's emotional currents and power relationships. People with this competence: Accurately read key power relationships; Detect crucial social networks; Understand the forces that shape views and actions of clients, customers, or competitors; Accurately read situations and organizational and external realities.

5. Social Skills

Influence: Wielding effective tactics for persuasion. People with this competence: Are skilled at persuasion; Fine-tune presentations to appeal to the listener; Use complex strategies like indirect influence to build consensus and support; Orchestrate dramatic events

to effectively make a point.

Communication: Sending clear and convincing messages. People with this competence: Are effective in give-and-take, registering emotional cues in attuning their message; Deal with difficult issues straightforwardly; Listen well, seek mutual understanding, and welcome sharing of information fully; Foster open communication and stay receptive to bad news as well as good.

Leadership: Inspiring and guiding groups and people. People with this competence: Articulate and arouse enthusiasm for a shared vision and mission; Step forward to lead as needed, regardless of position; Guide the performance of others while holding them accountable; Lead by example.

Change catalyst: Initiating or managing change. People with this competence: Recognize the need for change and remove barriers; Challenge the status quo to acknowledge the need for change; Champion the change and enlist others in its pursuit; Model the change expected of others.

Conflict management: Negotiating and resolving disagreements. People with this competence: Handle difficult people and tense situations with diplomacy and tact; Spot potential conflict, bring disagreements into the open, and help deescalate; Encourage debate and open discussion; Orchestrate win-win solutions.

Building bonds: Nurturing instrumental relationships. People with this competence: Cultivate and maintain extensive informal networks; Seek out relationships that are mutually beneficial; Build rapport and keep others in the loop; Make and maintain personal friendships among work associates.

Collaboration and cooperation: Working with others toward shared goals. People with this competence: Balance a focus on task with attention to relationships; Collaborate, sharing plans, information, and resources; Promote a friendly, cooperative climate; Spot and nurture opportunities for collaboration.

Team capabilities: Creating group synergy in pursuing collective goals. People with this competence: Model team qualities like respect, helpfulness, and cooperation; Draw all members into active and enthusiastic participation; Build team identity, esprit de corps, and commitment; Protect the group and its reputation; share credit.

The Research Model

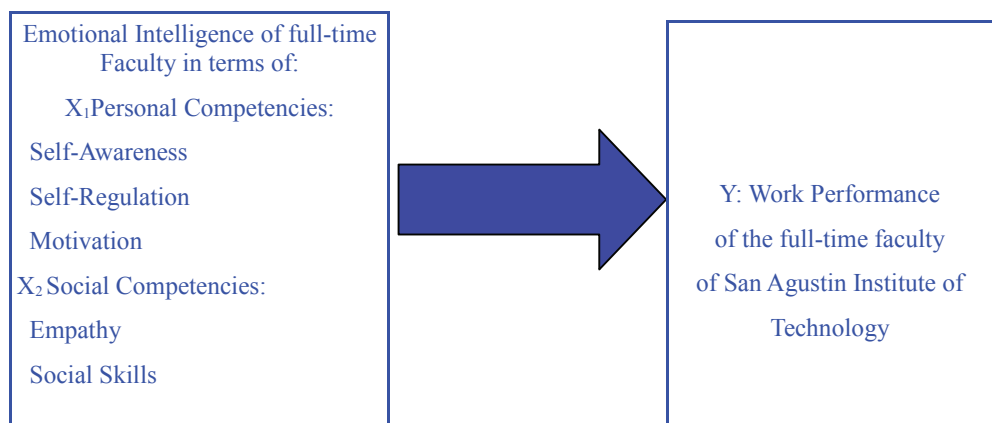


Figure 1
Schematic Presentation of the Study

Figure 1 presents the research model showing the interaction of the variables of the study: The emotional intelligence which were categorized into two approaches. First, personal competencies and second, social competencies.

From the previous discussions, the EQ concept argues that IQ, or conventional intelligence, is too narrow; that there are wider areas of Emotional Intelligence that dictate and enable how successful we are. Success requires more than IQ (Intelligence Quotient) according to the study of McPheat (2010). According to him, "We've all met people who are academically brilliant and yet are socially and inter-personally inept. And we know that despite possessing a high IQ rating, success does not automatically follow".

Thus, emotional intelligence of the full-time faculty in terms of personal and social competencies are measured on how it will have a significant implication to their work performance.

Hypotheses Development

The following are the research hypotheses:

Hypothesis 1: There is a significant differences on the personal competencies and work performance among the grade school, high school and college full-time faculty of San Agustin Institute of Technology, school year 2010-2011.

Hypothesis 2: There is a significant differences on the social competencies and work performance among the grade school, high school and college full-time faculty of San Agustin Institute of Technology, school year 2010-2011.

Hypothesis 3: There is a significant implication on the personal competencies and work performance of the full-time faculty of San Agustin Institute of Technology.

Hypothesis 4: There is a significant implication on the social competencies and work performance of the full-time faculty of San Agustin Institute of Technology.

under the Diocese of Malaybalay, supervised under the Bukidnon Association of Catholic School (BUACS) managed by the Missionary Congregation of Mary (MCM) Sisters.

There were three groups of respondents in this study. The first group were the seven grade school full-time faculty while the second group were the twelve high school full-time faculty and lastly, the third group were the eleven college full-time faculty. Complete enumeration was employed in getting the samples of the respondents due to the actual limited numbers of full-time faculty.

There were two types of instruments used to complete the field survey approach. First, the Emotional Intelligence from Daniel Goleman's book on working with emotional intelligence (1999) while the second type was the work performance instrument adopted from the Human Resource Management book by Wright, et.al. (2005) and the self-made performance evaluation instrument of the school which is directly answered by the students, Direct Head and The School Directress (commonly known as Performance Rating of Teachers).

The one-way anova was used to determine the significant differences on the personal and social competencies and work performance of the San Agustin Institute of Technology full-time faculty in the grade school, high school and college department. On the other hand, simple regression was used to determine the implication of emotional intelligence in terms of personal and social competencies to the work performance of the full-time faculty of San Agustin Institute of Technology.

METHODOLOGY

This chapter presents the method of research employed in the study, the research approach. The research approach used in this study is the field survey.

The study was conducted in the sectarian institution, named: San Agustin Institute of Technology, situated in the center of Valencia City, Bukidnon, at the heart of Northern, Mindanao, Philippines. The school is

RESULTS

Table 1 presents the results of one-way Anova on the mean differences of both the personal and social competencies, and work performance of the full-time faculty when grouped by grade school, high school and college. It was found out that the results showed highly significant at .05 level of significance. Therefore, hypotheses 1 and 2 are accepted since the P-value is lower than .05 level.

Table 1. one-way Anova on the Personal and Social Competencies of the Sectarian Institution Full-time Faculty when grouped by Grade School, High School and College

Indicators	Personal Competencies			Social Competencies			Work Performance		
	Mean	F	P	Mean	F	P	Mean	F	P
Grade School	11.971	5.10	.013*	33.514	9.21	.001*	3.61	.23	.793
High School	12.392			33.575			3.55		
College	13.809			37.864			3.56		

* Significance at .05 level

Table 2 presents the regression analysis on the personal and social competencies to the work performance of the full-time faculty of the Sectarian Institution. Study revealed that personal competencies showed to have a significant implication to the work performance of the full-time faculty of San Agustin Institute of Technology where p-Value is .004 which is significant at .05 level. Therefore, hypothesis 3 is accepted.

On the other hand, social competencies showed to have no significant implication to the work performance of the full-time faculty of San Agustin Institute of Technology where p-Value is .062 which is greater than the .05 level of significance. Therefore, hypothesis 4 is rejected.

Table 2. Regression Analysis on the Personal and Social Competencies to the Work Performance of the Full-Time Faculty of San Agustin Institute of Technology

Variables	P-Value
X1 Personal Competencies	.004*
X2 Social Competencies	.062
S	0.2847
R-Square	30.3%
F	5.86

* level of significance at .05 level

DISCUSSIONS

The statistical results indicated that the college full-time faculty personal competencies, showed the following: have better emotional awareness; are able to determine their strengths and weaknesses; are able to learn from new experiences and considered their weaknesses as opportunities for self-improvement and development; and lastly, have better self-confidence. This means that they are able to lead self-succes which is also well explained in the writings of Singh (2010) that emotionally intelligent person is able to identify one's own feelings and to know the cause behind them thereby leading to self-success.

Moreover, the development of college full-time faculty personal competencies particularly the ability to manage feelings has been found to be important for success which is supported by the study of Cherniss (2000). Thus, they are able to infect the group, from the other full-time faculty department, named: grade school and high school, of their emotions and good feelings led to improve cooperation, fairness and overall group performance.

Observation showed that personal competencies have larger influence to the work performance of the full-time faculty of the school as an educational organization. The statistical result is very indicative that personal competencies of Daniel Goleman Emotional Intelligence plays a very vital role in influencing the work performance (Singh, 2010). Personal Competencies as an independent variables, explained 30.3% of variance to the work performance of the full-time faculty of San Agustin Institute of Technology. The consequences of the personal competencies positive transition of the full-time faculty were able to strengthen the bonds between the faculties. Helped each parties to establish trust and mutually based on the common interests, goals and a sense of mission, creating the necessary conditions for achievement of personal and the goals of the school.

CONCLUSION

There is a significant differences both on the personal and social competencies among the grade school,

high school and college full-time faculty of San Agustin Institute of Technology. The development of college full-time faculty personal competencies particularly the ability to manage feelings has been found to be important for institutional excellence. Thus, they are able to infect the group, of the other full-time faculty department, named: grade school and high school, of their emotions and good feelings and led to improve cooperation, fairness and overall group performance as a pathway to excellence.

It is concluded that Personal Competencies showed to have a significant implication and have larger influence to the work performance of the full-time faculty of the school as an educational organization. Therefore, there is a need to strengthen the personal competencies of the full-time faculty of the said Sectarian Institution in order to improve work performance. Thus, emotionally intelligent behavior addresses the basic issues for bringing the workplace effectiveness and helping attain higher levels of the school organization growth and excellence.

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Environmentally Responsible Individuals: Challenge to Sustainable Environmental-Friendly Management

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Abstract - The present study aimed to determine the awareness and source of information of students, faculty and staff of two private universities in the Philippines namely Wesleyan University-Philippines and John B. Lacson Maritime University-Molo, Iloilo City, about global environmental problems and their causes. The study focused on the respondents' acceptance and participation to community and school based environmental advocacies and programs regarding eco-friendly activities and initiatives. Specifically this study set forth the following objectives: (1) to describe the socio-demographic profile of the respondents; (2) to determine the awareness and source of information of the respondents on environmental problems and their causes ;(3) to determine the respondents' eco-friendly practices and activities; and (4) to determine acceptance and participation of the respondents to environmental-friendly advocacies and the factors that influenced their participation. The findings of this paper highlight the social aspect of environmental -friendly management by determining the factors that influenced the acceptance and participation of respondents to school and community based environmental advocacies and their individual eco-friendly initiatives. The researchers argued that this aspect

is no less important than the technical and economic aspects of environmental management. The findings also identify the areas of environmental management where academic institutions can exert influence and encourage and sustain participation from different sectors of the academic community.

Keywords - global environmental problems, eco-friendly activities, eco-friendly practices, school based activities, private universities in the Philippines

I. INTRODUCTION

Environmental management is a critical component of every nation's development efforts due to harsh and long-term effect of environmental damages to the nation's human and economic resources. In view of this, parallel efforts among international communities of experts, educators and environmentalists were exerted. They were convened and came up with symposiums and conferences that were translated into international agreements and protocols with the end goal of mitigating the effects of and arresting further environmental deterioration. The Copenhagen Climate Conference, Kyoto protocol, Montreal protocol, Research conferences on environmental management and eco-friendly

state legislations are but few proofs that the issue has long been escalated into global concern. However, globalizing efforts will be ineffective and unsustainable unless appreciation of the issue penetrates individual level. Several environmental management projects both in national and local levels failed due to lack of sustainable participation from the stakeholders who lacked informed appreciation of the relevance of these efforts. Participation from all sectors of society is indispensable; hence academic institutions are likewise expected to lead in environment –friendly advocacies. Being in the institution of learning, it is expected that students, faculty and staff are more aware and appreciative of environmental issues and advocacies or at least initiate individual eco-friendly practices. This paper assesses the awareness and source of information of students, faculty and staff of two private universities in the Philippines namely Wesleyan University-Philippines and John B. Lacson Maritime University-Molo, Iloilo City, about global environmental problems and their causes.

Acosta study challenged the academe and other agencies to be more aggressive about measuring the efficacy of program and policies on a range of environmental concerns [1].

Study of Tan strongly cited that environmental education is a tool in creating the needed change. Mitigation is identifying the cause of the changing condition. After identification of the problem, action based on the cause is very important [2].

Thus, this study determined the acceptance and participation of community and school based environmental advocacies and programs towards practicing eco- friendly individual initiatives. In order to understand the present study, the specific questions were discussed in the next section.

II. STATEMENT OF THE PROBLEM

Specifically this study set forth to answer the following questions:

- (1) What is the socio-demographic profile of the respondents?
- (2) What are the sources of information of the respondents on environmental problems and their causes?
- (3) What are the respondents' eco-friendly practices and activities?
- (4) What are the acceptance and participation of the respondents to environmental-friendly advocacies and the factors that influenced their participation?

III. METHODOLOGY

This study employed the descriptive method with the use of questionnaire as the primary tool of data gathering. The questionnaire was designed to solicit quantitative and qualitative data [3].and was composed of 4 parts namely: (1) profile of respondents, (2) awareness and source of information on environmental problems and their perceived causes, (3) respondents' environmental-friendly practices and activities; and (4) acceptance and participation to community and school based environmental advocacies.

Respondents of the study were 60 tertiary students, 60 faculty members and 30 staff from the two respondent-universities. Appropriate statistics were employed in order to determine the factors that influenced the respondents' participation to environmental advocacies.

The data-gathering instrument was validated by the experts and Members of Research Committee of JBLFMU-Molo, Iloilo City, Philippines. Suggestions and recommendations of the experts and jurors were incorporated in the final administration of the instrument. Pilot tested was also conducted by the researchers to determine the problems on the contents and administration of the data-gathering instrument among the college students of maritime university in the Philippines [4], [5], [6].

IV. RESULTS

The results of this study are the following:

- (1) The profile of the respondents was 60 (40%) faculty members from private universities, 30 (20%) staff (non-teaching) and 60 (40%) college students.

TABLE 1
Profile of the Respondents

Category	Frequency	Percentage
A. Entire Group	150	100
B. Students	60	40
C. Faculty Members	60	40
D. Staff	30	20

- (2) The major environmental problems as perceived by the respondents were the following: pollution such as water, noise, land, and air (95, 64%), the second in rank was global warming (29, 19%), and the last was garbage/waste problem (26,17%). The sources of the information of these problems were: media (48, 32%), personal observation (42, 28%), family members (22, 15%), school teachers (20, 13%), and friends (18, 12%). The causes of the environmental problems are natural and inevitable occurrences (123, 82%) and man's act of greediness (27, 18%). Data are shown in Tables 2, 3, and 4.

