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SEAAIR
SOUTH EAST ASIAN ASSOCIATION
FOR INSTITUTIONAL RESEARCH

Proceedings

Cross-Cultural Education in AEC 2015:
Realizing Possibilities, Defining Foundations

The 14th Annual SEAAIR Conference
07-10 October 2014
Aquinas University of Legazpi
Legazpi City, Philippines

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AQUINAS UNIVERSITY OF LEGAZPI
The Dominican University of Bicol
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Message

ASSOC. PROF. TEAY SHAWYUN, Ph.D.
President, SEAAIR

Dear delegates of SEAAIR 2014 Conference,

On behalf of SEAAIR, we would like to extend a very warm welcome to all participants of the 2014 SEAAIR Annual Conference in Legazpi, the Philippines, graciously and gracefully hosted by the Aquinas University of Legazpi.

In the 2014 Conference, 156 Researchers from 8 countries submitted a total of 124 abstracts and 87 were accepted. The keytheme, *"Cross-Cultural Education for AEC 2015: Realizing Possibilities, Defining Foundations,"* highlights a major challenge for higher education institutions when ASEAN grows closer and more open allowing freer flow of resources and a more open market accessibility. A key aspect of this more open AEC, the intercultural aspect of our ASEAN students' expectations, needs to be re-examined in our educations systems so that our students must not only be self-sufficient but are also understanding and are capable of working amicably and cooperate well across different ASEAN economies towards a better world in the future.

SEAAIR conferences have always aimed at bringing together policy-makers, academics, researchers, practitioners and managers in ASEAN higher education institutions. 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 14 years to provide a balance of quality academic papers and the rich culture as offered and shared by each host institution anchored in Malaysia, Thailand, Indonesia, and the Philippines. We fully believe that SEAAIR will continue to benefit and build on the academic and cultural learning and sharing as we move towards a more culturally involved ASEAN 2015 when in 2015 we venture into Vietnam for the first time to achieve a 50% ASEAN countries of involvement.

It is hoped that everyone will enjoy the conference's learning and sharing, the open and caring Filipino hospitality, the local Legazpi hotspots and cultural icon of the ever beautiful Mayon Volcano, the pride of the Bicol region at the southern part of Luzon.

We sincerely thank the 2014 SEAAIR Conference LOC members and teams to take up the challenge of hosting SEAAIR in Legazpi, the Philippines and all participants who will make this conference a success. Happy sharing and learning through our ASEAN ways.

Thank you and I remain.

Message

Fr. Ernesto M. Arceo, OP

REV. FR. ERNESTO M. ARCEO, O.P.
Rector and President
Aquinas University of Legazpi

Greetings, my fellow ASEAN citizens.

The experience of hosting an international gathering of academics and researchers is both humbling and ennobling. Humbling as one gets to realize that he has no monopoly of knowledge and wisdom; ennobling because in the presence of the seekers of knowledge and truth, one gains wider perspectives on and deeper insights into the common and diverse problems and issues affecting various institutions in countries near and far.

The Province of Albay, where Aquinas University of Legazpi is situated, will certainly experience the effects of the ASEAN Economic Community (AEC) 2015. That we at the academe must gather as much knowledge, information, and technology is expedient for us to cope with both the windfall and the fallout, foreseen or not. One could ask, "are we ready for ASEAN, or is ASEAN ready for us?"

It is thus a privilege and an honor for the University to host the 14th Annual Conference of the South East Asian Association for Institutional Research (SEAAIR) with its timely and most fitting theme, "Cross-Cultural Education for AEC 2015: Realizing Possibilities, Defining Foundations" this October 7 to 10, 2014.

May we in these three or four days indeed be able to draw the blueprints towards realizing a better future for the citizens of our countries and for our institutions.

Welcome to Legazpi City and the Province of Albay and may God bless us all.

Message

SUSANA C. CABREDO, ED.D.
Vice-President for Academic Affairs
Aquinas University of Legazpi

It is our great honor and pleasure in Aquinas University to host the 14th Annual Conference of South East Asian Association for Institutional Research (SEAAIR) with the theme: “Cross-Cultural Education for AEC 2015: Realizing Possibilities, Defining Foundations.”

We welcome all our guests and delegates to this gathering of intellectuals from the Southeast Asian Region across the Pacific Rim. The educational milieu has changed enormously over the years. Many of the ideas which have become current in the twenty-first century challenge our notions about the nature of our educational system in this part of the globe. How the infinite possibilities of strengthening our collaboration through sharing our research outputs and experiences will unravel for the next three days shall form part of Aquinas University’s contribution to the evolving educational landscape not only in the Philippines but also across the globe.

This international conference is another milestone in the academic history of Aquinas University as we give importance to the intellectual pursuit of academic institutions from our neighboring Asian countries. The conference theme conjures up an image of vibrancy in the way educators from across the Southeast Asian Region in their multitudes of voices and in different modes gather together as they share their ideas borne out of research and experience through parallel discussions and parallel sessions.

May this conference foster stronger ties among community of scholars and teachers built on lasting friendship from which research and other forms of professional growth and development can flourish.

Message

HON. FERNANDO V. GONZALEZ
Congressman
3rd District of Albay

My warmest felicitations to all of you!

I extend my most sincere welcome to all the participants of the 14th Annual Conference of South East Asian Association for Institutional Research (SEAAIR) 2014 International Conference hosted by Aquinas University of Legazpi on October 7-10, 2014 with the theme: "Cross-Cultural Education for AEC 2015: Realizing Possibilities, Defining Foundations."

This conference has included a diversity of topics presented by authors from many different institutions across the Southeast Asian Region. This brings a plurality of interests and perspectives to a single location – Legazpi City, Philippines. I hope you take advantage of this opportunity and contribute, through presentations, discussion and interaction, to the development of new ideas and new directions in research for the upgrading of the quality of education.

In addition, there is a tour during the last day of the conference that shall allow you to fully appreciate the majesty and grandeur of the Mayon Volcano from different angles and visit scenic spots in Legazpi City and the Province of Albay. Please take advantage of this opportunity.

I hope you find the conference, including the keynote speakers, the parallel sessions and other program events not only educational but also interesting.

I would like to commend the extra effort of the officers, organizers and sponsors, staff and other organizing committee members who have taken time out of their busy schedules to help organize this year's conference.

CONGRATULATIONS! ! !

Message

HON. JOEY SARTE SALCEDA
Governor
Province of Albay

An educated citizenry has always been the hallmark of a progressive and modern community. No development could be expected, much less sustained, if the people lack the basic information and skills for advancement.

This is the reason why we in Albay put the lion's share of our resources towards the education of the young, the improvement of skills of the working class and the unending support for information dissemination for the citizenry in general. Albay allocates over one-third of its total funds for education. In fact, more than half of the provincial funds are allocated for education and health—thus a healthy and well educated constituents are foremost in our governmental agenda.

In addition, the province allocate funds for students so that these needy but brilliant scholars are assured of comprehensive and complete education unperturbed by family and personal problems that impinge on their academic life.

In addition, we also recognize the cultural transformations going on in the world today that affect our educational system—and the adjustments that our scholars and educators must make if we are to be globally prepared and be relevant.

As head of the province, I am exceedingly glad to learn about and I welcome conferences like the SEAAIR 2014 that enable the dynamic exchange of knowledge and experiences with our neighbors in the ASEAN Economic Community. We have a lot to share within our sphere of operation and influence.

Through the ensuing deliberations and exchanges of ideas, we are able to fast-track our pursuit of excellence and sustainability in education. Interactions like these also tend to enhance the creativity of our researchers, educators and practitioners of education.

Please be assured of the support of the provincial government in this endeavor.

While in Albay, I enjoin all the participants to this conference to savor the best that our province could offer: the hospitality of our warm people, fantastic food, fascinating cultural heritage, and enchanting tourist destinations.

Message

We extend our warm felicitations to the delegates of the 14th Annual Conference of South East Asean Association for International Research (SEAAIR).

South East Asian countries can better compete with its European counterparts if the member states are cohesively bonded for a common purpose. Cross-Cultural Education could be the tool to better achieve such goals.

In today's fast changing world and business environment, the trend is towards mainstreaming and integration that complements existing programs and activities to enhance its applications and effectiveness.

Education has been responsible for the progress and development that man now enjoys. The same education will be the tool for ASEAN nations to promote mutual understanding and harmonization and to boost the multi-cultural similarities among its people.

We are confident your gathering will yield innovative ideas and recommendations that will further enhance the unity of ASEAN nations and promote better relations among the economies of South East Asia.

We are honored to host your gathering and wish you a productive Conference. Mabuhay ang SEAAIR!

HON. NOEL E. ROSAL
Mayor
Legazpi City

"Padagos tang Buhayon an Legazpi"

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CONFERENCE THEME

Cross-Cultural Education in AEC 2015:
Realizing Possibilities, Defining Foundations

Subthemes:

- Development Education Models for AEC 2015
- Cross Culturalization of Higher Education Institutions in AEC
- Leading-Edge Strategies and Practical Solutions to Educational Quality
- Contemporary Problems in Education: Exploring the AEC Boundaries
- Education and Authentic Human Development for AEC

CONTENTS

Enhancing Learner's Knowledge of Business Management through a Business Simulation Online Game

Traci Morachnick
Saranya Kantabutra
Faculty of Business Administration
Chiang Mai University
Thailand

ABSTRACT

The rationale for the research is based on a review of prior literature that asserts that business simulation games provide opportunities to deliver valuable skills through a medium that students find highly engaging. This research investigated this assertion through the implementation of the Small Business Online Game as a participatory action research along with the output from a quantitative pre/post questionnaire and knowledge gained about management through a multiple-choice test. The study results from implementing a business simulation online game found an increase in student's attitude towards game-based learning however students' average multiple-choice test score did not increase after participating in the business simulation online game. The study also reveals that pre-game motivation has the strongest impact on post-game motivation, followed by gaming behavior and perceived usage, respectively. However, in terms of engagement, we found only one variable affecting engagement, which is gaming experience. Considering the results, the researchers can recommend incorporating a business simulation online game into undergraduate business courses as a method to engage students in active learning. Yet in order for a simulation online game to be an effective learning tool; course materials must be developed in order to aid students in the cognitive process of gaining new knowledge.

Keywords: **business simulation games, game-based learning, intrinsic motivation, student engagement**

Introduction

As Thailand comes closer to entering the AEC there is a need for students to experience innovative, real world and engaging learning experiences provided by higher education. Higher education is influenced by external changes such as social behavior, business trends and technology hence a need to add educational value to business course offerings (Pillay and James, 2013). The educational process in business schools throughout the world is continually criticized for failing to engage students in skills necessary for employment (Neubaum et al., 2009; Avramenko, 2012). Prior research has mentioned two broad categories for the failure; 1) is due to the irrelevance of the management theory being taught and 2) the outdated processes used to teach the students (Avramenko, 2012). To address the above weaknesses a participatory action research was implemented to enhance learning through the introduction of a business simulation online game ("BSOG").

This study has implemented a BSOG as a method to allow students to practice specific skills valued by employers and necessary for business school graduates such as communication, problem solving, critical thinking and analysis of both verbal and financial data within an environment that allows for failure to be redressed, and for alternative strategies to be employed without the possibility of long-term punitive consequences (Chakravorty and Franza, 2005; Vos and Brennan, 2010).The BSOG used allows for a degree of complexity encouraging students to integrate businesses concepts that have been taught in prior course work.

Prior literature has asserted that business simulation games provide opportunities to deliver valuable skills through a medium that students find highly engaging.This research investigated this assertion through the implementation of the Small Business Game along with the output from a quantitative pre/post questionnaire and knowledge gained about Small Business Management through a multi-choice test regarding the usage of the BSOG, and has drawn conclusions for educational practices. This paper reports on the student's pre-game attitude to determine the degree of motivation and engagement with BSOG and to discuss evaluating students enhanced knowledge of business management concept by participating in the BSOG.

Literature Review

The reason for interest in simulation games as a tool for dispensing business knowledge is due to the fact that simulations allows for a real life situation to be acted out. Other writers have quoted the Chinese proverb: I hear and I forget, I see and I remember, I do and I understand. The dominant teaching method in universities over the past decades have been the large lecture format (Fish, 2007; Piercy et al, 2012) which has advantages such as the ability to teach large numbers of student's with relatively little faculty or facility overheads (Nicholson, 2000 as cited by Piercy et al, 2012). However, it has been argued that the large-lecture format fails to actively engage students in the learning process (Fish, 2007). Further research has argued that this is a significant failing given the evidence that involvement in the learning process significantly improves knowledge retention and the ability to apply that knowledge (Karns, 2005; Leemkuil and deJong, 2012). Furthermore, a number of management academics have argued that teaching should not be restricted to simple dissemination of knowledge but should be focused on "the passing on of knowledge […] such as preparation for working life, learning how to learn, and the internalization of value systems and culture" (Baruch, 2006; Piercy et al, 2012). Further research has noted that simulation games allow students to be subjected to the type of behavior evidenced by entrepreneurs in their day-to-day business under conditions of ambiguity and risk (Huebscher and Lender, 2010). Simulation games have been found to allow students to practice specific skills valued by employers such as problem solving, critical thinking, and analysis of both verbal and financial data within an environment that allows for failure to be redressed, and for alternative strategies to be employed without the possibility of total bankruptcy (Vos and Brennan, 2010).

The use of a simulation games for business education offer students an opportunity to engage in the process of entrepreneurial and management decision making allowing for input from the students regarding such issues as start-up, profit/loss, distribution/logistics, market strategies, as well as the interdependencies of key business and managing variables. Students become actively involved with business practices through engagement with the simulation scenario. However, most authors agree that active learning approaches including simulation games need to be underpinned with knowledge gained from more traditional methods such as lectures and readings (Laverie, 2006; Vos and Brennan, 2010) and that for successful leaning to occur, students must also have the opportunity to reflect systematically on their experience and to grasp how it connects to the course content and learning outcomes. Huebscher and Lender (2010) note the constructivist learning theory [developed by the famous developmental psychologist, Jean Piaget (1950)] when discussing the value of a simulation game used in an entrepreneurial course.

Constructivist learning theory asserts that individuals create their own new understanding on the basis of an interaction between what they already know and believe, and ideas and knowledge with which they come into contact. Contact with concepts that cause cognitive conflict or puzzlement is the stimulus for learning and based on the learners' interaction with their environment. Simulation games can be successful if participants understand their existing knowledge so they are able to contextualize this knowledge into simulation scenarios.

Intrinsic motivation

Prior research has noted that the best known distinction in motivation research regarding learning engagement and learning outcome is between intrinsic and extrinsic motivation (Huebscher et al, 2010, Hainey et al, 2011, Mayer et al, 2013). Intrinsically motivated behaviors are carried out because they are rewarding in themselves, while extrinsically motivated behaviors are carried out because of the desire for some external reward, such as money, praise or recognition from others. Intrinsic motivation is thought to be more successful in engaging students in effective learning because intrinsically motivated students want to study for its own sake; they are interested in the subject and want to develop their knowledge and competence (Hainey et al, 2011). This distinction has been used by designers of educational computer games, notably Malone and Lepper (1987) who argued that intrinsic motivation is more important in designing engaging games. They suggested that intrinsic motivation is created by four individual factors: challenge, fantasy, curiosity and control and three interpersonal factors: cooperation, competition, and recognition. In Hainey et al's opinion these factors also describe what makes a good game, irrespective of its educational qualities.

Huebscher et al (2010), find that simulation games are an intrinsically motivating teaching method for problem-oriented learning in an authentic context. Furthermore Mayer et al (2013) statistical analysis showed a strong influence of the motivation of the student before the game on learning satisfaction. In other words, when students expect a game to be 'fun', there is a higher chance that they also will find it fun and will have a higher appreciation of the learning. In Mayer's research result she created the proposition that 'Intrinsic motivation' beforehand and 'Anticipation of fun' strongly influence the actual enjoyment and learning after the game.

Evaluating simulation online game based learning

It has been noted that playing digital games lead to a variety of positive outcomes and impacts but it has also been noted that the literature on computer games as learning tools are fragmented and lacking coherence (Connolly et al, 2012). Connolly conducted research on "A systematic literature review of empirical evidence on computer games and serious games" as a method to organize prior research in order to understand the effects of games, to offer information for developing more effective games and to propose guidance about how best to use games in learning. Mayer et al (2013) has also mentioned that there is an increased necessity to know the effects of what people are doing concerning digital game based learning. Their research states that there is a need to develop methods, tools and principles for the game based learning community to agree upon, validate and apply. Mayer et al (2013) believe it requires a "science of game-based learning" (de Freitas and Oliver, 2006; Sanchez et al., 2010 as cited by Mayer et al., 2013). The present research aims to evaluate student's engagement in enhancing their knowledge of business management through participating in an online business simulation game based on the conceptual framework as discussed in the section below.

Conceptual framework

The framework implemented to evaluate student's motivation and engagement with the BSOG is adopted and modified from prior research regarding game based learning. In practice, no framework currently exists which addresses the evaluation of enhanced learning through a BSOG. Mayer et al. (2013) designed a comparative model for game-based learning. Their research objective was to determine learning satisfaction with game based learning in higher education. The model was designed for flexibility considering that not all aspects and variables need to be measured in all game based learning cases.

This research has modified the Mayer et al. (2013) framework, as seen below, in order to focus on enhanced knowledge and motivation and engagement variables of a BSOG instead of student satisfaction since they are more practical and useful for this research objective. Additional variables have also been included to make the model more appropriate for this study.

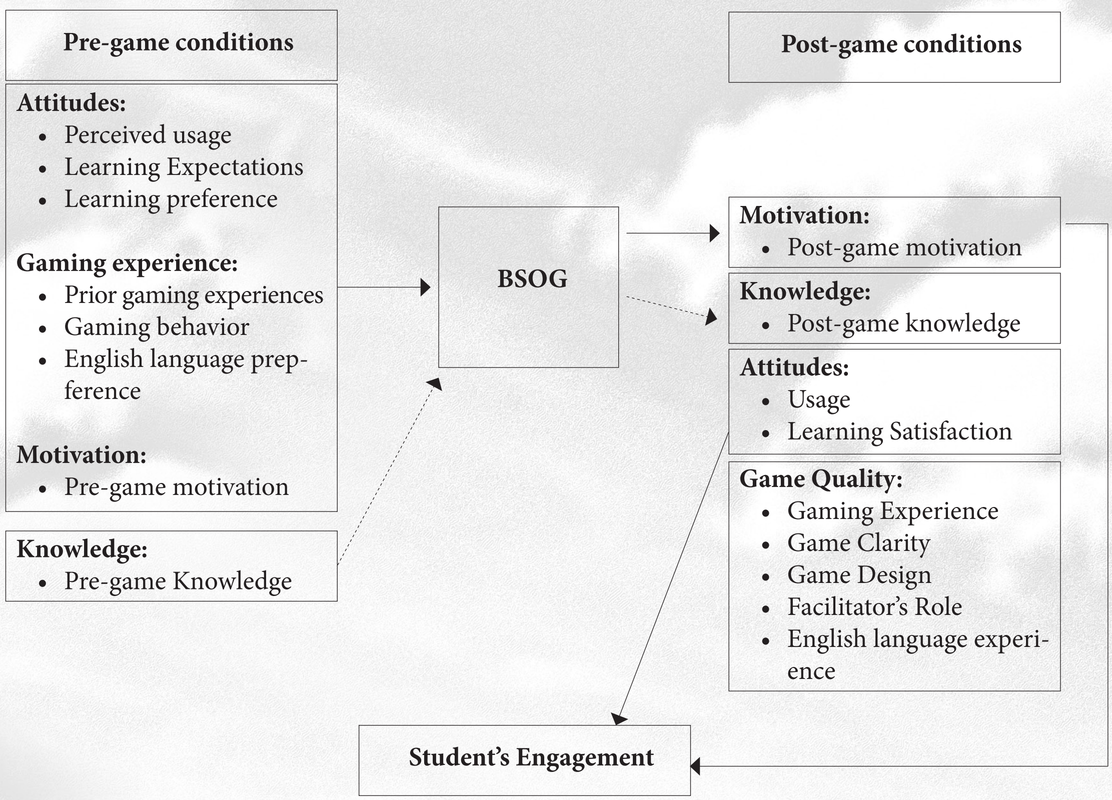

Figure 1: **Evaluation framework for a BSOG (modified from Mayer et al., 2013)**

Research scope

This research investigates students' attitudes towards the BSOG in 2 stages: before and after playing the simulation game.

Pre-game attitude consists of 7 aspects (33 items), namely; learning preference, perceived usage, learning expectations, gaming experience, gaming behavior, pre-game motivation, and English language preference.

1. **Leaning preference**: measures students' perception towards learning individually or in a group. (5 items)
2. **Perceived usage**: measures students' perception towards expected advantages of using a simulation game in teaching business courses. (3 items)
3. **Learning expectations**: measures student's anticipation towards leaning process and learning outcome

when using business simulation game such as idea sharing, knowledge gain, knowledge integration, professional skill improvement, and applying knowledge. (11 items)

4. **Gaming experience**: measures student's perception towards their experience of playing prior simulation games. (4 items)
5. **Gaming behavior**: measures student's perception towards the rules of a simulation game. (3 items)
6. **Pre-game motivation**: measures the degree to which the students expect to enjoy playing a business simulation game. (2 items)
7. **English language preference**: measures student's opinion towards using English as a medium in playing a simulation game. (5 items)

After playing the BSOG, student's attitudes are measured in 8 aspects (34 items), namely; usage, learning satisfaction, gaming design, gaming experience, gaming clarity, post-game motivation, facilitator's roles, and English language experience.

1. Usage: measures students' perception towards the usefulness of the BSOG. (4 items)
2. **Leaning satisfaction**: measures student's satisfaction towards the learning process and learning outcome after playing the BSOG such as idea sharing, knowledge gain, knowledge integration, professional skill improvement, and applying knowledge. (11 items)
3. **Gaming design**: measures student's perception towards the design of the BSOG. (2 items)
4. **Gaming experience**: measures student's perception towards their experience after playing the BSOG. (5 items)
5. **Gaming clarity**: measures student's perception towards the clarity of rules of the BSOG, game material availability, and task requirement. (4 items)
6. **Post-game motivation**: measures the degree to which the student enjoys playing the BSOG. (3 items)
7. **Facilitator's roles**: measures student's perception towards the role of the instructor in conducting the BSOG. (3 items)
8. **English language experience**: measures student's perception towards using English in the BSOG. (2 items)

All of the measurement items are adapted from Mayer et al. (2013) and Haniey (2011).

Hypothesis

H1: Business simulation online game leads to an increase in students' attitude towards game-based learning.

H2: Business simulation online game increase student's score on a multiple choice test in knowledge of management concepts necessary for business operations.

H3: Student's pre-game attitudes and knowledge will determine the degree of motivation and engagement with the online game.

Business Simulation Online Game (BSOG)

The BSOG is a flash-based on-line game environment. It replicates a sports retail store based on retailing football club merchandise. Students register for the game through a teacher console where they input a username and password in addition they select a team (only New Zealand football club are presented). Once they are registered they are able to enter the game site anytime they like. The overview of the screen consists of 5 rooms: The store floor, owner's office, meeting room, worker's room and inventory storage room. Students are able to click on different rooms to conduct various business functions such as order inventory, create marketing promotions, hire staff, raise funds and see cash flow. After the student is satisfied with their selection of activities they click the week tab which will tally their performance. Based on what they accomplish the game will rate each weeks performance such as did they increase cash flow by ordering the right type of inventory and the right quantity of inventory (not too little or too much), were they able to select effective marketing techniques to sell their inventory in a timely fashion, did they take time out to take care of themselves, did they hire the right people for the right price, etc.

The BSOG is organized into 52 weeks but a player can play the 52 weeks in one sitting or the player can save the game and return to the game at a later time. Within the 52 week time frame there is the possibility to go bankrupt and lose everything. Once the player is bankrupt the game ends and the player must start over. The objective is to accumulate cash flow, grow the business and to obtain a work/life balance, if the player is able to obtain the goal, the player will receive a high score. Students are given the chance to experiment with different strategies and tactics to see the impact of their decisions. Depending on the score the students receive at the end of the 52 weeks, the score will be posted to a leaderboard that contains the highest score for all players in the region.

How the BSOG was implemented into the course

The introduction of the BSOG into course work was conducted by having a total of 3different classes meet in the computer lab. Each student was able to have their own computer with the game on their screen. The facilitator would introduce the game by discussing the various tasks incorporated into the game that are necessary to build a sports-retail business. Students were able to explore the game by themselves to figure out the various tasks the game contained and to share their findings with one another. At the end of the first session students had a good understanding of how the game operated and were required to continue playing the game on their own for homework. For the 2nd week students again meet in the computer room to discuss techniques they used to grow the business and to share ideas of how to complete the 52 weeks without encountering bankruptcy. Facilitator and students would meet for a consecutive of 4 weeks in the computer lab to share information regarding the BSOG. After the 4th week of sharing information students were required to continue playing the game on their own for 2 more weeks. On the 6th week students were asked to take the post-multiple choice knowledge test and complete the post-questionnaire.

Data collection

Data collection was conducted in 2 stages using 2 sets of questionnaires and a multiple choice test. The first stage was conducted before the students participated in playing the BSOG. The students were asked to do a pre- multiple choice test (25 questions that relate to management of a small business that has been taught in pre-course work), then to complete the pre-game questionnaire. Pre-game questionnaire consisted of 2 parts. The first part gathered general information of the respondents, which were gender, age, major area of study, year of study, frequency of playing computer game, number of business course enrolled, past experience in simulation game for education, and intention to play other simulation game in education. The second part measured student's perception and opinion towards business simulation game in 7 aspects using 5-point Likert scale ranging from strongly disagree (1) to strongly agree (5).After students finished playing the BSOG, they took a post- multiple choice test (the same questions as the pre-multiple choice test) and filled-out a post-game questionnaire, which measured student's perception towards the BSOG in 8 aspects using 5-point Likert scale ranging from strongly disagree (1) to strongly agree (5).

Analysis

Data from questionnaires and multiple choice tests is analyzed using SPSS version 17. Two statistical analyses were performed; descriptive and inferential statistics.

Profile of respondents

From the results of the 70 valid responses received (from 78 total participants in the classes), the majority of the respondents are female (55.7%), majoring in Marketing (55.7%), studying in their fourth year (84.3%) and are 21 years old (42.9%). The majority of the respondents have no past experience in a simulation game (72.9%). For those who had past experience, it was during management courses when they had participated in a simulation game for education (73.7%). The results also show that a high majority of the respondents have an intention to play simulation games in an education setting in the future (94.3%).

Student's perception towards Business Simulation Online Game (BSOG)

For each pre-game attribute, items that have the highest mean are summarized in Table 1 while the post-game attributes and items with highest mean are presented in Table 2.

Table 1: Pre-game attributes and items with highest mean

Pre-game attributes	Item	Mean
Learning preference	It improves my learning to work together with other students in group	**3.86 (Agree)**
Perceived usage	I think business simulation games add value to lectures and seminars	**3.89 (Agree)**
Learning expectation	I expect that what I learn, I can apply to my career after graduation	**4.39 (Strongly agree)**
Gaming experience	I like that challenge of figuring out how to play new games	**3.89 (Agree)**
Gaming behavior	I rather have the rules of the game explained to me before I begin playing the game	**3.89 (Agree)**
Pre-game motivation	The simulation game's subject is appealing to me	**3.66 (Agree)**
English language preference	I expect to improve my English skills	**4.11 (Agree)**

Table 2: Post-game attributes and items with highest mean

Post-game attributes	Item	Mean
Usage	It improves my understanding about small business management to work on this	**4.09 (Agree)**
Learning satisfaction	What I learn in the Small Business Game I can apply to my career after graduation	**4.04 (Agree)**
Gaming design	I would rather the Small Business Game had included team playing	**3.39 (Agree)**
Gaming experience	More information is necessary in order for me to understand how to play the Small Business Game	**3.99 (Agree)**
Gaming clarity	The tasks that were required of the players were understandable and clearly described	**3.67 (Agree)**
Post-game motivation	I had fun using the Small Business Game	**4.07 (Agree)**
Facilitator's roles	The information given by the lecturer was useful in order to play the Small Business Game	**4.03 (Agree)**
English language experience	I had improved my English skills	**4.10 (Agree)**

To determine whether the BSOG leads to an increase in student's attitude towards game-based learning (H1), result from table 3 shows that students' average perception score of usage variable increases after participating in the BSOG, hence H1 is supported.

Table 3: Paired-sample t-test of mean perception score of students' perception towards pre-game perceived usage and post-game usage

	Mean	N	Std. Deviation	Std. Error Mean	t	df	Sig. (2-tailed)
perceived usage vs	3.81	70	0.552	0.066			
usage	4	70	0.481	0.057	-2.938	69	**0.004**

To determine whether the BSOG increases student's score on a multiple choice test (25 questions @ 1 point each) in knowledge of management concepts necessary for business operation (H2), apaired sample t-test of average pre-game and post-game multiple choice test score are compared. Results are presented in tables 4.

Table 4: Paired sample t-test of average pre-game and post-game multiple choice test score

	Mean	N	Std. Deviation	Std. Error Mean	t	df	Sig. (2-tailed)
pre-game score vs	14.9	70	3.842	0.459			
post-game score	15.26	70	3.65	0.436	-0.613	69	**0.542**

From table 4, we find that Sig. (2-tailed) equals 0.542 higher than 0.05 a significant level. Thus, average pre-game test score and post-game test score is statistically not different. Hence, the BSOG does not increase student's score on a multiple choice test in knowledge of management concepts necessary for business operations. Therefore H2 is statistically not supported.

Regression analysis is used to test H3, which is whether student's attitudes and knowledge will determine the degree of motivation and engagement with an online game. Our study reveals that pre-game motivation has the strongest impact on post-game motivation, followed by gaming behavior and perceived usage, respectively. However, in terms of engagement, we found only one variable affecting engagement, which is gaming experience.

Discussion

This study focused on variables that would help the current researchers determine student's engagement, learning outcome, and if pre-game attitudes influence motivation to engage with the game. An analysis of the data from pre and post questionnaire confirms that student's attitude increases after engaging with the BSOG.

However we found that the BSOG implementation does not increase student's score on a multiple choice test in knowledge of management concepts necessary for business operations. In regards to this finding we offer the proposition that the multiple choice test was not properly aligned to the BSOG concepts, hence did not offer the students amble information necessary to increase their scores.

The other results from this study are aligned with prior research findings. For example when comparing the pre-game attribute for motivation "The simulation game's subject is appealing to me" to post game motivation " I had fun using the BSOG" both attributes obtained the highest mean score (as seen in table 1 and 2). This is aligned with Mayer's proposition that intrinsic motivation beforehand and anticipation of fun strongly influence the actual enjoyment and learning after the game. This finding can refer to what Malone and Lepper (1987) discussed when arguing that intrinsic motivation is more important in designing engaging games. For Malone and Lepper intrinsic motivation is created through challenge, fantasy, curiosity and control along with cooperation, competition and recognition. The BSOG contains a challenge, fantasy, a competition and recognition in which players try to complete 52 weeks of running a sport-retail business without going bankrupt as well as obtaining a high score that appears on the leaderboard with the players name so that other schools can see who the top 10 players are.

There was only one pre-game attribute that received the highest mean for strongly agree (4.39) which is for learning expectation referring to "I expect that what I learn, I can apply to my career after graduation." This attribute fits the concept of intrinsic motivation used for this study which is "intrinsic motivation is thought to be more successful in engaging students in effective learning because intrinsically motivated students want to study for its own sake; they are interested in the subject and want to develop their knowledge and competence" (Hainey et al, 2011). Interestingly the mean for this attribute decreased when it appeared as a learning satisfaction, "What I learnt in the Small Business Game, I can apply to my career after graduation." which received a mean of 4.04. This result suggests a need to incorporate more learning aids throughout the game where the facilitator would incorporate pauses throughout the game in order to discuss techniques for players to understand how to improve the operation of the business. As noted by Tanner et al (2012) prior data indicates that understanding improves during the post-game discussion. They also mention that the majority of research suggests that effective combination of course reading, class discussions, presentations and simulations lead to deeper and accelerated learning.

Other attribute mean scores supports the point that there is a need to incorporate more readings, discussions and presentations when implementing a BSOG. For example the pre-game attribute for gaming experience asked if the player likes the challenge of figuring out how to play new games which received a high mean of agree at 3.89 while the post-game attribute for gaming experience asked if more information is necessary in order for the player to understand how to play the Small Business Game received a high mean of agree at 3.99. The mean score result for post-gaming experience suggests that in order for players to feel they have a deep understanding of the issues presented in the game it would be necessary to incorporate aids in order for players to make sense of the cognitive process such as the implications of decisions that appear through-out the process of growing a small business. The need for aiding learners throughout the games endurance has been confirmed by Onofrei and Stephens (2014) who found that when they implemented a simulation game the learners tended to focus on "playing the game" and not on how the decisions impacted on the outcome.

Recommendations

In regards to the results, the researchers can recommend incorporating a simulation online game into undergraduate business courses as a method to engage students in active learning. Yet in order for a simulation online game to be an effective learning tool; course materials must be developed in order to aid students in making sense of the cognitive process. The online game would need to be part of class discussion on a regular basis as well as having students create presentations about their findings in participating in a simulation game. In order for students to feel confident in the new knowledge gained the researchers recommend that simulations online games are assess through students creating presentations on specific points learnt through participating in such a simulation. Ideally for students to process their knowledge the business simulation presentation should contain why they think the business decision they opted worked in that situation and should be based on course readings such as case studies.

When considering implementing a BSOG into course materials the regression analysis is of use in highlighting motivation and engagement attributes that effect student's perception of the BSOG. It was found that pre-game motivation needs to focus on an appealing subject matter for the students as well as adding value to the course material, which could be referenced by student's high mean for "What I learnt in the Small Business Game, I can apply to my career after graduation." In other words an appealing subject matter and added-value to the course should be aligned to student's future career i.e., management topics, marketing concepts, financial aspects, etc. From the post-game analyses students agree with a high mean of 3.99 that more information is necessary in order for the students to understand how to play the BSOG which was implemented. It is necessary to consider how to engage students to keep playing the game and at the same time to give them enough information to make the game interesting. The researchers recommend the need to implement weekly interactions with game players that would review what was accomplished in the game and information on how to go forward and increase their score or knowledge.

REFERENCES

Avramenko, A. (2012), "Enhancing students' employability through business simulation", Education and Training, Vol.54 No.5, pp. 355-367.

Baruch, Y. (2006), "Role-play teaching: acting in the classroom", Management Learning, Vol. 37, No.1, pp. 43-61.

Chakravorty, S.S. and Franza, R.M. (2005), "Enhancing cross-functional decision making a simulation approach", Decision Science Journal of Innovative Education, Vol. 3 No.2, pp. 331-7.

Connolly, T.M., Boyle, E.A., MacArthur, E., Hainey, T, Boyle, J.A.(2012), "A systematic literature review of empirical evidence on computer games and serious games", Computers & Education, Vol. 59, pp. 661-686.

Doyle, D. and Brown, W.F. (2000), "Using a business simulation to teach applied skills-the benefits and the challenges of using student teams from multiple countries", Journal of European Industrial Training, Vol. 24 No 6, pp. 330-6.

Fish, L. (2007), "Graduate student project: operations management product plan, Journal of Education for Business, Vol. 83, No.2, pp. 59-71.

Fripp, J. (1997), "A future for business simulations?", Journal of European Industrial Training, Vol.21 No. 4, pp. 138-42.

de Freitas, S. and Oliver, M. (2006), "How can exploratory learning with games and simulations within the curriculum be most effectively evaluated? Computers & Education, 46 (3), 249–264.

Gilgeous, V. and D'Cruz, M. (1996), "A study of business and management games", Management Development Review, Vol. 9 No. 1, pp. 32-39.

Hainey, T., Connolly, T.M., Boyle, E.A. (2011), "The Differences in Motivations of Online game players and Offline Game Players: A combined Analysis of two studies at Higher Education Level", Computers & Education, Vol. 57, No. 4 pp. 2197-2211.

Huebscher, J. and Lendner, C. (2010), "Effects of Entrepreneurship Simulation Game Seminars on Entrepreneurs' and Students' Learning", Journal of Small Business and Entrepreneurship 23, no. 4, pp. 543-554.

Karns G, (2005), "An update of marketing student perceptions of learning activities; structure, preferences and effectiveness", Journal of Marketing Education, Vol. 27 No. 2, pp. 163-71.

Laverie, D.A. (2006), "In-class active cooperative learning: a way to build knowledge and skills inmarketing courses", Marketing Education Review, Vol. 16 No. 2, pp. 59-70.

Leemkuil, H. and De Jong, T. (2012), "Adaptive Advice in Learning with a Computer-based Knowledge Management Simulation Game", Academy of Management Learning and Education, Vol.11 No. 4, pp. 653-665.

Malone, T.W. and Lepper, M.R. (1987), Making Learning fun: A taxonomy of Intrinisic Motivations for Learning in Aptitude, Learning and Instruction, Volume 3: Conative and affective process analysis. Lawrence Erlbaum, Hillsdale, N.J. pp. 223-235.

Martin, D. and McEvoy, B. (2003), "Business simulations: a balanced approach to tourism education", International Journal of Contemporary Hospitality Management, Vol. 15 No. 6, pp. 336-9.

Mayer, I., Warmelink, H., Bekebrede, G. (2013), "Learning in a game-based virtual environment: a comparative evaluation in higher education", European Journal of Engineering Education, Vol. 38, No. 1 pp. 85-106.

Neubaum, D.O., Pagell, M., Drexler, J.A., Mckee-Ryan, F.M. and Larson, E. (2009), "Business education and its relationship to student personal moral philosophies and attitudes toward profits: an empirical response to critics", The Academy of Management Learning and Education, Vol. 8 No. 1, pp. 9-24.

Onofrei, G. and Stephens, S., (2014), "Simulation games in operations management: the importance of immediate post game analysis", Global Management Journal, Vol. 1-2, pp. 61-64.

Pillay, S. and James, R. (2013), Gaming across cultures: experimenting with alternate pedagogies", Education and Training, Vol. 55, No.1 pp. 7-22.

Piercy, N., Brandon-Jones, A, Brandon-Jones, E., Campbell, C., (2012) "Examining the effectiveness of experiential teaching methods in small and large OM modules", International Journal of Operations & Production Management, Vol. 32, No 12, pp.1473-1492.

Pongpanich, C., Krabuanrat, T., Tan, K.H. (2009), "Educator insight on simulations and games: a comparative study between business schools in Thailand and the UK", On The Horizon, Vol. 17, No.4, pp. 323-329.

Sanchez, A., Cannon-Bowers, J.A. and Bowers, C. (2010), "Establishing a science of game based learning". In: J. Cannon-Bowers and C. Bowers, eds. Serious game design and development: Technologies for training and learning. Hershey,PA: IGI Global, 290–304.

Tanner, J.R., Stewart, G. Totaro, M., Hargrave, M. (2012) "Business simulation Games: Effective Teaching Tools or Window Dressing?" American Journal of Business Education, Vol.5, No.2, pp. 115-128.

The Small Business Game (2013), available at: http://www.thesmallbusinessgame.co.uk/

Vos, L. and Brennan, R. (2010), "Marketing simulation games: student and lecturer perspectives", Marketing Intelligence & Planning, Vol. 28, No. 7, pp. 882-897.

An Active Learning Strategy Model in Religious Education Using Religious Drama

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ABSTRACT

The Center for Religious Education in Aquinas University yearly performs a religious drama-play known as 'Sinagoga'. It is a learning experience for the students to thoroughly understand the theological and religious concepts taught in the classroom. After six years, the activity presumed to be an effective learning tool. To substantiate this assertion, the activity was assessed with the following objectives: (1) to show 'Sinagoga' as a religious activity and a religious experience; (2) to justify or warrant active learning as an ideal and real mode of learning for religious education; (3) to construct a model on active learning in Religious Education using Religious Drama. This research undertaking employs three qualitative methods namely: phenomenology, foundational research and grounded theory. Using phenomenology, an initial model was constructed after the experiences of the student-performers and student-spectators were analyzed and interpreted. The model shows that the Sinagoga activity induced a religious experience among the students. Another model was also constructed following the review, exposition and synthesis of the various notions and theories of active learning and constructivism together with the development in the teaching-learning processes in religious education. Subsequently, the two preliminary models were fused to arrive at a fundamental model. It centers primarily on a learning process that a student of religious education may experience when engaged in religious drama-play—as a performer or as a spectator. The Encounter, Experience, Exchange (3E's) and the Informative, Formative Transformative (IFT) are terms prominent in the model.

Introduction

To permeate learning upon the learners, teaching methodologies and strategies are essential in imparting knowledge to them and likewise develop their skills. Teaching and learning methods and strategies in education are immense. They are presented in many forms and are introduced in varied ways. A teacher can utilize one learning method/strategy or a mixture of them depending upon the learning targets or objectives of a particular lesson.

In Religious Education (RE), though God and everything related to Him is the fundamental content of the said course, the same principles in education are being applied, but differ in depth and value for Christian religious education is grounded in the living Word of God. Religious Education does consider appropriate educational philosophies and principles, methods and strategies 'as long as these are useful and not harmful to the unity of the faith or contrary to the Gospel' (NCDP, 2007, p. 146).

Religious education develops or adopts approaches or strategies in order for the students to understand well the doctrine and interiorize these in their lives. Arts, drama, games, simulations, introspection, action-learning, mini-surveys and the like are among the various strategies available used in teaching religious education.

Today, with the availability of mass media, the richness of arts is compromised. Students nowadays prefer to be spectators rather than actors. The students are more satisfied to be in one place watching a movie or a show rather than be watched on stage performing. Maja Ardal (2003) said that 'most young people today watch television passively and play video games competitively. They have no more passion to theatre and drama plays'.

While this is true of students' interest and their preferred classroom experience today, the comparable importance and effectiveness of other learning tools and strategies like theatre or drama play are still relevant. The use of theatre and drama play in education particularly in religious education had been established by many religious dramatists and educators as a very useful tool in understanding religious concepts and promoting active learning among learners.

Therefore, the main concern of this paper is to warrant the above hypothesis that (religious) drama play is really an effective learning tool for educating the students (Farmer, 2011; Fontichiaro, 2007; Frawley-Mangan; 2006; Ashton-Hay, 2005; Rue, 2005; Gallagher & Booth, 2003; Fleming, 1997; Ehrensperger, 1962) particularly, the students of Religious Education. Bert (2002) and Rue's (2005) exhortations incited the researcher to explore also the significance of theatre and education. The former called theatre theorists to seek models for dramatic theory in religion and should yield productive models for understanding the nature of dramatic art. The latter also incites curriculum designer in religious education to consider the needs of the students.

In Aquinas University of Legazpi, the Center for Religious Education Department considered and utilized drama as a learning process and activity in order to understand better the theological and religious concepts being taught and discussed. Just like Jesus who used various methodologies like parable, story, metaphors, typologies, and analogies to explain well the truth-mysteries and be better understood by his listeners (Stauffer, 2004; Wostyn, 2004; Wezeman, 2001). This learning strategy (drama-play) was further transformed, established as a permanent activity and integrated in religious education curriculum known as the 'Sinagoga'. This activity became the venue for the RE students to translate the theologies and doctrines discussed in the classroom into artistic performances (as shown in the focus group discussion and students' reflections). The yearly themes and presentations are in the context of faith, morals and worship.

Objectives

To establish the assertion that religious drama as an active learning strategy is an effective tool in the understanding of religious concepts/items in Religious Education, the following objectives of this study were addressed: (1) To show 'Sinagoga' (Religious Drama) as a religious activity and a religious experience; (2) To justify or warrant active learning as an ideal and real mode of learning for religious education; and (3) To provide/construct a model on active learning in Religious Education using Religious Drama.

Methodology

Since this research took experience as the primary data particularly in the first objective, phenomenology therefore was considered as the suitable method. Husserl's phenomenological approach (Dy, 1986) in particular was utilized in order to define the very essence of the 'Sinagoga' and to show that religious drama through this activity activates religious experiences among the student-performers and student-spectators. These experiences were analyzed and interpreted further to come up with an initial framework or model. Students who were involved in the drama play for the past three years were selected according to the nature of their involvement or the kind of role assumed during the pre and post production event. These individuals, purposively selected, were the participants in a series of focus group discussion. Students' reflection paper, evaluation responses, photo and video documentations, scripts, post-production assessments are also considered as sources of data.

The second phase, which corresponds to the second objective of this study focused on active learning and constructivism as an ideal and real mode of learning in religious education. But to establish this, the various notions and theories of active learning and constructivism were reviewed, expounded and synthesized. The same way with religious education, its development in the teaching-learning theory and method were also reviewed, expounded and synthesized. After the connection between active learning and constructivism was established, a framework or model was constructed. Since the course of work in the second phase was merely expounding, reviewing and synthesizing the various related literature and studies, the method used was foundational research with meta-analysis as the approach for the interpretation.

Lastly, after the experiences of the students on religious drama were interpreted as religious experience (objective number one) and the theories of active learning and constructivism in relation to religious education are explored and established (objective number 2), an active learning strategy model in Religious Education using religious drama was developed (objective number three), thus, making use of the grounded theory as the method; in coming up with a model, the constructivist approach was used.

Findings and Analysis

The 'sinagoga' as a religious experience

The 3e's of religious experience

After a thorough analysis of the data gathered from the various sources such as recorded video, students' reflection, performers' evaluation and focus group discussion regarding students' experiences in the 'Sinagoga', a descriptive presentation of the findings and implications were provided. In a macro level, four clusters were constructed to classify students' responses and experiences such as the students' notion of 'Sinagoga', the identification of the elements necessary for (religious) drama-play, the values discovery and development, and religious experience. Since religious experience serves as the descriptor of 'Sinagoga' activity, the four clusters are further constricted into three main categories (micro-level) that will define or show 'Sinagoga' as religious experience namely: 'Encounter', 'Experience', and 'Exchange'. These terms are developed by the researcher himself after an exegesis of St. Luke's Gospel narrative, a post-resurrection story centered on the two disciples who experienced and encountered Jesus on their way to Emmaus. And after they experienced Jesus, a heart-burning sensation was felt by them and eager to replace their present feeling of desperation with hope. In other words, that experience made them to decide a change in their life orientation—a self-transformation. The researcher preferred this particular Gospel story as a perfect analogy to describe religious experience and its process. Aside from the Gospel reference of the terms, they are also adopted from the experiences of the students in the 'Sinagoga'.

To further explain the paradigm, the triangular shape is used to represent the process and aspect of religious experience. The purpose of the triangular shape will become intelligible and operational when the theory (objective number two) and practice (objective number one) are interlinked. The triangle shape if used in theology as a concept i.e., Trinity, it would mean individuality, persona or characterization but on the other side of it, it would also mean relationship or commonality. The three equal sides forming one complete whole could mean an economy, a system, a scheme, and a process. Thus, the three E's are separate concepts but delineate a process of a single concept pertaining to 'Sinagoga' activity (Religious Drama) as a religious experience.

The first in the process of religious experience is 'Encounter'. There must be a meeting and upon meeting, a sense of wonder and awe takes place especially if the things being encountered are unusual or peculiar. In this process, initial learning is likely to happen.

In relation to 'Sinagoga' experience, students when introduced to this activity, the same feeling of awe and wonder were found. Some were willing, others were inspired to join and explore the activity and still others were passive, indifferent, and timid. But of course, interested or not, they tried to build a concept for the activity and sought to establish a connection with the subject matter maybe because of the significant challenge or equal benefit of the said activity to them.

'Sinagoga' activity is not only an encounter of the activity itself but an encounter of the self and of others too. Many of those who experienced 'Sinagoga' as a religious drama activity said that it was an eye-opener, an opportunity for them to discover themselves and their talents. It is also an avenue for them to build trust and confidence. And in relation to others, it is an opportunity for them to make dialogue, collaborate, and build camaraderie, unity and friendship particularly during group dynamics, conceptualization phase, preparations, and practices. But what seems so impressive was the long-term friendship developed among the student-performers. Lastly, 'Sinagoga' is a good opportunity for religious knowing, deepening of faith and exploration of spirituality. Most of them would understand religious concepts such as the divine meaning of love and forgiveness, reconciliation, blessings, gifts and graces, faith, moral demands and the forms of worship.

Next in the process of religious experience is the 'Experience' itself. After the encounter, students have to immerse with the situation or with the context so that along the way in the process of discoveries and explorations, they may find the values necessary in forming themselves. It is on this process that the formal and practical learning takes place. As mentioned in the previous chapter, experience here may mean two things, either the experience of the students gained from the activity or the real experience set on the play. As regards students' experiences from the drama-play, the recognition of the sacred became more obvious. Values were also clarified. Students' learn how to negotiate with others, permeate viable solutions to conflicts, and allow the spirit to move in. They have also developed a sound and well-defined concept of life, truth, justice, joy, beauty, and freedom and further translate this into a drama form or experience. The latter, in the language of active learning is called transfer learning. Social relation was also apparent because students became sensitive to the needs of others. But what is more important in this stage is that the learners are left with the desire for self-transformation.

The last stage in religious experience is disclosed under the pretext and concept of 'Exchange'. It is also in this stage that the real and ideal learning must be developed. Norman Bert's (2003) notion of drama serves as a perfect background for this concept. He states, 'the quality of the best theatre play is not on the script but on the religious purpose. The best theatre is a tool for introspection, for relating the audience member to a community, for clarifying for audiences their relationship to God, the world, the way things are. And the best critic doesn't just ask if the script was well constructed, the directorial concept inventive, the acting believable, or the design coordinated but rather did the play serve its proper religious purpose of relating human beings to themselves, their community, their culture, and the forces beyond their control' (p. 9).

Therefore, the term 'Exchange' would not merely mean a give-to-receive-from pattern or situation but instead it should be understood in the framework of change and relation. Moral goodness, self-transformation, or re-created human being is not only the purpose and aim of religious drama but it is also a characteristic and proximate effect of religious experience. The experiences of the students in the 'Sinagoga' would strengthen this notion. However, in the sharing, no student explicitly expressed his or her intention for immediate self-transformation or promised to live a moral life after the show but instead students remained in the plane of introspection, awareness, prompting, realization of values, of good and evil and the desire to live with the good. This is exactly the very essence of religious drama and religious experience.

Active Learning: Learning Mode in Religious Education
The Ift Model of Active Learning in Religious Education

Active learning as oppose to passive learning characterize learners' engagement in an activity, analyzing and creating solutions to problems in a more dynamic, experiential and fun-filled fashion. A learner engaged in active learning developed him into a successful learner, confident individual, responsible citizen, and effective contributor. The umbrella philosophy of active learning is constructivism. It is a theory at the same time a learning approach. Constructivism is developed from the theories of Piaget and Vygotsky. Synthetically, constructivism is a meaning making theory or a learning theory wherein individuals create their own new understandings on the basis of an interaction between what they already know and believe and ideas and knowledge with which they came into contact.

After getting immersed with the theory together with its educational aim and benefits, it is also the objective of this paper to look into the possibility or applicability of the theory to religious education. The Congregation for Catholic Education instructed the Catholic Education Institutions to upgrade religious instructions and explore pedagogies 'as long as these are useful and not harmful to the unity of the faith or contrary to the Gospel'. 'It is necessary, therefore, that religious instruction in schools appear as a scholastic discipline with the same systematic demands and the same rigour as other disciplines. It must present the Christian message and the Christian event with the same seriousness and the same depth with which other disciplines present their knowledge'. With this call indeed, there was a great effort among the Fathers of the church, evangelizers, and religious educators to improve religious instructions in the course of history; exploring pedagogies, strategies, and techniques with the aim of moulding individual to a life of faith, morals and worship were the main occupation of religious educators. Burgess (2001) classified this pedagogical development into Historic, Liberal, Mainline, Kerygmatic and Social Science models.

The possible link between the theory of constructivism and the models of religious education can be scrutinized in these aspects: theory, method and practice. Apparently, Michael Grimmitt (2000), an educator in Great Britain applies constructivist approach in teaching an item in religious education. He developed three-stage pedagogy to help students explore new ideas and concepts by inquiring and reflecting on their experiences. And when confronted with the item in religious education, knowing some objective knowledge, they are still encouraged to continue to be constructivist in their response to such new information. They are encouraged to engage in an interpretative process in which new knowledge is considered critically and may or may not be accommodated within their own understanding.

Nevertheless, after drawing the core and essential features of constructivism and the models of Religious Education, a three-level process or aspect commonly used in education is espoused to establish the connection namely: 'Informative', 'Formative' and 'Transformative' or IFT Model. This was conceived in order to visualize the process.

'Informative' pertains to the transmission and acquisition of knowledge and skills. It is considered as the preparatory or the pre-conventional stage in the process of learning. It is because on this level that the content is implicitly impose to the learners as something to be known and acquired but open for any critical analysis and interpretation. The instructional aspect of religious education is also important because it deals about doctrine. Lee (as cited in Rott, 2005) argued that the primary proximate aim of religious instruction is the intellectual development of the learner in the matters pertaining to religion. The Apologetic and catechetical approach in religious instruction suggests this process. The 'learning about' of Grimmitt can be a governing principle for this aspect where pupils assimilate and accommodate the content as understood within its faith context. Though it sounds traditional, as long as the learners are engaged in an activity, they can explore new ideas, construct new knowledge either on their own or with others; it suggests active learning.

The term 'Formative' connotes norms, standards or values as measures of learning. The first aspect focused on the knowledge while this aspect is on values. In the moral stages of Kohlberg, this aspect would be similar to his conventional stage. After getting informed, the learner grasps the values as something worthwhile, something they can hold dear, something that speak about their life or something that adds meaning to their life. Value selection or clarification is a harmonious and integrated operation of the cognitive, affective and behavioural faculties of the person that produces genuine human learning and growth (Bauzon, 2005, p. 101). Furthermore, the person perceives what is right and desirable, actually desires and cherishes what is perceived, and then decides to act accordingly and repeatedly. This process takes place within the context of the various institutions in the society. As one grows in self-awareness, he also becomes aware of his social responsibility.

The last aspect is 'Transformative'. In the series, this is the highest. In education, this is topmost goal to be achieved. In religious education, this is the ultimate aim. The learner after getting immersed with the content of faith (informative) confronts this faith and selects the values as standards (formative) for moral living (transformative). It is on this level that the students with the help of teachers are challenged about Jesus, of the faith and of vocation and commitment. According to John Dirkx (1998), seeking transformative learning is attending the process of change. 'It is a way of being rather than a process of becoming' (p. 11). 'Self actualization is a difficult task. It invites to construct new ways of thinking, demands deeper sense of experience, and values creative dynamics of living life. But at the end, it is never a task; it is a way of life' (Sario, 2013).

Transformative learning therefore is directed towards the total development of the person. In this aspect, the students are expected to be principled human beings already, totally developed human persons, who internalized the values and channelized the virtues. In other words, a student should be intellectually sound, morally upright and emotionally mature. These values are actually the present thrusts of Aquinas University of Legazpi. On the article Assured Quality Education through Transformation, Bernaldez (2005) pointed out that 'Constructivism emphasizes the individual in his cultural context. The result of contextual education is creativity, insight and imagination. The "product" of this process is an integral person who is capable of doing with his hands, what his heart wills, through imagining with his head' (p. 21). The head, hands and heart dimensions are analogous to the informative, formative, transformative process of education or the Creed, Code and Cult dimension of religious education.

The 3e's and Ift Models Converge

The end product of this study is to come up with a strategy model in religious education. The possibility of having this is to come up with a synthesis of the theoretical and practical foundations of active learning particularly constructivism. In coming up with a model, the objective number one, which is the practical presentation of active learning in the form of religious drama through 'Sinagoga' is combined with objective number two, which is the theoretical presentation of active learning.

The combination of the two models namely the 'Sinagoga' as religious experience and Active Learning as the ideal and real mode of learning in religious education came up with a very vivid symbol—the Star of David or the

'Magen David' which means the 'shield of David'. This symbol doesn't have any religious significance in Judaism but it is one of the symbols most commonly associated with the Jewish people. This symbol is also the dominant symbol for the ancient synagogue. Among the other symbols associated with the synagogue, the Star of David was preferred because it symbolizes balance and knowledge, which are very significant in this study.

The merging of the two equilateral triangles is very symbolic. For some, it would mean the perfect union between heaven and earth, between the divine and the human, thus, incarnational. Incarnational is another term used in doing Theology or contextual theology. The term 'Incarnation' in Theology means a perfect union of the divine and human natures in Jesus—the Word made flesh. It is on this pattern that a certain approach in theologizing was conceived. The Word of God to be understood should be situated or contextualized in the experiences of the people, the grassroots. Incarnation would also mean perfecting the human nature in Jesus. The Saint John Paul II quoted Gaudium et Spes: 'It is only in the mystery of the Word made flesh that the mystery of man truly becomes clear'. The Church instructs Catholic schools that every stakeholder must have a clear understanding of who the human person is. Church's documents repeatedly remind the Catholic Education Institutions the need for an educational philosophy built on the solid foundation of sound Christian anthropology.

With this, it is very clear that Catholic schools have a straightforward goal: to foster the growth of good Catholic human beings who love God and neighbor and thus fulfill their destiny of becoming saints (Miller, 2005).

However, aside from the symbolic signification of the two triangles superimposed over each other, it should be noted that it is also a process—an active learning process in religious education. Focusing on the model, when religious drama is used as an active learning strategy, there are six individual yet relational concepts to be taken into consideration. Three of which namely 'Encounter', 'Experience', and 'Exchange' are the real, actual or concrete processes. The other three namely 'Informative', 'Formative', and 'Transformative' are the conceptual, ideal or theoretical processes. Each process is interwoven. It should be read counter clockwise, beginning from the tip most of the star with the word 'Encounter' until it goes back again to where the process started in order to complete the cycle. Though the 'Transformative' level is the apex of learning, it should not be forgotten that learning is a continuous process. Trammel Bristol (n.d.) found out and concluded that learning is cyclical after he examined the learning experiences of African-American adults in Sunday school class using the constructivist learning theory.

The interdependence between concepts was already explained earlier. However, putting religious drama on the limelight as a learning strategy will make these concepts operational. When religious drama is used as a strategy and then introduce to the student, the 'Encounter' is the initial phase of the entire experience. To 'Encounter' may not entail familiarity on the first glance but it could also mean strangeness or curiosity. Curiosity is the first step towards learning. Curiosity is also a step in religious experience. John Hick (1990) defined religious experience as a sense of awe and of wonder. There must be a sense of openness and eagerness among the students in order to let this activity be an avenue, an opportunity for them to discover new things, new learning together with others. And so, this level gives students the opportunity to encounter one's belief and of other's too in a form of dialogue. Nonetheless, these discoveries should be backed up with necessary information facilitated by the teacher (scaffolding). Here, the concept of Michael Grimmitt's Preparatory Pedagogical Constructivism is contributory. In this stage according to him, pupils are engaged in an enquiry into and reflection upon their own experience in order to prepare them conceptually and linguistically for an encounter with the item of religious content. The teacher contributes to the pupils' enquiries and reflections through questions and interventions which may include practical, group focused activities.

All the necessary information must be provided including the mechanics, the theme, the concept and the religious items. When confronted with religious items, students are getting aware of the sacred. Along the conceptualization phase, students are also provided with necessary knowledge and skills. The script writing, the activity programming, the concept making are cognitive features and products. Most of the contributions here are experience-based or application of the prior knowledge or learning.

After getting informed, students have to engage with the activity and immerse themselves to the activity. They have to experience every bit of it. While on the state of experience, students start to realize something valuable. They start to compare, build norms, draw viable things, make shift, getting rid of biases, and replace pessimism with optimistic attitude. Mentioning about values, students in this level have to consider values that are worthwhile, something they can hold dear, something that speak about their life or something that adds meaning to their life. The drama itself is instrumental for the students to realize values. The values of camaraderie, friendship, unity, etc. that were built among the student-performers are clear manifestations of value-learning. That is why drama is considered to be social, not only because it depicts social realities but also it is an activity of individual person grouped together. Students also experience pleasure or enjoyment or considered religious drama-play as a fun-filled activity despite of the tough situations. The intermittent laughter of the participants during the Focus Group Discussion indicates a meaning concomitant to this. Therefore, this particular experience affirms one of the benefits of active learning and that is the learner learns at the same time enjoys when actively involved in a certain task. For Piaget, it is through one's experience that the learner learns. Thus, these experiences can be considered or deduced as 'Formative'.

It was previously established that experience is a source of learning. Once experience is understood, there should be learning and this should be further associated and identified to oneself. Education has always the purpose and aim of being an integrated human person. Formation is not the end; it is just a means towards self-transformation. Therefore, there should be a commitment. The 'Formative' to 'Transformative' stage or level is bridged by an experiential concept 'Exchange'. Earlier, the operational meaning of this was already discussed. Exchange is not merely a give-receive pattern. It is more on conversion, of change, of replacement, of shift and of transformation eventually. Just as the old is replaced with a new one, self-transformation and change in life's orientation is the very aim and purpose of any of the following: education, including religious education; learning, including active learning; and drama, including religious drama. This is exactly the very meaning of the symbolic compounding of the two triangles. Self-transformation is an interaction and integration of the Head, Heart and Hand; of Doctrine, Moral, and Worship; the mediation of intellect and moral, of the cognitive and affective; the integration of 'learning about' and 'learning from' theory of Grimmitt. Doing religious drama motivates students for self-transformation as most of the drama educators theorized. Self-transformation should be a two-way movement: inward and outward. The outward movement refers to the lessons left by the drama performance or by the dramatists to the audience or the realization of the spectators for self-transformation after watching a religious drama-play presentation. The inward movement on the other hand refers to the lessons learned or the realization for self-transformation by the performers themselves. But among the aspects or dimension, it is the self-transformation which is hardly to assess, to follow or to determine the qualitative change happened to an individual learner. Self-transformation is not an overnight matter or a magical event. It is a process. It takes time for a full metamorphosis. In the Focus Group Discussion, no student would say or attest that he or she is a completely changed being after joining or watching a drama-play. Instead, students would realize, becoming cognizant and desirous of moral goodness and holistic transformation of the self and of the society as well. However, students may indicate or reactivate dormant behaviours during the course of preparation, group processes, actual performance, and after watching the drama-play. In this regard, the teacher plays an important role in assessing the students' performance. The teacher must first of all be a participant-observer. He must be a keen observer during instruction-giving and group processes. If possible, he has to document or write anecdotal reports of the day to day proceedings. He has to monitor the progress of the students' behaviour and learning, their attitude and response to the activity, and the progress of the activity itself. The teacher must keep in touch with the students to check their values.

The terms being used in this model indicating a process of learning are the same words and processes that can be found in active learning such as exploration, development, collaboration, activation, motivation, engagement and transformation. Students when engage in active learning, they are given the opportunity to explore, discuss and deal with difficult issues resolved through critical thinking and problem solving skills. Students working in groups learn about leadership, negotiation, cooperation and respect. Students when situated in a religious drama activity learn how to deal socially, refine their emotions, argue on values, discern spiritual matters, and develop meta-learning skills.

Conclusion

The newly developed model established that active learning is an effective tool, approach or method for/ in religious education. It also establishes that religious drama as an active learning strategy would help students understand religious concepts, have the desire for moral goodness or life transformation after going through such experience. This particular learning is delineated in the model itself, the actual process of Encounter, Experience and Exchange (3E's) and the conceptual process of Informative, Formative, and Transformative (IFT).

REFERENCES

Ardal, M. (2003). Theatre for Young Audeiences and Grown-up Theatre: Two Solitudes. In K. a. Gallagher, How Theatre Educates (pp. 189-197). Toronto: University Press of Toronto Incorporated.

Ashton-Hay, S. (2005). Drama: engaging all learning styles. In Proceedings 9th International INGED (Turkish English Education Association) Conference. Ankara Turkey: Economics and Technical University. Retrieved from http://www.google.com.ph/url?sa=t&rct=j&q=Drama:+Engaging+All+Learning+Styles+Sally+Ashton-Hay&source=web&cd=2&cad=rja&ved=0CDQQFjAB&url=http%3A%2F%2Feprints.qut.edu.au%2F12261%2F1%2F12261a.pdf&ei=KzIwUoOtIaSRigf_woDAAQ&usg=AFQjCNFv2E1jbg59gQge3JrKxSeUmJB on 11 June 2013

Bauzon, P. T. (2005). Essentials of Values Education. Mandaluyong City: National Book Store.

Bernaldez, P. (2005). Assured quality education through transformation. Aquinas Quarterly, 19-20. Legazpi City: Aquinas University of Legazpi

Bert, N. A. (2002). Theatre is religion. The Journal of Religion and Theatre, 1, 1-11. Retrieved from http://www.rtjournal.org/vol_1/no_1/bert.html

Bert, N. A. (2004). The incarnational actor: from christian theology into theatrical praxis. The Journal of Religion and Theatre, 4, 217-221.Retrieved from http://www.rtjournal.org/vol_3/no_2/bert.html

Burgess, H. (2001). Models of Religious Education. Indiana: Evangel Publishing House.

Catholic Bishops Conference of the Philippines. (2007). National Catechetical Directory of the Philippines. Manila.

Dy, M. (1986). Philosophy of Man: Selected Readings. Quezon City: JMC Press Incorporated.

Ehrensperger, H. (1962). Religious Drama: Ends and Means. Retrieved from Internet Archive.Org: http://archive.org/stream/religiousdramaen006938mbp/religiousdramaen006938mbp_djvu.txt on 26 June 2012.

Farmer, D. (2011). Learning Through Drama in the Primary Years. Drama Resource.

Fleming, M. (1997). The Art of Drama Teaching. London: David Fulton Publishers Ltd.

Fontichiaro, K. (2007). Active Learning Through Drama, Podcasting, and Puppetry. London: Libraries Unlimited.

Gallagher, K., and Booth, D. (Eds.). (2003). How theatre educates: Convergences and counterpoints. Toronto: University of Toronto Press Incorporated.

Grimmitt, M. (2000). Pedagogies of Religious Education. Essex: McCrimmon Publishing Co Ltd.

Hick, J. (1990). Philosophy of Religion. New Jersey: Prentice-Hall, Inc.

Miller, M. (2005). The Holy See's Teaching on Catholic Schools. Retrieved from http://www.google.com.ph/url?sa=t&rct=j&q=&esrc=s&source=web&cd=2&cad=rja&ved=0CCwQFjAB&url=http%3A%2F%2Fwww.catholiceducation.org%2Farticles%2Feducation%2Fed0269.html&ei=5lPoUrDtHcaKiQeIqYH4DQ&usg=AFQjCNGk8IPiVTIpPDKbOk3Obw4uRV5XqA on 15 May 2013.

Moore, M. M. (2004). Using drama as an effective method to teach elementary students (Thesis). Retrieved from Eastern Michigan University: http://www.google.com.ph/url?sa=t&rct=j&q=Using+Drama+as+an+Effective+Method+to+Teach+Elementary+Students+Mandie+M.+Moore&source=web&cd=1&cad=rja&ved=0CCoQFjAA&url=http%3A%2F%2Fcommons.emich.edu%2Fcgi%2Fviewcontent.cgi%3Farticle%3D1112%26context%3Dhonors& on 17 May 2012

Rott, D. (2005). Intersections between theatre and the church in the united states: 1930-1990. The Journal of Religion and Theatre, 4(1), 38-107. Retrieved from: http://www.rtjournal.org/vol_4/no_1/rott.html

Rue, V. (2005). Acting Religious. Oregon: Pilgrim Press.

Sario, A. (2012). Educational Praxis in Development Education. USA: LAP Lambert Academic Publishing

Stauffer, M. (2004). Building character while developing a character: An investigation of the integration of faith and theater. The Journal of Religion and Theatre, 3(1), 37-60. Retrieved from: http://www.rtjournal.org/vol_3/no_1/stauffer.html

Wostyn, L. (Ed.). (2004). Believing Unto Discipleship: Jesus of Nazareth. Quezon City: Claretian Publications.

Wezeman, P. (2001). 100 Creative Teaching Techniques for Religion Teachers. USA: Twenty-third Publications.

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Mathematics performance of first year students of the Abra State Institute of Sciences and Technology

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ABSTRACT

This study aimed to determine the performance in College Algebra of the first year students of the Abra State Institute of Sciences and Technology for school year 2013-2014. The students included in this study were from the three colleges namely; College of Teacher Education, Vocational Industrial Technology and College of Sciences and Industrial Technology. The population of the study is composed of first year students in the three colleges. The descriptive-correlation method of research was used. The result of the study showed that there is no significant difference in the level of performance of student-respondents in College Algebra whether they come from among the identified colleges of the institution and student-respondents and teacher-related factors except on parent's occupation and residence while studying. Based on the findings, it is recommended that teachers should strengthen concepts where students are weak. Parents should guide their children in their home studies and television programs.

Biographical Details

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Rationale

Like any other developing country, the Philippines banks on an educated society, one that can actively participate in national development, that can put to good use, and enjoy the benefits, and be able to sustain the fruits of such efforts. It is already an accepted theory that the strength of the nation is premised on its human resources, educated with the base in Mathematics in turn, is the key to nation building.

Teaching algebra today must reflect recent developments in the realm of Mathematics. Clearly, one aim of algebra is to acquaint the student with the algebra that is used functionally by the present-day Mathematicians. Therefore the course must include topics not previously in the elementary and intermediate algebra curriculum for example: Set Theories, Structure of Number Systems, Inequalities as well as equations, The Function Concept, and greater attention to the important role of the Coordinate Plane. Needless to say, the development of these topics in a beginning course in Algebra should be appropriate to the mathematical maturity of the student.

It should be emphasized that topics of modern algebra are not "substitutions" for topics of traditional algebra. Rather, modern topics provide a more meaningful way of developing understanding basic to the traditional topics.

Mathematics has always been one of the major learning areas in the field of education from elementary to the tertiary level because it plays a vital role in our lives. Man needs sufficient competence in the basic mathematical concepts. Nowadays, in almost every field of endeavor, one finds mathematics in some forms, not only useful but also necessary. Mathematics is the study of numbers and patterns. With the help of Mathematics, men have built spaceships, modern computers, large buildings, and longer bridges. It is used by persons in banks, in factories, and in department and grocery stores.

College Algebra is not simply a small mathematical world in itself. It has a far reaching role throughout mathematics, including the areas of geometry and trigonometry. Through a heightened emphasis, a meaning and structure, students of average or less-than-average ability can benefit as much as the superior student.

This study is to be undertaken to reflect the algebra subject which is offered in almost all courses. It is the belief of the researcher that the teacher and the student alike will discover college algebra as stimulating, meaningful, and an effective foundation for subsequent courses in mathematics.

This study was undertaken at the Abra State Institute of Sciences and Technology (ASIST) of both the main campus and its annex in Bangued, Abra.

Review of Related literature

Related studies and literature served as the basis in the conduct of this study:

On Mathematics Performance

Agoot(2006) found out that the first year college students of Divine Word College of Vigan have a satisfactory level of performance in College Algebra. The students are strong on the operations of algebraic expressions, exponents, special products and factoring. However, weak on the content area on equations and inequalities.

Seraos (2006) also found out that the level of performance of student-respondents performed "Very Satisfactory" in Elementary Algebraic Notation, Special products and fractions while "Satisfactory" level of performance in Factoring, Fractions and Graphs, Linear equations in One Unknown, and Systems of Equations in two Unknowns.

Aguilar(2004) concluded that the level of Mathematics Performance of the students in intermediate algebra by learning areas, by section and as whole is described as "weak". It shows that no significant relationship that exist with respect to place of residence.

As cited by Riamblon(2002), the parent's educational attainment and occupation are important factors that contribute to the pupil's performance in mathematics achievement test. These variables play an important role in the learning and teaching process inside the classroom which in turn affect the performance of pupils in mathematics achievement test (Aleta; 1999)

Gagto (2001) in his study regarding the performance of College Algebra of first year students in the University of Northern Philippines- Candon City, revealed that the level of performance was at " Satisfactory" level on the difficulty indices of the content area while "Weak" in the other content area in College algebra..

On Family Size

Agoot(2006) found out that the family size have significant relationship on the performance of students of students in College Algebra which contradicted the study of Quismundo (1990) where she concluded that achievement in College Algebra was affected by the family size.

Soria(1989) and Nokbin, as cited by Agoot(2006), concluded in their studies that the number of dependents did not affect the academic performance of the pupils. Ragandac(1986) also found out that family size did not significantly related to the achievement of the students.

Residence while studying

Hounters and Bront (1970) studies, they analyzed the relation of the type of place of residence with the achievement. They found out that those students staying in the residential hall of the school showed higher achievement grades in mathematics than those staying in their homes outside the school campus. Hence, they attributed the environment surroundings of the students to have significant effects in their performance.

Aguilar (2004) concluded that there is no significant relationship that exist in students level of performance with respect to place of residence.

On parent's Occupation

In the studies on the occupation of parents. (1985) and Cayanan(1981) as cited by Agoot (2006), revealed that Mathematics Achievement was significantly related to the occupation of parents.

On the contrary, De la Crus (1987) concluded that the father's occupation did not have any significant relationship to the mathematics achievement of the grade six pupils while mother's occupation did. Soria (1989) and Nokbin (1995), concluded also that both parent's occupation were insignificantly related to the academic performance of pupils. Furthermore, Quismondo(1990) concluded that the parent's occupation did not affect the student's achievement in Algebra. Gagto(2001) found out too, that the occupation of parents had no significant relationship on the performance of the students.

On the other hand as cited by Riambon (2002), the parents' educational attainment and occupation are important factors that contribute to the pupils' performance in mathematics achievement test. These variables play an important role in the learning and teaching process inside the classroom which in turn affect the performance of the pupils in Mathematics Achievement test (Aleta, 1999)

On Study Habits

A student with favorable study habits works consistently and generally does better than the person who is erratic. Achievement is more a function of how hard the student work.

As cited by Agoot(2006), Pilgrim(1989) stated that good study habits were the keys to learning and that everyone cannot be brilliant but everyone can learn how to study. Furthermore, Bremer (1980) quoted Mann's claim that habit is cable: we weave a thread of it everyday and at least we cannot break it. The pre-school and elementary levels present the greatest challenge in the formation of good study habits and attitudes. At this period, children receive impression and conduct those habits which impel them toward the good and true or toward evil and false (Bremer, 1980:552)

Saelim (1995), suggested that students should purchased Mathematics and periodicals. In these case, these students can make use of this magazines to supplement the lessons discussed to them in a classroom. He also made mention that the development of good study habits and interest is suggested to the students at the start in order to provide the students' good background in the basic knowledge as this is an important subject. At this point, the student's level of Performance

Attitudes Towards mathematics

In the study of Velasco(1989), the result came out that positive attitude of students towards mathematics would result to good performance, hence, it is recommended that there should be proper motivation on the part of the teacher.

Dantis (1987) revealed in her study that there is a significant relationship between attitudes towards mathematics and ability in Mathematics.

The study of Clemente (1981), revealed that there is a positive correlation between mathematical attitude and achievement of the respondents. The more positive a student's reaction towards mathematics, the higher would be his academic achievement in the said subject.

On the other hand, Mendoza (1981) also claimed that attitude towards mathematics has a marked relationship with mathematics achievement of students. Two of the findings revealed in her study on the factors associated with mathematics have a marked relationship with mathematics achievement and mental ability and attitudes towards mathematics are the best predictors of mathematics achievements. That is, students with favorable attitude towards mathematics performed better than those with unfavorable attitude and mathematically interested students performed better than those who are not interested in the subject.

In the study conducted by Gagto (2001) as cited by agoot(2006) on the performance in College Algebra of First Year student in the University of Northern Philippines- Candon branch found out that the average grade of students in non-mathematics subjects is significantly related to their performance. This implies that the higher the grade in non-mathematics subjects, the higher the performance in College Algebra. This findings agrees with the findings of Almo (1993) that higher grades in other subjects yielded better achievements in Mathematics.

Tactay(2005) cited a study on the students' attitudes and beliefs of the American Association of University of Women found out that girls' self-esteem, confidence in their abilities, expectations for life, interest in challenging courses and rewarding careers and pursuits in Math and Science decline as they get older.

Teacher's Profile

Effective teaching is a most desirable goal in education. The most convincing evidence of this goal being accomplishedis learning the targeted competencies on the part of the learner. A mechanism that enables the teacher to ascertain that the desired learning will take place depends on the competence and skills of the teacher.

There are three things that will help increase the effectiveness of a mathematics teacher. These are time, experience, and trainings. It takes time for a Mathematics teacher before he become effective and comfortable in his role as a teacher.

The corollary to time is experience. It is said that "experience" is the best teacher. The teacher learns from actual experiences of teaching mathematics that one can detect his strength and weaknesses.

Another factor that affects mathematics performance is the extent of manifestation of personal attributes of the mathematics teacher. Experiences of successful teachers have shown that teacher's job is not confine solely to the transmission of knowledge and information because modern technological devices such as televisions, films and computers can do it. What is important is the teacher's personal influence in promoting the development of the basic skills, understanding, work habits, desirable attitudes, values, judgments and adequate personal adjustments of the learners. Therefore, it can be said that teaching is effective when there is a desirable change in the learner. The work of the teacher should become more facilitation, compassionate, counsel and leadingonthan supervision and control of learning. The teacher should be the role model of what a good citizen and human being should be towards excellence.

It is noteworthy that Alegado's (1984) findings showed that mathematics teachers with in-service trainings in Mathematics perform better than those teachers without in-service trainings.

Ariola (2000) stated that the teachers must be able to face up the challenges of the times and therefore, she must continue to update her conceptual competence utilizing the existing theory-practice linkage structures. This includes graduate course, seminars, in-service trainings, professional meetings, as well as professional lectures.

All these studies reviewed on student-related and teacher-related factors provided insights to the researcher for the inclusion of such factor in the study. And from these researches, it could be theorized that students' mathematical ability might be affected by the student-related and teacher-related factor.

Procedures/ methodology

The design used in this study is discussed in the following:

Research Design. This study was concerned with the analysis of the mathematics performance of the first year students in College Algebra correlated with the student-related factors, therefore the descriptive correlational research design was utilized.

Population and Sample. The population of this study included the first year students of theAbra State Institute of Sciences and Technology (ASIST) who were enrolled in College Algebra during the first semester, School Year 2013-2014.

Data gathering Instrument. The performance of the student-respondents and other related factors included in this study have been gathered and measured using the following:

Part 1: **The student information questionnaire**. This was used to gather information on student-related factors namely: Gender, family Size, Abra State Institute of Sciences and Technology (ASIST) rating, daily Allowance, Monthly Family Income, Residence while studying, Source of Educational Support, and Time Spent in Media Exposure.

Part II. **The Attitude Scale Towards Mathematics**. This instrument is a 33-item statement that expresses the feelings and attitudes of the student-respondents towards mathematics. It was adapted from the work of Aruejo (2006). The following Range was used:

Numerical Rating	Descriptive Rating
4.21 – 5.00	Extremely Positive (EP)
3.41 – 4.20	Moderately Positive (MP)
2.61 – 3.40	nuetral (N)
1.81 – 2.60	Moderately Negative (MN)
1.00 – 1.80	Extremely Negative

Part III. **Achievement Test**. To analyze the performance of student-respondents in College Algebra, an achievement test was adapted from the study of Pilarta (2008). To determine the strength and weaknesses of the students, the item difficulty indices of the test was computed. The student was considered strong if as indicated by their responses, at least 50 percent of the item belong to that area in College Algebra have difficulty indices equal or greater than the average difficulty of the content area established by the norm sample (Agoot, 2006). On the other hand, the students were considered weak, if as indicated in their responses, less than 50 percent of the item belong to a particular content area have difficulty of less than the average difficulty index by the norm sample (Agoot, 2006).To describe the students' level of performance in College Algebra by content learning area, the following norms were set.

For a 50-item test

Intervals	Description
40.01 – 50.00	Outstanding (O)
30.01 – 40.00	Very Satisfactory (VS)
20.01 – 30.00	Satisfactory (S)
10.01 – 20.00	Poor (P)
0.00 – 10.00	Needs Improvement (NI)

Part IV. **Faculty Profile**. This comprises of the following information of the teacher: highest educational attainment, number of years in teaching Mathematics, number of preparations and the number of in-service education attended.

Data Gathering Procedure. The administration of the data gathering instruments was done by the researcher through the help and assistance of the teachers of the student-respondents.

Statistical Treatment of Data. To treat the data gathered in this study, the following statistical tools were employed: Frequency Counts and Percentages were used to describe the profile of the student-respondents and teacher-respondents. Mean average was utilized to determine the level of performance of the student-respondents in College Algebra and to describe the attitude scale of the student-respondents towards mathematics. Pearson-product moment of correlation was used to determine the correlation coefficient of the attitudes of the student-respondents towards mathematics. The Chi-Square test was used to obtain the relationship between the students' performance in mathematics and residence while studying, teacher-related factors. One-way Analysis of Variance(ANOVA) was used to determine the significant difference on the level of Mathematics Performance of the student-respondents.

Discussion of results

The following were the findings of the study:

What is the profile of the student-respondents?

Majority of the respondents are female since the school is female dominated school, belongs to a small family size, performed "Good" in the admission test, have an allowance of below 100, came from a family whose monthly income is below P10,000 and are living and supported by their family while studying.

Most of the students read newspapers, magazines, books and other reading materials for 30 minutes or less per day. Moreover, most of the students fall under 61 minutes andmore, watching television and listening to radio. The over-all mean on the attitude towards mathematics of the first year students is 3.30 which is described as "Neutral".

Profile of the Teachers

Most of the teacher-respondents finished their MA/Ms degree; have taught for at least 10 years and above, and have attended trainings/seminars in the national, regional and local levels, and have at least 3 to 4 preparations.

What is the level of Mathematics performance of student-respondents in terms on content areas?

Table 1. **Level of Mathematics Performance of Student-respondents by Content Area**

Content Area	# of items	CTE		VIT		CTECHT		CAFC		CSIT		As a Whole	
		X	DR	X	DR	X	DR	X	DR	X	DR	X	DR
Operations of Algebraic Expressions	10	4.28	P	5.75	S	5.4	S	3.92	P	5.73	S	5.02	S
Special Products and factoring	10	4.04	S	3.82	P	4.03	S	3.2	P	5.38	S	4.09	S
fractions	10	5.16	S	5.19	S	3.95	p	3.55	P	4.85	S	4.54	S
Linear Equations	10	3.74	P	3.23	P	2.3	P	1.99	P	3.54	P	2.96	P
Functions and Graphs	10	4.2	P	3.96	P	2.63	P	2.31	P	3.5	P	3.2	P
Over-all	50	20.42	S	21.95	S	18.31	S	14.97	S	23	S	19.81	P

Legend: P – Poor S – Satisfactory NI – Needs Improvement DR – Descriptive Rating

The student-respondents performed "S" in Operations of Algebraic Expressions, Special Products, and Fractions; and "S" in Factoring, Fractions and Graphs, Linear Equations in One Unknown and Systems of equations in Two Unknowns. The overall performance of students at "Poor"

In what content learning area are the students strong and weak?

Table 2. **Difficulty indices of the Content Learning Area in College Algebra as measures of strength and Weaknesses**

Content Area	# of items	CTE		VIT		CTECHT		CAFC		CSIT		As a Whole	
		X	DR	X	DR	X	DR	X	DR	X	DR	X	DR
Operations of Algebraic Expressions	10	43	W	58	S	54	S	39	W	57	S	50	S
Special Products and factoring	10	37	W	32	W	23	W	20	W	35	W	29	W
Fractions	10	42	W	40	W	26	W	23	W	35	W	33	W
Linear Equations	10	37	W	32	W	23	W	20	W	35	W	29	W
Functions and Graphs	10	52	S	32	W	40	W	36	W	39	W	40	W
Over-all	50	42	W	39	W	33	W	28	W	40	W	37	W

Legend: S – Strong = 0.50 and above Weak – less than 0.50 DR – Descriptive Rating

Students are found to be "strong" in the Operations of Algebraic Expressions but they are "weak" in all learning areas.

Is there a significant difference in the performance of student-respondents in College Algebra by college?

Table 3. **Summary of One way Analysis of Variance (ANOVA) on the Performance of Students by College**

Source of Variance	Degrees of Freedom	Sum of Squares	Mean Squares	Computed
Between Groups	4	7.17	1.79	1.32
Within Groups	20	19.7	.985	
Total	**24**	**26.87**		

Ft = 2.87 $\alpha = 0.05$

The level of performance of students by college had no significant difference whatever college they belong. They performed the same in College algebra.

Is there a significant relationship between the level of performance in College Algebra of student-related factors and teacher-related factors?

There is no significant relationship between the performance of the students in College Algebra and the student-related factors and teacher-related factor. This implies that in no way the performance of the students is significantly affected by the student-related factors and teacher-related factors. However, students level of performance was found out to be significantly related with the time spent in reading books, especially in textbooks, the higher the performance of the students.

Conclusion

Based on the findings, the following conclusions are made:

Majority of the student-respondents are females; members of a family with a small size; "good" in the College freshmen Admission test; having daily allowance of below 100 pesos; belonging to a family with a monthly income below 10,000 pesos; living with their parents while studying; and having their education through the support of their families.Majority of them spend more time in watching television and listening to radio than reading newspapers, magazines and books. The student-respondents have "neutral" attitude towards mathematics. There were significant differences on the level of Mathematics Performance of the student-respondents.

Recommendation

Based on the conclusions, the following recommendations are proposed:

Parents' supervision in learning at home is encouraged and give guidance and tutoring is a must, and to monitor their children on television schedules. Mathematics teachers should be updated on the current trends and issues on the teaching of mathematics. They should therefore be encouraged to attend seminars and trainings as well as undergo research studies. Mathematics teachers should strengthen the concept where the students are found to be weak and strong. More exercises should be given to students. There should be a continuous assessment on the strengths and weaknesses of students in the achievement test to measure the progress of students. Remedial teaching is encouraged by teachers at all times.

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REFERENCES

Books

Bremer, Sydney N.1980."Habit Formation," Successful Achievement, Volume 2. Quezon City: Success Unlimited Enterprises.

Guerero, de Leon, Cynthia and Paguso Cristobal, 1978.Elementary Statistics and Probability. Manila: Sinag-Tala Publishers Incorporation.

Rosskofp, Myron F.1984. Modern Mathematics – Algebra One,(Chicago: Silver Burdett Company)

Unpublished Materials

Agoot, Frederick R.2006."Performance in College of the First Year Students of Divine Word College of Vigan."Unpublished Master's Thesis, University of Northern Philippines, Vigan City.

Aguilar, Eugene R.2004, "Performance of Intermediate Algebra of the second Year Students ofSinait National High School".Unpublished master's Thesis, University of Northern Philippines,Vigan City.

Aruejo, Rodena M.2006, " Mathematics Achievement of the Third Year Students of Santa Maria national High School, Division of Ilocos Sur, Year 2005-2006'. Unpublished Master's Thesis, University of Northern Philippines, Vigan City.

Cayabyab, Mary Loreen V.2006. "Motivating factors Related to the Mathematics Performance of the First Year Students of the University of Northern Philippines". Unpublished Master's Thesis, University of Northern Philippines, Vigan City.

Gagto, Rico G.1989, "The Performance in College Algebra of First Year Students of the University of Northern Philippines- Candon, Unpublished Master's Thesis, University of Northern Philippines, Vigan City.

Quismondo, Corazon, 1990. " The Relationship between the Freshmen College Students' Achievement in Algebra and some related factors." Unpublished master's Thesis, University of Northern Philippines, Vigan City, Ilocos Sur.

Saelem, Somboon.1995, "Determinants of Mathematics Performance of the BSCE Junior Students of the University of Northern Philippines" Unpublished Master's Thesis, University of Northern Philippines, Vigan City.

Tactay, Tirso ,2005, "Performance of the First Year Students in College Algebra at the Institute of Fine Arts, University of Northern Philippines, Vigan City.

Instructional Competence of Faculty and Students' Academic Performance

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ABSTRACT

This study aimed to determine the profile and instructional competence of the faculty in relation to students' academic performance of ASIST. It involved total enumeration of 24 faculty, 30 Bachelor of Elementary Education (BEEd), and 12 Bachelor of Secondary Education (BSEd) students. A questionnaire was used to seek information of the profile and an evaluation sheet to gauge the instructional competence of the faculty. The gathered data were analyzed through frequency, percentage, mean, and correlation analysis. Results revealed that instructional competence of the faculty was good in all the aspects on commitment, knowledge of subject matter, teaching for independent learning, and management of learning. The academic performance of BEEd students were described as good while the BSEd students had a very satisfactory performance. Among the independent variables, only faculty with seminars/trainings, with researches, with computer at home could influence their instructional competence. Likewise, instructional competence significantly influenced students' academic performance.

Introduction

The principal elements that make teaching and learning possible and attainable are the teachers, the learners and a conducive learning environment. Without one, there could be no teaching nor will there be learning of a desired objective. Only when a positive relationship exists among them can teaching and learning occur with precision and predictability. The teacher serves as the prime mover of the educational wheel while the learners are the key participants in the learning process. The favourable environment provides essential features and ingredients that could make a headway in guiding the processes and methodologies needed for a smooth linkage among the three (Corpuz and Salandanan, 2007).

The teachers' competence in teaching affects to a great extent the performance of the students. The teachers, therefore possess the necessary attributes and competencies for the effective academic performance of students.

Profile of Teacher Education Faculty

a. Gender
b. Civil Status
c. Age
d. Educational Attainment
e. Academic Rank
f. Length of Teaching Experience
g. Number of Lesson Preparation
h. Number of Membership in Professional Organizations
i. Number of Seminars/Trainings
j. Number of Researches Conducted
k. Availability of Computer at Home
l. Availability of Internet Access at Home

Instructional Competence of the Faculty

a. Commitment
b. Knowledge of Subject Matter
c. Teaching for Independent Learning
d. Management of Learning

Academic Performance of Teacher Education Students in terms of the following subjects:

a. General Education
b. Professional Education
c. Major

Figure 1. **Research Paradigm**

Figure 1 shows the interrelation of the independent variables and the dependent variables considered in the study. The level of instructional competence of the faculty along commitment, knowledge of subject matter, teaching for independent learning, and management for learning could be influenced by their profile. Likewise, academic performance of the BEEd and BSEd fourth year students could also be influenced by the instructional competence of the faculty.

Statement of the Problem

This study aimed to investigate the instructional competence of the faculty and academic performance of Fourth Year teacher education students of the Abra State Institute of Sciences and Technology, Lagangilang, Abra during the school year 2012-2013. Specifically, it sought answer to the following questions:

1. What is the profile of the faculty in terms of the following: Gender; Civil Status; Age; Educational Attainment; Academic Rank; Length of Teaching Experience; Number of Lesson Preparation; Number of Membership in Professional/ Scientific/ Honor Society; Number of Seminars/ Trainings Attended in the last five years; Number of Researches Conducted; Availability of Computer at Home; and Availability of Internet Access at Home?
2. What is the level of instructional competence of the faculty in terms of the following dimensions:
   a. Commitment
   b. Knowledge of Subject Matter
   c. Teaching for Independent Learning
   d. Management of Learning?

3. What is the level of academic performance of the fourth year teacher education students along:
   a. General Education;
   b. Professional Education; and
   c. Major?

4. Is there a significant relationship between the faculty profile and their instructional competence?
5. Is there a significant relationship between the faculty instructional competence and students' academic performance?

Methodology

This study employed the descriptive-correlative method of research. The respondents involved the 24 faculty members who were totally enumerated, 30 BEED-4 and 12 BSED-4 students in the College of Teacher Education and Home Technology. A questionnaire was designed to elicit information on the profile of the faculty respondents and an evaluation sheet was accomplished by the fourth year BEEd and BSEd students to gauge the instructional competence of the faculty respondents. The academic performance of the student respondents from their first year to third year were taken from the office of the registrar. The data gathered were organized and summarized through the following statistics: frequency, percentage, weighted mean, and simple correlation analysis. The gathered data were processed using the software Statistical Package for Social Science (SPSS).

Results and Discussion

Faculty Profile of Teacher Education of the Abra State Institute of Sciences and Technology

The teacher education faculty is composed of 70.83% female, and 29.17% male. This result was also observed in the study of Flores, et.al. (2013) where 72.06% of their respondents were female. This also goes with the statement of former Education Sec. Leslie A. Lapus in the column of Esplanada (2009) in the Philippine Daily Inquirer that male teachers were a vanishing breed. Women-powered DepEd records furnished to the Philippine Daily Inquirer showed that 423,549 or 86.3% or 491,338 teachers in public elementary and high schools all over the country were women. And as shown in the article of Philippine Commission in Women as of July 2010, women dominated the teaching. profession. As to civil status, the vast majority (91.67%) of the faculty is married, none of them is single. This negates the conception of most people that most teachers remain single because they are married to their profession. The age bracket of the faculty ranged from 24-61 years old. Less than a majority (41.67%) is in the 40-47 age bracket. This implies that most of them are in their middle age. Of the 24 faculty of the College, more than a majority (54.17%) is MA degree holders. Everybody has earned either units or degree towards a graduate degree. This implies that they have the desire to grow professionally and that the college has a strong faculty force which meets the educational qualification of faculty teaching in higher learning institutions. As of National Budget Circular (NBC) 3rd Cycle, most of the faculty members (33.33%) have instructor academic rank. These are the new addition to the faculty force. Looking at the profile on academic rank it can be observed that the faculty members are more or less equally distributed in the different academic ranks. A vast majority (75%) of the college faculty have been in the profession for 16 years or more years. This implies that they have a long experience in teaching. Article 114 of the ASIST code (1997) provides that a normal load equivalent is 18 units, one preparation per semester or 15 units with 2 or more preparations per semester for undergraduate level for each full-time faculty member. In terms of the number of lesson preparations, most of the faculty(45.83%) have 5 or more preparations during the school year in review (SY 2012-2013). This implies that for some faculty, the number of lesson preparations exceeds that which is provided in the ASIST code. On membership in professional, scientific and honor societies broaden the knowledge, skills and experience of faculty, more than a majority (54.17%) have membership of such associations, and there are 4 or 16.67% who do not have membership in any professional, scientific honor societies. In-service seminars/ trainings keep the faculty abreast with the latest developments in their fields of specialization. More than a majority (66.67%) of the faculty has attended 5 or more seminars/ trainings in the last five years, 87.5% have attended 1-5 in regional/ national level, while 15 or 62.5% have not attended seminars/ trainings of international level. This implies that all the faculty have attended seminars/ trainings in the local and regional/ national levels but more than a majority (62.5%) have not attended any of an international level. Computers facilitate the teachers' academic functions. On the other hand, vast majority (70.83%) of the faculty of the college have computers at home, 50% of whom have availability of internet access in their homes. This implies that faculty recognizes the importance of new technologies in education.

Level of Instructional Competence of Faculty-Respondents

Table1. **The Level of Instructional Competence of the Faculty of Teacher Education Along Commitment Aspect**

Indicators of Commitment	x	Descriptive Rating
1. Demonstrates sensitivity to students' ability to attend and absorb content information.	3.82	*Good*
2. Integrates sensitivity in his/her learning objectives with those of the students in a collaborative.	3.84	*Good*
3. Makes himself/ herself available to students beyond official time.	3.92	*Good*
4. Regularly comes to class on time, well-groomed and well-prepared to do assigned responsibilities.	4.11	*Good*
5. Keeps accurate records of students' performance and promptly submits the same.	4.02	*Good*
Composite Mean	**3.94**	*Good*

1.00 – 1.80 - *Poor* 1.81 – 2.60 - *Fair* 2.61 – 3.40- *Satisfactory*
3.41 – 4.20 - *Good* 4.21 – 5.00 - *Excellent*

Table 1 shows the level of instructional competence of faculty of the Teacher Education along commitment. Commitment is a "solemn promise" to perform the duties and responsibilities mandated by the laws and Code of Ethics of the profession. It is an unwavering pledge to perform all teaching and learning actions with consistency and selflessness to the best interest of the students under their care. Committed teachers are ready to carry on, no matter the price (Corpuz and Salandanan, 2007). The table shows that the mean on all indicators of commitment ranges from 3.82 to 4.11 with a descriptive rating of good. The highest mean of 4.11 was given by students on indicator # 4 which measures the attendance, grooming and preparedness of the faculty to do an assigned responsibility. A composite mean of 3.94 along commitment aspect posted a descriptive rating of good. This implies that the students are very satisfied on the commitment of the faculty.

Table 2. **The Level of Instructional Competence of the Faculty of Teacher Education along Knowledge of Subject Matter**

Indicators of Knowledge of Subject Matter	$\overline{x}$	Descriptive Rating
1. Demonstrates mastery of the subject matter (explains the subject matter without relying solely on the prescribed textbook).	4.02	*Good*
2. Draws and shares information on the state of the art of theory and practice in his/ her discipline.	3.96	*Good*
3. Integrates subject to practical circumstances and learning intents/ purposes of students.	3.93	*Good*
4. Explains the relevance of present topics to the previous lessons, and relates the subject matter to relevant current issues and/ or daily life activities.	3.97	*Good*
5. Demonstrates up-to-date knowledge and/ or awareness on current trends and issues of the subject.	3.92	*Good*
Composite Mean	**3.96**	*Good*

1.00 – 1.80 - *Poor* 1.81 – 2.60 - *Fair* 2.61 – 3.40- *Satisfactory*
3.41 – 4.20 - *Good* 4.21 – 5.00 - *Excellent*

Of the five (5) indicators of knowledge of subject matter, the highest mean (4.02) is posted by the faculty's demonstration of mastery of the subject matter exemplified by his ability to explain subject matter without relying solely on the prescribed textbook. All indicators of knowledge of subject matter had a descriptive rating of very satisfactory, with a composite mean of 3.96. This implies that the faculty members are experts in what they teach, which is one of the professional attributes of a professional teacher. The finding along this line is coincides with the result of the study of Alderite, et. al (2011) where the students perceived that their mentors' instructional competencies are predominantly manifested in their mastery of the subject matter, among other factors.

Table 3. **The Level of Instructional Competence of the Faculty of Teacher Education Along Teaching for Independent Learning**

Indicators of Knowledge of Subject Matter	$\overline{x}$	Descriptive Rating
1. Creates teaching strategies that allow students to practice using concepts they need to understand (interactive discussion).	3.94	*Good*
2. Enhance student self-esteem and/or gives due recognition to students' performance/potentials.	3.86	*Good*
3. Allows students to think independently to make their own course objectives and realistically defined student-professor rules and makes them accountable for their performance.	3.86	*Good*
4. Allows students to think independently to make their own decisions and holds them accountable for their performance based largely on their success in executing decisions.	4.03	*Good*
5. Encourages students to learn beyond what is required and helps/ guides them how to apply concepts learned.	4.03	*Good*
Composite Mean	**3.94**	*Good*

1.00 – 1.80 - *Poor* 1.81 – 2.60 - *Fair* 2.61 – 3.40- *Satisfactory*
3.41 – 4.20 - *Good* 4.21 – 5.00 - *Excellent*

A student-centered classroom allows for independent learning. Students actively search for needed information and learning experiences, determining what is needed, and seeking ways to attain it, with the teacher as a facilitator (Vega, et.al. 2006). Along teaching for independent learning, the faculty had a very satisfactory level of competence with a composite mean of 3.94. This implies that the faculty uses the innovative method or open method, characterized by, among others, the teacher providing guidance and facilitating learning and child's education, the child's responsibility, (Roguel, SM nd).

Table 4. **The Level of Instructional Competence of the Faculty of Teacher Education Along Management of Learning**

Indicators of Teaching for Independent Learning	$\bar{x}$	Descriptive Rating
1. Creates opportunities for intensive and/ or intensive contribution of students in the class activities (e.g. breaks class into dyads, triads or buzz/ task groups).	3.87	*Good*
2. Assumes roles as facilitator, resource person, coach, inquisitor, integrator, referee in drawing students to contribute to knowledge and understanding of the concepts at hand.	4.00	*Good*
3. Designs and implements learning conditions and experience to promote healthy exchange and/ or confrontations.	3.82	*Good*
4. Structures/ restructures learning and teaching-learning context to enhance attainments of collective learning objectives.	3.83	*Good*
5. Use of instructional materials (audio/ video materials: fieldtrips, film showing, computer aided instruction, handouts, etc.) to reinforce learning processes.	3.83	*Good*
Composite Mean	**3.87**	*Good*

1.00 – 1.80 - *Poor* 1.81 – 2.60 - *Fair* 2.61 – 3.40- *Satisfactory*
3.41 – 4.20 - *Good* 4.21 – 5.00 - *Excellent*

One of the most important roles that teachers play is that of a classroom manager. Effective teaching and learning cannot take place in a poorly managed environment. A well-managed classroom does not just come out from nowhere. It takes a good deal of effort to create the conducive learning climate The person who is most responsible for creating it is the teacher (Corpuz and Salandanan, 2007). As shown in table 4, all indicators of management of learning posted means ranging from 3.82 to 4.0 which fall under the descriptive rating of good. The highest mean (4.6) however, is on the indicator wherein the faculty assumes roles as facilitators, resource person, coach, inquisitor, and integrator, reference in drawing students – contribute to knowledge and understanding of the concepts at hand. These faculty roles are consistent with the teacher's role in the pillar of education "learning to do" advocated by the International Commission on Higher Education for the 21st century (Vega, et.al,2006). This pillar of education – learning to do – describes one of the teacher's roles which is that of a facilitator. This role is also provided in section VI – Other Requirements – in CMO 02, s 2011, that the teacher is the facilitator of learning in a formal education. Higher Education Institutions (HEIs) are expected to ensure that the program faculty has the necessary qualifications and that there is a core of full-time faculty members handling the program. Moreover, HEIs ought to facilitate the shift from a teaching to a learning-centered education paradigm by orienting their faculty accordingly. The composite mean of 3.87 shows that the level of instructional competence of the faculty of Teacher Education along management of learning is good.

Table 5. **Summary of the Instructional Competence of the Faculty of Teacher Education of ASIST**

Instructional Competencies	$\bar{x}$	Descriptive Rating
Commitment	3.94	*Good*
Knowledge of Subject Matter	3.96	*Good*
Teaching for Independent Learning	3.94	*Good*
Management of Learning	3.87	*Good*
Overall	**3.93**	*Good*

1.00 – 1.80 - *Poor* 1.81 – 2.60 - *Fair* 2.61 – 3.40- *Satisfactory*
3.41 – 4.20 - *Good* 4.21 – 5.00 - *Excellent*

The table shows the summary of the instructional competence of the faculty of Teacher Education of ASIST along the 5 instructional competencies. Commitment has a mean of 3.94; knowledge of subject matter 3.96; teaching for independent learning 3.94 and management of learning 3.87, all with descriptive rating of good. The overall mean of 3.93 shows that the instructional competence of the faculty of Teacher Education of ASIST is good which means that their performance meets and often exceeds the job requirements.

Level of Academic Performance of the Students

Table 6. **Level of Academic Performance of the Fourth Year BEEd and BSEd Students**

Area	BEEd ($\bar{x}$)	Descriptive Rating	BSEd ($\bar{x}$)	Descriptive Rating
General Education	2.25	Very Satisfactory	2.18	*Very Satisfactory*
Professional Education	2.32	Good	2.19	*Very Satisfactory*
Major Subjects	-	-	2.09	*Very Satisfactory*
As a Whole	2.29	Good	2.16	*Very Satisfactory*

ASIST Grading System

1.00 – 1.25	1.00 – 1.25	Excellent
1.50 – 1.75	1.26 – 1.75	Superior
2.00 – 2.25	1.76 – 2.25	Very Satisfactory
2.50 – 2.75	2.26 – 2.75	Good
3.00	2.76 – 3.00	Average and Passing

The level of academic performance of the Fourth Year BEEd and BSEd Students is shown in table 6. Of the 2 curriculum areas evaluated, it is on professional education where the BEED performed very satisfactorily, and with good performance on professional education. As a whole, the BEED students had a mean rating of 2.29 with a descriptive rating of "good". This implies that the students are performing well in their studies. The BSEd, on the other hand, had a very satisfactory rating on all of the areas evaluated: general education, professional education and major subjects. The overall mean of 2.16 shows that they have a very satisfactory academic performance in all their subjects.

Table 7. **Correlation Matrix Showing the Relationship Between the Faculty Profile and Instructional Competence**

Profile \ Instructional Competence	Commitment	Knowledge of Subject Matter	Teaching for Independent Learning	Management of Learning	Overall
Gender	-.028	.100	.128	.098	*.070*
Civil Status	-.071	-.113	-.168	-.110	*-.110*
Age	-.355	-.328	-.391	-.384	*-.369*
Educational Attainment	.250	.252	.322	.325	*.287*
Academic Rank	.098	.198	.168	.203	*.166*
Length of Teaching Experience	-.149	-.077	-.100	-.104	*-.110*
Number of Lesson Preparation	.041	.037	.016	.097	*.048*
Number of Membership in Professional Organizations	-.025	.097	.050	.029	*.039*
Number of Seminars/ Trainings					
Local	.432*	.504*	.493*	.465*	.478*
Regional/National	.441*	.414*	.457*	.439*	.444*
International	.168	.275	.275	.239	.240
Number of Researches Conducted	.517*	.485*	.456*	.411	.479*
Availability of Computer at Home	.485*	.510*	.541**	.496*	.514*
Availability of Internet Access at Home	-.115	-.087	-.056	-.124	-.097

* Correlation is significant at the 0.05 level (2-tailed).

** Correlation is significant at the 0.01 level (2-tailed).

The table shows that of the independent variables tested in the study, only attendance in seminars/ trainings, having conducted research, and availability of computers at home had significant relationship with instructional competence of the faculty. This implies that teachers need to attend seminars/ trainings related to their fields of specialization to enhance their instructional competence. Moreover, they have to focus on redesigning delivery of instruction matched for the 21st century learners, through the introduction of Technology-Enhanced Instruction and pave the way towards borderless education for the coming of the ASEAN 2015. It is imperative for instructional leaders to design and implement new strategies to help teachers and students recognize, understand and integrate technology (Avolio, 2000).

One of the social dimensions of development in ASEAN 2015 is to strengthen education within the member states through increasing the competitiveness of the people. Ways of achieving this are through seminars, trainings and the conduct of researches that will improve the competitiveness of the people, especially teachers and students. This is also stipulated by Geronimo (2013) that among the eight ways the Philippines can prepare for ASEAN 2015 is through collaboration in research and extension. Higher education institutions, therefore, should conduct researches that can help meet the challenges on the quality of education (e.g., teacher education and pedagogy). In support to this, CHED Regional Director Catherine Castaneda assured that CHED always has money for research. All that is needed, therefore, are good researches that can help prepare the education sector for the ASEAN Integration by 2015.

Table 8. **Correlation Matrix Showing the Relationship between Instructional Competence of the Faculty and Academic Performance of the Fourth Year Teacher Education Students**

Instructional Competence / Academic Performance	Commitment	Knowledge of Subject Matter	Teaching for Independent Learning	Management of Learning	Overall
BEEd					
General Performance	.589**	.648**	.596**	.568**	.652**
Professional Education	.433*	.391*	.426*	.447*	.459*
As a whole	.579**	.584**	.579**	.575**	.628**
BSEd		.198	.168	.203	.166
General Performance	.456	.695*	.678*	.742**	.687*
Professional Education	.615*	.745**	.746**	.800**	.744**
Major Subjects	.453	.589*	.590*	.685*	.593*
As a whole	.565**	.701*	.693*	.764**	.698*

** Correlation is significant at the 0.01 level (2-tailed).

* Correlation is significant at the 0.05 level (2-tailed).

As shown in the table, the instructional competence of the faculty along commitment, knowledge of the subject matter, teaching for independent learning and management of learning have a significant relationship with the academic performance of the Bachelor of Elementary Education (BEEd)students as a whole. On the other hand there is a significant relationship between the instructional competence of the faculty and the academic performance of the Bachelor of Secondary Education (BSEd) students as a whole. Results of this study differ with that of Sali-ot (2011) in the degree of relationship between the instructional competence of the faculty and the academic performance of students. In her study, there is a moderate correlation between the competencies of college instructors and the factors affecting the academic performance of students, while in this study, the relationship is significant. However, ultimately, the result is clear that the academic performance of students is influenced by the instructional competence of the faculty.

Conclusions

1. A vast majority of the faculty of the College of Teacher Education (CTE) were female, married, aged 40 – 47 years old, with MAs, occupying instructor position, teaching for more than 15 years, with more than 4 lesson preparations, having membership in professional organizations, attended seminars and trainings in local, regional and national levels with only a few having participated in the international level. Most of the faculty have computers with internet access.

2. The instructional competence of the faculty was consistently rated by the students as good on all aspects (commitment, knowledge of subject matter, teaching for independent learning and management of learning).

3. In terms of academic performance, the BEEd students had a very satisfactory academic performance in general education, and with good performance in professional education subjects. The BSEd students, on the other hand, had a very satisfactory performance in general education, professional and major field of specialization.

4. Of the independent variables tested in the study, only attendance to seminars/ trainings, conduct of researches, and the availability of computers at home had significant relationship with the instructional competence of the faculty.

5. There was a significant relationship between the instructional competence of the faculty and students' academic performance in general.

Recommendations

1. The faculty should conduct more researches, especially those that could help meet the challenges of the ASEAN 2015; attend trainings/ seminars related to their fields of specialization to keep abreast with new developments, and to further their competence. They should likewise take advantage of the benefits of the use of computers and other ICT materials in their teaching to improve the performance of students.

2. Further studies along instructional competence of faculty and academic performance of students may be conducted to arrive at more conclusive results.

REFERENCES

Alderite, T.O., et. al. 2011. Instructional Competencies of Holy Cross of Davao College Education Faculty Assessed Through the National Competency-Based Teacher Standard (NCBTS).

ASEAN Secretariat. 2014. ASEAN Integration by 2015 and Its Implications to Education in the Region. Chiang Mai, Thailand.

ASIST Code 2007. ASIST, Province of Abra

Avolio, B. (2000). Full Leadership Development: Building the Vital Forces in Organization. London:Sage.

Corpuz, B.B. and Salandanan, G.G. Principles of Teaching 1.Lorimar Publishing, Inc., Manila, Philippines

CMO 52, s 2007. Addendum to CMO 30, s 2004 on the Revised Policies and Standards for Undergraduate Education Curriculum. CHED, Manila, Philippines

Flores, J. et.al. 2013. Teaching Competence of the BEEd and BSEd Pre-Service Teachers of ASIST. ASIST Main Campus, Lagangilang, Abra, Philippines

Geronimo, J.Y. 2013. 8 Ways PH Higher Education Can Prepare for ASEAN 2015.

Ornstein, A. Strategies for Effective Teaching. Harper Collins Publisher. New York, 1992

Roguel, S.M. nd. Self-Learning Module on Principles of Teaching and Strategies. CLSU-OU, Science City of Muñoz, Nueva Ecija, Philippines

Sali-ot, M.A. 2011. Competencies of Instructors: Its Correlation to the Factors Affecting the Academic Performance of Students.

Vega, V. A. and Prieto, N.G. 2006. Facilitating Learning. Books Atbp. Pub. Corp. Mandaluyong City, Philippines

The Economic Contribution of Abra State Institute of Sciences and Technology in the Development and Progress of the Province of Abra

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ABSTRACT

This study determined the economic contribution of Abra State Institute of Sciences and Technology, Bangued Campus in the development and progress of Abra. It considered the profile of the respondents and status of ASIST Bangued Campus as inputs, adequacy of school resources, program processes and quality of graduates as outputs and economic development of Abra as impact of the study. It employed the descriptive-correlational method of research. There were 465 respondents of the study. School resources, program processes and quality of graduates are influenced by status of ASIST. Singly, economic development of the province is influenced by equipment. As a whole, the combination of the factors influences the economic development of Abra. The college should offer courses that help the economic development of the province. Administrators must send faculty for the appropriate National TVET qualification schooling for them to acquire titles (highest NC level) as Master trainer (NTTC Level IV), Training Master (NTTC Level III), Training Designer/Developer (NTTC Level III and Trainer/Assessor (NTTC Level I) in technology education and higher education trainings to equip all faculty qualifications in support to the new educational challenge in the country better known as RA 10533 (Enhanced Basic Education Act of 2013) and eventually to avoid displacement or retrenchment of faculty resources. Knowledge, skills and attitudes of graduates should be prioritized to boost the province's economic development and in support to the ASEAN economic community.

Objectives

1. Identify the profile of the respondents in terms of age, sex, civil status, educational attainment, area of specialization, number of trainings/seminars attended, number of hours spent in trainings/seminars attended, status of appointment, and number of years in service.
2. Describe the status of the campus in terms of instruction, research, extension, and production.
3. Determine the level of adequacy of school resources and program processes in terms A) School Resources: human resources, and non-human resources; buildings, classrooms, laboratory, office and staff room, library, equipment, and materials: B) Program processes: Instructional system; processes, and activities: and C) administrative system.
4. Explain the level of adequacy of school resources of the campus as influenced by the profile of the respondents.

5. Determine the level of school resources influenced by the status of the campus in terms of instruction, research, extension, and production.
6. Reveal the quality of graduates in terms of knowledge, skills and, attitudes.
7. Show the relationship between the quality of the graduates and the profile of the respondents.
8. Reveal the relationship between the quality of the graduates and the status of the school.
9. Point out the impact of quality of graduates in terms of knowledge, skills, and attitudes on the economic development in the province of Abra.
10. Illustrate the impact on economic development influenced by the level of school resources of the campus.
11. Describe the impact on economic development influenced by the quality of graduates.

Introduction

The people are the greatest resources of every country and the most effective agents and managers of change. However, if the people are not equipped with vital knowledge, skills, and the right attitudes, nothing will change. To become agents and managers of change, they must be prepared and educated. They must be equipped with critical knowledge, skills, the right attitudes and values not only to function and live well in society, but also to be creative and upright citizens of the country. These capabilities and many more can be the object of development through education. It is an essential component in the making of a productive and strong nation.

Education should provide the necessary conditions and opportunities to the individual so that he can develop wholly and fully as a person. Education must make the individual aware of his world which consists of basic structures in which each of his new experiences and each new aspect of his personally developed world finds its rightful place. Education must make man and woman willing and able to find niche within the complexity of the world and thus, find meaning in life.

Abra State Institute of Sciences and Technology (ASIST) Bangued Campus (formerly Abra School of Arts and Trades ASAT) is silently discharging its function as a college offering globally competitive technical and academic courses that could develop every Abrenian economically, socially and politically.

As part of the Asean Economic Community (AEC) the college is producing quality graduates who are globally marketable skilled labor, showcasing responsive technologies and other solutions to development problems; can generate new knowledge and verify client-oriented technologies and other solution to local, national and international development problems; can develop and operate viable income generating projects that augment its finances and to sustain and develop ASIST as dynamic and responsive institution of learning, performing efficiently and effectively to economic development in the province, country and the Asean Economic Community (AEC) as a whole.

Education in every sense is one of the fundamental factors of economic development. No country can achieve sustainable academic/technical development without substantial investment in human capital. Education enriches people's understanding of themselves and world. It improves the quality their lives and leads to broad social benefits to individuals and society. Education raises people productivity and creativity and promotes entrepreneurship and technological advances. In addition it plays a very critical role in securing economic and social progress and improving distribution. (http:www.sociologyguide.com/education)

Theoretical Framework

The school indeed has a great responsibility in improving and enhancing its curriculum to link it to the world of work. Changing technology will inevitably encourage technical and vocational education system to improve methods and approaches in order to prepare students not only with current necessary skills, but also prepare them for new occupation. (http:/www.ite.educ.sg/pv).

As the 21st century education spreads worldwide, universities and colleges must prepare for the impact of the K-12 and the 2015 ASEAN Economic Community. It aims to unite the member countries of ASEAN into one economic and multi-cultural community cooperating on security matters. As an initial step in the integration process, aims to develop the 10-member countries of ASEAN into single market and production base for the free flow of goods, services, investment, capital and skilled labor. The following results are expected from the education sector: 1)greater student and staff mobility, 2) greater demand for quality programs, 3) more collaborative research and curricular activities, 4) competition for jobs and employment, 5) higher employer standards, and 5) race for university ranking.

The education reform that resulted in the K-12 basic education curriculum stems from the need to address the onslaught of globalization and regional cooperation for the graduates of HEIs to be globally competitive. This requires internal changes to include a shift from 10 to 12 years of basic education. By shifting to 12 years of basic education, the Philippines will now be at par with the rest of the world. This reform will result in a more solid basic foundation of HEI graduates, will provide a bigger chance of becoming regionally and globally competitive. http://www1.up.edu.ph/up-gears-up-for-the-impact-of-the-k-12-curriculum-and-asean-economic-cooperation-2015/

The quality of technical and vocational teacher must be considered placing greater emphasis on practical skills training curricula. Teachers are required to periodically undertake programs in continuing education in order to update their knowledge and skills.

No country has achieved constant economic development without considerable investment in human capital. Previous studies have shown handsome returns to various forms of human capital accumulation: basic education, training, learning-by-doing and aptitude building. The distribution of education matters. Unequal education tends to have a negative impact on per capita income in most countries. Moreover, controlling for human capital distribution and the use of appropriate functional form specifications consistent with the asset allocation model make a difference for the effects of average education. Investment in human capital can have little impact on growth unless people can use education in competitive and open markets. The larger and more competitive these markets are, the greater are the prospects for using education and skills. (http://socyberty.com/education/role-of-education-in-economics-development).

ASIST Bangued Campus is a producer of wealth, training students to become productive labor forces in the province, country and around the world. The types of workers produced are professional and skilled workers like teachers, engineers, electricians, auto mechanic, draftsmen, electronics technician, culinary managers, dressmakers, civil technology workers, plumber and masonry workers and cosmetology managers. These workers command higher salaries not only in the country but also abroad and these will be of big help with their families.

Ragasa (1999) explained that impact is produced by output. On the effectiveness of Graduate Education Programs in State Universities in Region I, the output indicators of effectiveness of the graduate programs is measured in terms of productivity of graduates and productivity of programs.

She further explained that production of graduates is measured in terms of change in positions, promotion, present salary, training and study, research conducted, articles written and books published.

Determinants of the success of graduates of higher institutions of learning are employability and passing the professional examinations such as Licensure Examination for Teachers, Licensure Examination for Engineering, Civil Service Exams, TESDA assessment among others.

On Economic Development

Economic development is a means and not an end. Economic growth is necessary, but not a sufficient condition for development. Local Economic Development is not just simply setting up large export processing zones or agro-industrial estates. It is not simply building roads, ports, and airports. The quality and direction of growth is as important- and perhaps more so than as quantity or size. Growth that destroys the environment, or that fails to create local employment and reduce poverty, is unlikely to be sustainable in the long run. Sustainable development is at the heart of LED. It is important to remember that while focused on the local, effective LED necessarily has links to the regional, national, and international levels. It is also important to remember the difference between local and national economic development. National economic development is concerned with setting the overarching framework and ground for the sustainable growth and overall competitiveness of the economy through the use of policy instruments such as inflation targeting, and/or floating the exchange rate. National economic development deals with industry-wide and inter-industry matters, while local economic development concentrates on firm, inter-firm, and cluster dynamics. The critical levers in local economic development are, among others, land use plans, taxation, wage setting (regional level), and the provision of infrastructure and social services. (LGSP, 2003; (http://www.dilgxi.org/KPs?EconomicDevelopment/led.pdf)

The AEC is definitely a work in progress. Businesses need to have an international mindset, which gives them the appetite and ability to make cross-border investments and acquisitions. Momentum has been established, as seen from many investments and merger and acquisition activity that has occurred in the region. In the Philippines, PNB and Allied Bank, BDO, Equittable Bank and PCI Bank among others joined together to form a stronger and competitive business undertakings.

Improved Economic Condition. Wim Naude (2008) as cited by Ferrer (2013) defines economic development as the process of structural transformation of an economy towards a modern, technologically advanced economy based on services and manufacturing. This process involves not only qualitative changes to the nature of an economy, but also accompanying quantitative changes in terms of the productivity and output per person. If these qualitative and quantitative changes result in unambiguous improvements in human welfare, it is generally seen as economic development. In both the qualitative as well as quantitative dimensions of economic development, entrepreneurship makes a positive contribution to economic development. Entrepreneurship is depicted as important for economic development, is seen to create jobs, eases fiscal burden, and provides competition.

Moreover, Miguel (2009) explained that industrial development has been a primary concerned of the national development plan of the government. The aim is not only to industrialize per se but also to ensure equal distribution of income and economic opportunities for all sectors of the Philippine society with priority to its less endowed members. With the declining efficiency of the economy coupled with the rising population and growing disparity in income, the government has made industrial development a main strategy to contribute to the attainment of social justice, economic equity, poverty alleviation, and, lastly, the enhancement of the standard of living. Industrial development in the Philippines, however, has been perceived as rich-biased for the reason that the big capitalists who own the big industrial firms are given priorities, and urban-biased because the development is concentrated only in the big cities.

Adequacy of School Resources

On Human Resources

This refers to the manpower, teaching force, administrators and staff rendering services to the clientele.

Education is one of the vital components of the development process since its function focuses on human resource development. Economists agree that it is not the human resources, of the nation, not its capital nor its material resources that ultimately determine the character and pace of its economic and social development. Harbion (1973) gives a version of this position by stating:

human resources .... Constitute the ultimate basis for wealth of the nation Capital and natural resources are passive factors of production; human beings are active agents who accumulate capital, exploit natural resources, build social, economic and capital organizations, and carry forward material development. Clearly, a country which is unable to develop the skills and knowledge of its people and to utilized them effectively in the national economy will be unable to develop anything else.

The statement shows and strongly confirms that the principal institutional mechanism for the developing human skills and knowledge is the educational system.

Human aspect of resources within an organization contributes approximately eighty percent of the organization's value. This implies that if people are not managed properly, the organization faces a serious chance of falling apart. The Human Resource main objective is to bring out the best in their faculty/employees and thus contribute to the success of the organization.

Pilarta (2011) mentioned that the administrators' performance was significantly related with the school-related variables such as adequacy of instructional materials, adequacy of physical plant and facilities and adequacy of support services. This means that the higher the adequacy of instructional materials, physical plant and facilities as well as support services, more likely the better is the performance of administrators. Furthermore, it also reveals that occupational competence was significantly related with the adequacy of instructional materials.

On Non-Human Resources

The study of Pilarta (2011), revealed that the adequacy of physical plant and facilities like school buildings, classrooms, offices and staff rooms, sanitary facilities and library, medical and dental services, guidance and counseling services and food services, instructional materials and support services were associated with the performance of the administrators. Teachers' positions, number of trainings attended, and number of preparations, on the other hand, as well as the land area of the school adequacy of instructional materials and physical plant and facilities were significantly related with overall performance.

On Quality of Graduates

Producing effective teachers, engineers, and industrial workers, to functionally respond to the needs of critical times challenged every institution of higher learning. Higher Education Institutions (HEIs) strive for quality education and excellence. Quality education is the crucial need of the present times. This maybe forged ahead by technology, government's systems and structures, complex social problems and issues among others. The aimed excellence by educational institutions entails standards that include the kind and quality of graduates it produced (Visco, 2013).

He also explained that various indicators that help to measure the quality of education provided in each of the Higher Education Institutions. One of them is the number of students who pass the national standardized examination with similar or identical questions given under the same conditions like the Licensure Examination for Teachers (LET), Licensure Examination for Engineering Courses, TESDA National Competency Assessments and the CSC Examinations. These are national examinations uniformly given by Professional Regulation Commission

(PRC), CSC, and TESDA. The results are important indicator of the quality of education provided by the school. The reason for this is that when there is a uniform examination system and a grading system for students, it is easy to identify the best performing institution. This will also enable in comparing the various institutions against each other.

Administration and supervision are necessary for a school system to carry on a successful educational programs that will align to the goals and objectives of the new basic education curricula parallel to ASEAN economic community.

Gillespie as cited by Visco (2013) the aim of administration and supervision is to provide the necessary leadership, and training in improving, coordinating, and evaluating of the school program and in handling the problems associated with these. It provides the leadership in improving the teaching-learning situation, changing the school curriculum when necessary, and in developing and improving the instructional materials.

The faculty is what makes the school. The faculty should consist of highly-qualified members in terms of academic qualifications and professional performance who can effectively achieve the teaching-learning goals. Malinnag (1990) said the quality of instruction and the level of expertness of a teacher could be achieved by a long nurturing process as a result of experience coupled with professional development. Competence in teaching is exemplified by the ability to cope with problems of students in hierarchical process of decision-making. First choosing a plan to organize the situation and then identifying a small set of factors that will help improve the situation characterized this. The component teacher has a sufficient expertness to determine the classroom rules that will work. On the other hand, a proficient teacher described as a teacher who thinks analytically and intuitively and one who is capable of organizing and understanding the tasks. Finally the expert teacher establishes maturity and practical understanding.

On Research

Research is an avenue through which new knowledge is discovered, applied or verified and through which appropriate technologies are generated. Thus, it is a basic requirement for an educational institution to have firmly established research and development program (AACCUP, 2005).

Azucena (1995) pointed out that, research is an essential element of the mission of state universities and college. It is viewed as a vital corollary to the teaching-learning process as it sustains and intensifies the ability to teach efficiently and effectively. Through research, faculty-respondents are students advance their understanding in the world and put that knowledge to work to serve society. It challenges the institutions to germinate and bring out to realization ideas to some things of tangible value. To carry out this important function, state universities and colleges employ a number of full time research staff attached to the department and units. A great deal of academic efforts is being spent in the generation of technology. The concern for technological changes and advances led to the opening of various areas for scholarly works. Thus, state universities and colleges become sources of innovations and technologies.

On Extension

The essence of the university's mission of extension services is to bring the campus and the community into fruitful collaboration thereby enriching the life of both. Traditionally, the non-formal programs of the universities involve vocational and skills-oriented training programs conducted in localities which are pre-surveyed to be in need of such programs. Skilled faculty-respondents and trainers, together with necessary materials and equipment are brought to the site convenient for the clients to keep cost of training on the part of the clients, to minimum. This has earned the program the moniker "*University of Wheels*". (Cadiz, 2009).

Labanen (1991) mentioned that ingredients of an effective university extension process to allow positive extension excellence and efficiency: 1) A clear cut statement of the university's extension incorporating dimensions, methods and priorities. 2) A sense of significance of the mission and on upgrading the commitment to it on the part of the entire university faculty, from the chief administrative officer to each individual professor. 3) A direct, consistent two channels between extension personnel and all the appropriate departments, schools and colleges of the university. 4) A symbiotic relationship between university research and university extension. 5) Imaginative, coordinated extension administration 6) An extension staff that merits and with full fellowship in university community while performing its essential mission. 7) An extension curriculum that reflects responsibility for institutional ideals and responsiveness to modern adult needs 8) Effective teaching techniques and learning materials 9) Adequate financing based on broad public support, and 10) Viable communications with individual students, clientele, groups and sister agencies.

On Production

Production activities aim to come up with a restricted set of resources, like materials, labor, equipment, and structure, these would be operated in some fashion such that the desired product or service results will accentuate the demands of the company.

Production management deals with planning, control, and decision-making necessary for the production process and system for getting end product or providing services to clients in the right quantity and of the right quality.

Extension and community outreach can only produce tangible outputs with benefits to the SUC and the general public served if viewed in its production efforts. Extension work when packaged as technology, both social and technical become production for income generation. This is the true essence of true rationalization of SUC's to self-propelling projects and self-liquidating operations management.

The success and failure of the program of the SUC's in Instruction, Research, Extension, and Production depends greatly on the competence and effectiveness in which faculty-respondents perform their professional roles.

Conceptual Framework

This study was guided by the following model:

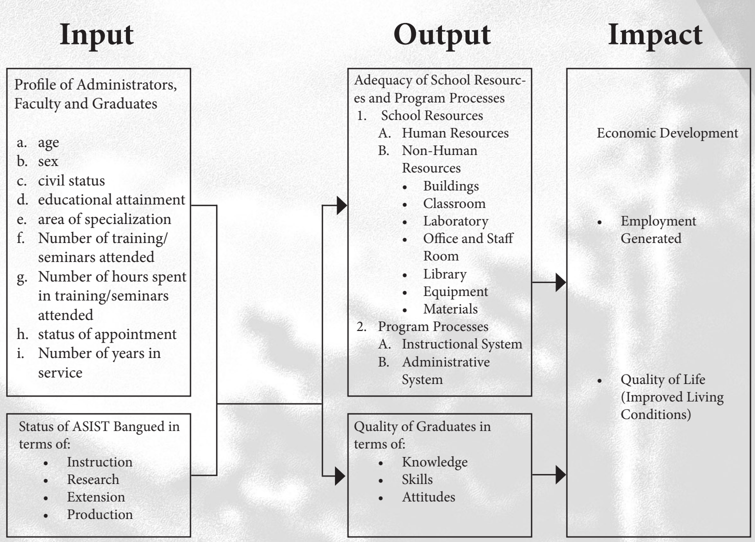

Figure 1. **Research Paradigm**

This study revolved around the paradigm shown above. The input included the Profile of Administrators and the Status of ASIST Bangued Campus along instruction; research, extension and production. The output included in the study are School Resources, Program Processes and Quality of Graduates. The impact of the study is Economic Development of the province of Abra.

Methodology

This study is descriptive and correlational in nature. Questionnaire was utilized to determine the role of ASIST in terms of instruction, research, and production.

Frequency and percentage was used to determine the impact of the roles played by the ASIST in the province of Abra along economic development. Mean was used to describe the status of ASIST in instruction, research, extension and production. Multiple regression was utilized to determine the influence of the profile of the administrators, faculty and graduate and the status of ASIST Bangued in instruction, research, extension and production; adequacy of school resources and program processes; quality of graduates in terms of knowledge, skills and attitudes on the economic development rules played by ASIST in the development of the province of Abra.

Results & Discussion

The salient findings of the study are summarized as follows:

Problem 1. What is the profile of the respondents in terms of the following factors:

a. age,
b. sex,
c. civil status,
d. educational attainment,
e. area of specialization,
f. number of hours spent in trainings/seminars attended,
g. status of appointment, and
h. number of years in service?

Majority of the respondents are female (273 or 58.7%) and of single (284 or 61.1%) status. 254 out of 465 or 54.6% are Bachelor of Science graduates and only four of them or 0.9% are graduates of a doctorate degree.

In terms of their area of specialization, Food Technology (10.5%) and Automotive (9.9%) of the Technical Trade Curriculum were revealed to be the greatest and Drafting Technology (1.7%) and Electronics (1.9%) were the lowest. This profile conforms to the accepted reality that culinary arts (food trades) and automotive technology are the best-selling courses in the country today.

Two hundred out of 465 or 43% of them were permanent and 127 or 27.3% are job order status. Sixty-five or 14% of them have been in the service for 16-20 years while twenty or 4.3% have been in the service for 36-40 years.

Problem 2. What is the status of the campus in terms of:

a. instruction,
b. research,
c. extension, and
d. production?

The level of Status of ASIST Bangued Campus in terms of Instruction. This shows that the school is attaining its goals in instruction. This is evident in the schools production of LET and Engineering Board Exam passers, CSC & TESDA qualifiers. Also the school produces students who won on skill competitions, regional contests on journalism, science and mathematics, etc.

The level of status of Bangued campus in research. This means that the school is responsive to one of the four-fold functions of the college. Although, as to the individual indicators, some of them are moderately attained. This could be attributed to the number of research outputs of faculty as well as students along academic, social, scientific and technical/vocational.

The level of status of Bangued campus in extension. This could be attributed to the numerous extension programs the college is doing. The faculty and students are involved in extension services along skills transfer, livelihood, numeracy/literacy, leadership, environmental awareness, calamity preparedness, etc.

The level of status of the college in production. The faculty members have done instructional manuals for students' use, constructed review materials are sold to CTE and Engineering graduates for use, services in cosmetology, automotive, electronics, drafting, dressmaking, electricity and civil technology are turned into money. Likewise, products in foodservice and management, handicraft and practical arts are all sold out for production.

Problem 3. What is the level of adequacy of school resources and program processes in terms of the following:

1. School Resources
   - a. human resources, and
   - b. non-human resources;
     - b.1. buildings,
     - b.2. classrooms,
     - b.3. laboratory,
     - b.4. office and staff room, and
     - b.5. library
     - b.6. equipment
     - b.7. materials

2. Program processes
   - a. Instructional system,
     - a. Processes, and
     - b. Activities;
   - b. Administrative System?

This presents the regression analysis of school resources of ASIST Bangued campus on the personal factors of the respondents.

The influence of the combination of the 11 personal factors on the level of adequacy of school resources is significant ($p < 0.05$). The 11 personal factors account for 27% of the variance on the level of adequacy; while 73% could be attributed to other factors not included in the study.

The beta coefficient of Educational Attainment (0.516) is significant at 0.05 probability level. Hence, the level of adequacy of school resources is influenced by the educational attainment of the respondents. This means that the higher the educational attainment of the faculty in ASIST Bangued campus, the better they will be able to manage school resources to the advantage of the clientele.

This means that the faculty possess all the qualities needed to be a great teacher. The faculty members possess the appropriate qualifications, display competence in teaching, approachable, sensitive to the needs of the students, set good examples in moral and social behaviours, perform leadership and followership roles. The most imperative is the support of the ASIST Bangued campus administration to the career development of the faculty.

The level of adequacy of classrooms is "Adequate" ($\bar{X}$ = 3.30). The BEEd and BSEd graduates assessed classrooms as "Very Adequate" with computed means of 3.50 and 3.38 respectively. The rest of the respondents rated it as "Adequate". This means that students of CTE perceived that the size of each classroom to conforms to standards and in proportion with the number of students in a class, the equipment and facilities are properly in place, there is an adequate supply and circulation of air in the classroom, properly lighted, ventilated and furnished. Thus, instructional areas are conducive to teaching-learning situation.

On the other hand, the level of adequacy of laboratory is "Very Adequate" ($\bar{X}$ = 3.42). This could be due to the reason that the administration of ASIST Bangued are so desirous to link with other funding agencies to improve laboratories.

The level of adequacy of staff rooms and library, as indicated in Table 11 is "Very Adequate" ($\bar{X}$ = 3.65). This could be attributed to the notion that the staff rooms are strategically located, spacious, equipped with proper facilities furnished and ventilated. However, the college has to elevate the adequacy of staff rooms and library to an extremely adequate level for the school to extremely discharge its function.

Consequently, the materials and equipment are "Adequate" both with a mean of 3.34. This could be attributed to the ability of the administration to link to other line agencies so as to improve the non-human resources specifically equipment and materials.

As a whole, the respondents assessed program processes at a "Very Adequate" ($\bar{X}$ = 3.84) level. This could be because the faculty are industrious to prepare syllabi and course outlines. There is an open communication atmosphere between faculty and students. The faculty members often conducts consultation with the stakeholders of the college. The teaching methods adapted and used by teachers provide maximum opportunity for analytical, critical and independent attitude. Faculty members are doing their functions efficiently and effectively.

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This reveals a "Very Adequate" ($\bar{X}$ = 3.78) level of adequacy of activities. This could be attributed to the varied teaching methodologies and strategies employed by teachers in their teaching to enhance classroom instruction. They even apply strategies that go with the trend of times.

The level of adequacy of program processes is "Very Adequate" ($\bar{X}$ = 3.76). This could be attributable to the point that the college administration includes the stakeholders, e.g. community, students, faculty, alumni, and private sector in planning and decision-making on policy formulation especially when it affects them. Academic unit heads are involved in screening the educational qualifications, skills and abilities of applicants for faculty positions. Channels of communication are evidently open to solve conflicts among workers of the school. Motivational factors like promotion (NBC 461), adequate salary, and professional development are implemented and incentives are given for greater efficiency. The administration also sees to it that rules governing students' admission, retention and other academic requirements are strictly enforced

Problem 3. What is the level of adequacy of school resources and program processes in terms of the following:
1. School Resources

a. human resources, and
b. non-human resources;
b.1. buildings,
b.2. classrooms,
b.3. laboratory,
b.4. office and staff room, and
b.5. library
b.6. equipment
b.7. materials

2. Program processes
a. Instructional system,
a.1. Processes, and
b.1. Activities;
b. Administrative System?

Problem 4. Is the level of adequacy of school resources of the campus influenced by the profile of the respondents?

The influence of the combination of the 11 personal factors on the level of adequacy of school resources is significant ($p < 0.05$). The 11 personal factors account for 27% of the variance on the level of adequacy; while 73% could be attributed to other factors not included in the study.

The beta coefficient of Educational Attainment (0.516) is significant at 0.05 probability level. Hence, the level of adequacy of school resources is influenced by the educational attainment of the respondents. This means that the higher the educational attainment of the faculty in ASIST Bangued campus, the better they will be able to manage school resources to the advantage of the clientele.

Problem 5. Is the level of school resources influenced by the status the campus in terms of instruction, research, extension and production?

The influence of the combination of the seven related factors on the status of school resources is significant ($F = 28.44$, $p < 0.01$). The seven related factors account for 34% of the adequacy of school resources; while 66% could be attributed to other factors not mentioned in the study.

Singly, the beta coefficients of Instruction (0.401), Research (0.338), Extension (0.379) and Production (0.493) are all significant at 0.05 probability level. Hence, the status of school resources is influenced by instruction, research, extension and production functions of the College. This means that status of school resources is dependent on the functionality of instruction, research generated, extension made and production engaged.

Problem 6. What is the quality of graduates in terms of: knowledge, skills, and attitudes?

This indicates a "Very Adequate" quality of graduates in the Vocational Industrial Technology. Knowledge, skills and attitudes are all at the "Very Adequate" level with 3.5, 3.55 and 3.59 computed means respectively and a grand mean of 3.56 which is described as "Very Adequate".

The VIT respondents commonly perceived the college to enhance knowledge and it should have the latest tools and equipment to be used in the future jobs, make norms of actions and decisions to be made in expected work or job in relation to ethical standards and legal principles. Also, to enhance skills should relate effectively with clientele, workers and supervisors through its On-the-Job Training OJT). Furthermore, to improve attitudes one should inculcate working independently and resolve conflicts peacefully.

Problem 7. Is the quality of graduates influenced by the profile of the respondents?

The 11 personal factors on the quality of graduates is significant ($F = 0.036$, $p > 0.05$). The 11 personal factors account for only 92% of the variance on the quality of graduates; while 8% could be attributed to other factors not considered in the study.

The beta coefficient of Hours of Seminars Attended (0.878) is significant at 0.05 probability level therefore, quality of graduates is highly influenced by it. This means that the more number of hours a faculty is exposed to seminars, the better he can perform his instruction function for he can give all the things he learned and experienced in the seminars.

The beta coefficient of Civil Status (0.646) and Hours of Training Attended (0.495), are significant at 0.05 probability level. Hence, the quality of graduates is influenced by civil status and number of hours of training a faculty had attended. This means that the more a faculty can concentrate in his/her work, the better quality of graduates. Singly, faculty can concentrate more on his/her work. Thus the greater the number of hours spent in training, the better is the job performance.

Consequently, the beta coefficient of number of hours of seminars attended (0.476) and Status of Appointment (0.546) are significant at 0.05 level; hence, quality of graduates is influenced by the number of seminars attended and status of appointment of the respondents. This finding may mean that those who have permanent appointment tend to become more enthusiastic in attending in-service seminars.

Problem 8. Is the quality of graduates influenced by the status of the school?

The combination of the status in terms of instruction, research, extension and production on the quality of graduates of ASIST is significant ($F = 56.876$, $p < 0.01$). The four function factors account for 45% of the variance on the quality of graduates; while 55% could be attributed to other factors not considered in the study.

The beta coefficient of Production (0.664) is significant at 0.01; therefore, the quality of graduates of ASIST is highly influenced by production. This means that the quality of graduates is dependent on the school's production.

Problem 9. What is the impact of quality of graduates in terms of knowledge, skills and attitudes on the economic development in the province of Abra?

The impact of ASIST Bangued campus on the economic development of Abra is “High” ($\bar{X} = 3.60$).This could mean that ASIST plays an important role in improving the quality of life of the graduates. Likewise, it could also help in the generation of jobs.

Problem 10. Is the impact on economic development influenced by the level of school resources of the campus?

The influence of the combination of the seven related factors on school resources is significant ($F = 10.29$, $p > 0.05$). The seven related factors account for 26% of the variance on the school resources; while 74% could be attributed to other factors not identified in the study.

The beta coefficient of Office (0.420) and Library (0.419) are significant at 0.05; therefore, economic development is influenced by them.

This means that the contributions of ASIST graduates on the economic development of the province depend on the adequacy of school resources, specifically offices and libraries. In turn, it may result to more employment to be generated and improved quality of life and improved living conditions of the Abreños.

Problem 11. Is the impact on economic development influenced by the quality of graduates?

The influence of the combination of the three related factors on quality of graduates is significant ($F = 16.42$, $p < 0.01$). The three related factors account for 22% of the variance on the quality of graduates; while 78% could be attributed to other factors not considered in this study.

The three related factors influenced the economic development. It takes a combination of the three related factors to affect economic development.

As manifested, the influence of the combination of the three related factors on quality of graduates is significant ($F = 20.94$, $p < 0.01$). The three related factors account for 26% of the variance on the quality of graduates; while 74% could be attributed to other factors not included in the study.

Conclusions

In the light of the findings of this study, the following conclusions have been drawn.

On economic impact. The impact of ASIST Bangued campus on the economic development of Abra is "High". The college plays an important role in 1) employment generation like: a) jobs were created through the technological courses it offered, b) people in the locality were employed, hence employees received fair and just remuneration from the businesses. 2) Improved Quality of life of the graduates (Improved Living Condition) through the following indicators: a) increased family income, b) met the basic needs of the family, c) improved health status of family members, d) bought quality clothes and footwear, e) have savings in the form or bank deposits, insurance protection on pre-need, f) acquired lot and other real properties, g) constructed a house, h) improved and renovate a house, i) purchased vehicles like jeep, car, and motor, j) purchased appliances like refrigerator, microwave oven, electric fan, electric iron, washing machine etc., k) purchased household furniture like sala set, dining set, chairs, cabinet, beds, etc., l) availed the services of a doctor or hospital, not only relying on self-medication or herbal medicines for some illnesses, m) sent their children to school, n) had paid other expenditures and taxes, and o) involved in recreational activities like travel, picnics, outings, parties, club affiliations and the like.

Recommendations

With the conclusions made, the following are the recommendations of the study:

1. Since the school produces the manpower needs of the province, it is imperative to review the undergraduate offerings and match to the new basic education curricula (K-12), by offering competitive courses in higher education and training that will align to the industry requirements for the economic development of the province parallel to ASEAN economic community perspectives.
2. Faculty members should be sent for trainings, seminar-workshops, conferences with longer duration to upgrade their teaching competencies and to be competitive to ASEAN institution of learnings and ultimately the college to have excellent faculty development program.
3. Administrators of ASIST Bangued should encourage their faculty to pursue their masters and doctoral studies in line with their fields of specialization to better prepare them as mentors of the students across departments and to prepare them responsive to the changing yet developing curricular programs brought about by K-12 and the ASEAN Economic Community.
4. To sustain improved program processes, there must be a review and evaluation of curricular program

offerings considering the impact of K-12.

5. Instruction, research, extension and production functions of the College should be tapped because they highly influence the quality of graduates.
6. The enhancement of the quality of graduates in terms of knowledge, skills and attitudes should be given highest priority by the College to synchronize with the ASEAN Economic Cooperation/community. This has a high impact on the province's economic development.
7. ASIST Bangued campus must strive hard to procure technologically accepted/functional machines and equipment for the students to acquire and master the skills required by industries here and international community. Besides, they play an imperative role in the economic development of the province and country as a whole.
8. Administrators must provide more practice rooms and spacious laboratory buildings technologically equipped audio-visual rooms for each department like College of Teacher Education (CTE), Vocational and Industrial Technology (VIT), and Engineering showcasing students' talents in the different fields in general education and technological education.
9. Administrators must send faculty for the appropriate National TVET qualification schooling for them to acquire titles (highest NC level) as Master trainer (NTTC Level IV), Training Master (NTTC Level III), Training Designer/Developer (NTTC Level III and Trainer/Assessor (NTTC Level I) in technology education and higher education trainings to equip all faculty qualifications in support to the new educational challenge in the country, better known as RA 10533 (Enhanced Basic Education Act of 2013) and eventually to avoid displacement or retrenchment of faculty resources.
10. For production to be enhanced, the school must put up separate trade service-businesses on technological education like: Automotive, Electronics, Electricity, Culinary Arts, Fashion and Garment Designs and Cosmetology.
11. ASIST Bangued campus must link with local, national and international government and non-government agencies to enhance knowledge and skill transfer and technology upgrading, opportunities to innovate, increase competitiveness and for improved delivery of services in the ASEAN Economic Community.
12. A parallel study using other independent variables like administrative support, students' scholarships, linkage with other line agencies, trade test, accreditation level and other variables is highly recommended to validate the findings of this study.

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REFERENCES

AACCUP. (2005). Master survey instrument for the accreditation of programs.

Azucena, C.F. (1995). The academe as alternative delivery system: The case of UPLB, Paper Presented at UP Diliman, Quezon City.

Cadiz, Lenaida A. (2009). Professionalism and performance of faculty members of selected universities and colleges in cordillera administrative region, Unpublished Doctoral Dissertation, University of Northern Philippines, Vigan City.

Ferrer, Ace. A. (2013). Compliance of Business Establishments to the Regulatory Measures of Local Government Units in Ilocos Sur, Unpublished Doctoral Dissertation. University of Northern Philippines, Vigan City.

Labanen, Santiago S. (1991). Resources as related to productivity of suc's in region I and CAR: a comparative study, Unpublished Doctoral Dissertation, UNP, Vigan City.

Malinnag Jr., Andres T. (1990). The board examination performance of unp college of teacher education graduates: its relationship to selected variables, Unpublished Master's Thesis, University of Northern Philippines, Vigan City, Ilocos Sur.

Miguel, Maria Maribel B. (2009). Assessment of the small and medium enterprises in Abra, Unpublished Doctoral Dissertation, University of Northern Philippines, Vigan City.

Pilarta, Mae Amalia B. (2011). Status of public secondary schools in Abra, Unpublished Doctoral Dissertation, University of Northern Philippines, Vigan City.

Ragasa, Victoriano R. (1999). The effectiveness of beed curriculum to the preparedness of the beginning to teach the learning area of nesc, Unpublished Docotral Dissertation, University of Northern Philippines, Vigan City, Ilocos Sur.

Visco, Dionisio A. (2013). Determinants of licensure examination for teachers (let) performance of higher education institution in Abra, Unpublished Doctoral Dissertation, University of Northern Philippines, Vigan City, Ilocos Sur.

Electronic

http:www.sociologyguide.com/education

http:/www.ite.educ.sg/pv

http://www1.up.edu.ph/up-gears-up-for-the-impact-of-the-k-12-curriculum-and-asean-economic-cooperation-2015/

(http://socyberty.com/education/role-of-education-in-economics-development)

(http://www.dilgxi.org/KPs?EconomicDevelopment/led.pdf

Supporting Program for Disadvantage Students to Increase the Successful Rate in Study in University

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ABSTRACT

The aim of this research is to find out the expected program to be conducted by university to encourage the confidence of the disadvantage students in Indonesia in order to increase the successful rate to finish their study in university. Disadvantage student in this research refers to the students from minority race, disability, lower socio-economiccondition.

There are two groups of respondent in this research. The first group is 30 lecturers who teach in several universities and the second group is six students from two areas in Indonesia; east and west. The lecturers are interviewed to find out their perspective and idea on how to develop and increase the success rate of disadvantage students in university and the students are interviewed about their feeling of being in disadvantage conditions and their responds upon the condition. Collected data are analyzed by collecting the answer and listing out the program based on priority. The expected program is divided into two programs. The first program isto open access for disadvantage students to enter university and the second program is to increase the success rate of disadvantage students to finish their study in university.

Keywords: Disadvantage students, program, successful rate

Introduction

Educationis generallyperceivedas abridge to abetter lifein the future, whichwillimprove thequality of life. Thus, access toeducationshould be opento everyonewithout exception. The beneficial contributions of education have been analyzed along the years from various points of view: productivity growth, income growth of educated persons, decreasing social discrepancies, reducing disparities between the levels of development among countries (Livia & Laura, 2009). Unfortunately, access tohigher educationis verylimitedparticularlyfor peoplewith disabilitiesin various fieldssuch aseconomics (Asplund, Adbelkarim, & Skalli, 2008); gender differences; ethnic groups(Livia & Laura, 2009)andso on.

In Indonesia, compulsory education for all citizens is given to primary and secondary education for 9 years. Furthermore, higher education is an optional education for everyone; therefore the access depends on economics condition and intellectual ability to entrance university.Despite embracing the ideology of Pancasila in which humanity and social justice are core principles, taking care of disadvantaged students is not yet mainstream in Indonesian society nor or tertiary education. Respondents acknowledged that someuniversities were structurally unprepared or unable to support the specific needs of disadvantaged students to ensure they can access tertiary education which will contribute to their quality of life. Many disadvantaged students are poor and include those who are from remote areas, are a part of a minority group, and/or have a mental or physical disability. Disadvantaged students find it difficult to enter university and are sometimes not supported to access tertiary studies. For instance, national selection to enter public universities in Indonesia is more likely to give indirect and direct benefits to rich students only. It can be seen from the announcement of admission and other related information is disseminated by mainstream media where the coverage limited in the urban area. Also the admission fee is quiet expensive for some disadvantage students cannot afford to submit.