TABLE 2
MAJOR ENVIRONMENTAL PROBLEMS PERCEIVED BY THE RESPONDENTS

Category	Frequency	Percentage
A. Pollution such as water, noise, land, and air	95	64
B. Global Warming	29	19
C. Waste Garbage/Waste problem	26	15
D. Total	150	100

TABLE 3

SOURCES OF ENVIRONMENTAL PROBLEMS PERCEIVED BY THE RESPONDENTS

Category	Frequency	Percentage
A. Media	48	32
B. Personal Observation	42	28
C. Family Members	22	15
D. School Teachers	20	13
E. Friends	18	12
F. Total	150	100

TABLE 4

CAUSES OF ENVIRONMENTAL PROBLEMS PERCEIVED BY THE RESPONDENTS

Category	Frequency	Percentage
A. Natural and Inevitable Occurrences	123	82
B. Man's act of greediness	27	18
C. Total	150	100

(3) Respondents' eco-friendly practices and activities are the following: (a) tree planting (71, 47%), (b) solid waste management information drive (41, 27%), (3) energy conservation (30, 21%), and (4) reduce, reuse, and recycle (RRR) campaign (8, 5%).

(4) Majority of the respondents accepted and participated to environmental-friendly advocacies (138, 92%) and only few (12, 8%) of the respondents were not involved. The factors that influenced their participation are the following: (1) "it is everybody's responsibility to save the environment" (92, 61%), (2) "help in saving our environment" (30, 20%), and (3) concern with the welfare of the future generation (28, 19%).

V. CONCLUSIONS

Based on the results of the study, the following conclusions were advanced: (1) Majority of the respondents belonged to the faculty and student sectors from private universities, few were staff members; (2) The major environmental problem as perceived by the respondents was pollution such as water, noise, land, and air; (3) The major respondents' eco-friendly practice and activity was tree planting; (4) Majority of the respondents accepted and participated to environmental-friendly and the major factor that influenced their participation [7], was "it is everybody's responsibility to save the environment" [8], These factors were included in framing concepts on "Sustainable Environmental-Friendly

Management" among environmentally responsible individuals of the society [9], [10], [11] -[18].

VI. RECOMMENDATIONS

Based on the results and conclusions of the present study, the following recommendations were advanced: (1) Other sectors of the society shall be included in the attempt to preserve and protect the environment; (2) Water, noise, land, and air pollution shall be given priority in addressing environmental problems; (3) education-information and re-orientation shall be included also in the eco-friendly activities; (4) concern of the LGUs and other stakeholders shall be considered in determining the factors that influenced participation in any environmental activities; (5) Parallel environmental-studies are recommended to determine other factors that are vital to the "sustainable environmental-friendly management" of the Earth's environmental resources.

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Lived Experiences and Lessons Learned: The Case of Seven Effective School Leaders in the Philippines

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Abstract— This phenomenological study delved on the lived experiences of seven effective school leaders in the Philippines. The seven school leaders / key informants were selected through purposive sampling considering the following inclusion criteria: must be a school head of a college or university from the different regions of the Philippines; leads / manages at least 500 subordinates; recipient of outstanding award in school leadership; and have been in the administrative post for at least 7 years. The systematic investigation made use of a battery of questions inquiring on personal, leadership skills and leadership practices attributes. There were 15 questions sequenced from a macro- point of inquiry “How were you able to turn the wheel in the right direction?” After which, a free flowing discussion on the experiences of the informant followed based on the thematic interview process. The critical appraisal of the differentiated responses and the emerging patterns were identified and supported by literature which helped bring together all the ideas and the lived experiences of the informants. Objective thematic analysis was employed using the “identify – analyze – synthesize - re-conceptualize” method. The school leaders / informants were also requested to engage in feedback analysis. The self-acknowledged comments were incorporated in the critical appraisal. From the holistic view of shared lived experiences which was critically appraised and thematically analyzed emerged the comprehensive picture that school leadership is a both social mission and a social responsibility.

Keywords— effective school leaders, lived experiences, research hub, social mission, social responsibility

INTRODUCTION

School Leadership is a gift. It may also be regarded as a very crucial task and perhaps, the most complex gift of social responsibility. The roles of school leaders are multifaceted. Undoubtedly, they are the key figures behind the schools’ success or the opposite, failure.

This qualitative inquiry utilizing phenomenological approach is a textual description of the lived experiences of effective school leaders in the Philippines. As middle level managers, the researchers come in constant communion with school leaders, particularly during seminars, investitures, planning sessions, work-shops and conferences. Hence, the

researchers have been in the environs of the institutional pillars of educational leadership.

A Chinese proverb states that: “to know the road ahead, ask those coming back” (as cited in Stone, 2006, p. 245). Relating to the context of the proverb, and as articulated in the works of Goldsmith, Kaye and Shelton (2010) and Oliver, Church, Lewis, and Desroisiers (2009), it is believed that novice leaders will certainly learn from the administrative experiences of senior school leaders. It is in this light that the qualitative inquiry was conceptualized.

STATEMENT OF PURPOSE

The thrust of this study was to create a narrative on the lived experiences of seven (7) effective school leaders from the various regions in the Philippines. The outcome of which was a synecdoche of the critically appraised lived experiences of the Filipino school leaders and their successful leadership based on the emerging themes.

SCOPE AND LIMITATIONS

This study was limited to the description of the lived experiences of the 7 school leaders / key informants that the researchers came across in seminars and conferences they attended from 2005 to 2010. The data were recorded and kept during the times that the researchers were attending together either as participants or resource speakers in seminars, work-shops and research conferences. The information gathered through field notes were kept and later written in continuous methodical narratives.

The following inclusion criteria were considered in the selection of the key informants: (a). must be school heads of colleges and universities in the different regions of the Philippines; (b). leads / manages at least 500 subordinates; (c). recipient of outstanding award in school leadership or awards in related fields; and (d). have been in the administrative post for at least 7 years in varied designations not necessarily in one position only; (e). a school head of either autonomous or deregulated school from the 17 regions in the Philippines; and

(f). a recipient of leadership or related recognitions and / or awards.

There research instrument consisted of 15 questions. These questions were asked in the form of a thematic interview process that started from a macro - point of inquiry, “*How were you able to turn the wheel in the right direction?*” After which, a free flowing discussions followed where questions were asked in no particular order. Through thematic analysis and critical appraisal of the differentiated responses supported with literature review and related readings, the outcome of the study was educed - the paradigm of effective school leadership as defined by Filipino school leaders

SIGNIFICANCE OF THE STUDY

Meeting special people like renowned school leaders are worth capturing in photographs. Like pictures they preserve a lot of good memories. School leadership, like a picture, whether still or moving, shows many significant memories, lessons, mission, challenges, complexities, ambition, sincerity, compassion, success or perhaps even failure. Their lived experiences and the lessons learned from the lived experiences of the seven Filipino school leaders are leadership accomplishments that readers of this study may learn from and likewise, for future school leaders as well, to ponder or emulate.

METHODOLOGY

This qualitative inquiry utilized the phenomenological approach to explore the lived experiences of the seven school leaders / key informants of the study. Data gathering was conducted as simple as asking questions in a very casual manner and noting down responses. The school leaders / key informants were selected through purposive or judgmental sampling

The seven key informants were identified from among a substantial number of school leaders whom the researchers came across and interacted with during seminars and conferences from 2005 to 2010. These leaders from the different regions of the Philippines represented their respective institutions in national conferences, and when approached during the conference for the possibility of engaging them in a study on school leadership, signified their willingness to participate in the exercise.

The inquiry process was conducted by asking questions which inquired about the respondents’ personal, leadership skills and leadership practices - attributes that were emerging through the unedited responses from the 15 questions about school leadership. The questions were asked in no particular order, with the initial and primary question being: “*How were you able to turn the wheel in the right direction?*”

Results of the critical appraisal were categorized and summarized in terms of emerging themes. The themes were supported by literature. To avoid bias, objective thematic analysis was employed. Thematic analysis was described by Cohen, Manion and Morrison (2007), as a pragmatic inquiry that aims to identify data that relate and fit together in emerging patterns or themes. The themes or patterns surfaced from the informants’ stories and experiences, which were later brought together to form a common theme. From these common themes, the collective experiences shared by the school leaders were drawn into a comprehensive picture.

Recording of responses proceeded in a very simple manner – note taking. The responses were supported by observations and other attributes that cannot be seen in the transcribed documents. Textual descriptions were maximized in the entire journey of writing the narratives for the seven cases which followed the “**identify-analyze-synthesize and re-conceptualize**” pattern. From the emerging themes, a synthesis on effective school leadership of Filipino school leaders was formulated. Data analysis was primarily based on the frequency or number of times the occurrences responses and the substance of the responses as recorded from the one-on-one interviews.

RESULTS AND DISCUSSION

A. *Identifying Personal Attributes of School Leaders / Key Informants*

A look at the personal profile revealed that majority of the school leaders / key informants are female, with a mean age of 57.43, predominantly married, and holders of appropriate degrees: five Doctor of Philosophy (PhD) and the remaining two Doctor of Education (EdD). They were designated with the highest academic positions [at the time of the study]: President; Chief Executive Officer (CEO); Vice President; Vice President for Academic Affairs; and School Director. Profile data on the number of years of administrative experience revealed a mean of 16 years. The school leaders, however, were assigned in various administrative positions before their designation to the current post. Geographically, the school leaders hail from different regions of the country. They have served as administrators of their respective institutions for an average of 16 years. The school leaders were are handling an average of 714 subordinates at the time of the study. The schools were recognized by an authorized accrediting regulating body with statuses ranging from deregulated to autonomous. As expected, all informants have been recipients of school leadership awards and other awards related to current leadership positions.

To become a school leader anywhere else entails quite a number of outstanding qualities. The above personal characteristics and some salient attributes revealed from the responses that school leaders should be holders of appropriate academic degrees; had served in various administrative leadership positions which provided them enough experiences

as a leader; had received awards and recognitions as a manifestation of excellent and quality performance; administers recognized and accredited universities either autonomous or deregulated status, which suggest that their institutions met the criteria as regards to quality and excellence in education. The institutions represented also garnered very satisfactory to excellent ratings in 7-9 areas set by the Accrediting / Regulating Body recognized by the Federation of Accrediting Agencies of the Philippines (FAAP) and the Commission on Higher Education (CHED) - Philippines. The autonomous status is the highest recognition awarded to the applying institution which may be granted and enjoyed by the institution from 1 to 5 years, but which maybe taken back on reasonable grounds. From a review of the attributes of effective leaders, it became apparent that the position of a school leader is a designation earned from extensive experience through time.

The Philippines has 17 Regions, comprised of Regions I-XIII and the rest of the 4 regions are autonomous namely, National Capital Region (NCR), Autonomous Region of Muslim Mindanao (ARMM), Cordillera Administrative Region (CAR) and CARAGA Region. The schools of the 7 key informants were selected from the deregulated and autonomous schools in the 17 Regions of the country.

B. First Reflection: Leadership is About People

Leadership is the science of organizing and directing human efforts to control the forces and to utilize the materials of nature for the benefits of man. Leadership, as a social science, has developed solid theoretical frameworks that help weave together people to function properly and to cooperate for the attainment of a common purpose (Neumann, 2011).

According to five (5) of the key informants, *leadership is considered effective if and when school leaders are in control of their people and the activities they have to undertake*. From the analysis, it was deduced that the competence of a leader is defined by how well he or she puts things in their proper order for the best benefit of the organization. Thus competence reflects on how well subordinates perform their tasks toward the achievement of the organizational goal/s.

Back then, effective leadership refers to the *Key People* who make significant decisions and are held responsible for such decisions. Nowadays it is different. Leaders are now enjoining every member of the organization to meaningfully involve themselves in a consultative-participative management, such that the best decision is the most agreed upon by many.

Two of the key informants said that, " *leadership is about people-relationships. You cannot be a leader all alone. You have to have followers to be called one*". According to Yague in Montano (2007), school heads show skill and mastery of

managing their tasks, and command respect and confidence from their subordinates. Hence, if the school has to move forward, school leaders must be fully aware on how to use the instrument, their people, for advancement.

Leadership is a relationship. Konzes and Posner (1987) contend that love is a relationship between individuals who aim to take the helm and those who support who takes the helm. Through productive and cooperative relationships leaders to a great extent influence their employees and impact considerably their performance. Leadership, indeed, connects people in organizations.

As reiterated by the school leader-informants, *the key to advancement is proper management of subordinates; proper handling of people's feelings and emotions would mean a journey to your achievements as well. Trust and respect are the keys that can open many doors to organizational success*.

As regards to the roles of school leaders in the workplace, Robbins and Coulter (1996), mentioned that they are required to perform variety of interpersonal roles. The ability to work well with other people both individually and in group is a human skill. Dealing directly with people is an essential task. Managers who possess this human skill know how to communicate efficiently, motivate, lead and inspire enthusiasm and trust among people. Human skill is one of the three essential skills of school leaders, the other two are technical and conceptual skills.

In similar vein, Montano (2007) opined that school administration is a unique activity, differing greatly from business, military, hospital, and other varieties of administration, has largely given way to the idea that there is more that is common about the varieties of administration than just being different. The following are specifically related to responses of the key informants: a) the administrator must fulfill the goal of the organization, and b) the administrator must make use of other people in fulfilling these goals, not as if they were machines, but rather in such a way as to release their initiative and creativity.

Accordingly, these tasks suggest that school leaders' performance and their behaviors are related to the attainment of the institutional goals and behaviors related to the influencing of people should be differentiated. In the academic setting, for instance and just like other organizations, there are three (3) levels of positions from which people operate: the Top Level Management, the Middle Level Management, and the Rank and File. Note that the key informants were from the top level management. All these components of the management structure taken collectively contribute to the success of the organization.

However, all of the key informants were in unison in saying that, "*Leadership of people can be eclectic depending*

on the situation and conditions appropriate to the needs of the constituents [their opinion].” Needless to say, that there is no perfect management and there is no one best way to manage people (Hoy and Miskel, 1991).

C. Second Reflection: Leadership is About Power

The seven (7) school leaders were one in saying that, “there is no position without authority and there is no authority without responsibility. Once designated a position or as school head and eventually after signing a contract relative to the designated position is the power to execute your duties and operate, however it is clear the power is not absolute. There is no such thing as absolute power”.

Leaders are appointed or may simply emerge from within the group and that he can influence others to perform beyond the actions that formal authority dictates. The school leaders that are appointed have ability to influence because of the formal authority inherent in the position. Power in leadership which spawns influence is called charisma.

The responsibilities of leaders along with the authority attached to their designations made them confident and competent to translate the policies and regulations of their school organizations to actions [by virtue of appointment]. Effective leaders according to two (2) key informants are those school leaders who are successful in making the vision and mission of their schools realizable. Furthermore, successful leadership means interpersonal competence.

As noted, all the participating key informants were from schools that were either deregulated or the highest accreditation status. By autonomous, is meant that the institutions passed standards of quality and excellence in education. No wonder, the 7 key informants were effective school leaders per se.

Additionally, when asked how leaders formulate organizational goals to get ahead of their competition, the school leader – informants chorused a single word: research. The discussion about leadership and power culminated in a common consensus among the school leaders that research is the best way to make a connection between what is already known about teaching / teacher learning and educational leadership is through research. This frame of thinking among school leaders is supported in literature by Firestone and Riehl (2005).

Meanwhile, all seven school leaders / key informants believe that schools in the forefronts of their respective niches are those who utilize their maximum potentials for research. For this reason, the seven school leaders affirmed that they are staunch supporters of research in their institutions. For them the power of information is harnessed through research. Incidentally, all leaders are extremely familiar with the five

elements of information power as elucidated in Bacon (2011). All the seven school leaders recited the elements facilitated by the RADIO mnemonics: retrieval, access, dissemination, interpretation, organization. “Together and separately, these capabilities enable people to lead and influence others through the effective deployment of information” (Bacon, 2011, p. 155).

D. Third Reflection: Leadership is About Process

The seven key informants were one in saying that “leadership is a process of influencing and interacting. It is a cyclical process of highly related functions such as planning, organizing, leading, controlling and staffing”.