Some scholarships do exist, offer by central and local government to fund the education of disadvantaged students. However most of these are linked to academic performance not poor socio-economic conditions. Without scholarships on the basis of socio-economic disadvantage there can be self-perpetuating cycle where poor students have to support themselves and work while they study so are unable to achieve the grades required to access scholarships and stop working. For those that are on scholarships there is a great deal of pressure to perform as funding may be terminated. There also appeared to be a lack access of information among students on these opportunities, particularly for a postgraduate education. It was also noted that there were many irregularities in the disbursement of payments which led to drop outs as they were unable to fund the gap. In more extreme cases some students did not receive the full amount of the committed scholarship value. Reasons included corruption, cuts or fees, tax, and debt such as unpaid university fees and library sanctions for unreturned books. At the same time disadvantaged students require more than financial support, especially those who often experience cultural shock, isolation, or physical barriers to participate in academic and student life. Disadvantage is complex as it cross cuts many issues such as academic performance, cultural integration, and comfort with technology. These challenges can overwhelm and diminish the motivation of disadvantaged students to stay in university. Compounding this is the fact that there is a low demand among university staff to participate in inclusive education trainings.

Equity in Education

Untilnow, it is still believedthataccess tohigher educationis limitedto people frommiddle and uppersocioeconomic class. Thoughveryclearstated by (Mazzarol & Soutar, 2001)thateducationfroman economic perspectiveisanopportunitytoimproveworkability, professionalism, andsocialstatus, thereforestudentswho have the opportunityto study in university willhavea greater opportunitytoearna highincome and better career. Unfortunately, people from lower economic class, who supposed to be the main target to be improved by education system; find difficulties to access higher education.Even though Indonesia has provided a wide range of scholarship schemes to help people from lower economic class but the dissemination of informationis done through the media that are not accessible to lower class communities. According to (Yang, 2006), the choice of media in purpose to disseminate information (specifically in learning process) is reflection of equality. This condition shows that even in dissemination information, the disadvantage students experience inequality.

The lack of assistance to the group from lower economic class is causing them increasingly difficult to access higher education. In addition, scholarships are usually awarded based on competency not socio-economic conditions. Thus, if a group of students from the lower economic classes must compete based on the competence of knowledge, and then they will find it hard to succeed, because they generally attend the basic education in remote areas where the quality of education is relatively lower compared to other regions in Indonesia. This condition affects difficulties to disadvantage people/student (lower socio-economic condition; remote areas; and particular ethnic) and it makes their condition worse. Supposedly, the indicators of success in basic education arethe ability of graduates to enter university (Asplund, Adbelkarim, & Skalli, 2008). Equityhas two basic meanings in the economic jargon: a horizontal and a vertical one. Thehorizontal one refers to the necessity of avoiding discrimination (in terms of gender, ethnic group or any other form) among individuals that are equal from a material point of view (they have identical results in economic terms). Vertical equity consists in reducing the economic differences among individuals. It is put into practice through the redistribution function of the state and implies the use of the public budget to redistribute income towards the underprivileged categories, either directly by transfer or by negative taxation or indirectly by providing free or subsidized goods or services (Livia & Laura, 2009).

Fortunately, in 2010 the Indonesian government launched a very good program with a noble purpose. The program is called "BidikMisi", which aims to provide services and facilities, as well as ensuring the quality education for every citizen without discrimination, and shall provide support community resources in education. To organize quality education requires considerable cost. Therefore, every student at the educational unit is entitled to tuition assistance for those who have good academic potential and economically disadvantaged and are entitled to scholarships for high achievers. This program helps the students as much as 20,000 in 2010 and is growing very rapidly to 30,000 in 2011 and to 42,000 in 2012 and increased to 61,000 in 2013, while for 2014; the government will provide assistance to the 60,000 prospective students (Santoso, 2014).

Research Framework

The paradigm of this research is qualitative, where all data were collected and analyzed qualitatively. Data collection conducted two times in west of Indonesia and east of Indonesia. Each area provided30 lecturers and 6 students as informants (respondents). They were selected from various universities where the choice university mixed between public and private university; small, medium and large university in term of numbers of the student body; rural and urban area. Lecturers were selected with this proportion: lecturer who also has role in management of university (i.e. dean, vice dean, head of department, research and publication director, academic director, etc.); lecturer who has direct responsibility in student development and lecturer who has responsibility merely in teaching process. These 30 lecturers divided into six groups. Each groups were also add 1 informant from group of students. Therefore, there are six groups; each group consists of six informants. Focus group discussion (FGD) was facilitated by one facilitator who gave the topic to be discussed among the groups member. One person assists the research process by recorded the discussion process and one who wrote the process. The research p wasconducted two times in west and east of Indonesia.

Supporting Program for Disadvantage Students

Data is gathered by interviewing respondents in focus group discussion model. A group formation model was used to proportionally determine the number of people in each group in order for the discussion to run effectively and for each participant to voice their opinion and listen to others'.Overall, the discussion was conducted in an interactive, casual, and relaxed mood without losing the essence of the discussion itself. Each group wasaskedthe same questionabout theways in which studentsfromdisadvantagegroupshavemore open accesstoentranceinto universityandhow toimprove thesuccess rateincompleting his educationat the university. From thediscussionsthere are somefindingsthat are groupedinthree parts, namelyincreasing accesstouniversities for disadvantage students; increasethe successratefor studentswhohave entereduniversity and the last is how to increase the success of the program.

As forimprovingaccess, the onlytwopoints presented, namely: (1). Universities shall adopt and implement socially inclusive policies and programs that encourage the acceptance and enrolment of disadvantaged students.

(2). Prepare for the admission and support of disabled students and promote their preparedness. Establish a division within each university to support disabled students and conduct needs assessments and planning for the creation of infrastructure and learning systems for them. Grant funds could be used to build infrastructure such as wheelchair ramps, or to recruit education assistants to shadow and support their learning.

There are several findings found from the discussion, such as: in general, the universities in which the participants worked and studied did not have students with disabilities. This was based on the fact that no disabled students applied in their universities, with the exclusion of two universities (respondents) which claimed that they had received applications from disabled students who unfortunately failed in the selection process. Nonetheless, all participants agreed to provide opportunity and support for disabled students in their respective institutions by creating a special enrollment selection process and assistance from senior students who can help the disabled students throughout their study time.The other finding is almost all universities received students with financial disadvantage but claimed that the opportunities for these students were widely open due to the scholarships offered by both the central and district governments. However, it is worth noticing that the scholarships, which covered both the academic and living expenses, were often mismanaged by the people in charge that they failed to, reach the targeted group. In general, awardees from low economic status possessed the required level of intelligence to undertake high education, because they had to pass a strict selection to receive the scholarships.

After students finally able to study in university there are several common reasons for their failure in finishing their study was their personality and character. Some of the success barriers for these students included low self-esteem, lack of courage, bad communication skills, and the pressure to upgrade their lifestyles. Therefore, several suggestions were given to improve the success rate for these students, including:(1). A sustainable tutoring or mentoring program. Dedicated lecturers or students who have the calling for the program will be selected as tutors or mentors. This program will beneficial for disadvantage students to ensure the success of disadvantaged students such as education assistants as an appropriate learning support systems, student mentoring, soft skills development, self-help and empowerment programs to become independent, study to work programs as well as education materials adapted to their needs. Student organizations and bodies could also be called upon to be active in supporting those that are disadvantaged. (2). A matriculation program for new students. Materials for the program will be taken from skill standardization related to the chosen study program as well as personality development and life skills materials.Providing matriculation and bridging classes for those disadvantaged students that may have learning difficulties or are falling behind to ensure retention and support those that perform well to participate in internal and external academic competitions, as well as student exchange programs. (3). Soft skills centers. These centers will help develop additional skills such as personality and character development, leadership, entrepreneurship tutorial, communication skills, writing and problem-solving and many more. (4). Students roles improvement. Students must be encouraged to play more roles, both on and off the classroom, by holding a joint-research or joining student organizations, internship, competitions, and others. For this purpose, the program have to make the commitment to disburse scholarship payments covering academic and living expenses on-time and have zero-tolerance for corruption in the administration of these funds. It is also important to create financial incentives for disadvantaged students to support their studies and success. For instance, assist disadvantaged students with a scholarship to complete their thesis research or provide free student accommodation. A monitoring mechanism should also be designed to ensure that incentives are received by the right parties and used appropriately. (5). an integrated curriculum. It is essential that the curriculum allows the students to have an improved knowledge of the program they choose and a good personality and character to go with their skills. For the group of disabled students, it needs to develop curriculum accessible and appropriate for the learning needs of disabled students. This should adhere to international guidelines and cater for disabilities such as blindness, deafness and so on. Care should also be taken to develop special learning materials for the disabled, especially for the blind and deaf. The last but not least is (6). To develop a management and evaluation system to track the progress of disadvantaged students (particularly those on scholarships) by classifying their needs, setting indicators of performance and monitoring the implementation of the inclusive education policy as it relates to their individual circumstance

Respondents from the group of disadvantage students were basically aware of the need for activities that will stimulate their creative minds. They also realized that they needed a broader knowledge of places outside their area in order to understand the others way of life. To achieve this, they may be required to leave their residence and conduct student/lecturer exchange and or trips to other places to broaden their perspective. In other side, respondents from the group of lecturer said they need to receive special programs such as workshops, trainings and mentoring. It is hoped that these programs will increase the lecturers' creativity and teaching ability, which will eventually affect students' ability to understand and learn. Therefore, some recommended program propose as follows: (1). Provide special needs training for university staff how to treat disabled students appropriately and ensure a learning environment conducive to the success of disabled students. This may be supported by arranging staff to visit universities with good systems in place for the disabled and encouraged with the institution of incentives for lecturers who can fully' assist disable students. (2). Follow the best practice set by disability-friendly universities domestically and internationally as well as facilitate wherever possible the visit of staff and student leaders to these institutions to learn more from their example. Additionally universities could facilitate workshops to be held with visiting national and international leaders in the provision of education to the disabled to share lessons learned. (3). Initiate campaigns that would reduce the stigma towards disabled people and facilitate interaction between disabled students and the wider student community by setting up a mentorship program. This could also be supported by field trips to leave the student residence and national or international exchange programs. Socialization should also extend beyond the campus to include local government and businesses to ease graduate transition from study to work. (4). Monitor the performance of disabled students rigorously, adapted with external environment changing and celebrates their achievements.

The other important finding from this group discussion is the fact that limitation in information and communication technology devices in campus environment. It is also an important aspect to consider. Life trend in general and campus life trend in particular require a good access to information technology. As a result, infrastructure provision, particularly information technology devices (hardware, software, and networking), is essential to achieve success in teaching, research, and students success rate increase for every university.

Conclusion

This study concluded the need to widely open the access for disadvantage students to enter the university. This study also concludes six programs that are considered important to improve the success rate ofdisadvantage students to finish their study at the university. They are: provide mentoring program; conduct matriculation, establish soft skills center, increase the role of disadvantage student, develop an integrated curriculum and develop monitoring and evaluation systems to ensure the successful of disadvantagestudent.

BIBLIOGRAPHY

Asplund, R., Adbelkarim, O. B., & Skalli, A. (2008). An Equity Perspective on Access to, Enrolment in and Finance of Tertiary Education. Education Economics, 261-274.

Livia, B., & Laura, A. (2009). Compulsory Education In Romania Between Equity and Efficiency. Rumania: Economic Science Series.

Mazzarol , T., & Soutar, G. N. (2001). The Global Market for Higher Education: Sustainable Competitive Strategies for The New Millennium. Northampton: Edward Elgar Publishing Limited.

Santoso, D. (2014). Pedoman Penyelenggaraan Bidik Misi Tahun 2014. Jakarta: Direktorat Jenderal Pendidikan Tinggi Kementerian Pendidikan dan Kebudayaan.

Yang, J. F. (2006). The Discussion of Media Selection and Accessible Equity in Distance Education. The Journal of American Academy of Business, 126-130.

The Development of Effectuation-Based Entrepreneurship Learning Model to Increase the Ability of University Students in Running a Business

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ABSTRACT

This study aims to develop an entrepreneurship-based learning model using effectuation approach to improve student's entrepreneurial skill in running a business through the following phases: (1) exploration of entrepreneurial learning model to find the philosophical basis and study fields in entrepreneurship science (2) discovery of the appropriate entrepreneurship learning model for new entrepreneurs by creating innovative and creative design in running a business (3) application of model by limited trial learning model and large-scaledtrials. The research method used is qualitative study with the addition of: (1) documentation study, qualitative depth interviews, and focus group discussions to obtain data, and (2) Miles and Huberman model to analyze qualitative data. This research will use a limited trial on one class consisting of 40 students during one year to measure their ability to run a business before studying entrepreneurial learning effectuation model. This will then be compared to the students' ability to run a business after applying an effectuation-based approach model.

Key Words: Entrepreneurship Learning; Effectuation Model; Development Model of Entrepreneurship Learning

Introduction

As a country, Indonesia is in dire need of new entrepreneurs. Since entrepreneurs will first create jobs for themselves before employing others, entrepreneurship is seen as the solution for economic issues such as unemployment and poverty. Eventually, as their work become known and accepted by the regional and international community, entrepreneurs will also provide added values for their country in the form of foreign exchange earnings. In short, an entrepreneur's role is crucial and beneficial for the society.

David McCelland's research as cited by Kao (1995) indicates that a developed nation owns nothing less than 2% entrepreneurs. This research supports the sentiment that the growth of entrepreneurship plays a significant role as one of the causative factors that aids economic development. The fact shows that entrepreneurship spirit turned Singapore, Japan, Taiwan, South Korea and China into developed countries as we know them. The entrepreneurs in these countries hold a crucial role in accelerating the economic development of their countries. The more entrepreneurs a country has, the faster the country's economy will be developed.

McCelland's research initiates an in-depth study about whether an entrepreneur is born or created.

Jose Carlos Jarillo-Mossi in Harefa (2009) defined entrepreneurs as people who are able to spot an opportunity, chase opportunities that are compatible with them, and believe that success is attainable. One similarity found in successful entrepreneurs is the presence of the spirit of excellence. These people always expect the best from what they work on.

They are not easily satisfied with their achievements, but tend to challenge themselves to do better, make more impact, be more distinguished, and create something more beneficial for the society. An entrepreneur always turns obstacles into opportunity and never gives up on their dreams.

One of the successful examples of Indonesian entrepreneurs is Ciputra. His contribution to the country's economic development is already known by many. Forbes magazine even recorded his name as one of the ten most successful Indonesian businessmen. Some of his monumental works are based on his idea of changing something that seemed impossible or never occured to others into prestigious projects, such as the construction of Pasar Senen and Taman Impian Jaya Ancol. In Surabaya, he managed to transform a desolate area known as Laka Santri into Citraland, an elite housing complex known for the slogan "Citraland, The Singapore of Surabaya."

The question is how we can create more entrepreneurs like him. The idea is to create more entrepreneurs in Indonesia to encourage economic development process. This motivates people to spread entrepreneurship spirit, especially for the younger generation. The problem at the moment is the challenge to answer the important questions, such as the way to encourage the development of entrepreneurship spirit in a country still embroiled in feudalism principles or the best strategy to make young people interested in becoming entrepreneurs instead of attending career day exhibitions to find job in both government and private companies.

A research conducted by Sulasmi (1989) on 22 business families who have parents, husband, or relatives as businessmen indicated that Bakrie, Kalla and Aksa families are the famous examples of families with strong business culture. It is easy to find great entrepreneurs among these families. The research shows that an entrepreneur is born from an entrepreneur family.

Another research conducted by Mu'minah (2001) on the 8 most successful businessmen in Pangandaran showed that all businessmen began their businesses out of necessity. This research shows that people become entrepreneurs not because they are born to be ones but because of the state of their economic condition.

A research done by Muhandri (2002) enforces the idea that emotional modalities are needed to be an entrepreneur. It means that a businessman should have a higher educational degree. In this category, there were several businessmen who directly started their businesses and felt that their level of knowledge alone was enough for them to succeed in opposed to other businessmen who chose to work in their field of business in order to have an in-depth understanding before becoming entrepreneurs

From these research studies we can conclude that entrepreneurs can be created by environment, condition, and also education. The recent phenomena suggests than many family business in Indonesia find it hard to sustain their business and pass it on to the next generations. The business that is initially created by parents as the first generation is generally successful and well-developed. However, the next generation which is equipped with better academic titles and higher knowledge tend to fail and experience bankruptcy. Kodrat (2008) proved that from the current family businesses: 3% were established between 1932 and 1943; 2% between 1944 and 1955; 10% between 1956 and 1967; 24% between 1968 and 1979; 24% between 1980 and 1991; and 37% between 1992 and 2005. It proves that the quality of education and entrepreneurship learning has not been able to create entrepreneurs. Therefore, further research is needed to determine how to form an entrepreneur by design in order to run a sustainable business.

Ciputra established Ciputra University in Surabaya with a slogan of 'Creating World-Class Entrepreneurs', because he had a passion to create young Indonesian entrepreneurs who will bring benefits to themselves, their families, the society, and Indonesia. It is hoped that these young entrepreneurs can be the driving force to a better economical condition. The students of Ciputra University are not only encouraged to start a new business, but are also prepared to take over their parents' business. The right entrepreneurship learning model will highly influence the quality of the graduates' ability to run a business.

Along with the development of technology and knowledge, entrepreneurship learning model also continuously advances. The current traditional entrepreneurship learning model in Indonesia is slowly replaced by new models and more relevant approaches. Since the study concentration in Ciputra University is entrepreneurship, there is a need to develop the current learning method into an effectuation-based learning method. It is hoped that this method will be more appropriate in shaping young entrepreneurs (entrepreneur by design) into innovative, creative, and competent individuals.

Research Objectives

The specific objectives of this research are to:

1. Find a philosophical basis of entrepreneurship science so that it will have a solid scientific foundation; and
2. Determine the study fields in entrepreneurship to produce an innovative and creative entrepreneur by design

Research Benefits

There have been numerous people who are involved in entrepreneurial activities or taken up careers as young entrepreneurs in micro to medium businesses at the moment. Additionaly, many young people are being prepared to take over their parents' business. It is important that we can equip them with knowledge and experience to help their personal and business developments in order to bring benefits to themselves, their community, and Indonesia.

Drucker (2005) came to a conclusion as to why businesses crumbled. He believed that it was because business theories collapsed due to irrelevant assumptions. He said, *"The assumptions on which the organization has been built and is being run no longer fit reality."*

Entrepreneurship science is often linked to the management theory made by Stoner (2009) who made a management theory definition as such:

"Management is a process of planning, organizing, actuating, and supervision of the organizational members' efforts and other organizational resources to achieve the organizational goal." Based on this statement, it can be concluded that management is basically a man-to-man cooperation to determine, interpret, and achieve organizational goals with the help of planning, organizaing, actuating, and controlling fuctions. Unfortunately, there has not been any management theory that can be implemented in all situations. In other words, the development of economics and management science cannot compete with the rapid development in the world of work and entrepreneurship.

The best way to produce new entrepreneurs is through education (Kodrat, 2011). An appropriate learning method and entrepreneurship model development will produce tough entrepreneurs who can minimize the risk of failure and develop their business.

Theoretical Framework

This research emphasizes on basic aspects ideas that:

1. Entrepreneurship is a taught science that can be taught through education process

2. Entrepreneurship talents can be developed by anyone who has the right learning methods, training programs, and the appropriate entrepreneurship model development.

The importance of a condusive environment and practice to develop the potential of an entrepreneur and young talents encouraged Ciputra to establish Ciputra University in Surabaya with a slogan of '*Creating World-Class Entrepreneurs*', as suggested by his book, The Ciputra Way (2006). In his book entitled "The Best Practices To Become True Entrepreneurs" (2006), Ciputra realized that a condition must be created in order to encourage and increase the number of new entrepreneurs who will develop and bring pride to Indonesia in the future. Ciputra claims that he discovered his best entrepreneurial talents through a continuous learning process. He also emphasizes that people should be willing to learn. Ciputra never considers himself as a genius; and instead, a person who wants to learn. In other words, he suggests that even a talented person needs to learn more. A talented person will be better developed with the best resources and facilitators. Ciputra said, *"Even the most talented entrepreneurs are human beings. You do not have to be a genius in all fields to be a successful entrepreneur. You only need to be a genius in the field closest to your talent or life choices, and in order to do that, you need to keep learning."* This statement has answered the question that has been a debatable topic in the business world, "Is formal education necessary for an entrepreneur?" Kodrat (2011) adds that the best way to produce new entrepreneurs is education. Educational process has a significant influence on the success of an entrepreneur.

The Importance of Education In the Success of An Entrepreneur

History tells us that economics science has failed to mark the difference between a business owner and an entrepreneur. An entrepreneur is generally considered as someone who socially, psychologically, and financially starts a small business, or equal to a management (Hisrich and Peters, 1992 in Morries, 1998).

In closer inspection, a business owner is created by parents' inheritance. In other words, the business is conducted by copying a successful business or running a franchise system. In such condition, the business owner does not start with vision and mission, innovative actions, or big risks.

Ciputra (2009) said that, *"They can be called businessmen but not entrepreneurs."* He also suggests that an entrepreneur is an innovative person who can bring his creative ideas to life. Some of the characteristics of an entrepreneur are:

1. Persistence. Obstacles and problems will only encourage an entrepreneur to overcome them.
2. Courage. The ability to try something new or revolutionize a change that will open a supply channel for certain goods or services.
3. Vision. The ability to see a business prospect that others cannot see or imagine and create something new.
4. Innovation. Changing a less pleasant situation into a desirable one.
5. Risk Taking. The ability to take financial risk (loss) and/or mental risk (failure) is part of an entrepreneur's requirement to learn from everything.

Ciputra said that, *"An entrepreneur's passion to learn should not be restricted to learning, but also having a vision for the future and doing concrete actions. He or she must have unlimited enthusiasm and ideas that others may struggle to understand."*

At the moment, the role of schools and universities in forming entrepreneurial characters remains questionable. It even suggests that since formal education does not teach business, being an entrepreneur does not require formal education. In other words, business experience and learning process can be obtained without formal education. Unfortunately, this leads to an extreme interpretation of education. It suggests that in order to become an entrepreneur, one does not require formal education. Therefore, formal education as a fundamental study environment is no longer essential.

The story of Scott Smigler in Entrepreneur magazine (2005) is a good example of the importance of education for an entrepreneur. Scott was a 22-year-old US student who managed to establish a business that generated over 2,4 billion Rupiah a year without leaving college. After graduating from high school, Scott established Exclusive Concepts Inc, a company which provided a professional web design service and online marketing solutions for up-and-coming companies. He started at his parents' house and received wider acknowledgment through word of mouth due to his reputation as a professional and competent service provider. Since then, he has opened an office in Burlington, Massachussets. With the help of five staffs, he managed to acquire US$3000 turnover in 2003. While managing his business, Scott also undertook a study in Finance in Bentley College, Waltham. He graduated with a GPA of 3,7 and established an Entrepreneurship Society in the school. Every week, he put aside tens of hours of his time to assure entrepreneurs of all age groups of the importance of education to the success of an entrepreneur. Smigler said, *"The business environment changes swiftly. Education is a very important factor for success. It is not true that gaining more knowledge through education is a waste of time. Instead, it 'recharges your battery'. In the long term, you will reap the benefit of education."*

The Development of Entrepreneurship Science

The definition of entrepreneurship created by economics experts stresses on risk taking, capital provision, decision making (arbitrage), and production factors processing (Morris, 1998).

Economics also emphasizes on relevant decisions on resources allocation which lead to economical results such as company performance, industry, and the country. In general, economics experts have no real interest in a more personal entrepreneurship definition or the specific personal characteristics that it carries (Schumpeter, 1934 and Casson, 1982). In principles, economics only studies humans behaviour in fulfilling their needs through the concept of exchange.

Based on this concept, the discussion focus of entrepreneurship has shifted to innovation and a unique combination of resources to create new goods, services, processes, organizational structures, supply channels, and new markets. In other words, entrepreneurs have continuously performed the 'creative destruction' process that the current methods and products have become irrelevant. By broadening the Schumpeterian perspective, entrepreneurship can be identified as an agent of change in the community (Tropman dan Morningstar, 1989).

Due to the limitation in economics in understanding entrepreneurship, a multi-paradigm approach is used. Entrepreneurship is studied using three different approaches including entrepreneurial personality approach, entrepreneurial process approach, and sociological approach.

These three models are significantly different from the current model. The current entrepreneurship material emphasizes on the discussion of organizational functions, such as marketing, finance, production, and operational. As as result, if this material is given to students from all majors, it will feel like a burden for students who do not come from Economics/Business majors and at the same time boring for those who belong to the two majors. Therefore, new methods and materials are required for entrepreneurship education.

Effectuation Approach

The 5 principles of effectuation approach are:

a. *Bird in hand principle*
   This principle suggests that an entrepreneur must have the courage to start a new business by considering what he has and knows, as well as who he knows. In other words, knowing what you have at present.
b. *Affordable lost principle*
   An entrepreneur will always need to take risks, therefore, he needs to know which risks are affordable.
c. Lemonade principle
   An entrepreneur must always be ready to face the unexpected.
d. *Crazy quilt principle*
   An entrepreneur must be able to use his creativity and innovative ability to create something acceptable for consumers.
e. *Pilot in the plane*
   An entrepreneur must be able to estimate future situations and anticipate them in order to reduce loss.

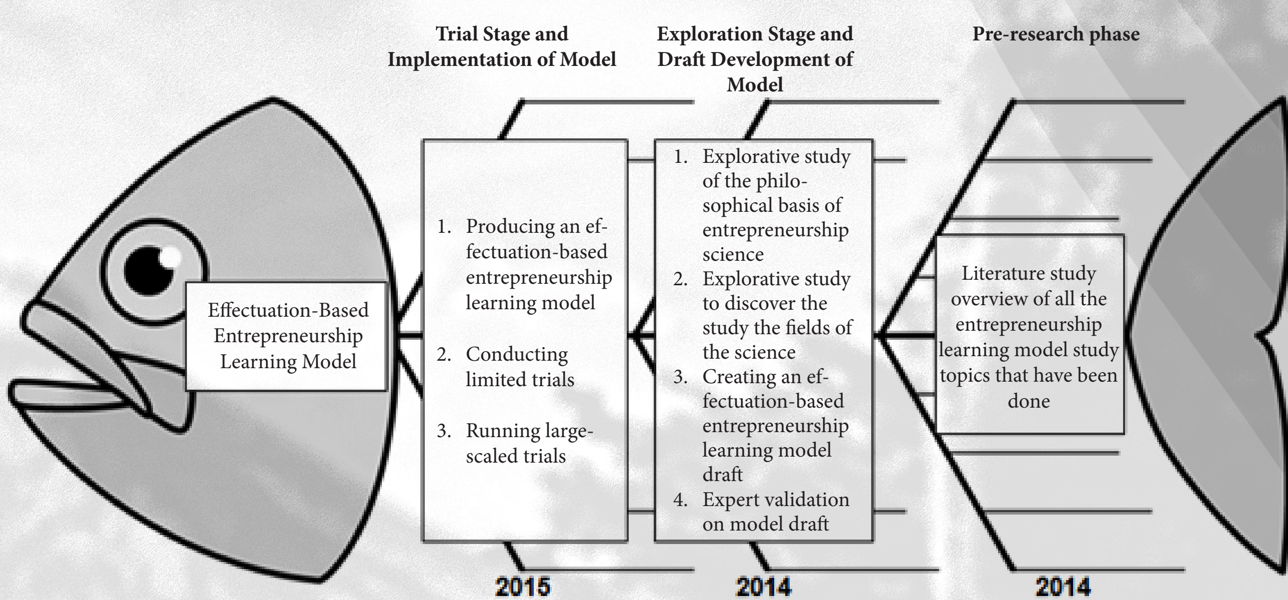
Research Methods

The research method used in this study is qualitative method with the addition of: (1) Documentation Study, Qualitative Depth Interview, and Focus Group Discussion to obtain data, and (2) Miles and Huberman Model to analyze the qualitative data.

Data Analysis And Discussions

The research method used in the first year is qualitative method with the addition of: (1) Documentation Study, Qualitative Depth Interview, and Focus Group Discussion to obtain data, and (2) Miles and Huberman Model to analyze the qualitative data.

Development of Effectuation-Based Entrepreneurship Learning Model to Increase



Picture 1 Development Model of Learning Model
Source : Authors' Processed Data (2014)

University Student's Ability to Run a Business

The expected result of this research is an explorative study of previous studies which discuss the philosophical basis of entrepreneurship science, as well as the entrepreneurship learning model that is currently used in various universities. The results of the *qualitative depth interview* and *focus group discussion* will help form a more appropriate entrepreneurship learning model draft that will increase one's ability to run a business as approved by experts.

One of the findings in the documentation study suggests that entrepreneurship education is the most appropriate way to produce new entrepreneurs (Kodrat 2011). According to Ciputra (2009), the right learning model and entrepreneurship model development will produce solid entrepreneurs who can reduce failure risk and support their business developments. Entreprenurship can be taught through education. In fact, entrepreneurship talents can also be taught through education. Drucker (2005) found that less precise approach in entrepreneurship teaching often happened with some still using economic science or management theory approaches. Because of this, most university graduates are portrayed as lacking in big vision and toughness. Businesses crumble because the current assumptions are no longer adequate (Drucker, 2005). Schumpeter (1934) and Carson (1982) reinforced the idea that economics and management theory are not suitable for entrepreneurship teaching. A new model tailored to personal characteristics is needed to develop the characters of an entrepreneur. Entrepreneurship has become an innovation and creativity learning model which is uniquely combined with entrepreneur character development. Schumpeterian perspective implementation can be identified as an agent of change in the community (Tropman and Morningstar, 1989).

Some of the key findings in the expert depth interview and focus group discussion describe entrepreneurship teaching and character development as absolute requirements for the 21st century, especially in terms of increasing the welfare of a country as well as individual welfare level or per capita income.

Entreprneurship is the most empowering, most democratic, and most freedom-creating phenomenon in the history of the human race. The world is currently entering the entrepreneurialage phase. Entrepreneurship teaching and approach sytem differ from one country or university to another. Some of the current learning models are:

(1) *Business Basic; the mechanics of starting a venture, and borrowed content,*

(2) *Entrepreneurship as a distinct discipline with district content, and*

(3) *Entrepreneurship as a way of thinking and acting.*

Entrepreneurship cannot be effectively taught in one semester. Ideally, it takes at least 3 years (diploma study) to teach entrepreneurial concepts. The best way to do it is by having a balanced combination of theory and practice. The current entrepreneurship learning in many universities focuses solely on *Business Basic* which emphasizes only on business set-up, including selling, hiring staffs, forming enterprises, formulating strategies, analyzing market, and franchising.

Universities which teach entrepreneurship models in more than one semester have gone as far as *Entrepreneurship Basic*, which has broader emphasis such as entrepreneurship concept and definition, entrepreneurial process, entrepreneurship characteristics, the nature of opportunity, entrepreneurship and society, seed and venture capital, and exit strategies.

A more advanced entrepreneurship learning model which is considered equal to Graduate or Post-Graduate study level emphasizes on Entrepreneurial Thinking and Acting phase. This model consists of opportunity alertness, risk intigation, resources leveraging, vision conveying, innovation, passion, persistence and tenacity, creative problem solving, guerrilla behavior optimism, failure-based learning, change implementation, adaptation, and resilience. These basic abilities enable students to possess a combination of entrepreneurial skills and characteristics.

A good entrepreneurship learning pattern forms an entrepreneurial mindset which consists of a combination of attitude and professionalism in life. Learning methods with causal approach is good for businesses in mature phase. At this stage, the approach and development can be combined with management techniques. Normally, at this stage, the company size is big, with numerous workers and operational standards. The business is not based on opportunity creation, but trend and market needs. On the other hand, effectuation approach will be more useful for start-up phase in which an entrepreneur learns how to innovate and be creative with the available resources. Entrepreneurs who successfully adopt the effectuation process will be more flexible in processing and developing micro-scaled business.

Entrepreneurship teaching model development using effectuation approach maximizes the potential of an entrepreneur, especially in terms of empowerment and transformation. According to the World Bank, empowerment is "the process of increasing the capacity of individuals or groups to make choices and to transform those choices into desirable actions and incomes."

Empowerment and trasnformation highly influence an entrepreneur's ability to start a new business or develop a family business. Some empowerment implementations include creating our own jon to create our own future, creating our own wealth, creating a sense of pride and self-worth, creating our identity, creating our own facilities and operations, creating jobs for others, and contributing to the world.

The implementation result of entreprenur transformation can transform oneself, families, markets, business practices, communities, and economics.

Conclusions and Suggestions

The conclusions of this research, which studies entrepreneurship learning model in university level, suggest that:

1. Entrepreneurship is a science that can be taught using education process
2. Entrepreneurial talents can be developed by anyone with proper learning methods, training programs, and entrepreneurship development models

Suggestions

1. Since entrepreneurship is a taught science, a systematic study is needed to conduct entrepreneurship teaching in university level
2. A proper development of entrepreneurship training model will help produce excellent entrepreneurs.

REFERENCES

Brandt, S.C. 1986. Entrepreneur in Established Companies. Homewood, H: Irwin.Carsrud, Alan L. dan Malin Brannback. 2009. Understanding the Entrepreneurial Mind. USA: Springer.

Casson, M. 1982. The Entrepreneur – An Economic Theory. Oxford: Martin Robertson.

Chell, Elizabeth. 2008. The Entrepreneurial Personality: A Social Construction, 2nd. New York: Routledge.

Covin, J.G dan Slevin, D.P. 1989. Strategic Management of Small Firms in Hostile and BenignEnvironments, Strategic Management Journal, 10 (January): 75 – 87.

Ciputra.2006. The Best Practices To Become True Entrepreneurs. Jakarta: Elex Media Komputindo

Drucker, Peter E. 2005. Managing for the Future. New York: Harper and Row

Gartner, W.B. 1990. What Are We Talking About When We Talk About Entrepreneurship? Journal of Business Venturing 5: 15 – 28.

Harefa, Andreas. 2009. The Ciputra Way. Jakarta : Elex Media Komputiondo

Hornaday, J.A dan Aboud, J. 1971. Characteristics of Successful Entrepreneurs, Personal Psychology, 24: 141 – 153

Jeffry A. dan Stephen Spinelli. 2004. New Venture Creation:Entrepreneurship for the 21stCentury. 6th edition. New York: The McGrow Hill Companies, Inc.

Kao, JJ. 1989. Entrepreneurship, Creativity and Organization. Englewood Cliffs, N.J: Prentice-Hall.Kirzner, I.M. 1982. Uncertainty, discovery and human action: a study of the entrepreneurial profile in the Misean system in I.M. Kirzner (Ed) Method, Process and Astrian Economics: Essays in Honour of Ludwig von Mises, Lexington, MA: DC Heath.

Raymond W.Y. Kao, Entrepreneurship- A Wealth Creation and Value Adding Process, Prentice Hall, 1995

Kodrat, David Sukardi, 2011. Strategies To Increase the Number of Micro, Small, and Medium (SME) Businesses Through Entrepreneurship Education Ahead of 2010 (Best Paper). Proceeding SNKIB I, Jakarta: Universitas Tarumanagara.

Kuncoro, Mudrajad . 2009. Research Methods for Business and Marketing. Jakarta : Penerbit Erlangga

Landes, David 1999. The Wealth and Poverty of Nations: Why Some Are So Rich And Some SoPoor. New York: W.W. Norton.

Miller, D. 1983, The Correlates of Entrepreneurship in Three Types of Firms, Management Science, 29 (July): 770 – 791.

Mischel, M. 1968. Personality and Assessment. New York: Wiley.

Morris, Michael, H. 1998, Entrepreneurial Intensity: Sustainable Advantages for Individuals, Organisazations, and Societies. Londoh: Quorum Books

Morris, M.H dan Sexton, D.L. 1996. The Concept of Entrepreneurial Intensity: Implications for Company Performance, Journal of Business Research, 36 (1): 5 – 14.

Pietra Sarosa, Becoming Young Entrepreneur, Jakarta: Elex Media Komputindo, 2005

Pinchot, G. 1985. Intrapreneuring. New York: Harper & Row.

Schumpeter, Joseph A. 1942. Capitalism, Socialism and Democracy. New York: Harper

Integrated Student Support Services in a Seamless Academic Community in the Higher Education Institutions

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ABSTRACT

The major objective of the study is to create an "Integrated Student Support Services Model" for higher education institutions (HEIs). Status of Student Support Services (SSS) delivery alongside instruction, extent of implementation, current strengths and weaknesses, problems encountered in the provision of SSS by selected HEIs were studied. The study is a descriptive – mixed method investigation on the 14 components of SSS as per Commission on Higher Education (CHED) – CHED Memorandum Order (CMO) 21, 2006 among the selected HEIs.

Findings: CHED prescribed components of SSS were implemented to moderate extent but fully functional. Strengths are co-curricular activities, scholarship & financial assistance and HEIs undergoing accreditation. Weaknesses are on provision for international student, student housing and students with special needs. Problems encountered by HEIs are; inclination of school administrators, SSS components not integrated, there is rivalry between instruction and SSS units on student's availability. Thus, the need for an SSS model to enhance delivery among Albay HEIs.

Conclusions: Student Support Services Professionals as educators are aware of functional provisions that needs further enhancement. SSS programs as component of holistic student development not given equal priority versus academic instructions. Three of the 14 mandated components of SSS that directly related to enrolment campaign are given priority in resource allocation. There is a need to adopt an integrated student support services model in a seamless academic community of learners among HEIs.

Recommendation: School administrators to support and adopt an Integrated SSS Model interfacing with instruction through policy formulation, planning and program implementation of SSS in a "seamless academic community among HEIs".

The Research Problem

Institutions of Higher Education (HEIs) today are facing exceptional challenges dealing with the millennial generation of students, on the steadily increasing cost of education while available fund for re-investment is decreasing and competition. Universities must find ways to retain currently enrolled students while attracting new ones especially in the private institutions (Nejati and Nejati, 2009). With the predicament that administrators and students of the present generation are facing that this research on the model of provision of the student support services (SSS) of HEIs was conceptualized. Specifically, this study provided answers to the following questions:

1. What is the status of the provision of Student Support Services in terms of its practices along; 1) Admission, 2) Information and orientation services, 3) Scholarships and financial assistance, 4) Health Services, 5) Guidance and counseling services, 6) Food services, 7) Career and placement services, 8) Safety and security services, 9) Student discipline, 10) Student housing services, 11) Services for students with special needs, 12) International students services, 13) Co-curricular programs &activities, 14) Research and Evaluation?
2. What is the extent of the implementation of the practices along the fourteen (14) components of student support services program of the identified HEIs, as stipulated in the CHED Guidelines on student services delivery.
3. What are the strength and weaknesses in the delivery of the twelve (14) components of student support services program of the identified HEIs, as stipulated in the CHED Guidelines on student services delivery.
4. What enhancement may be proposed by the study?

The Theoretical Background

Human resources is the ultimate basis of wealth of a nation, thus molding the youth holistically is the main theme of the human capital theory which rest on the assumption that formal education is very inevitable in the country's productivity - "educated population is a productive population". In America schools operate under the philosophy that education is more than just attending classes within the four corners of the classroom, it is also about the experience of independence and leadership in a complex society. This is supported by student development theory and the psycho-social and identity development theory.

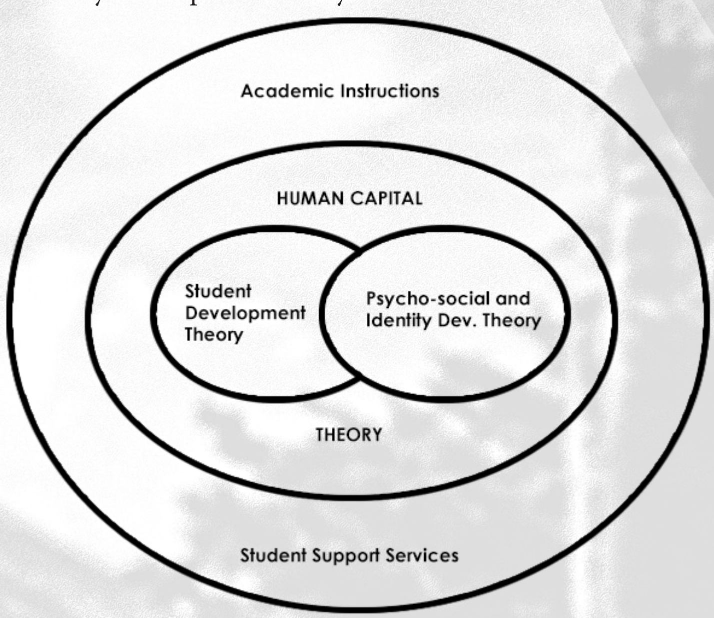

Figure 1. **Theoretical Framework Model**

The Research Process

Researches about human life form, human activities and human aspirations are increasingly becoming complex making them impossible to be answered by one method or approach alone, that the mixed method research was used. Both qualitative and quantitative research techniques, methods, approaches, concepts or lingo were used all together into a logical and practical alternative manner.

For this study, four HEIs in the province of Albay were purposively selected as locale of the study. Key informants, participants and respondents responses formed part of the data for this research. Data gathered were evaluated against CHED CMO No. 21, series of 2006 on the provision of SSS and the expectations of the students and service staff, especially on areas of the 14 component contained in the CHED CMO.

There are variety of research instruments used, these are: The questionnaire - established the status and extent of the implementation of SSS, the strength, weakness and problems encountered by HEIs. The self made questionnaire was patterned from PAASCU instrument upon approval by the Executive Director. The status and extent of implementation of the provisions of SSS were measured in a Likert rating scale of 1 to 4 where 4 is excellent which means that the provision is effectively and extensively implemented and fully functional. 3 is when the provisions are implemented to moderate extent and 2 when implemented to limited extent only, while rating of 1 when provisions are not implemented at all and not functioning, 0 is also provided should the respondent believe that the provision is not applicable in their institution. Functional means that the provision satisfies the minimum required standards by the CMO and serving the student according to the HEIs' purpose.

The interview guide and the FGD guides were developed composed of four main tasks; 1) participants to react on the overall rating provided by Albay HEIs. 2) evaluate the ratings of individual components. 3) evaluate the strengths and weakness in the delivery of SSS program in Albay. 4) then, participants were given chance to propose a model of student support services that can enhance the delivery of the SSS to the students.

The researcher personally visited the school administrators with a letter requesting approval and assistance in the conduct of the study. The questionnaires were personally administered to SSS officers/staff who qualified in the inclusion criteria. After retrieval of questionnaires, data were subjected to statistical analysis. After the data were analyzed, the two identified key informants (KI) were interviewed (both worked as director of student affairs for more than five year and are officers of PAASA – Bicol). In between interviews, FGDs where conducted in each HEI with SSS coordinators and student leaders as participants.

Analysis of the qualitative data is done as data are collected; the data were continually refined and re-organized in the light of emerging results. Right after the conduct of every activity such as, interviews and FGDs, data were coded and summarized using thematic notes for the purpose of considering details like the content and emerging themes. The quantitative data on the other hand, responses of SSS professionals in the survey questionnaire were analyzed using the Microsoft Excel Program.

The Status of the Provision of Student Support Services among Selected HEIs in Albay

Student support services includes prevention, intervention, transition and follow-up services for students and even their families, to ensure holistic development of the student through the 14 component of SSS as per CHED CEMO 21 of 2006. Table 1 shows the overall mean of the 14 components of student services among the selected respondent HEIs in Albay.

Table 1. **The Provision of Student Support Services among HEIs in the Province of Albay**

Component of Students Support Services (CHED CMO #21 series of 2000)	HEI-A	HEI-B	HEI-C	HEI-D	Mean	Interpretation
Admission Services	3.24	3.64	3.55	3.55	3.49	Good
Information and Orientation Services	3.17	3.27	3.25	3.42	3.28	Good
Scholarships and Financial Assistance	3.57	3.30	3.60	3.74	3.55	Excellent
Health Services	3.55	3.43	3.15	3.26	3.35	Good
Guidance and Counseling Services	3.35	3.46	3.58	3.44	3.46	Good
Food services	3.30	2.68	2.60	2.79	2.84	Good
Career and placement services	3.01	3.51	2.75	2.40	2.92	Good
Safety and security services	3.41	2.92	3.05	3.16	3.14	Good
Student discipline	3.55	3.34	3.15	2.60	3.16	Good
Student housing services	3.04	2.55	2.60	0.80	2.24	Fair
Services for students with special needs	2.17	2.86	2.10	0.00	1.78	Fair
International student services	2.21	2.57	1.58	0.00	1.59	Fair
Co-curricular programs and activities	3.62	3.63	3.70	3.63	3.65	Excellent
Research and evaluation	2.81	3.14	3.35	3.16	3.12	Good
Overall Mean					**2.98**	**Good**

Legend: 4 – Excellent, 3 – Good, 2 – Fair, 1 – Poor, 0 – Does not apply

Among the respondent HEIs in Albay, the overall mean of the 14 components of student services as prescribed by CHED – CMO 21 of 2006 is 2.98 interpreted as "good" only - the status and extent of implementation of SSS on the overall is implemented to moderate extent though fully functional. The implication is that there are provisions that need to be enhanced or provided extensively in a manner that is responsive to the need of millennial students. Hardin's dissertation (2007) found out that both traditional and nontraditional student of a university marked student support services as important but the level of satisfaction is low due to its provisions that are implemented on moderate extent only.

Looking closely, the table revealed that there are two provisions that are excellently provided - the provisions are effectively and extensively implemented and are fully functional. The excellent components are: *Scholarship and financial assistance* with a mean of 3.55. Key informants were one in saying that this component is extensively provided by schools and that administrators use this provision as marketing strategy. KIs even disclose that most institutions provide assistance to encourage would be students to enroll offering them different loan program which was also noted during FGD; *Co-curricular program and activities* with a mean of 3.65. Co-curricular activities are directly supportive of the academic performance of student, directly supporting and interfacing with academic instruction, thus, one of the priority support services being provided by HEIs .

What pulls the overall rating of SSS are the three components that were rated 'Fair" only - provisions or conditions are implemented to limited extent only and functioning minimally. These are: *Housing Services,* "fair" only with a general weighted mean of 2.24. Interview revealed that only two HEIs have school-managed dormitory inside the campus, but the number of available rooms is far too small compared to the number of transient students. While one of the HEI respondents rated their HEI almost zero because they believe that due to the nature of their students this component is not applicable. *Services for Students with Special Needs* with an overall mean of 1.78 only. Statistics show that there are very few students with special needs and their presence does not merit special attention.

HEIs are aware of the law but respondents believe that very little attention is given yet due to above mentioned reason. *International Students Services* with a mean of 1.59, very little also is being done as it would be very costly for the institutions to provide specialized programs and facilities for them at the moment. Informants considered the fact that most of this foreign students did not come to Albay for a specialized course, they have relatives and family here as source of support mechanism for them in their coping up stage.

The Strengths and Weaknesses of the Delivery of Student Support Services of the Selected HEIs in Albay

In the Philippines, the commission en banc promulgates the Guidelines on Student Affairs and Service Program, known as the CHED – CMO 21 series of 2006. A written document – guideline to steer higher education institutions towards holistic development of their students can be obtained from. It is very revealing, that after 6 years of implementation of the CMO, among the selected HEIs got a mean of 2.98 only or "good". Dr. Koon (2011), Dean of Students, National University of Singapore, reported that in Southeast Asia, the process of embracing student life and development had started but the progress is very slow. This finding conforms to the result of this study.

Strengths of the Student Support Services Provision of Albay HEIs

Co-curricular Programs and Activities got a mean of 3.65, which according to the PAASCU evaluation standard, is excellent, meaning that the provisions and conditions are effectively implemented and functioning fully, is the number one strength among the selected HEIs in Albay, which based on experience KIs and FGD participants agrees. Scholarship and Financial Assistance being the next strength of SSS with a mean of 3.55, which is again excellent, is effectively implemented and fully functional. Informants strongly agree with the findings as schools maintain this to be a good promotion alstrategy in marketing for more enrollees in their programs.

Added to the two mentioned provisions that are considered as strengths is that fact that these participating HEIs are undergoing accreditation which can lead to enhancement of student services. Working for accreditation means evaluating their current student services program, identifying what needs improvement and improving the delivery of services and facilities according to the accrediting agency's standards.

Weaknesses in the Student Support Services Provision of Albay HEIs

On the weaknesses of student support services of the selected HEIs in Albay, there are three components identified, namely, International Student Services with a mean of 1.59, Student Housing Services with a mean of 2.24, and Services for Students with Special Needs with a mean of 1.78, all with 'fair' rating. Common reasons for this weakness are the number of students that would need these services which is statistically insignificant and the cost of hiring specialized professional and facilities for these services is costly which cost-benefit ratio does not profitably guarantee.

Very obvious weaknesses, as revealed during the FGD and interview, the student support services provision among participating HEIs in Albay are as follows: first the components are not integrated into one office and do not interface with academic instruction; second, the programs and activities are mostly traditional and responsive to minimum government agency mandate only; and third, there is no model of provision of the services on which the schools can pattern their structure and initiatives that shall insure quality delivery of services at all times with the goal of holistically developing the person of a student.

Problems Encountered by HEIs in the Implementation of Student Support Services

According to CHED-CMO 21 of 2006, the 14 SSS Components are equally important in the total or holistic development of students. But there are some problems that came out during the focus group discussion, interview with key informant and unstructured discussion with school administrators:

Political will and interest or inclinations of school administrator - Student leaders are dissatisfied in one point in time when their school president and the VP for Academics were one in their thrust that classroom instruction is the first priority in college formation that co-curricular and extra curricular activities are curtailed and viewed as an interruption to classroom instruction. Another participating HEI experienced the opposite, where their president before was so inclined into co-curricular activities and extra-curricular activities that classroom instruction was sacrificed. The key informants also shared almost the same experience sometime in their careers as student support services administrators. Cases like this can hamper balance in the formation of the student not only as future workers but also as future leaders.

No standard/model organizational structure for Student Support Services prescribed by regulating government agency was the next problem identified during the FGD and was confirmed by the KIs. Each academic institution structures their support services based on priorities and "desire" of the school administrator which is not long term. When new administrator come to replace the current, as in the case of sectarian schools, new direction and structure are introduced which would sacrifice continuity of the program and can defeat the purpose of student support services' intent as stipulated by CHED – CMO 21. Having no standard structure, the president is given free hand to organize this very important component of an HEI, based their personal desire. According to KIs, PAASA – Bicol tried resolving this by coming up with a model but there are challenges and oppositions, until now the model is still a plan, and they are not aware if this move has been continued by their successors.

Components of student support services functions independently with each other and each belonging to different departments in the organization is another problem identified. These results to unorganized, inconsistent and not cohesive activities and absence of integrated plan that is supported by an appropriate organizational structure and policies that find support from top management, no clear cut student holistic development plan can be prepared, no clear budget appropriation to fund student support activities.

Rivalry between academic units and student support units on the time availability of the students while each is putting forward its role of imparting knowledge and working on student development. The students said that they are victims sometimes of academic activity having conflict with student affairs activities, specially the student leaders.

KIs were very strong in their stand that academic instruction and support services can work closely and help each other in crafting the holistic person in the student; they are not rivals. They can coordinate their knowledge, attitudes and values formation instead of sometimes contrasting manner creating confusion, loss of trust to the institution or worst, it could unmake the persona of a student.

Conclusion and Recommendation

This study on the provision of student support services among selected HEIs in Albay has the following conclusions:

That the overall, the provision of student support services among selected Higher Education Institutions in the Province Albay is "good" which means that the students and the student Support Services Providers (Staff) are aware that there are functional provisions but the need further enhancement in order to provide extensive and authentic student support services along the various areas of student's needs. The study concludes further that SSS professional as educators themselves and SSS programs as component of holistic development of the person of the students are not given equal priority as that of the academic instruction. Only 2 our of the 24 components of SSS are rated excellent these are the components that are given priority in terms of financial and other resources allocation of HEIs. There are three components that are rated "fair" only, administrators must look into these "poorly" provided components of SSS that needs enhancement to better serve the needs of students

The weaknesses of SSS of the selected HEIs in Albay are: First there are three components that were rated 'fair' only, lack of political will of administrators to address these areas were observed. Second, the SSS components are not integrated into one cohesive office and functioning independently from academic instruction, thus SSS programs do not interface with academic instruction and sometimes even viewed as interference to academic development of students.

There is a significant need to propose an integrated student support services in a seamless academic community of learners in Albay HEIs.

REFERENCES

Ajowi, J.O., Simatwa, E.M.W., (2010) " The role of guidance and counseling in promoting student discipline in secondary schools in Kenya: A case study of Kisumu district. Educational Research and Reviews Vol. 5(5), pp.263-272, may 2010, ISSN 1990-3839 © 2010 Academic Journals.

Andersen, P., & vandeley, m. (2206). Career counseling and development in a global economy. Boston : Houghton Mifflin.

Arcibal, C. M. (2012). What exactly ails the Philippine education system –part 5, http://www.philstar.com/school-special/810427/what -exactly-ails-philippine-education-system-part-5.

Barr, M., Sandeen], A. (2006). Critical issues for student affairs: challenges and opportunities. San Francisco, ca : jossey Bass.

Belgica, Ace Dr. 7th annual convention of the Philippine association of the administrators of student affairs (PAASCU), tagbilaran, bohol, april 10-13, 2002.

CHED - CMO #21 series 2006 - commission on higher education manila. http://www.ched.gov.ph/chedwww/index.php

Dunggan, M.wW (2010): improving services for students with disabilities at community colleges, a dissertation submitted in partial fulfillment of the requirements for the degree of doctor of education, national- Louis university, Chicago, Illinois.

Fujita, k. (2006): the effects of extra-curricular activates on the academic performance of students.

Grandillo, m.a. (2005): college recruitment practices: recruitment theory and practices nontraditional enrollees,ethics, financial aids as a recruiting tool, the future.

Gujjar, A. A., Chaundry, B. N., Hafeez, A. C., (2009): a comparative study of student support services of allama iqbal open university and the open university of sri lanka, federal college of education, the islamia university of bahhawalpur, Pakistan.

Hardin, B. E. (2007): the importane of student support services, as perceived by nontraditional students enrolled in 4th year public institutions in south texas, a dissertation submitted to the dean of graduate studies and research texas a& m university- corpus Christi, texas.

Hollins, T. N., Jr. (2009): examining the impact of a comprehensive approach to student orientation, virginai community college system, usa.

Karanja, r. & bowen, m. (2012): student indiscipline and academic performance in public schools in kenya, daystar university.

Laurano, m., lomabrdi, m. (2012): human capital trends: managing talents for organizational growth. http://summits.aberdeen.com/1/hcm2012/hcm-programGuide_150-030512f.pdf

Leung, C., Ng, C., Chan, p. (2011): can co-curricular activities enhance the learning effectiveness of students?: n application to the sub-degree students in hong kong.

Ludeman, r.b., osfield, k.j., hidalgo, e.i., oste, d., wang, h.s. (2009), student affairs and services in higher education: global foundations, issues and best practices. The international association of student affairs and services and united nation educational, scientific and cultural organization.

National campus safety & security Project: America association of state colleges and universities: expecting the unexpected: lessons from the Virginia tech tragedy." 2007.

Nejati, m. (march 2009), education service delivery and students' satisfaction: a study of prvate colleges in Malaysia.

Nejati, m. and nejati, m. (2008), "service quality at university of Tehran central library", Library management, emerald publishing group, vol. 29 no. 6/7, pp. 571-582.

Pantington, Richard (2011): Predictive Effectiveness Of Matrix In Admission To The University Of Cambridge, An Unpublished Dissertation for the Degree Oo Doctor in Education, University of Cambridge, Cambridge CB2 1QY

Salanga, M.G. & Mateo, N.J. (2012), Autonomy in the Development and Practice of Filipino Counselor, De La Sale University, Philippines

Sicat, R.M. (2011): Foreign Students' Cultural Adjustment and Coping Strategies, Tarlac State University, Tarlac City.

Wang, M. "Adjustment Challenges For East Asian International Students" (A Thesis submitted to the Department of Psychology of State University of New York at New Paltz, 2011)

Woodford, M.S., (2010): Recovering College Students: Practical Consideration for College Counselors, Counselor Education at the College Of New Jersey.

http://www.bsu.edu.sa/mission- Ball state University Student Affairs and Enrollment Management.

http://www.ncpublicschools.org/studentsupport/

http://www.eurojournals.com/ejsr.htm

Motivation in Language Learning: Voices from Thai EFL Learners

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ABSTRACT

This study aims to investigate Thai undergraduate students' motivations towards language learning, focusing on four language skills – listening, speaking, reading and writing; and their possible ways for developing their four language skills. An open-ended questionnaire was distributed to 30 Thai undergraduate students who enrolled in a preparation course at a university specializing in science and technology in Thailand. The findings showed that students exhibited the highest motivation towards speaking and the lowest motivation towards writing. Students also presented some possible ways to improve their four skills.

Keywords— Motivation, Language skills, Thai undergraduate students

Introduction

The ASEAN Economic Community (AEC), which is coming in 2015, gradually influences many people living in 10 ASEAN member countries (i.e. Brunei Darussalam, Cambodia, Indonesia, Lao People's Democratic Republic, Malaysia, Myanmar, Philippines, Singapore, Thailand, and Vietnam) in several aspects such as in the free flow of investment and the free flow of skilled labour. Consequently, in the future, applying for a job will be a more competitive process because a higher number of companies will require proficiency in at least one foreign language, English in particular, for employment.

In Thailand, it was found that many Thai learners, especially undergraduate students who will be encountering competitive conditions in the near future, need to improve their language skills. Previous studies have investigated how different contexts could affect learners' behaviors in order to develop their language skills (Chamot & Kupper, 1989; Hong-Nam & Leavell, 2006; Afshar, Moazzam, & Arbabi, 2014). Regarding motivation, several studies have primarily used quantitative methods to explore this topic (Sakiroglu & Dikilitas, 2012; Tanaka, 2013; Mahmoodi, Kalantari, & Ghaslani, 2014).

Therefore, this study focused on a qualitative investigation of the learners' motivations towards language learning (focusing on four primary skills -- listening, speaking, reading, and writing), using an open-ended questionnaire. In addition to motivation, this study investigated possible ways for students to develop the four language skills.

Motivation

According to Longman Exams Dictionary (2006, p. 996) motivation is "eagerness and willingness to do something without needing to be told or forced to do it or; and the reason why we want to do something". Similarly, those were defined in Macmillan English Dictionary (2006, p.925) as "a feeling of enthusiasm or interest that makes you determined to do something". In the view of Gardner (1985, p.10), "motivation refers to the combination of effort plus desire to achieve the goal of learning the language plus favourable attitudes toward learning the language". Therefore, in this study, motivation is a feeling of willingness and having the reason to achieve the goal in language learning.

Dornyei (1994, p.280) proposed a framework of second language (L2) motivation by focusing on motivation from a classroom perspective. It was conceptualized in three levels which are language level, learning level, and learning situation level (see Table I).

Table I. **Components of Foreign Language Learning Motivation**

Language Level	**Integrative Motivational Subsystem** **Instrumental Motivational Subsystem**
Learner Level	Need for Achievement Self-Confidence • Language Use Anxiety • Perceived L2 Competence • Causal Attributions • Self-Efficacy
Learning Situation Level	
Course-Specific Motivational Components	Interest Relevance Expectancy Satisfaction
Teacher-Specific Motivational Components	Affiliative Drive Authority Type Direct Socialization of Motivation • Modeling • Task Presentation • Feedback
Group-Specific Motivational Components	Goal-orientedness Norm & Reward System Group Cohesion Classroom Goal Structure

Regarding Language Level, integrative and instrumental motivational subsystems are consistent with the two main types of learning motivation – integrative and instrumental motivation – proposed by Gardner and Lambert (1972). They also mentioned that integrative motivation is related to language learning which is derived from the learners' interest or desire; whereas instrumental motivation is referred to using motivation as an instrument to achieve goals set by the learners such as learning language to pass an exam or to get a better job.

Therefore, only Language Level was selected for the study because the two types of motivation classified – integrative and instrumental motivation – could be linked to the data obtained from the open-ended questions in order to answer the research questions.

Research Questions

This study was conducted in order to answer the following questions:

1) What are Thai undergraduate students' motivations towards language skills?
2) What are some possible ways for developing the students' language skills?

Research Methodology

A. Participants

The participants of the study were 30 first year Thai undergraduate students who enrolled in an English preparation course (in June, 2014) at King Mongkut's University of Technology Thonburi (KMUTT), Bangkok, Thailand. They were required to complete the course before starting their first semester (1/2014) in August, 2014 because their score received from the placement test was below the set criterion.

B. Instruments

A questionnaire was used to collect the data for the study. It consisted of 3 main open ended questions which asked which skill the students had the highest motivation to learn; their motivation towards language skills (listening, speaking, reading and writing); and the possible ways to develop their four language skills. It was derived from the informal interviews with a group of 5 students who have taken the English preparation course. When the questionnaire was created, it was piloted with 10 students, excluding the participants of the study, in order to check understanding while completing it. Then, the questionnaire was improved and revised to obtain the final version.

C. Data analysis

The data obtained from the questionnaire was analyzed by using keywords in the context.

Findings

A. Students' motivation towards language skills

The data obtained about the students' highest motivation towards the four language skills is presented as follows:

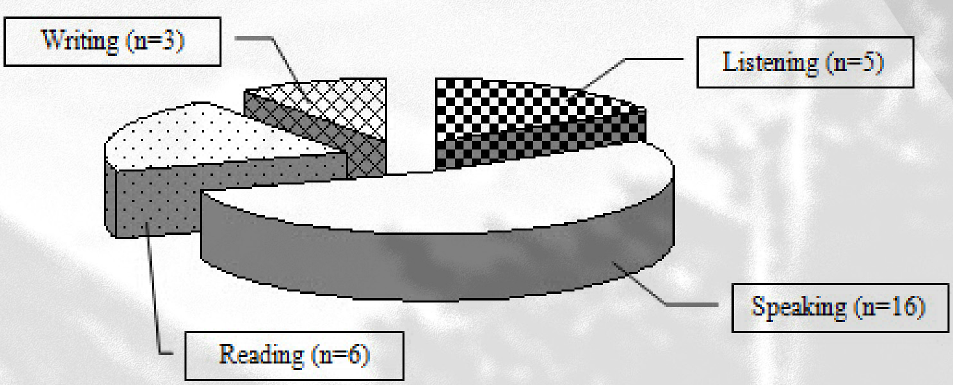

Figure 1. **Students' highest motivation towards the four language skills**

Figure 1 shows that the students had the highest motivation for 'Speaking' and the lowest for 'Writing'. The main reasons given by the students were concerning Grammar. They thought that 'Speaking' was the skill which focused on understanding more so than on using correct grammar. They could use it in the real situation without being aware of whether what they said was correct. The reasons written in the questionnaire are summarized as follows:

- I can speak without being aware of doing mistakes.
- I feel it is enjoyable to learn speaking.
- Speaking skill is the most important for communication.
- I can use speaking skill to communicate with others, especially the foreigners.
- I can use speaking skill in my daily life.

On the other hand, while writing the students had to be aware of many points such as grammar, spelling, punctuation, etc. 'Writing' was a complicated skill for them. The reasons which they used to support their thoughts are summarized as follows:

- I have to remember a lot of rules.
- I have problems in spelling or writing the words correctly.
- It takes time for writing and it is rare for me to use it.
- I am afraid of making a lot of mistakes in my writing.
- I often feel confused while writing.

When analyzed further, it was found that the benefits from using the language skills given by the students can be divided into integrative and instrumental motivation (see Fig. 2).

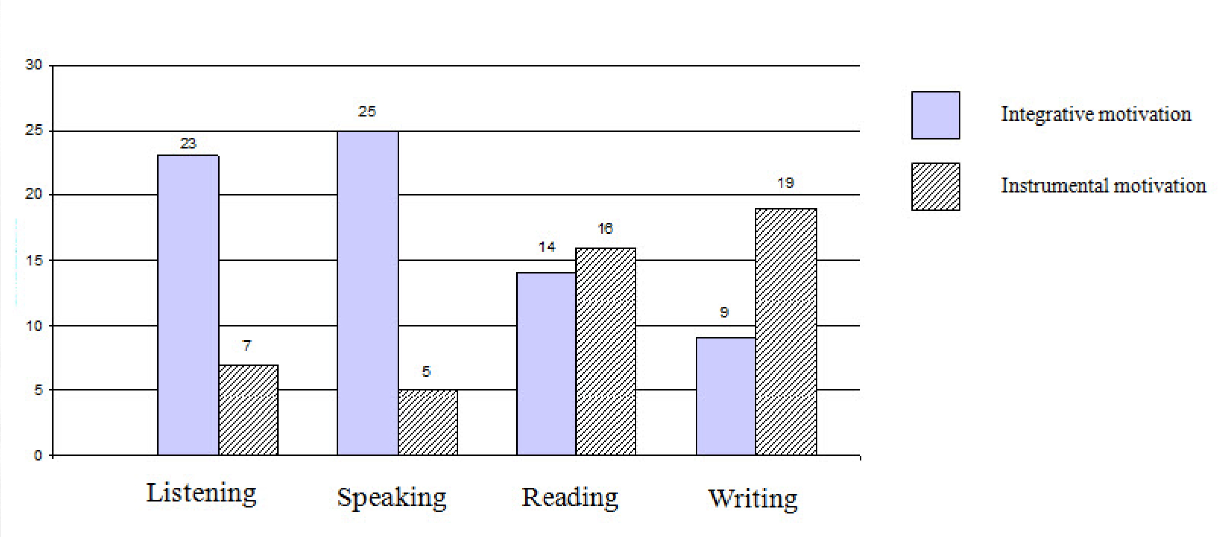

Figure 2. **Types of motivation towards four language skills**

As seen, the integrative motivation was mainly related to listening and speaking skills; whereas instrumental motivation was concerned with reading and writing. Regarding listening and speaking, the students were willing to interact and learn more with foreigners, native speakers in particular. They preferred to practice their skills in the realistic situations. As for reading and writing, most students accepted that they had to learn the two skills to pass their exams and to get jobs.

B. Possible ways for developing students' language skills

The information about the possible ways for developing the four language skills presented by the students was summarized in Table II.

Table II. **Possible Ways for Developing the Four Language Skills**

Skills	**Ways for developing**	
	In the classroom	**Beyond the classroom**
1. Listening	*Involve the teacher* • Be trained to use listening skills by the teacher.	*Interact with material* • Use TV and the Internet as sources to improve listening skills. • Listen to music or news in English. • Watch movies in English. • Play games. • Involve a mental approach • Find the main ideas of the speaker. • Do not avoid using English. • Find chances to practice listening.
2. Speaking	*Produce the language* • Talk to teacher and friends in English. • Try to practice speaking in the classroom.	*Interact with material* • Watch movies. • Play games. *Produce the language* • Practice more. • Talk to friends. • Talk to the foreigners. • Sing English songs. • Ask everyone in their family talk in English. • Talk to oneself in front of the mirror. *Involve mental approach* • Focus on understanding the whole text more than just grammar. • Listen to the foreigners' accent.
3. Reading	*Interact with material* • Practice from the textbooks.	*Interact with material* • Read texts found in daily life such as in advertisements. • Read the texts from various sources such as from: playing games, subtitles in the movie, interesting English books (e.g. cartoon, novels), lyrics from English songs.

Skills	Ways for developing	
	In the classroom	Beyond the classroom
		Involve a mental approach • Find keywords in order to understand the whole text.
4. Writing	*Involve the teacher* • Learn how to write from the teacher	*Involve a mental approach* • Jot down favorite words or words used in daily life. • Remember frequently used words. • Focus on understanding while writing more so than using complex sentences.
	Interact with material • Learn from a grammar book or the textbooks used in the classroom.	*Produce the language* • Write in real-life situations such as writing a letter/ email to foreign friends, and writing through social networks. • Write songs in English.
	Involve mental approach • Be careful about spelling while writing. *Produce the language* • Practice by starting from writing difficult sentences.	

It can be seen in Table II that in order to develop listening, speaking, and reading skills, the students mainly paid attention to the ways beyond the classroom; whereas in order to develop writing skill, the students focused on learning to write from the teacher in the classroom. Also, interacting with material (i.e. the textbooks), using mental approaches, and practicing in the classroom were necessary for improving their writing skills.

Conclusions

This study was conducted to investigate Thai undergraduate students' motivations towards the four language skills consisting of listening, speaking, reading, and writing; and possible ways for developing those skills presented by the students. The results showed that the students had the highest and lowest motivations for speaking and writing, respectively. They also proposed possible ways for developing their four skills in a variety of activities. Obviously, most activities presented were beyond the classroom and all skills were related to mental approaches.

Thus, in order to use the four language skills more effectively, students should be trained how to organize themselves and use the various sources which suit their situations. Teachers could also scaffold students and give them the guidelines for using different sources beyond the classroom. The advantages and disadvantages of those sources should be provided to support students before making a decision.

Inspiring students to become enthusiastic and willing to improve their language skills should be added in the classroom. In addition, the teachers could adapt the results of the study in various activities to suit their students. However, adding individually conducted interviews to further the investigation would be more beneficial. That would help the teachers or others concerned see the clearer picture about how to provide the activities or how the teachers should play the role for the students more appropriately.

REFERENCES

Afshar, H. S., Moazzam, I., & Arbabi, H. R. (2014). A comparison of Iranian EAP students and EFL majors on the use of vocabulary learning strategies. *Procedia Social and Behavioral Sciences*, 98, 1828-1835.

Chamot, A. U., & Kupper. L. (1989). Learning strategies in foreign language instruction. Foreign Language Annuals, 22, 13-24.

Dornyei, Z. (1994). Motivation and motivating in the foreign language classroom. *Modern Language Journal*, 78, 273-284.

Gardner, R. C., Lambert, W. E. (1972). *Attitude and motivation in second language learning*. Rowley, Mass: Newbury House.

Gardner, R. C. (1985). *Social psychology and second language learning: The role of attitudes and motivation*. Edward Arnold: London.

Hong-Nam, K., & Leavell A. G. (2006). Language learning strategy use of ESL students in an intensive English learning context. *System, 34*, 399-415.

Longman Exams Dictionary. (2006). UK: Pearson Education Limited.

Macmillian English Dictionary. (2006). UK: Macmillan Publishers Limited.

Mahmoodi, M. H., Kalantari, B., Ghaslani, R. (2014). Self-regulated learning (SRL), motivation and language achievement of Iranian EFL learners. *Procedia Social and Behavioral Sciences*, 98, 1062-1068.

Sakiroglu, B., & Dikilitas, K. (2012). Language learning motivation of Turkish tertiary level EFL students. *Procedia Social and Behavioral Sciences,* 46, 3215-3219.

Tanaka, M. (2013). Examining kanji learning motivation using self-determination theory. *System, 41,* 804-816.

Mantra Meditation: Spiritual Performance for the Community

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ABSTRACT

This is a performance study of mantra meditation as practiced in Bicol. Performance study is a study of any action or activity of man (may it be on stage, on camera, on screen or real life.) He used mantra meditation as a subject to his study because he has realized positive things in the three years he is practicing mantra meditation. Thus, the objectives of the research are to document the philosophy, the procedures, and the benefits of mantra meditation as practiced in Bicol and to analyze mantra meditation as a spiritual performance for the community.

With the researcher's direct participation and interviews with the mantra meditation practitioners in Bicol, he found out that mantra meditation is the process of hearing and chanting/ singing of transcendental sounds. These sounds are transcendental because they can actually purify an individual's heart and mind of too much lust, greed, envy and anger. Moreover, through this meditation, one can realize the science of the self or the truth of one's identity. And if one acts according to her nature, she will be in tune with reality; she will experience inner peace and eternal happiness.

Then using Richard Shechner's theory on performance, mantra meditation is a performance because (1) it is an embodied activity (2) it is considered "as performance", (3) it is a ritual (4) it is a play, and (5) there is a creative tension between a ritual and a play. At the same time, using Jagad Guru's definition of "spirituality", mantra meditation is spiritual not because it endorses any particular religion or sect but because it is a personal endeavor of man to fully realize her essence, position and function. Lastly, through Bhaktivedanta's definition of "community", a community can get spiritual and material benefits from mantra meditation.

With these results, the researcher came up with two recommendations:

(1) Mantra meditation may be considered, remembered or (re) practiced by individuals and communities in Asia and around the globe who are willing to listen and learn other ways or methods to achieve inner peace.
(2) Art practitioners and art educators may add to their philosophies the "science of the self" and may also consider mantra meditation as part of their art practices and creations.

Introduction

Everyone is searching for happiness – real not artificial, eternal not just temporary. But in this world full of dualities, is there real happiness? The researcher is an art educator and an art practitioner. He too is searching for real happiness. He finds it in fame, awards, higher position, good relationship, eating, sleeping, competition, sex, cigarettes, alcohol, and drugs. But he just tasted flickering enjoyments not real happiness. There came to a point that (maybe) suicide is a solution to the anxiety caused by diseases, old age and death, to the pain and suffering caused by one's body and mind, by other living entities and by nature. Indeed he (man) is in great dilemma.

Then he met a poet friend in 2004 two years after his college graduation who is practicing sound or mantra meditation. After two to three months of talking about culture and arts, he was encouraged to attend a meditation (wisdom) class. Out of curiosity, the researcher after some great thought decided to attend the meditation class 1 in Legazpi City. This was the first time he heard about the philosophy of mantra meditation. But after the class, it was all rubbish to him. He dismissed everything he heard out of arrogance and ignorance. Seven years after his first meditation class in 2011, he decided again to continue his meditation classes this is because he ran out of choices in his search for happiness or the absolute truth. He felt this was the only way never been tried. So he continued and consistently attended meditation classes under the Science of Identity Foundation, Tabaco and Legazpi. And in 2012, he begun to constantly practice mantra meditation and experience self-realization. Because of this, in 2013 he decided to document the philosophy, the practice (procedure), and the purpose (benefits) of sound or mantra meditation and confirm if all of this information is true to all the active mantra meditation practitioners in Bicol. At the same time, it was in this year that the researcher had attended the 1st Performance Studies Philippines Conference in De La Salle University, and everyone is talking about "performance study." As Richard Schechner puts it, "Everything can be considered as a "performance."

Following Schechner's lead, the researcher investigated mantra meditation practice not just as a performance but a spiritual one.

The goals of this paper are to:

1. Document the philosophy, procedures, practice and benefits of mantra meditation.
2. Analyze mantra meditation practice as a spiritual performance for the community.

Methodology

The documentation is based on the researcher's realization in his practice and his attendance to meditation classes conducted by Sir Erick Tristan Llaneta, and also to the confirmation and agreement of the 29 regular mantra meditation practitioners in Bicol.

The analysis is based on Richard Richard Schechner's views on performance, Jagad Guru's definitions of spiritual(ity) and A.C. Swami Bhaktivedanta Prabhupad's discussion on community.

Results and Discussion

1. Philosophy
    a. Mantras are millions and hundreds of transcendental sounds or names of the Supreme Being (God.) Meditation is not concentration on a particular thing but the focus of one's heart, mind and entire being on the Supreme Being.
    b. Mantra Meditation is a meditation that requires hearing and chanting of the millions and hundreds names of God or representatives of God. It is the practical process in today's time to actually remember and realized the science of the self.
    c. The science of the self answers the essence, position and function of the self/ man.
    d. The person's essence is not the body or the mind that are material. Instead, she is a spiritual soul – she is the atma, the chi, the living force or the living energy. Her body and mind because they are material are subject to the four laws of material nature which are birth, diseases, old age and death

(major cause of suffering in the material world). While she, the spiritual soul is transcendental to the four laws therefore does not experience birth, diseases, old age and death. She is eternal, full of knowledge and full of bliss. But because she is in the material world, by nature she is given material bodies (mind and body) and she forgets her real identity.

e. Because she forgets her real identity, her position is only a dominated part-and-parcel of the Superior Soul (God).
f. But since by nature she is full of bliss, she seeks blissfulness in many ways but if she is educated that she is a spiritual entity only parts-and-parcel of God, and then she will act on her purpose to render loving service to God.
g. One who is fixed and act in accordance with his real identity is compared to a lotus flower rising above a dirty pond and remains pure and untainted though the water is dirty.
h. It is through meditation that the self will always be reminded of his real identity, therefore he will act according to his nature. In return he will be in tune with reality. The reality is that this world is material, temporary and subject to change and so the self's body. Therefore, his body and mind will inevitably suffer diseases, old age and death but since the self is not the body and mind because he is an eternal spiritual soul, he remains calm and peaceful. Hence, the person/ the self achieves inner peace and eternal happiness.

2. Procedures
   a. GAUR RA ANG GA Meditation
      a.1 Gauranga means "the one who descends with a golden complexion."
      a.2 Pre-meditation technique is helpful to be more attentive and relax. Make a breathing exercise. Breathe in slowly, gently and deeply, feeling one's body rejuvenated. Breathe out slowly, not forcefully and feel one's body relax with the exhalation. Repeat this several times. This is only a pre-meditation technique.
      a.3 Add the mantra to the breathing exercise. The most important thing is to keep one's attention focused on each syllable whether saying it mentally or audibly. Say the mantra silently to oneself as one inhale through the nose and then chant it audibly on the exhalation.
      a.4 Make sure to pronounce clearly and to focus on each syllable. Chant the Gauranga mantra every day, for a minimum of 7-10 minutes in the morning and again in the evening.

   b. Japa Meditation
      b.1 Japa means touch and speak softly.
      b.2 This is done alone that uses the sense of hearing and the sense of touch by using beads for chanting. It is not to try to sit quietly and stop the senses or the mind, which is impossible, but rather the redirection of the senses and the mind into a spiritually purifying activity. It gradually helps man's not to fiddle.
      b.3 Try and chant GAURANGA on the beads at least 2 or 3 rounds every day. One should set a minimum that never go under but should try to increase. This needs a certain amount of self-discipline, humility and determination to follow this process.

c. Kirtan Meditation
   c.1 Kirtan is chanting a mantra with melody or music and other people with or without musical instrument. One can participate just by listening to others, or also by chanting along.
   c.2 There are two ways to chant: 1.One person leads and others follow. 2. Everyone chants together.
   c.3 Kirtan or the congregational chanting of the Holy Names of the Lord as preached by Lord Chaitanya cleanses the heart of all the dust accumulated for years and extinguishes the fire of conditional life, of repeated birth and death. This is the prime benediction for humanity at large because it spreads the rays of benediction moon. It increases the ocean of transcendental bliss, and it enables everyone to fully taste the nectar for which one is always anxious.
   c.4 Lord Chaitanya set the requirement to chant the holy names, and that is to be in a humble state of mind, feeling to be lower than the straw in the street; one should be more tolerable than the tree, devoid of all sense of false prestige and should be ready to offer all respects to others.
   c.5 Chant kirtan for about 5-7 minutes.

3. Practice
   a. Regular students or practitioners who already have a grasped and realization of the philosophy maintain certain number of rounds in their japa meditation. Like the researcher maintains twelve rounds a day. He usually wakes up at 4 or 5 in the morning, takes a bath and finishes the six rounds before breakfast and work. The other six rounds are finished either after lunch or after dinner. The researcher usually does his round in a quiet and secluded place. But for beginners, they can really do it anywhere and anytime.
   b. The kirtan meditation is usually done whenever group of students or practitioners are free to jam together either in a public or a private place. If it is public, they usually do it where there are many bystanders or passerby such as park, supermarket, near the malls, along the streets, university grounds, etc. It if it is private, practitioners jam in the meditation center, available university class rooms, homes of regular students, etc.
4. Benefits
   a. Body
      a.1 Eats more nutritious foods (vegetables and fruits).
      a.2 Sleep easily and wakes up early.
      a.3 Takes a bath early in the morning.
      a.4 Practices physical fitness exercises like jogging, swimming or hatha yoga.
      a.5 Quits smoking, liquor drinking or drug taking.
      a.6 Not pressured anymore by others (peers, friends or parents) to smoke, drink or take drugs.

   b. Mind
      b.1 Thinks of ways to have a healthy lifestyle.
      b.2 Thinks of helping others (parents, brothers, sisters, relatives, peers or friends) without asking anything in return.
      b.3 Thinks of serving his/her school, barangay, town, province or country unconditionally.
      b.4 Thinks of giving charity to social, cultural, religious, spiritual or non-government organizations.
      b.5 Thinks of improving or developing his/her learning, artistic, or/and leadership skills.

b.6 Thinks of inventing or creating a work of art, a machine or any tool that can help achieve peace and harmony within nations of the entire world.

c. Consciousness

c.1 Does not feel jealous or envy on any material thing or activity (new food, new gadgets, new dress, new car, new house, good looks, sexy body, flawless skin, winning competitions or multiple sex life) other people have or do.

c.2 Does not get overly stress, frustrated or suicidal over family problems, school difficulties, peer pressure, friends issues or/and "love-life" concerns.

c.3 Does not get anxiety over diseases, old age and death.

c.4 Wants to be humble; feeling (not dressing) lower than the dirt in the street.

c.5 Wants to be tolerable than a tree. Tolerate physical, mental and emotional pains. Tolerate the mistakes of others.

c.6 Being forgiving.

c.7 Wants to avoiding false prestige. (Does not feel, say and act to be always number 1 or does not get angry if he is not number 1.)

c.8 Offers all respects to everyone without asking any respect in return.

c.9 Refrains from finding faults from others.

c.10 Compassionate to all living entities (plants, flowers, animals and human beings).

c.11 Wants to controls lust and anger.

5. Mantra Meditation Practice (MMP) as a Performance

Richard Schechner's View on Performance

1. A performance "is performance" based on what a particular culture in a particular period deems to call a performance. Different historical periods have different yet interrelated concepts and definitions of what a performance is.[1]
2. Any performance is considered "as performance." This is when the methods of performance studies are applied to analyze any phenomenon or activity. Since there are infinite activities that are somehow overlapping each other, anything can be analyzed therefore any happening or experience is considered as performance.[2]
3. A performance can be a "ritual" or/and a "play." A ritual is a performance where realities are imposed. It is way or organizing or re-organizing behavior into set patterns; a way of taking certain behavior and emphasizing it to create new things from old behaviors. It can also be a daily routine when the routine is elevated in a way that the person is conscious of the process, the methods or the principles in doing it. Or it is the commonly religious rituals that express certain beliefs or a process of initiation from being an outsider to being part of the community.[3]

It is a play because there's a conflict, an imitation, a chance, and an ailing. All of these categories of play can be mixed and remade into all kinds of performative behaviors. Play is bounded by rules but because there is the aim to push the boundaries, rules are somehow being played like in theatre games and improvisations where one makes his own rules. So play is deeply creative because it creates realities and gives a lot of room for free activity. [4]

All performances exist in a kind of creative tension between a ritual (where realities are imposed) and a play (where one freely creates reality). [5]

Mantra meditation practice "is performance" because based on classical and twentieth century drama/ theatre, japa meditation practice is a monologue performance where the meditator is the actor and his audience is himself and God. The kirtan meditation practice is a musical performance. The leader of the kirtan is the lead musician and the other chanters are his co-performers and at the same time the audiences with other walk-in people, and God.

Mantra meditation practice is considered "as performance." The practice is a phenomenon that can be analyzed in terms of the methods of performing studies. The happening is a meditation through mantras or transcendental sound vibration. It starts with a humble obeisance to the spiritual master. Then, it expresses humble respect to God and his pure devotees, and all the devotees, disciples and students. The body of the meditation is the Mahamantra where a pure devotee humbly and deeply asks for God to engage him in His transcendental loving relationship. Disciples and regular students who have attended basic and advance meditation classes and already have an understanding and realization of the philosophy regularly practice mantra meditation. There is no specific attire for the practice. The principle is that it should be respectful and suited for the weather or celebration/ occasion. The space of the practice can be private or public. If it is closed or private, it should be cleaned and instruments are set-up (if available).

Mantra meditation practice shows a creative tension between a "ritual" and a "play." But it is not more of a tension but a requisite (the play as a requisite to be a ritual). The japa meditation practice is a ritual because it is regularly done every day. It is routine but because the meditator is conscious of its philosophy and process, it is elevated to a ritual. It is a religious ritual not because it endorses a particular sect or religious organization or it expresses a particular belief but because it reveals a truth -an alternative process for self-realization and God-consciousness. It is not an initiation but a rediscovery or a remembering. By nature, the person/the spiritual soul is already self-realized and God-loving but because of the influence of material nature, he forgets his natural identity. So mantra meditation practice will make her (the soul) rediscover or remember his true identity.

At the same time it is a "play" because as what Lord Chaitanya prays, "there are no hard and fast rules for chanting the Holy Names of God (mantra meditation)…" Beginners can practice anywhere and anytime. They can practice before, during or after an activity they're working on. Whatever they're feeling or situation in, they can practice mantra meditation. They do not need to give up their religious affiliation or membership. They can use any contemporary tune or melody as long as they don't change the mantra. And all they need to do is to listen to the mantras or the transcendental sounds whether they agree or disagree to its philosophy or whether they are serious or not. If they feel like it, they can sing or chant along.

But if one is desirous to be advanced in philosophy and practice then they need to consider another Lord Chaitanya's prayer and that is "One should the holy names (mantra meditation practice) in a humble state of mind, feeling to be lower than the straw in the street; one should be more tolerable than the tree, devoid of all sense of false prestige and should be ready to offer all respects to others."[6]

In mantra meditation practice, the play is a requisite to be a ritual. One is not forced or compelled to take it as a ritual. It must be done with love and love requires free will. She just needs to listen, regularly listens to the mantra and if she becomes sincere and humble, she will decide for herself to make the practice a ritual.

6. MMP as a Spiritual Performance for the Community

Jagad Guru's Definition of Spiritual[7]:

1. Spiritual means personal
2. Personal means person or man
3. Spiritual means the person or the human being
4. Spiritual or personal means man's realization of her essence as a spiritual being dominated parts-and-parcel of the Supreme Being (God) and naturally executes her function to love God with love and devotion.
5. Spiritual is not religious because it is not a sectarian group or a religious organization endorsing a particular religion.
6. Spiritual is religious because it is the essence of religion; the essence of religion is love for God. The end of being spiritual is to love God without conditions.

A.C. Swami Bhaktivedanta Prabhupad's Definition of Community[8]:

1. A perfect community is a peaceful and loving community. It is composed of self-realized individuals who follow the different four spiritual and social orders yet sharing the same goal.
2. The main goal is to be pleasing with God by rendering loving service to Him.
3. The spiritual orders are: single life, householder, renunciation
4. The social orders: preachers, government officials, businessmen/ merchants and workers.
5. The orders are not based on birth but on qualification.
6. Today's community is full of chaos, cheating, and confusion because it does not follow the said orders motivated by its main goal to cultivate the loving relationship with God.

Mantra meditation practice is a spiritual performance not because it endorses a particular religion, sect, race, culture, or nationality. It is spiritual because it is a performance that will make the performers and the audiences remember their forgotten identity (as spiritual souls/ entities) and re-establish their loving relationship with God (Superior Soul/ Being).

The practice is for the community because it ideally wants to offer an alternative way to achieve a harmonious and peaceful society through individuals who are humble, tolerable, and respectful because they are self-realized and God-conscious.

Conclusions

1. MMP is process to remember one's true identity.
2. MMP is beneficial to one's body, mind and consciousness.
3. MMP is/as performance.
4. MMP is a play at first then a ritual in the long run.
5. MMP is a spiritual performance for the community.

Recommendations

1. Mantra meditation may be (not forced) considered, remembered or (re) practiced by individuals and communities in Asia and around the globe who are willing to listen and learn other ways or methods to achieve inner peace and eternal happiness.

2. Art practitioners and art educators may add to their philosophies the "science of the self" and may also consider mantra meditation as part of their art practice and creation.

REFERENCES

Richard Schechner, "Is/As Performance", Performance Studies: An Introduction, 3rd Edition, youtubevideo.[1]

Schechner, "Is/ As Performance."[2]

Richard Schechner, "Ritual", Performance Studies: An Introduction, 3rd Edition, youtubevideo.[3]

Richard Schechner, "Play", Performance Studies: An Introduction, 3rd Edition, youtubevideo.[4]

Schechner, "Play."[5]

A.C. Bhaktivedanta Swami Prabhupad, The Golden Avatar: Teachings of Lord Chaitanya (Philippines: The Bhaktivedanta Book Trust, 1981.)[6]

Jagad Guru Siddhaswarupananda Paramahamsa, Mantra Meditation and Self-realization (Philippines: Science of Identity Foundation, 1982).[7]

A.C. Bhaktivedanta Swami Prabhupada, Srimad-Bhagavatam, Singapore: The Bhaktivedanta Book Trust, 1982.[8]

Instructional Competence of Criminology Teachers in Region V: A Baseline Study

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ABSTRACT

This study is backed up with the purpose of expanding opportunities to criminology instructors in order to improve their competencies in teaching in terms of: a) organizational planning; b) mastery of the subject matter; c) motivation; d) instructional skills; e) evaluation of students; f) classroom management; g). relationship and values formation; h) communication; and i) professional growth.

This study covered the recognized criminology schools in the Bicol Region which are under the supervision of the Commission on Higher Education (CHED). The respondents are the full- time and part-time criminology instructors handling professional subjects in criminology education.

The descriptive correlation method of research was used in this study to determine the extent to which different variables are related to each other in the population of interest.

The study found out that the criminology instructors were competent in organizational planning garnering a weighted mean of 3.66; mastery of the subject matter 3.70; motivation 4.09; evaluation of students 3.59; classroom management 3.72; relationship and values formation 3.86; instructional skills 3.09; and communication 3.77. However, this study found out that they are moderately competent in instructional skills 3.09 and in engaging in self development activities and assessing their strengths and weaknesses.

On relationship between the profile and instructional competence, the findings were sex profile– low; civil status- high, age- low, employment status –high, baccalaureate degree-low, master degree-high, number of loads-low, service training-low, and number of teaching years-low.

This study concluded the following: 1)the criminology instructors 31 to 40 years old, married, baccalaureate degree graduates with BS in criminology, have attended various training in seminars, with 3-6 teaching load, majority part time and rendered 1-5 years in teaching;2) the criminology instructors are competent in organizational planning, mastery of the subject matter, motivation, classroom management, relationship and values formations, evaluation of students, communication and moderately competent in instructional skills, in engaging in self developments activities and increasing their strengths and weaknesses. Thus there was a high correlation between instructional competence and the profile of the respondents.

Objectives:

1. To provide expanded opportunities for the technical knowledge and skills of Criminology Professors and improve their capabilities in teaching in college.
2. To serve as a basis for quality directions towards quality education.
3. To provide opportunities for pre- service training and strengthen their knowledge and opportunities for self development in their career life.
4. To identify problems areas in criminology education.
5. To enhance instructors' competencies in instructions for the attainment of quality education and for the best service to the clientele.

Scope and Coverage:

This study covered the recognized criminology schools in the Bicol Region which are under the supervision of the Commission on Higher Education (CHED) as follows : Bicol College, Central Bicol State University, Masbate college, Naga College Foundation, Our Lady of Lourdes College, Osmena College, Partido College, Pili Capital College, Sorsogon College of Criminology, Tabacco College, Amando Cope College, Ubilla College, Viritas College of Irosin, Solis institute of Technology, Univeristy of Saint Anthony, Alfelor Senior Memorial College, University of North Estern Philippines, The respondents are the full- time and partime criminology instructors handling professional subject in criminology education.

Methodology

The descriptive correlation method of research was used in this study, according to Sevilla , descriptive correlation research is designed to determined the extent to which different variables are related to each other in the population of interest, relative used of descriptive method highly suits this study on the instructional competence of the teachers in the Bicol region to discover the needs of the criminology teachers.

Respondents

The respondents of this study includes criminology teachers who are both full - time and part - time there were 112 out of 132 criminology teachers in higher education institutions but not all responded to the questionnaires distributed. This was due to the facts that some criminology teachers were on leave at the time of this distribution of the questionnaire. These respondents are actually teaching at the colleges of criminology in the Bicol region. Which were given government recognition by the Commission on Higher Education (CHED). They are shown in table 1.

Data Gathering Procedure

The main data gathering tools used was a validated questionnaire checklist with informal interview among schools staff and teachers. Observation was also conducted to support the information gathered.

Table 1. Respondents

Name of School	Number of Respondents
Bicol College	14
Central Bicol State University of Agriculture	5
Masbate College	7
Naga College Foundation	10
Our Lady of Lourdes College	6
Osmena College	9
Partido College	5

Statistical Tools

The researcher used several tools to treat the gathered data. The responses of the respondents were classified and tabulated systematically according to different variables included in the study. All data gathered were presented quantitatively. The following statistical tools was used; percentage technique, weighted mean, chi square and contingency coefficient of correlation.

Profile

The profile of the criminology teachers in the was classified into two, the personal profile which includes the age, gender and civil status; and the professional profile which includes educational attainment, field of specialization, length of service, training attended, number of teaching load, job status, and eligibility of the respondents.

Table 1 Personal Profile of Criminology Teachers in Region V

Personal Profile	Frequency	Percent
Age		
21- 30	54	21.43
31-40	41	36.61
41-50	35	31.25
51 above	12	10.71
Total	**112**	**100.00**
Sex		
Male	96	85.71
Female	16	14.29
Total	**112**	**100.00**
Civil Status		
Single	15	13.39
Maried	97	86.61
Total	**112**	**100.00**

Table 2 Professional Profile of the Criminology Teachers

Professional profile	Frequency	Interpretation
Baccalaureate		
BS in Criminology	92	82.14
BS in Crim. Major LEA	5	4.46
BS in Crim. Major Correction	6	5.36
With 18 and above professional subjects in education	2	1.79
With3- 15 units in professional subjects in education	7	6.25
Total	**112**	**100.00**
Graduate studies		
PhD in Criminology	4	
Units PhD in Criminology	3	
MS Crim. Major in LEA	7	
MS Crim. Major in Correction	2	
MS Crim. Major in LEA (units)	35	
MS Crim. Major in Correction(units)	3	
Other Masteral courses	57	
Total	**112**	
Employment Status		
Part Time	59	52.68
Full Time	53	47.32
Total	**112**	**100.00**
Eligibility		
Civil Service	20	11.97
NAPOLCOM	23	35.93
PRC	69	52.08
Total	**112**	**100.00**
Length of Service		
1 - 5	57	50.89
5 - 10	43	38.39
15- above	12	10.71
Total	**112**	**100.00**
Number of teaching load		
1 - 3	28	25.00
3 - 6	34	30.36
6 - 9	27	24.10
9- above	23	20.54
Total	**112**	**100.00**
In - Service Training Attended		
PCAP	100	73.53
PEACE	16	11.75
OTHERS	20	14.71
MULTRIPLE RESPONSE TOTAL	**136**	**100.00**

Findings:

1. Ninety seven or 86.61 percent were married and 15 or 13.39 percent were single; 96 or 85.71 percent were males and 16 or 14.29 percent were females; 24 or 21.43 percent belonged to the age group of 21-30 or 36.61 percent belonged to the age group 41-50 and 12 or 10.71 percent to the age group of 51 and above; 59 or 52.68 percent work as part timers; 53 or 47. 32 percent were full timers; 92 or 82.14 percent were graduate of BS Criminology or which 5 or 4.46 percent were major in Ballistics, 6 or 5.36 percent were major in police administration; 2 or 1.79 percent with professional subject in education; 7 or 6.25 percent with unit in professional subject in education.
2. Nine or 8.04 percent were master degree major in law enforcement administration, 2 or 1.79 percent were major in correctional administration,35 or 31.5 percent had earn units in Master of Science in Criminology major in law enforcement administration and correctional administrations, respectively out 112 respondents only 5 or 4. 46 percent is a full pledge doctoral degree holder in criminology and one or 0.89 percent have earned units in doctoral degree; 57 or 50.89 percent have been in the teaching profession for 1-5 years, 43 or 38.39 percent to 55-10 years, and 12 or 10.71 percent with 15 years and above; 28 or 25.00 percent handled 1-3 subjects, 34 or 30.36 percent 3-6 subjects, 27 or 24.1o percent 6-9 subjects and 23 or 20. 54 percents handled 10 and above; 100 or 73. 53 percent attended PCAP seminars and 16 or 11.76 percent attended PEACE seminars, and 20 or 14.71 percent attended other seminars.
3. The criminology instructors were competent in organizational planning3.66; mastery of the subject matter 3.70; motivation 4.09; evaluation of students 3.59; classroom management 3.72; relationship and values formation 3.86; instructional skills 3.09; and communication 3.77. they are moderately competent in instructional skills 3.09 and in engaging in self development activities and assessing their strengths and weaknesses.
4. On relationship between the profile and instructional designed, the finding were sex – low; civil status- high, age- low, employment status –high, baccalaureate degree-low, master degree-high, number of loads-low, service training-low, and number of teaching years-low.
5. Findings shows that there is a need to conduct career training for instructional designed of criminology instructor for sound learning environment to produce productive and competent graduates.

Conclusions:

1. The criminology instructors 31 to 40 years old, married, baccalaureate degree graduates with BS in criminology, have attended various training in seminars, with 3-6 teaching load, majority part time and rendered 1-5 years in teaching.
2. The criminology instructors are competent in organizational planning, mastery of the subject matter, motivation, classroom management, relationship and values formations, Evaluation of students, communication and moderately competent in instructional skills, in engaging in self developments activities and increasing their strengths and weaknesses.
3. There was a high correlation between instructional designed and the profile of the respondents.
4. Results of the study is rich source for inputs to the proposed guide to teaching for professionals.

Recommendations:

1. The faculty for criminology education be encourage to qualify themselves by finishing their master's degree, should attend training and seminars in the field of criminology education.

2. The level of instructional designed of criminology instructors be raised from competent to very competent by improving themselves and using the training designed.
3. A guide to criminology teaching material development for professionals may be developed.
4. A follow up study along this area be conducted to validate the findings of this study thus come up with a more innovative program for the continuous enhancement of the instructional designed of the criminology instructors.
5. It may be recommended therefore that: 1) the faculty for criminology education be encouraged to qualify themselves by finishing their master's degree, should attend training and seminars in the field of criminology education; 2) the level of instructional designed of criminology instructors be raised from competent to very competent by improving themselves and using the training designed; 3)the guide to teaching for professionals may be introduced; and 4) a follow-up study along this area be conducted to validate the findings of this study thus come up with a more innovative program for the continuous enhancement of the instructional competence of the criminology instructors.

Applying Formal Science to Social Science: Case of Accounting Study

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ABSTRACT

The objective of this study is to encourage learning other field of subjects which cross over one field of study. Crossing over among branches of subjects can help students thinking far beyond what they are. It also lights a fire of innovative thinking for students. In case of this study, accounting is one of the most popular subjects among Thai students' interesting. This subject is classified in a school of social science branch. With lacking of advanced formal science operations in accounting procedures, most curriculums are reducing some details in formal science subject off accounting core subjects.This situation should not be occurred.In addition, this paper encourageskeepingformal science subjects in all social science branches, because integration skill is very important to college students. It also helps them solving an incidental problem in many alternatives of perspectives. Moreover, many crossing cultures sometimes evolve a new era of innovation. This is good for our next generation to create a new thing which very helpful to develop our society. Finally, this paper illustrates a possibility of cross culture procedure between formal science and social science in case of accounting study with a new accounting operation. This operation is developed by bringing an advanced technique of Mathematics, Matrix.

Key words: **Cross culture study, Formal science, Social science, Dual nature, and Accounting Matrix**

I. Introduction

Accounting is accepted to be one of a social science school, because accounting does not use any Mathematics functions to solve any problems or to determine any appearances. Although, accounting brings Mathematics signs and operations to do its procedure, the accounting procedure does not use any advanced Mathematic techniques to operate. It brings just a simple operation to do an accounting. Because of this action, there are a lot of questions which are asked by the students in the class. One of the most frequently being asked by students is why do we learn a lot of Mathematics? Many students have already focused on social science study since they were in high school. They strongly believe that social science is completely different from formal science. So, they think it is not necessary for them to learn a lot of advanced Mathematics techniques. Consequently, it is teachers' duty to answer and to explain why do they have to learn advanced Mathematics technique?

It is truly that accounting procedure does not use an advanced technique from Mathematics, but accounting cannot avoid using Mathematics operations. Due to the subject nature, accounting does not exist in natural. Accounting is created to serve human needs of recording something in a systematic order. In addition, to measure what human needs, Mathematics signs and operations are used as tools for providing value of existing. With several Mathematics applications, it is curiously that why does Mathematics less applying to the process of accounting? If we challenge to applymuch of Mathematics operations in accounting process, what will happen to accounting appearances? Is it working smooth as a classical approach which we are familiar with?

As a result of Matrix Method Posting Paper, Accounting Matrix really exists and can place to accounting procedure smoothly. So, this is a good opportunity to illustrate that formal science can be possibly applied its advanced technique to social science procedure. Accounting Matrix is one of an example cross culture study between formal science and social science in the new era. To prove the possibility of crossing operation, deductive approach is employed to investigate the simultaneous logic from both formal science and social science. After logical proving, Accounting Matrix can use to explain accounting procedure in the new perspective of thinking.

To provide business information, accountants use accounting book which is called General Journal to record all of the daily transactions. To record all transactions, there is a tough rule for book keeping which is called *double entry system* to control all balance amounts of 2 sides of accounting equation (Debit and Credit) during the time of booking. Although, the business transactions are exactly booked in the General Journal, there is another process which is systematically made after every single business transaction has been made to provide sub-detail for every single accounting title. The following process is called posting. The posting procedure is used to book for every transaction as a sub-summary account for every single accounting title which has been opened to serve the booked transactions in General Journal. Finally, at the end of accounting period, there is usually found a gap amount between debit and credit side; the different amount in every sub-detail is forwarded to a Trial Balance for computing an accuracy of the equation during the book has been made. The accounting process is provided as follow:

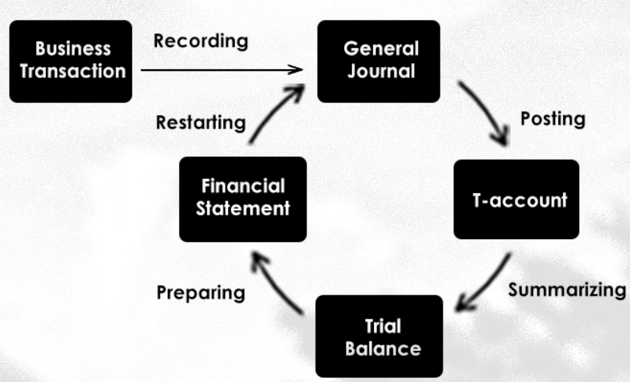

Figure 1: **The accounting process diagram**

This paper offers a new way to post all transactions by using the Mathematics Matrix. According to the rule of book keeping, there are 2 sides of the equation for recording all business transactions during the book is recording. Surprisingly, the fundamental operation of the Matrix also has 2 ways of operations which are roll and column operation too. In addition, both operations are effected to each other during operation. There are a lot of matrix types in Mathematics operations, but only a square matrix should be appropriately used in the case of accounting. The dimension of accounting matrix should be 5x5, because 5 major elements of the accounting which are *assets, liabilities, owner's equity, revenue,* and *expenses* are suitably placed in the rolls and columns of the matrix. Then, roll and column operations are used for debit and credit operations.

Figure2: **An accounting matrix for business transaction.**

Credit Operation

	Assets	Liabilities	Owner's equity	Revenue	Expense
Assets					
Liabilities					
Owner's equity					
Revenue					
Expense					

Debit Operation

Although, there are several previous literatures that encouraged to use a matrix as a tool for providing accounting information, none of those literatures brought accounting matrix for serving a fundamental factor of accounting practice which is a booking system. Thus, this paper tries to challenge the using accounting matrix as a new tool for recording business transaction. Actually, the accounting matrix in this paper is placed for posting and preparing a trial balance procedure. Finally, the objective of this paper is to provide an alternative for posting and preparing a trial balance in another perspective which is a Mathematics perspective. The result of this matrix encourages opening mind about accounting operation in another perspective to seek out any information in the future.

II. Research Methodology

According to the objective of this study, this paper focuses on applying the formal science operation to social science operation. In addition, this research is a way of developing technique of accounting. This new technique is applied from an operation of matrix which is one of pure mathematics operations. Due to the concept of a context of discovery, there are 4 procedures which are dreams, Eureka, Deductive approach, and Inductive approach generating or discovering empirical generalizations, laws, or theories (Riahi-Belkaoui (2004)). Furthermore, this paper truly bases on a deductive approach, because this new type of accounting practice is derived from the basic assumption of accounting recording principle to a logical conclusion which is a matrix operation. Deductive approach is the logical process of deriving a conclusion about a specific instance based on a known general premise or something known to be true (Zikmund (2003)). There are 4 steps for carrying out the investigation. These 4 steps are logical comparison, logical investigation, comparison with other theories, and testing by the empirical application. This paper needs to approve that the mathematics matrix can be placed to post all of the business transactions off the old-fashioned way posting. Then, the methodology of investigation is followed by the 4 steps of deductive approach.

Logical Comparison

Through the logic of recording transaction, there are 2 sides of operations which are debit and credit sides in the general journal. The following processes, posting procedure and preparing a trial balance, are also operated in 2 sides like debit and credit as well as booking in the general journal. Moreover, while transactions are booking, amounts on both sides of operations are totally balanced. It can be assumed that every procedure of accounting bases on balancing 2 sides of operations. In mathematics, matrix also has a fundamental operation within 2 sides (roll and column)during one time of operation. While one side of the matrix is operating, it automatically effects to another side of operation. Finally, the total amount of the roll and column operations must exactly be equal.

With the logical comparison, it can be concluded that accounting and matrix have 2 similar fundamental logics. The first parallel logic is 2 sides operations in one time. In accounting, one business transaction must impact *Debit* and *Credit* operations systematically. Similarly to matrix, one datum which has put in a cell of matrix table automatically affects *Roll* and *Columnoperations*. The other logic is balancing amount during and after operation. It is obviously seen that total amount from accounting and matrix operation is equal between 2 sides of itself operation during and after operation. From both logical operations, if accounting and mathematics have a parallel operation, then the matrix is also applying to the accounting subject as a replacement from a classic way of recording the transaction.

The components of the accounting matrix are based on 5 elements of financial statement. They form the accounting matrix shaping like a square matrix which has equal dimension both rolls and columns. The roll operation and column operation are placed for debit and credit operation. Especially, in accounting matrix, the amount of the transaction must be put in one cell of the accounting matrix. A single amount which is booked in the matrix automatically effects to both sides operations.

Figure 3: The illustration of recording transaction in the accounting matrix

	Assets	Liabilities	Equity	Revenue	Expense	Total	
Assets		100				100	Total assets debit = 100
Liabilities							
Equity							
Revenue							
Expense	20					20	Total expense debit = 20
Total	20	100				120	
	Total assets credit = 20	Total liabilities credit = 100					

According to the result of the accounting matrix, one amount in the matrix cell automatically provides the effect of debit and credit operations. After matrix operation finished, net amount of the roll and column balances is balance forward amount from posting process and forwards to trial balance. Moreover, grand total amount provides a rough balance of debit and credit of trial balance.

Logical Investigation

Accounting has a simply logic of equation which is balance amount between debit side (left-hand) and credit side (Right-hand) (Weygandt, Kieso, and Kimmel (2003)). To complete the accounting equation, there are 5 components of financial statement putting in the equation as follow:

Assets + Expenses = Liabilities + Owner's equity + Revenues
(Debit side) (Credit side)

Basically, every transaction begins with the fundamental equation status. For example, Assets and Expenses occur or increase, the entries are booking in debit side only. In contrast, Liabilities, Equity, and Revenue start or rise, the entries are recording in credit side. If business activity makes some components decreasing, the entries will be reversed to book in the opposite side of its normal status. An example of decreasing transaction is as follow:

Expenses - Liabilities = Owner's equity + Revenues - Assets
(Debit side) (Credit side)

There is another important logic for accounting which is called double entries system or matching principle. This logic seems to be like an assumption for booking transactions. If one side of the equation rises, then another side will be raised automatically. Moreover, the essential reason of matching principle is limited by the accounting components and fundamental status of accounting equation. These are many choices which book keeper must select among them to serve the real business activity (Horngren, Harrison, and Bamber (1999)).

Table 1: **The table of expected reason from raising assets**

Components changing	Basic assumption for business activity
Liabilities increasing	Purchasing assets on credit
Equity increasing	Initial investment by assets
Revenues increasing	Selling merchandise for cash
Expenses decreasing	Adjusting prepaid expense by full expense method

After choosing the correct opposite component to serve the correct business activity, book keeper also bewares to record the amount of the entries which are strictly to balance in both sides of the equation. Posting is used to collect the sub-detail of each accounting titles to summary all amount which is recorded during the period of business round. Unbalanced amount equation from posting procedure provides a balance forward. These forward balances are put in the trial balance for checking the correct amount throughout the basic of accounting logic which debited and credited entries are totally equal. The final stage of accounting process is preparing a financial statement. Primary information in financial statement is derived from data in a trial balance.

By the way, the matrix operation can handle to solve the complicated equation which has a lot of variables in the same time of occurring. The basic operation of the matrix is roll and column operations. Surprisingly, if user calculates correct, the roll and column operations are obviously providing the same result. The matrix operation depends on the dimension. The dimension of the matrix likes any Cartesian Multiple in the mathematics function. Amount of roll and column are the dimension of the matrix; the coordinate from dimension is used to identify the position of the member in the matrix.

$$A_{n\times m} = \begin{bmatrix} a_{1,1} & a_{1,2} & \dots & a_{1,m} \\ a_{2,1} & a_{2,2} & \dots & a_{2,m} \\ \dots & \dots & \dots & \dots \\ a_{n,1} & a_{n,2} & \dots & a_{n,m} \end{bmatrix}$$

Figure 4: **The appearance of the matrix**

Most matrix operations are used to solve the multiple linear dynamics equation, because matrix can provide data of those dynamics in the same time. Basically, there are at least 2 types of matrixes which derive from the appearance of the dimension, symmetric (square) and asymmetric.This paper focuses on the square matrix, because the square matrix can be operated transposing, determinant calculating, and inversed matrix calculating easily. In square matrix, the transposing is useless, because the number of roll and column have the same dimension. Through, determinant calculation, there are 2 types of matrixes from determinant operations which are singular matrix (det = 0) and non-singular matrix (det ≠ 0). The singular matrix cannot operate an additional function as inversed matrix, because the determinant is used as a nominator of the operated function.

$$A = \begin{bmatrix} a & b \\ c & d \end{bmatrix} \; ; \quad \det A = \begin{vmatrix} a & b \\ c & d \end{vmatrix} = ad - bc$$

Figure 4: **The basic calculation of matrix's diagonal cross determinant for dimension 2X2**

Actually, there are several procedures which can be identified the matrix's determinant as diagonal cross multiple. Minor method is the other type of determinant calculation for matrix. With this method, the users have to select one of the matrix's roll or one of the matrix's column. After that, selected roll or column is deleting of the matrix and beginning to calculate the determinant with a remained sub-matrix. To illustrate, the figure 5 provides Minor method for determinant calculation (Ayres (1986) and Bolton (1995)).

$$C = \begin{bmatrix} a_{1,1} & a_{1,2} & a_{1,3} \\ a_{2,1} & a_{2,2} & a_{2,3} \\ a_{3,1} & a_{3,2} & a_{3,3} \end{bmatrix} \quad M_{1,1} = (-1)^{1+1} \cdot a_{1,1} \begin{vmatrix} a_{2,2} & a_{2,3} \\ a_{3,2} & a_{3,3} \end{vmatrix} \quad M_{1,2} = (-1)^{1+2} \cdot a_{1,2} \begin{vmatrix} a_{2,1} & a_{2,3} \\ a_{3,1} & a_{3,3} \end{vmatrix} \quad M_{1,3} = (-1)^{1+3} \cdot a_{1,3} \begin{vmatrix} a_{2,1} & a_{2,2} \\ a_{3,1} & a_{3,2} \end{vmatrix}$$

Figure 5: **The Minor method determinant calculation**

Select 1st roll for Minor calculation;det C = $M_{1,1} + M_{1,2} + M_{1,3}$

$$M_{1,1} = (-1)^{1+1} \cdot a_{1,1} \begin{vmatrix} a_{2,2} & a_{2,3} \\ a_{3,2} & a_{3,3} \end{vmatrix} \quad M_{2,1} = (-1)^{2+1} \cdot a_{2,1} \begin{vmatrix} a_{1,2} & a_{1,3} \\ a_{3,2} & a_{3,3} \end{vmatrix} \quad M_{3,1} = (-1)^{3+1} \cdot a_{3,1} \begin{vmatrix} a_{1,2} & a_{1,3} \\ a_{2,2} & a_{2,3} \end{vmatrix}$$

Select 1st column for Minor calculation; det C = $M_{1,1} + M_{2,1} + M_{3,1}$

Surprisingly, the results of determinant calculations from Minor method are totally equal from both sides of calculations. This is the appearance which can prove the logic of matrix symmetry operation. Although, the users focus on a roll determinant operation, the column determinant operation also produces the same product of the operation in parallel. Moreover, matrix provides several methods of determinant calculation; and they serve the same product of the operation. So, it is possibly assumes that any symmetry operations should also be applied to create the other operation to replace the classic way of operation, but the modernized operation must be strictly to the root of the logic of symmetry.

After investigation of the matrix logic and operations, it is probably assumed that matrix logic and accounting logic are closely alike in many ways. Firstly, there are 2 ways of operations which must be produced the equal result. Secondly, matrix and accounting are served to operate many variables in the same time. Finally, there are opened to operate the result in the different ways of thinking, but the way of thinking must be strictly to its fundamental logic. Then, if matrix logic and accounting logic are closely, matrix will be probably used to serve the accounting procedure as a new alternative of booking.

Actually, the matrix is already used in many ways of business operations. The quantity analysis is a good example of applied matrix in business operation. Markov process model is one of the quantity analysis processes which are applied by matrix operation. This process is useful in studying the evolution of system over repeated trials. Mostly Markov process models are obviously applied to account receivable analysis in several firms. In addition, Analytic Hierarchy Process (AHP) also used matrix to solve complex multi-criteria decision problems (Anderson, Sweeney, and Williams (2001)). Furthermore, managerial accounting also brings matrix to help managers setting up the master budget (Horngren, Foster, Datar (2001.)).

Theory comparison

According to the objective of this study, this paper encourages everyone to have a chance to learn other field of knowledge, because integration among branches of knowledge always creates a new age of thinking. Adapting formal science to accounting procedure, it should be good for extending an accounting perspective to another way of thinking. In addition, this formal science logic might bring accounting logic more reasonable than it is.

Actually, formal science and social science are separated in a way of measurement already. Formal science is used to seek out the result from existing natural logic which can be identified by Mathematics function, but social science is always searched for relationship between factors which are expected to be influent in an observation subject. Normally, formal science is employed a real Mathematics functions and operations to answer the questions, and every question what is asked must have answers. In contrast, most social science works are involved inner movement or behavior. To measure relationship between factors is accepted to be very difficult and exist. Statistics is also created to measure a realistic of relation through numeric value. In addition, it isonly calculated for search a connection or an influential factor. Statistics product is totally different fromMathematics function which uses to determine appearance or to find a logical answer.

Although, accounting is classified in a school of social science, there is none of statistic technique found in its procedure. Most accounting procedures are simple Mathematics operations, but none of Mathematics function is set up during the procedure. Moreover, accounting has itself logic which is balancing amount between 2 sides during recording. This logic of balancing quietly sounds like Mathematics equation. Consequently, accounting seems to provide *dual nature of appearance* between formal science and social science. According to *dual nature appearance* of accounting, some advanced Mathematics techniques should be adapted to accounting practices smoothly. Because of existing and validity, Accounting Matrix might be the one of an essential example for lecturers to answer the question that why students in social science likes accounting should learn advanced Mathematics technique from formal science branch.

Empirical Application Testing

To make people believes that Mathematics can be applied to accounting. An existing example should appropriately bringto explain the accounting procedures in a formal science perspective. As proving by theory comparison, Mathematics might be placed for accounting from the beginning to the end of accounting procedures. There are at least 4 Mathematics topics which can be adapted in accounting procedure in the first age of discovery. The mathematics replacement diagram provides as follow:

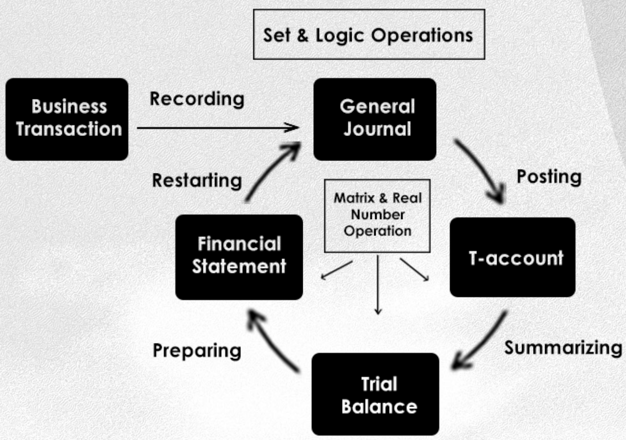

Figure 5: **The mathematics replacement diagram**

Set operation

Mathematics ***set*** is a fundamental operation which is applied by primary accounting procedure. ***Set*** is used to classify every accounting title from business transactions into one of at least 5 financial statement components which are ***Asset, Liability, Owner's equity, Revenue,*** and ***Expense***. It can be assumed that accounting is originated by 5 sets of financial statement components.

"Purchase equipment 100 Baht on account"

After receiving this business transaction, accountant firstly analyzes that what are accounting titles used to determine the fact of business information? What is it able to purchase? The answer is only ***Asset*** which can be purchased. Then, *Equipment* is selected from ***Asset Set*** to determine what thing is purchased. How does *Equipment* be purchased? The answer is *Equipment* is purchased by creating a ***Liability***. So, Account Payable is chosen to record in accounting book as a member of ***Liability Set***.

Logical operation

Logical operation is a second step of accounting procedure which is automatically employed after selecting accounting title. Increasing and decreasing dynamic of ***Accounting Set*** and 2 sides ***balancing logic*** are taken control of this accounting step. With the example, ***Asset*** is increasing from purchasing. Which ***Set*** is suitable selected to match with this action? ***Liability*** is increasing as soon as ***Asset*** is obtained. Furthermore, these are accounting dynamic of double entry system which accounting procedure must be occurred both sides of equations. Then, those accounting titles are recorded in accounting book.

Dr. Equipment	***100***
Cr. Account Payable	***100***

Why does *Equipment* be recorded on ***Debit*** side? The answer is because *Equipment* isa member of ***Asset Set***. In addition, logic of accounting dynamic is provided that increasing Asset must be recorded on ***Debit*** side. Simultaneously, other dynamic of ***Liability*** is booking on ***Credit*** side when ***Liability*** is increasing. Moreover, there is a last logic operation with this business transaction that is amount of both sides must equal as ***balancing logic***.

Matrix and Real Number operations

According to the above, the objective of this paper is to encourage using a Matrix as an alternative of booking business transaction. Then, Matrix should be used for booking accounting entries in a general business entity. *Example of Accounting Matrix procedures;*

Dr. Cost of farm's production	***100***	and	***Dr. Tax expense***	***50***
Grain inventory	***50***		***Cr. Cash***	***20***
Cr. Farm's revenue	***150***		***Tax payable***	***30***

(Recording farm's revenue in a harvest period) *(Paying tax expense by cash)*

	Assets	Liabilities	Equity	Revenue	Expense	Total
Assets	0	100	0	50	0	150
Liabilities	0	0	0	0	0	0
Equity	0	0	0	0	0	0
Revenue	0	0	0	0	0	0
Expense	20	30	0	100	0	150
Total	20	130	0	150	0	300

According to the above Matrices, all transactions are completed in the Matrix table. Moreover, the grand total of Matrix provides an equal amount between roll (debit) and column (credit) exactly. The forward balance of assets is equal to 130 from the different amount between roll and column (150 – 20). In addition, the forward amount of assets is on the debit side which correctly as the fundamental balance of the assets, because sub-total roll amount of assets in the Matrix is much than sub-total balance of column assets.

Table 2: **Table of example topic comparisons between Mathematics operations and accounting procedures**

Mathematics Operations (Formal Science)	Accounting procedures (Social Science)
1. Set Operation	Identifying components of financial statement
2. Logical Operation	Increasing and decreasing components in equation
3. Matrix Operation	Booking and Posting business transaction in a book
4. Real Number Operation	Numeric calculating during procedure

Additional empirical testing

The Matrix has other operations. The determinant calculation is a signature operation of Matrix. In this paper, it is totally found that the determinant of all Accounting Matrix is equal to 0. So, every Accounting Matrix is a Singular Matrix. The determinant calculating in Accounting Matrix can help checking an accuracy of booking transactions for the entity. This result can help auditor reviewing clients' accounting easily. With this result, it also provides that formal science technique is necessary to survive for accounting job. Finally, cross cultural study can extend the perspective of thinking more than the way which has been familiar with.

II. Summary and Conclusion

Because, the accounting practice is barely evolved for a long period, this paper provides Mathematics Matrix as a tool for challenging the new era of posting procedure. With deductive approach, the Mathematics Matrix is investigated by 4 stages of deductive testing, which are logical comparison, logical investigation, comparison with other theories, and testing by the empirical application. Accounting has a special logic which is balancing amount between 2 sides of transactions (Debit and Credit). It totally matches with the Mathematics Matrix operation which must be balancing amount of roll and column operations. According to the empirical testing, the Mathematics Matrix can provide the posting procedure of accounting process smoothly, but all transactions which bring to post in the Matrix might be condensed back into all 5 fundamental elements of financial statement.Thus, lacking of transaction fact is the only disadvantage for Accounting Matrix.

This paper increased an additional empirical investigation which is a signature operation of the Mathematics Matrix. This signature operation of the Matrix is determinant calculation. Unfortunately, the Accounting Matrix cannot compute the determinant (det = 0). Although, the Accounting Matrix cannot be calculated the determinant, it does not mean useless procedure for accounting. The determinant calculation senses another perspective of auditing. It is impossible that every cell in Accounting Matrix is full of amount. If Accounting Matrix has volume in every cell, the determinant will be able to calculate. Automatically, it can be pointed out that there are some misplaced entries putting in Matrix cells.

Actually, the proving of ***dual nature appearance*** of accounting still incompletes, because there are a lot of details of accountings waiting for a time and interested people to continue investigation in other perspectives of formal science. Moreover, there are a lot of future studies through the idea of Accounting Matrix. For example, the Accounting Matrix should also explain the surplus from combining between business entities. To illustrate (Beams, Anthony, Clement, and Lowensohn (2003));

$$\text{Merger} \Rightarrow A + B = cA\text{Consolidation} \Rightarrow A + B = C$$

A and B are single Matrix which stands for single entity. In the case of merger, the result of combination remains only merger entity. In addition, c stands for scalar of surplus proportion after merger procedure. In contrast, the consolidation technique is erasing all consolidated entities to form a new entity. According to the Matrix discipline, Matrix A and Matrix B consolidate together into a new Matrix.

In conclusion, formal science can be applied it technique to social science smoothly. After proving, the result is pointed out that cross cultural study is very helpful to create a new age of innovation. Integration among different of knowledge can increase an unlimited perspective of thinking. The more we know a lot of knowledge, the more we able to adapt and to handle an incidental situation easily. As a university lecturer, it is an important duty to explain the necessary of cross cultural field of major study to university students. Finally, every curriculum should be increased cross cultural subjects in its curriculum to give students more logical and innovative thinking than they have ever had.

REFERENCES

Anderson, D., Sweenney, D., and Williams, T. Quantitative Methods for Business 8th ed. United States of America: South-Western Thomson Learning. 2001.

Ayres, F. Theory and Problems of Matrices 2nd ed. Singpore: Mc Graw Hill. 1986.

Beams, F., Anthony, J., Clement, R., and Lowensohn, S. Advanced Accounting 8th ed. United States of America: Prentice Hall. 2003.

Bolton, W. Linear Equations and Matrices Malaysia: Longman Scientific and Technical. 1995.

Brickley, J., Smith, C., and Zimmerman, J. Managerial Economics and Organizational Architecture 3rd ed. Singapore: Mc Graw Hill. 2004.

Christensen, J., and Demski, J. Accounting Theory An Information Content Perspective Unites States of America: Mc Graw Hill Irwin. 2003.

Horngren, C., Foster, G., and Datar, S. Cost Accounting a Managerial Emphasis 10th ed. United States of America: Prentice Hall. 2001.

Horngren, C., Harrison, W., and Bamber, L. Accounting 4th ed. United States of America: Prentice Hall. 1999.

Riahi-Belkaoui, A. Accounting Theory 5th ed. Great Britain: Thomson, 2004.

Scott, W. Financial Accounting Theory 3rd ed. United States of America: Prentice Hall. 2003.

Weaver, W., and Gere, J. Matrix Analysis of Framed Structures 3rd ed. Singapore: Chapman and Hall. 1990.

Weygandt, J., Kieso, D., and Kimmel, P. Financial Accounting 4th ed. United States of America: Wiley. 2003.

Zikmund, W. Business Research Methods 7th ed. United States of America: Thomson Learning. 2003.

Managing Culture Shock with Adaptation of Students at Ciputra University, Surabaya

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ABSTRACT

Surabaya is the second largest city in Indonesia and marked as the popular destination of college students from other parts of Indonesia. Ciputra University is one example of private collages that some of its students come from eastern cities in Indonesia, which typically small and less developed. Those students experiencing a cultural gap while enrolling in the University. Students who come from different cities and cultures have to adjust to live in Surabaya as well as to the campus activities.

The primary purpose of the study was to reveal the perceptions of students enrolled in International Business Management program study at Ciputra University regarding their experiences with culture shock. The qualitative approach was employed in this study and the data were collected using in-depth interview. On the basis of the collected data from interview, the paper will discuss the nature of culture shock in which most of the interviewed students had to deal with.

In addition, having to cope with new environment, it is often more challenging and stressful than expected. Most students will experience some stress as part of this experience. How they cope with stress revealed their ability in the process of cultural adaptation.

Keywords: **Culture Shock, Cultural Adaptation, Cultural Gap**

Introduction

There are many reasons why students from small cities in Indonesia choose to study in big cities like Jakarta, Surabaya, Bandung or Yogyakarta. Besides having numbers of well-known qualified University in which the student has various number of Universities to choose from, big cities also offer a lot advantagesthat student's home town cannot offer. Some students are looking for professional training, obtain degree, learn about another culture, to enhance personal growth, to experience modern life or some combination of these reasons. Some students already have some kind of information or even been to those big cities before, others may only learn or read. Never the less, they will go through a period adjustment with the cultural gap, mayor or minor. It is natural for people who live in a new environment will experience a cultural shock, this happens because the traditions, value and customs may vary greatly from the new place compare to the place they used to live. Adjustment to the new situation is not accomplish in a few days, it takes time to do so.

My personal experience as a former students from small city allowed me to think that this issues is not an abstract issue, instead it is a real problem. It took time, embarrassment and disappointments to overcome this cultural shock process. I was aware that my personal experience years ago should not be generalized in recent condition, therefore I am using this reason to find out how culture shock is experienced by students nowadays or whether they did not experience it at all. Though each student experience is unique in his/her own way, it is still possible to derive some broad generalization and conclusion regarding the reality of cultural shock.

Surabaya, as the second largest city in Indonesia provide a lot of benefits as other big cities able to offer. Being some kind of magnet as big city, Surabaya become a popular destination for students from other cities, typically small, less developed and from eastern part of Indonesia. Ciputra University is one example of private collage in Surabaya that some of the students come from that area. Ciputra University is a University that started by Indonesian entrepreneurDr. Ir. Ciputra, Chairman of Ciputra Group. UniversitasCiputra's goal is to create a study place that is full of integrated entrepreneur values.

Those students experiencing a cultural gap while enrolling in the University. Students who came from different cities and cultures have to adjust to live in Surabaya as well as to the campus activities. According to previous research, up to 80% of students studied reported feelings of homesickness at some time with 10% experiencing such a great deal of shock that it interferes with their daily life (Stroebe, Vliet, Hewstone, Willis, 2002). This paper will analyze culture adjustment and process needed by students to adapt and the effects of culture shock on students and also the implications on the field of education.

Literature Review

According to the Oxford English Dictionary, culture gap is a systematic difference between two cultures which hinders mutual understanding or relations. Such differences include the values, behavior, and customs of the respective cultures. According to Searle (1990), Cultural gap or distance has been implicitly regarded as an important factor in adjustment to cultural change and also relates to social learning approaches to cross-cultural transitions

Kalervo Oberg, who coined the term culture shock in the mid-1950s, defines culture shock as "the anxiety that results from losing all our familiar signs and symbols of social intercourse" (Oberg, 1960/2006). According to Oberg, a person is not born with a culture but only with the capacity to understand it and use it. As we grow up in a determined cultural environment and we learn to interact socially in this environment, this culture becomes our way of life

Culture shock also describe as a disease that people suffer when they move to a new cultural environment (Chapdelaine, Alexitch, 2004). This explain inivididual's feelings of loneness when they enter a new culture. The greater the difference between cultures, the greater the degree of culture shock (Mumford, 1998). Culture shock is relatively short term feeling of disorientation, of comfort due to unfamiliarity of surroundings, the lack of familiar cues in the environment. Culture shock occurs to almost all people who cross over cultural boundaries, whether they have done so voluntarily or not.

Although many researches underline the negative experiences related to culture shock, there are some positive interpretations of it too. For instance, Rothwell defines culture shock as a cross-cultural learning experience. As a result of it individuals become aware of their own growth, learning and change. It is in this direction that the positive outcomes of culture shock should be sought. Among the best strategies to cope with culture shock is the increasing of individuals' communication competence, expressed in their knowledge as well as in their empathy (Rothwell, 2000).

Cross cultural adaptation is defined as the process of a person adapting to distinct cultural environment when encountering culture shock (Caliguri, 2000). Rieger and Wong-Rieger, according to Tung (1993), propose the process of cross cultural adaptation defined as the process of a group members adapting to a different group culture from a cultural background. Moreover, Young (2004) defines cross cultural adaptation as the entire of a phenomenon of individuals who, on relocation to an unfamiliar socio-cultural environment, strive to establish and maintain a relatively stable, reciprocal and functional relationship with the environment.

Oberg described the process of adaptation to a new cultural environment as a U-shape continuum where the following stages are usually present:

Image 1. **Oberg's U-Shape Continuum**
(Oberg, 1960/2006)

1. Honeymoon Stage: The subject has just arrived in a new environment and is fascinated. The subject feels euphoric, energetic, and enthusiastic. Everything is fantastic and the differences between the culture of origin and the new culture are fascinating.
2. Rejection or Regression Stage: The physical tiredness resulting from the previous stage appears, issues with the physical adaptation process to the target culture are detected. Family and friends are missed and a feeling of loneliness and vulnerability hovers around. The subject feels confused, tired, afraid, rejected, lonely, irritable, vulnerable and anxious every time one of these situations is faced.
3. Adjustment/ Negotiation Stage: The subject progressively adapts to the new environment and starts to develop. Of course, the subject is conscious of the differences between the culture of origin and the target culture but know s/he understands the target culture is not bad; it just has to be interpreted with different patterns.
4. Mastery Stage: Not all the subjects spend enough time in the target culture to complete this stage where the subject would become an adoptive cultural native.

Research Design

This study employed a qualitative approach. Researcher recorded interviews with five students and analyzed these interviews using qualitative methods. Those respondents are Benclin from Banjarmasin (South Kalimantan), Nio from Makassar (South Sulawesi), Yosiafrom Manado (North Sulawesi), Yansen from Ambon (Maluku) and Meifen from Kupang (East Nusa Tenggara). Interviews are done in Indonesian since those students have insufficient capability in English. Later on, interviews are transcripted and translated to English,carefully, in order to capture the true meaning of respondents' sentences. First of all, related to the idea of cultural shock, writer gathered information about the students who came from less developed cities. The second layer used to choose the respondents was the length of study at the university. Participants should at least have studied for two years, with the consideration that within the first two years, they have faced enough experiences that beneficial to enrich this research. Selected students then asked if they are willing to participate in this process. Agreed students were latter scheduled to be interviewed in campus. All participants voluntarily joined this study.

Since cultural shock is a subjective experience, a semi-structure interview was use in order to allow respondents to talk freely about the experiences. The two pages interview questions were formulated from academic-literature such as journal and non-academic literature like blogs that researcher read as the supporting material for this research. The interview sessions were done in campus area and the speeches were audio-recorded. Each interview was approximately 30 to 40 minutes long. Because this research was based on subjective student interviews, no standardized, objective-measuring tools were used. Each student answered the same questions in the same order. This is to assure validity and to avoid any possibility of misinterpretation of the information by either participants or the researcher. Finally all the data collected from the interview were studied to identify cultural shock and the adjustment respondentshad to overcome.

Findings and Discussion

Culture Shock

At the beginning of the interviews, after revealing basic information such as name, age, hometown, etc., researcher explained the nature and purpose of the study so all respondents will have a clear information about the interview and eliminating the risk of misunderstanding during the process. After researcher explained the nature of this research, which was culture shock, respondents were asked their comprehension regarding this topic. Even though they didn't have a clear definition of this term, they have some understanding as what mentioned by Ben; *"I don't really know the definition of culture shock, but in my opinion, it is a shock, experiences by someone who move to a new place. Banjarmasin is a small city while Surabaya is big, so I just felt shock."* Yosia also mentioned that; *"In my opinion, culture shock is something experiences when one individual arrive in different location and have to deal with different culture compare with the origin culture."* Similar answer mentioned by Meifen, "*In my opinion, culture shock is a kind of depression or feeling of fear to new environment.*" Based on respondents answer, they have already captured the essence of cultural shock term, with of course their own definition and language.

Respondents asked about the form of cultural shock that they engaged the most when they arrived in Surabaya and all of them gave the similar answers, related with social activities and friendship. As what Nio stated: *"People in Surabaya are more open in making friends compare to Makassar."* Yosia also mentioned that: *"The one thing that I perceived most about the culture differences between Surabaya and Manado was the language, how people communicate to each other. How people in Surabaya express their friendship are totally different with how Manado do. In Manado, we don't use offensive and rude words to show closeness and friendship among friends, but in Surabaya know for yourself."*

Yansen in his opinion shared that: *"I think the social activity is a kind of different between Surabaya and Ambon, Surabaya is more high class, sophisticated........ but in Surabaya, as big city, people are more consumptive."*

From the respond of all respondents, though how they perceived cultural shock differently one to another, all the differences are related with social activities in which how people in big city behave differently to how small city are.

Academic Environment

From academic point of view, all respondents graduated from high school in their hometown and moved to Surabaya to study in University. Of course they should have experienced a gap from high school system to university environment. Hereby are some arguments related to academic environment started with Ben: *"Totally different, in high school, teachers still willing to take care and helped students. When study in university, I have to do it all alone, I have learned to do it on my own."* Similar opinion also shared by Meifen *"Of course, education system of high school in Kupang is totally different with university in Surabaya. In ciputra, there are a lot of pressure from lectures, while in Kupang teachers have a tendency to treat students nicer, just give students assignment, presentation and that's all, no pressure indeed."*

Moreover, easy to say that the quality of education in big city like Surabaya is superior compare to small cities. Nio mentioned: *"Shock, yes, definitely. There is a huge differences in education system between Makassar and Surabaya. It is very common that level of education in big city as Surabaya is higher and better than small city like Makassar."* Yansen also added his opinion: *"......teachers in Ambon still usedphysical approach, for example when students did something wrong, teacher may slap student on the face or smoking inside a class room. My point is, the quality of educators in Ambon still low."*

Basic Needs

It was anticipated that one of manifestation of culture shock would be difficulties encountered with fulfilling basic needs. In this particular research, designed basic needs related with food, housing and transportation, since Ciputra University is a campus with no dormitory housing and insufficient public transportation to campus area. As what Ben mentioned about food: *"For food, basically not that shock, I can manage it because taste of food in Banjarmasin and Surabaya are almost the same, just a hint of differences."* Yosia also shared the same experience about food: *"I'm open to new food, so almost every kind of Surabaya food, I tasted and liked it, except for several kind of food like pecel (vegetables and rice with peanut sauce), Ijust don't like it."*

From all the responds about food, all respondents had little problem dealing with food differences and can managed the adaptation quite well in short period of time. While for housing and transportation, respondents are facing several deeper issues. As what Yosia shared in his opinion: *"I stay in boarding house outside campus area, quite far, almost 11 Km. At first, there was a shuttle car from my place to campus, but when the service was canceled, I faced problem. In west Surabaya where campus located, bus or other inexpensive public transportation are rare. There was taxi, but the cost was very expensive. Luckily latter I met a friend who has a motorcycle and not using it often, he lended it for me to use."Nio also comment: "I stay at graha family in Surabaya, not far from campus. For transportation, luckily I have my own car, therefore the only problem for me was to memorize streets is Surabaya. It was quite difficult because Surabaya is a big city, there are plenty of streets. I learn to drive in Surabaya using GPS."*

Regarding having to own and drive their own vehicle or whether the accommodation near of far from campus area, all respondent had to deal with the crowd of big city. Memorizing numbers of long and endless streets in Surabaya is one of the obstacles they faced.

Support System

All respondents agreed that support system really helped them to overcome troubles and stress related with cultural shock. Some referred to family and relatives, other got benefit from friends. As what Nio explained *"My first time in Surabaya, my father helped me to know Surabaya. I also make friends with friends from my hometown, Makassar, who stay in Surabaya, they helped me to know and explore this city"*

Yosia explained the same thing regarding problem he faced and how to adapt with it: *"I'm an introvert person, so I find it quite difficult for other to make friend with me and so do I. It was not easy for other to accept who I am. The first time I was in Surabaya, the only friendI have is the one who share the same boarding house. It was not easy for me to adapt with how youngsters in Surabaya behave. I remember when I was in the second semester at Ciputra UniversityI joined a cell group activity in church near my place. What I felt, friends from cell group helped me enough trough my rough first year."* Yansen also share the same experience: *".....families and friends really helped me to adapt with Surabaya condition."*in which proved that relatives and friends are important factors that helped all respondents to coupe with adaptation process.

Different perspective experienced by Meifen. She got help from campus personnel, in which Ciputra University provide services for student who has personal issue with its advising and counselling department. *"For the first time, I truly felt alone, there were no one for me. Luckily I received support from lectures, hmmmm, the person in counselling department, they gave me courage. Their support made me strong and I also have to believe in myself."* With sufficient and appropriate support system; it could be from friends, groups and community, family or campus personnel, students with cultural problems can receive enough support that enable them to cope with the problem or at least make the adaptation process faster.

Language

Though almost everyone in Indonesia speaks Bahasa (mother language of Indonesia), there are thousands of islands and tribes in this country which resulted in hundreds of different local languages and dialects used. All respondents came from different island as for Surabaya is located in Java Island, therefore some troubles related with language differences occurred. As what Nio mentioned: "*The language difference between Surabaya and Makassar is huge. In my opinion, the way Surabaya people speak, the dialect and intonation are funny. In other side, my Surabaya friends are often made fun on how I speak. I did not feel bad about it because Iknow their intention was just for fun only, nothing more.*"

Yansen also shared similar problem: "*Took me quite some times to adaptwith the language difference. Ambonese like to speak fast and the tone is high, so people in Surabaya may think that we talk with emotion, but it is wrong. Yeah, and also the dialect are different..........but if they are using east java language instead, I only understand 80%.*" Respondents also need to understand the terms of the "slang language" in which native speakers often communicate. Indeed, a failure to understand such language can create embarrassment and difficulties like what respondents experienced with.

Home Sick and Adaptation Process

Regarding home sick, two of the respondents; Nio and Yansen never felt it. One respondent, Nio never went back to his hometown during his 3.5 years in Surabaya. Yansen in other hand, went back once a year, but not because of home sick, as what he stated: *"No, never feel homesick. I never miss my hometown. But I went home once a year, not because I felt homesick, it just a kind of obligation, had to meet my family and helped my parent with their business."*

The other three respondents Meifen, Ben and Yosia did feel homesick but only for a while, after sometimes they were able to manage that feeling. Ben mentioned that: *"Yes, I felt it. Because I miss my hometown, my family a lot, I purchased my plane ticket 3 months prior to my holiday. But now I don't feel it anymore, the thought of going home* *is not present anymore in my mind for sure. Now I'm happy living in Surabaya. I felt homesick only at the beginning."* As what Meifen said *"Feeling of homesick usually getting worse in December near Christmas because I usually spend time with my family during that holiday.......... but last ChristmasI did not came home because I had to take the short semester. So, I felt alone and lonely."*

Yosia among four respondents felt homesick the most: *"Yes, I felt homesick couple times, quite often. So far, every 6 months, Idefinitely went back to my hometown."* Related to adaptation process, 2 of the respondents took 1-6 months to be fully adapted with Surabaya way of life. While 1 respondent, Yosia need 1 year to overcome the same process: "..........after 1 year, I feel that I was able to adapt living in Surabaya."1 particular respondent, Meifen, needs 2 years to be fully adapted: *"I started to feel accepted when I moved to the boarding house...... I made a lot of new friends and hang out with them quite often. I was not shy anymore. It took me 2 years until I have that feeling, being fully adapted."*

Conclusions and Suggestions

The result if this study indicates that students who come from small cities experience culture shock. The responses vary from confusion, withdrawal and misunderstanding. Most students will experience some stress as part of this experience, some might feel worse than others. How they cope with stress revealed their ability in the process of cultural adaptation. Respondent who adapt the fastest should considered to be more flexible in this process.

The factors that limit the conclusion of this study involved sample size and data collection. The most obvious weakness is the sample size. Future studies could enroll more participants, more than 5 respondents from a more diverse range setting. Questions asked also need to be well prepared and deeper, therefore researcher should be able to conclude what factors contribute to the level of cultural shock and adaptation process.

For the implications, as one of the respondents mentioned that she received sufficient support from Advising and Counseling department during her breakdown, University should expose the existence of this service to the new students especially who come from less developed cities more frequent and intensive, therefore students know adequateinformation where to turn to when they are dealing with cultural problems. Members of this department also should be more aggressivein their program and action to help those students since they might be scare and unwilling to share the problems by their own initiative. University might organize special program in which new students from outside Surabaya, especially from less developed cities are gathered to take a tour around Surabayaarea to get to know this city better. Since support system are strongly influential to help the students dealing with cultural shock, those students can develop their own community to help each other. University only need to make the first step to introduce them, one to another.

REFERENCES

Caligiuri, P. M. (2000). "The big five personality characteristics as predictors of expatriate's desire to terminate the assignment and supervisor-rated performance." *Personnel Psychology* 53(1): 67-88.

Chapdelaine, R.F. & Alexitch, L.R. (2004). Social skills difficulty: Model of culture shock for international graduate students. *Journal of College Student Development*, 45(2), 167-184.

Mumford, D.B. (1998.) The measurement of culture shock. *Social Psychiatry and Psychiatry Epidemiology*, 33, 149-154.

Oberg, K. (2006). Cultural shock: Adjustment to new cultural environments. Curare, 29 (2+3), 142-146. Retrieved from http://www.agem-ethnomedizin.de/download/cu29_2-3_2006_S_142-146_Repr_Oberg.pdf?c309bd31734c35b99e5db589267fd36c=0115d0. (Reprinted from *Practical Anthropology,* 7, 177-182. Copyright 1960)

Rothwell, Dan J. (2000). In the Company of Others. *An Introduction to Communication*; Mountian View, California, Mayfield Publishing Company.

Searle W., & Ward, C., (1990). The Prediction of Psychological and Socio-cultural Adjustment During Cross-Cultural Transitions. International Journal of Intercultural Relations (IJIR), 14, 449-464

Strobe, M., Vliet, T., Hewstone, M., & Willis, H. (2002). Homesickness among students in two cultures: Antecedents and consequences. *British Journal of Psychology*, 93, 147-168.

Tung, R. L. (1993). "Managing cross-national and intra-national diversity." *Human Resource Management* (32)4: 461-477

Young, Y. K. (2004). Long-term cross-cultural adaptation. In D. Landis, J. M. Bennett, & M. J. Bennett (Eds.). Handbook of intercultural training. California: Sage Publications, 2004. 337-362

The Role of Opinion Leadership and Sundanese Knowledge in Improving Intention to Use Sundanese Language in Bandung Higher School Students*

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ABSTRACT

ASEAN ECONOMIC COMMUNITY (AEC) is One form of the three pillars that comprised of ASEAN community (Pangestu, 2009). One of the forms of economic cooperation is tourism economics. This research related to the preservation of one of the cultures in Indonesia, that is the Sundanese language. To preserve the Sundanese language is to maintain the cultural diversity as one of the commodities that trade among ASEAN countries. This research motivated by the decrease of use of sundanese language in Bandung as capital city of West Java, the most province that inhabited by Sundanese, on the other hand, UNESCO declares that mother tongue is one of the culture factors that must be preserved. One of the factors that can increase the intention to use the Sundanese language is the role of Opinion Leaders, therefore, this study examines the role of Sundanese language Knowledge and Sundanese Opinion Leaders in improving intention Students in Bandung to use Sundanese language. The role is explored through the relationship amongs the three variables that examined, and the result is that two independent variables, these are Knowledge of Sundanese, and Opinion Leaderships have significant relationships with intention to use Sundanese language. Consequently the government of Bandung City should have a specific strategy to develop sundanese language, it is not just through formal education, but emphasize on the promotion of the sundanese language through opinion leaders or word of mouth communication.

***Keywords*: Sundanese Language, Bandung Students , Sundanese Language Knowledge, Opinion Leader, and Intention to Use Sundanese Language.**

Research Background

Pangestu (2009) revealed that the cooperation between the ASEAN community will be comprised of three pillars, namely the ASEAN Economic Community and ASEAN Socio-Cultural Community. This research is related to Asean Economic Community (AEC), especially the tourism economy. One element of the tourism is language; this study is expected to be able to preserve one of the Indonesian cultures, the Sundanese language. Language

**This paper is part of M.Suhendar thesis (skripsi) at Faculty of Business and Management of Universitas Widyatama Bandung* preservation is necessary to maintain the diversity of cultures that exchanges within ASEAN Community, and the diversity is one of tourism elements that exchanged amongst the countries and will benefit economically.

UNESCO (United Nations Educational, Scientific, and Cultural Organization), on 21st February 1991 declares as the world mother tongue day. The day is expected celebrate annually to promote cultural and linguistic diversity of the world. (http://badanbahasa.kemdikbud.go.id, accessed on 02/21/2014)

In 2002 and 2003, UNESCO asked an international group of linguists to develop a framework for determining the vitality of a language in order to assist in policy development, identification of needs and appropriate safeguarding measures. This Ad Hoc Expert Group on Endangered Languages elaborated a landmark concept paper entitled "Language Vitality and Endangerment", (http://www.unesco.org/new/en/culture/themes/endangered-languages/language-vitality/#topPage)

Bandung City Government has issued some regulations regarding the use of Sundanese, including the Regulation No. 2 in 2012 on the Use and Preservation of Language, Literature, and Sundanese script. One of the clauses in the regulations in 2012 no.2 is the duty of all citizens of Bandung (both officials and the public) to speak Sundanese every Wednesday. (http://www.jurnalbandung.com accessed on /2014/03/13/)

On the other hand the wishes of UNESCO and the local government in fact have not supported by the condition of the people, survey conducted by the Bandung Language Center showed that of 850 respondents couple sunda tribes, only 754 couples who can speak Sundanese. Of the 754 couples who can speak Sundanese, there are only 565 children who could speak Sundanese. From the results of these studies show that generatively there is a significant decrease in using Sundanese language from generation to generation among the Sundanese tribe. In addition, Alwasilah (2014), and Kurnia (2014) (Rector of the University of Padjadjaran in Bandung, a leading university in Bandung) revealed that the habit of using Sundanese becoming increasingly eroded due to lack of filtering of foreign culture. Most of Sundanese as citizen of Bandung prefer to use Indonesian or English. (http://www.pikiran-rakyat.com/accessed on 11/03/2014).

In the field of marketing and consumer behavior, the use of language can be categorized as an idea product, and the idea is one of the products that can be offered to the market (Kotler and Keller, 2011). The idea of using Sundanese language in this study is a product to be marketed by the Government of Bandung through certain programs, for example by developing opinion leaders (opinion leaders) who will be the trigger or marketer of ideas to use Sundanese, especially through words of mouth communication. Opinion leaders are in some circles, including among students Bandung (Zulganef, Garniwa, and Nursanti, 2007), therefore this study examines the role of opinion leaderships in promoting intention sundanese students in Bandung to use sundanese language. In addition, this study also takes into account the Sunda language knowledge because knowledge is one factor that can also encourage someone to take a specific action. Referring to cognitive theory, the opinion leadershps and knowledge can be categorized as cognitive factor or attitudes, while intentions using Sundanese language is a conative factor. (see Ajzen, 1988). The research model depicted in figure 1.

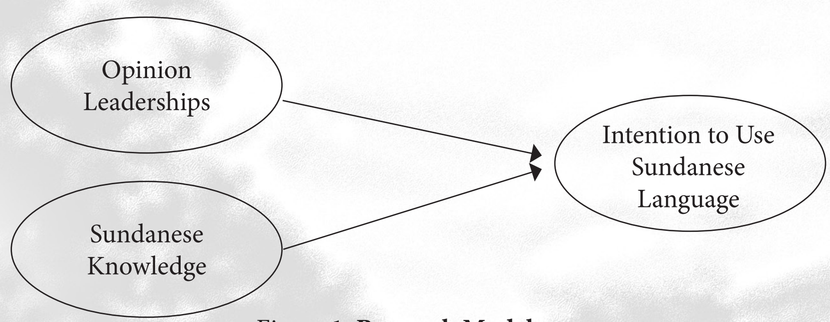

Figure 1. **Research Model**

Literature Review and Hypothesis

Opinion Leader

Opinion leader theory originated from the writings of Lazarsfeld who put forward the theory of two stages, namely that the steering of voting flows from mass media to opinion leaders (first stage), and from opinion leaders to the public (second stage) (Liu, 2007).