Leadership is about having a purpose and that purpose would be the end in mind. Planning is setting up a systematic structure on how things can be done in the organization. An effective plan is a design where a good leader and his followers can proceed, while organizing is creating harmony among people of the organization to bring into being the plan of the organization. Leading, on the other hand, is directing or influencing people to work toward a common purpose or goal and controlling is associated to regulating the organization particularly on the control of finances of the institution. Staffing is choosing the best people to man the different units of the organization by following valid criteria for the selection of qualified staff. The key informants agreed that the five leadership functions are vital to the advancement and success of the organization. Hence, every school leader should show mastery in the execution of these processes.

E. Fourth Reflection: Leadership is About Passion

For all the key informants, **leadership is about passion**. Passion, according to them, is a dedication of self to the organization they serve. They feel happy when their schools meet the expectations. They empathize with the schools when there is failure. Their love for work surfaced in the interview. They were serving and dedicating their efforts to the schools as if it were their own.

Passion taken in the positive sense [as there are negative definitions] implies a strong positive feeling that is deeply felt. It is characterized by the eagerness in the pursuit of something or the untiring desire to accomplish desired outcome. School leaders are passionate in their desire to serve the best they can for the success of the schools they relentlessly served. As two out of the seven key informants mused, “it is not the money or salary that matters, but service”

Some evidences about passion were cited: (a). during National Board Examinations of students of the different programs, school leaders cannot really find sound sleep and even prayed harder [harder than before] for the students to pass; (b). During natural calamities like typhoons, floods, earthquakes and others, they worried much for their schools

and students, the physical structures and other amenities; (c). During enrolment time, school leaders would like to see that the target number of students are met; (d). During accreditation time, school leaders truly support the process and worry much about the results; (e). During turbulences and conflicts between and among employees, school leaders were thinking of best interventions and directives that would engender resolution for only the best; (f). To safeguard the school name and status at all times; and many more.

The aforementioned points to the fact that leaders most of the time think about their people / subordinates. That thinking about the school is not thinking of the structure of the school alone, but more importantly the human organisms under the auspices of the school. However, everything else in the structure matters.

EIDETIC INSIGHTS

Re-conceptualizing from the concepts discussed, the key informants know what it means and what it takes to be a leader. Leadership for them is setting goals and expectations. Leaders have a vision of the ideal, and can articulate this vision with others. An effective leader is a person with a passion for a cause that is larger than they are. Moreover, a good leader has to have a purpose that is larger than or she is and the balanced personality and skills to put that purpose into action.

In this qualitative inquiry, it revealed that there are four emergent concepts that all of the 7 key informants concord; **People, Passion, Process and Power**. The **4Ps** and the interplay of the different reflections resulted to a vivid opinion that *leadership is a social mission and a social responsibility*.

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Sexting as Socio-Cultural Practice and Its Influence Among Filipino Youth: A Journey to Explore

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Abstract - In this present study, researchers explored the “sexting phenomenon” as a trend among young individuals in the two (2) universities, specifically, John B. Lacson Foundation University-Molo and Wesleyan University-Philippines. The study also focused on the influence of “sexting” as a socio-cultural practice among the Filipino youth. Sexting is defined as “the act of text messaging someone in the hopes of having a sexual encounter with them later; initially casual, transitioning into highly suggestive and even sexually explicit.” Sexting has become a fad nowadays and such practice brought about by technology has led a lot of Filipino youth to a certain situation beyond control. The respondents of this study were the college students who were familiar with “sexting” as phenomenal trend among Filipino youth. A researcher-made questionnaire was specifically made for this purpose and made use of both quantitative and qualitative modes of data interpretation. Quantitative data were subjected to appropriate statistical analysis to determine “sexting phenomenon” of the respondents. Qualitative data and information were derived from the written testimonies, insights, and recollection of the respondents regarding “sexting” as a socio-cultural practice.

Keywords – sexting phenomenon, text messaging, insight, transitioning, socio-cultural practice,

I. INTRODUCTION

The youth is the segment of the population that is more active in exploring and redefining the use of digital technology in unprecedented manner [1]. The expanding functionalities of today’s mobile phones like embedded

camera and 3G capabilities offers the youth numerous exciting activities to explore. Aside from calling and sending messages, teens and young adults have redefined the use of mobile phones and have gone as far as using them in their sexual interaction and exploration. The youth of this generation believe that they can do anything they want to do with their bodies and their phones is ultimately their business only, even to the extent of enjoying the privacy and freedom leading to sending sexually suggestive image and messages [2].

In USA, this practice known as “sexting” has caught the attention and concern of parents, teachers and law enforcers as significant number of teens and young adults use their cell phones to send sexually suggestive text messages and or access the internet to post nude or semi-nude photos and videos of themselves. This is despite the known legal, social and psychological devastating effects of such practice.

In an effort to understand the intermingling between sex and cyberspace, the National Campaign to prevent Teen and Unplanned Pregnancy commissioned a survey in 2008 in the United States among 1280 respondents of teens (13-19) and young adults (20-26). This study which was the first of its kind aimed at quantifying the proportion of teens and young adults that are sending or posting sexually suggestive text messages and images. Results showed that 20% of teens while 33% of young adults said they have sent or posted semi-nude or nude photos and videos of themselves, 86% of which through the use of cell phones; while 39% of teens and 48% of young adults have sent sexually suggestive messages. Seventy-five percent of teens and 71% of young adults

considered that such practice can have negative consequences yet they were doing it because of peer pressure and for fun and flirting.

Along with legal consequence, teens may also face social and psychological repercussions as cited in a study conducted by [3] enumerating the consequences of “sexting” such as: being judged or excluded by their peers, communities, and families; damaging academic, social, and employment opportunities; trust is broken when an image is forwarded without the creator’s consent and this brings psychological devastation among youth and young adults. The same study enumerated the reasons for “sexting” which include pressured by friends, trying to impress a crush, and response to sexual text messages received. Teens and young adults never think of the implications of how quickly digital information can spread via cell phone and Internet.

In case of the Philippines, which has the title of being the texting capital of the world with the youth as the forefront of this technology, the study of their texting culture cannot be underestimated. In the study of the changing lifestyle of the Filipino youth from 1970’s to 1990’s, noted a shift into a more permissive attitude on sexuality, however, this is not coupled with a shift in their sexual behaviour [4]. Nevertheless, she also found that youth are media-pliant and hence vulnerable to external influences whether good or bad. Therefore, in the context of recent breakthroughs in information technology coupled with shift in attitudes of Filipino youth towards sexuality, the researchers are interested to determine if the Filipino youth texting culture has to some extent evolved into “sexting” practice.

II. FRAMEWORK OF ANALYSIS

The Filipino youth today are more the products of mass media rather than their genes or school, or least of all, their homes and along with the mass media the advent of new information technologies –or time-space compressing technologies –reshaped the contours of youth culture [5]. The diminishing family influence amidst the rapid development in information technology like Internet and the more popular texting technology ushered new patterns of socialization [6].

McLuhan warned us of this consequence when he stressed in his classic work *Understanding Media* that men tend to focus on the obvious therefore largely missing the structural changes in our affairs that are introduced subtly, or over long periods of time. It is in this view that he introduced the world to his enigmatic paradox, “the medium is the message” [7].

III. OBJECTIVES

This study aimed at exploring the socio-cultural practice of sexting and its effects among Filipino youth. Specifically, the objectives of the study are the following:

1. To describe the profile of the respondents;
2. To determine if sexting is prevalent among the respondents;
3. To explore the reasons why the youth engage in sexting;
4. To explore the factors that drawn the youth towards sexting;
5. To identify the effects of sexting; and
6. To capture the opinions and views of the respondents about “sexting” as a practice.

IV. METHOD

The study employed descriptive method using both qualitative and quantitative approaches of data gathering. The data-gathering instrument was composed of 25 items of closed-ended and open-ended questions designed to gather information about the profile of the respondents; their ideas about sexting; its prevalence, how, why, causes and effects of such practice. It was administered to 80 college students from two private universities in the Philippines.

To verify the data from the instrument and further explore the sexting practice, the researchers facilitated two focus group discussions (FGD) held separately in the two respondent-institutions. Each group was composed of 8 members selected from the 80 respondents based on their response to the instrument that they have experienced sexting. This is to ensure that they can contribute to an in-depth analysis of sexting practice among Filipino youth. Members of focus group were also interviewed individually to obtain information which they cannot share with the group. This qualitative approach helped the researchers explored the sexting phenomenon as it is non-manipulative, non-controlling, and provides openness to whatever emerges [8].

V. RESULTS AND DISCUSSION

A. Respondents Familiarity with the Term Sexting

Result shows that 60% of the respondents never heard of the word sexting. Sexting is relatively a new term which is more popular in USA. Results of focus group discussions however showed that in the Philippines, this practice is commonly called as “sex on phone” or “SOP”.

B. Source of Information about “Sexting”

The respondents’ sources of information about “sexting” are the following: (1) friends (32, 40%), (2) classmates (24, 30%), (3) boardmates (8, 10%) and TV/cell phones/computers (8, 10%), and (4) professors (4, 5%) and mothers (4, 5%). This means that the Filipino teenagers get information on “sexting” more from their friends and classmates than their teachers/mothers. This is consistent with the findings of other

studies that topics about sex are seldom discussed in the Filipino home. Hence, the youth rely with the information and or misinformation they get from their peers.

C. Respondents idea about "Sexting"

Respondents' idea of "sexting" is sending sexual text messages (National Center for Missing and Exploited Children, 2009; Celizic, 2009) or exchanging of sexually arousing and horny text messages. However, some of the teenagers have idea that sexting is also "sex on phone" (f=20%, R=2). Still, some of the Filipino teenagers have no idea of the term "sexting" (f=10%, R=3).

This shows that although majority of the respondents were not familiar with the term "sexting", they have an idea of how it is done which they commonly called as "sex on phone".

D. Distribution of the Respondents as to whether they have Received or Sent Sexting Messages

Result shows that 61% and 43% of the respondents have received and sent "sexting" messages respectively.

It can be noted that while more than half received sexually explicit messages, majority have not sent similar messages as some respondents were just ignoring such kind of messages, nevertheless, this finding shows that "sexting" is prevalent among the respondents.

To understand fully how the practice is done, an interview with a member of the FGD revealed that "sexting" often start with casual conversation transitioning to exchange of sexually explicit messages or phone calls. The "sexting" individuals are verbally describing what is being done in an actual sex. Hence, he argued that at least one of them has previous experience of actual sex or at least exposure to pornographic and obscene materials.

Participants of FGD claimed that with marketing strategies of several mobile phone service providers like unlimited text and call makes mobile phones an affordable medium for youth not only to communicate but also to explore sexually.

E. "Sexting" Messages the Respondents Received

It shows that all respondents (49) who claimed to have received sexting messages received sexually suggestive, flirty and horny text messages. This is followed by sexually suggestive phone calls (24); nude, semi-nude images or photos of someone they do not know (21) and the last in rank is nude, semi-nude images and photos of someone known to them.

When asked about their reaction after receiving such message, participants of the focus group claimed that they

were initially shocked and tried to ignore the sender, however due to pressure from the sender who usually was known to them, coupled with curiosity, they were provoked to respond and exchange the same message. Hence, the initial feeling of shock and inhibitions eventually fades. The more they engage in it, the more comfortable they become in doing it.

F. "Sexting" Messages the Respondents Sent through Cell phones

Data from show that "sexually suggestive, flirty and horny text messages" (30) is also the most prevalent type of message the respondents were sending followed by "sexually suggestive phone calls", (16); "nude, semi-nude images or photos of someone they know", (10); and "nude, semi-nude images or photos of someone they do not know", (4).

This finding is similar to the results of the 2008 survey of teens and young adults in USA that there were more respondents who were sending sexually explicit messages than those sending nude or semi-nude images. However, although less prevalent, it is still alarming to discover that there were respondents who were receiving nude or semi nude images of someone known to them. Such practice is very dangerous as once a digital nude image is sent, they lose control of what happens to it next.

G. Relationship of Respondents with the Sender of the Message

The result shows that of the 60 respondents who received sexting messages, 36 or 60% knew who the sender was while 24 or 40% answered they didn't know the sender. Among these 36 respondents, 17 (47%) answered the sender was their friend, 13 (36%) said boyfriend/girlfriend while others answered text mate (F=4; 11%) and enemy (F=2; 6%).

It is interesting to note that almost half of the respondents who received "sexting" messages received them from friends. It can be gleaned from these findings that youth today have tendency to have casual sexual exploration even with those whom they are not intimately related.

H. Reasons why Respondents Practice Sexting:

Data from the instrument showed several reasons why the respondents engaged in sexting practice and these include: to have fun, to combat boredom, to express sexual desire when getting naughty, to satisfy curiosity, to try sexting and if one does not experience it, he/she is not fully human, to flirt and to enjoy and to meet up with someone who is open for this practice. Results of FGD confirmed this finding and participants further added that youth of today engaged in sexting because it is the easiest, most accessible and affordable way to explore sexually. As long as the sexting practice will not end up in actual meeting which they called "eyeball", they claimed that is harmless. They also considered

sexting as “in” and “hip”. This behavior and attitude was further reinforced when they know of some friends who are also doing the same.

It can be gleaned from these responses that those who are practicing “sexting” exhibit not only a shift towards a more permissive attitude on sexuality but also a shift towards a relativist and consequential views of judging the propriety of an act. Since majority of youth considered that sexting is a norm in youth’s culture, and if it will not result to damaging consequences then, it is right.

I. Factors that Influence the Respondents to Engage in Sexting

All participants in the focus group discussions (FGD) considered “sexting” as a result of more liberal attitudes of youth towards sexuality and the availability of technological means to explore. None has considered that it is a function of technology alone. In terms of attitude on sexuality, they considered the youth of today’s generation as different from their predecessors; they are more open to this practice, more curious about sex, and more sexually aggressive and daring. However they claimed that curiosity about sex is normal among youth across culture and generation although there is variation in the ways by which this curiosity is satisfied depending on the availability of means in their environment. Today technological innovations are easily accessible along with different media to which they are exposed to. They stressed that these media including movies, magazines, video CD’s and DVD’s, TV shows, and other similar materials which are portraying sexual permissiveness influence them. This is reinforced by influence of peers and the diminishing influence of family during adolescent stage. A separate interview of two members in the FGD admitted that prior to practicing “sexting”, they had been exposed to different obscene materials like videos, magazines and also have previous experience of “sex on chat”, a practice that proliferate in many internet chat rooms nowadays.

The above results is consistent with the findings of Meneses that today’s youth get higher exposure to sex through internet, magazines, TV shows, movies and other media than decades ago [9]. This higher exposure to different media without any corresponding increase in information on how to handle them is causing adverse effect on youth’s attitude towards their sexuality. Likewise, this is paralleled with the findings of Ogena who posited that with decreasing parental influence, coupled with greater sexual awareness and curiosity, a media-pliant youth culture has emerged [10].

J. Effects of Sexting

Data showed that more than half ($F=45$, 56%) of the respondents considered that sexting have no benefits while ($F=35$, 44%) considered that sexting have benefits. As to whether sexting has damaging effects, 55 or 69% of the

respondents answered NO while only 25 or 31% answered YES.

It is interesting to note that while majority of the respondents considered that “sexting” has no benefits, majority also considered it to have no damaging effects.