Schiffman and Kanuk (2000: 395) defines opinion leadership (word of mouth communication) as a process in which a person (the opinion leader) informally influences the actions and attitudes of others, which may be an opinion seekers or merely opinion recipients . The main characteristics of these effects is the nature of interpersonal and informal and takes place between two or more individuals, that none of them represent a source of commercial sales that can take advantage of a sale

Knowledge

Bakhtiar (2005: 85) cited Gazalba who defines knowledge as : what is known or the result of knowing work. The knowing work is the result of a familiar, conscious, conviction, understanding, and intelligence work. the knowledge is all of belongs to or contents of mind. therefore knowledge is the result of the process of human effort to know.

Suriasumantri (1999: 2) revealed that knowledge is the product of the thinking activity which is the torch and cement of civilization in which man finds himself and live life more perfect.

The knowledge definition according Gazalba and Suriasumantri illustrates that knowledge is something that motivates human behavior. In addition, The essence of "knowledge" in society is the development of knowledge, namely the creation of new meaning, value added generated by the creative process of the information available by the people and is measured by the application of a greater and / or new / usefulness of information that is processed, compared to the information initially available. If this is the only criterion, then all people can be classified as a knowledge society, in some form of "new meaning" is always made (United Nations; 2005).

Cognitive Theory

The research model examined in this study is the theory of information processing model of cognition, therefore in this study the authors use the theory of cognition as an overarching grand theory research model. The theory reveals that the mental processes of a human being is a treatment (process) information in mind, as well as a computer (Flavell et al., 1993). Peter and Olson (1999) and Dharmmesta (1999) looked at the mental process consists of three elements, namely cognitive, affective, and conative. These three elements are interconnected with each other like a circle (cycle).

Several authors and researchers in the fields of consumer behavior and marketing uses this approach in his study of mental processes, eg Eggert and Ulaga (2002) with its impact mediated models, Fishbein and Ajzen (1975) with their Theory of Reason Action, and Wakefield and Blodgett (1999) with the customer response to service quality factors models. The researchers investigated the relationships between variables that represent elements of cognitive, affective, and conative.

Mediated impact model stated by Eggert and Ulaga (2002) (Fig. 2.) shows that relationship of service attributes as an antecedent of customer satisfaction, and conative variables as the consequent of customer satisfaction. It is quiet clear that Eggert and Ulaga (2002) divide the variables studied into three-dimensional type of attitude, namely the cognitive dimension, affective, and conative. Eggert and Ulaga (2002) categorize the perceptions of service attributes as cognitive variables, consumer satisfaction as an affective variables, and the repurchase intention, an alternative search, and word-ofmouth as conative variables.

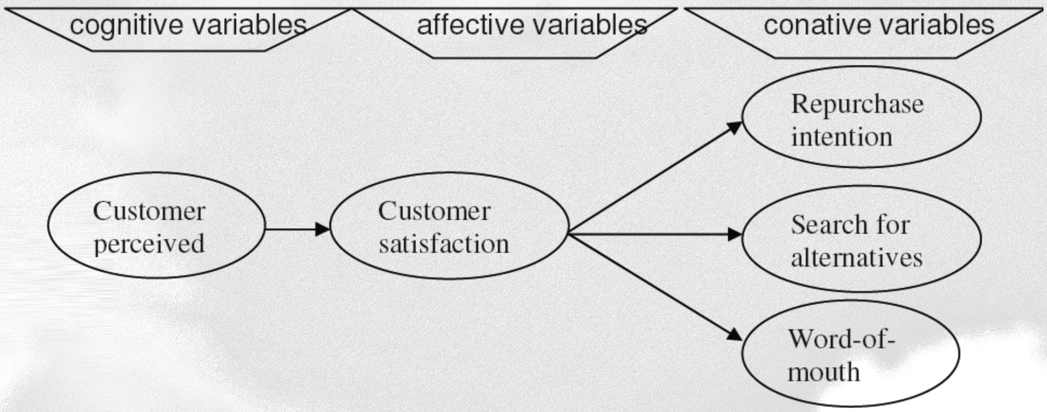

Figure 2. Mediated Impact model of Eggert dan Ulaga (2002)

Eggert and Ulaga (2002) reveal that cognitive variables (customer perception of value) have significant relationship with affective variables (customer satisfaction), then customer satisfaction has significant relationship with conative variables (repurchase intention, search for alternatives, and word of mouth)..

Eggert and Ulaga (2002) research shows that Repurchase Intention is conative element, while satisfaction is the affective element. On the other hand, Dharmmesta (1999) reveals cognition theory as three basic concepts that almost use in the field of consumer behavior, those are cognitive, affective, and conative. The three basic concepts are one of some paradigms of research in consumer behavior; consequently, the customer satisfaction in Eggert and Ulaga (2002) work can be considered as one of the affective variables that give consequences on the Repurchase Intention.

Based on the cognitive theory, and taking into account that the leaderships opinion and knowledge are a reflection of cognitive while intentions using Sundanese language as a reflection of conative, then the hypothesis of this research are:

H1: There is positive relationship between Opinion Leadership With Intention To Use Sundanese Language.
H2: There is positive relationship between Sundanese Language Knowledge and Intention to Use Sundanese.

Research Design

This study uses a survey of students in Bandung which is the capital of West Java province, a province that inhabited by Sundanese ethnic majority in Indonesia. Survey method used is based on the consideration that the data is ex post-facto. Ex post-facto data is data that is used to examine the relationship several independent variables with the dependent variable that has occurred (Singh, 1986: 361).

Another reason is due to conduct survey research of this study is to test several hypotheses, draw conclusions from past experiences or behavior of respondents (Neuman, 2000: 250). Samples were taken of 100 respondents. According to Malhotra (2005: 368-369), that the sample size or population respondents with an infinite amount of at least four or five times the number of sub-variables. From the explanation above, the number of samples in this study were 100 respondents.

Sampling was carried out through non-probability method, the method of sampling is used due to the population numbers can not be estimated (Singh, 1986: 332). Rank Spearman correlation technique is used to analyze the data. The self administered questionnaires are distributed to 125 respondents in four Higher Educational

Institution in four regions of Bandung City, i.e. Northern of Bandung, Southern of Bandung, Western of Bandung, and Eastern of Bandung. To separate sundanese and non-Sundanese students, the authors put the first question in the questionnaire regarding "your tribe is ...." . The respondents data which is analyed is only the sundanese students.

Result

The validity of each item statement can be seen in the value of Corrected Item-Total Correlation of each item statement. Based on calculations of correlation coefficient (r) is known that all item correlation of the variables is greater than r table or 0.195, then all of the instruments is valid

Table 1 and Table 2 show realibility test of the variables examined which are describe that allpha cronbach all variables are greater thatn 0.7, therefore all of items in the instruments (questionnaires) are reliable

Table 1. **Reliability test of Opinion Leader and Knowledge**

Sub variable	Cronbach's Alpha	N of Items
opinion leader	0.814	7
Knowledge	0.719	5

Source: Data

Table 2. **Reliability test of Intention to Use Sundanese**
Reliability Statistics

Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items
.793	.786	4

Source: Data

Table 3. **The correlations**

			OL	KNOW	INT
Spearman's rho	OL	Correlation Coefficient	1.000	.357**	.482**
		Sig. (2-tailed)	.	.000	.000
		N	124	124	124
	KNOW	Correlation Coefficient	.357**	1.000	.394**
		Sig. (2-tailed)	.000	.	.000
		N	124	124	124
	INT	Correlation Coefficient	.482**	.394**	1.000
		Sig. (2-tailed)	.000	.000	.
		N	124	124	124

**. Correlation is significant at the 0.01 level (2-tailed).

Table 3 shows that all correlations that examined in this research are significant at 0.00 level. Correlation coefficient of Opinion Leader and Intention to Use Sundanese Language is 0.482, and Knowledge and Intention to Use Sundanese is 0.394. The contribution of each independent variable to dependent variable are : (0.4822) = 23.23% for Opinion Leader and (0.3942) = 15.52% for Knowledge. It is shows that the contribution of Opinion Leader is greater than Knowledge in detrmining of Intention to use sundanese language.

Conclusion, Discussion, and Recommendation

The objective of this research is to examine the role of opinion leader in preservation of one cultural element in Indonesia, especially in the West Java Cultures, that is Sundanese Language. To meet the objective The authors developed two hypothesIs concerning the correlations amongs opinion leader, knowledge, and intention to use sundanese language.

The authors expected that the two indepenent variables have correlations with intention to use sundanese language, and they are. The Data analysis shows that the two correlations are significantly supported by the data. It shows that Opinion leader has significant role in determining using sundanese language in Bandung sundanese students.

The contribution of opinion leaderships to intention to use sundanese language variable is greater than knowledge, the contribution of opinion leaderships is 23.23% while knoledge is 15.52%. It means that opinion leaderships as a part of external locus of control (consumers external factor) is more detrmined than knowledge as part of internal locus of control (consumers internal factor).

This research shows that the corellations amongs thre variables, those are opinion leadership, knowledge, and intention to use sundanese language are supported by the data. The results show that Opinion Leader has a significant role in influences the intention to use sundanese language, it means that Opinion Leader in Higher Students of Bandung can be used as mediator in preserving the sundanese language.

The correlations coefficient between opinion leadership and knowledge is 0.357 and significant at level 0.000. This suggests that the opinion leaderships that associated with intention to use Sundanese language is also associated with knowledge. Thus it can be concluded that opinion leaders have a very important role in the development of Sundanese language in Bandung.

Based on these results, the authors make some recommendations to the local government of Bandung city to preserves Sundanese Language as one of tourism elements as follows:

1. emphasizes the use of Sundanese language development through policies that empower opinion leaders in Bandung, for example using a promotional mix through community leaders as well as the original artist or actor widely known as Sunda and good and well users of Sundanese language
2. increase public knowledge about the importance of preserving the Sundanese language as an important part of a culture also through the role of opinion leaders

REFERENCES

Alwasilah, Chaedar (2014) Vice Rector of Academics of Universitas Pendidikan Indonesia, "Keberadaan bahasa Sunda mesti diberdayakan agar kelestariannya bisa dipertahankan". (http://www.pikiran-rakyat.com/ diaksespada 11/03/2014)

Bakhtiar, Amsal (2005), *Filsafat Ilmu*, PT.Raja Grafindo Persada, Jakarta

Dharmmesta (1999) Riset Konsumen dalam Pengembangan Teori Perilaku Konsumen dan Masa Depannya," *Jurnal Ekonomi dan Bisnis Indonesia*, Vol.14, No.1, 60-70

Eggert, A., and W. Ulaga (2002), "Customer perceived value: a substitute for satisfaction in business markets?" *Journal of Business & Industrial Marketing*, Vol. 17, No. 2/3, 107-118

Fishbein, M., and I. Ajzen (1975), *Belief, Attitude, Intention and Behavior: An Introduction to Theory and Research*, Addison-Wesley Publishing Company,Reading, Massachusetts.

Ajzen, I. (1988), *Attitudes, Personality and Behavior*, Open University Press, MiltonKeynes.

Flavell, J. H., P.H. Meller, S.A. Miller (1993), *Cognitive Development,* Prentice-Hall Inc., Englewood Cliffs, New Jersey. P.3.

Liu, Frank C.S. (2007), "Constrained Opinion Leader Influence in an Electoral Campaign Season: Revisiting The Two Step Flow Theory with Multi-Agent Simulation," *Advances in Complex Systems*, Vol.10., No.2, 233-250, Wordl Scientific Publishing Company

Kurnia, Ganjar, http://www.unpad.ac.id/2014/05/lagu-merupakan-sarana-efektif-ajarkan-bahasa-sunda-pada-generasi-muda/

Kotler and Keller (2009), *Marketing Management*, Pearson International Edition, 13 edition, p.46-47

Maholtra, Naresh K. (2005), *Marketing Research: An Applied Orientation*, Prentice Hall, Inc. P.368-369

Neuman, W. Lawrence (2000), *Social Research Methods: Qualitative and Quantitative Approaches*, Allyn and Bacon, Boston,p. 250.

Pangestu, M. E. (2009), "Competitiveness Towards Asean Economic Community," *Journal of Indonesian Economy and Business*, Volume 24, Number 1, 22 – 32

Peter, J. P., and J. C. Olson (1999), *Consumer Behavior and Marketing Strategy*, McGraw-Hill International Editions, Boston

Schiffman, Leon G. and Leslie Lazar Kanuk (2000), *Consumer Behavior*, Prentice Hall, Inc., p.395

Singh, A. K. (1986), *Tests Measurements and Research Methods in Behavioural Sciences*, Tata McGraw-Hill Publishing Company Limited, New Delhi

Suriasumantri, Jujun S. (1999), "Tentang Hakekat Ilmu: Sebuah Pengantar Redaksi," in Jujun S. Suriasumantri (ed), *Ilmu dalam Perspektif*, Yayasan Obor Indonesia.(United Nations; 2005).

Wakefield, K. L. and J. G. Blodgett (1999), "Customer Response to Intangible and Tangible Service Factors," *Psychology & Marketing*, Vol.16, January (1), 51-68

Zulganef, Garniwa, and Nursyanti (2007) "Identifikasi Keberadaan Kepemimpinan Opini *(Opinion Leadership)* Pada Produk Fesyen, Perguruan Tinggi, Dan Politik" in proceeding of *The 1st PPM National Conference on Management Research* "Manajemen di Era Globalisasi", Sekolah Tinggi Manajemen PPM, 7 November 2007 http://repository.widyatama.ac.id/xmlui/handle/123456789/1191

http://badanbahasa.kemdikbud.go.id, accessed on 02/21/2014

http://www.unesco.org/new/en/culture/themes/endangered-languages/language-vitality/#topPage

http://www.jurnalbandung.com accessed on /2014/03/13/

http://www.pikiran-rakyat.com/accessed on 11/03/2014

Cross-Culture Education in AEC 2015: University Readiness in the Face of Challenges and Opportunities

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ABSTRACT

ASEAN Economy Community (AEC) will come to reality in the year 2015. Following this liberalization, all ASEAN countries will have the same opportunity of people development thru service goods, capital investment and skilled labour. This single large market system is a possibility for skilled labor to move free from one country to another. There are two popular terminology in skilled labor movement principal namely; Movement of Natural Persons (MNP) and Facilitated Entry. Indonesia will face serious problems if the nations labor skill is not ready. Based on Statistics Indonesia (BPS – Badan Pusat Statistik) released data on Mei 2014, shows only 7% of the total labor in Indonesia are ready. Which means there is still open oppurtunity for foreign labor to work in Indonesia. That phenomenon is both a challenge and opportunity for Universities in Indonesia like UPN "Veteran" Jakarta, to prepare skilled ready graduates in facing the liberalization market of AEC 2015.

Keywords*: *AEC policy, challenges and opportunities

Introduction

ASEAN Economic Community (AEC) will come into force in 2015, aiming to achieve an integrated economic order imposing a open market system or an open single market for trade in good, services, investment, capital and skilled labor among ASEAN countries.

Particularly in the field of manpower, displacement between one country to another will certainly happen. Liberalization of employment knows two principle terms of skilled labor migration, namely Movement of Natural Persons (MNP) and Facilitated Entry. According to the first principal, skilled labor mobilizes within a certain time frame either as self-employed individuals or as employees of multinational companies. MNP includes business visitors, investors and traders who conducts transactions and investments, moved labor in multinational companies, also professionals such as doctors, nurses, lawyers, accountant, information technology professional engineers. The second principle is controlled mobility, meaning that this mobility is not totally free.

The role of Indonesian higher education institutions becomes vital to help face challenges and strategically seize labor market opportunity in AEC 2015. Based on a report shared by the World Bank, Indonesia owns quite a huge gap in terms of skilled labor quality in the use of English (44%), computer (36%), behavioral skills (30%), critical thinking skills (33%) and basic skills (30%). What is worse than that only 7% of Indonesian workers have higher education background, which is such a disproportion? In May 2004, that data is strengthened by what Statistics Indonesia (BPS) informed, that the quantity of educated workers in Indonesia holding higher education background is 12,58 million people or only 10,03% from Indonesia's total workforce of 125,32 million. That is 69,17% from Indonesia's total population and 60% of ASEAN Countries population all gathered together.http://www.scribd.com/doc/219549095/Analisis-Kesiapan-Indonesia-Dalam-Menghadapi-ASEAN-Economic-Community-2015

Liberalization of free trade will indirectly affect increasing number of new jobs. However, if it is faced with challenges arising from quality and quantity of available skilled labor, Indonesia will certainly attract lots of interest for skilled workers from other ASEAN countries like Singapore, Malaysia and Thailand. http://www.martinafiaub.wordpress.com/2013/06/13/sudah-siapkah-indonesia-menghadapi-asean-economic-community-2015

This situation will become a problem for higher education institutions in Indonesia. Those institutions are required to work harder in preparing the availability of large quantity skilled workforce and their ability to speak English. Pembangunan Nasional "Veteran" University (UPNV), as one of the private universities in Indonesia, must find solutions for such challenges and use the opportunity positively by strategizing programs in preparing the availability of superior workforce which will be needed to fill future labor market needs.

Indonesia's Prospective aOpportunities in AEC 2015

With liberalization of capital investment, the ASEAN member countries will benefit from economic growth and emerging jobs from new business of small, medium, and multinational enterprises. SMEs are accounted for 96% of enterprises, and between 50-85% of domestic employment across ASEAN.

Based on the Indonesian Trade Ministry data in year 2009, the level of economic development amongst ASEAN Member Countries are still diverse. ASEAN-6 countries and ASEAN-4 countries demonstrate the difference of their economic levels, however this differentiation has distinguish the intended intergration of ASEAN. When examined more specifically, following are the rate of progress among ASEAN Member States: (i) group of developed countries (Singapore), (ii) group of dynamic countries (Thailand and Malaysia), (iii) group of middle-income countries (Indonesia, Philippines, and Brunei), and (iv) group of undeveloped country (CLMV). http://ditjenkpi.kemendag.go.id/website_kpi/Umum/Setditjen/Buku%20Menuju%20ASEAN%20ECONOMIC%20COMMUNITY%202015.pdf

In dealing with SMEs, the government of Singapore and Malaysia are more prepared because they have been fully aware of the challenges and opportunities that AEC brings. The two countries are putting effort both in talent planning and resources to better support their SMEs. This is different from Indonesia, although the Indonesian government has began to develop more effective plans to integrate and support its' SME, it is obvious that these plans are probably behind where it needs to be. http://www.business-in-asia.com/asia/asean_economic_community.html

As a country with the biggest population (40%) amongst other ASEAN country members, Indonesia is expected to be able to play an important role especially in supplying skilled labor. Furthermore, Indonesia holds confident in the benefit of AEC 2015, which will conceptually boost the economic growth of not only Indonesia but also other ASEAN countries, and provide employment opportunities that will ultimately improve the welfare of all countries in the ASEAN region. http://ditjenkpi.kemendag.go.id/website_kpi/Umum/Setditjen/Buku%20Menuju%20ASEAN%20ECONOMIC%20COMMUNITY%202015.pdf

Indonesia is a potential investment destination. Several basic factors make the country essential as an investment destination:

a. Its 42 million small and medium-large enterprises as a backbone of Indonesia's economy
b. The soil is rich and fertile
c. Very large population (230 million) which has become potential markets and competitive workforces
d. Strategic location (located between several vital international sea transportation lanes)
e. Open market economic and the current free money system (http://www.bkpm.go.id/index.php/main/content/114)

Current Situation and Challenges of AEC 2015

- Current Situation

ASEAN countries have been concentrating in developing hard infrastructure and soft infrastructure. Hard infrastructure is needed to ease people movement from one country to other country. Soft infrastructure, for instance fluent English, is also needed in facing AEC 2015. Several former British colonies such as Singapore, Malaysia and the Philippines will have an advantage over other ASEAN countries like Indonesia. This means learning English is becoming increasingly important.

According to the World Bank report as written in page 2, Indonesia has not given enough attention in improving English skills throughout its education system. Now, Indonesia is in a somewhat weaker position to countries such as Thailand and Vietnam who have given increased attention to this, also gaining benefit from having western alphabet that makes learning English both reading and writing easier than in Indonesia.
http://www.business-in-asia.com/asia/asean_economic_community.html

- Higher Education in Facing the Challenges of AEC 2015

Besides its positive impacts, liberalization of investment might also have negative impacts we should be aware of and anticipate. Implementation of AEC 2015 certainly will bring investors from other ASEAN countries to Indonesia. Manpower from other ASEAN member countries is permited to enter Indonesia's employment industry. Seventh sector works will impact doctors, nurses, engineers, finances, researchers, dentists and architects.

But Indonesia also face the threat because people from other ASEAN countries will be able to come to Indonesia to search for job opportunities, they will be free to enter and work in Indonesia, meaning job opportunities that exist in Indonesia will be contested by more people. If the Indonesian workers do not prepare and enhance the competitiveness of the workforce is not impossible that the Indonesian labor market will be dominated by foreigners. (Maesaroh, (2013); Izzudin (2013).

The extent to which Indonesian people can compete in the country or in the country itself is highly dependent on the quality of human resources nva. The quality is closely related to the competency of the Indonesian workers. Skilled workforce competencies gained from the development of one of them special abilities through education in the university. This suggests that university education has an important role in creating graduates who have high competence or skilled both in the international language (English) and intercultural, because according Frankenstein & Hosseini, Adler, Black, in Bhawuk & Brislin, (1992), intercultural can be seen as the most quality determines the success of an employee who will be assigned to work abroad, the same opinion expressed by Panggabean, (2004) which says that interculturai Sensitivity 'is one of the best indicators to predict the performance of an employee working in cross-cultural teams.

The existence of differences in beliefs and values held by each culture will cause vulnerable to interpersonal conflict, so there intercultarral Sensitivity believed to facilitate more effective interpersonal interactions that cross-cultural teams can produce maximum performance (Maznevski in Lloyd & C. Hartel, (2010). From these findings indicate that the development of quality intercultarral sensitivity is very important for someone who works in the organization of cultural meeting place of various countries. In addition, English language skills are also absolutely necessary in relation to the AEC in 2015 due to labor from employees, managers, marketing agencies and even insurance can also cross country. The high demand for Indonesian companies to employees, who have a proficiency in English, can be expected to be met by an employee or foreign students from ASEAN countries. The same thing, it could be an opportunity for the Indonesian people to work in another country, if they can speak English well.
(www.howmoneyindonesia.com)

As a researcher that engaged in the educational field, Shaftel expresses that higher education students's English language skill and intercultural ability of facing work rivalry must be studied. According to Shaftel and Ahluwalia (2007), higher education students who are able to successfully developed their intercultural competence in the form of tolerance towards individual differences or the ability to change their behavior by understanding people from different cultural background, not only will become more successful and appreciated in their workplace but also are in high demand by companies, compared to students who are not able to have intercultural competence during their undergraduate lectures.

In this case researcher will study the process of English language learning also the intercultural ability of higher education students in UPN Veteran Jakarta.

Review of the Literature

Hammer, Bennett and Wiseman (2003) defines intercultural as someone's cognitive capability to distinguish also experience culture differences. The intercultural development sensitivity model owned by Bennett (1998, 2004) is named Development Model of Intercultural Sensitivity (DMIS). In general, DMIS explains that intercultural sensitivity is a quality in a person who develops, and such development will take place in six continuous and gradual phases. The six development phases of intercultural sensitivity, from the lowest to the highest level are; Denial, Defense, Minimization, Acceptance, Adaptation and Integration. Furthermore, Benentt's Development Model of Intercultural Sensitivity (DMIS), in adopted in this research. As a matter of fact, research on the Development Model of Intercultural Sensitivity (DMIS) has been done many times, for example Wolfgang Fritz, Antje Möllenberg, (2002), Peggy Porterfield Bayles (2009), Chen & Starosta (2000), Anderson, Lauton, Rexeisen, and Hubbard, (2006).

Research Method

The intercultural sensitivity is operated with construct by the researcher based on Bennett's (2004) Developmental Model of Intercultural Sensitivity (DMIS) theory, which has six scales of measurement that is Denial, Defense, Minimization, Acceptance, Adaptation, and Integration. But Integration stage will not be done, because from the researcher's point of view it does not represent the Faculty of Economics students of UPN Veteran Jakarta.

The expected result is respondent's intercultural sensitivity score from scale Denial (indicator 4), Defense (Indicator 3), Minimization (Indicator 3), Acceptance (Indicator 3), and Adaptation (Indicator 3), with a total of 32 questionnaire items measured using 5 point Likert.

SCALE	INDICATOR
Denial	1. believing that his/her belief system and cultural value are the most righteous and realistic belief system in the world. 2. believing that his/her cultural customs are the most righteous and realistic customs in the world. 3. uninterested in the facts that there are cultural differences 4. uninterested and unable to appreciate different cultures
Defense	1. justifying his/her opinion and believing that his/her culture is the best one in the wold 2. feeling insecure and threaten by other cultures 3. stereotyping other cultures negatively
Minimization	1. minimizing cultural differences due to recognizing physical similarities of human race [physical universalism] 2. minimizing cultural differences due to universally occurring abstract concept [transcendence universalism] 3. attempting to alter other people behavior to fit his/her cultural perspective
Acceptance	1. considering that his/her culture is one of possible perspective towards the world within the same level of complexity 2. considering people from other cultures as distinctive yet equal as human race 3. able to indentify how cultural differences operate in various human interaction
Adaptation	1. able to perceive circumstances from other cultural perspective 2. able to behave accordingly to other culture 3. able to empathize, i.e. to view from many different cultural perspective [perspective taking]

Whereas English language capability variable is measured with prediction toefl, with obtained data from the Lembaga Bimbingan Karier (Labimkar) UPN Veteran Jakarta, according to the respondent who were sampled. A total of 120 respondent samples are randomly taken from the sixth semester students of the Faculty of Economics Management class - UPN Veteran Jakarta. To test the validity of intercultural sensitivity measuring instrument, contruct validity is used. To test the reliability of intercultural sensitivitu measuring instrument, researcher is using the Cronbach Alpha internal consistency examination. The result for all items of the contruct validity in each stages are the Denial Cronbach's Alpha in the amount of 0,856, defense α 0,776, minimization α 0,874, acceptance α 0,874 and adoption α 0,863. That result is all valid.

A descriptive analysis is used not only to illustrate the subject deployement in each intercultural sensitivity stage, but also to illustrate student's ability of speaking English.

Result and Discussion

Result data taken from the research's subject, which is the Faculty of Economics students from UPN Veteran Jakarta, then processed descriptively based on the intercultural sensitivity stage.

Tabel 2. **Result of Students's Intercultural Sensitivity**

Stages of Intercultural Sensitivity	N	%
Denial	-	-
Defense	8	7
Minimization	40	33
Acceptance	68	57
Adoption	4	3
Total	120	100

From the above table it is visible that 68 people (57%) are in the Acceptance stage, which is a stage where someone has accepted and appreciate the fact that there are differences between the elements of their culture with elements of other foreign cultures. Whilst the smallest number of subject group, that is 4 people (3%) are in the Adoption stage, which is a stage where someone is actualy able to accept the fact that Indonesian culture is essentially different from the foreign culture but remains equal to each other. This acceptance of differences enables them to appreciate also respect the belief value and belonging patterns of a foreign culture.

Research results on the overview of intercultural sensitivity based on Bennett's (2004) DMIS theory shows that the majority of the Faculty of Economic students are in the Acceptance stage. When examined with Bennet's (2004) opinion about the development of intercultural sensitivity, a person with ethnocentric intercultural sensitivity will make an assessment towards something orienting to one's own cultural values and beliefs. If the environment supports the person to dissolve in a multicultural life then most likely what will happen is intercultural sensitivity quality development, which tends to be more ethnorelative (the Acceptance and Adaptation stage). The person will feel comfortable with the standards of various cultures so one is able to adjust their assessment and behavior according to the context of other cultures (Hammer and friends, 2003). UPN Veteran Jakarta as an educational institution has continued to support multicultural environment for the intercultural sensitivity development of students, to move towards the ethnorelative stage, which is Acceptance and Adoption.

Students of UPN Veteran Jakarta are very heterogeneous, because the University's acceptance policy for new students is not viewed based on their nationality, cultural, religious, racial and ethnic backgrounds. Visits and student exchange from other countries in UPN Veteran Jakarta, particularly in the Faculty of Economic, has made cultural communications occur. This is inline with the research result of Banos (2006) and McMurray (2007), stating that experiences abroad can affect one's intercultural sensitivity quality. When someone travels beyond his own country, that person will be in contact with the values, beliefs and behavioral patterns of a different culture. This will force changes in one's point of view to the stage of a more ethnorelative intercultural sensitivity development. The same analisis, experiences of traveling to another country is believed by the researcher to became one of the cause why the majority of the Faculty of Economic students are able to develop their intercultural sensitivity up to the Acceptance stage.

Another thing needing to be done is reviewing the total overview of subject deployement in the Denial and Minimization stages. The research result shows no Denial stage. This condition comes to no surprise, since all respondent lives in Jakarta, a megapolitant city where various products and foreign culture gathers. This has indirectly impacted student's intercultural sensitivity stage; the majority of them are in the Acceptance stage, then Minimization stage, and none are in the Denial stage. This is a result of believing that humans physical similarity is causing development of their intercultural sensitivity towards an ethnorelative stage.

Here is a result of the Prediction Toefl test taken from 120 students being sampled for their English language ability:

Tabel 3. **Prediction Toefl Result**

Skor Toefl Mahasiswa

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	343	5	4,2	4,2	4,2
	347	5	4,2	4,2	8,3
	353	17	14,2	14,2	22,5
	357	5	4,2	4,2	26,7
	363	6	5,0	5,0	31,7
	367	30	25,0	25,0	56,7
	380	6	5,0	5,0	61,7
	417	6	5,0	5,0	66,7
	437	6	5,0	5,0	71,7
	453	28	23,3	23,3	95,0
	480	6	5,0	5,0	100,0
	Total	120	100,0	100,0	

From the above table it is showed that only 34 people (28%) scored above 450. In reality, to be able to apply for an employement position (whether to be a civil servant or private sector's employees), the required minimum score is 450 (www.toeflindonesia.com), even more if working abroad is a target. This is of course is becoming such a concern, because English is an absolute requirement that must be mastered in the labor competition after AEC 2015.

To explore further the causes of why majority of the students have low toefl score, researcher had interviewed 5 subject identified of having the lowest scores. Researcher gained information that they have not done or only had very minimum activites where English is used, for example watching a movie, reading and communicating in English. Their interaction with English is only during a collage lecture. This finding has indicated that students with less English activities will find it harder to undertake their Prediction Toefl, since they are not accustomed with reading or listening to conversations in English.

Conclusion

From the results of 120 subjects, it is concluded that the majority of the Faculty of Economic UPN Veteran Jakarta student's are in the Acceptance stage of Intercultural Sensitivity. No data is found in the Denial stage. Bellow the Acceptance stage is the Minimization stage with 40 respondents, whilst only 4 people are in the Adoption stage.

The important general conclusion from this research is that the majority of the Faculty of Economic, UPN Veteran Jakarta students has intercultural sensitivity at the Acceptance level, a stage where one can accept the fact that foreign culture is different from Indonesian culture, however are stil equal. There are able to appreciate and respect values, beliefs and behavior patterns of other culture. In other words, if AEC comes to reality in the year of 2015, where different culture enters Indonesia, this will not become a problem for the student.

However, as shown in the English language skill scores of 120 researched respondents, only 28 of them are above 450. This indicated that students' readiness in using English is very weak. Graduates of the Faculty of Economic - UPN Veteran Jakarta will not be ready to face the situation.

Therefore, what UPN Veteran Jakarta needs to do is to make strategic moves that can be implemented in a special target to optimaly seize market opportunities through;

a. Prioritizing curriculum development orientating on skilled labor competition, with the ability in English both for students and lecturer.

b. Building an international standard foreign language laboratorium
c. A change of work culture into a more productive one by leaving the traditional, feudalistic and bureaucracy work ethic, which has became an obstacle for productive work.
d. Stronger cooperation development between higher education institutions, nationally and internationally to improve lecturer's and students competency

REFERENCES

Anderson, P.H., Lawton, L., Rexeisen, R. J., and Hubbard, A. C. (2005). Short-term study abroad and intercultural sensitivity: A pilot study. Intercultural Journal of Intercultural relation, 30, 457 -469.

Banos, R V. (2006). Intercultural sensitivity of Teenagers: A Study of Educational Neuassities in Catalonia Iniercultural Communication Studies, 15 (2). Diakses dari httpzllwww.uriedu/iaicslcontent/ZOOGVl 5112/

Bennet, M.J. 1998. Intercultural Communication : A Current Perpective in Bennett,M.J (Ed), Basic Concept of Intercultural Communications; Selected readings, Yarmount.ME : Intercultural Press

Bennet, M.J. 2004.Becoming Interculturally Competent, in Wurzel. J. Toward Multiculturalism : A Reader in Multicultural Education (2nd. Ed. 62-77), Newton. MA

Bhawuk, D.P.S., & Brislin, R. (1992). The measurement of intercultural sensitivity using the concepts of individualism and collectivism. Intercultural Journal of Intercultural Relations, 16, 413-436.

Chen, G.M., & Starosta, W. J. 2000. The development and validation of the intercultural communication sensitivity scale. Human Communication, 3, 1-15.

Christopher W. Runckel (nd)

Diki Hermawan on Apr 22, 2014. Analisis Kesiapan Indonesia Dalam Menghadapi ASEAN Economic Community 2015

http://www.scribd.com/doc/219549095/Analisis-Kesiapan-Indonesia-Dalam-Menghadapi-ASEAN-Economic-Community-2015

Fritz Wolfgang , Möllenberg Antje, Chen, GM 2002. Measuring Intercultural Sensitivity in Different Cultural Contexts, Intercultural Communication Studies XI: 2

Hammer, M.R. Bennet, M.J & Wiseman, R. 2003. Measuring Intercultural Sensitivity : The Intercultural Development Inventory. International Journal of Intercultural Relations , 27, 421-443 http://ditjenkpi.kemendag.go.id/website_kpi/Umum/Setditjen/Buku%20Menuju%20ASEAN%20ECONOMIC%20COMMUNITY%202015.pdf

http://www.bkpm.go.id/index.php/main/content/114

http://www.business-in-asia.com/asia/asean_economic_community.html

Izzudin, 2013, Agustus 27, Muhaimin minta mahasiswa siap hadapi AEC 2015, http//ekbis.sindonews.com. Diakses April 2014.

Llyod,S & Hartel,C, 2010. Intercultural Competencies for Culturiverse Work Teams, Journal of Managerial Psychology, 25(8), 854-857.

Maesaroh, 2013 Agustus 27, Hadapi AEC 2015, Tenaga RI Masih Terkendala Bahasa, http//economy.okezone.com Diakses April 2014.

Martina Purwaning Diah - Juni 13, 2013. Sudah Siapkah Indonesia Menghadapi ASEAN Economic Community 2015?

http://www.martinafiaub.wordpress.com/2013/06/13/sudah-siapkah-indonesia-menghadapi-asean-economic-community-2015

Mc Murray, A.A 2007. Measuring Intercultural Sensitivity of International and Domectic College Students : The Impact of Intercultural Travel (Thesis not publication, University of Florid, Amerika Swrikat.

Memilih PBT atau IBT (nd), www.toeflindonesia.com

Panggabean,H, 2004 Characteristic of Intercultural Sensitivity. Jakarta : Fatoklesar

Peggy Porterfield Bayles, 2009. Assessing the Intercultural Sensitivity of Elementary Teachers in Bilingual Schools in a Texas School District, A Dissertation Submitted to the Faculty of the Graduate School of the University of Minnesota

Shaftel J. Shaftel, T & Ahluwalia. 2007. International Educational Experience and Intercultural Competence, International Journal of Business and Economics 6 (1), 25-34

Cultural Barriers to International Cooperation on Innovation Training: The Case of I-SMEs Project in Vietnam

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ABSTRACT

As innovation are increasingly important, training of business innovation is becoming popular. In developing countries like Vietnam, the training mostly involves foreign partners as they provide experience and knowledge that domestic lecturers are lack. Through a completed Finnish-Vietnam joint training projects on business innovation, we analyzed the feedbacks of all participants, foreign and domestic lecturers. The results shown that the international cooperation is among critical factors to deliver innovation to business in developing countries. However, there are barriers to a effective cooperation such as language, motivation and business context. It seem that all barriers are coming from cultural differences and can be solved by building trust through long-term strategic partnership.

Keywords*: *innovation training, cultural barriers, international cooperation

Introduction

In Vietnam, the concept of innovation has been mentioned since late 1990s but it is not comprehensively understood by government, universities and enterprises (IPP, 2013). There are only 20-30% of enterprises has implemented innovation activities (GSO, 2012). However, SMEs seem not to invest in new products but instead in new process with improved technology and product modification, which may be called as incremental innovations. At the current stage of development, this may prove the right strategy as the country is trying to adopt foreign technology rather than carrying R&D activities. However, in order for the future development, investment in new product innovation will prove to be essential (Nguyen Ngoc Anh, 2013). So, the role of universities in promoting innovation become increasingly important.

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Responding to the increased demand for higher education, the last decade has witnessed a rapid expansion of the higher education sector in Vietnam in terms of number of universities and colleges (Nguyen Ngoc Anh, 2013). However there is evidence that the country's education system fails to provide employers with the needed qualified personnel. A ccording to the WB report, Vietnam's higher education is still not a source of technical innovation as it is in upper or middle-income countries. On the other side, the research output of universities in Vietnam is very worrying, which is explained by the very poor funding for research at universities (Nguyen Ngoc Anh, 2013).

Some university has tried to developing subjects in their undergraduate curriculum, such as Technology Management or Business Innovation (Phong, 2012). Those syllabus has been developed upon similar ones in foreign universities, but the common challenges are lack of localized reading materials as well as resource people. In long-term, these activities will help improve the understanding of the concept, supporting for bottom-up innovation in reality.

Besides, there are several projects on innovation training, which aims at business managers or employee. Focusing on practical aspects, these projects has tried to simulate innovation process in blended learning environment to support top-down innovation at enterprises. With the current weakness of Vietnam's universities, all projects share a common characteristic of involving foreign partner.

Research Questions

Using a case study of a joint project between Vietnam and Finland in training business innovation, the paper aims to explore the benefits and barriers to international cooperation in promoting enterprises' innovations. The paper seeks to answer following research questions:

(1) How international cooperation between universities help teaching business innovations.

(2) What are the barriers to effective cooperation between universities in teaching business innovations.

Description of the I-SMEs project

I-SME Vietnam professional training course has been designed to support small and medium sized enterprises in managing and planning business operations to nurture innovation. The course was led and taught by Innovation management and SME professionals from Finland in cooperation with professionals from Vietnam. The training curriculum of Seinäjoki University of Applied Sciences' Business School was adapted and used in Vietnam. The training consists of four modules. The goal throughout the four training modules was for trainees to learn to formulate a viable business plan for innovation.

In term of methodology, the innovative virtual enterprises methodology was applied in the training. The virtual enterprise is a combination of traditional university teaching with company consulting in management area to ensure both theoretical and practical views.

There are 2 rounds of pilots training organized with the participant numbers of 13 and 18 respectively. These small numbers of participants has advantage and disadvantage. The advantage was it allows for interactive activities during class contact training. The disadvantage was that there were too few people in the class. Majority of participants come from enterprises, i.e. 8 out of 13 and 16 out of 18 in the 1st and 2nd round respectively. In addition, there were people from universities' business faculties (2 in each round). This means that the group of participants was a mixture of people from business enterprises and training bodies.

Enterprises that participated in the training came from different industries, from manufacturing (food, automobile industries) to service (consulting, publishing, IT and trading) sectors. However, majority of participated

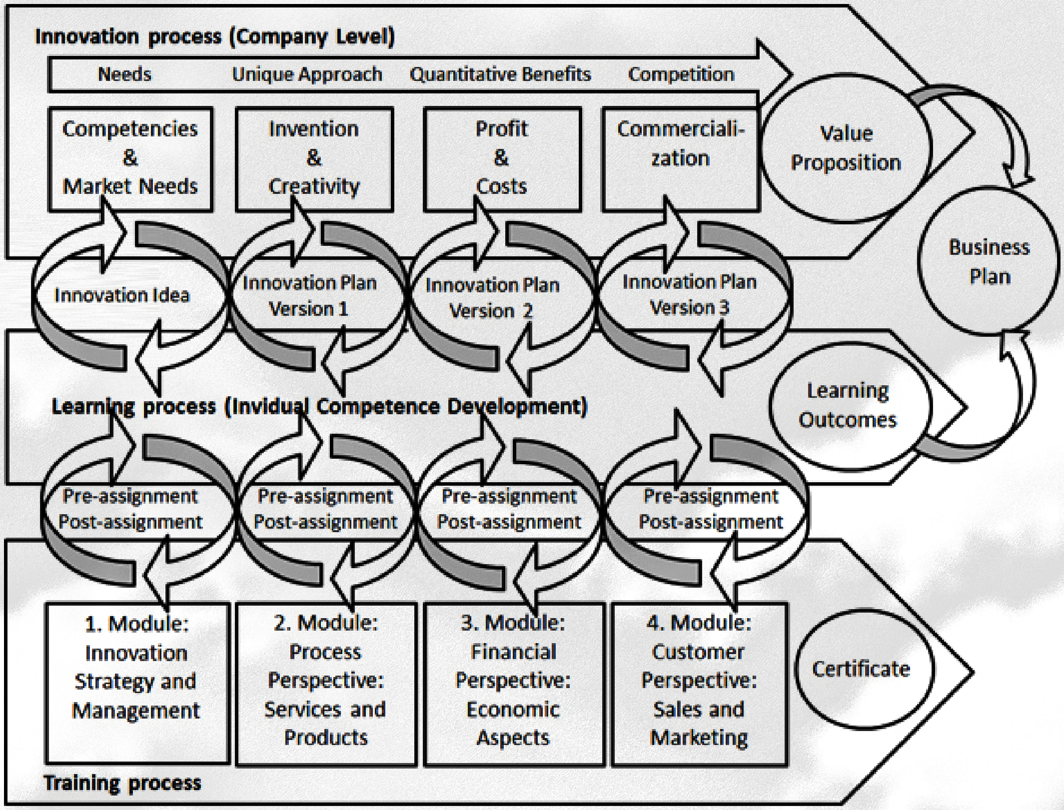

Figure 1. **The training process**

companies came from the services sectors in different application of IT technology, i.e. search engine, e-books, Internet television, e-commerce.

The diversities backgrounds of participant provided opportunity for class discussion because this enables innovation idea to be viewed from different perspectives. It also promotes more innovation ideas on products innovation by creating bundle/package of goods and services to satisfy customer's demand. However, the downside was the lack of process innovation as participants cannot go into details on the process of particular industry.

Of the enterprises that participated in the training, two was from a state-owned company, two were foreign invested enterprises and the rest were private enterprises (account for 85% of participating enterprises). This shows that those enterprises that support innovation were mostly private enterprise as compared to state own enterprise. All enterprises were newly established, the oldest one started in 2002 and the youngest one was only two years old. This fits in with research in literatures that young enterprises are more dynamic and open to innovation.

The majority of the participants were from management position of their companies, either as a CEO or as a director of a department in the company. Representatives of universities were also from management. This was one of factors that contributed to the interactivity of the training days as participants were active, willing to share and comment on different innovation plans. It was due to top managers who were experienced and educated.

During training days we have observed that the CEOs were the ones who were actively participated in the discussion. In some cases where there was more than 1 person from the same company, only the CEO spoke or instructed others to speak. The subordinates were less active. This shows innovation in this case was a top-down innovation process.

Based on the participants' feedback, some revisions were carried out relating to the contents and organization of the training. The training was focus more on practical issues, rather than academic content. More examples of innovations from both Finland and Vietnam were added on the project website. A training day was organized at an innovative company which belonged to one of the participants. Participants found the experience beneficial as they could see and discuss real life examples.

Discussions

How international cooperation between universities help teaching business innovations.

The teaching of innovation and entrepreneurship has grown dramatically over the past decade. Common tools for teaching entrepreneurship generally include case studies, business plans and computer simulations. However, there is still considerable uncertainty as to whether innovation and entrepreneurs are born or made, which has led to the questions about whether we can actually teach individuals to be innovative (Henrry C., 2005).

New entrepreneurship programs have been emerging at business schools in the entire world. In the USA, they have been launched at such prestigious institutions as Harvard, Stanford, Northwestern, and the University of Chicago. Traditional business schools tend to over-emphasize quantitative and corporate techniques at the expense of more creative skills (Porter, 1994) . Whereas entrepreneurial education should emphasize imagination, creativity, and risk taking in business

While entrepreneurship programs across different countries may have a common focus in terms of new business creation and the development of a business plan (Hisrich R.D., 1998) or entrepreneurship as a discovery process (Fiet, 1997), there may be differences in emphasis depending upon the particular needs of the participants, the country or the resources available. Transitional economies have different fundamental problems than do countries with a long history of capitalism and entrepreneurship.

It is our belief that although we can teach the practice of innovation, there are many factors that will influence its success. We concur with McClelland (1999) that successful innovation depends on the need for achievement (N-Ach) of an individual. The person involved may either have (or lack) the necessary intrinsic motivation to undertake the hard task of acquiring the necessary knowledge base to practice innovation. N-Ach refers to the individual's desire for significant accomplishments. People with high N-Ach are characterized by a strong tendency to seek challenges and a high degree of independence. The recognition of their achievement is their reward. On the contrary, people with low N-Ach tend to prefer easy tasks that are not very challenging, in order to minimize the risk of failure. The relative security and predictability of a career is preferred to the challenge of starting a new business venture.

Another important observation that we have learned is that a teaching style that is action-oriented, encourages experiential learning, problem solving, project-based learning, creativity, and is supportive of peer evaluation. We need to foster a culture of enterprise and innovation. Innovation education emphasizes imagination, creativity, and risk taking in business whereas traditional business schools tend to over-emphasize quantitative and corporate techniques at the expense of more creative skills.

From the success of the training, we can see that innovation is a process from idea to commercialization, so teaching innovation we need to follow the process. This takes times to develop. Virtual enterprise methodology and blended learning environment help to overcome this challenge. In addition, Innovation training can be organized according to the different type of innovation. Product innovation, usually occur as a bundling of good and service are demand-driven and must be supported by a diverse backgrounds of participants, who should have direct contact with consumers. Otherwise, a supply-driven and process innovation would not be nurtured.

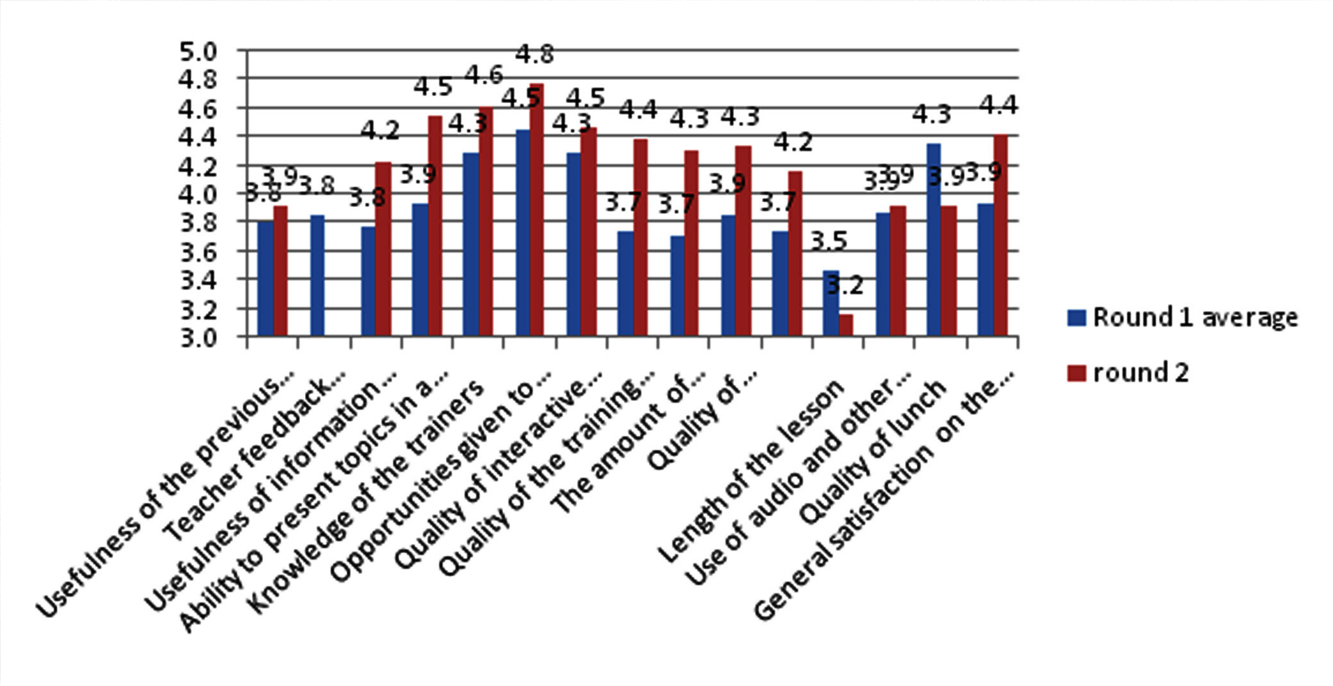

Figure 2. **Average feedback of participants**

In order to analyze the course, we used questionnaires to get the participants' feedback. At the end of each module, all participants was required to complete a small survey, comprise of 14 specific and 1 general criteria. As the training can be defined as the lecturers' delivery of contents of the course to the participants and supported by facilities, our criteria covered all 4 aspects as shown in Table 1. All the criteria was measured in a Likert scale of 5 points.

Table 1: **Criteria used in participants feedbacks**

	Criteria used in participants' feedback
Lecturers of the course	Usefulness of information presented during the two-day training Knowledge of the trainers Ability to present topics in a way that is easily comprehensible to the participants
Content of the course	Usefulness of the previous assignments Quality of the training material The amount of references/material provided on the website
Interactivity of the course	Quality of teacher feedback on previous assignment Opportunities given to participants to present questions and participant Quality of interactive classroom activities (discussions, group exercises, presentations, etc.) The use of practical examples, case studies Quality of references/material provided on the website
Organization of the course	Length of the lesson Use of audio and other teaching equipment Quality of lunch

Measured by the general satisfaction, the I-SME case has proved to be a success in teaching innovation to business people. The project has received good feedback from participants as the evaluation scores were both more than 3.7 out of 5. The overall assessment of the finished 1st round was 3.9. Also, the revision of round 2 as pointed out above has contributed to the higher evaluation of round 2 (see Figure 2).

In details, the specific criteria was determinants to the course's success. Among various criteria, those received consistent mark in both rounds were Knowledge of the trainers (4.3 and 4.6 in round 1 and 2 respectively); Opportunities given to participants to present questions and participant (4.5 and 4.8 in round 1 and 2 respectively); Quality of interactive classroom activities (4.3 and 4.5 in round 1 and 2 respectively). Those were determinants to the success of innovation training. In case of I-SME projects, international cooperation with the presence of Finnish experts bringing their experiences and fresh views from developed country has explained the high assessment of "trainers' knowledge", which the Vietnam's partner alone cannot perform well (Dao Ngoc Tien, 2013).

What are the barriers to effective cooperation between universities in teaching business innovations.

Although Entrepreneurship education is becoming popular around the world, its education in each country is different based on its cultural context. Dana argues that, "A key prerequisite to training people is to understand them, their cultural values, historical experiences and mindset" (Dana, 2001). In case of I-SMEs project, the training course was designed as innovation process through interaction among Finnish experts, Vietnamese tutor and participants. As the Innovation depend intensively on the availability and sharing of knowledge, the success of the I-SMEs course depend on the overcoming of cultural barriers among these three groups.

Although knowledge sharing was fundamental for the students in the innovation classes, we found that there were many barriers. Firstly teaching innovation to students in a foreign language is not trivial. The main problem we found was the language and translation issues. This was especially so during discussion time with the Finnish tutor. Because the students could not express themselves in English, it must first be translated from Vietnamese to English and vice versa. Meaning was lost during the translation process. This resulted in much misunderstanding between the student and tutor.

Secondly, the heterogeneous groups in the class were another big challenge because participants came from different background and abilities. There was a lack of collaborative capabilities in the students. (Blomqvist K., 2006) suggested that collaboration capability can be seen as a generic meta-capability enabling leverage of both internal and external knowledge bases for changing needs in uncertain and complex environment. According to (Tyler, 2001), collaborative capabilities consist of information processing, communication, knowledge transfer and control, management of intra- and inter-unit co-ordination, trustworthiness/ability to engender trust and negotiation skills.

Thirdly, there was a lack of motivation among the students to collaborate. Knowledge-sharing motivation is a function of reciprocity issues, relationship with the recipient, and rewards (Ipe, 2003). The lack of motivation was attributed to the students' inability to generate interest in group discussion because of communication problem of having to have translations instead of direct interaction between the Finnish staff and Vietnamese staff and students.

Lastly, but not least important is the trust issue. There was a lack of trust in knowledge sharing among the groups. Trust is the most important precondition for knowledge exchange (Anne-Maria Aho, 2013). Although the transfer of knowledge is a voluntary behavior, we often need to share values and/or establish a common shared objective with someone before we are willing to transfer any knowledge. Conversely, trust is also voluntary; especially to trust initially is a voluntary act of faith. (Anne-Maria Aho, 2013) found that there were a lack of 'benevolence-based trust' and competence-based trust' among the students. 'Competence-based trust' is trust that describes a relationship in which an individual believes that another person is knowledgeable about a given subject area. Benevolence-based trust' is trust in which an individual will not intentionally harm another when given the opportunity to do so.

Conclusion

The experience of I-SMEs has confirmed that innovation education in each country is different, based on its cultural context, international partnership is critical in developing innovation training as each partner has complementary resources needed for the success of training.

However, as a knowledge sharing process, there were many cultural barriers for international cooperation on business training. Firstly teaching in a foreign language is challenging. This can be overcome by giving local tutors bigger roles. Secondly, cultural context should be emphasized in the training process. We should create custom made training process and methods for Vietnamese business managers. Thirdly because of the role of heterogeneous groups, there should be collaborative capabilities training for the groups before the start of the course. Lastly, we can conclude that most important issue is the trust from both parties, which is only achieved via strategic and long-term partnership.

REFERENCES

Anne-Maria Aho, L. U., 2013. *Knowledge sharing in international innovation course*. s.l., s.n.

Blomqvist K., L. J., 2006. Collaboration capability - a focal concept in knowledge creation and collaborative innovation in networks. *International Journal of Management Concept and Phisolophy,* 2(1/2006), pp. 31-48.

Dana, 2001. The education and training of entrepreneurship in Asia. *Educatiobn and Training*, Issue 43, pp. 405-416.

Dao Ngoc Tien, A.-M. A. L. u., 2013. *Developing Innovative training for business managers: I-SME project between Finland and Vietnam*. s.l., s.n.

Drucker, 2002. *The discipline of Innovation*. Hacard Business Review.

Fiet, J., 1997. Education for entrepreneurial competency: A theory based activitity approach.

GSO, 2012. *General Statistic Office's enterprises census*. s.l.:s.n.

Henrry C., H. F. L. C., 2005. Entrepreneurship education and training: can entrepreneurship be taught. *Education and Training*, 47(2).

Hisrich R.D., M. P., 1998. *Entrepreneurship*. s.l.:McGrawHill.

Ipe, M., 2003. Knowledge sharing in organisations: A conceptual Framework. *HRM Development Review*, Issue 2(4), pp. 337-359.

IPP, 2013. *Final eveluation of Innovation Parrtnership Programme*, Hanoi: s.n.

Nguyen Ngoc Anh, D. Q. H. N. T. P. M., 2013. The Vietnam National Innovation System: A disgnostic Review. *Tech Monitor*.

Phong, D. T., 2012. *Innovation in Vietnam in Workshop "Innovation management for SMEs in Vietnam"*. s.l., s.n.

Porter, 1994. The relation of entrepreneurship education to business education. *Simulation and Gaming*, Volume 25, pp. 416-9.

Tyler, B., 2001. The complementarity of Cooperativve and technological Competencies: A Resource-based perspectives. *Journal of English Teaching techinolgy Management,* Issue 18, pp. 1-27.

Author Rights Awareness to Promote an Inter-university Open-Access Repository for Theses and Memoires

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ABSTRACT

Inter-university open access repository for Theses and memoires is a key to promote cross seeding Research in Higher Education by emulating senior student research. This article presents a synthesis of previous works on the benefits of Open Access repository in the organization of the university research system. The figures of the current situation in Lebanon towards the understanding of authors' rights under Open Access policy and the degree of acceptance of those principles. Based on the results of our survey done on major Universities across Lebanon we are confident of the awareness and readiness of faculty members, students and librarians for Inter-university open access repository. We propose the main steps to increase awareness on the different author rights under Open Access policies and to organize an Inter-university Institutional repository based on Green Open Access rules for theses and memoires

Introduction

The Open Access (OA) Movement is more than 10 years old and is an alternative to toll-access journals. Between 2001 and 2003, three international meetings acknowledged the establishment of "open access" as the common term for initiatives to make scholarly literature freely available. In 2012, Harvard University started a campaign against the publishers' unaffordable prices and decided to fully support the Open Access Movement. According to Suber (2012), "open access literature is digital, online, free of charge, and free of most copyright and licensing restrictions." Crawford (2011) defines open access as requiring " refereed journal articles be fully and freely available on the open internet, on or before the date of formal publication, to be read, downloaded, distributed, printed, and used for any legal purpose (including text manipulation, data mining and other derivative purposes), without permission or other barriers." Section 1 presents the copyright management under open access. Section 2 presents the benefits to move to open access. Based on the results of our nationwide survey done on major universities throughout Lebanon, Section 3 shows the awareness and readiness of faculty members, students, and librarians for open access. Finally, Section 4 proposes the main steps in organizing the promotion of an inter-university institutional repository based on a Green Open Access for theses and memoires.

Section 1. Copyright management under open access

This section presents an overview of copyright regulation and compares the copyright management between traditional publishers and Gold and Green Open Access.

Overview of the International Copyright Regulation

The legal framework for the protection of articles and books is embedded in the intellectual property Conventions and Regulations. On an international level, many treaties were adopted by the member states of both the World Intellectual Property Organization (WIPO) and the World Trade Organization (WTO). The WIPO has organized the Berne Convention for the Protection of Literary and Artistic Works in 1886. It is undoubtedly the most important treaty in the matter and has since been amended many times. This convention regulates the problems raised by the international private law on the specific domain of copyright. Article 5, paragraph 2 establishes the principle of the application of the laws of the country where protection is claimed. This rule was later integrated into other international and regional instruments.

The emergence and development of the use of the internet in all branches, including the publishing sector, have raised a major issue concerning the application of the intellectual property legal framework on Internet transactions (David, 1997). Can the existing legislations regulate this new phenomenon as the expansion of electronic books and articles, or is it mandatory to enact special rules to govern this new type of activity? Since legislations usually have an abstract and general character, especially in the Germanic-Roman system, most of the countries modified and updated their existing intellectual property laws to include cyberspace-related aspects of intellectual property protection instead of introducing a comprehensive set of cyber laws to protect intellectual property in cyberspace. Two treaties were adopted in 1996, under the auspices of the same organization, aiming to update the international copyright standards for the internet era. The World Trade Organization adopted on April 15, 1994 in Marrakesh the agreement on the Trade-Related Aspects of Intellectual Property Rights (TRIPS) that sets down minimum standards for many forms of intellectual property. On the one hand, on a regional level, the model for Anglo-Saxon regulation is the Federal Criminal Statutes Protecting Intellectual Property Rights (USA government, 2011). On the other hand, the European Union has enacted many instruments concerning the protection of intellectual property rights online: the Directive 2001/29/EC of May 22, 2001 (titled *"Harmonization of Certain Aspects of Copyright and Related Rights in the Information Society"*) and the Directive 2004/81/EC of April 29, 2004 on the Respect of Intellectual Property. The Council of Europe has also played a role in the process of enacting instruments in the matter by elaborating the European Convention relating to questions on copyright law and neighboring rights in the framework of transfrontier broadcasting by satellite on May 11, 1994. Most of the South East Asian Countries have in recent years passed new Intellectual Property Law to be TRIPS compliant : Singapore between 1987 and 2000; Malaysia between 1990 and 2006, Indonesia between 2000 and 2002; Cambodia in 2002 and 2003; Vietnam at the end of 2005 (Goon, 2002). Laos is a recent member of the WTO since 2013 and TRIPS compliant. The Philippines has adopted a comprehensive intellectual property code following WIPO models in 1995. The South East Asian Nations (ASEAN) have also an active working group on Intellectual Property Cooperation. The United Nation Economic and Social Commission for Western Asia (ESCWA) has developed several directives to serve as a model for the Western Asia region. The ESCWA cyber legislation directives should be considered as a reference for lawyers, judges and legislators (ESCWA, 2011). The fifth directive covers cybercrimes including a chapter on Infringement of *Intellectual Property Rights*, whereas the sixth directive covers the legal protection of online documents in terms of their ownership, the rights of the holder of the intellectual copyright as well as the exceptions that might result thereof. Finally, in order to complete the study, one shall note the various Pan-American conventions applicable in the matter: Convention of Montevideo (1889), Convention of Mexico (1902), Convention of Rio de Janeiro (1906), Convention of Buenos Aires (1910), Convention of Caracas (1911), Convention of Havana (1928) and Convention of Washington (1946).

Copyright barrier of toll-access Journals versus Gold and Green Open Access

Authors who publish scientific articles transfer their copyrights to publishers who sell their work. Once authors transfer their copyrights, the publisher restricts them from sharing their work for commercial reasons. The common contracts of traditional publishers restrain authors from publishing their articles in open access. Gold Open Access means that researchers submit their articles in open access journals that provide immediate online access to readers (Crawford, 2011). Journals are evolving and accepting open-access articles if their authors pay an open access publishing fee.

Authors can alternatively decide to publish in an open-access repository. Generally, the terms and conditions of the repository are called Green Open Access. This means that the articles will be deposited for free and accessible during a period of time in the repository and for a specific community. Commonly, there are two kinds of repositories: The disciplinary repository and the institutional repository. The disciplinary repository (such as arXiv for physics, cogPrints for cognitive sciences and PubMed Central for medicine) is designed to capture research related to the same field or subject. Institutions (mainly universities) manage the institutional repository. The authors, students or researchers publish their works in the repository. The researcher affiliated with the institution will publish either voluntary or compulsory in the institutional repository according to his/her specific employment agreement. Furthermore each university has to decide in the promotion policy the value of an article published in an institutional or disciplinary repository compared to an article published in a toll-journal. Publishing in a toll-journal and in an Open Access repository are not always incompatible. The researcher should be aware of his/her right to negotiate the terms and conditions of his/her publishing agreement in a toll-journal. In other words, the contract should include the researcher's right to publish in the repository with or without an embargo period. In the event that the author is a student, he/she has to acknowledge the right of the institution to publish his/her memoire or thesis in the repository with an opt-out right if he/she intends to transfer his/her copyright to a publisher.

All authorized users have the same access privileges in an OA Repository. They have access to the full text without delay and can copy it without additional costs or permission. The authorized users are defined by the library's policy of the institution and are mainly professors, researchers, visiting faculty members and students. There are no limits for authorized users to simultaneously access the same articles. According to Bailey (2007), libraries should have the right to migrate older content to new media formats to keep them readable as technology changes.

Section 2. Author benefits in terms of exposure

Since open-access publication is ease of access to the public, the main benefit of it is undoubtedly the improvement of articles' impact factor. Eysenbach (2006) studied the "citation advantage of open articles," and showed that the "comparison of the impact of OA and non-OA articles from the same journal in the first 4–16 months after publication shows that OA articles are cited earlier and are, on average, cited more often than non-OA articles". Lawrence (2001), a scientist at the NEC Research Institute, analyzed nearly 120,000 computer science articles cited in a standard disciplinary bibliography. He found that 85% of the most cited articles were open access, which means that the impact factor of those articles is higher than tool-access articles.

Antelman (2004) conducted a study to show that open-access articles have higher impact and higher citation than the toll-access articles. Antelman's hypothesis was "that scholarly articles from disciplines with varying rates of open access adoption have a greater impact if the articles are freely available online than if they are not". Her study shows that open-access articles are cited more than the toll-access articles. For example, the electrical and electronic engineering toll-articles are cited 2.5 times, while the open-access articles are cited 3.5 times on average. Furthermore, according to Bailey (2007), open access has an influence on libraries and, more specifically, on their policies, procedures and services.

Section 3: Awareness and readiness of the stakeholders for open access in Lebanon

Methodology

To assess the awareness and readiness of stakeholders, we performed three surveys for librarians, faculty members and students of six major universities in Lebanon. The sample universities were selected because they were representative in this area. Only two universities (later referred as IR-Universities) have an Institutional Repository for Students' Memoires and Theses. The three sample weeks studied were managed during typical weeks of end of spring and beginning of summer 2013. Three questionnaires were designed for librarians as professionals and faculty members and students as both potential authors and library users. The questionnaire for students was composed of seven groups of questions about habits, knowledge on open access, library needs, the type of research tool used to work and the type of database used. The questionnaire for faculty members covered additional questions about the type of publications they use and the reasons for the level of development of open access in their institution. The questionnaire for librarians asked different questions related to the administration of open access and institutional research services, the degree of awareness of the faculty members and the students and the reasons for the level of development of open access in their institution.

The sample of the surveyed librarians totaled 23 librarians from around 70. It was handled face-to-face on paper. The two IR-Universities totaled 12 answers and are more represented than the other four. The sample of surveyed students totaled 239 students. It was handled with an on-line survey available either on the computers of the library or on tablets for the students who have visited their library during the sample week for about 14,000 enrolled students. Undergraduates students are overrepresented (92%). 19% of the respondents are working on a thesis or a memoire which is similar to the percentage of senior students in the universities; 75% are working in a research study for a course, and 6% are in the library for other reasons. The sample of the surveyed faculty members totaled 75 from around 1400 faculty members. The percentages of faculty members in each rank level were similar to the rank distribution in universities, however the professor rank is half underrepresented in the survey.

There is a systematic way to calculate the sample size required for a specified level of confidence in the result, in relation to a population of a specified size, with a specified degree of sampling error, given a specified level of probability for a particular answer to be provided by a respondent (Dillman 2000, 206–207). But Cook et al (2000) and Draugalis et al (2008) point out that response representativeness can compensate a low response rate in web-based survey research. Several case studies (Sivo et al, 2006; Nulty, 2008; Bjertnaes et al., 2010, Fincham, 2008) have presented low response rates for online surveys and identified a small effect of non-response error indicating adequate representativeness of their sample. Despite our best efforts it is difficult and time consuming to obtain response rates to meet 5% sampling error, and to accept a 95% confidence level (i.e. 374 instead of 239 students; 66 instead of 23 librarians, and 301 faculty members instead of 75): few students and few faculty members are going effectively physically to the library but are using their library online access; and fewer are willing to fill-in an online survey in the library. As proposed by Nulty (2008) we verified that our surveys comply with liberal conditions set: to set a 10% sampling error (higher than the normal 5%), and to accept an 80% confidence level (much lower than the normal 95% used by statisticians). The bigger non response error bias will be to over represent the opinion of physical users of the library over the opinion of non-users.

The reliability of the responses was measured with Cronbach's alpha, which was in the acceptable range of 0.5/0.6, for each survey.

For the treatment of the data, SPSS version 11.5 was used in processing the data for ease and accuracy. Means and standard deviations were computed to determine the general open-access perceptions of the librarians, faculty members and students.

Perception of the Open Access Movement and research habits

According to our findings, 100% of the librarians and 96% of the faculty members questioned fully support both the Open Access Movement and implementing an institutional repository. Student opinions, however, were confusing. In fact, students (23%) have little knowledge about the Open Access Movement, and they misunderstand the role of an institutional repository. Students (71%) believe that their universities have a rich collection of articles. Half of the students surveyed, however, use Google Scholar for their research to find the articles they need. Even Google Scholar is a very efficient research tool in finding the major publications in a specific domain, the predominant search engine for students is Google (28%) and other library engines (19%), while ISI and SCOPUS, which are massively used by scholars, are not popular with the students (see Table 1).

Table 1. **Student Questionnaire results**

	Student Questionnaire	**Yes %**
Open Access and Institutional Repository.	Do you know about the Open Access Movement?	23%
	Do you know about institutional repositories?	23%
	Does your university have an institutional repository?	33%
	Are you facing any obstacle accessing peer reviewed materials?	33%
	Does your university have a library with a rich collection in your field?	71%
	Do you pay for your resources?	39%
	Is there another source to access peer reviewed material?	23%
Google Scholar	Do you know about Google Scholar?	45%
	Do you browse Google Scholar searching for articles?	43%
	Do you add article references from Google Scholar in your bibliography?	31%

Organizational constraints to develop open access

The librarians and the faculty members agree that the lack of obligatory self-archiving is one of the obstacles in developing open access. Librarians emphasize the staff shortage as a major constraint rather than administrative problems. Table 2 compares the librarians' and the instructors' opinions on the organizational constraints.

Table 2. **Viewpoints on Organizational Constraints**

Organizational Constraints	Librarians	Faculty Members
Lack of obligatory self-archiving	33%	32%
Administration problem	11%	24%
Other, please specify	0%	13%
Staffing shortage	39%	13%
Lack of staff in charge of its maintenance	17%	10%
Lack of financial means	0%	8%

Considerations to publish under open access

The majority of faculty members and librarians prefer the implementation of a request or encouragement policy (see Table 3). A request and encouragement policy merely asks faculty members to make their work open access or recommends open access for their new work. This choice is far more popular than the loophole mandate policy, which requires Green Open Access, except when the author's publisher does not allow it. A request and encouragement policy is also preferable to a deposit mandate policy, which requires a deposit in an open-access repository as soon as the article is accepted for publication; however, the timing of deposit is separated from the timing of open access.

Table 3. **Expressed preferences on the type of Policy for the authors**

Type of policy for the authors	Librarians	Faculty Members
Request or encouragement policies	30%	37%
Loophole mandates policies	10%	17%
Rights-retention policies	40%	13%
Deposit mandates policies	10%	6%
Don't know	10%	25%

Of the faculty members, 56% do not have a problem publishing under open access, and 57% agreed to sign a contract that includes mandatory open access. Faculty members (79%) are strongly motivated to see that each article's full text is published in the institutional repository and is accessible by either the public or restricted to the university community (see Table 4). The current, and the most accepted, format for librarians and faculty members is a PDF version with no right to copy (see Table 5).

Table 4. **Expressed preferences on the type of Institutional Repository Policy**

Institutional Repository Policy	Faculty Members
Open to the public: full text	47%
Restricted to university community: full text	32%
Open to the public: metadata	13%
Restricted to university community: metadata	4%
Other, please specify	3%
Restricted for a definite time	1%

Table 5. **Expressed preferences on the format of publication**

Format	Librarians		Faculty Members
	University with an IR	*Other Universities*	
PDF with no permission to copy	64%	42%	80%
Word	21%	8%	11%
XML	0%	13%	0%
JPG (picture)	14%	29%	4%
Other, please specify	0%	8%	5%

Section 4: Organizing the promotion of an inter-university institutional repository based on a Green Open Access for theses and memoires

Faculty members, students, and librarians are ready for a change. There are several actions to be taken at each level.

1. At a national or regional level, an association of universities or the Ministry of Education could set up a committee to coordinate the promotion of an institutional repository by offering a set of tools and conferences including, but not limited to, the definition of the university Open Access Policies. According to our study, communication is still important. While 96% of the faculty members know about open access, only a third publish under open access and less than a third are able to explain what a Green Open Access or a Gold Open Access is. Furthermore, only 15% know their rights to edit their publishing contract in order to be able to publish under open access after an embargo period.
2. At the university level, the Academic Affair Office, with the support of the library, should define an institutional research policy. Under the condition of adhesion to this policy, each member of the university community should be able to access the institutional repository. According to our study, a Green Open Access Policy for institutional research could promote a full text PDF, with no right to copy, as the most appropriate format.
3. The library has to follow the necessary steps to create a solid institutional repository. Below, we suggest the main steps to implement an institutional repository under Green Open Access. The Open Access Scholarly Information Sourcebook (OASIS) at OpenOasis.org provides fruitful tools covering the concept, principles, advantages, approaches and means to achieve open access.

Step 1: The library should endorse the implement of an institutional repository, able to stock both student theses and research articles. According to the librarian survey, an open-source software is more common (75%) than a commercial software in managing an institutional repository. The questioned librarians recommended Eprints (eprints.org) and DSpace (dspace.org); both are OAI-MH (Open Archives Initiative Protocol for Metadata Harvesting) compliant.

Step 2: According to our study for the researchers, each university has to define an open-access policy, preferably either as a request or as an encouragement policy. The university has to defend the researchers' rights by explaining how to edit a publishing contract and how to enforce their rights to keep their work open access for their institution.

Step 3: The Academic Affair Office should prepare a contract with students to allow copyright transfer under Green Open Access to publish their memoires or theses in the institutional repository. Each memoire or thesis will remain in the institutional repository until the student requests to remove it. The contract should include the student's right to limit the access to his/her publication in the repository during an embargo period of two years. The contract should also include the student's right to opt out in the event he/she wants to transfer his/her rights to a publisher. The faculty should define the criteria to select the best thesis or memoire (B+ and above) for publication in order to maintain a certain level of quality.

Step 4: The library, in coordination with the administration, has to define a communication plan to promote open access and the institutional repository. According to our study, only 36% of the questioned librarians talked about open access with the researchers and students. Librarians can prepare workshops about depositing articles in the institutional repository and about copyrights and publishers' agreements. Authors should know that open access is related to building their career because publishing under open access will enlarge their audience and, accordingly, they will have more citation and more impact. The process to publish in the institutional repository for students and researchers should be straightforward and convenient. The librarians' role is to help authors deposit their articles under open access.

REFERENCES

Antelman, Kristin Do Open Access Articles Have a Greater Research Impact? College & Research Libraries News, 2004, vol. 65, n. 5, pp.

Bailey, C. W. (2007). Open Access and Libraries. Collection Management 32, no. 3/4 (2007): 351-383. http://www.digital-scholarship.org/cwb/OALibraries2.pdf

Bjertnaes, O; Iversen H, Bukholm, G.,(2010) International health policy survey in 11 countries: assessment of non-response bias in the Norwegian sample, BMC Health Serv Res. 2010; 10: 38. Published online 2010 February 10. doi: 10.1186/1472-6963-10-38, PMCID: PMC2833149

Björk, B-C. (2012). The hybrid model for open access publication of scholarly articles: A failed experiment? J. Am. Soc. Inf. Sci., 63: 1496–1504. doi: 10.1002/asi.22709

Brick JM, Kalton G. (1996) Handling missing data in survey research. Stat Methods Med Res. 1996;5:215–38. http://www.ncbi.nlm.nih.gov/pubmed/8931194 (accessed August 15, 2014).

Castets-Renard, C. (2010). Droit de l'internet. Montchrestien

Cook C, Heath F, Thompson RL.(2000) A meta-analysis of response rates in web- or internet-based surveys. Educ and Psychol Meas. 2000;60(6):821–36.

Council of Europe , (1994), European Convention relating to questions on Copyright Law and Neighbouring Rights in the framework of transfrontier broadcasting by satellite, (Strasbourg 11 V 1994), published on http://conventions.coe.int/Treaty/en/Treaties/Html/153.htm (accessed July 31, 2014).

Crawford, W. (2011). Open access: what you need to know. Chicago, IL: American Library Association.

David S.(1997), Personal jurisdiction in cyberspace: the constitutional boundary of minimum contacts limited to a website, the John Marshall journal of computer and information law, vol.15 p 819

Dillman, D.A. (2000). Mail and internet surveys: the tailored design method. Brisbane: Wiley.

Draugalis JR, Coons SJ, Plaza CM. (2008) Best Practices for Survey Research Reports: A Synopsis for Authors and Reviewers. Am J Pharm Educ. 2008;(1):72. Article 11. http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2254236/pdf/ajpe11.pdf (accessed August 15, 2014).

ESCWA, (2011), Directives for the Regional Harmonization of Cyber Legislation (Beirut 13 to 15 Sept, 2011), http://www.escwa.un.org/information/meetingdetails.asp?referenceNum=1439E (accessed July 31, 2014)

European Union, (2001), Directive 2001/29/EC on the Harmonization of Certain Aspects of Copyright and Related Rights in the Information Society publish on http://eur-lex.europa.eu/legal-content/EN/TXT/?uri=celex:32001L0029 (accessed July 31, 2014).

European Union, (2004), Directive 2004/81/EC of the 29th of April 2004 on the respect of intellectual property publish on http://ec.europa.eu/internal_market/iprenforcement/directive/index_en.htm

Eysenbach, G. (2006). Citation Advantage of Open Access Articles. PLoS Biol 4(5): e157. doi:10.1371/journal.pbio.0040157

Fincham, JE, (2008) Response Rates and Responsiveness for Surveys, Standards, and the Journal, Am J Pharm Educ. 2008 April 15; 72(2): 43. PMCID: PMC2384218, http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2384218/pdf/ajpe43.pdf (accessed August 15, 2014).

Goon D., (2002), Malaysia, in Intellectual Property Law In Asia 309-10 (Christopher Heath ed., London: Kluwer 2002); Lim, supra note 1, at 107-09. http://www.stidays.net/wp-content/uploads/2014/02/workshop-ipr-ramocki-ASEAN-helpdesk.pdf (accessed July 31, 2014).

Lawrence, S. (2001) Free online availability substantially increases a paper's impact Nature, 31 May 2001. http://www.nature.com/nature/debates/e-access/Articles/lawrence.html

Nulty, D. (2008), The adequacy of response rates to online and paper surveys: what can be done? Assessment & Evaluation in Higher Education Vol. 33, No. 3, June 2008, 301–314, http://www.uaf.edu/files/uafgov/fsadmin-nulty5-19-10.pdf (accessed August 15, 2014).

Ramocki J (2014), Practical, first-line intellectual property advice for EU SMEs in ASEAN, STI Days, Bangkok, 22. January 2014, http://www.stidays.net/wp-content/uploads/2014/02/workshop-ipr-ramocki-ASEAN-helpdesk.pdf (accessed July 31, 2014).

Sivo, S.; Saunders, C.; Chang, Q.; Jiang, J. (2006) "How Low Should You Go? Low Response Rates and the Validity of Inference in IS Questionnaire Research," Journal of the Association for Information Systems: Vol. 7: Iss. 6, Article 17. http://www.bus.ucf.edu/faculty/csaunders/file.axd?file=2011%2F2%2FHow+Low+Should+You+Go..Low+Response+Rates+and+the+Validity+of+Inference+in+IS+Questionnaire+Research.pdf (accessed August 15, 2014).

Suber, P. (2012). Open access. Cambridge, Massachusetts: The MIT Press, www.arl.org.

Templeton L., Deehan A., Taylor C, Drummond C, Strang J, (1997) Surveying general practitioners: does a low response rate matter? Br J Gen Pract. 1997 February; 47(415): 91–94. PMCID: PMC1312913 http://www.ncbi.nlm.nih.gov/pmc/articles/PMC1312913/pdf/9101692.pdf (accessed August 15, 2014).

USA government, (2011) Federal Criminal Statutes Protecting Intellectual Property Rights 17 U.S.C. 506, 1201 to 1205, 506 18 U.S.C. 2318, 2319, 2319A, 2320, 1831 to 1839, 497 published on http://www.copyright.gov/title17/ (accessed July 31, 2014).

WIPO, (1886), Berne Convention for the Protection of Literary and Artistic Works, (September 9, 1886 last amendment on September 28, 1979), published on http://www.wipo.int/treaties/en/text.jsp?file_id=283698

WIPO, (1996), WIPO Copyright Treaty (WCT), (Geneva on December 20, 1996), published on http://www.wipo.int/treaties/en/text.jsp?file_id=295166 (accessed July 31, 2014).

World trade organization (1994) Agreement on trade-related aspects of intellectual property rights publish on http://www.wipo.int/treaties/en/text.jsp?file_id=305907

Perceived Strengths, Best Practices, and Challenges of Centers of Excellence in Veterinary Education for Instructional Quality in the Philippines

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ABSTRACT

As academic institutions, Commission on Higher Education (CHED) – recognized Centers of Excellence (COEs) in Veterinary Education are expected to provide excellent, equitable, and relevant education opportunities in the field of veterinary medicine through quality instruction. The study aimed to identify the perceived strengths, challenges and best practices for instructional quality of COEs in Veterinary Education in the Philippines. Quasi-qualitative/descriptive method through observations, interviews and surveys was used to gather data. The survey questionnaire consisted of open-ended questions designed to elicit answers pertaining to the circumstances that best describe the strengths and challenges of the respective institutions with regard to instructional quality. Data gathered through observations, interviews, and printed materials were collated, analyzed and interpreted to supplement the survey data. Best practices, core observations and conclusions were summarized in textual form.

For instructional quality, strengths include - good leadership style, competent faculty and staff, effective quality assurance, availability of basic laboratories and equipment, provision for variety of learning, resources. Challenges include - lack of funds, non-competitive compensation package for faculty and staff, excessive teaching/ work load, deficiency in state-of-the art equipment, and deficiency in ICT capacity. Best practices for instructional quality revolve around maintaining and retaining experienced school administrators; attracting, hiring, and maintaining competent veterinary teachers; developing state-of- the-art facilities; and providing better library and ICT services and facilities.

Introduction

The veterinary profession has a distinct responsibility in guaranteeing not only the health of animals but also ensuring public health. Performing this duty requires veterinarians to be highly competent and this is attainable through high quality veterinary education. Unfortunately, the quality of veterinary education is not good enough in many countries today and there is a need to strengthen veterinary education globally (Office International des Epizooties (OIE), 2013). Member countries of the OIE or World Organization for Animal Health are tasked to strengthen their veterinary services. One of the aspects of this is the provision of high quality veterinary education.

The Philippines, for instance, uses a system of recognizing Centers of Excellence (COEs) in various fields by the Commission on Higher Education (CHED) to ensure the deliverance of quality education to target clients. With the upcoming Association of South East Asian Nations (ASEAN) 2015 integration, it is important that member countries examine their education systems so as to ensure maximum advantages during the economic integration. This will start by knowing one's self. This includes looking into the strengths, best practices and challenges of higher education institutions which train future professionals that, in turn, will help fuel the economy. Among the twenty-three (23) veterinary schools in the Philippines, there are four (4) Centers of Excellence (COEs) considered as the leading veterinary schools in the country. Looking into their strengths, best practices and challenges will somehow help veterinary schools in the country prepare for and endure the challenges of ASEAN 2015.

One of the best ways for a veterinary school to advance is to be open to learning from the approaches of its peer institutions in the country. The study intended to benchmark with foremost veterinary academic institutions primarily for improvement. According to Mosier and Schwarzmueller (2002), one of the most valuable tools for dealing with the current challenges in higher education is the process of benchmarking. Looking into the best practices of peer institutions, then adapting and developing programs for their own programs, higher education leaders can develop the quality of programs and services that they can offer (Bender, 2002). Generally, the study identified the perceived strengths, challenges and best practices for instructional quality of COEs in Veterinary Education in the Philippines to aid improvement. Ramirez in Tullao (2003) benchmarked Philippine maritime and nursing education with Asia Pacific Economic Cooperation's (APEC) best practices with reference to educational procedures, activities and endeavors common to the respondents' institutions. According to Fedler (2001), all of the abovementioned components arise from existing situations. The study also looked into these existing situations as perceived by the administrators of the respondent schools as Ramirez in Tullao (2003) also accounted for the perceived strengths and weaknesses of the respondent institutions.

Data gathered in this study provided information on the situation of COEs in Veterinary Education amidst their quest for instructional quality. Benchmarking with the best practices of the existing COEs in Veterinary Medicine in the Philippines will lead to the transformation of other veterinary schools to become a more effective academic institution. Recommendations from this study can lead to concrete measures that can aid the present and future institutional leaders of veterinary schools in the Philippines to develop and implement changes in their goal of advancing veterinary education of the country to a relatively higher educational standard.

Methodology

Of the 23 veterinary institutions in the Philippines, four COEs in Veterinary Medicine designated by CHED were purposively chosen. These include: (1) University of the Philippines Los Baños College of Veterinary Medicine (UPLB-CVM), (2) Central Luzon State University College of Veterinary Science and Medicine (CLSU-CVSM), (3) University of Southern Mindanao College of Veterinary Medicine (USM-CVM), and (4) Central Mindanao University College of Veterinary Medicine (CMU-CVM).

The study was conducted using a quasi-qualitative/descriptive method. Observations, interviews and surveys were used to gather data. A set of questionnaires was administered to the deans of the Centers of Excellence. Part I of the questionnaire comprised questions about the personal profile of the respondent. Part II was designed to elicit answers pertaining to the circumstances that describe the instructional qualification of each institution. The questionnaire included open-ended questions based on the SWOT analysis format eliciting discussion regarding strengths, weaknesses, opportunities and threats of each of the respondent institutions. Printed materials and electronic data were used to substantiate the interview and survey data. Data were organized in a table for easy reference. Best practices, core observations and conclusions were summarized in textual form.

Results and Discussion

Table 1 presents the summary of the perceived strengths, weaknesses, opportunities and threats.

Table 1. **Summary of the Perceived Strengths, Weaknesses, Opportunities and Threats of the Instructional Quality of COEs in Veterinary Education in the Philippines by Their Respective Deans**

Indicator	Strength	Weakness	Opportunity	Threat
Instructional Quality	Good leadership style Competent faculty and staff Effective quality assurance Availability of basic laboratories and equipment Provision for variety of learning resources	Lack of funds Non-competitive compensation package for faculty and staff Excessive teaching/work load Deficiency in state-of-the art equipment Deficiency in ICT Capacity	Implementation of faculty mentoring Awards and incentives Partnership with other agencies Fund support from other agencies Availability of on-line learning resources Information sharing type of learning	Better job offerings by private institutions Less fundings provided by funding agencies for instructional development

Administrators of COEs considered good leadership, competent faculty and staff, functioning University Quality Assurance Office, well equipped laboratories and accessible learning resource centers as their strengths in maintaining instructional quality.

As perceived by one respondent, "having a leader with a good heart which commands support and cooperation of his subordinates to work hard and give their best for the upliftment of the instructional quality of the institution". Leadership was one key aspect to improve instructional quality through proper motivation of teachers and students alike. Other respondents mentioned that as a leader, one should be equipped with skills such as effective communication, coordination, planning and programming.

Highly competent faculty and sufficient administrative staff also contributed in maintaining instructional quality in COEs. Administrators perceived that the conduct of regular evaluation of faculty and staff by students, peer and supervisors is an effective way of maintaining competency of the work force. In addition to this, an active faculty and staff development is a very important part of maintaining qualified, effective and efficient faculty and staff.

The existing and functioning university wide quality assurance office was perceived by the respondents as a way to improve instructional quality. It oversees the instructional quality of each college by assessing its instructional activities using criteria set by CHED and/or Accrediting Agency of Chartered Colleges and Universities in the Philippines (AACCUP).

The existence of laboratories with basic equipment was also perceived by the respondents as an advantage. Administrators program the yearly improvement of facilities and acquisition of equipment. To ensure that the planned improvements and acquisitions are realized, strong university administration support was secured.

Accessible learning resource center was also recognized by the respondents as a vital item for instructional quality. Reading rooms and mini-libraries with internet connection is a must have so that students can readily reinforce their classroom learning through access of reading materials such as books, journals, among others.

However, the deans of the COEs felt that there are also weaknesses, drawbacks and challenges that they should address to better improve their institutions quality of instruction. Budget has to be increased for equipment and supplies. They also considered having an increase in the laboratory fees of students and to actively pursue resource generation such as donations from alumni and others as a way to augment monetary constraints. Other respondents suggested effective handling of income generating projects and improvement of the financial management services of their universities as means to help solve budgetary problems. Respondents also noted that lobbying for higher budget allotment is a way to resolve financial burdens.

The respondents also felt that the compensation package of their faculty is not attractive enough to retain the best and the brightest workforce. Furthermore, the lack of existing items for faculty teachers also affected the recruitment and retention of faculty veterinarians. The respondents felt the need to provide items for their contractual faculty veterinarians.

The respondents also felt that there should be strong administrative support to effectively implement the faculty and staff development program. For them, there is low motivation for some faculty to pursue graduate degrees due to slow implementation of promotion scheme in the university. Encouragement and support for their faculty to attend relevant degree courses, trainings, seminars, workshops, and conventions done locally and abroad was also felt necessary.

Rapid turnover of faculty members due to better opportunities abroad was identified as a major problem. One respondent opined that their solution is to pursue mentoring is a way to minimize the problem of rapid faculty turnovers. Mentoring is where a senior faculty trains a junior faculty such that in the event the senior faculty leaves, there is a junior faculty who will take over his role. Other incentives identified by the respondents to retain faculty veterinarians include free tuition for the dependents of the faculty who are currently in the university, study leave with pay, reduced teaching load for faculty on part time study, and cash incentives for publication in international refereed journals, for professorial chair lectures and for preparation of laboratory manuals.

Another challenge felt by the respondents that affected instructional quality is teaching load. For them, there is a need to deload teachers to improve teaching quality and for teachers to be encouraged to do research work. They also believed that professorial ranks must devote more time in the conduct of research.

The respondents also felt the need for state-of-the-art equipment and laboratory facilities to maintain instructional quality. They also felt the need for the regular replenishment of needed reagents and materials and the repair and maintenance of existing laboratory equipment. A respondent shared that their institution created an instructional instrument and equipment repair service center to maintain their existing equipment.

The respondents also felt the need to improve their library holdings. There was a felt need to have regular subscription to veterinary journals of local and international publications to be a rich source of information of new developments in the field of veterinary medicine. Some respondents had lobby for an increase fund allotment to subscribe to veterinary journals and budget to subscribe to more online resources.

Moreover, a university-wide computer network system must be further improved in order to maximize information, communication and technology (ICT) capabilities of each college and to enhance access to online teaching resources. Respondents had plan to improve their data bases and information systems and to provide free WiFi access to all campus buildings. They also encouraged and gave support to faculty to train in e-learning methods to prepare them for the implementation of a paradigm shift in methodologies from a generally informative teaching to information sharing and analysis.

Best Practices

There were four best practices in instructional quality which include (1) maintaining and retaining experienced school administrators; (2) attracting, hiring, and maintaining competent veterinary teachers; (3) developing state-of- the-art facilities; (4) providing better library and ICT services and facilities.

According to OIE (2013), veterinary education needs to be strengthened with respect to its competency as it relates to the delivery of national veterinary services. Furthermore, the tasks of veterinary medicine and veterinary education are greater than ever throughout the globe. It is important for veterinary education to re-examine the approaches that have been used, and evaluate on individual school basis which may best achieve its increasing and expanding responsibilities (Klosterman, Kass & Walsh, 2009). The practice of consideration and integration of major national and international developments in the field of veterinary medicine in the DVM program is crucial in increasing the quality of educational outputs. As it is evident in the performance in the licensure examination, COEs had a consistent performance in the licensure examination for veterinarians. If veterinary schools are responsive to the call of reviewing their DVM programs in the light of new developments, their graduates may perform better in the board examinations. Furthermore, the competencies of graduates from such schools are better as they are deployed anywhere in the country and the world.

The author observed that the maturity of administrators may also matter in making the process of integration of developments in the DVM program successful. Most administrators of COEs had served for some time. Snyder (2007) proved the function of the institution's administration in putting value on innovations and responsiveness to the dynamics of education, society and human development to promote conducive environments for learning. On top of the length of experience, leadership qualities of administrators matter in improving educational outputs. Leadership is one key aspect to improve instructional quality through proper motivation of teachers and students alike.

Craven (2009) identified the role of the quality of faculty of educational institutions in increasing the quality of educational outputs. He also mentioned that academic staff numbers and qualifications must be sufficient and appropriate to carry out the educational program and realize the mission of the school. The faculty profile of COEs demonstrate increase in the number of post-baccalaureate degree holders. Moreover, the longer length of services of COEs' faculty members may enhance the quality of learning inputs to the students. Quality inputs may also come in the form of the quantity and quality of publication of instructional materials produced by seasoned teachers in COEs. COEs encourage and provide for the publication of instructional materials to ensure effective delivery of learning to students and guarantee quality of graduates in the future.

A way of maintaining competent teachers as perceived by COE administrators is the conduct of regular evaluation of faculty and staff by students, peer and supervisors. In addition to this, an active faculty and staff development is a very important part of maintaining qualified, effective and efficient faculty and staff. There was a significant positive effect of the faculty development program on teachers' perceived competence in the study by Boerboom et al. (2009). Attendance to relevant degree courses, trainings, seminars, workshops, and conventions done locally and abroad is another way of maintaining quality teachers.

Novak (2002) believed that more than the number and qualifications of personnel, issues regarding faculty contract, compensation and intellectual property rights need to be addressed to ensure quality educational outputs. The compensation package of veterinarians in the academe is not attractive enough to retain the best and the brightest workforce. Rapid turnover of faculty members due to better opportunities is identified as a major problem. 'Brain drain' in veterinary schools is a consequence of the rapid turnovers and mentoring is an identified way to address this problem. Mentoring is where a senior faculty trains a junior faculty such that in the event that the senior faculty leaves there is a junior faculty who will take over his role.

The author also observed that COEs practice maintenance of congruency of the faculty members' qualification to the subject assigned to them. In COEs, this was done by assessing present faculty recruitment and establishing priorities for immediate hiring based on recognized needs and matching faculty with recognized needs for expertise.

The COEs develop state of the art facilities to enhance instructional activities. Facilities used in teaching and research must be sufficient in number, appropriately designed and well maintained (Craven, 2009). It is evident that all COEs reached the 100 percent compliance to the minimum requirement for functional facilities. These facilities and equipment were developed to carry out and support instructional activities that strengthen the hands-on experiences of students, ensuring the quality of graduates. The acquisition of these facilities and equipment entailed an effective way of resource generation in the part of the COE administrators through developing, supporting and recognizing research collaboration and productivity, encouraging interdisciplinary animal health researches, and sourcing of research study/projects grants from local and international funding agencies.

Craven (2009) also looked at the availability of library services, information, communication and technology capability as a key indicator for the performance of veterinary schools amidst global needs. COEs adequately supported students with library, electronic media and related information services. Same with the case of laboratories, facilities and equipment, provision of these services entails a sustained resource generation on the part of the school administration. With the provision of these services, quality educational outputs were achieved by the COEs.

Conclusions and Recommendations

The study looked into the perception of the deans of COEs on the strengths, challenges and best practices of COEs in Veterinary Education in the pursuit of instructional quality. In terms of instructional quality, there were five strengths, four weaknesses, five opportunities and two threats noted. The study also documented the best practices of the COEs, four of which are: (1) maintaining and retaining experienced school administrators; (2) attracting, hiring, and maintaining of competent veterinary teachers; (3) development of state-of-the-art facilities; (4) providing better library and ICT services and facilities.

This study was primarily intended to identify the strengths, challenges and best practices of COEs in Veterinary Education in the pursuit of instructional to aid improvements to other veterinary school in the country as ASEAN 2015 is fast approaching. To face the challenges of ASEAN economic integration by 2015, veterinary schools in the country need to adopt the documented best practices to aid self improvement.

REFERENCES

Bender, B. E. (2002). Benchmarking as an administrative tool for institutional leaders. New Directions for Higher Education. Issue 118, pp 113-120.

Boerboom T. B. B., Dolmans D. H. J., Muijtjens A. M. M., Jaarsma A. D. C., Van Beukelen P., and Scherpbier A. J. J. (2009). Does a faculty development programme improve teachers' perceived competence in different teacher roles? *Med Teach*. Volume 31 (11), pp 1030-1031.

CHED (2007). Commission on Higher Education Memorandum Order (CMO) No. 51 series of 2007. Implementing Guidelines for the Selection of Centers of Excellence (COEs) and Centers of Development (CODs) in Agriculture Education.

Craven J. A. (2009). Matching veterinary school accreditation to the global needs of the profession and global society. *Revue Scientifique Et Technique*. Volume 28 (2), pp 847-854.

Fedler, A. J. (2001). *Fishing, Boating, and Aquatic Stewardship Education: Framework and Best Practices Recommendations*. VA: Recreational Boating and Fishing Foundation. pp 4 – 17.

Klosterman E.S., Kass P. H., and Walsh D.A. (2009). Approaches to veterinary education--tracking versus a final year broad clinical experience. part one: effects on career outcome. *Revue Scientifique Et Technique*. Volume. 28 (2), pp 797-810.

Mosier, R. E., and Schwarzmueller, G. J. (2002). Benchmarking in student affairs. *New Directions for Higher Education*. Issue118, pp 103-112.

Novak, R. J. (2002). Benchmarking distance education. *New Directions for Higher Education*. Issue 118, pp 79-92.

OIE (2013). Retrieved from http://www.oie.int/support-to-oie-members/veterinary-education/

Snyder, Kristen M. (2007). The European education quality benchmark system: helping teachers to work with information to sustain change. *European Journal of Education.* Volume 42 (3), pp 425-435.

Ramirez, V. E. Philippine maritime and nursing education benchmarking with APEC best practices in Tullao, T. Jr. S. ed. (2003). *Education and globalization*. Makati City: Philippine APEC Study Network and the Philippine Institute for Development Studies. pp 273 – 333.

Students' Expectations Towards Teaching and Learning Process for Entering into the AEC Era

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ABSTRACT

The ASEAN Economic Community (AEC) which is the regional economic integration will be enforced in 2015. Countries in ASEAN have large diversity. They prepare various policies and activities to enable citizens to adjust to changes which will follow, for example, there will be more exchanges and mobility among people in the region hence governments are supporting education institutions to promote learning about ASEAN (Association of Southeast Asian Nations). This research aimed to investigate the expectations of students pursuing teacher degree regarding the teaching and learning processes which could help them to prepare to enter the AEC (ASEAN Economics Community). Focus group interviews were performed with 1st to 4th year students in the Faculty of Education in Ramkhamhaeng University in Thailand. Students could freely express their opinions and concerns regarding AEC and their personal development. Themes were derived from the interviews. Results revealed that students expected the teaching and learning process to educate them in 5 issues: (a) learning objectives (b) class materials (c) teachers' qualification (d) application of learned materials and (e) ethical issue.

***Keywords*: AEC, students' expectations, teaching and learning**

Introduction

Countries cannot stand alone in the networked globalization era. The trade disputes among countries especially regarding tax and tariff as well as trade barriers led to the establishment of many bi-, and multi-lateral trade agreements among countries. The World Trade Organization (WTO) was established on 1 January 1995 (World Trade Organization, 2014) in order to seek cooperation among countries in the world in order to reduce the disputes and promote economic well-being for member countries (Bateman, 2014). Currently 160 countries are members of WTO. In the regional level, co-operations were also formed, for example, the European Union which aims for the economics, societal and cultural integration (European Commission, 2014). The integration promotes European Union (EU) to become one of the strongest economies in the world today. Countries in Southeast Asia (SEA) also form similar co-operation and integration. Formerly, there were several attempts to integrate among countries in Southeast Asia (SEA) but those failed because countries in Southeast Asia have a lot of diversity and adversity through history so countries were rather protectionist against each other. For example, people in SEA use different language, unlike EU people who have Grego-Roman foundation and have similar languages. Countries in SEA have own national languages which are rather different. Although people in Singapore, Malaysia, Brunei, and Indonesia can understand each other, Thai, Philippines, Lao, Myanmar, and Cambodia have different languages. But now, due to the forces of globalization and world tight economy system, countries realize the need to co-operate else each country in SEA wouldn't survive if compete alone (Thepchatree, 2009a).

The Association of Southeast Asian Nations (ASEAN) was established in 1967 by 5 founder countries namely Malaysia, Indonesia, The Philippines, Singapore and Thailand. Bangkok Declaration was singed in order to strengthen the economics, society and culture among countries in the region and ASEAN blueprint or roadmap was drawn.The member countries seek to promote cooperation in 3 areas or the 3 pillars of ASEAN: ASEAN Security Community (ASC), ASEAN Economics Community (AEC) and ASEAN Socio-cultural Community (ASCC). AEC was first achieved through the agreement on ASEAN Free Trade Area (AFTA) in 1992 with the goal to reduce trade and tariff among 6 countries in the region. Other countries were convinced to join later. In 1999, all 10 ASEAN member countries (Brunei,Cambodia, Indonesia, Lao, Malaysia, Myanmar, The Philippines, Singapore, Thailand and Vietnam) agreed on AFTA. AFTA was expand into AEC agreement which will start in 2015 with the aim to transform ASEAN nations into single market and production base with free flow of skilled worker, investment, and capital with the market size of more than 600m population in order to compete in the global trade arena(King Prajadhipok's Institute, 2012). The timeframe development of AEC is shown in table 1.

Table 1. **The development timeframe of ASEAN Economic Community**

Year	Agreements
1967	Bangkok Declaration – the establishment of ASEAN
1992	ASEAN Free Trade Area (AFTA) agreement
1996	ASEAN Industrial Cooperation Scheme(AICO)
1997	ASEAN Vision 2020 formulated
1998	Hanoi Plan of Action (HPA) ASEAN Framework Agreement on Service (AFAS) ASEAN Investment Area (AIA)
2000	Initiative for ASEAN Integration (IAI)
2001	Roadmap for Integration of ASEA (RIA) ASEAN Competitive Study
2009	ASEAN Trade in Goods Agreement (ATIGA)
2011	ASEAN Comprehensive Investment Agreement (ACIA)
2015	ASEAN Economics Community (AEC) in force

Countries in Southeast Asia are facing unprecedented socioeconomic challenge. New forms of wealth are emerging across the region. An important force that changes Asian countries from the past into modern era is the influence of religions from other regions such as Buddhism, Hinduism, Islam and Christianity. Parts of these religions were selectively blended with the indigenous belief systems to form a complex modern value system difficult for outsiders to understand (Dayley and Neher, 2013). It is said that no co-operation groups in the world is as diverse as ASEAN (Thepchatree, 2009a). We have people who follow all major religions in the world, earners among the poorest who earned USD600 per year and among the richest who earn USD50,000 per year. AEC member countries, with different belief systems, need to struggle to find common conducts in order to overcome barriers against full economics cooperation.

ASEAN countries, just like other countries, have different strengths and weaknesses. In AEC, each country must focus on her strengths and use member countries' strengths to cover a country's weakness. Together with the cooperation on many developments such as logistics, technology, and etc., many changes are introduced in the whole regions' economic and market structure. There is a necessity that people in the region should adjust themselves in order to cope with the changes in the ASEAN environment.

Higher education has the duty to prepare students to become quality member of AEC. The teaching and learning process should be adjusted to reflect the changes in the environment, economically, societally and culturally. With this need, educators should abreast themselves with the knowledge about AEC and tailor the education system to help students to develop. In this regard, the expectation of students is an important consideration for educators. Hence, this research was conducted with the aim to investigate students' opinions on their expectation regarding the teaching and learning process which they believe can help them in the AEC era.

Methodology

The objective of this research was to investigate students' expectations from the higher education system which can help them function in the AEC era. The researcher utilized focus group interview technique to elicit data from informants. Focus group interview is a data gathering technique that enables informants to think while discussing with each other. Ideas can be generated through the discussions. Ten focus groups were organized. Freshmen, sophomore, junior and senior students in the Faculty of Education in Ramkhamhaeng University in Thailand were recruited voluntarily. Each focus group consisted of 10 students from the same years of study to yield homogenous groups (Zigmund, 2011). Topics for discussions were students' expectations from education system which they need for their (and their future students') preparation to enter AEC. The researcher facilitated the discussion and motivated students to express their opinions and concerns regarding AEC and their personal development particularly the issues relevant to their needs or expectations from the teaching and learning process which they thought could prepare them to enter the AEC era. Data were recorded verbatim.

Results and discussion

Data from focus group interviews were analyzed and themes were elicited. Most students mentioned they were not confident that they will be able to work well in the new environment of AEC. There are tremendous amount of changes to be learn and handled. Five themes emerged from the data. Students reflected that they need to acquire certain knowledge and skills and they expect the teaching and learning process should be modified in order to prepare them for the forthcoming AEC era. These themes are (a) learning objectives, (b) class materials, (c) teachers' qualification, (d) application of learned materials and (e) ethical issue.

Learning objectives

Students express their opinions that Thailand's current learning objectives basically emphasize the technical knowledge, especially science. The government and education institutions aim to produce workforce for businesses and industries. The integration among countries needs interpersonal capability and networking. Hence, the learning objectives should include the aims to enhance interpersonal relationship capability rather than technical knowledge alone. Socio-cultural objectives should be included. The curriculum may have to be revised to reflect the changes that AEC brings about. The objective of learning should aim to prepare students to become a quality AEC citizen or world citizen, technological-wise and human-wise. Teaching and learning should be broadened to include regional perspectives.

Class materials

Students show their concerns that they lack knowledge about other countries in order to adjust themselves for the AEC integration. Workforce is able to cross the border to work in other member countries easier than before. The visa system and work permit will be easier to obtain. Hence, students expect to work with people from other countries or they may have to work in other countries. Without a thorough knowledge about other countries' history, culture, norms and believe systems, it would be difficult for them to create proper work relationship. Cross-cultural contents should be offered. Socio-cultural knowledge should be offered in order for them to know the rules of conduct in other ASEAN countries.

English is one of the major concerns of students. Many Thai students lack adequate English proficiency but the AEC integration needs a medium for communication. English is currently used as the medium for communication among ASEAN countries(Thepchatree, 2009b) so students expect that English will continue to be used among member nations. Furthermore, many students think technology is also important in the future. Class content should include technological knowledge especially in the area of Information Technology (IT). Materials about AEC should be added into every subject, for example, member nations' economy should be included in economics courses, accounting standards in each country should be added into accounting courses.Law and regulations are also very important for them to function properly such as international treaty and acts, child abuse, immigration treaties should also be included.

Teachers' qualification

The informants suggested that many teachers are bounded in the traditional student-teacher relationship mindsets. Many teachers are too conservative and against changes but the joining into AEC bring about major socio-economic changes. Unless teachers open their mind and become flexible to accept new ways of seeingand seek new visions, they wouldn't be able to learn the new information about foreign countries. Hence, they would not have sufficient knowledge about AEC to transfer to students. Teachers should have experience with people in other countries. Several students mentioned they want their teachers to have work experience in ASEAN member countries. Hand-on experience in other countries would benefit the students. In short, students want teachers to become more international or world citizen rather than the old-fashioned conservative teachers in the traditional teaching and learning approach. Some students mentioned about the attire teachers wear. Many teachers in Ramkhamhaeng University always dress very traditionally which they said does not portray the international appearance and they do not have confidence that such teachers could deliver them international knowledge.

The informants are teachers and they reflected about modern teaching and learning environment. Students in the modern era have lower respect and tolerance towards teachers than before. Teachers should know students' psychology and have the skills to draw attention from students. Most importantly, skills in teaching are also required so teachers could teach them properly. Finally, teachers should be well averse in devising the tools and methods to assess students' accomplishment with certain standards which are applicable to class objectives.

Application of learned materials

Students want to have more case studies about issues among ASEAN nations. Information from case study could help them to learn and apply knowledge about other countries. Assignments should be designed so that students would seek information about other member countries and their behaviors. Moreover, students also suggest that there should be educational trips to other countries so they would have opportunity to learn the ways people work in other countries. Exchange programs with universities in other countries for both teachers and students could help both parties to function in other countries as a practice. Scholarship should be offered for both groups to take courses or programs in other member countries so that students and teachers could learn from practice and also create relationship with personnel in other countries. There are many research studies in Thailand regarding AEC, these should be disseminated among member nations to enable people in the member nations to better apply knowledge.

Ethical issue

Students agreed that the ethical standards are different among countries. This makes it difficult for co-operation in practice. Ethical standards enable a society to maintain justice and fairness. Without common or agreed upon code of conduct, there will be chaos and disputes. Common ASEAN ethical conducts should be created in order to be used as the standard ethical codes among member countries. There are a lot of ethical issues students expected from education system. Since AEC co-operation involve legal binding issues, the observation of intellectual property, code of ethics and labor welfare are issues they would like to know in order to protect themselves against unlawful conduct either by themselves or being ill-treated by others. Honesty and responsibility should be enhanced so people could live together in the community. Corruption should be prohibited. Good governance should be promoted among member countries.

Conclusion

Students realize they have to compete with people from other ASEAN nations in the coming AEC era. They want to advance themselves and want education institutions to provide them with proper teaching and learning system to enable them to become a qualified member of ASEAN. They would like to learn things beyond technical knowledge alone. Formerly, Thailand focused on mobilizing the country technologically. Science knowledge was promoted to advance the well-beings of people. Hence, Thailand education system had a competitive perspective to compete with other nations. Under the new integration scheme, Thailand should be co-operative rather than competitive. Hence, the education should aims towards more socio-cultural issues. Students emphasized that socio-cultural capabilities and knowledge are necessary. Many ASEAN and AEC relevant knowledge are required. Such preparation is unlikely if teachers and educators do not open their minds to seek new ideas and information first. Furthermore, universities in the region should create network and share information in order to promote better knowledge and application of knowledge among students in member countries.

In conclusion, students realized they need to develop themselves to meet the requirement of the free flow of skill-workers and trade within the region. They implied they lack necessary skills. Hence, higher education institutions should incorporate their needs and expectations and revise the curriculum and course contents to match their needs. Last but not least, this research was conducted with students at Ramkhamhaeng University as the informants. There is a limitation that the result might apply only with students with similar qualifications and perspectives. Students in other universities might have different opinions. Another research project to include students from other universities will contribute further to the knowledge in this area.

Thailand's education philosophy was rather Essentialism which focuses on the transfer of the country's traditional knowledge along from generations to generations (Wattanapanit, 2014). Now that Thai culture is blending with other ASEAN cultures. The philosophy should change to be more progresstivism because we have to adopt the ASEAN culture, traditional philosophy may not be appropriate in the AEC era. Progressivism educational philosophy should be adopted. Progressivisitic philosophy aims for the learning of diverse people and live together in peace. Hence, the educational philosophy of education institutions should be changed rather than to stick with own culture.

REFERENCES

Bateman, T. and Snell, S. (2014). Management: Leading & Collaborating in a Competitive World (11thed.). NJ: McGraw-Hill/Irwin.

Dayley, R. and Neher, C. D. (2013). Southeast Asia in the New International Era (6thed.). Boulder, CO: Westview Press.

European Commission. (2014). The EU single market: General policy framework. Retrieved on 27 July 2014 from http://ec.europa.eu/internal_market/top_layer/index_en.htm

King Prajadhipok's Institute.(2012). A report on the readiness and adaptation of Thailand for the entering into AEC in 2015. Bangkok: S Charoen. [in Thai]

Thepchatree, P. (2009a). The ASEAN Economics Community. Bangkok: Thammasart University Press.

Thepchatree, P. (2009b). Towards ASEAN Community 2015. Bangkok: Thammasart University Press.

Wattanapanit, N. (2014). General Knowledge in Education. Bangkok: Ramkhamhaeng Press.

World Trade Organization. (2014). What is the WTO. Retrieved on 28 July 2014 from http://www.wto.org/english/thewto_e/whatis_e/whatis_e.htm

Zigmund, G. W. and Babin, J. B. (2011). Exploring Marketing Research (11thed.). NJ: Cengage Learning.

Opinions to Higher Education Appraisal Criterions of Off-Campuses in Thai Upper Central Region of Thailand

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ABSTRACT

This paper presents the opinionsto Higher Education Appraisal Criterions of off-campus education management and a comparison about performance of supporting factors for off-campus education management. Usingopinion poll, observe and compare performances of 4 off-campus learning centers in the central region of Thailand include 70 people, who were executive, authority and professor of the center, by following 7 rules from the higher education commission and 11 supporting factors. Standard deviation and arithmetic mean had been used to analyze data. From the result, the highest mean for opinion about opinion to higher educationcriterions of the higher education commission is student part. The secondis location. Then it is curriculum, and the lowest is educational quality assurance. ThepsatriRajabhat University Doembang was under standard in curriculum, quantity of professor, management and educational quality assurance. The result from performance comparing shown that not onlyThepsatriRajabhat University Doembang, research institute and exchange program, but also SuanDusitRajabhat UniversitySuphanBuri,ChandrakasemRajabhat UniversityChainat and KamphaengphetRajabhat UniversityMaesotwere able to proceed on education program.

***Keywords*: quality assurance, off-campus education, proper standard**

Introduction

Government has a policy to push forward universities to control and manage by themselves, but Government is still giving supporting fund. For this reason, many universities have to earn money in every ways they could, for instance, renting out area for restaurant and coffee shop, funding research from outside and forming an off-campus education center. The higher education commissionhad evaluated that over 60 percent of off-campus education centers were unable to continue open in year 2011 because ofunder standard of 7 rules which were curriculum, professor, location, facility, administration, and student and educationquality. TheIncreasing of expanding for off-campus education centers becomeproblem, so the higher education commission must form a standard module to create effectiveeducation. In year 2012,the higher education commissionindicated that there were 1,643 off-campus education centers in Thailand. Some centers were below standard level ofministry of education which lead to criticizing about quality of student between main campus and off-campus. KamjornTatiyakavee,Deputy Secretary-General for the higher education commission, said that it was such a great beginning to start off-campus center, but it also needs consecutively development to create effective administration.In year 2011, there were 96 off-campus centers from 150 institutes, 684 centers giving information to 140 institutes. 32 institutes and 45 centers were informedwhich was 4.6 and 6.5 percent respectively. In year 2012, 43 institutes, 110 centers and 285 curriculums pass a standard for 35 curriculums, need developing for 57 curriculums and failed for 186 curriculums which were 12.3 and 20 percent respectively.In year 2013, 52 institutes 164 centers422 curriculums were in the progress of evaluation. (The higher education commission, 2013)

The university needs to follow the rule of off-campus center evaluation which has invested bydemanding of local area for 13 years before the evaluation. The university has formed a cooperation network to create activity and to compare performance to keep forwarding progress.More factors from Pongwirat, Nipa. (2004).Benchmarking of education management in 20 items as curriculum according to local necessity, Institute research, Develop a research center, Community research service, Student competencies development, Buddhismactivity, Infrastructure development, Dormitory, Sport center, Computer system, Library, Architecture, Budgets, Income, Quality insurance, Scholarship, Exchange programs, Local information center, University goals and Culture.

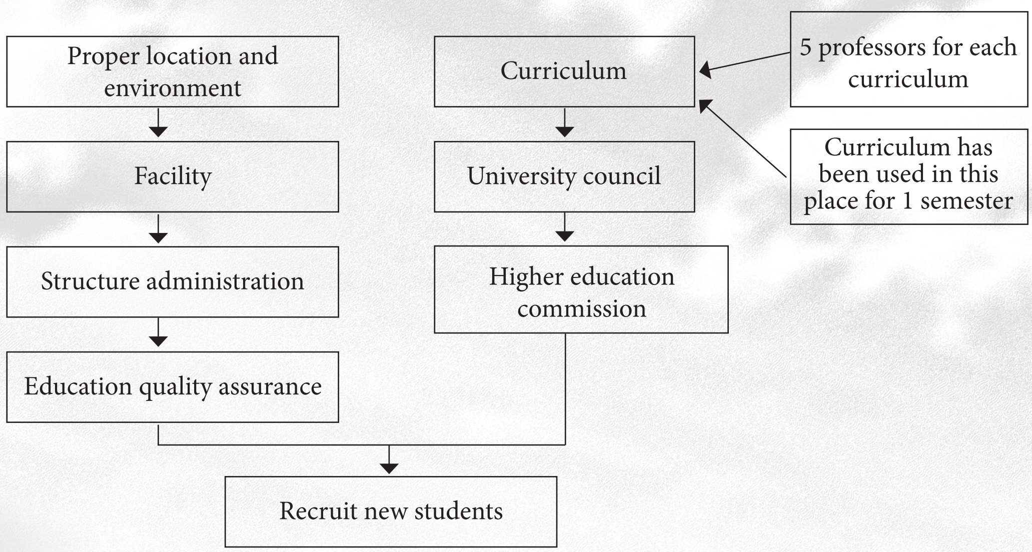

Figure 1 **Procedure of forming off-campus center**

Purposes of Research

1. Study about opinions to higher education criterions of off-campus education management.
2. Compare about performance of supporting factors for off-campus education management.

Scope of Research

Boundary of population purposive sampling from 4 off-campus education centers, which are cooperation network with Chainat learning center, is 70 amounts of people who were administrator at the center including officer both of academic and supporting.

Boundary of content Proper module of forming off-campus center, for instance, curriculum, professor, location, facility, administration, student and education qualityincluding performance comparing of 7 rules of the higher education commission and 11 supporting factors.

Boundary of areaof off-campus in the central of Thailand.

Research Framework

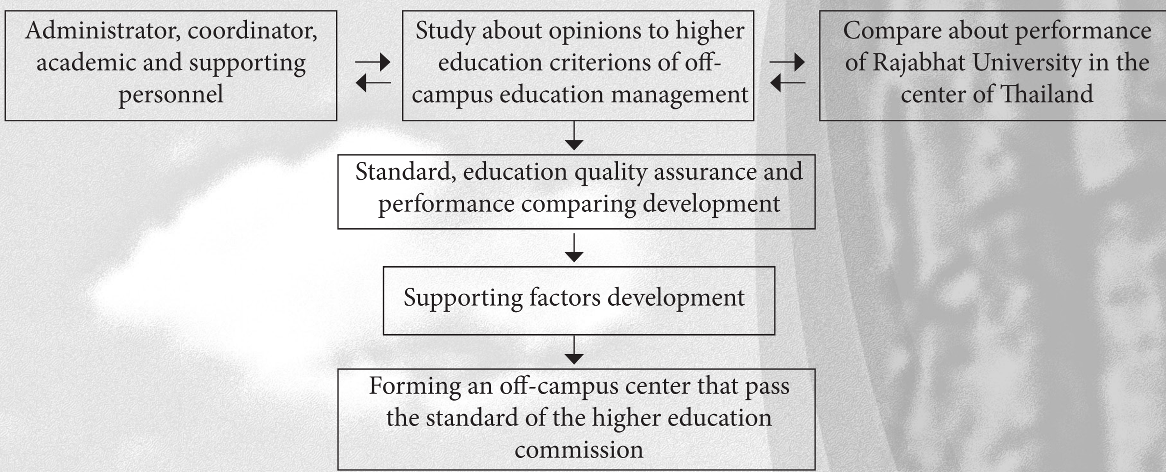

Figure 1 **Procedure of forming off-campus center**

Research Methodology

Research Tools

Tools that have been used in this research were a poll about opinion to higher education criterions commission and interviewing form about off-campus education management. The poll has reliability value for 0.8523. There are 4 parts in the module, for instance, curriculum, professor, location and facility. About the interview form, it has IOC between 0.88 and 0.90

Data Collection Method

1. Study data about off-campus module management
2. Create a poll and an interviewing form
3. Collect poll back from the population
4. Interview administrator and personnel about off-campus module management
5. Compare performance of off-campus education center with the standard module
6. Conclusion

Data analysis

Analyzing quantitative data and descriptive statistics, for instance, frequency, percentage, mean and standard deviation. Analyzing qualitative data has been used to analyze contents and group them, then find a connection between data and verify by qualitative analysis.

Research Findings

1. Study opinion about higher education criterions of off-campus education

1.1 General information of respondents

Most of respondents are female. There are 48 females and 22 men. There are 39 people completing master degree, 27 people completing bachelor degree and 4 people completing doctorate degree. Most of them have work experience less than 10 years, but there are 21 people who work more than 30 years, 10 people who work between 20 and 29 years and 8 people who work between 10 and 19 years. About their position, there are 32 people who work in supporting section, 29 people who work in academic section and 3 people work as an executive.

1.2 Opinion for module of off-campus education management

Table 1. **Opinion for module of off-campus education managementabout curriculum**

No	Curriculum opening	$\bar{x}$	S.D.	Opinion
1	Expanding opportunity for an education base on requirement of the local area.	4.23	0.871	Most
2	Useful for the student and local.	4.24	0.731	Most
3	Approvement curriculum from council.	4.11	0.808	Most
4	Curriculum has been used in this place for 1 semester.	3.84	0.973	Most
	Total	4.10	0.656	Most

From table 1 shown that an average total data is 4.10 and highest opinion. No. 1 has a highest mean at 4.23 and highest opinion, and No. 2 is come in second which has mean at 4.24 and highest opinion.

Table 2. **Opinion for module of off-campus education management about professor**

No	Professor	$\bar{x}$	S.D.	opinion
1	Professor follows the schedule plan.	4.23	0.745	Most
2	Professor has enough qualification as require in module.	4.11	0.826	Most
3	Special professors have an appropriate qualification with their program.	4.04	0.751	Most
4	A professor must not be the same as campus center.	3.91	1.032	Most
5	The proportion between professor and student is proper enough to create effectively education.	3.89	0.877	Most
6	Lesson sometimes take place in off-campus.	3.51	0.959	Most
	Total	3.95	0.531	Most

From table 2 shown that an average total data is 3.95 and highest opinion. No.1 has a highest mean at 4.23 and highest opinion, and No. 2 is come in second which has mean at 4.11 and highest opinion.

Table 3 **Opinion for module of off-campus education managementabout location**

No	Professor	$\overline{x}$	S.D.	opinion
1	The centers have their own district.	4.43	0.693	Most
2	This place has enough area for students.	4.40	0.668	Most
3	Environment around the center are proper with students.	4.24	0.669	Most
4	Location and environment are reach a standard of higher education.	4.11	0.808	Most
5	Enough facility and security.	4.03	0.816	Most
	Total	4.24	0.504	Most

From table 3shown that an average total data is 4.24 and highest opinion. No.1 has a highest mean at 4.43 and highest opinion, and No. 2 is come in second which has mean at 4.40 and highest opinion.

Table 4 **Opinion for module of off-campus education managementabout supporting equipment and student service**

No	Supporting equipment and student service	$\overline{x}$	S.D.	opinion
1	Facility and equipment are same standard as the main campus.	4.01	0.825	Most
2	Facility is utilizing effectively for each major.	4.01	0.752	Most
3	Facility for professor use same standard as lecture room.	3.90	0.801	Most
4	Internet is strong enough to access from everywhere in center	3.94	0.740	Most
5	Lecture room, library, labatory and printer use same standard as the main campus	3.89	0.925	Most
6	Computer and high speed internet are used in the system	3.84	0.810	Most
7	There is a guidance service which everyone is able to use it	3.83	0.816	Most
	Total	3.92	0.665	Most

Table 5 **Opinion for module of off-campus education managementabout student service**

No	Student service	$\overline{x}$	S.D.	Opinion
1	Registration, adding subject, grading and bill payment are the system of university	4.17	0.636	Most
2	Developing student about Desired Characteristics	4.07	0.729	Most
3	Extra preparation about professional for student	4.00	0.681	Most
4	Student has an achievement according to proposal of program	3.97	0.722	Most
5	Extra activity help students has specify identity.	3.94	0.634	Most
	Total	4.03	0.549	Most

From table 5shown that an average total data is 4.03 and highest opinion. No.1 has a highest mean at 4.17 and highest opinion, and No.2 is come in second which has mean at 4.07 and highest opinion.

Table 6 **Opinion for module of off-campus education managementabout administration and cooperative with the campus**

No	Administration and Cooperative with the Campus	$\bar{x}$	S.D.	opinion
1	Administration follows the standard according to the rules from Thailand Qualification Framework for Higher Education	4.06	0.720	Most
2	Financial auditing is above-board and follows the procedure from the university	4.00	0.780	Most
3	Personnel structure follows the standard as main campus	3.99	0.789	Most
4	Administration have their own structure	3.90	0.783	Most
5	Procedures are followed the rule according to the procedure of education quality evaluation	3.91	0.737	Most
6	Evaluation commission work fairly and appropriate for an evaluation.	3.87	0.815	Most
7	Evaluation documents are follows the standard of evaluation	3.87	0.679	Most
8	Evaluation commission is friendly	3.89	0.753	Most
9	Evaluation conclusion must be obviously comply with the evaluation standard	3.81	0.786	Most
10	Evaluation pronouncement must be unconcealed	3.81	0.822	Most
11	Proposal of evaluation must be informedin advance	3.81	0.767	Most
12	Informationexchange must be unconcealed between adviser and student	3.77	0.641	Most
13	Location and facility visitation and evaluation conclusion is properly done.	3.73	0.700	Most
	Total	3.87	0.502	Most

From table 6 shown that an average total data is 3.87 and highest opinion. No.1 has a highest mean at 4.06 and highest opinion, and No. 2 is come in second which has mean at 4.00 and highest opinion.

2) Comparison about performance of off-campus education center in the center of Thailand

Table 7 **Comparison about performance of off-campus education in 7 sections**

Section	Opinion	Chandrakasam-Chainat	SuanDusit-SuphanBuri	ThepsatriDoem-bang	Kamphaengphet-Maesot
1. Curriculum	4.107	4	4	7pass1	6
2. Professor	3.950	Fully	Fully	Deficient	Fully
3. Location	4.242	Yes	Yes	No	Yes
4. Supporting	3.918	Yes	Yes	Yes	Yes
5. Student	4.314	Yes	Yes	Yes	Yes
6. Administration	3.879	Yes	Yes	No	Yes
7. Quality	3.910	QA	QA	No	QA

From Table 7 shown that All of campus pass the curriculum standard except for ThepsatriRajabhat University Doembangwhich has six program below standard leading to unable recruitment new students for next semester. About

Location of ThepsatriRajabhat University Doembang, it is under process of administration and still lacking of education quality assurance and executive. However, all of campuses are well proper in supporting and student section.

According to the standard evaluation for off-campus center, Curriculum has the highest priority which indicates ability to carry on this campus and recruit more students. However, with high potential of facility, location, executive, and education quality assurance will cause effective student as a quality standard requirement.

Table 8 **Comparison about performance of off-campus education in another sections**

Section	Chandrakasam Chainat	SuanDusit SuphanBuri	Thepsatri Doembang	Kamphaengphet Maesot
1. Researching	Yes	Yes	No	Yes
2. Community service	Yes	Yes	No	Yes
3. Religion, art, and culture	Yes	Yes	Yes	Yes
4. Dormitory	No	Yes	No	Yes
5. Information Technology system	Yes	Yes	Yes	Yes
6. Library	Yes	Yes	Yes	Yes
7. Building and hall	Yes	Yes	Yes	Yes
8. Fund	Yes	Yes	Yes	Yes
9. Scholarship	Yes	Yes	Yes	Yes
10. MOU	Yes	Yes	No	Yes
11. Vision	Yes	Yes	Yes	Yes

From table 8, another supporting factors need to be in part of performance comparing. ThepsatriRajabhat University Doembangis not only below standard of curriculum but also lacking of professor and executive. Therefore, ThepsatriRajabhat University Doembang failed the evaluation.On the other hand, other campuseswere approved by good evaluation standardand fully provide with supporting factors. So they are able to manage on education according to the standard of the higher education commission.

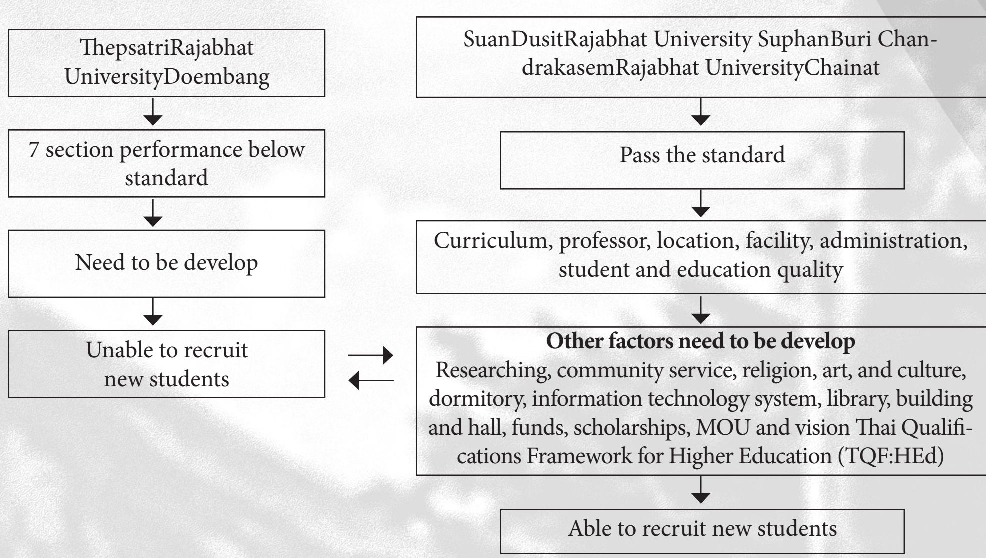

Figure 3 **Performance comparing chart of off-campus education center**

For the higher education criterions ThepsatriDoembang has to improve in the items of location administration and quality assurance to approve by Higher education Department.

The interview data to show the others support factors from benchmarking of education management which are in the details of higher education criterions. Three off-campuses such as ChandrakasemChainat, SuanDusitSuphanBuri, KamphaengphetMaesot are complete in:(1)Support Community Business Organization and local industry research.(2)Community service (3)Religion, art, and culture. (4) Dormitory. (5) Information Technology system. (6) library/information technology. (7) Building and hall. (8) Institute budget. (9) Student fund. (10)Build institute network and Community exchange activities. (11) Do have a vision to serve community need. ThepsatriDoembang has to develop in the items of location, dormitory, research, Community service, network and network activities to pass the criterions.

Conclusions and Discussion

According to the standard of the higher education commission, the result shown that a university, which educated student followed as the demanding in local area for more than 10 years, followed the procedure from an act of Rajabhat University.Abruptly increasing of off-campus to 1,643 centers in year 2011 leaded to education quality decrease, therefore 7 standards has been created.Nowadays, there are only 164 off-campuses center with 422 programs. From performance comparing of 4 off-campus center, only ThepsatriRajabhat University Doembangfailed in curriculum and professor section, so it was unable to continue the program. Above all, there were other factors which became part of performance comparing, for instance, researching, community service, religion, art, and culture, dormitory, information technology system, library, building and hall, funds, scholarships, MOU and vision according to Thai Qualifications Framework for Higher Education. The other campuses are highly potential fully provide with these factors, so they are able to continue opening program. In addition to StapornTawornatiwart (2007) who had researched about Principles means and form of off-campus education management chandrakasemrajabhat university chainat campus.The result shown that1) Education management serve community needs in formal and informal system. 2) The curriculum coordinate with community enterprises such as: construct engineer/community product design/management science/communityorganization management/community health/sustainable agriculture management/cooperative management/community environment management/ community product development and Community wisdom Information Center. 3) Arrange Community Training Center. 4) Arrange Culture Center. 5) Support Community Business Organization and local industry research. 6) Build network and Community Information exchange. 7) Develop academic environment and support facilities such as: library/informationtechnology system/education medias/sport complex/dormitory/Buddhism center/student complex/ arranged environment and culture and 8) Arrange exchange program with international organization.

Research Suggestions

Suggestion

1. Evaluation commission should use same standard with education management organization.
2. Evaluation commission should clearly inform the result to the centers and other options to develop their problem.
3. Evaluation commission should change the period of time to report the result to the center, so the executive will be able to change a policy and procedure in time.
4. Evaluation commission should give more budgets to continue developing the center in case of they are qualified.

5. Develop in the item of student center, location and curriculums to serve the student needs.

Suggestionfor next research

1. Expanding scope of sampling population and provide all side of the country.
2. Should research about an option to develop the centers with increasing more academic service.

REFERENCE

[1] Chandrakasame – Chainat . Director.(2014) *Interview*.

[2] Johnson, Arik R. (2006). *Seven Steps to Effective Competitor Benchmarking*.(online). Available: http://www.aurorawde.com/benchmarking.htm.

[3] Kumpangpet-Maesod. Director.(2014) *Interview*.

[4] Office of the Higher Education Commission. (2014). *The External Academic Service Center Data*. (30 April 2014)

[5] Pongwirat, Nipa. (2004). *Benchmarking ofEducation Management UsingSchool-Based Management*. Doctoral research (Education Administration). Bangkok: Graduate school. Srinakarintrarawirote University.

[6] Pongwirat,Nipa.(2005). *"Secondary Schools' Benchmark, Best Practice, SBM" in Participation towards EducationQuality Management*." pp. 25-35. Bangkok:Educational Area 1.

[7] Suandusit-Suphanburi. Director.(2014) *Interview*.

[8] Tepsatri-Deumbang. Director.(2014) *Interview*.

Development of A Model of Integrated Quality Management Strategies Using Advanced Execution Premium Strategies and Comprehensive Quality Assurance System for Public Universities

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ABSTRACT

This research was to develop a model of integrated Quality management for public universities deriving from academic literature, In-depth interviews, responding from the questionnaire, synthesis and examined by experts and trial. The findings showed the strategy model of EPQA in the line ofCSIPOCF gained. That are Context, Suppliers, Process - the proceeding of strategy management driven by the Office of Strategic Management (OSM) Output,Outcome and Feedback. This model is useful for application in Higher Education management in competitive advantage.

Keywords: **Integrated Quality Management Strategy, Execution Premium, Comprehensive Quality Assurance.**

Introduction

Strategy in the management of higher education institutions is a key factor for the economic development of the country. Internationally, competitive is the goal leading the organization to besuccessful,especially in the age of globalization. Higher education institutions must face challenges and stiff competition. To the survival of the institution,famous or high quality universities will be trusted and respected. Established a presence in the social also extends across the border to outer space or other countries. Seen from a reputable university with campuses in other areas,including foreign making institutions to accelerate development to enhance their ability to have the potential to be competitive. The quality of higher education is the key to competitive advantage. The cause of education reform throughout the world during the 21st century and implement serious reforms. We call this the century acentury of education reform,a century of quality higher education (Gustofson, 2009; Juran, 1991).

In addition to the strengthening of the reform to be more effective.Strategies, therefore, are needed for support group members, such as the European Union with the Association of Universities in Europe (European University Association) (Jenton, 2009) as well as other Asian countries, it has a network of universities (ASEAN University Network Quality Assurance - AUNQA) etc. (PinitiRatanukul, 2007) with a standard set of groups and power management. To help assess the quality, quality monitoring and development access to the same standard can approach. The strategic integration of quality management system to make the reform of higher education such as the development of a strong system of quality assurance and management system is a process. The steps are clear operational framework. Targets and benchmarks that can monitor performance, etc. It is constantly evolving. The quality standard is acceptabledeveloping strategies to improve the quality. It is a key part of the reform of management in raising quality standards for higher education. Development of quality assurance and quality management is a key factor in development and improve the quality of Higher Education (SEAMEO RIHED, 2012: 20).

The countries mentioned above have been developed to guide the medium-quality institutions adapted to the context and needs of each country and institution. In order to enhance management,following the expansion of the network to a share in the enterprise and other countries such as the quality of EFQM (European Fermentation Quality Management) in the UK has developed and agree to share in the European system, AUN - QA (ASEAN University Network Quality Assurance) shared among ASEAN countries and MBNQA (Malcolm Baldrige National Quality Award) is used worldwide. The quality of such institutions in the group was used as a standard in the development of the standards of the institution itself. Individual institutions have developed a quality system based on the context and needs of an organization or institution. To improve the quality of the institution's standards are recognized and the highest quality,the quality of the institution or the quality of products is the ultimate goal of the institution. Higher education institutions can make a sustainable competitive advantage.

Thailand recognizes the importance of quality as well. As mentioned in the National Education Act 2542 and Amendment Act (No. 3) Act 2553, stating that the agency provide a quality education and a quality assurance system in education and be considered as part of a process of education that needs to be carried out continuously. Covering the entire input (Input) process (Process) and output (Output) as defined in the ministerial rules and procedures for quality assurance in education. Higher Education Act 2553 (Commission on Higher Education, 2553: 3-9), and the external assessment by the Office of Standards and Assessment. The individual institutions will lead to the development of the above concept as a strategic management approach. The development of quality systems or their own internal quality assurance system.In accordance with the Higher Education Commission set to improve the management of the institution,to manage the quality assurance system or management of the institution that is the development of quality assurance as part of effective management. To adopt a strategy for management make administrative tasks conducted effectively and the factors contributing to quality in all parts of the institution. As a result, leads the quality and productivity of the system as well as the strategy and mission of the institution.

Thus, in a competitive situation of the institution, to enter ASEAN and Ranking of World Class Universities, Thailand has to change management or strategic management to solve problems and develop management and quality assurance system. However, it remains unclear whether the management strategy can cover criteria andsystem of quality assurance and also implementation of strategic deployment. In this way, we offer solution to integrate strategic processes,a unified policy that is linked to the policy of the university and led to the practice of the institution by the administration strategy,or the Office of Strategy Management (Office of Strategic Management-OSM) serves as a mechanism to link the track to support the achievement of strategic priority. Corresponding to the rapidly changing global society, the management of quality assurance, when a combination of new management concept called Integrated Quality Management Strategy orAdvanced Execution PremiumAEP). It is hope that this study will receive interest in a competitive situation of the institutionmanagement.

Literature Review

There are, in fact, many theories about changing management in academic text. Three of them are given here. First,Kaplan and Norton (2008), management concept is excellent (Execution Premium-EP) which has the concept of organizational management. The development strategy, plan strategy, align the organization ,plan operations, monitor and learn and test and adapt,The Office of Strategy Management (OSM) is a mechanism to drive the strategy in management of strategic plan and operation plan . These are widely applied in the management of change in both public and private organizations . And also in higher education institutions with a sample of University of Leed, UK.etc. Secondly,The concept for excellence (In search of Excellence-7S) of McKinsey (Peter and Walterman,1980) consists of an exchange of values (Shared Value) management skill (Skill) faculties or staffs (Staff) organization structure (Structure) working style (Style) management strategy (Strategy) and organization system (System). Finally,the concept of quality chain (Value Chain-V) by Michael E. Porter (Porter,1985), which is a concept in the management of the Primary Activities : inbound logistics, outbound logistics,marketing and sales and Secondary Activities: firm infrastructure, procurement ,human Resources and technology development. Those concepts are different ideas but the same goal ,which is the quality of organization. And management strategies related to the adoption of such a synthesis and integration. To get concepts of strategies management institutions, the new management at the top three concepts with the key concept of Kaplan and Norton(2008), can bedeveloped. Which is called Advanced Execution Premium-AEP, In search of Excellence -7S and Value Chain-V = referred to as AEPSV) will result in Innovation Management. These are mix concept using Kaplan and Norton's concept as a core concept for applies on higher education institutions.

For managing higher education institutions (MHEI),Srikanton and Dalrymple (2004, 215) has stated that in the past 20 years to improve the quality of the university has become an important issuewhich dated back to the trend since 1980 of a quality that has applications in the industry is of interest to the theory and practice of higher education. As already mentioned, using this, the university has been discussed in the literature of the higher education development service of the university to produce a higher flexibility as well as the structure of the university. Concepts in the management of the university relating to the application of tools andtechniques. By the way, the organization can get the most out of each part of the service. Apparatus and method for determining a way to improve the management of the university administration or the ability to efficiently and effectively manage the organization and to fulfill the needs of different stakeholders to analyze the way.Consequently, Knight and Trowler (2000) said thattwo forms of quality in higher education must be closely monitored, with 2 types of format (Type one quality and Type two quality). The type one quality consists of quality, evaluation, process design, clear step, consistency, motivation (rewards and punishment), one way communication, cause and effect ideas and transmission. For the type two quality, the concept of effectiveness, process oriented and flexibility, trust value, creativity and learning from mistake, self esteem, two way communication with careful senses are deployed. These quality management in higher education institutes have to improve continuingly according to competitive condition. Likewise,Noble (1999) claimed that strategy and implementation in organization top manager can also improve the effectiveness of the competitive management, For Thailand, The quality of higher education institute is evaluated base on themissions of each institutional group. Depending on the type of the institutions , the missions are different in term of the service area and levels of that are emphasized (Office of the Higher Education Commission, 2014)

In fact, many quality assurance concepts have been widely used in management in higher education institutes in Thailand. For in stance, the internal quality assurance system (Internal Quality Assurance)(Office of the Higher Education Commission, 2014). The external quality assessment (External Quality Assurance)

(The Office for National Education Standard and Quality Assessment, 2004) Regulatory Quality Education for operational excellence (Education Criteria for Performance Excellence: EdPEx) (National Institute of Standards and Technology : NIST,2513) , ASEAN University Network Quality Assurance: AUN-QA (Piniti Ratnukul, 2007), Criteria for Ranking of World Universities (World Class Ranging: WCR),Thailand Quality Framework for Higher Education: TQF - Hed.,(Office of the Higher Education Commission ,2009) etc. The system and criteria of quality assurance as mentioned above can be integrated for each higher education institution because some are the same. These are calledComprehensive Quality Assurance System (CQAS).

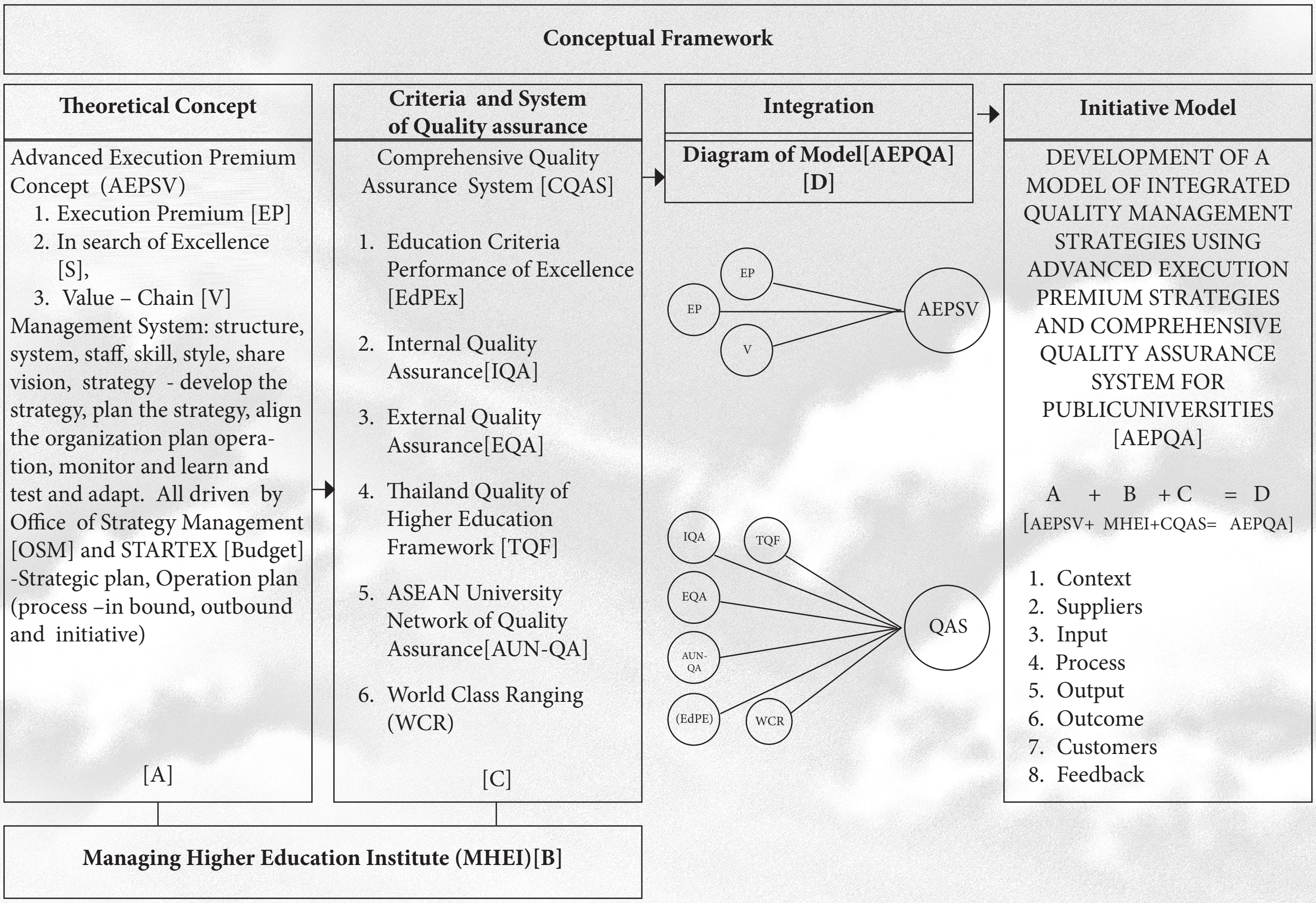
For concept of CQAScombiningor integratingof criteria and quality assurance system ,Kehunen & Kantola (2007) mentioned that concept of integration come from different ways by different institutions to integrate different methods into a single management system of the institution. Shawyun, 2012) agrees on this issue and proposes a concept for integrating quality management on information systems,and planning system called Integrated QMIPS (Quality Management, Information and Planning System) to emphasize the interconnected system management plan. Management Information Systems and quality management system .Similarly, the University of Lisbon. (Technological University of Lisbon, 2011) has developed an integrated quality management system called IQMS-UTL (Integrated Quality Management System) that focuses on the mission of the institution, which involves all activities.The purpose of the policy implementation to achieve the highest quality with a focus on basic principles, stakeholders, leadership, involvement of people. The desired target management process continuous improvement,database for decision and community relations, etc.

In addition, Mergen, Grant and Widrick (2000) stated that many colleges and universities have become more interested in applying principles of quality management to higher education but discussion of models of quality management is limited .Consequently, Scholtes (1998: 59) has proposed the SIPOC in the system or model, which is the "Scholtessystem" refers to the interaction and how coherence in the system. The system will have many smaller or narrower in scope, it is a framework and process. But that is the focus of the management is based on the process. The system is composed of and to refer to elements of the process are the objectives and functions of the system. Values of the organization are visible through the interaction of processes and procedures (Steps) referring to the elements of the way in one other reason to see things that interaction is a sequence of stages to meet the objectives, so the SIPOC Model is a system composed of processes, methods and procedures. Suppliers deliver Inputfor Process and then Output and Outcome. Customers who use services and to manage the situation by systematic concepts. Organizational context (Context) constitutes an important part. The feedback (Feedback) helps to improve the style of a new Model. Therefore, It is reasonable to propose CSIPOCF(Context, Suppliers, Input,Process,Output /Outcome, Customers and Feedback) for the alternative one.

Purposes

The purpose of this research isto develop a model of Integrated Quality Management Strategies using Advanced Execution Premium Strategies and Comprehensive Quality Assurance System for Public Universities

Conceptual Framework



Methodology

Since the objective of the study was to develop a model of Integrated Quality Management Strategies using Advanced Execution Premium Strategies and Comprehensive Quality Assurance System for Public Universities .Research is mixed method in the exploratory survey (An Exploratory Sequential Design) is a qualitative research. Followed by quantitative research methods. The population and sample are institutions that have been selected on the basis of the evaluation of the quality was good or very good and also outstanding in 10 universities of different institutional groups – 2 of each group (Group 1= Autonomous University, Group 2 = Public University, Group 3 = Rajabhat University, Group 4=Rajamangala University of Technology, and Group5 = Boromarajonnani College of Nursing. In - Dept interview was conducted to the Administrators or the Vice Presidents assigned and responsible, offering a total of 30 people (3 of each group of institution). According to Questionnaires,Likert's rating scale with a quality check for a match by 5 experts to determine compliance IOC (Item Objective Consequence) and have lunch using a Coefficient alpha (Alpha Coefficient), as described by Cronbach if the information is quantitative. These were conducted for 280 people of the Board Director of Quality Assurance ofwho were trained and had permission for quality assurance evaluators from Office of the Higher Education Commission(OHEC).And 21 experts are required.

Analyzed with content analysis and descriptive statistics were as follows:

1) For AEPSV, Content analysis on academic literature reviews of 3 theorist concepts were summarized.

2) For CQAS, Content analysis on academic literature reviews of 6 concepts of criteria and system of quality engagement were summarized.
3) For MHEI, Content analysis onIn- Dept Interview fact-to-fact interview of 30 administrators and confirmed by descriptive statistics (Mean, Standard Deviation, and Priority Need Index (PNI).
4) For AEPQA, Content analysis and integration of AEP, MHEI, and CQAS to develop a new model in line of CSIPOCCF. Thejudgment was made by experts.

Results

From data collection, the findings were as follows:

The development of integrated management based on Advanced Execution Premium (AEPSV), Managing Higher Education Institute(MHEI),and Comprehensive Quality Assurance System(CQAS),arean AEPQA Model in line with CSIPOCF. It was found that:

1. Context comprises of the special function offered with only a single field or the comprehensive university offered with several fields. There is a duration and period in the development of the institution, the purpose of establishment, vision, mission, values, core competencies, identity and unique position, and the environment in competition both internal and external, including the culture of institution, the stand point of competition, and group of institutions.
2. Suppliers consist of agency policy, a partnership or network and the former institution of students.
3. Input comprises of institutional structure, the database and the work system in the institute, resources for teaching and learning, the complex building, materials, the environment in learning,off office of Strategy Management, STRATEX (financing and budgeting), strategy plan and personnel (administrators, lecturers, and staff and students).
4. Process comprises of the administrative leadership of the executives, team, strategy - develop the strategy, plan the strategy, align the organization, plan operation, monitor and learn, and test and adapt. The strategic plan and operation plan are conducted.These aredriven by Office of Strategy Management (OSM) based on mission and strategies.The two processes are found. One, the main process comprises of administration and management- risk management, knowledge management, graduation production, student development activities, research and creative work, academicservice to community and social responsibility and preservation of art and culture. Two, supportive process comprises of Information Technology, Internationalization, and quality assurance.

4.1 The process of producing graduates consists of graduate admissions process in line with the plans. The teaching process has been set focusing the student-centered with curriculum management in accordance with the Thailand National Qualifications Framework for the Higher Education including curriculum development, Curriculum implementation into practice, Monitoring and evaluation curriculum , reporting and reviewing and improvement the process of curriculum. Student development consists of systems and mechanisms for consultation and information services, systems and mechanisms to promote students and alumni.