In terms of damaging effects, data from the instruments include: addicting, ending up relationships with girlfriend/boyfriend when doing “sexting” with persons other than them; misunderstanding with and reprimand from parents, may injure reputation; spend sleepless nights “sexting” thus adversely affecting studies. “Sexting” can also make one a sex addict; can ruin one’s personality and virginity; hinders one to focus on what he/she is doing; can lead one to commit crime of rape; and will be more wild and lustful and can make one psychological maniac.

From the results of FGD, the following were identified as damaging effects of “sexting”: can be addictive; can lead eventually to actual sex when the sexting individuals decided to meet up hence there will be higher incidence of premarital sex, unwanted pregnancies, early marriage and sexually transmitted diseases; girls can also be raped when they decided to meet up with someone they just met online. Only one of the participants in FGD and none from the total respondents thought of the risk that once digital image is sent they lose control on what will happen to it next.

It can be deduced from the above findings that the respondents are well aware of the potential damaging effects of sexting, yet it is alarming that despite this awareness, some are still taking the risks as what Meneses had observed, youth are risk takers and pleasure seekers with sex as one of the array of behavior which they engage in [11].

K. General View of the Respondents about Sexting

The respondents were asked to give their opinions about “sexting” as a practice. Responses were collated and as presented in this study, they were grouped into affirmative and negative views. On the affirmative side, “sexting” is considered as normal and interesting yet shall not be taken seriously as it is just one way of having fun, enjoying life to the fullest and interacting with the opposite sex.

On the negative side, “sexting” is considered as against the standard of morality and is bad and inappropriate for the youth. It is tantamount to destroying oneself especially among females. It can also be destructive to one’s study and should not proliferate or more youth being weak will be tempted to try it.

It can be gleaned from this finding that the respondents are divided in their general views of “sexting”. It seems that some of them are judging the propriety of an act based on its consequence. If sexting is giving joy and pleasure, then it is

right. This line of reasoning is somehow alarming as this indicates a deteriorating value system of a segment of the youth population.

It is good to note however that there are those who still believed that “sexting” is against the standard of morality and potentially damaging.

VI. CONCLUSIONS

After obtaining the data and analyzing the qualitative results, the researchers arrived at the following conclusions:

(1) Only few Filipino youth were familiar with the word “sexting”, however most have ideas that it is sex through texting which they heard from their friends, classmates, and board mates. They called such practice as “sex on phone”.

(2) Sending sexually suggestive and horny messages is the most prevalent sexting practice.

(3) Sexting occurs between individuals who are known to each other.

(4) Self-gratification, curiosity and peer pressure are the reasons why youth engage in sexting.

(5) Different media shaped the youth’s attitude towards sexual permissiveness, and along with peer pressure and affordable texting technology, the youth are driven to sexting.

(6) Youth engaging in sexting exhibit not only a shift towards more permissive sexual attitude but also a shift towards relativist and consequential views of morality.

(7) The youth are divided in their views about sexting but majority consider such practice as normal among them.

VII. RECOMMENDATIONS

Based from the results and conclusions of the study, the researchers have advanced the following recommendations:

(1) Continuous education on “sexting” shall be the thrust of the teachers, parents, and counselors.

(2) Since the information on “sexting” came from friends, classmates and board mates, it is also advised that parents should know the close companions of their children and their activities.

(3) Parents should also be informed about “sexting” and the behaviour of the Filipino youth towards this trend so they will be guided on how they can help their children understand the danger of such practice.

(4) Parents should foster a strong relationship with their children, keep communication line open, and inculcate in them a wholesome and healthy attitude towards sexuality.

(5) The government shall strictly implement existing laws against proliferation of pornographic and obscene materials as these were found to be influential in shaping youth’s view of sexuality.

(6) Further studies on sexting specifically on its correlation with different internal and external factors are recommended.

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Cluster analysis in the determination of Widyatama University Students Segments

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Abstract - One of the important thing in the company's activities is marketing strategy. Marketing strategy could be developed through the process of segmenting – targeting – and positioning. This research is part of a development strategy based on Segmenting - Targeting – and positioning process. This study examines the segments that can be used as a base by a university, especially the University of Widyatama in determining the main segment(s), target and position of the university. Through cluster analysis, this research showed that the segment of Widyatama University could be divided into four profile segments, namely: the first profile is consists of variable age, semester, the domicile, and sibling; the second profile is consists of gender; the third profile consists of department, and the fourth profile is consists of parents job status. This research shows that the institution, in this case Widyatama University should considers the 4 segments to make marketing policies, such as product (curriculum), promotion and price. For example, the curriculum should considers gender, and promotion should considers siblings and parents job. The only widyatama students as respondents is a limitation of this research, it should be validate into other university students as respondents.

Keywords: segmenting, targeting, positioning, cluster analysis

I. Introduction

Zulganef and Garniwa (2007) shows the condition of Widyatama University brand awareness in perception of University student candidates, It is the third lowest position from seven other private university that observed in west java. On the other hand, the applicants who are propose to study a Widyatama university in last three years shows growing, Table 1 shows the growth. Admission form sold was increase from year to year since 2006/2007 academic period to 2008/2009 academic period. The university has sold 1956 admission forms in 2006/2007, in 2007/2008 the sold increase into 2215 expemplars, and in 2008/2009 had sold 2504; the average increasing is around 13%. Tabel 1. Student candidates Interest growth to widyatama university Quantity 06/07 07/08 08/09

Admission Form Sold in 1956 is 2215 2504

Tabel 1. Student candidates Interest growth to widyatama

Quantity	06/07	07/08	08/09
Admission Form Sold	1,956	2,215	2,504

The second phenomenon that can be point out as a background of this research is the recovery of economic conditions in Indonesia after the 1997 monetary crisis that resulting 3328 family which have a prosperity in between

US 5-20 billion. And other family that have a prosperity of 20-100 billion estimated is 167 families, 80% living in Jakarta, 12,6% in Surabaya, 3,3% in Bandung and 4,1% spreading in other region in Indonesia. All this family categorized as High Net Worth Individual (HNWI), in year of 2006 the growth of this group raised 16% and Indonesia listed as the third highest growth country in Asia Pacific after Singapore and India.(Source: Internet article/Wealth Indonesia.com) The changing of economic into better condition indicated by the growth of group that have a wealth in high scale in Indonesia (High Net Worth Individual). It is showed the probability of increasing demand in education in the future. Generally, the people income has a correlation with education demand; it means that the increasing in income will affect the demand of better education.

The increasing of the study demand that showed by the increasing applicant to study in widyatama university, and the economic growth after the crisis showed great opportunity for widyatama university to create the marketing programs more specifically, and more clearly, in term of the creation of concepts that come initially from understanding market segment(s), so that concepts could increasing the interest of student candidates to study in widyatama university. One way to understanding the student is treated them as customers that has some segments that are different in interest or some other conditions. And one way to understand the customer segments are through profiling. Segmenting their profile is known as segmentation (craven 2003, Kotler and Keller,2009)

Based on the phenomenon above, the purpose of this research are:

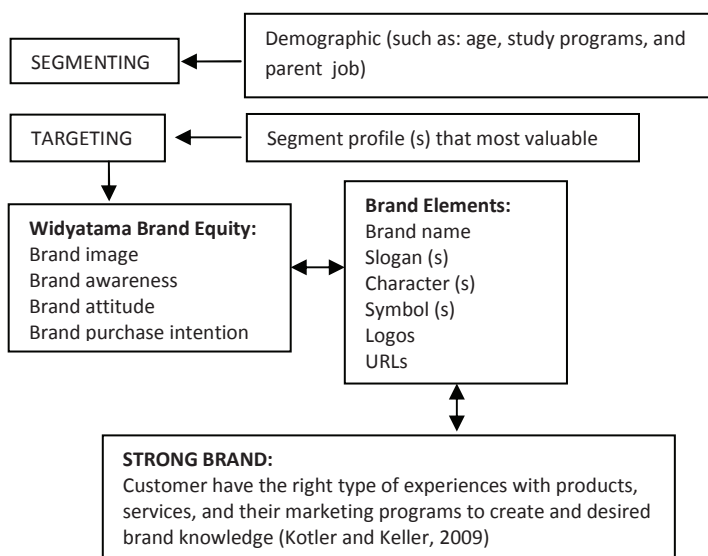
1. Identified the existing segments in Widyatama University consumer, in this case is the student of Widyatama University. (segmenting)
2. What kind of segment(s) that can be choose as the target(s) of Widyatama University? (targeting)
3. What kind of brand elements that influenced and associated with segment(s) profile of widyatama university?

II. Literature Review

Craven (2003) expressed that one of the first step (move) to expand market is understand the existing market segments (segmenting), then choose one or more segment(s) (targeting), and finally is positioning the product according to the chosen segment(s) target. Additionally, one of company programs to position the product in consumer mind is brand imaging, so that the company brand will be formed in consumer mind. Brand imaging is created through understanding brand equity firstly since brand image is a part of brand equity. The other part of brand equity is brand awareness, brand attitudes, and brand purchase intentions. The four elements of brand equity can help organizations to positioning their company or brand in market.

Paradigm that used to elaborates widyatama university brand image development in order to make student candidates interesting to study at widyatama university is shows at figure 3. The Paradigm is started from the understanding of market segments of widyatama university student through the measurement of the value and lifestyle, usage and attitudes through the university. It is helpful in creating customer based - brand equity. Afterward the segmentation will put as a basic to setting the target (s) that suitable with the vision and mission of widyatama university.

Figure 1. the paradigm of research



Based on the measurements of the value and lifestyle, usage, and attitude of the student candidates, the brand equity in the mind of student candidates can be cover up. Brand equity is the added value endowed on products and services. It may be reflected in the way consumer think, feel, and act with respect to the brand, as well as in the prices, market share, and profitability the brand commands for the firm (Kotler and Keller 2009). The Brand equity is consists of: brand image, brand awareness, brand attitude, and brand purchase intentions.

Understanding brand image, brand awareness, brand attitude, and brand purchase intentions can be utilize as a basic to decide what message to delivered to the market (message strategy), how to delivered (creative strategy), and who should delivered (message source) (Kotler and Keller, 2009:517). Afterward the three elements could be applied in marketing mix. Then the brand equity is articulates in form of brand elements: name, slogan, character, symbol, logo, and URL which are suitable to the image that perceived by consumer. Next step is designing promotion programs based on the image of Widyatama University through the promotional mix. Finally, the promotional program is use to create strong brand.

The firm segments measurement is conducting through understanding the value and life styles, usage, an attitude of the consumers. Through the comprehension of this factor, we can get the understanding of the existing segments in the market. (Craven, 2003). On the other hand, brand equity measurements is conducting through brand elements, such as: brand name, slogans, characters, symbols, logos, and URLS. Subsequently the organization comprehension through the brand equity will be the basic in developing message strategy, creative strategy, and message source. Message strategy, creative strategy, and message source are implementing in promotional mix programs that create strong brand condition, the condition when customer get the right type in products experiences, services, an firm marketing programs in order to forming the brandknowledge (Kotler and Keller, 2009).

III. Research Design

Refer to the paradigm and this scope, so this research is an exploratory research that explores widyatama university students segments, beside, the collecting data method is survey, the method that used to cover up *ex post-facto* data (Singh, 1986:358). The respondents are widyatama university student, since they are assumed as the widyatama products customer. In this research student candidates is not observed since they are assumed has an equal conditions with widyatama students.

Statistic technique used in this research is cluster analysis. Sample size is determines through convenience sampling method. By measuring the value, life styles, usage, and student's attitude. Cluster is statistic method that the main

purpose is to categorizing object based on the object's characteristics, and classified objects (respondent) based on their similarity profile characteristics (Hair, et al., 1998:473). Sample size is 300; however the questionnaire given to respondents is 375 due to completion rate as suggested by Malhotra (2002). Response rate of the respondent responds is 244.

The next stage is market targeting, It was conducted base on Widyatama University vision and mission. This stage was qualitative analysis with exploration the vision and mission first, then based on the vision and mission it can be decided the market segments that been chosen to become promotion target. In Stage fourth, the authors were analysis brand equity. This stage was also qualitative approach based on market segments profiles that was taken based on brand elements such as, brand name, slogans, characters, symbols, logos, URLs (Kotler and Keller, 2009).

IV. Result

This research was conducted on student at management and business faculty of Widyatama University Bandung, with total respondent 244. The statistic tools used to analyze was descriptive which was describing respondent profiles, and cluster analysis to understand existing segments that exist in Widyatama. Some information that have been collected from student are: gender, study program, age, semester, domicile, parent occupation, and number of siblings.

A. Respondent Profile

This research shows that the most part of sample is woman (54,9%), Study program that take by student is mostly management program (Bachelor degree) (57,4%), respondent commonly having age within 18-20 (65,2%), 21-23 years (32%), 24-26 (5%), and 2 above 26 years old (0,8%). Most of correspondent, especially business and management faculty are in 4th semester (32,8%), this is shows that respondent are higher school students in the middle semester . So the researcher has an assumption that the respondent has an optimal attitude and behavior in study process. About (44,3%) students living in east Bandung. Widyatama university is located in east Bandung, so the data shows that widyatama student lived near college location. Most of widyatama higher schoold student have a parent with an occupation as civilian worker (38,5%) and self employed parent (31,6%). This is show that family or culture that become a background of behavior and attitude widyatama university college are background of self employed and civil worker occupation. Widyatama college student commonly have 2 siblings (15,2%), and 1 sibling (14,3%). This showed that widyatama college student are the 1st child. Psychologically commonly the 1st kid have higher

self esteem and discipline than second or third child.

Refer to the paradigm and this scope, so this research is an exploratory research that explores widyatama university students segments, beside, the collecting data method is survey, the method that used to cover up *ex post-facto* data (Singh, 1986:358). The respondents are widyatama university student, since they are assumed as the widyatama products customer. In this research student candidates is not observed since they are assumed has an equal conditions with widyatama students.

Statistic technique used in this research is cluster analysis. Sample size is determines through convenience sampling method. By measuring the value, life styles, usage, and student's attitude. Cluster is statistic method that the main purpose is to categorizing object based on the object's characteristics, and classified objects (respondent) based on their similarity profile characteristics (Hair, et al., 1998:473). Sample size is 300; however the questionnaire given to respondents is 375 due to completion rate as suggested by Malhotra (2002).

Response rate of the respondent responds is 244. The next stage is market targeting, It was conducted base on Widyatama University vision and mission. This stage was qualitative analysis with exploration the vision and mission first, then based on the vision and mission it can be decided the market segments that been chosen to become promotion target. In Stage fourth, the authors were analysis brand equity. This stage was also qualitative approach based on market segments profiles that was taken based on brand elements such as, brand name, slogans, characters, symbols, logos, URLs (Kotler and Keller, 2009).

V. Cluster Analysis

Sharma (1996) said that cluster analysis is used to combining the data (observations) to the groups or clusters, :

1. Every cluster or group(s) is homogenous or compacted based on certain characteristics, so that the data in every group have a similarity.
2. Every groups should be different from another groups based on the similarity characteristics, so the data that in one group should be different from another group(s).

A. Choosing Similarity Measurement

Sharma (1996) expressed four ways to measure similarity between object in cluster techniques, 1st the techniques that measure similarity based on the distance between objects in Euclidian (Euclidian distance), 2nd techniques to measure distance based on mahalanobis (mahalonobis distance), techniques to measure the distance based on coefficient associations (coefficient associations), and techniques to measure distance based on correlations

coefficients (correlation coefficients). Refer to Sharma (1996), the techniques to measure the distance that been used in this research is Euclidian distance, remaining that the data been collecting have a different scale and should be standardize. For example; age variable scale using ratio, but domicile scale should be using nominal scale.

B. Cluster Techniques Used

There are two type of clustering techniques that can be used, hierarchically and non-hierarchically techniques (wuensch, <http://faculty.chass.ncsu.edu/garson/PA765/cluster.htm>, January 27th 2010). Hierarchically techniques usually used to data that was not more than 300 respondents. So this research was choose hierarchically cluster techniques .

C. Clustering Method

Clustering method that been used is **ward** method which are the distance among clusters is the total square of all variables. This procedure was tending to group the variable into the smaller cluster in every group (Hair, 1998). This method used because the data that been processed have different scale and focus to mean value. Figure 2.

D. Clusters that have been chosen

Total cluster that been chosen was based on the dendrogram graphic, graphics that shows clustering process in form of trees graphics. Based on dendrogram, so it can be seeing the clustering process and based on the process researcher can decide possibility of total cluster.

E. Interpretation to the cluster result

Figure 2. Dendrogram

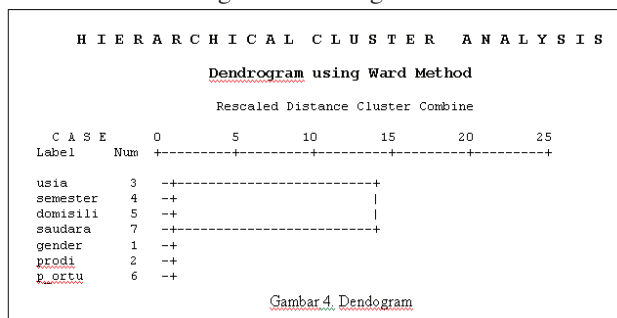


Figure 2. expressed dendrogram that get in this research. In figure 4 showed that clustering process occurred in 1st step. The processed data shows that widyatama student could be segmented into 4 profiles:

1. first segment consist of age, semester, domicile, and siblings variables
2. Second, third, and fourth segments consist of 1 variable for each, those are: gender, study programs, and parents occupation.

Based on the data processing, the widyatama student can be analyzing based on the 4 segments. 1st¹ profile shows that student can be categorize into: age, semester, domicile, and number of siblings. For example: first profile of student is the age within 18-20, 4th semester, domicile in east Bandung, and having 2 or more siblings

Second profile shows that widyatama student can be categorized based on gender, those are woman and man. It is shows that woman and man are really two different group profiles. Consequently widyatama university should make different curriculum for different sex. The Third profile shows that widyatama student can be categorized based on study program. It is expressing that widyatama can be categorized his student based on their study program characteristics, for example bachelor accounting group and diploma accounting group. Fourth profile shows that widyatama college student can be categorized based on parent's occupations. It is shows that widyatama student character can be differed based on their parent's occupation background.

VI. Market Target and Brand Positioning Strategy

Referring to the cluster result above, so we can infer the possibility market target are 1st segment, college student within the age of 18-20, 4th semester, east Bandung domicile, and have 2 sister or brother. And based on this research, the brand positioning strategy should be match with those target market, in this things are brand, slogans, characteristics, symbols, and logos matching with characteristics of the teenager within age of 18-20, 4th semester, east Bandung domicile, and 1st child (have 2 younger sister or brother)

VII. Conclusions and Recommendations

Based on the analysis can be refer to:

1. The segments of Widyatama student can be categorized into four primary segments, age, semester, domicile, and number of siblings. Consequently Widyatama institution programs, such as marketing or curriculum should considers those segments. For example, in promoting the institution, the marketing division could make advertising based on domiciles and sibling.
2. Based on the segment characteristics, in order that, the primary segment profile of widyatama student is aging within 18-20, 4th semester, and east Bandung domicile, and have one or two brothers or sisters. Consequently the marketing division of widyatama should concentrate or makes east Bandung as promotion target priority, teenage-look advertising, and make the students in 4th semester as word of mouth agents.
3. Refer to primary segment profile, especially teenagers and 4th semester; widyatama student can be a primary target to Widyatama University as opinion leaders for their siblings.

4. Refer to the target, so the positioning target for Widyatama University should be made based on this segments target characteristics.

5. Refer to the target, consequently, brand elements should follow teenager-look, for example:

a. Brand name: class name no more A,B,C, etc Classes, but it should be teenager's name, such as: tweety class, mickey class (from mickey mouse), Minnie class (from Minnie mouse), Mark Twain class, etc.

b. Slogan (s): remain: "friendly campus for future business pro"

c. Character (s): it should be used a teenage friendly characters such as Mc donald's

d. Symbol: it should be a scientific teenage friendly or popular symbols, for examples: Alber Einstein, isaac Newton, etc

e. Logos: it should be used a teenage friendly logos

f. UTLs: it should be used a teenage friendly UTLs

VIII. Limitations and further research

Limitations of this research :

1. This research was conducted only in Widyatama University; it will not generally represent all students in Bandung. Consequently, there should be research with broader respondents e.g. involving students of other universities in Bandung, and involving another respondent types, such as: employees, the women of Household, or the Manager.

2. This research is a part of the whole paradigm, meaning that this research not observed the positioning or analyzed brand elements that could implement by widyatama university. The paradigm of this research could be completed if followed by positioning research and brand elements research as seen in figure 1.

3. The variable that been used in this research are demographic variable, this research will be more interesting if we develop into attitude and value variable (VALS)

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The Role of Ethnocentrism in Higher Students Behavior to Consume (The Study of Made in China Fashion Products in Bandung)

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Abstract-Sharma (1987) pointed out that ethnocentrism is more concerned with blindly accepting to his own group and tends to reject things that are outside the group. Based on that definition, this research purpose is to study the consumer ethnocentric tendency of Higher Education Students in Bandung toward Chinese fashion product. This study shows that 53.2% Students in Bandung had high ethnocentrism attitude. The associations between ethnocentrism and the perception of quality fashion products made in China is negative; It means that invasion of Chinese products will not be strongly affected the existence of Indonesian fashion. However, there is one thing to be aware for fashion business in Indonesia, namely the price. This research shows that in spite of ethnocentrism, price is still a major consideration in terms of buying made in China fashion products, since there is a positive relationship between perceptions of price and the intention to buy made in China fashion products. Based on this research, a University as a social development institution could enhance this ethnocentric tendency through curriculum or programs. For example makes an anthropology or nationalism subject in their curriculum as a requirement.

Keywords: Nationalism, Consumer Ethnocentric Tendency, ACFTA, perceived on price, perceived on quality, and purchase intentions.

I. INTRODUCTION

Practitioners and academicians in Indonesia have variety opinions regarding the trade relations between ASEAN and China, especially with the increasing of cooperation between China and ASEAN through ACFTA (ASEAN-China Free Trade Area). Some practitioners and academicians see the negative impact of the ACFTA enactment in Indonesia, and the others see positive impact.

The enactment of ACFTA is one of political or economic factors that will influence a company strategy development, (Kotler and Keller, 2009; David, 2004; and Craven, 2003).

The authors convinced that one of the essential marketing strategies is focused on consumer behavior. Thus, a phenomenon in the business environment will be a threat or

an opportunity depends on how consumers respond to the event, in this case is the invasion of Chinese products to Indonesia as a result of the enactment of ACFTA. Therefore, in facing the phenomena or events in the environment, the business organization should understand the impact of the events or phenomena on consumers in order to understand consumer behavior.

Schiffman and Kanuk (2000), Peter and Olson (1999), Assael (1998), and Zaltman and Wallendorf (1979), reveal the consumer behavior model which provides an overview of cultural or social role in influencing consumer behavior, one of the sociological concepts that influence behavior consumers is ethnocentrism, it is psychology constructs which is relevant for individual personality systems analysis as well as with wider analysis of socio-cultural framework (Shimp and Sharma, 1987).

Sihombing (2005) validates Shimp and Sharma's (1987). CETSCALE (Consumer Ethnocentric Tendency Scale), and found that CETSCALE (Consumer Ethnocentric Tendency Scale) reduced version has negative relations with attitude and intention to buy foreign brand products. On the other hand, several studies in the field of consumer behavior reveals the perception of product attributes is the antecedent of a consumer attitude, such as research of Garbarino and Johnson (1999), Pritchard, et al. (1999), and Eggert and Ulaga (2002). The attributes of these products can be either the quality or price.

The third point that motivates this research is the issue of nationalism which is currently often used as a basis for promoting a product, for example Pertamina advertising "Lucky nation, we are lucky," Maspion with the slogan "Love the made in Indonesia products," and a shoe-making in the center of Bandung Cibaduyut shoe industry, branding her shoes "JK (Jusuf Kalla) ", the name of former Indonesia Vice President.

Referring to the three points, the aims of this research are:

1. Examining the existence of ethnocentrism in the Indonesian consumer behavior, especially in order with the implementation of ACFTA and concerning to

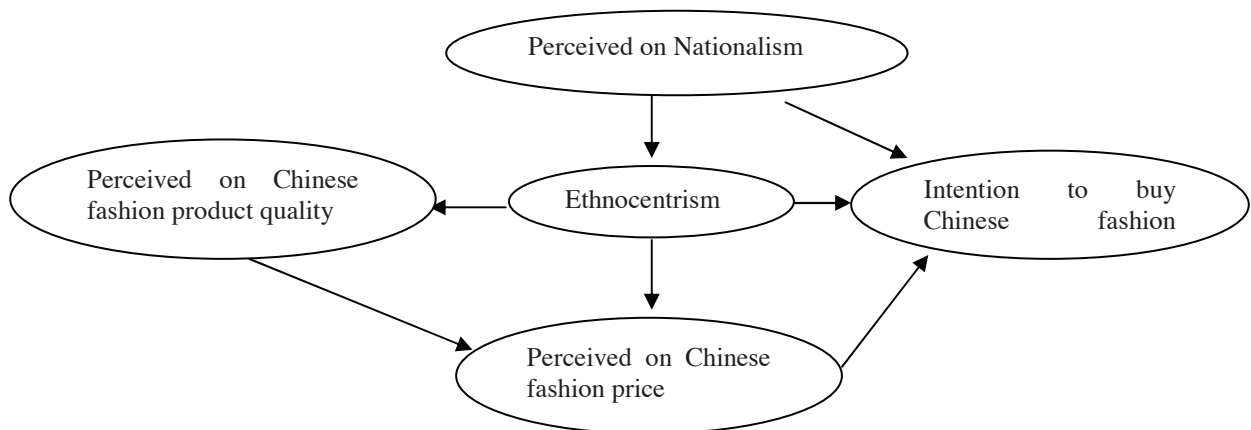
the invasion of Chinese fashion products. Considering that the fashion sector is globally expected to have significant potential market, which is valued at 1.7 trillion U.S. dollars, or about 3 times the GDP of Indonesia which is about 540 billion U.S. dollars (Kompas, 19 November 2010 : 18). Students are selected because they are parts of society that are regarded as member society who knows more understand the existence of the industry in Indonesia or Bandung. In addition, research Zulganef, Nursjanti, and Garniwa (2007) show that there is Opinion Leader in Fashion products, which indicates that this product

is quite popular among students; in terms of dissemination information that better compared to other products (i.e. political product).

2. Recognized the impact of ACFTA enactment to Indonesia Through understanding the existence of ethnocentrism, especially the industries whose products are face to face (head to head) with made in China products

The authors reveal the background and problems through a research model on Figure 1

Figure 1. Research Model



II. LITERATURE REVIEW AND HYPOTHESES DEVELOPMENT

A. Intention and Ethnocentrism

Dharmmesta (1998:91) describes the intention in the Theory of Planned Behaviour (TPB) variables as: "Catcher" or intermediary for the motivational factors that have impact on a behavior, illustrate how hard someone dared to try, demonstrating how much effort a person planned to do, and most closely associated with subsequent behavior.

Referring to the intention expressed by Dharmmesta (1998), then understanding the intention is the beginning for understanding the consumer behavior. In this study, the authors' investigation is focus on the variable of intention to purchase Chinese products.

Research of Garbarino and Johnson (1999), and Eggert and Ulaga (2002) reveal the role of intention in purchasing a product which found that buying intention is consequence of trust and commitment. On the other hand, this study focuses on investigation of ethnocentrism as an antecedent for intention to buy Chinese fashion products.

Ethnocentrism is an attitude that sees the difference between his own group (in-group) with another group (out-

group) (Schiffman and Kanuk, 2000). Fishbein and Ajzen (1975) and Ajzen (1988) revealed that intention is a consequence of the attitude or a tendency toward an object or behavior. Referring to the term of attitudes proposed by Fishbein and Ajzen (1975), Ajzen (1988), and the term of ethnocentrism proposed by Schiffman and Kanuk (2000) and Shimp and Sharma (1987), which suggests that ethnocentrism is more concerned with blindly accepting to his own group (in this case, Indonesian) and tends to reject things that are outside the group, then the first hypothesis of this research is:

H1: Ethnocentrism positively influences the intention to purchase made in China fashion products.

Kotler and Keller (2009) suggest price as the major determinant of buyer choice, and consumers are "price takers" and accept prices at "face value". The suggestion shows that price is an important consumer's consideration to purchase and it could be a major determinant of buyer intention to buy. Economically, It means that the higher the price the lower the intention to buy. In spite of that, price can see as a result of consumer evaluation, meaning that price is a perceived value and it can be considered as an attitude, consequently, the second hypotheses of this study is:

H2: Bandung higher student's perceived price negatively influences the intention to purchase Chinese fashion products.

B. Ethnocentrism

Schiffman and Kanuk (2000), Peter and Olson (1999), Assael (1998), and Zaltman and Wallendorf (1979), explain one of the sociological concepts that influence consumer behavior, it is ethnocentrism, which is an attitude that sees the difference between his group (in-group) and other groups (out-group). Ethnocentrism has become psychological construct that are relevant to the personality as well as extensive analysis of socio-cultural framework (Shimp and Sharma, 1987). Thus become an interesting variable in consumer behavior since it is adopted from the field of sociology. It can be seen from some studies that investigate the role of ethnocentrism in the context of consumer behavior, including John and Brady (2009), Horn (2009), and Nien Hsu (2008), Sihombing (2005), and Maheswaran (1994).

John and Brady (2009) examined the relationship between product consumption patterns package (consumable packages), i.e. products that are packaged with a good identity so consumers can know the origin, content and product materials (labeling), and consumption of non-product -package (non-consumable packages), i.e. products that are not given the identity of the packaging at all, with CET Mozambique-African community, they found that the packaged products and comes from South Africa are more vulnerable than the non-package products. They also found that products of non-package more influenced by consumer ethnocentrism than the packaging of products, particularly products originating from South Africa.

Research of Nien Hsu (2008) on consumer behavior in Taipei and Shanghai revealed that ethnocentrism has a strong influence on the brand selection (preference) in the country. The results of this study indicate that there are different patterns between consumer ethnocentrism in the sub-cultures of different Chinese communities. Research of Maheswaran (1994) toward consumer experts (expertise) and consumer beginners (novices) showed that the State of origin (country of origin) has a strong relationship with the consumer evaluation of product attributes.

Research of John and Brady (2009), Nien Hsu (2008), and Maheswaran (1994) give an idea that ethnocentrism has a strong influence on the selection (preference) of a product, so that it can be estimated that ethnocentrism will also affect consumer perceptions of product quality and price of China-made fashion products, such influence will be negatively given the ethnocentrism is oriented attitude towards their own culture or group. Therefore the third hypothesis (H3) and fourth (H4) of this research are:

H3: Ethnocentrism negatively influences the Bandung Higher student's perceived quality of Chinese fashion products

H4: Ethnocentrism negatively influences the Bandung Higher student's perceived price of Chinese fashion products.