4.2 Process research and creative work includes policy setting, guidelines for doing research, research standards, research ethics, strategic plan for research and creative work, mechanism of management systems for research and creative work is the collection and analysis of selected research and creative work system, selection, analysis and synthesis research and creative work Integrating research and creative work with other missions, including dissemination of research and creative work in an academic conference or published in national or international journals with high impact factor and the implication of intellectual property.With reference to an outside agency or community systems and mechanisms to protect the rights of research and creative work.

4.3 To offer academic and social responsibilities include academic services. Social responsibility can be done by establishing the strength to the community. A wealth of knowledge guiding and solving social problems.The Center for Academic Services.and research in the area of expertise. And social services cluding the integration of science in giving service to the society, the academic mission of the institution and to evaluate the success of an academic service and social responsibility.

4.4 Maintenance and promotion the arts and culture consists of systems and mechanisms for the promotion and preservation of arts and culture. That are integrated with other mission of the Institute is to evaluate the success of the integration and the result is updated. And set standards in the arts and culture.

4.5 In part of information technology includes developing information technology in the institutions for management and decision, this is the basic information that can be found in the database of the office of the Higher Education Commutation . Having user satisfaction evaluated of information system. Supervision and monitoring plan and evaluating the success of a plan to improve the technology and bring results to be improved.

4.6 To go international includes with guidelines for entering the international, preparation international program, student exchange program with the memorandum of understanding (MOU), establishing the center for International studies.

4.7 In part of quality assurance, there should be policy setting of the council to include quality assurance as part of the management. Administrators to focus on educational quality assurance with the internal quality assurance system. Both institutions, agencies and programs must have the internal quality assurance system in line with the mission and development of the institutions, having an annual strategic and action plan for quality assurance, integrating different quality assurance systems into a single system. Insurance agencies are responsible for working with the programs of the institute and in accordance with the planning of the institutions, working as managing and coordinating as set in the strategy. Performance monitoring and clinical assistance, guaranteeing the quality for assisting agencies and individuals in the field of quality assurance. Bringing the results of quality assurance as the guidelines for the quality development plan and best practices.

4.8 Risk management includes the risk management committee that has a high level executive responsible for the mission which the risk factors are analyzed, factors to cause the risk. Identifying the order of risks, preparing risk management plan integrating the risks with the regular plan, monitoring and evaluating the outcome of the performance and improve the risk management plan.

5. Output included products from managing the students, executives, faculty members and support staff. The number of graduates who have jobs varied because of the differences in their field of study. All the graduates from Nurse and Medical Schools may get jobs, while others from other disciplines may not. The Graduates' area of studies do not match the social demand. The students in master and doctoral degrees still have small amount of research publications. The level of the assessment of the executives in this aspect is at good to very good. The quality of lecturers who have Ph.D. degrees and have don't their academic work were still not up to the standard set by the OHEC
6. Outcome included involved the analysis of user/client and stakeholders expectation. The level of satisfaction is at moderate. It's necessary to have higher level of satisfaction.
7. Feedback included the process of taking suggestion from different guidelines from other organizations especially from the outsiders in order to improve the institution plan.

Conclusion and discussion

This result of this study led to A Model of Integrated Quality Management Strategies using Advanced Execution Premium Strategies and Comprehensive Quality Assurance System for Public Universities . There are 4 Steps to complete this study.

1) Integration of 3 management theorists,Kaplan and Norton (2008) ,Peter and Waterman (1980)and Porter(1985), for developing an AEPSV Model are required.
2) The criteria and system of 6 quality management concepts are concluded for developing a COAS Model.
3) 30 University administrators were asked for their performance and analyzed performance assignment
4) Summary of all steps for developing an AEPOAwithin the framework of SIPOCCF Model

This initiative model may be useful for managing in higher Education Institutes. The model emphasized on strategic management which is integration of management and quality assurance together within one system fordaily management system of Higher Education.

REFERENCES

1)Bangkok Sweet Chili graphics. Gazette. (2553). Ministerial rules and procedures for quality assurance, Volume 127, to 23 December 2553.. 2 April 2553.

2) Baldrige Performance Excellence Program.(2013-2014). Education Criteria for Performance Excellence. [On Line] .Available fromhttp: //www.nisit.gov/baldrige [2013, March14].

3) Bollaert, Lucien and other. (2009). Trends in Quality Assurance: A Selection of Papers from The 3 RD European Quality Assurance Forum. Belgium: Brussels. European University Assurance.

4) Certo, Samuel C. and Peter, J. Paual. (1991). Strategic Management: Concept and Applications. (2 nd. Edition). New YorK: Mcgrow, Hill.

5) Chaffee, Ellen Earle. (1855).Three Models of Strategy.Academy of Management Review.Vol10, No 1: 89-98.

6) Collin D. and M. Rukstad. (2008). Can You Say What Your Strategy is? Harvard BusinessReview (April 2008): 89-90.

7)Donoghue, Simon and Mike Kimberley. (2012). Our Journey Towards world Class Leading Transformational Strategic Change.[On line] .Available from http://www.com/Arlicles/Strategy. [2012, March 14].

8)Kaplan, Robert S. and David P. Norton. (2008) .The Execution Premium: Linking Strategy to Operation for Competitive Advantage. Harvard: Harvard Business School Publishing Corporation.

9)Kaplan, Robert S., David P. Norton. (2008) .The Execution Premium. Boston: Massachusetts, Harvard Business School Publishing.

10)Kaplan, Robert S., David P. Norton. (2005).Creating theOffice of Strategy Management. Working Paper no 05-071.

11)Mergen,Ethan, Devin Grant and Stanley M.Widrick (2000). Quality management Applied to Higher Education. Vol,No 3,2000.

12)Mind Tools.The Mckinsey 7-S Framework Ensuring That All Parts of your Organization work in Harmony. [Online] Available from http: //www.mindtools.com/pages/article/newSTR_91.htm.

13)Noble,CharlesH.(1999) "Building the Strategy ImplementationNetwork", Business Horizons, November/ December,1999.

14)Norton, David P. (2011). Palladium / Thailand Stock Exchange Conference 2011. Palladium / Group Asia Pacifies, Strategy Execution Forum. June, 2011.

15)Norton, David and Randall H. Russell. (2011). Balanced Scorecard Report: The Strategy Execution Source. January-February, 2011, B (1).

16)Office of The Higher Education Commission, Ministry of Education. (2014). Manual for the Internal Quality Assurance for Higher Education Institutes. Bangkok, Prabpim Ltd., Part.

17)Office of The Higher Education Commission (2009). Qualifications Framework for Higher Education Act 2552. (Thai Qualifications Framework for Higher Education). Bangkok: Thammasat University.

18) Office for National Education Standards and Quality Assessment. (2004). Law amended the National Education Act BE 2542 (No. 2). BE 2545. Bangkok: Graphic Co., bell peppers.

19) PinitiRatananukul. (2007). ASEAN University Network Quality - Assurance: Manual for the Implementation of the Guidelines.

20) Porter, Michel E. (1985). Completive Advantages. New York. Free Press.

21) Porter, Michel E. (1996). What is strategy? .Harvard Business Review. November-December: 61-78.

22)Porter's Value Chain. [Online].Available from http://www.ifn.eng.com.ac.UK/dstovls/paradigm/valuch.html. [2013, January1].

23)Thomas J. Peters and Robert H. Waterman, Jr. Edited by Veera Tantikul. (2521). In Search of Excellence: the experiences of America's leading companies. Bangkok: NCAA Duke applications.

24) Vadim Kotelnikov. 7-S model: A Managerial Tool for Analysis and Improving Organizations. [Online] Available fromhttp://www.1000ventures.com/business_guide/mgmt_index_7s.html.[2013,January 14].

25) What is the importance of Mckinsey 's 7-S approach in today's. [Online] Available from http://wiki.answers.com/q/what-is-the-importance-of-mckinsey's 7-s approach-in-today ... [2013, January 9].

Predictors of Performance in the Licensure Examination for Teachers of the Graduates of Higher Education Institutions in Abra

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Challenged with the contribution of Higher Education Institutions (HEIs) of Abra, Philippines for globalization, this study analyzed the predictorsof performance in the Licensure Examination for Teachers (LET) of the teacher education graduates of HEIs in Abra from 2007-2011. Findings revealed that student-related predictors like Teaching Aptitude Test (TAT) and attendance in LET review classes;faculty-related predictorssuch aseducational attainment, trainings/seminars attended, academic rank, workloads;administrative and supervisory predictorslikesupport services, human relations, and linkages significantly influenced performance in the LET. It is recommended that HEIs in Abra should screen upcoming graduates through a valid Teaching Aptitude Test, periodically conduct LET review classes, faculty members should becompelled to finish their masters and doctorate degrees, attendance to training/seminar-workshops/conferences be encouraged,faculty members should strive hard to improve their academic ranks, regular workloads be given, support services (president), human relations (Teacher Education Chairperson)and linkages (Student-Teaching Coordinator) be maintained.

Keywords: **Teacher Education, Licensure Examination for Teachers (LET), Philippines.**

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Dr. Visco finished Bachelor of Science in Industrial Education, major in Mathematics (cum laude) at the Abra School of Arts and Trades in 1991 after graduating First Honorable Mention at Bangued East Central School, Bangued, Abra and First Honorable Mention at Abra School of Arts and Trades. He earned his degrees in Master of Arts in Education and Doctor of Education major in Educational Administration at the University of Northern Philippines, Vigan City Ilocos Sur in 2000 and 2013 respectively.

He is a recipient of the competitive Civil Service Local Scholarship Program for Masteral Degree Course (LSP-MDC) in 1999-2000.

Introduction

Education is one of the prime movers of the Philippine's economic and social development. It develops knowledge, skills, positive behaviors and attitudes of individuals to become self-confident, capable and committed to setting goals, making informed choices and acting in ways that improve living conditions.

2015 marks the birth of the ASEAN Economic Community (AEC). It will mark the start of free trade between the 10 member-countries. Products and services, among other things, will have a single market and production base. Labor, investments and capital will have a freer flow.

As 2015 approaches, conversations regarding AEC are growing, with many individuals bringing forward ideas on how Filipinos can collectively work to prepare them educationally for the country's entry into the free trade arena.

Recently, the Organization for Economic Co-operation and Development (OECD) noted that around half of the economic growth experienced by the developed world in the last decade can be traced to improved education and workforce skills. ASEAN countries can easily pursue and must adapt this path to grow.

Many experts talk about equipping students with 21st century skills to prepare for the changing nature of jobs. However, the 2014 Learning Curve Report said that developing countries—like those in ASEAN, specifically the Philippines—must first focus on teaching basic skills more effectively. The 2012 version of the Report underscores, there is no substitute for having good teachers. (http://thelearningcurve.pearson.com/reports/the-learning-curve-report-2014/executive-summary)

This resonates with the call for further increases in teacher pay scales, where after the final tranche of across-the-board government salary increases, the starting rate is around P18,000 (US$412) for public school teachers.

Some of the ASEAN neighbors are way ahead of the Philippines. The 2013 Global Teacher Status Index found Singaporean teachers had the highest average salary in the world—close to US$4,000 a month (around US$45,755 a year). In Malaysia, it's around US$2,200 and in Indonesia, US$1,400. These exclude various perks and performance incentives. (http://researchnetwork.pearson.com/nextgen-learning-and-assessment/lessons-learning-around-world-2014-learning-curve-report)

By raising salaries, the Philippine education system can attract the best and the brightest into teaching careers — an imperative, given that high classroom-to teacher ratios persist amid the on-going rollout of the new K-to-12 system.

However, high salaries are only one part of the picture. The 2012 Learning Curve Report suggests that successful school systems are able to give teachers a cultural status similar to other respected professions, while providing them relevant and continuing training. These teachers are made to adhere to stringent standards and fulfil high goals, but are also given enough autonomy to determine how best to go about their jobs. (http://m.thelearningcurve.pearson.com/reports/the-learning-curve-report-2012/preface#section)

In the Philippines, some 536,600 students are enrolled in the teacher training programs—the second highest among tertiary level courses in 2012. But as the Philippine Business for Education (PBEd) noted, only 54 percent of 268,000 first-time takers passed the Licensure Examination for Teachers (LET) between 2009 and 2013. In the last five years, up to 60 percent of the country's 1,200 teacher education institutions (TEIs) failed to get even half of their graduates to pass the LET. These indicate that major revamps are necessary on how to educate mentors.

As ASEAN bids to become a more attractive investment destination, there is a need to pay special care and attention to how teachers are trained and nurtured. Their status and pay must be raised to a level commensurate to the invaluable services they render to the country's youth. (Manila Bulletin, Sat. June 7, 2014). (https://ph.news.yahoo.com/raising-status-teachers-154433375.html)

Producing effective teachers, to functionally respond to the needs of the AEC 2015 challenged every institution of higher learning. Higher Education Institutions (HEIs) strive to produce highly competent and competitive teachers for quality education and excellence. Quality education is the crucial need of the AEC 2015. This maybe forged ahead by technology, government's systems and structures, complex social problems and issues among others. The aimed excellence by educational institutions entails standards that include the kind and quality of graduates it produced responsive to the challenged of globalization.

There are various indicators that help to measure the quality of education provided in each of the Higher Education Institutions in the Philippines. One of them is the number of teacher education graduates who can pass the national standardized examination with similar or identical questions given under the same conditions like the Licensure Examination for Teachers (LET). This is a national examination uniformly given and conducted to all the graduates of teacher education by the Professional Regulation Commission (PRC). The result is an important indicator of the quality of education provided by the HEIs. The reason for this is that when there is a uniform examination system and a grading system for the students, it is easy to identify the best performing institution. This will also enable in comparing the various institutions against each other. (http://www.saching.com/Article/ Indicators-that-measure-the-quality -of-education-in-an-institution/5681).

Figuerres, (2012) unveiled the fact that when Republic Act (RA) 7836, known as the Philippine Teachers Professionalization Act of 1994 became a law on December 16, 1994, the Professional Regulation Commission (PRC) was tasked to strengthen the supervision and regulation of the teaching profession. The PRC then prescribed the Licensure Examination for Teachers (LET).

The work of Figuerres also underscored that the Commission on Higher Education (CHED) Memorandum Order No. 30, series of 2004 (CMO 30, s. of 2004), otherwise known as the Revised Policies and Standards for Undergraduate Teacher Education Curriculum, quality pre-service education is a key factor to help Philippine education prepare for the challenge of globalization. The pre-service preparation of teachers for primary and secondary education sectors is very important responsibility that has been assigned to higher education institutions. All efforts to improve the quality of education in the Philippines are dependent on the service of teachers who are properly prepared to undertake the various important roles and functions of teachers.

Higher Education Institutions in Abra offering Teacher Education are committed to produce quality teachers for productive employment locally and internationally. They are envisioned to develop prospective teachers for the next generation. They are also working towards quality education and excellence for global competitiveness.

The functionality and productivity of the Higher Education Institutions in Abra offering College of Teacher Education primarily depends in their ability to produce quality graduates who are able to pass the Licensure Examination for Teachers (LET). It is on this matter that the quality of education is reflected.

The HEIs administration in order to functionally attain such goals, keeps on encouraging and sending faculty members to pursue higher education and sending them to relevant seminars locally, regionally, nationally and internationally to keep them abreast of educational trends and issues thereby improving their trade.

CHED Memorandum Order No. 30 s. of 2004 declared that for the most recent years, there have been reports about the deteriorating quality of teacher education graduates as reflected in the PRC-LET results. The average teacher education graduate has a weak basic communication ability, literacy, quantitative skills and higher order thinking skills. Research studies show that the average teacher education graduate possesses below content knowledge of the subject matter as well as ill-equipped with teaching skills required to teach.

Teacher Education graduates of HEIs in Abra are not exempted from the foregoing scenario. Aware of the above mentioned reality, the researcher was prompted to conduct a study on LET to find out the predictors of the said examination. This research endeavor certainly yields vital information on the performance of Teacher Education graduates in the Licensure Examination for Teachers given by the Professional Regulation Commission.

The output of this research is believed to be beneficial for administrators, faculty and teacher education graduates of Higher Education Institutions in Abra, Philippines inasmuch as indicators of performance in passing the LET is the center of this study.In addition, administrators will be guided in the formulation of policies regarding curricular and co-curricular activities which may enhance the cognitions, skills, and values of the learners. It may also be utilized as the best avenue for curriculum planners, administrators, faculty, and teacher education graduates to move a step higher towards the attainment of their mission as social change agents to address the challenge of ASEAN vision and globalization.

Furthermore, results of this study will help future researchers in looking into the predictors that affect the performance of the education graduates of the HEIs in Abra in the Licensure Examination for Teachers.

Theoretical and Conceptual Framework

Theoretical Framework

The researcher read materials and reviewed studies which provided direction to this research venture.

On Student-Related Factors. Figuerres (2012) in her study entitled "An Analysis of the Performance of the University of Northern Philippines in the Licensure Examination for Teachers", found out that for the ten-year period (2001-2010) the LET performance is significantly correlated with specialization. Selective admission and retention policies could be a plausible explanation to this result. The LET performance is also correlated with year of graduation. The newly graduates of the teacher education programs tend to perform higher in the LET than those who took the LET at later examination schedule. This is explained by the principle of memory retention why graduates tend to forget the principles and concepts they had learned during their course of study if they take the test several months or years after graduation.

Figuerres (2012) also found out that the performance of the examinees in the LET Elementary and LET Secondary in general education, professional education and specialization courses failed to meet the passing rate. However, the distributions of their scores were negatively skewed; there were more examinees who obtained higher scores compared to those who got lower scores. The distributions of their scores were platykurtic. They have extreme scores indicating the heterogeneity of their LET scores.

She further disclosed that for the LET examination period 2001-2010, the UNP Institutional Percentage Rates for LET Elementary had been consistently higher than the National Passing Rates. For the LET Secondary, UNP passing rates were higher in 2001, 2002, 2003, 2005, 2007, 2008 and 2009 but lower rates in 2004, 2006, April 2008, September 2010 and April 2010.

Viernes, (2010) in her study entitled, "Performance of the Graduates of Selected State Colleges and Universities of Solid North in the Licensure Examination for Teachers", found out that the overall LET performance of the BSEd and BEEd graduates is not significantly influenced by sex, parents' educational attainment, parents' occupation, year graduated and academic achievement, taken singly and as a whole.

Aman, as cited by Bañez (2002) conducted a research entitled, "Trend Analysis of the Board Examination Performance of UNP Bachelor of Science in Architecture Graduates, 1987-1997". She came out with the following findings:

1. The group of 1987 board examinee-respondents was the highest achievers in Mathematics among the 11-year groups of board examinee-respondents.
2. The mean rating of the performance in the Architecture board examination of the 11-year groups was below passing. This indicates that for the past 11 years the performance was low.
3. The achievements in Mathematics and the professional subjects showed a substantial direct relationship. This was backed up by the computed t-value which was higher than the tabulated value. When the correlation between Mathematics proficiency and the professional subjects was taken individually, it was found out that the relationship between Mathematics proficiency and achievement in Structural Design and Utilities System yielded a very high significant relationship. This indicates that the BS Architecture graduates who got high grades in Mathematics were the same graduates who got high grades in their professional subjects.
4. The grades of the BS Architecture graduates in Mathematics had no significant relationship with their performance in the board examination except in the content area of Structural Design and Utilities System, which involves Mathematical computations.
5. There was a direct relationship between the academic achievements and the BS Architecture Board Examination ratings.

Bajet as cited by Bañez (2002), in her study entitled, "The Integrated Nursing Comprehensive Licensure Examination Performance of the College of Health Sciences BSN Graduates of UNP", concluded that weighted average in high school and UNP CAT performance of the nurse graduate-respondents significantly influence their performance in the professional subjects. This implies that those who performed well in the UNP CAT and in their fourth year high school tend to perform well in their nursing education.

This present investigation is related to most of the reviewed studies in that it attempts to correlate some independent variables to a dependent variable which is the LET performance of the teacher education graduates. However, it differs from other studies in a number of aspects. As to population, this study will concentrate on the LET takers of HEIs for a period of five years. This study includes teaching aptitude test, academic rank and instructional materials/books developed/published by the teacher education faculty of the HEIs in Abra as variables which are not considered in the study of Bañez.

On Faculty-Related Factors. Pilarta (2011) in her study entitled, "Status of Public Secondary Schools in Abra", exposed that the administrators' present position and administrative experience had a significant relationship with their performance. The adequacy of physical plant and facilities, instructional materials, and support services were associated with the performance of the administrators. Teachers' position, number of trainings attended and number of preparations, on the other hand, as well as the land area of the school, adequacy of instructional materials and physical plant and facilities were significantly related with their performance. The administrators' performance also had a significant relationship with the performance of the school particularly on repetition rate. Likewise, the teacher's performance was found out to have a significant relationship with the completion rate, repetition rate, and survival rate of the school. Similarly, administrators' and teachers' performances had a bearing on student's academic performance.

Cadiz (2010), found out that the faculty respondents in selected universities and colleges in Cordillera Administrative Region manifest an outstanding level of professionalism showcasing their rationality, responsibility, ethics, commitment, accountability and creativity.

There are significant differences between and among the faculty respondents in selected universities and colleges in Cordillera Administrative Region with respect to their levels of professionalism as a whole in instruction, along Instructional Competence, Evaluation Skills and Personal and Social Qualities; research, along conduct of research, total number of researches conducted, and dissemination of researches; extension, along involvement in extension activities, form of extension activities; and production, along involvement in production activities, number of production involvement activities, role in production activities.

Professionalism of faculty respondents, according to Cadiz, is significantly associated with age, educational, attainment, trainings attended, and academic rank. Their sex, civil status, number of units taught, number of preparations, length of service and status of appointment were found to be not associated with their professionalism.

There is a significant relationship between performance in instruction with age, civil status, educational attainment, trainings attended, and academic rank, number of preparations and length of service. There is significant relationship to the performance in instruction, with sex, number of units, and status of appointment.

Since the faculty plays a pivotal role in the transformation of the students, educational enhancement should be a periodic activity in higher education institutions to keep them abreast of knowledge content, teaching methodology and strategy, and evaluation of learning gains. The in-service trainings which are to be done school-based should focus on capability building for research, article and module writing and publication and the faculty should be guided on the crafting of extension programs for income generation concerns.

Buenafe (2010) revealed that there is a significant relationship between the level of professionalism of the faculty of Data Center College of the Philippines (DCCP) and factors like educational attainment, academic rank, trainings attended and working experiences outside DCCP while no significant relationship was observed on age, sex, civil status, status of appointment and length of service while the non-teaching staff, academic rank has significant relationship among the factors towards professionalism. There are significant relationships on the level of performance of the faculty along age, civil status, educational attainment, trainings attended and work experiences outside DCCP except sex, status of appointment, length of service, and academic rank. Only attainment among the factors has significant relationship with the level of performance of the non-teaching staff. In addition, the faculty factors, taken by dimension and as a no significant relationship with the level of performance. The level of performance of the faculty and non-teaching staff of DCCP is dependent on their professionalism. The higher the level of professionalism of the faculty and non-teaching staff, the higher is their performance.

Rabara (2010) in her study "Performance of the Master Teachers of Bantay, San Vicente and Sta. Catalina Districts, Division of Ilocos Sur" revealed that membership in organization has a significant influenced on lesson planning and delivery and technical assistance. Learners' achievement is related to educational attainment. School, home, and community involvement is significantly related to sex, religion, and service training attended and membership in organization of the master teachers. Educational attainment is found to be significantly related to instructional competence. Personal/professional characteristics are found to be significantly related to membership in organization. Religion is significantly related to punctuality and attendance of the mater teachers. Plus factor is also significantly related to number of training facilitated and membership in organization. The other variables included in this study are found to be not significantly related to plus factor. Number of training attended and number of seminars facilitated are found to be significantly related with the overall teaching performance. The master teachers from San Vicente District performed significantly better that those from Bantay and Sta. Catalina Districts.

Pinol (2000), stated that the future of our generations of Filipinos to manage their affairs depends to a great extent on teacher who trains students in proper attitudes, values, and skills that will make them successful and happy individuals, good citizens, and productive members of society.

Bañez (2002) mentioned some qualities of an effective teacher. A teacher should be a model in all his actions. Setting a good example in his speech, attitudes, and his ways at any place and anytime will gain him respect from students and people around him. By observing him, they will learn good values. Values are caught not taught, so they say, hence he should be respectful, honest, firm in his words, kind, and friendly.

Viernes (2010) pointed out that the outputs of teacher education in the Philippines had a high level of moral qualities and personality traits as teachers but their social relationship traits were of considerable extent. They also displayed a high level of teaching skills but considerate extent of evaluating skills. In short, the "actual" teacher characteristics of the teacher education outputs significantly fell short of the "ideas".

Quintinita (2001) mentioned in her study on motivation needs and teaching performance of UNP CTE faculty that age, academic rank, salary, and length of service were not significantly related to the overall teaching performance but were significantly related to instructional competence as an indicator.

The number of dependents and educational attainment were not significantly related to the overall teaching performance and three indicators. Likewise, sex and civil status, were not significantly related to teaching performance but significant relationship existed with the indicators of personal and social qualities as well as evaluation skills.

Lazo (2003) generalized that position/designation, highest educational attainment, length of years in teaching, length of administrative experience and numbers of subordinates are significant factors that influenced administrators' performance; while position/designation and number of training attended influenced the teacher's performance.

Administrative and Supervisory Factors. Administration and supervision are necessary for a school system to carry on a successful educational program.

The aim of administration and supervision is to provide the necessary leadership and training, in improving, coordinating, and evaluating of the school program and in handling the problems associated with these. It provides the leadership in improving the teaching-learning situation, changing the school curriculum when necessary, and in developing and improving the instructional materials (Gillespie, as cited by Bañez, 2002).

Buenafe (2010) spelled out one of the components of organizational effectiveness that showed the quality of interpersonal relationships, laterally and horizontally, which are perceived to have influence on work. Good relations with superior motivated the workers to do a good job, whereas negative interpersonal relationship discouraged them. In effect, the positive nature of workers' interpersonal relations encouraged reciprocal assistance.

Adriatico as cited by Viernes (2010) studied the levels of implementation of the supervisory functions of elementary school principal and head teachers. The study revealed that the implementation of the supervisory functions on the areas of classroom visit, school plant, research evaluation, in-service education program, human and public relation, and guidance were perceived at "very much" level.

Educational leaders are the strength of the educational system and this strength lies on their hands. According to Arellano, as cited by Buenafe (2010), the good school managers wanted in the field are the following: 1) someone, whether or not assigned in a remote impassable station. Who continues to seek greater responsibility not only for his own enlightenment but also for the teachers whom he guides and the community which he serves; 2) one who can interact and associate with his teachers effectively; 3) one who is not a mere "instructional puppet", slavishly following macro-directives without analyzing if such are workable in their vicinity; 4) one who has managerial skills imbued with intellectual creativity and foresight, is abreast with current development, and is an expert in effective planning and implementation of educational goals.

Benabese, (2001) revealed that there are significant differences between the assessment of administrators and teachers of CAR on mission statement, enrolment, administration, supervision and personnel services but in Region I and NCR, an insignificant result is noted.

Findings revealed that the mission statement of the different institutions was rated "Outstanding" by the administrators. Only the teachers in the two HEI's in CAR gave a "Very Satisfactory" rating for this particular indicator of internal efficiency. All the respondents gave an "Outstanding" rating on enrolment.

The assessment of internal efficiency of trades and industrial education among the respondent school yielded an insignificant difference on mission statement, enrolment and instruction but significant differences on administration were noted.

On the relationship between internal efficiency of trade and industrial education and administrator/teacher related factors, insignificant relationship is noted between professional advancement and mission statement and between position and enrolment; between instruction and all administrator/teacher related factors.

She therefore recommended that an intensive and functional Human Resources Development Program should be maintained in every institution especially in CAR to motivate and encourage administrators and teachers in trade and industrial institutions to advance professionally.

From all these studies presented and discussed, the researcher derived some imperative ideas and theories that significantly helped him collate the theoretical background of this research study.

Conceptual Framework

The conceptual paradigm (Figure 1) revolved around testing the influence of the independent variables on the dependent variables of this study.

The independent variables are grouped into student-related, faculty-related and administrative-related factors while the dependent variable is the LET performance in the general education, professional education, and major subjects. The student-related variables are: average grade in Fourth Year High School; score in the College Admission Test; score in the teaching aptitude test; academic achievement in the three subject components: general education, professional and major subjects; and attendance in the LET review. The faculty-related variables are: teaching experience; educational attainment; attendance in trainings/seminar-workshops; membership in professional organization; academic rank; average performance rating for the last five years; workloads and instructional materials/ books developed/published.

The administrative-related variables are: policies; support services; linkages; human relations; and classroom visitation.

The stated independent variables tend to affect the LET performance of the respondents (dependent variable).

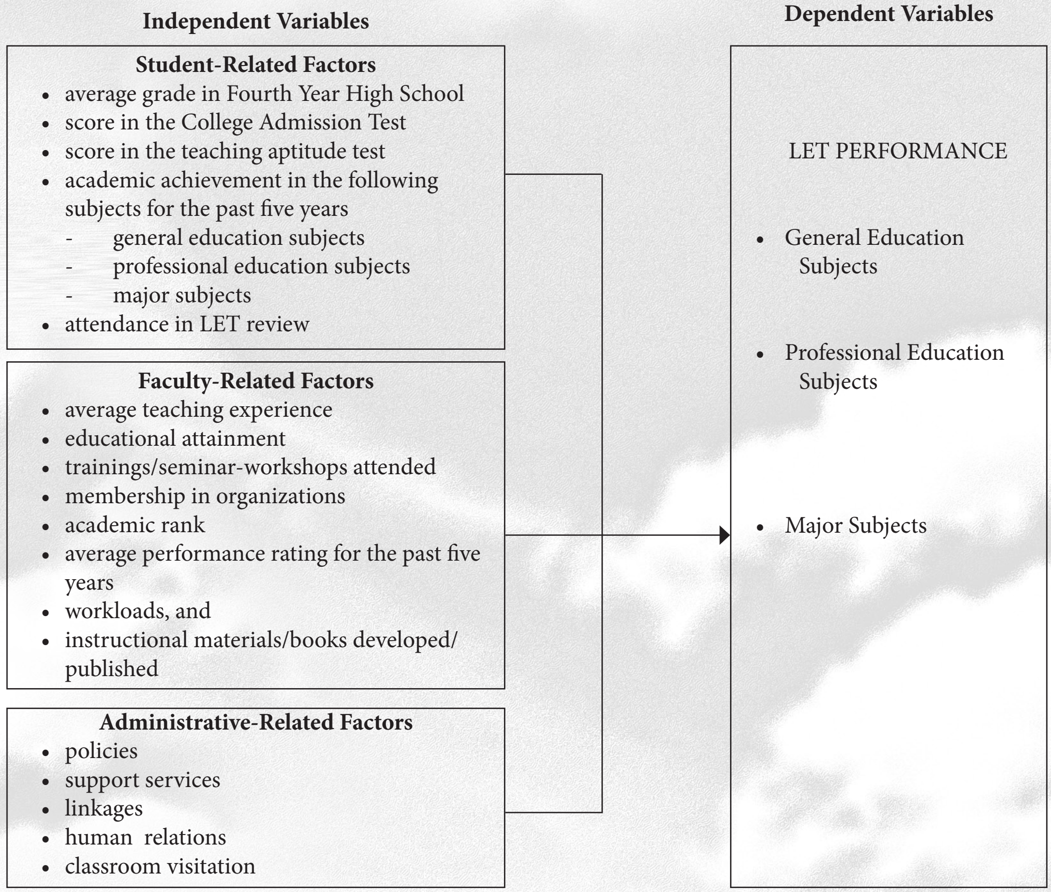

Figure 1. **Conceptual Paradigm**

Problem

This study aimed to analyze the predictors of performance in the Licensure Examination for Teachers (LET) of the Higher Education Institutions of Abra from 2007-2011 along student-related, faculty-related and administrative and supervisory related variables.

Specifically, it sought answers to the following questions:

1. What is the profile of the teacher education graduates in terms of the following:
   a. average grade in fourth year high school,
   b. score in the College Admission Test,
   c. score in the teaching aptitude test
   d. achievement in the following subjects for the past five years:
      - general education subjects
      - professional subjects
      - major subjects; and
   e. attendance in LET review?

2. What is the profile of the faculty-respondents along the following factors:
   a. teaching experience,
   b. educational attainment,
   c. trainings/seminar-workshops attended,
   d. membership in professional organizations,
   e. academic rank,
   f. average performance rating for the last five years,
   g. workloads, and
   h. instructional materials/books developed and published?

3. What is the level of performance of the administrators in terms of their administrative and supervisory functions in the following aspects as perceived by the LET examinees:
   a. policies,
   b. support services,
   c. linkages,
   d. human relations, and
   e. classroom visitation?

4. What is the level of performance of the BSEd and BEEdTeacher Education graduates in the LET for the past five years?
5. Do the following student-related variables significantly influence the LET performance of the teacher education graduates:
   a. average grade in Fourth Year High School,
   b. College Admission Test,
   c. score in the teaching aptitude test,
   d. achievement in the following subjects for the past five years:
      - general education subjects
      - professional subjects
      - major subjects; and
   e. attendance in LET review?

6. Do the following faculty-related variables significantly influence the LET performance of the teacher education graduates:
   a. teaching experience,
   b. educational attainment,
   c. trainings/seminar-workshop attended,
   d. membership in professional organizations,
   e. academic rank,
   f. average performance rating for the past five years,
   g. workloads, and
   h. instructional materials/books developed/published?

7. Do the following administrative and supervisory variables significantly influence the LET performance of the teacher education graduates in terms of:
   a. policies,
   b. support services,
   c. linkages,
   d. human relations, and
   e. classroom visitation?

Methodology

This study employed the descriptive method of research. The academic achievements of the graduate-respondents and the other student-related variables were taken from the official records of the office of the Registrar and underwent documentary analysis. The Licensure Examination for Teachers ratings were the certified copy of the rooster of examinees which were secured from the Professional Regulation Commission (PRC).

A questionnaire on the administrative and supervisory related factors was distributed to the 738 teacher education graduate-respondents from the four Higher Education Institutions (HEIs) in Abra – Abra State Institute of Sciences and Technology Bangued Campus, Abra State Institute of Sciences and Technology Main Campus Lagangilang, Divine Word College of Bangued and Abra Valley Colleges.

Using the PRC LET results, this study employed documentary analysis and correlation research designs. The frequency and percentage, mean, Multiple Linear Regression, Analysis of Variance and Scheffe Test were used as statistical treatments.

Findings

Salient findings of the study are summarized as follows:

1. Profile of the Teacher Education Graduates of HEIs in Abra

It is shown in Table 1 that majority (229 or 60%) of the teacher education graduates of HEIs in Abra has a "Very Good" (85-89) average grade in their fourth year high school; most of them (174 or 49%) scored 60 – 69 in the college admission test; majority (122 or 34%) of the graduates scored 70 – 79 in the teaching aptitude test; majority (202 or 53%) of them received "Good" (2.01 – 2.50) in their general education subjects; they (239 or 63%) are "Very Good" (1.51 – 2.00) in their professional education subjects; majority (98 or 69%) of the BSEd graduate-respondents are "Very Good" (1.51 – 2.00) in their major subjects; and almost all of the graduates (237 or 62%) have attended LET review classes.

The findings imply that HEIs in Abra indeed went through an acceptable selection of teacher education students in their college and close scrutiny was done before they award their certificate of completion of the course. The profile of the graduate-respondents also implies that HEIs in Abra had been doing their part in the production of teachers who are tagged as agents of change and molders of the youth through careful selection of students for the college of teacher education. HEIs in Abra musthelp contribute in producing pool of good teachers who can help the Philippines prepare for the challenge of ASEAN Economic Community by 2015.

2. Profile of the Teacher-Respondents of HEIs in Abra

Table 2 revealed that most of the faculty-respondents (27 or 33%) from the four HEIs in Abra are in their first ten years of teaching experience. It is wise to note that in the respondents are almost equally distributed in the four groupings of teaching experience. In terms of educational attainment, most of the respondents (30 or

37%) are pursuing their doctorate degrees (MA with Doctorate Units) after finishing their masters. Majority (29 or 36%) have attended 11 – 20 training/seminar workshops; (49 or 60%) are members of 7 – 10 professional organization; 49 or 60% of them hold instructor academic rank; all of the are "very Satisfactory" in performance, majority carries 22 – 27 workloads and 49 or 60% of them have developed three instructional materials.

This implies that the teacher education graduates must have benefitted from the idealistic stage of teaching since the faculty-respondents were in their first ten years of teaching with suitable educational qualifications, seminar training and workshops attended, membership to organizations that enhanced their abilities in teaching, and carries regular workloads. The finding also implies that faculty of the HEIs in Abra are also doing their best to upgrade their educational qualifications, equipping themselves with necessary training, absorbing all imperative learning gained from membership to organizations and developing their own instructional materials. Further, HEIs in Abra are not also far behind the standards of other higher educational institutions in the Philippines, hence, playing a complementary role in the educational development of the province and the bid of the Philippines to cope with the challenges of regionalization.

3. Level of Performance of the Administrators of HEIs in Abra as Perceived by the LET Takers

It can be gleaned from Table 3 that the support services of the Presidents of HEIs in Abra is perceived to be "Excellent" by the LET takers of 2007 – 2011. The human relation function of the teacher education chairperson is evidently "Excellent", too. The student-teaching coordinator of the four HEIs in Abra is exceptionally "Excellent" in the discharge of his functions categorized as policies, support services, linkages, human relations and classroom visitation.

This finding implies that administrators of HEIs in the province of Abra are doing their share in the production of good teachers. Strict implementation of school rules, policies and regulations; support on the conduct of LET review classes; linkage with other agencies for off-campus teaching among others are manifestations of this.

4. Level of performance of the Teacher Education graduates in the 2007-2011 LET

The level of performance of the BSEd LET examinees of ASIST Bangued, ASIST Lagangilang, DWCB and AVC is generally described as "below national passing mark" for the nine examination periods. Looking at Table 4 closer, ASIST Bangued and Lagangilangsurpassed the national passing percentage one examination period each, April 2009 and April 2011 respectively. Divine Word College of Bangued surpassed the national percentage rate in four (April 2008, September 2008, October 2009 and April 2011) examination periods.

The level of performance of the BEEd LET examinees of ASIST Bangued, ASIST Lagangilang, DWCB and AVC is described as "below national passing mark" (in general education and professional education subjects) for the period 2007-2011. Table 5 indicates two (April 2009, April 2010) examination periods for ASIST Bangued and one (April 2008) for DWCB having surpassed the national passing rate.

Generally, the performance of the graduates of HEIs in Abra in the LET is "below national passing percentage". This means that the graduates of HEIs in Abra are lower in performance compared to their national examinee counterparts. The number of LET passers from the HEIs in Abra with reference to the total number LET takers of the provincefalls short in quantity compared to the percentage of LET passers with reference to the total number of LET takers in the entire country.

Consequently, Whitehurst, GroverJ. suggested three routes to the goal of education. First, schools can be substantially more selective in the cognitive abilities that are required for entry into the teaching profession.

Second, they can provide pre-service and in-service training that is more focused on the content that teachers will be delivering and the curriculum they will be using. Third, schools can provide much better contexts for teachers to do their work. One important context is in the form of systems that link and align standards, curricula, assessment, and accountability. http://www2.ed.gov/admins/tchrqual/learn/preparingteachersconference/whitehurst.html

5. Multiple Regression Analysis of Profile on Graduate-Related Variables on LET Performance

As shown in Table 6, the influence of the seven independent variables (average grades in fourth year high school, college admission test, teaching aptitude test, academic achievement in general education, professional education subjects, major subjects and attendance in LET review classes) on the LET performance of the Teacher Education graduates is significant F = 1.42; (p = .05). The seven graduate-related factors account for forty seven percent of the variance on the LET performance of teacher education graduates; hence about 53 percent could be explained by other factors not included in the study.

The beta-coefficient (0.36) obtained for score in teaching aptitude test and (0.32) attendance in LET revieware significant at .05 probability level. LET performance of the Teacher Education graduates is therefore influenced by these factors. Hence, teaching aptitude test (TAT) and attendance in LET review are good predictors of LET performance.

This implies that those who performed well in the teaching aptitude test and religiously attended LET review class tend to perform better in the licensure examination.

6. Multiple Regression Analysis of Profile on Faculty-Related Variables onLET Performance

As reflected in Table 7, the influence of the combination of the eight independent variables on the LET performance of the Teacher Education graduates is significant, that is F = 9.80; (p < .05). The eight faculty-related factors account for fifty-two percent of the variance on the LET performance of Teacher Education graduates; hence about forty-eight percent could be attributed to other factors not included in the study.

The beta coefficient for educational attainment (0.66), Training/Seminars Attended (0.41), Academic Rank (0.19), and Workloads (0.22) are significant at 0.05 level, therefore these variables are good predictors of LET performance.

This means that when the teachers are masteral and doctoral graduates, have attended relevant training/ seminar workshops, have high academic ranks and carry a regular workload, the greater is the tendency for the HEI graduates to pass the LET.

Contrary to our intuitions and anecdotes about the importance of teachers, the landmark study, Equality of Educational Opportunity, by sociologist James Coleman, suggested that differences in teachers did not matter much. This was a huge study employing 60,000 teachers in grade 6 and beyond in over 3,000 schools. The principal finding was that nearly all of the variability in how students achieved was attributable to their socioeconomic background rather than to the schools they attended. On the subject of teacher attributes, Coleman wrote, "A list of variables concerning such matters as teachers' scores on a vocabulary test, their own level of education, their years of experience, showed little relation to achievement of white students, but some for Negroes.... Even so, none of these effects was large." http://www2.ed.gov/admins/tchrqual/learn/preparingteachersconference/whitehurst.html

7. Multiple Regression Analysis of Profile on Administrative and Supervisory Variables on LET Performance

As revealed in Table 8, the five administrative and supervisory variables when taken in combination significantly influenced the Teacher Education graduates' LET performances. The multiple regression suggests that there exists a moderate correlation between LET performance and administrative and supervisory variables. Together, they account for 46 percent on the total variance of LET while the remaining 54 percent respectively are accounted by other factors different from what were considered in this study.

The beta coefficient for support services of the president (0.53), human relations of the CTE Chairperson (0.32) and linkages (0.20) of the Student Teaching Coordinator are significant at .05 probability level. Therefore, these are all good predictors of LET performance.

Consequently, those graduates whose presidents, CTE Chair., and ST Coordinators were supportive, excellent in their human relations and good at linkages respectively tend to perform better in the LET.

Conclusion

In the light of the findings of this study, the following conclusions have been drawn.

1. The level of performance of the Teacher Education graduates of HEIs in Abra (ASIST Bangued, ASIST Lagangilang, DWCB and AVC) who took the LET is described as "below national passing mark". The number of LET passers from the HEIs in Abra with reference to the total number of LET takers of the province is lower compared to the percentage of LET passers with reference to the total number of LET takers in the entire country.
2. In the case of the graduates of HEIs in Abra, though they performed "below national passing rate", the following predictors contributed to their passing in the LET.
   a. Graduate-related factors like Teaching Aptitude Test (TAT) andattendance in LET review classes are good predictors of LET performance.
   b. Faculty-related variables like educational attainment, training/seminar workshops attended, academic rank and workloads are good predictors of LET performance.
   c. On administrative and supervisory variables, a supportive president, excellent CTE Chair in human relations and a student teaching coordinator who is good in making linkages are good predictors of LET performance.

Recommendation

With the implementation of ASEAN Economic Community by 2015, the following are the recommendations of the study to better prepare the teacher education graduates of HEIs in Abra to respond to the challenge:

1. a) HEIs in Abra should screen their upcoming teacher education graduates through a valid Teaching Aptitude Test as early as their second year.
   b) HEIs in Abra should periodically conduct LET review classes.
2. a) Administrators of HEIs in Abra should encourage their teacher education faculty to pursue their masteral and doctoral studies along their fields of specialization to better prepare them to become mentors to the pre-service teachers.
   b) Faculty members should be motivated to attend more training/seminar-workshops, conferences, improve their academic ranks and should carry a regular workload.
   c) A supportive president, excellent CTE Chair in human relations and a student teaching coordinator who is good in making linkages are needed to enhance better performance in the LET.
3. A parallel study in the College of Teacher Education and other colleges using other independent variables like strategies of teaching, technologies in teaching, leadership potentials of students and teachers, pre-service trainings and seminars, field study or experiential learning gains of students, status of

cooperating schools, guidance extended to pre-service teachers by cooperating teachers, problems coping mechanisms of pre-service teachers, students' membership to teacher education organizations and other variables as predictors of LET performance is highly recommended.

REFERENCES

CHED, 2004 Commission on Higher Education Order (CMO) No. 30, series of 2004. "*The revised teacher education curriculum*" R.A. No. 7836

1994 Republic Act (R.A.) No. 7836 – "*The Philippine teachers professionalization act*" (an act to strengthen the regulation and supervision of the practice of teaching in the Philippines and prescribing a licensure examination for teachers and for other purpose).

Bañez, Solita Evangeline S. (2002). *"Analysis of the university of northern philippines-college of teacher education performance in the licensure examination for teachers"*, Unpublished Doctoral Dissertation, University of Northern Philippines.

Benabese, Leticia M. (2001). *"Internal efficiency of trade and industrial education of public HEIs of CAR, region I and NCR",* Unpublished doctoral dissertation, University of Northern Philippines, Vigan, Ilocos Sur.

Buenafe, Mario B. (2010). *"Professionalism and performance of the faculty and non-teaching personnel of data center college of the Philippines"*, Unpublished Master's Thesis, University of Northern Philippines, Vigan, Ilocos Sur.

Cadiz, Lenaida. (2010). *"Professionalism and performance of the faculty-respondents in selected universities and colleges in cordillera administrative region"*, Unpublished doctoral dissertation, University of Northern Philippines, Vigan, Ilocos Sur.

Figuerres, Ocarna B. (2012). *"An analysis of the performance of the university of northern philippines in the licensure examination for teachers,"* (Unpublished Research Material, University of Northern Philippines, Vigan, Ilocos Sur).

Lazo, Magdalena T.(2003). *"The performance of the elementary schools in the division of ilocossur"*, Unpublished Doctoral Dissertation, University of Northern Philippines, Vigan, Ilocos Sur.

Pilarta, Mae Amalia B. (2011). *"Status of public secondary schools of Abra"*, Unpublished doctoral dissertation, University of Northern Philippines, Vigan, Ilocos Sur.

Pinol, Gorgonia N. (2000). *"Determinants of bse student teachers' performance in the sucs of region i and the national capital region"*, Unpublished Doctoral Dissertation, University of Northern Philippines, Vigan, Ilocos Sur.

Quintinita, Aurora Russ. (2001). *"Motivation needs and teaching performance of the faculty of the cte, unp"*, Unpublished Master's Thesis, University of Northern Philippines, Vigan, Ilocos Sur.

Rabara, Michelle A. (2010). *"Performance of the master teachers in bantay, san vicente and sta. catalina districts, division of ilocossur",* Unpublished Master's Thesis, University of Northern Philippines, Vigan, Ilocos Sur.

Viernes, Norma V. (2010). *"Performance of the graduates of selected state colleges and universities of solid north in the let",* (Unpublished doctoral dissertation, University of Northern Philippines, Vigan, Ilocos Sur).

http://thelearningcurve.pearson.com/reports/the-learning-curve-report-2014/executive-summary

http://researchnetwork. pearson.com/nextgen-learning-and-assessment/lessons-learning-around-world-2014-learning-curve-report

http://m.thelearningcurve.pearson.com/reports/the-learning-curve-report-2012/preface#section

https://ph.news.yahoo.com/raising-status-teachers-154433375.html

http://www.saching.com/Article/ Indicators-that-measure-the-quality -of-education-in-an-institution/5681.

http://www2.ed.gov/admins/tchrqual/learn/preparingteachersconference/whitehurst.html

The Role of Self-Efficacy to Persistence of Technology Students in the Philippines

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ABSTRACT

The attainment of a baccalaureate degree largely determines income and occupational status. Persistence was defined as a constellation of factors that lead to completion of a course. Self-efficacy is an important factor that mitigates persistence especially in a technology-related course that is deemed crucial in a global economy. The contribution of domain-specific self-efficacy in student persistence (technology self-efficacy, computer self-efficacy, career self-efficacy, and general self-efficacy) was examined using sample data from students of 3 institutions of higher education in Metro Manila and nearby province. This study reveals that general self-efficacy and computer self-efficacy are significant predictors of persistence while career self-efficacy and technology self-efficacy are not.

***Key words*: information technology education, self-efficacy, technology self-efficacy, persistence**

Introduction

Technological advances continue to enhance and challenge all aspects of our lives (Schimdt, 2008; Sammons & DeLeon, 2004). The advent of the Internet has revolutionized communication and the basic tenets of human relationships have been broadened, intensified, and challenged. The prevalence of next generation smart phones, computers, internet services and other technology tools highlight the significance of academic institutions where the new era of computationally-educated and global workers are being prepared. However, these bastions of knowledge contribute in the global decline of much-needed innovative professionals. According to numerous studies, educational institutions often act as both facilitator and moderator in student attrition (e.g., Rhodes et al., 2011; NSB, 2007). Societal deterrent such as disparity, discrimination, and racism has found its way in the academe negating the effects of good mentors, supervisors, and updated curriculum (Yadav & Korb, 2012; World Bank, 2010) highlighting the role of family and peers (Harris et al., 2004; Clark, 2011; Thiry et al., 2011; Soldner et al., 2012) in combating attrition.

Student attrition is the reduction in numbers of students attending a course as time goes by. It is the focus of educational institutions and a national concern for the government to retain and train them until degree completion (Tinto, 1987; 1982). Intention to persist in a chosen major is expected to be strong predictor of actual persistent behavior (Maltese & Tai, 2011) and persistence in an educational context, refers to the individual's intention to continue in the chosen major through university and earn the degree (Saifuddin et al., 2013; Restubog et al., 2010). Persistence is an individual phenomenon that reflects the student's desire and action to stay within the system of higher education (Mamiseishvili, 2012). It has been defined as the antonym of attrition or as a constellation of factors that lead to completion of a course (Hart, 2012).

Espoused in career development theories is the importance of personality factors that could impede student progression through their persistence. Different personality traits influence self-efficacy and career decision-making (Chamorro-Premuzic, 2012). Landmark studies have explored this relationship between intrinsic and extrinsic variables that are described in social cognitive career theory (SCCT) which posit that aspirations, career choices, and persistence are the result of the complex interplay of personal, environmental, and behavioral factors (Lent et al., 1994; Lent et al., 2001; Lopez et al., 2007; Drake, 2011; Restubog et al., 2010).

As one of the priority discipline in the Philippines, technology courses are exhibiting a phenomenon contrary to the experience of highly developed nations. While most nations are experiencing shortage of students matriculating in technology courses, the Philippines is having oversubscription in IT courses (Roman, 2012; Villar, 2007). The fact that only 15 percent of students' progress to complete their technology course (CHED, 2012) provides a compelling reason to examine this phenomenon and ascertain the role of technology-related self-efficacies and that of personality traits in student progression.

Theoretical Background

Social Cognitive Career Theory (SCCT) is a relatively new theory in which Robert W. Lent, Steven D. Brown, and Gail Hackett expanded upon the scope of Albert Bandura's work to focus exclusively on the development of the individual within the context of career. It provides an explanatory framework capable of fully clarifying individual's career development process by merging common aspects of other noted career theorists such as person-environment correspondence René Dawis & Lloyd Lofquist, personality typology theorist John Holland, social learning pioneer John Krumboltz, life-span and life-space by Donald Super, and developmental theorists Fred Vondracek, Richard Lerner, & John Schulenberg. SCCT also incorporates the work of Hackett and Betz in which the concept of self-efficacy was first identified as an important factor in career development (Capuzzi & Stauffer, 2006; Duggan &Jurgens, 2007).

According to Bandura (1997), there are four primary sources for self-efficacy beliefs; (1) prior experience, (2) modeling, (3) social persuasions, and (4) physiological factors which are carried over in SCCT. Self-efficacy is important mechanism of personal agency and positive adaptation across many domains of psychosocial functioning (Bandura, 1997) and has been used in different construct and in many different forms. Bandura also revealed that individuals will avoid situations and tasks that they believe exceed their capabilities but undertake tasks and behaviors that they believe they are capable of performing. Therefore, students with low self-efficacy for a specific task are likely to give up and not expend much effort in accomplishing a task compared to students with high self-efficacy for a task (McCue-Herlihy& Stone, (2005).

Central in SCCT is self-efficacy which is found to be pivotal in interest, implementation, and achievement of career and academic development. According to the study of Swanson & Gore (2000), self-efficacy beliefs and outcome expectations are more powerful in predicting occupational concern than the more traditional variable of vocational congruence. Three basic SCCT models were developed as a means to understand the ways in which (a) career and academic interests are formed, (b) career choices are implemented, and (c) career performance outcomes are achieved (Lent et al., 1994, 2000). Building on the constructs of self-efficacy and outcome expectations, SCCT posits that individual variables such as self-efficacy, in interaction with aspects of the environment such as social support, shape an individual's career behavior—including choice and persistence (Lent et al., 2000).

Objectives of the Study

Prior works on self-efficacy has focused on career development of women (Hackett & Betz, 1981) followed by a variety of academic and career-related outcomes in both men and women (Garcia et al., 2012; Lent et al., 2008; Lopez et al., 2007; Michie & Nelson, 2006). Lately, majority of the SCCT literature has examined its application in science, technology, engineering, and mathematics (STEM) fields (Lent et al., 2003) as it seek to understand the dramatic decline in enrollment and the increased dropout rate for these fields. In the computing discipline in particular, the studies of Lent et al. (2008) and Lopez et al. (2007) provides evidences on the mediating and/or moderating effect of self-efficacy as it relate to goals and contextual variables of technology students.

Self-efficacy judgments are situational and domain-specific (Akbulut et al., 2008). For example, technology self-efficacy (TSE) as a belief in one's ability to successfully perform a technologically sophisticated new task is a specific application of a more general and broad construct of self-efficacy (McDonald & Siegall, 1992) while the perception of information technology skills and knowledge are espoused in computer self-efficacy (CSE) (Smith, 2002).This paper will examine how persistence is affected by self-efficaciesessential to technology students. Figure 1 summarizes the study's framework and is directed by the hypothesis that TSE, CoSE, CaSE, and GSE will predict persistence among technology students.

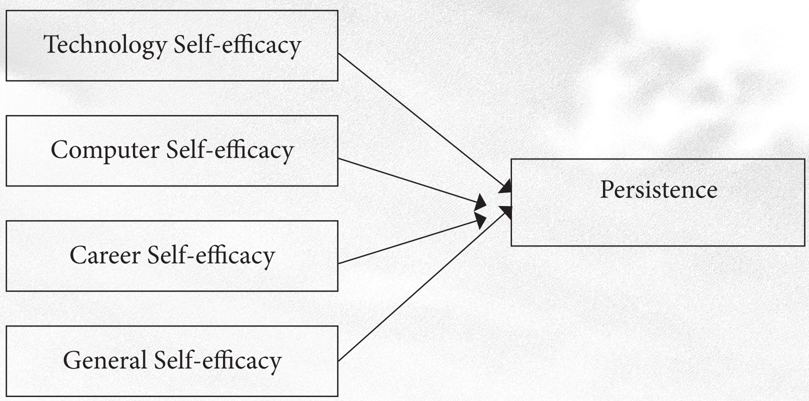

Figure 1. **Research model**

Methodology

The Research Approach and Participants. Using field survey studies, the aim of this study is to empirically test the relationship between student self-efficacies and persistence among technology students. Surveys typically use self-reports to identify facts, opinions, attitudes, and behaviors, as well as the relationship among these aspects. Descriptive research provides basic information about a variable or phenomenon and has made important contributions to the counseling profession (Heppner et al., 2008).

Students were recruited for participation in the study via faculty members/research partners at each of the three institutes of higher education. Participants were 128 undergraduate students enrolled in 1 large university in Manila and 2 colleges in a nearby province of Bulacan. The sample consisted of a large number of males (54%) and females (46%) with a majority age of 18 years and below (62%). Academic programs in computing science were represented, including BS Computer Science (2%) and BS Information Technology (98%). Participation was entirely voluntary and all participants were informed that they could withdraw from the study at any point in time. Participants are surveyed 2 months after the start of the current semester/trimester and were asked to report their technology self-efficacy, computer self-efficacy, career self-efficacy, general self-efficacy, persistence, and demographic characteristics. Multiple regression technique was utilized in analyzing the relationships among variables and to understand which among independent variables is predictor to the dependent variable (Cohen et al., 2013;Heppner & Heppner, 2007).

Table 1. **Respondent profile**

Number of respondents (N=128)			%
Gender:	Male	69	54
	Female	59	46
Age:	Under 18	40	31
	18 yrs old	40	31
	19 years old	27	21
	20 years old	8	6
	21 years old	2	2
	22 years old or older	11	9
Course:	BS Computer Science	3	2
	BS Information Technology	124	97
Year Level:	First year	1	1
	Second year	57	45
	Third year	61	48
	Fourth year	6	5
	Fifth year	1	1

The Instrument. The development of questionnaire items to measure each of constructs in the research model are adapted from prior literatures and each item was measured with a 6-point Likert scale, ranging 1 (Strongly disagree), 2 (Moderately disagree), 3 (Slightly disagree), 4 (Slightly Agree), 5 (Moderately Agree), and 6 (Strongly agree). The Persistence measure was adapted to conform to predict interest in computing discipline. The original academic performance and persistence measure made by Lent et al., (2008) has produced a coefficient alpha of .89 while the self-report persistence measures reported by Ventura & Shute (2013) provides the persistence scale a reliability of 0.83. The career self-efficacy (CSE) measure is based on the Career Decision Self-Efficacy Scale developed by Professor Nancy Betz with internal consistency of .94 for the 25-item total score (Betz & Luzzo, 1996). Restubog et al., (2010) utilized this measure in examining the relationship between contextual support and persistence and obtained a Cronbach's alpha of .83 while Littman-Ovadia (2008) reports a .86 in her study.

The Computer Self-Efficacy Scale (CoSE) has 29 items with high scores indicating a high degree of confidence in the subject's ability to use computers (Durndell et al., 2000) with a Cronbach alpha values of 0.63, 0.72, and 0.90 respectively for CARS, IAS, and CSE subscale (Sam et al., 2005). In samples tested and collected from 23 nations, the General Self-Efficacy (GSE) scale's reliability ranges from .76 to .90, with the majority in the high .80s. This scale has been translated in 33 languages and has been used for more than two decades to measure the general self-efficacy of the general adult population and adolescents (Schwarzer, & Jerusalem, 1995; Schwarzer&Scholz, 2000).

Technology Self-Efficacy's (TSE) is influencedby the work of Holder (2007)'s computer/Internet self-confidence scale. It has a coefficient alpha of .67. Smith (2002)'s research to explain vocational interest in information technology reports of a Cronbach's alpha of .85 from her sample while Borbon & Borbon (2013) report of .87 Cronbach's alpha in TSE's current form.

Results And Discussion

Means, standard deviations, and range of scores for the predictor variables and the criterion variable are presented in Table 2.

Table 2. **Descriptive data**

Number of respondents (N=128)			
Variable	**M**	**SD**	**Range**
Predictor : Technology Self-efficacy (TSE)	4.18	1.21	1 - 5
Computer Self-efficacy (CoSE)	4.76	0.95	1 - 4
Career Self-efficacy (CaSE)	4.47	0.96	1 - 5
General Self-efficacy (GSE)	4.43	0.94	1 - 5
Criterion : Persistence (Per)	2.87	1.17	1 - 5

Table 3 summarizes the result of the multiple regression analysis in predicting persistence (see the Appendix for additional details). Multiple linear regression analysis was used to test if GSE, TSE, CoSE and CaSE significantly predicted persistence. The results of the regression indicated that GSE (β= -.365, $p<.05$) and CoSE (β=-.288, $p<.05$) negatively and significantly predicted persistence. The negative regression coefficients of GSE and CoSE indicate that the variables are negatively associated with persistence, which means that the higher the scores on GSE and CoSE the lower the persistence scores. Conversely, the lower the scores on GSE and CoSE, the higher the persistence scores are. The other two variables, TSE (β=.018, $p>.05$) and CaSE (β=.059, $p>.05$) are not significant in predicting persistence. Furthermore, the results of the regression indicate that the two variables (GSE and CoSE) explains 33.5% of the variance of persistence (R2 = .335, $F(4, 120) = 15.088$, $p<.01$).

The model below is best represented with the equation:

$$\mathbf{Per = 5.515 - 0.365GSE + 0.018TSE - 0.288CoSE + 0.059CaSE}$$

Table 3. **Multiple Linear Regression Analysis Between Independent Variables and different efficacies**

Independent Variables	**Regression Coefficients**	**t-value**	**P-Value**
General Self-Efficacy (GSE)	-.365	-4.032	.000
Technological Self-Efficacy (TSE)	.018	.230	.818
Computer Self-Efficacy (CoSE)	-.288	-2.758	.007
Career Self-Efficacy (CaSE)	.059	.474	.636

Constant : 5.515
Adjusted R2: 0.312
F-Value: 15.088
Sig. Level: 0.000

The general result of this study reveals that the higher general self-efficacy (GSE) and computer self-efficacy (CoSE) scores of the students, the less would their persistence be in college. Several studies can provide explanation to this research's findings. In a study of online students, Harell & Bower (2011) reveals that an increased level of computer skills is associated with the subsequent increase in withdrawal rates. The study also added that lesser focus on course content and distractions accorded by the Internet might be the cause of the increase in attrition. Kuo et al. (2013) research reports that the lack of programming self-efficacy by students mean that their learning dwindles and become unsatisfied.

While Dupin-Bryant (2004) reports that increased computer skills are not related to student retention, the study does not report of a negative correlation between the variables measured. Wang et al. (2013) research suggests that students with higher levels of technology self-efficacy tend to receive better grades and course satisfaction. Albeit in a different application, Holden & Rada (2011) concludes that computer self-efficacy and technology self-efficacy have no significant influence in technology acceptance and cautions the readers that their results are situation-based and might produce a different result when replicated in a different situation.

Conclusions and Implications

The result of this study should be interpreted with caution in light of a number of limitations. First, persistence was predicted using only four concept of self-efficacy deemed essential to a technology course. As far as the literature is concerned, there are many types, forms, and measure of domain-specific self-efficacy with various moderating and mediating effect in concert with other contextual variables (e.g. Fagan et al., 2003; Saifuddin et al., 2013; Garcia et al., 2012; Lent et al., 2008). As such, this research did not explicitly measure other internal and external contributing factors to student persistence. Second, this study only provides a brief glimpse of the students' academic life which according to Pascarella & Terenzini (2005) serves an indirect role in mediating persistence, thus, the years of education or previously earned degrees are not examined. Accordingly, students can persist by continuing to pursue a major at a college or university, change majors, or transfer from one university to another, but continue in the educational system (Leppel, 2001). Lastly, self-efficacy is not universal as it holds varying degrees of confidence in an individual's ability across a multitude of domains (Bandura 1977, 1986). Therefore,any measure of domain-specific self-efficacy may or may not be positively correlated with a measure of an individual's actual abilities in a particular domain. These contributing factors was not presented nor considered in this study.

The implication of this study highlights the importance of persistence in a global situation brimming with the effect of technology's push and pull. First, the computing and technology-related courses put premium on how technology-adept and computer-savvy students are. This so-called "technology push" necessitates academic institutions to adapt the latest technology and tools in order for their students to be prepared globally which may have direct and indirect implications on student persistence. For example, the cost of acquiring new equipments, gadgets, tools, and software are directly transferred to students via laboratory and/or miscellaneous fees. While it is not explicitly stated, the high cost of education is a recurring reason why students are not enrolled in the Philippines (Montalvo, 2004; Unicef, 2010), Malaysia (Sua, 2012), Indonesia (Elley, 1977), Thailand (Sittichai et al., 2009), and other ASEAN countries (Yao et al., 2013). Furthermore, students may experience unforeseen shocks during college that might cause them to exit early (Velez, 2013).In addition, adapting new technology forces the faculty and other academic personnel to get used to a gamut of new procedures and paradigm more quickly, these inadvertently contributes to student attrition (Hoffmann, 2012;Yadav& Korb, 2012; Harell & Bower, 2011; Dupin-Bryant, 2004; Astin, 1993).

Second, the global industry demands adequate and relevant skills needed for innovation, competitiveness, and the survival of the manufacturing and service sectors (World Bank, 2010). Problem solving, critical thinking, creativity, and technical skills are much needed in the industry and academe that the academia has failed to provide. This "technology pull" is best characterized by the demand and supply mismatch reported by extant literature (e.g., OECD, 2013; Sipin et al., 2012; UNCTAD, 2011; Maltese & Tai, 2011; World Bank, 2010). Observant nations are quick to address this issue thru academic reforms and in part by funding academic programs that prevents and/or minimize student attrition (Yadav & Korb, 2012; Hoffmann, 2012; DOL, 2007).

In conclusion, this study provides a guidepost in which future research can explore. It highlights the salient role of general self-efficacy (GSE) and computer self-efficacy (CoSE) and its negative association to student persistence in the domain of computing education. Its contribution to the body of knowledge is through the presentation of statistical evidence that technology self-efficacy (TSE) and career self-efficacy (CaSE) has no direct effect in persistence. The result also support and further validates the theoretical foundation that students with low self-efficacy for a specific task are likely to give up and not expend much effort in accomplishing a task. Technology disrupts existing norms and practice; it also innovates and creates new practice and new paradigms. This study presents the dual role of technology as a solution and the cause of problem in student attrition, as such, policy makers are cautioned in embracing it wholeheartedly.

REFERENCES

Akbulut, A. Y., Looney, C. A., & Motwani, J. (2008).Combating the decline in information systems majors: The role of instrumental assistance. *Journal of Computer Information Systems*, 48(3), 84.

Astin, A.W. (1993). What matters in college? Four critical years revisited. San Francisco, CA: Jossey-Boss.

Bandura, A. (1997). Self-efficacy: the exercise of control. New York: Freeman

Betz, N. E., & Luzzo, D. A. (1996).Career assessment and the career decision-making self-efficacy scale. *Journal of Career Assessment*, 4, 413-428.

Borbon, M.R. & Borbon, M.L.F. (2013, October).Counselors and their use of ICT Tools in maximizing services to Institutions. Paper presented at the 13th SEAAIR Conference, Jogjakarta, Indonesia (pp. 225-230). Surabaya: Universitas Ciputra.

Capuzzi, D. & Stauffer, M. D. (2006). Career Counseling: Foundations, Perspectives, and Applications. Boston: Pearson Education

Chamorro-Premuzic, T. (2012). Personality and Individual Differences, 2nd edition. Glasgow: Bell and Bain.

CHED (2012).Higher education indicators as of July 24, 2012. Retrieved December 12, 2012 from http://www.ched.gov.ph/chedwww/index.php/eng/Information/Statistics

Clark, R. (2011)," Today's pupils, tomorrow's engineers! Pedagogy and policy: a UK perspective". *Journal of Engineering,* *Design and Technology*, Vol. 9 Iss: 2 pp. 227 – 241.

Cohen, J., Cohen, P., West, S. G., & Aiken, L. S. (2013). Applied multiple regression/correlation analysis for the behavioral sciences. Routledge.

DOL (2007). "The STEM Workforce Challenge: the Role of the Public Workforce System in a National Solution for a Competitive Science, Technology, Engineering, and Mathematics (STEM) Workforce". Retrieved from http://www.doleta.gov/Youth_services/pdf/STEM_Report_4%2007.pdf

Duggan, M. H. & Jurgens, J. C. (2007).Career Interventions and Techniques.A Complete Guide for Human Service Professionals. Boston: Pearson Education.

Durndell, A., Zsolt, H., & Laithwaite.H. (2000). "Computer self efficacy and gender: A cross cultural study of Scotland and Romania." *Personality and individual differences*. 28.6: 1037-1044.

Dupin-Bryant, P. A. (2004). Pre-entry variables related to retention in online distance education. The American *Journal of Distance Education*, 18(4), 199-206.

Drake, J.K. (2011). "The Role of Academic Advising in Student Retention and Persistence". *About Campus*. July–August 2011. DOI: 10.1002/abc.20062

Elley, W. B. (1977). National assessment of the quality of Indonesian education. *Studies in Educational Evaluation*, 2(3), 151-166.

Fagan, M. H., Neill, S., & Wooldridge, B. R. (2003). An empirical investigation into the relationship between computer self-efficacy, anxiety, experience, support and usage. Journal of Computer Information Systems, 44(2), 95.

Garcia, P.R.J.M., Restubog, S.L.D., Toledano, L.S. & Tolentino, L.R., & Rafferty, A.E. (2012)."Differential Moderating Effects of Student- and Parent-Rated Support in the Relationship Between Learning Goal Orientation and Career Decision-Making Self-Efficacy". *Journal of Career Assessment*, 20(1) 22-33.

Hacket, G. & Betz, N. E. (1981).A self-efficacy approach to the career development of women.Journal of Vocational Behavior, 18, 326-336.

Harrell, I. L. & Bower, B.L. (2011). "Student characteristics that predict persistence in community college online courses". *American Journal of Distance Education*, 25(3), 178-191.

Harris, B. J., Rhoads, T. R., Walden, S.E. & Murphy, T.J. (2004). "Gender Equity in Industrial Engineering: A Pilot Study". *NWSA Journal*, Volume 16, Number 1, Spring, pp. 186-193.

Heppner, P., Wampold, B.E., & Kivlighan, D.M. (2008). Research Design in Counseling 3rd edition. California: Thomson Higher Education.

Heppner, P. P., & Heppner, M. J. (2004).*Writing and publishing your thesis, dissertation, and research: A guide for students in the helping professions*. Thomson/Brooks/Cole.

Holden, H. & Rada, R. (2011). "Understanding the Influence of Perceived Usability and Technology Self-Efficacy on Teachers' Technology Acceptance." *Journal Of Research On Technology In Education (International Society For Technology In Education)* 43, no. 4: 343-367. Professional Development Collection, EBSCOhost (accessed July 28, 2014).

Holder, B. (2007).An investigation of hope, academics, environment, and motivation as predictors of persistence in higher education online programs.The Internet and higher education, 10(4), 245-260.

Kuo, F.Y., Wu, W.H., & Lin, C.S.(2013). "An Investigation of Self-Regulatory Mechanisms in Learning to Program Visual Basic." *Journal Of Educational Computing Research* 49, no. 2: 225-247. *Professional Development Collection*, EBSCO host (accessed July 28, 2014).

Lent, R., Brown, S., & Hackett, G. (1994). "Toward a unifying social cognitive theory of career and academic interest, choice, and performance".Journal of Vocational Behavior, 45(1), 79– 122.

Lent, R., Brown, S., & Hackett, G. (2000). "Contextual supports and barriers to career choice: A social cognitive analysis". *Journal of Counseling Psychology*, 47(1), 36 – 49.

Lent, R. W., Brown, S. D., Brenner, B., Chopra, S.B., Davis, T., Talleyrand, R., & Suthakaran, V. (2001). "The Role of Contextual Supports and Barriers in the Choice of Math/Science Educational Options: A Test of Social Cognitive Hypotheses". *Journal of Counseling Psychology*, Vol. 48, Number 4, 474-483.

Lent, R. W., Brown, S. D., Schmidt, J., Brenner, B., Lyons, H. & Treistman, D. (2003). "Relation of Contextual Supports and Barriers to Choice Behavior in Engineering Majors: Test of Alternative Social Cognitive Models". *Journal of Counseling Psychology*, Vol. 50, Number 4, 458-465.

Lent, R. W., Lopez, A. M., Lopez, F. G., & Sheu, H. (2008).Social cognitive career theory and the prediction of interests and choice goals in the computing disciplines. *Journal of Vocational Behavior*, 73 (2008) 52–62.

Levy, Y. (2007). Comparing dropouts and persistence in e-learning courses. *Computers & education*, 48(2), 185-204.

Littman-Obadiah, H. (2008). The effect of client attachment style and counselor functioning on career exploration. *Journal of Vocational Behavior* 73 (2008) 434–439

Lopez, A.M., Lopez, F.G., Lent, R.W., & Constantine, M.G. (2007)." Multidisciplinary Research on the Data path of the Computing Disciplines". *Communications of the ACM*. Vol. 50, No. 12

Maltese, A.V. & Tai, R.H. (2011)."Pipeline Persistence: Examining the Association of Educational Experiences With Earned Degrees in STEM Among U.S. Students". *Science Education Policy.Wiley Online Library*. DOI

10.1002/sce.20441.

Mamiseishvili, K. (2012). "International student persistence in U.S. postsecondary institutions". *High Educ*. 64:1–17.

McCue-Herlihy, E.A. (1997). Relations among academic achievement, resource utilization, and persistence in a sample of nontraditional college students. UMI Dissertation Services: 9805026

McDonald, T., & Siegall, M. (1992). The effects of technological self-efficacy and job focus on job performance, attitudes, and withdrawal behaviors. *The Journal of Psychology*, 126, 465-475.

Michael, S. & Nelson, D.L. (2006). "Barriers women face in information technology careers: Self-efficacy, passion and gender biases". *Women in Management Review*.Vol. 21, No. 1. pp. 10-27.

Montello, J. G. (2004). "Education, Poverty, and Development". *Korea*,100 (94.2), 82-0.

NSB (2007)."A National Action Plan for Addressing the Critical Needs of the U.S. Science, Technology, Engineering, and Mathematics Education System". Retrieved from http://www.nsf.gov/nsb/documents/2007/stem_action.pdf

OECD (2013), Education at a Glance 2013: OECD Indicators, OECD Publishing. Retrieved from http://dx.doi.org/10.1787/eag-2013-en

Pascrell, E.T., & Terenzini, P.T. (1991). How college affects students: Findings and insights from twenty years of research. San Francisco, CA: Josses-Bass.

Pascrell, E.T., & Terenzini, P.T. (2005). How college affects students. San Francisco, CA: Josses-Bass.

Rest bog, S.L.D., Florentine, A.R. & Garcia, P.R.J.M. (2010)."The mediating roles of career self-efficacy and career decidedness in the relationship between contextual support and persistence". *Journal of Vocational Behavior*. 77: 186–195.

Rhodes, V., Stevens, D. & Hemming, A. (2011). "Creating Positive Culture in a New Urban High School", *The High School Journal*, Volume 94, Number 3, Spring 2011, pp. 82-94.

Roman, E. R.(2012). "University Rankings –Are Philippine HEIs Readyfor Them?". *Education Quarterly*. Vol. 70, Issue 1 pp. 4-13.

Saifuddin, S.M., Dyke, L.S, & Rasouli, M.(2013). "Gender and careers: a study of persistence in engineering education in Bangladesh". *Gender in Management: An International Journal*. Vol. 28 No. 4, 2013, pp. 188-209.

Sam, H. K., Othman, A. E. A., & Nordin, Z. S. (2005). Computer Self-Efficacy, Computer Anxiety, and Attitudes toward the Internet: A Study among Undergraduates in Unimas. Educational Technology & Society, 8 (4), 205-219.