C. Nationalism

Some companies in Indonesia use issues of nationalism which is currently used as a basis for promoting a product, for example Pertamina, a national oil company which promote her product as " lucky we are, is lucky nation," Maspion with the slogan "love the made in Indonesia products," Dhompert Dhuafa, a non-government organization for a charity writes advertisement "tithe for my nation", Minister of Tourism and Culture of Indonesia on an Indonesian television broadcasting, states "known your country" and a shoe-making in the center of Bandung Cibaduyut shoe industry is brands his shoes as "J-K (Jusuf Kalla) " the former vice president of Indonesia. Besides that, there are several products using Indonesian names though the principal of those products is not come from Indonesia, such as: Toyota Kijang, Mitsubishi Kuda, and Daihatsu Ceria. The advertisement and brand names show that the issue of nationalism or original characters of Indonesian through product brand names explains that it is important to understand the consumers' attitude toward nation (nationalism).

Those attitudes conform to the term of nationalism attitude stated by some researchers, such as Cleveland et. Al (2009). John and Bradly (2009). And Hsu and Nien (2008) which point out that consumer prefer to domestic products than foreign products.

Stanford Encyclopedia of Philosophy further reveals that nationalism can be defined as the attitude owned by a nation when they care about the identity of their nation. Nevertheless it is possible that Indonesian consumers to deal with the dilemma between selecting products that are not qualified, higher prices, with nationalism, given the resulting products of other Country is cheaper and better, for example bead crafters Trowulan price is ranges from 12 to 50 thousand rupiah, while Chinese products only 10 thousand rupiah. ([Http://berita.liputan6.com/ekbis/](http://berita.liputan6.com/ekbis/)).

The authors suggest that the term of nationalism defined above is correspond to the term of ethnocentrism, in order that, it can be predicted that the higher the nationalism the higher the ethnocentrism. Referring to the logical consequences of the nationalism and ethnocentrism, then the fifth hypothesis (H5) of this research is formulated as follows:

H5: Nationalism positively influences the Ethnocentrism tendency of Bandung Higher Student toward Chinese fashion products

Maheswaran (1994) found the relationship among country of origin with consumers' evaluation toward product attributes. On the other hand, Nakata and Sivakumar (1996) through literature review producing several proportions related with the relationship between national culture and the development of new products.

Referring to the term of nationalism stated by *Stanford Encyclopedia of Philosophy*, the nationalism is someone attitude in connection with national identity and actions connected to the achievement of *self-determination*. *Maheswaran (1994)* reveals the relationship between *country* of origin and evaluation toward product attributes, proposition of Nakata and Sivakumar (1996) concerning the relationship between national culture and the development of new products, and attitude theory (Schiffman dan Kanuk, 2000), Referreing to the several research, so the sixth hypothesis (H6) of this research is formulated as:

H 6: Nationalism negatively influences the Bandung Higher student's intention to purchase Chinese fashion product

D. Product Quality, Price, and Ethnocentrism

Kotler and Keller (2009:169) quotes the American Society for Quality Control which reveals that the quality of the overall features and characteristics of products or services associated with the ability to satisfy customer needs. While Cheng and Tam (1997) cites the meaning of quality of some researchers which expressed meaning of quality as excellence, value, fitness for use, conformance to requirements, defect avoidance, and meet or exceeds customers' expectations. On the other hand, Parasuraman (1996:145), quoting Lewis and booms in the field of quality of service, that service quality is a measure of the extent of services provided in accordance with customers' expectations. Barnes and Cumby (1996: 178) reveal the relationship between product quality and costs, especially in services. They reveal that to produce good quality service, we need a high cost. Referring to the understanding proposed by Barnes and Cumby (1996), it can be expected that the quality of services associated with product price, so it can be said that if the quality of products is good, the price would be high. In order that, consumers will face the choice of quality products with high prices or products with less or no quality with low price. However, research of Riesz (1978) reveals the negative relationship between price and product quality on the products of non-durables, while the durable products have a positive relationship between quality and price of the product. However, research of Riesz (1978) revealed that the overall aggregate analysis of products (durables and non-durables) shows the relationship between positive price-quality products.

Referring to Riesz (1978) suggestion and the relationship

between price and quality products of Barnes and Cumby (1996), then the seventh hypothesis (H7) of this research is:

H7: Bandung Higher student's perceived quality positively influences her perceived on price of Chinese fashion products

III. Research Design

This research approach is explanatory, while the method used is a survey method and the unit of analysis is Higher students in Bandung. Data were collected using convenience sampling technique, by distributing questionnaires to the student of Bandung. The data analysis technique used was analysis of the average frequency of respondents' answers to the question of ethnocentrism to detect the presence of ethnocentrism and structural equation modeling to analyze the relationship among variables studied.

The questionnaires were distributed to Private Universities students in Bandung, the total distributed questionnaires were 500 exemplars. The returned questionnaires were 410 exemplars (response rate is 82%)

IV. Result

Ethnocentrism Identification

The lower ethnocentrism tendency response is 46.8%, the rest is 53.2% which represent the average response of the higher ethnocentrism tendency. It means that most respondents have a high tendency ethnocentrism attitude.

A. Data Fit Model

To test the hypotheses of this study, the data is conducted into two stages, namely overall analysis of the model, and structural analysis, i.e. analysis of the relationships contained in the model. (Anderson and Gerbing, 1988; Hair, et al., 1995).

Table 5.1 CMIN/DF

Model	NPA R	CMIN	D F	P	CMIN/ DF
MODEL ALTERNATI VE	84	1208.2 80	69 6	.00 0	1.736
Saturated model	780	.000	0		
Independence model	39	1673.9 88	74 1	.00 0	2.259
Zero model	0	7390.5 00	78 0	.00 0	9.475

Tables 5.1 and 5.2 are the results. They show that the value of Cmin / DF is 1.736 which is located between 1 and 5; RMR = 0187, GFI = 0837; and AGFI = 0817. This illustrates that the model under study is fit to the data.

Table 5.2. RMR, GFI, AGFI, dan PGFI

Model	RMR	GFI	AGFI	PGFI
ALTERNATIVE MODEL	.187	.837	.817	.746
Saturated model	.000	1.000		
Independence model	.270	.773	.762	.735
Zero model	.347	.000	.000	.000

B. Structural Analysis

Table 5.3. showing the relationships between variables analyzed. The table shows that 3 of the 7 hypothesized relationships are significant at the level of confidence 0.05, namely:

- The positively influences of Nationalism to Ethnocentrism

Tabel 5.3. Regression Weights

				Estimate	S.E.	C.R.	P
1	ETHNOCENTRISM	<---	NATIONALISM	0.519	0.106	4.898	***
2	PRODUCT QUALITY	<---	ETHNOCENTRISM	-0.308	0.099	-3.117	0.002
3	PRODUCT PRICE	<---	PRODUCT QUALITY	0.379	0.152	2.495	0.013
4	PRODUCT PRICE	<---	ETHNOCENTRISM	-0.011	0.038	-0.284	0.776
5	INTENTION TO BUY	<---	NATIONALISM	0.018	0.048	0.379	0.705
6	INTENTION TO BUY	<---	PRODUCT PRICE	0.73	0.423	1.725	0.085
7	INTENTION TO BUY	<---	ETHNOCENTRISM	-0.113	0.068	-1.653	0.098

V. Conclusion and Discussion

The study shows some things that need to be discussed, namely:

- This study showed that 53.2% Higher Students in Bandung have high ethnocentrism attitude. It shows that most of the Indonesian Students recognize that there are differences between the Indonesian people (in-group) with other nations (out-group) in this case the Chinese as a fashion producer.
- Refer to the first point above, it can be expected that the Indonesian Students perceive Chinese products are different with Indonesia products, and different attitudes are strong enough to withstand the influence of invasion of Chinese-made fashion products. The relationship between ethnocentrism with the perception of quality fashion products made in China is negative; it shows that the higher the attitude of ethnocentrism students of Bandung, the lower the Bandung Students Perception On made in China fashion products quality. So it can be expected that if students in Bandung were given the option to choose the similar of Chinese products and domestic products, they will choose domestic product.

- The negatively Influences of Ethnocentrism to the quality of products perceived by Bandung Higher Students
- The positively influences of product quality to product price

On the other hand, 2 of 7 The relationship is significant at the 0.1 confidence level, namely:

- The positively influences of product price perceived by Bandung Higher Students .to intention to buy
- The negatively influences of ethnocentrism to intention to buy

While the not supported hypotheses are:

- The influence of ethnocentrism to the price perceived, and The influence of nationalism to the intention to buy

- The supporting first hypothesis: there is a negative relationship between ethnocentrism and the intention of the students in Bandung to purchase made in China fashion products shows that the higher trend of students' ethnocentrism in Bandung, the lower the students' intention to buy made in China products. The existence of ethnocentrism in the Bandung Students as described in point 1 illustrates that domestic producers do not have to worry about invasion of Chinese products. This is consistent with the relationship between ethnocentrism and the perception of the quality of Chinese products (Hypothesis 3).
- There is one thing to be noted by the business actors in Indonesia in the term of Chinese products invasion, that is the pricing problem. This research shows that price is still a major consideration in terms of buying fashion products made in China. Operational price as something positive "The price of made in China fashion products is more valuable than the products made in Indonesia," It means that the cheaper the price perceived by the students, the stronger the intention of Bandung Students to buy made in China fashion products. In addition, these conditions also shows that price is still an important consideration in buying made in China fashion products. It can be said that the price and ethnocentrism are two main variables considered by the Bandung Students in buying made in China fashion products.

5. Structural analysis shows that there are two main paths of Bandung students mental processes in considering the purchase of made in China fashion products:
 - a. The first pathway that showed the main **considerations of Price**: Nationalism → ethnocentrism → perceptions of the quality → intention to purchase fashion products made in China. The statistical estimation is: 0.044
 - b. The second pathway that showed the main **considerations ethnocentrism** : Nationalism → ethnocentrism → Intention to buy fashion products made in China. The value of statistical estimation is: $0.0519 \times 0.113 = 0.059$

Two process mental paths mentioned shows that Ethnocentrism plays an essential role in mediating the relationship between nationalism with the intention to purchase Chinese fashion products. However, prices can also be a major consideration but not so alarming, because the path is longer relative price considerations with the estimated value is lower (0.059 vs. 0.044)
6. Nationalism has positive relationship with Ethnocentrism, this shows that the level of consumer trends in addressing Chinese products have associations with attitudes towards nationalism, this shows that students of private universities in Bandung is still concerned about the existence of the Indonesian people, especially the presence in the economic field, especially the survival of products produced by the Indonesian.
7. Product quality has a positive relationship with product price. This is shows that the better fashion products made in China, then the product is perceived cheaper. Although ethnocentrism affects the perception of made in China fashion products quality, but the quality will still be influential on the price perception of fashion products made in China.

VI. Recommendations

1. This research shows that the existence of ethnocentrism in Indonesia, especially students in Bandung is relatively not so large, that is 53.2% of the total respondents, The Universities as a social development agent need a campaign or makes a national movement to promote the importance of consuming made in Indonesia products.
2. This research shows that price and ethnocentrism are two main considerations of Students in Bandung in buying made in China fashion products. This shows that the higher the nationalism, the higher the ethnocentrism that is inside of Students in Bandung, Therefore, to stem the invasion of fashion products made in China, the campaign or campaigns about nationalism or love campaign on Indonesian products by Indonesia universities is need to improve, such as the campaign of "love the Indonesia products," or from Maspiion " we are lucky, nation is lucky " from

Pertamina needs to be reinforced and reproduced by the other campaigns.

3. The first point shows that the better the perceived quality of Chinese products the more expensive the products (the positive relationship between product quality and the price of Chinese fashion products). This suggests that product quality is importance in student's consideration, although the quality is influenced by ethnocentrism.
4. Another thing that needs to be considered by the manufacturers of domestic products that competition issue with Chinese fashion products is price, since this research shows that price is still a major consideration in addition to ethnocentrism. The high economic cost that is often a major problem in the production of goods in Indonesia needs to be repaired.
5. To prevent an invasion of Chinese products, there should be policies that make the Indonesian products have better quality than Chinese products.
6. The relationships between nationalism, ethnocentrism, and intention to purchase illustrate that Indonesia Universities or higher educational institutions need to enhance either nationalism or ethnocentrism to prevent Indonesia fashion industry from Chinese fashion products invasion, for example with anthropology or nationalism subjects in universities or higher educational institution curriculum.

VII. Limitations and Further Research

1. This research was conducted only in Bandung and limited at 4 Universities only; it will not generally represent all students in Bandung. Consequently, there should be research with broader respondents e.g. involving students of other towns in Indonesia, and involving another part of Indonesia citizens, such as: employees, the women of Household, or the Manager.
2. Perhaps some students are not likely able to evaluate made in china fashion products, since it was not asked whether they have ever / never consume made in China fashion products. However, this limitation is not so alarming, considering that substantial ethnocentrism presented by students in Bandung who demonstrate the difference between Indonesia and China.

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The Comparative Analysis of Academic Advisor Pattern I and Pattern II Considered from Student's Interest in Business and Management Faculty of Widyatama University

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ABSTRACT

This research aims to find a student response to the academic advisor system pattern I and pattern II. The academic advisor system is applied in particular Widyatama University Faculty of Business & Management. Trusteeship services are provided in order to support students in determining the direction and the right target in his education in order to achieve complete success in a timely manner and scholarly, with a satisfactory CAI (Cumulative Achievement Index) and by itself will reduce the drop out students. Problem under study is about the student response system for the implementation of a trust that has been conducted by the University Widyatama current (trusteeship system pattern I), student responses to the trusteeship system of pattern II, and whether there are significant differences between the pattern I trusteeship system with pattern II trusteeship system. This research uses survey patterns with a sample of populations. The results showed that the average student response to the level of interest in the trusteeship system for pattern I significant. This means that respondents to the trusteeship system of pattern I viewed from the standpoint of tangible dimensions, reliability, responsiveness, assurance and empathy rather important, because it is on the interval from significant up to significant enough. While the average response of students to the level of interest in the trusteeship system of pattern II by significant. This means that the response patterns of respondents to the trusteeship system of pattern II from the perspective of tangible dimensions, reliability, responsiveness, assurance and empathy important, because it is on the interval from significant up to very significant. Further tests of significance of differences in student responses to the trusteeship system with pattern I pattern II showed is a little bit difference, with value is significant enough. Based on this research can be concluded, there is a significant difference between the academic advisor pattern I and pattern II, it is advisable for students to use the service on the trusteeship system of pattern II that students feel comfortable and satisfied, so the student can improve his performance.

Key words: *The academic advisor, the trusteeship system of pattern I, the trusteeship system of pattern II, tangible dimensions, reliability, responsiveness, assurance, empathy, achievement*

I. INTRODUCTION

Widyatama University is a private high school in Bandung. It is well known in Bandung and specially has its own market in Bandung and generally in West Java province. Widyatama prepared itself since it was founded through a good vision and mission to support national education in facing globalization era. Moreover, Widyatama has a good management system applied by an ISO 9001 2000 Quality Management System, it is a step in facing globalization and regional autonomy.

By applying this Quality Management System ISO 9001 2000, Widyatama will place it self ahead to get new students. In order to reach a perfect vision and mission of Widyatama, It should be supported by good education system and teaching, consistent and continuous. Widyatama gives counseling service which done by the lecturers (academic counselor/advisor) functioning as a facilitator and helping students to determine subjects which will be taken and being studied within one semester. Besides, students will be able to determine an excellent course and object to successfully complete their scholar on time and reach satisfying school grades and automatically reduce the number of drop out students.

Choosing and determining subjects are based on individual ability of the students (IQ, EQ, and SQ abilities). In order to run this counseling service well and continuously, it needs support from expert lecturers as academic advisor and the students must be pro-active and consistent to take advantage of this counseling service.

Widyatama University is a private high school in Bandung. To fulfil its visions and missions, Widyatama brings about counseling system as a facilitator and helps students to determine in choosing subjects which will be taken and being studied within one semester. Counseling system is a relation between student and the lecture of

academic counselor (advisor) to help or direct student to do his/her academic activity or study in the university.

I.1. THE EXPLANATIONS OF COUNSELLING

According to Mohamad Surya (page 31; 1998) : **counselling can be explained generally as a help or demand.** Therefore, to know about the real meaning, we have to remember that not every form of help is a counselling. Thus, to get clearer explanation, this is the explanation of counselling:

The definition of guidance which is written in Year Book of Education (1995), is:

"Guidance is a process of helping individual through their own efforts to discover and develop their potentialities both for personal happiness and social usefulness".

According to Mohamad Surya (page 36; 1998), making further explanation about guidance : guidance is a process of helping individual continuously and systematically from advisor to the advisable to reach entrepreneurship in self understanding, self-acceptance, self-guidance and self-realization to reach optimum development and self-adjustment with surroundings.

I.2. THE PURPOSES AND FUNCTIONS OF COUNSELING

Counseling is an integrated system from the beginning to the end which can be pleasantly carried out by the students. According to Oemar Hamalik (1990:92) the aim of counseling service to the students is helping every students in making up their minds and determining appropriated attitudes that are matched with their skills, interest, opportunity and social values to be able to understand about themselves, be able to develop their own potentials, be able to solve the problems, be able to adapt themselves which are finally succeeded to reach academic skills and the expected professional skills. According to Ketut Sukardi (2003 :7) there are the aims of counseling program as general, which are: the student is able to expand his/her understanding, to know about field of job and job opportunity, to choose and able to show appraisal to the others' interest and self-esteem. While the special aims of counseling are the student has an ability to solve their problems in understanding himself, surrounding, and society. And the functions of counseling is to lead a student to the professional education program, to plan his study program, to know himself, to solve the problems, to train in completing his duty as a student.

Besides, there are many kinds of counseling, they are: *Academic, Educational, Vocational, Social and, Leisure Time Counseling.*

I.3. THE MEANING OF COUNSELING

Academic counseling or education counseling which is carried out at schools or high schools is known as

"perwalian". The word **perwalian** comes from the word guardian, means: a person who is on duty, authority and responsible in his field. For further explanation, counseling can be explained as follow:

Counseling is one of the lecturer's activity in the university in giving academic consultation service to his students. Djumhar (1988), he said that an effective counseling program is intend to a qualified lecturer service to be promoted as an academic counselor or advisor, every lecturers is given an opportunity to cooperate his/her students directly and continuously. It is considered as an effort in giving opportunity to the lecturer to know his guided student directly and has an emotional approach.

This counseling activity takes part in the continuity of student's studying plan, especially in taking a number of Credits (sks) and subjects as an effective way in managing the period of time which will be spent during the lecturers. Conditionally, the implementation of this counseling can be categorized as a service that given by the institute to the students, it is clear that the students expect to get optimum service which can satisfy them.

I.4. THE FRAMEWORKS OF THE RESEARCH

Widyatama University is a private high school in Bandung. To fulfil its visions and missions, Widyatama brings about counseling system as a facilitator and helps students to determine in choosing subjects which will be taken and being studied within one semester. Counseling system is a relation between student and the lecture of academic counselor (advisor) to help or direct student to do his/her academic activity or study in the university.

There are two models of counseling system in the university, especially in Widyatama, they are:

There are two models of counseling system in the university, especially in Widyatama, they are:

1) Counselling system model I

Model I is usually called "guarding system". It is because of every lecturers is obligated to do his/her duty as an academic counsellor (advisor) based on the schedule and defined place. In this system, a student is not obligated to use this system, so he/she is not obligated to be active to use the appropriated counsellor's service. While the counsellor has no moral responsibility to the student's success in doing academic activity in Widyatama University. It is because every advisors can't help or guide certain students continuously from time to time or per-semester.

2) Counselling system model II

In this system, advisor is on duty to cooperate or help certain students in certain numbers

continuously until the students complete their study in the university. In accordance with General Orientation of Education Organization 1999/2000, published by Pajajaran University, “ideally, every academic counsellors or advisors are able to help as many as 15 students or appropriated to the condition of faculty/department/study. The implementations of the counseling are fully given to the commitment between counsellor and student. The duties of an advisor are briefly follows:

- a. To helps student to arrange study planning, both full study and per-semester study program.
- b. To give consideration to the guided students in determining the burden of study and type of subject this will be carried out according to their ability.
- c. To monitor the guided student’s progress from time to time or per-semester until he/she complete her/his study.

The implementation of this counselling system must be supported by adequate facilities and infrastructures. Therefore, the implementation of counseling system service can be carried out effectively. The service of counseling system in Widyatama can be evaluated from the five dimensions. According to Fandy Tciptono (1999; pg 26), they are:

1. *Tangibles*
2. *Reability*
3. *Responsiveness*
4. *Assurance*
5. *Empathy.*

By evaluating the five dimensions as mentioned above, it is expected that the implementation of counseling which was done or will be carried out in Widyatama meets the student’s expectation or helps him to complete his study in the university with a satisfaction or very satisfaction. Thus, the stated visions and missions of Widyatama will be achieved.

In compliance with applying counseling model I which was implemented now, shows that student who has school grade less than 2 raise or known as decreasing quality, it is caused by the lack of supervision from advisor, it is shown in following table: (see table-1.1 and table-1.2)

A number of students’ business & management faculty Recapitulation

Department. Academic year. Ganjil=first semester. Genap = second semester

Source : LDE Universitas Widyatama bandung (2006)

This counseling evaluative system is done through the research, which is titled : **“THE COMPARATIVE ANALYSIS OF COUNSELING MODEL I AND MODEL II CONSIDERED FROM STUDENT’S INTEREST IN BUSINESS AND MANAGEMENT FACULTY OF WIDYATAMA UNIVERSITY”.**

(based on the perception of business and management faculty’s student).

2. THE METHOD OF RESEARCH

To write this research, the writer used analytive descriptive method, which is a method by giving a systematical overview, real fact, then it is analyzed and summarized. According to Freddy Rangkuti (2001:17), descriptive research is a research to describe the condition of observed object then it described based on the existed fact.

The population of the research is the students from S1 and Diploma III Degree of Business and Management Faculty who have been active for five years, from 2000 to 2004. The populations are about 2434 persons, and the numbers of obtained samples are 286 persons.

The required data in this research is primary and secondary data which taken not only from the students of business and management faculty but also academic bureau of Widyatama University. The gained data is taken from questionnaire which was given to the respondents of Business and Management Faculty.

2.1. VARIABLES’ OPERATIONALIZATION.

This research uses Variable (x), as counseling system model I and II which measured from the student’s interest rate of Business and Management Faculty and it is measured based on 5 dimensions, as in the following table: (see table-2.1).

2.2. THE METHODS OF DATA COLLECTION

The obtained data is statistically processed and this research aims to compare the students’ conception about the counselling activity model I and II, therefore, it used a One-way Anova statistical test instrument and the obtained data is ordinal data, so it was firstly changed into successive interval data, by this following criteria: (see table-2.2)

2.3. THE DESIGN OF HYPOTHESIS TESTING

The proposed Hypothesis testing was the two-sides testing by using normal distribution. Therefore, the formulas of hypothesis which was proposed are :

Ho : There is no difference to students’ conceptions about the counseling system model I and II

Ha : There is a difference to students’ conceptions about counseling system model I and II

If the significant figure more than 0,05, Ho is denied.
but, if significant figure less than 0,05, Ho is accepted

TABEL – 1.1
RECAPITULATION NUMBER OF STUDENT BUSINESS ANA MANAGEMENT FACULTY

Faculty	Years of Academy									
	2000		2001		2002		2003		2004	
	1 st smester	2 nd smester	1 st smester	2 nd smester	1 st smester	2 nd smester	1 st smester	2 nd smester	1 st smester	2 nd smester
EM/S1	2011	1663	1976	1719	2184	2022	2256	2046	2235	1911
EM/D3	383	341	480	432	504	472	493	431	430	343
TOTAL	2394	2004	2455	2151	2688	2494	2749	2477	2665	2254

Source:LDE Universitas Widyatama-Bandung (2006)

TABEL – 1.2
RECAPITULATION NUMBER OF STUDENT BUSINESS ANA MANAGEMENT FACULTY WHO HAS GPA < 2

Faculty	Years of Academy									
	2000		2001		2002		2003		2004	
	1 st smester	2 nd smester	1 st smester	2 nd smester	1 st smester	2 nd smester	1 st smester	2 nd smester	1 st smester	2 nd smester
EM/S1	289	265	289	258	364	335	462	425	512	422
EM/D3	85	79	110	93	121	102	110	102	127	97
TOTAL	374	344	399	351	485	437	572	527	639	519

Source:LDE Universitas Widyatama-Bandung (2006)

TABLE 2.1
VARIABLES' OPERATIONALIZATION

Variable	Sub variable	Indicator	Scale
Independent variable : Service (X)	1. <i>Tangible</i>	a. The location of counselling	Ordinal
		b. The cleanliness of counselling's room	Ordinal
		c. The comfort of the room	Ordinal
		d. The availability of the transcript	Ordinal
		e. The fluency of counselling process	Ordinal
		f. The academic counsellor's tidiness	Ordinal
	2. <i>Reability</i> (keyakinan)	a. The accuracy of counselling service	Ordinal
		b. The availability of advisor.	Ordinal
		c. The ease to meet advisor in giving solutions	Ordinal
		d. An ease to meet an advisor	Ordinal
		e. The Uncomplicated procedures	Ordinal
		f. The adequate amount of time to do counseling.	Ordinal
	3. <i>Responsiveness</i> (tanggapan)	a. The ability of an advisor to know students' problem.	Ordinal
		b. The counseling is based on each department.	Ordinal
		c. The availability of advisor to monitor students' progress continuously.	Ordinal
		d. An immediate respond to solve academic programs	Ordinal
	4. <i>Assurance</i> (kepastian)	a. The knowledge and skill of counsellor to give suggestions to the students.	Ordinal
		b. The clarity of given suggestion and information	Ordinal

	5. <i>Empathy</i> (Empati)	c. The security of students' secrecy	Ordinal
		d. The accuracy, clarity of the suggestions and big responsibility of the advisor.	Ordinal
			Ordinal
		a. The attention of an advisor to the students' problem.	Ordinal
		b. The friendliness and politeness of the academic counselor.	Ordinal
		c. The willingness to give attention to the students who need academic information.	Ordinal
		d. The willingness to give counseling without considering the students' social status.	Ordinal
		e. The openness of advisor to give information.	Ordinal
			Ordinal
			Ordinal

TABLE 2.2.
THE INTEREST RATE OF INTERVAL CLASS

Tingkat Kepentingan/interest rate	Rentang Skor/scoring range
STP (Sangat Tidak Penting/very unimportant)	1.000 - 1.857
TP (tidak Penting/unimportant)	1.858 - 2.714
ATP (Agak tidak penting/less unimportant)	2.715 - 3.571
CP (Cukup Penting/important enough)	3.572 - 4.429
AP (Agak Penting/Rather important)	4.430 - 5.286
P (Penting/important)	5.287 - 6.143
SP (Sangat Penting/very important)	6.144 - 7.000

3. THE RESULT OF THE RESEARCH AND EXPLANATION

3.1. The Respondents Conceptions about Counseling Model I and II

The results of the counseling system model I and II, as in the following table: (see table-3.1).

TABLE - 3.1.
Result of Counseling Model I and II

Dimension	Model I	Model II
<i>Tangible</i>	5,91	5,61
<i>Reability</i>	5,24	5,64
<i>Responsiveness</i>	5,35	5,35
<i>Assurance</i>	5,35	5,35
<i>Empathy</i>	5,41	5,41

3.2. The analysis of difference between counseling system model I and II.

The processed analysis based on Oneway Anova testing,

- Referred to the Tangible dimension, It shows that There is a significant difference in the students' conceptions to the counseling system model I and II, the significant level is equivalent to 0.0000
- Referred to The Reliability dimension, it shows that there is a significant difference equivalent to 0.002.
- Referred to The Responsiveness dimension, it shows significant difference equivalent to 0.015
- Referred to The Assurance dimension, it shows a significant difference, equivalent to 0.000

- Referred to the Empathy dimension, it shows a significant difference, equivalent to 0.012.

4. Conclusions and Suggestions

4.1. Conclusions

This research is a study to know the student's conception to the implementing of counseling system in Widyatama University, especially in Business and management faculty. It can be concluded that from the five dimensions of quality services in counseling system model I is considered that the respondents' conceptions to the Tangible dimension is rather important for the students. While, Reliability dimension is rather important, Responsiveness Dimension is rather important, Assurance dimension is rather important and Empathy dimension is important. It can be concluded that the averages of the students' conceptions to the counseling system model I is rather important.

Therefore, the respondents' conception to the counseling system model I from the Tangible dimension is important, Reliability dimension is important, Responsiveness dimension is important, Assurance dimension is important, and Empathy dimension is important. It can be concluded that the averages of the students' conceptions to the counseling system model II is important.

Because of the difference of interest rate to the Counseling system Model I and II, the significant testing is needed to reveal the difference significantly for all dimensions of quality services

4.2. Suggestions

From what has been described from the conclusions, the writer would like to give suggestions. Those are as follows :

- a. It needs a further research to the evaluation of counseling system implementation.
- b. It needs an intensive control to increase counseling activity.
- c. It needs a good administration to handle each student.
- d. To optimized the counseling service, in order not to inhibit students.

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Determinants of Work Performance of Stakeholders: An Evaluation of the Human Resource Short Term Training Program of the University of Mindanao

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Abstract—This endogenous research determined the degree of influence of determinants on work performance. Using the mixed method approach, findings reveal high levels of capability, motivation, and opportunity that were provided to stakeholders of the University of Mindanao. Such level was substantiated by stakeholders' feedback related to improved subject- matter expertise, better relationship with students and colleagues; and a sense of gratefulness as well as heightened self-confidence. For the profile indicators, only civil status matters as far as work performance is concerned. Among capability, motivation and opportunity, only the last was ascertained to have a significant influence on work performance. Nonetheless, the epistemological, ontological, and axiological interpretations of their experiences avowed equally the merit of the other two determinants. Finally, the employees' *experienced meaningfulness* and *experienced responsibility* as indicators of work performance were found to be very high, but not for the *experienced productivity* indicator which only gained a high level due to a moderate level of response to its indicator on 'doing research'.

Keywords: *determinants of work performance, stakeholders, human resource short term training program*

I. INTRODUCTION

In a context of highly competitive and information technology- driven global milieu, organizational reengineering is called for to ensure that the quality of service delivery fits prevailing realities and future market conditions (Ouskel & Vyhmeister, 2001; Becker & Steele, 1995). The design and development of valid and robust measures for organizational performance may well be considered necessary at this time (Wood & Wamsley, 2004). Consequently, the work performance of the human resource of an organization can indeed shape organizational success (La Oberhauser, et.al, 2010). The same can be said for academic institutions which rely on the complementary functions of teachers, support staff

and administrators (Early & Bubb, 2004) in order to remain relevant and efficient.

In particular, a large number of Philippine schools were reported to manifest declining levels of quality, and that public schools are generally perceived as offering low quality education (Meinardus, 2003; Lam, 2005). To address this low quality issue, the Commission on Higher Education campaigned for the compliance to relevant educational qualification and training of faculty as one of the key development agenda for universities and colleges (MTDP-HE, 2007). Thus, public and private higher education institutions are increasingly urged to align their development agenda with those articulated by the governing authorities.

The University of Mindanao, being the largest private school in the southern part of this country, serving 31, 000 students in 11 campuses, made explicit in its 5- year institutional strategic plan for 2006-2011, the training and development of its approximately 1,100 personnel as a key priority in terms of funding and quality policy. The institution's training records show that between 2007 to the 1st quarter of 2011, a total of 1,248 employees were sent to offsite training and development activities in local and international venues. The school also initiated 133 on-site seminar-workshops utilizing in-house trainers and external training providers.

However, the extensive provision of training and development opportunities for the employees of the said university needs to be evaluated in terms of how these have influenced their capacity and motivation to perform their assigned duties. The researchers agree with Mankin (2009) who argued for the necessity of evaluation of trainings in order to verify its effectiveness while findings from such kind

of evaluation are useful as a referent to future capacity development efforts (Horton, 2002). At present, the training evaluation activities of the Human Resource Department only address the first two levels of Donald Kilpatrick's model for training evaluation, which is participant reaction and knowledge. Thus, this study sought to find out the 'transfer of learning' from short term trainings to the conduct of the employees' work assignments. This purpose was addressed by determining how the overall work performance of trained employees were influenced by trainings they attended for the last three years.

Research Design and Data Treatment

A. Statement of the Problem

Objectives. This study determined the degree of influence of stakeholders' non-cognitive variables, capability, motivation and opportunity on their work performance. Equally, it ascertained the qualitative evaluation of stakeholders on the same indicators in connection to the short term trainings they attended.

Theoretical Framework. This formative evaluation research is anchored on interlocking theories related to organizational development. According to Ivancevich, et, al, (2008), work performance is determined by the capacity to perform, opportunity to perform, and motivation to perform. Ivancevich (2004) theorized earlier that motivation, as a predictor of work performance, takes in among others, distributive justice, expectancy, and reinforcement. This means that people will be motivated to perform well if they perceive equity, expect benefit and reward from the work that they do for the organization. However, Lundborg (2004), who gave greater emphasis on the role of management, theorized that organizations create opportunities by framing the structural (lay-out and roles), leadership (changing, accessing and influencing) and cultural qualities regarded as necessary for the organization's success. Finally, Baser and Morgan (2008) theorized that the elements of capacity as a determinant of work performance includes the "capability to adapt and self-renew, to commit and engage, to carry out technical, service delivery and logistical tasks, to relate and attract, and to balance diversity and coherence" (p.231).

Conceptual Framework. The five variables were demographic profile, capability, motivation, opportunity and work performance. The first four comprise the independent variables. The demographic profile of the respondents was defined in terms of sex, civil status, employment status, type of stakeholder, educational attainment, number of training attended, and number of years employed. The capability variable was denoted by abilities to adapt, to commit, to carry out task, to relate and attract, and to balance diversity and coherence. The motivation variable was indicated by equity, benefit and reward motivations. The opportunity variable was shown by structural, leadership and cultural qualities. Finally,

the work performance was manifested by the level of experienced meaningfulness, responsibility and productivity of among the respondents.

II. METHOD

A. Research Design and Data Treatment

This study used a combination of quantitative and qualitative approaches which Johnson & Christensen (2008) referred to as mixed method. This particular methodology was used for two reasons: 1) mixing the methods of quantitative and qualitative research allow for a more thorough and realistic description of the situation under scrutiny; and 2) mixed methods allow inquirers to see the links among the components, sections or nuances of a social phenomena (BERA, 2011).

The results and findings are harmonized and matched (Creswell, 2006). The quantitative part utilized descriptive correlation method specifically multiple linear regression. Adapted and validated questionnaires were administered. Using descriptive statistics, the mean scores of the independent variables namely, capability, motivation, and opportunity to perform were used to describe the levels. The degree of influence of these variables on work performance was tested through the use of correlation statistics particularly multiple linear regression.

Equally, the qualitative-interpretive method was utilized. Guided with open-ended questions, the pieces of qualitative information were gathered, sorted and categorized using coding system (Colton & Covert, 2007). Frequency of occurrence of information was determined through tabular presentation (Trochim, 2001).

In writing the qualitative texts, the study utilized the experiential-theoretic transition model presented by Piantanida and Garman (2009). The presentation of findings was written in mix of situational and iterative interpretation. The conclusion was written following the theoretic interpretation technique and done in the framework of correct and multiple line of logical discourse with corresponding evidences such as audit trail. Thus, coherence and rigor, artistry and ethics were ensured.

B. Ethical Considerations

The principles and guidelines of Johnson & Christensen (2008) in upholding ethical standards were undertaken. These included informed consent, confidentiality, anonymity and privacy. In the case of endogenous research, ethical issues particularly on anonymity of participants can be problematic. However, steps were made to address these. For instance, school officials were assured that the report will not harm the reputation of the institution. In addition, respondents were not asked to write their names on the survey form while participants in the focus group discussion were shown the

narrative drafts a few weeks after the interview so that they can appraise whether their identities were sufficiently hidden in the narratives (Trowler, 2011).

C. Research Locale

This study was conducted at the University of Mindanao (UM) located in Southern Mindanao, Philippines. Standing in ten campuses, UM has been granted autonomous status by the Commission on Higher Education because of its indisputable performance in line with academic excellence and formation of Filipino values, both indicative of its contribution to nation building and peace in the region.

D. Respondents/ Study Participants and Sampling Technique

The total no. of survey respondents was 197, randomly selected among the 1,100 officials, teaching and non-teaching personnel. The selection of the participants of the three focus group discussion however was purposively done based on the following qualifying criteria: a) must have a minimum of 3 years of employment ; b) has attended both an off-site and on-site short term training yearly; c) recommended by the head of the program or office; and d) willingness to participate in the focus group discussion. With a total of 27 volunteer individuals as FGD participants, the saturation level (Mason, 2010) was reached

III. FINDINGS

A. On Demographic Profile

There were more female than male respondents, however with a gender distribution difference of only 5 percent. There were more married than single stakeholders. The latter was a little over one half (55 percent) of the former. Employees with probationary status account for one third of the total number of respondents employees with two-thirds having permanent employment. The number of stakeholders according to type coincides with the teacher-non-teaching-administration with highest-lowest order. The distribution in terms of educational attainment follows a 48-43-9 percent arrangement led by those with master degree followed by baccalaureate and doctorate degree holders. There was a 76-24 percent distribution in favour of those who had attended three and less number of trainings as compared to those with more. Finally, twice the number of stakeholders was employed in three and less years compared to the number of those already employed in four and more years.

A. On Capability.

With an overall mean of 4.2, the stakeholders reveal a high level of capability. This means that they were highly able to adapt, commit, carry out tasks, and balance diversity. The capabilities acquired from short term trainings attended have equipped them in terms of applying new trends in

science and technology as well as social development and research. Such gain is sensed in the stakeholders' creativity and innovativeness, conversance, dynamism with sincerity and patience that encourage endurance in learning, and in their confidence, commitment and enthusiasm in service.

According to the study participants, the knowledge, abilities and skills acquired from trainings have improved their way of redesigning curriculum content (planning), of facilitating classes (implementing pedagogy) and of assessing the impact of their teaching practices on students' learning outcomes (evaluating). These findings affirm that the components of capability are knowledge and skill (Hughes *et al*, 2009; Desimone, *et al*, 2002).

Furthermore, these improved capabilities led to strengthened relationships among peers and paved the way to a more dynamic and healthier cooperation among work colleagues, shifted their orientation towards, professional behaviour and work priorities, transformed their perspectives about issues and events inside and external to the institution, enticed deeper involvement in the social actions, developed the sense of fulfilment in work and gratification, and widened the horizon by becoming members of professional organizations, building linkage with industry partners, gathering teaching-learning resources, as well as the rare opportunity to see new places and personally participate in key professional events. All these acknowledged improvement in their capabilities agree with what Baser and Morgan (2008) contends that ability and skill drives people to do and go beyond the usual task.

The diverse impact of capability obtained from different trainings made the stakeholders give varied feedback about HRMD efforts. Positive remarks included good and manifesting effort, initiating significant training, triggering excitement to discover new things, and influencing people to perform better. However, they also revealed matters that need immediate corrective measures which include the following: a) inviting incompetent speakers, b) miscommunication about the substance of the seminar/training objectives or topic causing expectation failure: c) seemingly sending the wrong person for the training or sending the same people repeatedly; d) lack of orientation or awareness on the concrete and clear guidelines to qualify in the screening of recommended delegates; e) inadequate funding and absence of explanation for budget cut or disapproval; f) delayed release of funding support for training; g) poorly organized training activities in both onsite and off-site venues; h) inconvenient or far flung-venues which are costly thus reducing its attraction for funding support; i) late posting or announcement of list of trainings which gives little time for stakeholders to choose from, apply and anticipate; and finally, j) the perceived absence of mechanism to avoid decreasing attendance while the training is going on.

With the issues raised, the following were measures were suggested: 1) setting up a committee to carefully select the most suitable speaker; 2) provide a more thorough background on the scope of the seminar to potential attendees so that these may more closely align to their training needs and interest, thus avoiding waste in time, effort and resources; 3) select training participants based on clear guidelines and undertaking a screening process that allows the collective participation of colleagues in the department. In addition, the HRMD and/ or department officers may invite the applicant to explain the proposed budget for the training as well as provide early a list of trainings. Also, venues should be an important consideration, selecting those that are appropriate to the topic or training objectives. In-house trainers need also to be equipped with facilitating and organizing skills. The HRMD should likewise initiate more hands-on and output oriented training rather than the seminar or input type. Finally, better communication regarding the significance of time, effort and monetary outlays for certain short term trainings, and specifying clearly on the ROAST or training proposals the date for the release of the approval and fund support are regarded useful.

B. On Motivation

The stakeholders were highly motivated by equity and reward system provided by the UM Human Resources Development and Management as each of these indicators obtained a respective mean of 4.12 and 3.94; however they were only moderately motivated by benefit system as pointed out by the said indicator's mean of 3.38. Thus, the overall level of the stakeholders' motivation was high as indicated by total mean of 3.81.

There were two levels of motivation revealed by the study participants: motivation to avail of the short term training and motivation to improve work performance by means of applying what is learned from the trainings. It was likewise very clear that considered motivational factors are belief about the benefit that can be acquired from the training, sense of responsibility, desire to learn and interest to be updated in order develop professionally and to work effectively and efficiently, eagerness to apply what is learned, feeling fulfillment to see students develop and become successful as offshoots of the imparted knowledge on them, aims for excellence, and support of peers. These coincide with the notion of Conner (2004) that motivation, either from within or outside, make the decision to act including to take or reject the chance to learn.

On the other hand, the negative remark and memo concerning violations plus corresponding penalties like salary deduction, the imposition of penalty even before confirming it with the person concern, and insufficient financial support for one attending training were considered as demotivating experiences for one to perform better. With these, the following were recommended: a) the use of milder words in

stating violations; b) confirming with the person concerned before any penalty is imposed; and c) to regularly review compensation package and possibilities to improve policies like converting sick leave into cash and increasing the financial support to someone sent to (offsite) short term trainings.

D. On Opportunity

There was a high level of opportunity provided to the stakeholders by the UM Human Resources Development and Management. Such finding was indicated by an overall obtained mean of 4.09 for the opportunity variable and its specific indicators' respective means that was, structural quality with 4.15, leadership quality with 4.11, and cultural quality with 4.00.

Provision of opportunity particularly for onsite training or sending one for offsite training so as to lead towards an improved performance is considered a shared responsibility by the faculty/staff, HRMD personnel and line managers, deans and the program heads in particular. The rank and file employees were given importance by consulting them about their needed knowledge and skills. This was considered an indication of bottom-up scheme in knowing the stakeholders' needs which rather attracted greater participation in short term training and improving one's work performance.

The organizational structure and leadership in the HRMD was regarded a material to the development of enthusiasm and sustainability of the employees' efforts to perform better. The culture of participation, sharing and desire to improve capability is strengthened and broadened by the existing structure and leadership. Yet suggestions were mentioned to improve the condition. These were the need to develop the culture of prompt and timely dissemination of information, notice of approval or disapproval of requests to attend trainings and the timely release of budget. Also suggested was the putting up of an HR Information system which can greatly smoothen the operations related to employee development.

The hope to establish the friendliest working environment was expressed by the stakeholders. The leadership was expected to lead in minimizing or even eradicating "*chismis*" that was regarded and felt as demeaning and absurd for an academic institution. There was also a suggestion to establish a mechanism to ensure fairness in sending delegates from different branches and to expedite release of training fund/refund. A local HR was mentioned as probably one effective means to address these identified problems.

E. On Work Performance

There was a high level of work performance among the stakeholders of the University of Mindanao as indicated by an overall mean of 4.37. Such level was an average result of the stakeholders' very high level of experiencing meaningfulness in their work, very high level of experiencing responsibility, and high level of experiencing productivity as indicated by respective means of 4.64, 4.64 and 3.82. The productivity indicator had a much lesser mean as compared to experience of meaningfulness and responsibility – reason that the overall level of work performance was pulled down to just high instead of very high level.

Work performance was measured likewise according to the level of emotion felt while performing tasks and functions. Common emotions revealed were happiness, fulfillment, longing and aspiration, unworried, ensured, gratification, and confidence. Moreover, work performance was described as a process dynamically evolving. The study participants described their work performance saying that they are “continuously improving” and willing to sacrifice. This means that they were functioning actively and progressing vigorously, and were willing to extend time and give more energy in working amidst hectic schedule and with limited resources. These accounts agree with the assertion of Curtin and Garcia (2011) that work motivation is considered as one of the various components of work performance. Finally, the study participants described their work performance according to their awareness of their responsibility and efficiency, their impact to the students, achievement of the students, and relationship with colleagues which are social urges in nature. This conforms to the assertion of Hall *et al.*, (1998) that “humans are motivated primarily by social urges.”

F. Influence on Work Performance

Among capability, motivation and opportunity as determinants, only the latter had a significant influence to work performance as indicated by its p-value of 0.00 which was lesser than the 0.05 level of significance. Likewise, among the items defined in the demographic profile of the respondents, only the civil status had a significant attribution to the influence of opportunity on the work performance. Such association was pointed out by the obtained p-value of civil status that was 0.00 or less than the 0.05 degree of significance. This finding does not totally conform to the idea Ivancevich *et al.*, (2008) that the aforementioned variables significantly determine work performance. However, from the focus group discussion, it appeared that work performance was determined by study participants' capability that was enhanced by short term training, by their motivation to work, and by the support from leadership that was made easy by existing structure and practices.

IV. CONCLUSIONS

The level of capability gained by the stakeholders from training is high. It was confirmed by the stakeholders' expertise in designing, redesigning, implementing and evaluating pedagogical content and strategies, and in relating with students and colleagues. The level of motivation is also high and is manifested by stakeholders' enthusiasm in applying what were learned from short term training. Likewise, the level of opportunity provided to stakeholders is high. The attendance to short term trainings and the culture of sharing manifested this. Further, the level of work performance of stakeholders is high as contributed by very high level of experiencing meaningfulness and responsibility but by only moderate level in productivity. The stakeholders' confidence and desire to keep on improving affirmed this. Finally, among the determinants, opportunity significantly influenced the stakeholders' work performance. Civil status does as well. However, the epistemological, ontological and axiological interpretations of the stakeholders on their experiences indicate how all determinants equally contributed to work performance cutting across all non-cognitive variables.

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