Sammons, M.T. & DeLeon, P. H..(2004). Foreword. In Kraus, R., Zack, J. S., & Stricker, G (Ed.), Online counseling: A handbook for mental health professionals. Amsterdam: Elsevier Academic Press.

Schwarzer, R., & Jerusalem, M. (1995). Generalized Self-Efficacy scale. In J. Weinman, S. Wright, & M. Johnston, Measures in health psychology: A user's portfolio. Causal and control beliefs (pp. 35-37). Windsor, UK: NFER-NELSON.

Schwarzer, R., &Scholz, U. (2000). Cross-Cultural Assessment of Coping Resources: The General Perceived Self-Efficacy Scale. Paper presented at the First Asian Congress of Health Psychology: Health Psychology and Culture, Tokyo, Japan.

Schmidt, J.J. (2008). Counseling in Schools: Comprehensive Programs of Responsive Services for all Students, 5th edition. Boston: Pearson Education.

Sipin, G. L, Espiritu, J. D., &Malabanan, O. A. (2012)." Issues on the Philippines' Information and Communications Technology (ICT) Competitiveness".De La Salle University. Retrieved December 13, 2012 from http://www.dlsu.edu.ph/research/centers/aki/_pdf/_concludedProjects/_volumeI/Sipinetal.pdf

Sittichai, R., Tongkumchum, P., & McNeil, N. (2009).Discontinuation among University Students in Southern Thailand. International Education Studies, 2(2), P17.

Smith, S. M. (2002). The role of social cognitive career theory in information technology based academic performance. *Information Technology, Learning, and Performance Journal*, 20, 1-9.

Soldner, M., Rowan-Kenyon, H., Inkelas, K. K., & Garvey, J. (2012)." Supporting Students' Intentions to Persist in STEM Disciplines: The Role of Living-Learning Programs Among Other Social-Cognitive Factors". *The Journal of Higher Education*, Volume 83, Number 3, May/June 2012, pp. 311-336.

Sua, T. Y. (2012). Democratization of secondary education in Malaysia: Emerging problems and challenges of educational reform. *International Journal of Educational Development*, 32(1), 53-64.

Swanson, J.L. & Gore, P.A., Jr. (2000).Advances in vocational psychology theory and research. In S.D. Brown & R.W. Lent (Eds.), *Handbook of counseling psychology* (3rd ed., pp. 233-269). New York: Wiley.

Thiry, H., Laursen, S.L, & Hunter, A. (2011)." What Experiences Help Students Become Scientists?: A Comparative Study of Research and Other Sources of Personal and Professional Gains for STEM Undergraduates". *The Journal of Higher Education*, Volume 82, Number 4, July/August 2011, pp. 357-388

Tinto, V. (1982).Limits of theory and practice in student attrition. *The Journal of Higher Education*, 687-700.

Tinto, V. (1987). Leaving college: Rethinking the causes and cures of student attrition. University of Chicago Press, 5801 S. Ellis Avenue, Chicago, IL 60637.

Tinto, V. (1997).Classrooms as communities. *The Journal of Higher Education*, 68(6), 599–623.

UNCTAD (2011). "Information Economy Report: ICTs as an Enabler for Private Sector Development". Geneva: United Nations. Retrieved January 11, 2013 from http://unctad.org/en/PublicationsLibrary/ier2011_en.pdf.

Unicef (2010). "The Filipino child: Global study on child poverty and disparities: Philippines".Policy Brief No. 4. Retrieved from http://www.unicef.org/philippines/brief04_fnl.pdf

Velez, E. D. (2013). America's College Drop-Out Epidemic: Understanding the College Drop-Out Population. Retrieved from http://www.air.org/sites/default/files/downloads/report/AIR-CALDER-Understanding-the-College-Dropout-Population-Jan14.pdf

Ventura, M., & Shute, V. (2013).The validity of a game-based assessment of persistence. *Computers in Human Behavior* 29 (2013.) 2568–2572.

Villar, I. (2007). Implementing a comprehensive guidance and counseling program in the Philippines. Makati: Aligned Transformations.

World Bank (2010). "Philippines Skills Report: Skills for the Labor Market in the Philippines". Report No. 50096-PH. Retrieved January 11, 2013 from http://siteresources.worldbank.org/EASTASIAPACIFICEXT/Resources/226300-1279680449418/HigherEd_PhilippinesSkillsReport.pdf

Yadav, A. &Korb, J. T. (2012)."Learning to Teach Computer Science: The Need for a Methods Course". *Communications of the ACM*. Vol. 53. No. 11. pp. 31-33.

Yao, J., Yi, H., Zhang, L., Wang, H., Yang, C., Shi, Y., ...& Rozelle, S. (2013).Exploring Dropout Rates and Causes of Dropout in Upper-Secondary Vocational Schools. REAP Working Papers.

Entrepreneurship Learning in Cross-cultural Educational Environment: The Dynamics and Critical Factors

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ABSTRACT

The establishment of ASEAN Economic Community (AEC) in 2015 has brought more challenges and important roles for entrepreneurs in the South East Asia region. One of the main cooperation programmes in AEC is the capacity building and professional development that have an emphasis on building good and successful entrepreneurs being resilient in highly competitive economic region. This paper presents our research on how to develop entrepreneurship competences in cross-cultural university by exemplifying the development of students' business creation and challenges as well as identifying their critical failure and success factors. In multi-cultural educational environment, a cultural difference can be a challenge for students to learn entrepreneurship. Some of the challenges may rise from the differences in languages, lifestyles, interactions, traditions and values of life. On the other hand, this cross-cultural environment could deliver a positive impact on improving the students' entrepreneurship competences. Good entrepreneurship learning should be able to generate entrepreneurial skills and knowledge, such as entrepreneurial character, leadership and business management. The implementation of entrepreneurship learning in a cross-cultural educational environment was explored in the scope of business creation issues and challenges experienced by students of the International Business Management Program at University of Ciputra. The criteria for sample were groups of students running business projects, consists of students with different cultural backgrounds. Triangulation methods and sources were used to obtain validity and reliability. The results showed that students experienced a dynamic learning process and faced challenges caused by cultural differences. Based on this study, entrepreneurial characters and support accepted by students was identified as the most important success factors. Students who are successful in their business projects tend to be more open and confident in creating business with cross-cultural team members.

Keywords: **cross-cultural, entrepreneurship, higher education, start-up business**

Introduction

The Asean Economic Community (AEC) will establish a single regional common market of Asean countries by 2015. This effort is expected to be an economic prosperity mission, increasing business and investment opportunities for the ASEAN countries through free flow of goods, services, investment capital and skilled labor, supported by the administrative policies such as tariff reductions and other administrative procedures. AEC opened the opportunity for entrepreneurs in South East Asia with new regional markets, greater choices of goods and services for consumers, acquiring more qualified human resources and business networks across ASEAN countries. On the other hand, this condition will increase competition, constraints such as tight fiscal situation, inadequate infrastructure (Rosellon & Yap, 2010) and other challenges for entrepreneurs. Moreover, for marketing highly competitive products and services, entrepreneurs need to learn many things about the target market, such as local regulations, culture, languages, and customer behaviors of the market. Entrepreneurs who are generally associated with SMEs will meet several barriers, such as: "access to finance, technology, skills, information gaps, difficulties with product quality and marketing, and the fact that penetrating the export market has not been easy for SMEs" (Aldaba, 2013). This challenge is not only the responsibility of the business people but also educational institutions, by contributing to highly competent human resources.

Today, entrepreneurship becomes important factors contributing in job growth and national economic development (Sahin, Nijkamp, & Baycan-Levent, 2007). The role of entrepreneurs in private sector has become the driver of economic growth in most of ASEAN member countries (Rosellon & Yap, 2010). Furthermore, an entrepreneurship education is expected to create great passionate, highly energetic entrepreneurs that can invent new ideas, creative solutions with calculated risk taker character and has vision to recognize opportunities (Kuratko, 2005). Thus, entrepreneurs will be able to face AEC challenges by creating employments in dynamic, creative and productive businesses (Abdinagoro, 2003) within cross cultural environments. "This will require models of education which is more focused on preparing people for tomorrow's labour markets and for a more unpredictable and complex society, as well as new policies especially target for this area" (Marques & Albuquerque, 2012). Particularly, entrepreneurship education must be improved by incorporating cross-cultural business environment in its curriculum.

This paper explores the entrepreneurship education experience in cross-cultural environments in International Business Management study program in Ciputra University. The entrepreneurship learning process at University of Ciputra adopts experienced-based learning approach that combines theory and practice. Students are assigned to create a business project that must be excecuted from the 2nd semester until 7th semester of their studies. By having business project, students had the opportunity to apply knowledge and skills learned in class into their business, practice how to look for business opportunities then creating businesses of their own. Student must be the active participant in learning and depends on collaboration and interaction with their partner within the group (Lans, Popov, Oganisjana, & Täks, 2013). Furthermore, "the role of culture in explaining entrepreneurial intentions is probably very relevant" (Liñán & Chen, 2009), culture effects learning styles, such as "preference for abstract conceptualization versus concrete experience" (Joy & Kolb, 2009). Moreover, culture is considered as tools of communication in a group, used for expressing feelings, exchanging valuable information, forming bonds of solid teamwork as well as strategies for their business project (Kraus & Sultana, 2010). Cross-cultural collaboration incorporated in entrepreneurship education is expected to result in better development of interpersonal skills as well as higher-level learning (Sweeney, Weaven, & Herington, 2008).

This research focuses on how to develop entrepreneurship competences in cross-cultural university by exemplifying the development of students' business creation and challenges as well as identifying their critical failure and success factors. The implementation of entrepreneurship learning in a cross-cultural educational environment was explored in the scope of business creation issues and challenges experienced by students of the International Business Management Program at University of Ciputra. Case study approach is used on groups of students running business projects, consists of students with different cultural backgrounds, Cleaning Service Residential (CSR) and Forward Event Creator (FEC). The selection of CSR is considering cross-cultural background of members of a group consisting of two locals and one Korean student. CSR is a business in cleaning service on call for personal residential that has been running for 3 semesters. This group was examined concerning on cross-cultural influences related to differences in nationality. On other hand, the FEC was chosen with regard to its members' background that consists of 4 local students, from Surabaya city, and one student from Ende city. Cross-cultural differences related with student's origin, 4 members are from Java, part of Western Indonesia and 1 student is from Flores Island, part of Eastern Indonesia. The objective of using case study is to identify a more detailed description on the entrepreneurial learning process, group dynamics related to the relationship between members, interaction with customers, suppliers, employees and other parties and to identify the problems, find solution proposed by groups then formulate critical failure and success factors in a cross-cultural entrepreneurship.

Literature review

Cross cultural education

Before looking further into entrepreneurship education in cross cultural environment, it is necessary to first understand what culture is. In general, culture consists of four elements: values that comprise ideas about what seems important in life, norms that consist of expectations of how people will behave in various situations, institutions as the structures of a society within which values and norms are transmitted and artefacts, aspects of material culture, derive from norms and values of a culture (Sahin et al., 2007). With these elements, "growing up in a certain cultural context entails the imparting of these meanings, practices and tools of discourse" which processed explicitly or implicitly involving knowledge (Kraus & Sultana, 2010). "Culture is a factor, which can influence people in the way they behave. Culture is transferred by social environment in which one passes through the learning and growing process" (Sahin et al., 2007).

In educational context, students from various cultural backgrounds gathered in an institution, creating dynamics in learning and social interactions. It is evident that culture has an impact on the learning style like collectivism, uncertainty avoidance in certain culture impact person's preference for abstract conceptualization versus concrete experience (Joy & Kolb, 2009). Instead of influencing learning style, culture consists of "a set of conventionalized learned routines that help individuals in a society to coordinate their social behaviors. On the other hand, when an individual is immersed in and exposed to only one culture, the learned routines and conventional knowledge of that culture may limit his or her creative conceptual expansion" (Leung, Maddux, Galinsky, & Chiu, 2008). The cultures from different disciplines, different national and cultural contexts influence students' ability of becoming effective communicators and collaborators (Kraus & Sultana, 2010). Students attending universities in a culture different from their own usually deal with problems of adjustment. Multi-cultural experience could result in "culture shock, feeling anxious and disoriented in the absence of the familiar—the language, the food, the behavioral norms" (Leung et al., 2008). This is could be difficult when a new student is aware of the cultural differences in advance, and becoming more difficult when he or she is unaware, assuming that the new environtment are like their home country (Zhou, Jindal-Snape, Topping, & Todman, 2008).

Dynamics caused by cultural differences also happen in the learning process and interaction within smaller group of students. "Obstacles in communication within a culturally mixed group are often concerned feelings of awkwardness, discomfort and uneasiness associated with expressing what one felt during interactions with others" (Kraus & Sultana, 2010). Many learning-related problems in inter-cultural group are resulted from expectations gaps between teachers and students (Zhou et al., 2008), tensions and challenges involving value differences while working on assignments as project partners may have different perspective (Kraus & Sultana, 2010). Thus, "social support from both host and co-nationals can contribute to enhancement of student psychological well being to enhance the quality of their overall experiences" (Zhou et al., 2008).

Entrepreneurship in cross-cultural environment

For AEC 2015, entrepreneurs should be able to overcome expanded business environment. Cultures exist surrounding entrepreneurs will influence entrepreneurial intentions. "Culture-based differences like inter alia, internal solidarity and loyalty, flexibility, personal motivation, the work ethic, flexible financing arrangements, influence entrepreneurial attitude and behavior" (Sahin et al., 2007). Moreover, entrepreneurially friendly culture such as in collectivistic cultures that valuing entrepreneurship as career option, supported with legal reforms that facilitate firm creation will promote entrepreneurial intentions (Liñán & Chen, 2009). Culture, in the form of a family tradition in business and strong family ties, has an impact on business entry motives, on the financing of new start-ups, and are responsible for encouraging an entrepreneurial spirit and performance (Sahin et al., 2007).

An entrepreneur should have vision and innovative thinking then learn all the information, to plan and measure risk before taking action (Kuratko, 2012). However, culture may limit creativity, multicultural experiences can promote creative ideas by "providing direct access to novel ideas and concepts from other cultures, creating the ability to see multiple underlying functions behind the same form, destabilizing routinized knowledge structures, thereby increasing the accessibility of normally inaccessible knowledge, creating a psychological readiness to recruit ideas from unfamiliar sources and places, and fostering synthesis of seemingly incompatible ideas from diverse cultures" (Leung et al., 2008). The entrepreneurs find opportunities and start business based on perceived entrepreneurial opportunity influenced by contextual motivation, that is the influence of social, economic, and political environments that shape individual behaviors (Hechavarria & Reynolds, 2009).

In higher education entrepreneurial learning context, Rae (2003) speaks of opportunity-centred learning as the heart of entrepreneurship (Lans et al., 2013). The learning process needs to incorporate cross-cultural element that enhances creativity and opportunity recognition. Bringing students from different cultural backgrounds into the same team provides multicultural experience that can potentially result in creative problem solving and idea generation (Leung et al., 2008). However, the learning success rate in heterogeneous student groups need to consider factors like embracing members' knowledge, experiences and skills; "communication; problem solving and decision making; conflict management; and leadership" (Lans et al., 2013). Incorporating cross-cultural in entrepreneurship study should contribute significantly to the personal development such as confidence, personal initiative, creativity and responsibility and, the entrepreneurial skill development such as social competences, "creative problem solving, opportunity seeking, selling, presentation, group leadership, community co-operation, dealing with bureaucracy, among others" (Marques & Albuquerque, 2012).

Research Method

Qualitative research approach with a case study strategy is used to explore the development of students' business creation and challenges, and to identify their critical failure-success factors as well as to develop entrepreneurial competences in cross-cultural university. This study used three data collection methods of observation, interview and documentation that used as triangluation to obtain the validity of the data. CSR was selected based on members' cross cultural nationality backgrounds consisting of two local students and one Korean. FEC groups were selected based on members' background consisting of 4 local students from Surabaya and one from Ende, Flores Island in

Eastern Indonesia to learn the cross-cultural differences of student origin within one nationality. Observation period of this study was taken over three semesters starting from start-up business phase.

Discussions

The first section of discussion will explain about the dynamics of CSR and FEC in their learning process during business start-ups and execution. The entrepreneurial competences that appear as a result of their learning process will also be described in this section. The last part of the discussion will describe the critical failure and success factors in entrepreneurship learning and business creation process particularly in cross cultural environment elaborated from observations and interviews.

Dynamics and entrepreneurial competence

Business start-up process was done in the 2nd semester as part of Entrepreneurship 2 and Entrepreneurial Project 2 courses. At the beginning of the course, students were given the task to form a business group and then create business idea that was targeted to be ready for execution at the end of 2nd semester. In early stages of the group formation, both CSR and FEC choosed their members based on friendship. CSR choosed members from their classmates since they felt more comfortable working with a friend they already know as they hoped for easier coordination in the team because they have similiar lecture schedule than if collaborating with those from different classes. FEC group selected their members based on classmates, hangout partners since they expected it would be fun and fit each other. At this stage, they do not yet understand the recruitment process and forming group as fulfillment of course requirement.

The next stage was they must think a business idea to be executed. Students were given knowledge of business ideas creation using design thinking method and planning using the Business Model Canvas tools from Entrepreneurship 2 class, while Entrepreneurial Project 2 courses taught the knowledge of market and competition as well as the preparing a professional business plan. Furthermore, lessons from class were directly practiced and they finally were able to decide business ideas. CSR decide to create cleaning service for home personal residents. This idea initiated by the CEO after considering many households in Surabaya often been hassled caused by the absence of housekeeper. CSR members held preleminary survey and market observation; then conclude an opportunity in this business. This business idea was then approved by the other members; but unfortunately, not all members interested with this kind of business, nor feeling optimistic with this idea. Moreover, cross-cultural dynamics experienced by Korean member, named Lee. At first joining the group, Lee did not know the other members well and he was more following the majority or CEO's direction. Lee also found that the Indonesian middle class usually have personal housekeeper and nowadays it's been quite difficult to find one since many workforces choose to work as factory labor, shopkeeper or others that give higher salary and seemed to be more prestigious than housekeeper. On the contrary, in Korea, the middle classes do the houseworks on their own instead of having housekeeper. Another obstacles experienced by Lee was not fluent in Bahasa Indonesia, so often in discussions he stunned, silent for lost in translation or unable to express his opinions and feelings. On the other hand, the local members often got confused with Lee and sometimes laughed the ackwardness. Fortunatelly, this did not stop them in working on their business since all can speak in English. Informal interaction between members also occur like hang out, watching movies gave them opportunity to know each other in person, adapt, learning local term or slanks for Lee. Language barrier and acceptance from friends once had been a personal issue for Lee at the 1st semester. At Entrepreneurial Project 1 course, Lee did not know the class member, felt confused and less involved by his classmates result in feeling uncomfortable, unmotivated, more absence in class and failed in this course. This issue became less crucial in smaller group like CSR since each member were more supportive and friendly.

Different conditions experienced by FEC, when they decided to join the team. In creating a business plan, originally they wanted to create business in trading palm oil commodity considering big profits generates from each transaction. But this idea was not executed because they have another alternative, event organizer business. According to them, event organizer was more fun than commodity business. Furthermore, all members had once used event organizer services, and experienced organizing event at Entrepreneurial Project 1 course. They see the opportunities that people, present and future, might hold an event or celebration. Although there are many competitors in this business, they were optimistic that this business could be successful considering the market size, creative opportunities to win the market and the most important was their passion in this area. Teamwork was more easily formed in this group because they have the same passion, and it is easier to communicate compared to CSR because Indonesian is their mother tounge. After forming the FEC, they were more often met formally to work on class assignment as well as hang out together. Often in informal meetings, they discuss business while dining or hanging out, and this effect to better teamwork, motivation and excitment in their business. In FEC, one of the members who have different cultural backgrounds came from the island of Flores, named Selvi. According to her, Flores people are more straightforward expressing their opinion, talk in a loud voice and act fast, unlike the Javanese people who are more implicit in communication, softspoken, more patient and careful. She also had an event organizer business while in high school and had often helped his parents in the store during her childhood in Flores. Her background did not become problem in FEC, even help create openness in the team. Differences in local languages do exist, but in this group used Bahasa Indonesia more often than local languages.

In start-up business phase, both CSR and FEC learned basic concepts for starting business and entrepreneurial knowledge as well as managerial skill from other courses; then applied these in their business creation practice. From both cases, CSR and FEC start their business based on opportunity instead of necessity. This explains the opportunity recognition skill learned by students and had been applied in their business creation process. In addition, both group faced cross-cultural challenges such as language barrier, different cultural background and managed themselves to adapt to each other more from informal interactions to maintain cohesiveness.

On the next semester, CSR and FEC continued on business execution. For CSR, the execution did not run smoothly because they had trouble in finding customers. Although they had advertised their service to friends through BBM and brochures, many people contacted just for asking information since cleaning service for personal resicential was relatively new. Consumers often compared the price offerd with housekeeper salary that seemed more expensive, without considering professional cleaning offers. In addition, CSR also found difficulties in recruiting employees whereas business has been launched. At the beginning of running their business, there are several times that they had to clean customer houses because orders had been received but then employee were absence without prior notice. As solution, all members agreed to work on the customer's home together. Unfortunately only Edbert (CEO), Gabriel and Lee come while the other 2 members did not come, nonetheless they decided to the finish the work. This brought an exciting experience for members of the CSR, the middle class students, who generally have housekeeper at their house and not used doing cleaning job. In this condition, they learn responsibility and the meaning of excellent customer service to build customer trust. Adverse business conditions and employees turnover happened one after another and finally 2 members quited, and left Edbert (CEO), Gabriel and Lee. This event gives hard pressure for the remaining members, but they did not give up. Edbert (CEO) remained confident that this business can run and needed more time for introduction and development, while Gabriel and Lee were less confident but still give support for Edbert considering their friendship. They changed the advertising media and look for employees through newspaper mini advertisements and get positive results. They finally got regular subscription and learned improving their services, developing standard procedures and managing employees. In the execution processes, assigning tasks according to members competence were very important. Edbert (CEO) at first gave Lee responsibility as marketing, but this became problem because Lee did not speak Indonesian fluently, unable to communicate with customers and become less performed. Next, Edbert (CEO) assign Lee to handle daily operations, since he considered Lee was not good in handling finance and administration documents. However, this job meet language barrier once again, as Lee must meet local suppliers i.e. shop owners, dealing with employees who are local people with lower education and had to communicate more with the Javanese local language. Moreover, Lee did not have his own vehicle that is hindering the mobility to buy goods and other operational purposes. Finally Edbert gave assignments in administration and finance for Lee because this task does not require a lot of communication with external parties. As a result, Lee found it easier and more comfortable now and learned to improve his administration. This experience taught CEO in leadership and managing human resources that appropriate job assignment will bring optimal result; trust in team member and give responsibility will result in cohesiveness, more participation and better teamwork. In addition, the change of responsibility gave experience for Lee in interacting with the locals, experiencing cross-cultural dynamics in local business.

The FEC experience in the execution of the business can be valued more smoothly than CSR. It was proved from the performance; they had launched 7 events within 2 semesters and had reached over one hundred million Rupiah of sales (equal to USD 10,000). Their first event is “Fun Parade” which took children and toddler markets succeeded and reach full return on their initial investment Thus increase team motivation and confident in business. Their other events were bazzar and Halloween, and each event was always profitable. Business conditions are good this one because of solid teamwork by all members of the group. Although there are duties and responsibilities, but all give support to another friend. In FEC, Selvi, one from Flores, is responsible for marketing and has a different experience than the experience of doing business in Flores. Selvi explains that the people of Surabaya more careful in choosing and take time to decide on the deal, while people usually faster Flores decides deal shortly or immediately after the offering. Language is also a major challenge of doing business in Surabaya, because the bidding process, communication with customers should be more often use the Javanese local language so that the customer was not too formal and familiar thus forcing Selvi learn the local language. Another challenge is the lack of acquaintance of the Surabaya spur Selvi meet and interact more with the local people so they can more easily get a reference customer contact. These conditions provide a new experience for Selvi in negotiations to win the deal with the customer and this success gave personal pride because the background as Flores, a small island, he could deal with the business of Surabaya which is considered more advanced. Another experience is the interaction with a group of friends Surabaya to become stronger and Selvi feel fully supported, becoming an important part of the group.

In business execution phase, both CSR and FEC experienced various dynamics. Important learnings from their entrepreneurial experiences are developing system dan operational procedures like marketing, operation, customer service, promotion and effective business strategy. High ethical standard are important as well, applied in fulfillment of customer order, friendly service for customer, also after sales service to maintain customer relationship. At this stage, language barrier still exist for student with different cultural background, motivation to adapt with local situation and support from other members are also important to maintain solid teamwork.

Based on the observation of the dynamics of the group and interviews, critical failure factors in the process of learning entrepreneurship in a cross-cultural environment can be formulated, as follows:

- Lack of passion and confidence in the business. In CSR, lack of confidence in the business because of group splitting-up, whereas in FEC all members have the same passion thus the business runs more smoothly.

- Language can greatly impede the process of learning and interactions of foreign students. In groups' internal communication, language barrier can be overcome by the initiative among members to accept this weakness. However, the incapability of speaking local language could limit an opportunity to making a deal with customers and building longterm relationship with customers or suppliers.
- Insufficient managerial knowledge and skills for business operations, human resource management and marketing can result in business stagnation and failure.

In addition, several success factors can be summarized below:

- Passion and confidence in business undertaken. This factor is confirmed and emphasized by the CSR and the FEC during interview and in accordance with their current business performance.
- Dare to take risks is important to execute business plan, implement quick effective solutions and improve business process.
- Persistence and adaptability can overcome cross-cultural environment constraints. This should be applied in the management and personal interactions.
- Support between members and the environment encourages entrepreneurs in running and sustaining their business in different cultural market area.

Conclusion

Entrepreneurship learning through cross-cultural educational environment provides dynamic challenges and entrepreneurial compentences in the development of new businesses, which can be adopted in the international business setting. The successful entrepreneurs often bring innovation, provide creative products and have good business management while they must adapt with the local culture. This research is a case study of multi-cultural entrepreneurship education at Ciputra University that could not be generalized internationally. It is also required some considerations of other cross-cultural environment and entrepreneurship dimension. However, this study can be utilized as useful information and guidance for the entrepreneurial education in cross-cultural environment, and for the preparedness of the ASEAN Economic Community (AEC) on building compentences of good entrepreneurs and generating new strong businesses in highly competitive AEC economic region.

REFERENCES

Abdinagoro, Sri Bramantoro. (2003). Road to be an own bos: Menjadi bos untuk diri sendiri. Republika Publishing.

Aldaba, R. M. (2013). ASEAN Economic Community 2015 SME development: Narrowing development gap measure (No. DP 2013-05).

Hechavarria, Diana M, & Reynolds, Paul D. (2009). Cultural norms & business start-ups: the impact of national values on opportunity and necessity entrepreneurs. International Entrepreneurship and Management Journal, 5(4), 417-437.

Joy, Simy, & Kolb, David A. (2009). Are there cultural differences in learning style? International Journal of Intercultural Relations, 33(1), 69-85.

Kraus, Katrin, & Sultana, Ronald G. (2010). Problematising 'cross-cultural'collaboration: critical incidents inhigher education settings. Cross-cultural Lifelong Learning.

Kuratko, Donald F. (2005). The emergence of entrepreneurship education: development, trends, and challenges. Entrepreneurship Theory and Practice, 29(5), 577-598.

Kuratko, Donald F. (2012). Entrepreneurship: Theory, process, and practice. South-Western Pub.

Lans, Thomas, Popov, Vitaliy, Oganisjana, Karine, & Täks, Marge. (2013). Learning for entrepreneurship in heterogeneous groups: experiences from an international, interdisciplinary higher education student programme. TRAMES(4), 383-399.

Leung, Angela Ka-yee, Maddux, William W, Galinsky, Adam D, & Chiu, Chi-yue. (2008). Multicultural experience enhances creativity: the when and how. American Psychologist, 63(3), 169.

Liñán, Francisco, & Chen, Yi-Wen. (2009). Development and Cross-Cultural application of a specific instrument to measure entrepreneurial intentions. Entrepreneurship Theory and Practice, 33(3), 593-617.

Marques, Laura Alvarez, & Albuquerque, Cristina. (2012). Entrepreneurship education and the development of Young people life competencies and skills. ACRN Journal of Entrepreneurship Perspectives, 1(2), 55-68.

Rosellon, Maureen Ane D, & Yap, Josef T. (2010). The role of the private sector in regional economic integration. A view from the Philippines.

Sahin, Mediha, Peter Nijkamp, and Tüzin Baycan-Levent. Multicultural diversity and migrant entrepreneurship: The case of the Netherlands. Vrije Universiteit, Faculty of Economics and Business Administration, 2006.

Sweeney, Arthur, Weaven, Scott, & Herington, Carmel. (2008). Multicultural influences on group learning: A qualitative higher education study. Assessment & evaluation in higher education, 33(2), 119-132.

Zhou, Yuefang, Jindal-Snape, Divya, Topping, Keith, & Todman, John. (2008). Theoretical models of culture shock and adaptation in international students in higher education. Studies in Higher Education, 33(1), 63-75.

Effects of Interactive Health Education on the Compliance of Mothers to Postpartum Care

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ABSTRACT

The study was conducted to determine the effects of interactive health education on the compliance of mothers to postpartum care. Forty (40) postpartum mothers aged 15 to 40 years old and above, uncomplicated primiparas from General Emilio Aguinaldo Memorial Hospital, Trece Martirez City , Cavite and Batangas Regional Hospital, Batangas City were the participants in this study. Majority of the respondents belonged to 20-29 years old (57.5%), married (55%), professed Catholic faith (77.5%), earns 10 000 pesos and below (67.50%), finished secondary education (67.50%), and unemployed (65%).

There was a low compliance in both treatment and control group prior to whereas after the provision of Interactive Health Education, the treatment group had a high compliance. The follow up on the treatment group had very high level of compliance to postpartum care. The module was used in the Obstetric Ward to intensify the interactive health education to postpartum as part of nursing care of mothers and their families.

Introduction

The changes in today's health environment mandate the use of an organized approach to health education so that patients can meet their specific health care needs (WHO, 2007). The Philippine Nursing Act of 1991 categorically included the health teaching that the nurse can carry out to meet the health needs of the clients. The Philippine government and health care delivery system recognizes health as a basic human right. Preventive and promotive health services are essential for reducing the need and spending for personal health services (National Health Insurance Act of 1995, Republic Act No. 7875). There are 14 million Filipino women in the reproductive age group (15 -49 years old). Of this, 9 million are married or have partners, 6 million are considered to be at risk if they become pregnant because they are either too young (less than 20 years old), too old (more than 35 years old). According to Department of Health (2007), with an average fertility rate of 3.7 (number of children per woman), an estimated 2.3 million women are expected to get pregnant every year. Two million of those who become pregnant will deliver (http://www.health.gov/healthypeople). Given these pieces of information, the researcher has conducted the study that determined the effects of interactive health education on compliance of mothers to post partum care. It is anchored on the strong belief that health education is viewed as a basic function of the nurse and therefore must be practiced effectively in different clinical settings.

Methodology

This study utilized the quasi experimental design specifically the non – equivalent control group design or the pre test and post test design. Forty (40) postpartum mothers were the total population of this study. Only primiparas' aged 15 – to 40 years old and above was purposively selected as respondents of this study. The inclusion criteria were as follows: 1. the mother has agreed to participate in the study. 2. the mother is confined at OB ward of the hospital. 3. the mother is an uncomplicated postpartum primipara.. 4. the baby is roomed in for breastfeeding. 5. the mother had not received any formal health teaching on postpartum care except the one given at the OPD of the hospital during their prenatal check-up. 6. the mother should have the support of the husband.

In this study, the independent variable –interactive health education was applied and its effects were observed on the dependent variables – compliance of mothers to postpartum care (Figure 1).

A control group and treatment group differed in terms of their compliance to postpartum care. A total of 20 clients were included in the treatment group, the compliance was assessed before, after, and during follow up after implementing interactive health education. Otherwise, 20 clients in the control group, the compliance was further assessed in the same way as the treatment group. The only difference was, in the control group they were not exposed to interactive health education intervention. This study entailed the implementation of researcher's personalized, one to one strategy developed to enriched interactions consisting of breastfeeding, personal hygiene and newborn care. The treatment group was exposed to the lecture/ discussion/interaction for 35 minutes. A nine items tool was utilized to assess the level of compliance of mothers to postpartum care. The scale ranges from 5 (always) to 1 (never).

Results and discussion

The respondents and their ages

Figure 2 shows the profile of respondents according to age. Out of the 20 respondents in the control group, nine (45%) belonged to 15-19 years old age category, 11 (55%) belonged to 20-29 years old age bracket, no 30-39 years old as well as 40 years old and above. In the treatment group, six (30%) 15-19 years old age category, 12 (60%) 20-29 years old age bracket, two (10 %) 30-39 years old and no 40 years old and above. From the 40 total number of respondents, 15 (37.5%) belonged to 15-19 years old age group, 23 (57.5%) 20-29 years old age group, and two (5.0%) 30-39 years old group. These findings mean that most of the postpartum mothers belonged to 20-29 years old age group.

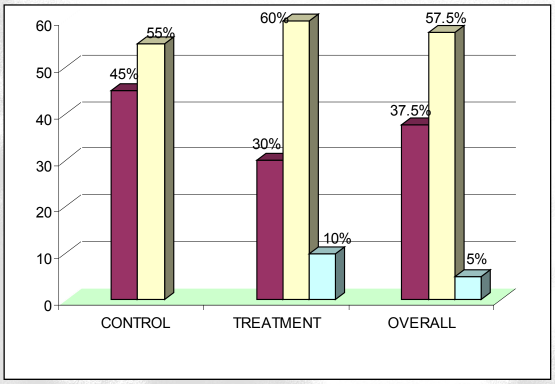

Figure 2. **Profile of respondents according to age**

Civil status

Figure 3 illustrates the profile of the respondents according to civil status. Out of 20 respondents in the control group, five (25%) are single, and 15 (75%) are married. In the treatment group 13 (65 %) are single and 7 (35%) are married. From the 40 total number of respondents, 18 (45%) are single and 22 (55%) are married. The finding of the study means that more of the postpartum mothers are married.

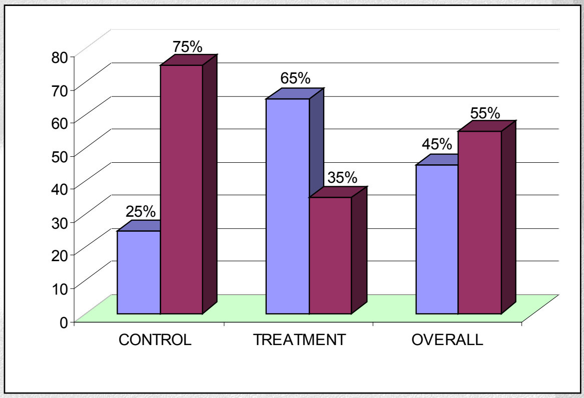

Figure 3. **Profile of respondents according to civil status**

Religious affiliation

Figure 4 shows the profile of respondents according to religious affiliation. Out of the 20 respondents in the control group, 13(65 %) professed Catholic faith and seven (35%) are a non Catholic. In the treatment group 18 (90%) professed Catholic faith while two (10%) are non Catholic. Among the 40 total number of respondents, 31(77.5%) professed the Catholic faith and nine (22.5%) are non Catholic. These findings showed the preponderance of the respondents who professed Catholic faith.

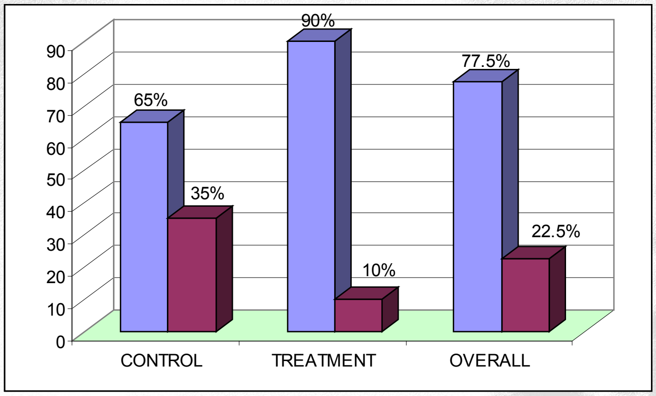

Figure 4. **Profile of respondents according to religious affiliation**

Monthly family income

Figure 5 shows the profile of respondents according to monthly family income. Out of 20 respondents in the control group, four (20%) earn 20, 001- 30, 000 pesos , six (30%) earn 10,001- 20,000 pesos and 10 (50%) earn 10, 000 pesos and below. Furthermore, in the treatment group, three (15%) earn 10, 001- 20, 000 pesos and 17 (85%) earn 10, 000 pesos and below. From the 40 total respondents, four (10%) earn 20, 001- 30, 000 pesos, nine (22.50%) earn 10,001- 20,000 pesos and 27 (67.50%) earn 10, 000 pesos and below. This finding means that most of the postpartum mothers had monthly family income of 10, 000 pesos and below.

Educational attainment.

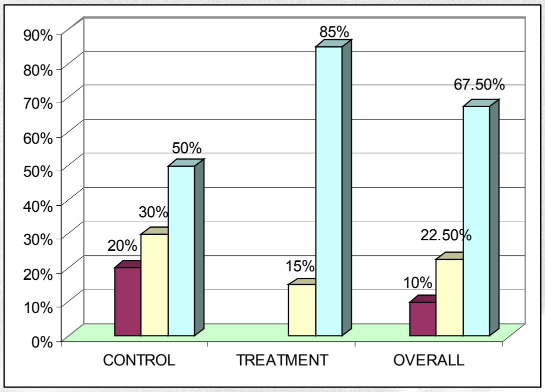

Figure 5. **Profile of respondents according to monthly family income.**

Figure 6 indicates the profile of respondents according to educational attainment. Out of 20 respondents in the control group, one (5%) completed elementary education, 15 (75%) finished secondary education, two (10%) attained vocational course and two (10%) hold college degree. Furthermore, in the treatment group, two (10%) attained elementary education, 12 (60%) consummated secondary education, one (5%) attained vocational course, and five (25 %) hold college degree. From the 40 total number of respondents, three (7.50%) completed elementary education, 27 (67.50%) finished secondary education, three (7.50%) attained vocational course and seven (17.50%) hold college degree. This finding means that most of the postpartum mothers obtained secondary education.

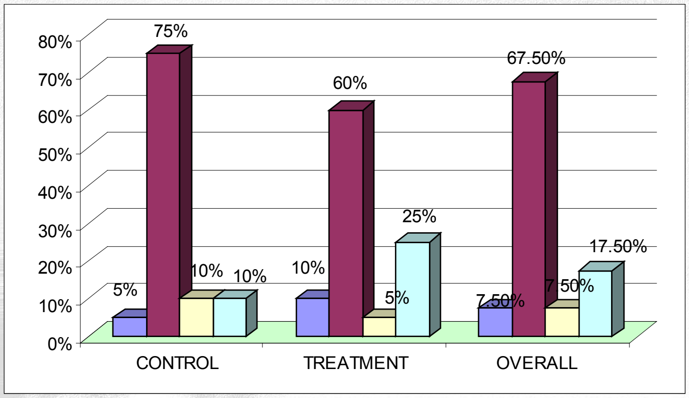

Figure 6. **Profile of respondents according to educational attainment**

Employment status

Figure 7 shows the profile of respondents in terms of employment status. Out of 20 respondents in the control group, nine (45%) are employed and 11(55%) are unemployed. Nevertheless, out of 20 respondents in the treatment group, five (25%) are employed and 15 (75%) are unemployed. From the 40 total number of respondents, 14 (35%) are employed and 26 (65%) are unemployed. This finding means that most of the postpartum mothers are unemployed.

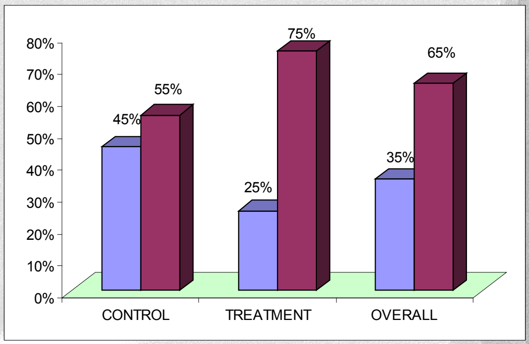

Figure 7 **Profile of respondents in terms of employment status**

Level of compliance of mother to postpartum care before and after Interactive Health Education between those who are exposed and not exposed to the intervention

Table 1 presents the level of compliance to postpartum care of the control group before the Interactive Health Education. The means ranging from 1.95 to 2.50 mean that the mothers in control group had lower compliance to postpartum care in terms of breastfeeding per demand, cord dressing with the use of 70% isopropyl alcohol, daily bathing of babies, singing and touching the baby during breastfeeding, burping the baby after breastfeeding, daily bathing of mother, cleaning the breast prior to breastfeeding, and babies exposure to sunlight before the Interactive Health Education.

Table 1. **Level of Compliance to Postpartum Care of the Control Group Before the Interactive Health Education**

	Postpartum Care	Mean	Standard Deviation	Interpretation
1	Breastfeeding per demand	2.15	1.53	Low
2	Cord Dressing with the use of 70% alcohol	2.50	1.57	Low
3	Daily bathing of babies	1.95	1.23	Low
4	Singing and touching the baby during breastfeeding	2.50	1.50	Low
5	Burping the baby after breastfeeding	2.25	1.41	Low
6	Daily bathing of Mother	2.15	.933	Low
7	Cleaning the breast prior to breastfeeding	2.15	1.26	Low
8	Using of pacifier	3.00	1.55	Moderate
9	Baby's exposure to sunlight	2.20	1.47	Low
	Overall Mean	2.32	0.94 (Low	Compliance)

Lowest Score	1.95
Highest Score	3.00
Standard Deviation	0.94
Coefficient of Variation	7.89%

The computed mean score of 3.00 means that the respondents in the control group had moderate compliance in terms of using pacifier. The overall mean of 2.32 with a standard deviation of 0.94 mean that the mothers in the control group had low compliance to postpartum care before the Interactive Health Education. The lowest score was 1.95 and the highest score was 3.00. The standard deviation of 0.94 with coefficient variation of 7.90 percent showed that the respondents in the control group are homogenous in terms of compliance to postpartum care. These findings mean that the respondents in the control group had a low compliance with postpartum care before the implementation of interactive health education and they are homogenous in this feeling.

Level of Compliance to Postpartum Care of the Control Group During Follow up After Interactive Health Education

Table 2 presents the level of compliance to postpartum care of the control group during follow up after Interactive Health Education. The means ranging from 4.20 to 4.50 mean that the mothers in control group had very high compliance to postpartum care in terms of breastfeeding per demand, cord dressing with the use of 70% isopropyl alcohol, burping the baby after breastfeeding, cleaning the breast prior to breastfeeding, and babies exposure to sunlight.

Table 2. **Level of Compliance to Postpartum Care of the Control Group During Follow up After Interactive Health Education**

	Postpartum Care	Mean	Standard Deviation	Interpretation
1	Breastfeeding per demand	4.50	.889	Very high
2	Cord Dressing with the use of 70% alcohol	4.20	1.10	Very high
3	Daily bathing of babies	3.30	1.30	Moderate
4	Singing and touching the baby during breastfeeding	4.00	1.21	High
5	Burping the baby after breastfeeding	4.45	.887	Very high
6	Daily bathing of Mother	3.30	1.41	Moderate
7	Cleaning the breast prior to breastfeeding	4.35	.988	Very high
8	Using of pacifier	2.05	1.39	Low
9	Baby's exposure to sunlight	4.25	1.25	Very high
	Overall Mean	3.82	0.70	(High Compliance)

Lowest Score	2.05
Highest Score	4.50
Standard Deviation	0.70
Coefficient of Variation	4.39%

The computed mean score of 4.00 mean that the respondents in the control group had high compliance in terms of singing and touching the baby during breastfeeding, and the computed mean score of 3.30 mean that the control group of postpartum mothers had moderate compliance to daily bathing of babies, and daily bathing of mothers. The mean score of 2.05 in the control group had low compliance in using pacifier during follow up after Interactive Health Education. The overall mean of 3.82 with a standard deviation of 0.70 mean that the mothers in the control group had high compliance to postpartum care during follow up after Interactive Health Education. The lowest score was 2.05 and the highest score was 4.50. The standard deviation of 0.69 with coefficient variation of 4.39 percent showed that the respondents in the control group are homogenous in terms of compliance to postpartum care during follow up after Interactive Health Education. These findings mean that the respondents in the control group had high compliance with postpartum care during follow up after Interactive Health Education and they are homogenous in this feeling.

Level of Compliance of the Treatment Group Before the Interactive Health Education

Table 3 presents the level of compliance to postpartum care of the treatment group before the Interactive Health Education. The means ranging from 2.30 to 2.95 mean that the mothers in treatment group had moderate compliance to postpartum care in terms of breastfeeding per demand, singing and touching the baby during breastfeeding, cleaning the breast prior to breastfeeding, using pacifier and babies exposure to sunlight. The computed mean score of 2.05 to 2.35 mean that the respondents in the treatment group had low compliance in terms of cord dressing with the use of 70% isopropyl alcohol, burping the baby after breastfeeding, and daily bathing of mothers. The computed mean score of 1.70 mean that the treatment group of postpartum mothers had poor compliance to daily bathing of babies before the Interactive Health Education.

Table 3. **Level of Compliance of the Treatment Group Before the Interactive Health Education**

	Postpartum Care	Mean	Standard Deviation	Interpretation
1	Breastfeeding per demand	2.85	1.53	Moderate
2	Cord Dressing with the use of 70% alcohol	2.05	1.43	Low
3	Daily bathing of babies	1.70	.978	Poor
4	Singing and touching the baby during breastfeeding	2.60	1.31	Moderate
5	Burping the baby after breastfeeding	2.25	1.37	Low
6	Daily bathing of Mother	2.35	1.49	Low
7	Cleaning the breast prior to breastfeeding	2.30.	1.59	Moderate
8	Using of pacifier	2.95	1.57	Moderate
9	Baby's exposure to sunlight	2.95	1.60	Moderate
	Overall Mean	2.18	0.84	(Low Compliance)

Lowest Score	1.70
Highest Score	2.95
Standard Deviation	0.84
Coefficient of Variation	6.43%

The overall mean of 2.18 with a standard deviation of 0.84 mean that the mothers in the treatment group had low compliance to postpartum care before the Interactive Health Education. The lowest score was 1.70 and the highest score was 2.95. The standard deviation of 0.84 with coefficient variation of 6.43 percent showed that the respondents in the treatment group are homogenous in terms of compliance to postpartum care before the Interactive Health Education. These findings mean that the respondents in the treatment group had low compliance with postpartum care before the Interactive Health Education and they are homogenous in this feeling.

Level of Compliance to Postpartum Care of the Treatment Group After the Interactive Health Education

Table 4 presents the level of compliance to postpartum care of the treatment group after the Interactive Health Education. The means ranging from 4.25 to 4.40 mean that the mothers in treatment group had very high compliance to postpartum care in terms of breastfeeding per demand, cord dressing with the use of 70% isopropyl alcohol, singing and touching the baby during breastfeeding, cleaning the breast prior to breastfeeding, and babies exposure to sunlight. The computed mean score of 3.65 to 4.10 mean that the respondents in the treatment group had high compliance in terms of daily bathing of babies, burping the baby after breastfeeding, and daily bathing of mothers. The mean score of 2.30 in the treatment group had low compliance in using pacifier after Interactive Health Education. The overall mean of 3.95 with a standard deviation of 0.54 mean that the mothers in the treatment group had high compliance to postpartum care after Interactive Health Education. The lowest score was 2.30 and the highest score was 4.40. The standard deviation of 0.54 with coefficient variation of 2.63 percent showed that the respondents in the treatment group are homogenous in terms of compliance to postpartum care after Interactive Health Education.

Table 4. **Level of Compliance to Postpartum Care of the Treatment Group After Interactive Health Education**

	Postpartum Care	Mean	Standard Deviation	Interpretation
1	Breastfeeding per demand	4.35	.812	Very high
2	Cord Dressing with the use of 70% alcohol	4.35	.812	Very high
3	Daily bathing of babies	3.65	1.26	High
4	Singing and touching the baby during breastfeeding	4.40	1.09	Very high
5	Burping the baby after breastfeeding	4.10	1.11	High
6	Daily bathing of Mother	3.85	1.13	High
7	Cleaning the breast prior to breastfeeding	4.35	1.08	Very high
8	Using of pacifier	2.30	1.17	Low
9	Baby's exposure to sunlight	4.25	.966	Very high
	Overall Mean	3.95	0.54	(High Compliance)

Lowest Score	2.30
Highest Score	4.40
Standard Deviation	0.54
Coefficient of Variation	2.63%

Level of Compliance to Postpartum Care of the Treatment Group Follow up After Interactive Health Education

Table 5 presents the level of compliance to postpartum care of the treatment group follow up after Interactive Health Education. The means ranging from 4. 25 to 5.00 mean that the mothers in treatment group had very high compliance to postpartum care follow up after the Interactive Health Education in terms of breastfeeding per demand, cord dressing with the use of 70% isopropyl alcohol, daily bathing of babies, singing and touching the baby during breastfeeding, burping the baby after breastfeeding, cleaning the breast prior to breastfeeding, and babies exposure to sunlight.

Table 5. **Level of Compliance of the Treatment Group Follow up After the Interactive Health Education**

	Postpartum Care	Mean	Standard Deviation	Interpretation
1	Breastfeeding per demand	4.40	1.09	Very high
2	Cord Dressing with the use of 70% alcohol	5.00	.000	Very high
3	Daily bathing of babies	4.25	1.01	Very high
4	Singing and touching the baby during breastfeeding	4.20	1.23	Very high
5	Burping the baby after breastfeeding	4.80	.410	Very high
6	Daily bathing of Mother	4.00	1.37	High
7	Cleaning the breast prior to breastfeeding	4.60	.940	Very high
8	Using of pacifier	2.10	1.55	Low
9	Baby's exposure to sunlight	4.65	.587	Very high
	Overall Mean	4.22		(Very High Compliance)

Lowest Score	2.10
Highest Score	5.00
Standard Deviation	0.91
Coefficient of Variation	21.6%

The computed mean score of 4.00 means that the respondents in the treatment group had high compliance in terms of daily bathing of mother. The computed mean of 2.10 means that postpartum mothers in the treatment group had low compliance in using pacifier. The overall mean of 4.22 with a standard deviation of 0.91 mean that the mothers in the treatment group had very high compliance to postpartum care follow up after Interactive Health Education. The lowest score was 2.10 and the highest score was 5.00. The standard deviation of 0.91 with coefficient variation of 21.6 percent showed that the respondents in the treatment group are homogenous in terms of compliance to postpartum care follow up after Interactive Health Education. These findings mean that the respondents in the treatment group follow up after the implementation of interactive health education had a very high compliance to postpartum care and they are homogenous in this feeling.

Significant differences in the level of compliance of mothers to postpartum care between those who are exposed and not exposed to Interactive Health Education.

The comparison of the level of compliance of mothers to postpartum care before the interactive health education is shown in Table 6. The respondents in the control group obtained a mean score of 2.3166 with a standard deviation of 0.9367, whereas, the respondents who belonged in the treatment group had a mean score of 2.1888 with a standard deviation of 0.8454..

Table 6. **Comparison of the Level of Compliance of Mothers to Postpartum Care Before Interactive Health Education.**

Group	N	Mean	Sd	t-ratio	p-value	Interpretation
Control	20	2.3166	0.9367	-0.441	0.664	NS
Treatment	20	2.1888	0.8454	-0.441		

LEGEND: *NS –Not Significantly different at 0.05 level using 19 degrees of freedom*
N - Number of Respondents
Sd – Standard Deviation

The statistical results reveal that the t-ratio of -0.441 with probability (significance) value of 0.664 indicates that there is no significant difference at 0.05 level of significance using 19 degrees of freedom. Therefore, the null hypothesis that there is no significant difference in the level of compliance of mothers to postpartum care before the interactive health education is accepted. This finding confirms that prior to the provision of interactive health education, respondents from the control and treatment groups have the same level of compliance to postpartum care

Comparison of the Level of Compliance of Mothers to Postpartum Care During Follow up After Interactive Health Education.

Table 7 shows the comparison of the level of compliance of mothers to postpartum care during follow up after the interactive health education. The respondents in the control group had a mean score of 3.8222 with a standard deviation of 0.6984, while respondents who belonged to the treatment group had a mean score of 4.2222 and a standard deviation of 0.9135. The computed t-ratio of - 2.596 with a probability (significance) value of 0.018 denotes that there is significant difference at 0.05 level of significance using 19 degrees of freedom. Therefore, the null hypothesis is rejected. These findings indicate that the respondents in the control and treatment group have different levels of compliance after the provision of interactive health education.

Table 7. **Comparison of the Level of Compliance of Mothers to Postpartum Care During Follow up After Interactive Health Education.**

Group	N	Mean	Sd	t-ratio	p-value	Interpretation
Control	20	3.8222	0.6984	- 2.596	0.018	S
Treatment	20	4.2222	0.9135			

LEGEND: *NS –Not Significantly different at 0.05 level using 19 degrees of freedom*
N - Number of Respondents
Sd – Standard Deviation

Comparison of the level of compliance of mothers to postpartum care before, after and follow up after interactive health education

Table 8 presents the pair wise comparison to further elaborate and show the significant difference of the level of compliance of mothers to postpartum care. The treatment group has a mean percentage of 2.1888 with a standard deviation of 0.8454 during the pre-test which is described as low compliance, and mean percentage of 3.4833 and with a standard deviation of 0.5412 during the post test which described as high compliance to postpartum care. The treatment group follow up test had a mean percentage of 4.2222 with a standard deviation of 0.9135 during the follow up which indicate that postpartum mothers had a very high compliance to postpartum care. The statistical results reveal that the obtained mean difference of 2.033 and paired t-test of -8.604 with a probability (significance) value of 0.000 is significantly different at 0.05 level of significance using 38 degrees of freedom.

The hypothesis that there is no significant differences on the level of compliance of mothers to postpartum care among those who are exposed to Interactive Health Education is rejected. These findings indicate that the Interactive Health Education is important on the level of compliance of mothers to postpartum care Likewise, among the control group the obtained mean percentage of 2.3166 with a standard deviation of 0.9367 described mothers had a low compliance to postpartum care during the pretest and a mean percentage of 3.8222 with a standard deviation of 0.6984, described mothers had a high compliance to postpartum care during the follow up test. The statistical result reveals that the mean difference of - 1.5056 and a paired t-ratio of - 8.340 with probability (significance) of 0.000 is significantly different at 0.05 level using 38 degrees of freedom. Thus, the null hypothesis that there is no significant differences on the level of compliance of mothers to postpartum care among those who are not exposed to Interactive Health Education is rejected. This finding means that there is an increased level of compliance of mothers to postpartum care before and follow up after even if the postpartum mothers were not exposed to Interactive Health Education.

Table 8. **Comparison of the Level of Compliance of Mothers to Postpartum Care Before, After and Follow up after Interactive Health Education**

Group	N	Pre-test		Follow-up		Mean Diff.	Paired t-test	p-value	Interpretation
		Mean	Sd	Mean	Sd				
Control	20	2.3166	0.9367	3.8222	0.6984	1.505	- 8.340	0.000	S
Treatment	20	2.1888	0.8454	4.2222	0.9135	2.0334	-8.604	0.000	S

LEGEND: *S – Significantly different at 0.05 level using 38 degrees of freedom*
N - Number of Respondents
Sd – Standard Deviation

Conclusion

The majority of the respondents were ages 20-29 years old, married, professed Catholic faith, finished secondary education, unemployed, and earns below 10, 000 pesos. There was a low compliance of mothers to postpartum care in the both treatment and control group prior to Interactive Health Education, whereas after the provision of the Interactive Health Education, the treatment group had a high compliance compared to control group. The follow up on control group had a high level of compliance while the treatment group had very high level of compliance to postpartum care. The Interactive Health Education which consists of lecture, discussion, demonstration and module regarding breastfeeding, personal hygiene, and newborn care was effective strategy to improve the level of compliance of mothers to postpartum care.

Recommendations

To the Clients- Interactive Health Education should be made as an opportunity to interact with clients and create a motivational climate for learning. To the Nurse Practitioners- Interactive Health Education module should be implemented to the Obstetric Ward Nurses and to other nurses assign in different areas to intensify the use of Interactive Health Education to postpartum as part of routine nursing care of mothers and their families. Nurses can use this to assist new mothers through anticipatory guidance of what to expect when going home with a new baby.

Nursing and Hospital Administration- Interactive Health Education should be continuously implemented as part of continuing education to all nurses in different areas in their hospital. The module regarding Postpartum Care should be made available and accessible to all nurses especially to those who are newly hired. It is also recommended that this module should be given to the relatives and family members of postpartum mothers. Nurse educators should provide information emphasizing the Interactive Health Education as an alternative modality that helps improve the level of compliance of mothers to postpartum care. Conduct a seminar workshop on the use of interactive health education and other avenues to increase interaction with postpartum mothers to help the students develop an intense commitment and develop a positive impact on the health of the nation and global society. For Future researchers- A further study is recommended in pursuit of the effects of interactive health education on handling postpartum mothers with longer time allocated for the provision of intervention with greater number of respondents.

REFERENCES

Bennet, T. Maternal and Child Health Journal 1 (1998): Women's Health in Maternal and Child Health:Time for a New Tradition.pp. 253-265.

Calderon, J. and Gonzales, E. (2006) Methods of Research And Thesis Writing Manila, National Bookstore Publishing

Daniel, M., and Green, L. W. (1999). Community-Based Prevention and Chronic Disease Self-Management Programmes: Problems, Praises and Pitfalls. Disease Management and Health Outcomes : pp.185–192.

Department of Health (2007). retrieved on April 14,2008 from http://www.health.gov/healthypeople

George, J. (2002) Nursing Theories, New Jersey. Pearson Education, Inc.

Gupta, L.C. (2004) Pocket Nurse's Dictionary 92nd edition. India. AITBS Publishers and Distribution.

Green, L. W., and Kreuter, M. W. (1999). Health Promotion Planning: An Educational and Ecological Approach, 3rd edition.. Mountain View, CA: Mayfield

Hallett, A. (2004). Nursing Standard. Volume 19(1) (2004) Narratives of Therapeutic Touch pp 33-37

National Health Insurance Act of 1995, Republic Act No. 7875, retrieved on April 14,2008 from http://www.health.gov/healthypeople

Pillitteri, A. (1999). Maternal and Child Health Nursing: Care of the Childbearing and Childrearing Family. Philadelphia: Lippincott,.

Smeltzer, Jan, and James McKenzie (2000). Planning, Implementing, and Evaluating Health Promotion Programs. 3rd edition. Allyn and Bacon.

Smeltzer, S and Bare,B (2004) Brunner & Suddarth's: Textbook of Medical-Surgical

Nursing 10th edition, Lippincott Williams and Wilkins, New York

Spencer, P.(1998). Parenting Guide to Pregnancy and Childbirth. New York: Ballantine Books.

Tangog, A.G.(2007) Effects of Meditation-Relaxation With Audio-Visual Stimulation On the Level of Anxiety Of Significant Others Of Patients In The Intensive Care Unit. Unpublished Master's Thesis. De La Salle-Health Sciences Campus

Tiburan N. (1999). Effects of Health Education To Compliance of Mothers to Postpartum Care. University of the Philippines,College of Nursing

Thorton, L. (2005). The Model of Whole-Person Caring: Creating and Sustaining a Healing Environment. Volume 19(3):106-115, May/June 2005

Tones, K., and Tilford, S. (1994). Health Education: Effectiveness, Efficiency, and Equity, 2nd edition. London: Chapman and Hall.

Wardell, D. & Weymouth, K. (2004). Journal of Nursing Scholarship. Volume 36(2) Review of Studies of Healing Touch. pp 147-154.

Wheeler, L. (1997). Nurse-Midwifery Handbook: A Practical Guide to Prenatal and Postpartum Care. Philadelphia: Lippincott-Raven Publishing Inc.

Healthy People, 12/2000. In the U.S. Department of Health and Human Services, Office of Disease Prevention and Health Promotion [web site].

Who says we are not human? The art and science of forgiveness in educational leadership

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ABSTRACT

The dearth of literature on forgiveness in educational leadership cannot be overlooked. As an element of care-driven leadership, forgiveness is a fertile source of theory building efforts and activities in educational administration, management and leadership. This study is a preliminary attempt to fill this research gap. Guided by the central question, *"How do Filipino academic administrators collectively describe their forgiving acts to win back their 'lost' subordinates in their leadership practice by regaining the spirit of continuing their given responsibilities in the organization?"* the researchers have employed a phenomenological design using open-ended and semi-structured interviews (Patton, 1990) to 13 academic administrators, following an aide memoir. After the doubly tape-recorded (digital and analogue) interviews were transcribed, extended texts were analyzed via *dendogram*. **Data were grouped under similar themes expressed by the subjects. Inductive and deductive methods (Hardy et al., 2001) were made to ensure the placement of raw data under appropriate themes. Interestingly the emerged anthropological (caring as** *mindfulness*), **sociological (caring as** *situatedness*), **psychological (caring as** *tactfulness*) **and philosophical (caring as** *transcendental-ness*) **dimensions clearly define forgiveness as an intersection of art and science. The study implies that practicing forgiveness does not mean condoning faculty's unbecoming behaviors but rather it provides opportunity for improvements in a humane and positive manner.**

Keywords: **forgiveness, mindfulness, situatedness, tactfulness, transcendental-ness, Filipino academic administrators.**

Introduction

Understanding the nature of human beings continues to be the central feature in the practice of forgiveness (McCullough, 2008). The nature of the human being speaks of one's strengths and weaknesses, success and failures, which to some extent creates possibilities to effect conflict of some kind. Conflicts usually develop due to individual disagreements for various reasons, such as personality differences, role expectations, ideological differences and dysfunctional communications (Komives et al., 1998; Trenholm, 1999). Conflict arises from the event when one party perceives that the other behaves in unjustly (Wertheim et al., 2006). Gudykunst (1994) and Trenholm (1999) averred that there are many ways of solving conflicts but techniques for restoring such relationship to functionality are few. Restoration of broken human relationship is done through forgiveness. Thompson, Snyder, Hoffman, Michael, Rassmusen, Billings, and Heinze (2005) define forgiveness as the process of releasing negative emotions, thoughts and behaviors toward a transgressor and transforming these to more positive emotions, thoughts and behaviors. Practicing forgiveness enables academic administrators to effect positive changes cognitively (Al-Mabuk et al., 1998) such as possibility of not condemning judgment and planning as revenge to an offender (faculty); affectively (Ferch, 1998) which turns anger, hatred, resentment and sadness into neutral emotions; and in psychomotor (Pingleton, 1997) that is avoiding revenge and willing to build a peaceful and loving organizational community (Kearns and Fincham, 2004). Forgiving leaders lead the followers with the intention to more than just fix what is wrong i.e. to build up what is right (Seligman, 2000). Cameron and Caza (2002:39) assert, "Organizational forgiveness then is the capability of fostering collective abandonment of justified resentment, bitterness and blame, and instead, the adoption of positive, forward-looking approaches in response to the harm or damage." In short, forgiveness is the 'conscious choice to replace the negative with the positive. It is inherently social since it occurs in relationship with other (living) individuals, not to inanimate objects (Enright and Coyle, 1998).

The purpose of forgiveness is to accommodate erring individuals back to unity with other members of the organization, thus fostering peaceful and supportive working environment. Through forgiveness, administrators are enhanced to perform their leadership tasks on the bases of mutual understanding, trust and respect. Hill (2001) avers that forgiveness is an integral element for healthy human development. Positively perceived, forgiveness fosters accountability (Coleman, 1998; Enright et al., 1998), reduces negative responses to offense (Gassin and Enright, 1995). In reducing negative motivations (Paleari et al., 2005; Bono et al., 2008), forgiveness strengthens administrators' efforts of avoiding and seeking revenge against the offender (Kearns and Fincham, 2004). However, the forgiver needs extra effort in making the offender feel accepted and forgiven. The forgiver needs to transcend his motive of strengthening the bond of relationship with others.

Forgiveness has not been empirically investigated (Cameron and Caza, 2002), hence, study on forgiveness is considered new in today's research endeavors (McCullough et al., 2000; McCullough et al., 1998). There is growing concern that researchers consider forgiveness as a significant contribution to scientific inquiry (Younger et al., 2004). Admittedly, current studies on forgiveness are limited to the personal or family level and other small therapy groups. However the studies recommended that forgiveness relates to collective outcome, particularly the caring relationships among members of the organization (McCullough et al., 2000, cited in Cameron and Caza, 2002). Administrators' ability to forgive enables them to successfully maintain good working and organizational relationships (Hodgson and Wertheim, 2007).

In the Philippines, forgiveness is viewed in the context of relationality (de Mesa, 2006). It is about the acceptance of an individual toward erring others (kapwa), on the basis of considering others as equally significant. Kapwa means 'each and everyone is like me' or 'who I am as an individual intrinsically relates to who you are as a person' (de Guia, 2005). Bearing this in mind, committing mistakes is considered as one of the natural phenomena of human existence. Reflecting deeper on the meaning of forgiveness in the context of Filipino culture, de Mesa (2006) views forgiveness from theological perspectives. He explains that as a Christian, an individual cannot end up by living up his mistakes. Mistakes should be resolved through the process of being anchored to God's enduring love and forgiveness. Enlightened by the theology of 'sin', God's forgiveness is a reflection of grace being victorious over sin. This belief overpowers the role of the Filipino loob, or personhood and the most authentic inner self of the Filipino

- which has illumined the life of the Filipino people in sincerely forgiving other people. Moreover, it is believed that forgiveness reflectively occurs in response to the Lord's Prayer of "Forgive us our trespasses as we forgive those who trespass against us" (Patawarin mo kami sa aming kasalanan, tulad ng pagpapatawad naming sa mga nakakasala sa amin). In other words, 'forgiveness is the triumph of love in the situation of sinfulness' (de Mesa, 2006:164). It is in forgiving that two parties reconcile and freely choose to forgive and be forgiven in order to experience a cleansing spirit of embittered rigidity becoming transformative openness. An effective leader is able to establish relational trust to forgive among individuals and the process becomes embedded in their life within an organization (Ferch and Mitchell, 2001; Valle and Halling, 1989). Further, Ferch and Mitchell (2001) call this intentional forgiveness, which means a technique that gives specific guidelines of interpersonal reconciliation. By granting forgiveness to a faculty, an academic administrator is actually creating an environment of thriving, allowing individuals to grow, while learning and contributing in a safe place where they feel they belong. Caring leaders consider the mistakes, failures, flaws and breakdowns of life as opportunities of awakening greater wisdom, compassion and capability in their workers and themselves (Stone, 2002). Guided by the following central question, "How do Filipino academic administrators collectively describe their forgiving acts in order to win back their 'lost' subordinates in their leadership practice by regaining the spirit of continuing their given responsibilities in the organization?" the researchers describe the phenomenological experiences i.e. the collective essence of lived experiences of a select group of Filipino academic administrators in their respective colleges and universities relative to forgiveness. Such an attempt is considered in this study as an academic administrators' transcendental move for purposes of addressing faculty human weaknesses and helping individuals become united after each conflict.

Method

A total of 13 (Creswell, 1998) experienced academic administrators (Goulding, 2005; Kruger, 1988) from selected colleges in the Philippines, agreed to participate in this phenomenological study. All the subjects were either deans or department heads, who had been serving the institutions for an average number of seven years. Having made initial contacts with administrators, the interviews were conducted to their convenience. Prior to the interviews, written consent was obtained (Street, 1998) and the subjects were assured of their anonymity. The confidentiality of information was preserved accordingly.

Semi-structured and in-depth interviews were conducted to a select group of academic administrators following an aide-mémoire. Though questions were asked similarly, the order of questioning varied depending on the responses of participants. Various issues and aspects of forgiveness were cited by the interviewers in order to probe deeper into the nature and circumstances of how forgiveness takes place. All interviews were conducted face-to-face in an environment comfortable to participants. Interviews were doubly tape-recorded (analog and digital) to ensure the accurate transcription of data. Each interview lasted for an average of 80 minutes.

As the initial step of analysis, field texts were read and re-read in order that the researchers could get the feeling and essence of the story. Essences were identified through text analysis where the following tasks were observed: (1) discovering of themes and sub-themes; (2) winnowing themes to a manageable few; (3) building hierarchies of themes; and (4) linking themes into theoretical models (Ryan and Bernard, 2003). Following the method of clustering (Côte, Salmela, Baria, and Russell, 1993), field texts were analyzed via a dendogram – in which data were grouped into similar themes expressed by the participants. Inductive and deductive methods (Hardy et al., 2001) were used to ensure the appropriate placement of raw data into appropriate themes, hence higher-order themes were apparent to be appropriate. In the final analysis, the dendogram as suggested by Faulkner and Sparkes (1999) was reviewed by the second researcher who was not involved in data gathering. The second researcher, a 'critical friend' (Faulkner and Sparkes, 1999), thoroughly examined the data categories, reviewed all the steps in the initial data analysis after which vertical and horizontal analyses took place (Thelwell et al., 2007).

Findings

This phenomenological study reveals the following conceptual clusters as categorized via dendogram:

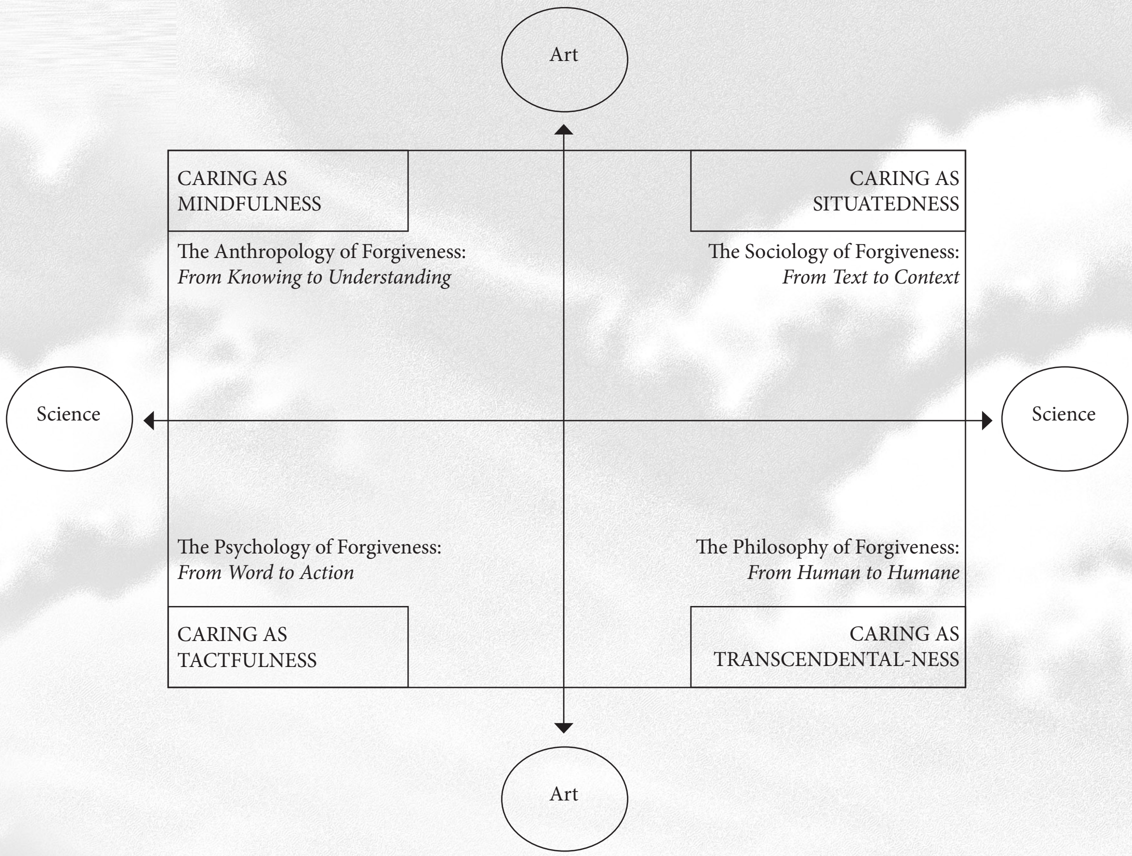

Figure 1: **Forgiveness as Intersection of Art and Science**

The fullness of care-driven leadership practice is not fully achieved without touching the elements of forgiveness in organizational life. Forgiveness makes members of organization feel accepted, close to one another and able to communicate in the spirit of mutual acceptance and supportiveness as they move forward to achieve of organizational goals. The finding of this study indicates significant elements of such forgiveness, which are well identified as anthropology of forgiveness (caring as *mindfulness*), the sociology of forgiveness (caring as *situatedness*), the psychology of forgiveness (caring as *tactfulness*) and the philosophy of forgiveness (caring as *transcendental-ness*). These elements emphasize respectively the administrators' mindful attitudes on predicaments and its implications such as gearing towards understanding the faculty for their human capacity; situating themselves by adopting proactive measures, being fully aware of their emotional state which is guided by rules and principles in promoting fair judgments to individual faculty members; tactful approaches to courageously work for the right solutions through deeper probe of emerging problems; and transcending human tendencies to be humane in addressing faculty weaknesses. These are significant elements lived and practiced by the administrators to facilitate care in welcoming their erring faculty in their respective tasks and responsibilities.

In the anthropology of forgiveness, administrators demonstrate caring as mindfulness, which enhances their effort to know and understand the emerging problems of the faculty. Such mental disposition enables them to demonstrate relevant behaviors in coping with predicaments. Such predicaments are considered inevitable realities experienced throughout their leadership practice such as difficulty in managing people. One administrator admits, *"I understand that it is difficult to manage people but I tried to win them although there are two or three who are hard-headed"*. In the meantime, administrators observe that the value of teaching has declined, and the sense of dedication of some faculty members has diminished. This is confirmed when one administrator admittedly says, *"I find faculty members who are not so committed to their 'vocation' as teachers. Hence, today we have faculty members who only teach for a living not to teach as a mission."* Such declining value of teaching consequently affects their commitment to perform responsibly in their teaching endeavors. In effect, this gives 'headache' to administrators, saying, *"Some faculty members who find much wanting in commitment"*. Nevertheless, predicaments are seen as instruments in understanding the faculty better in their totality. Knowing their faculty, namely their strengths and weaknesses, enhances them to consider their own anger and frustrations as part of human phenomena, hence efforts to tolerate and overcome such human tantrums are very much felt. The following expressions are noted, *"I understand them as human beings; Anger and frustrations are natural phenomena in any organization; I am quite tolerable to them; I learn how to outgrow my tantrums."*

In the context of the sociology of forgiveness, the administrators understand the nature of human being as a social entity. Such understanding has prompted them to situate themselves in the proper context on how to view and understand their faculty errors. Reflectively viewed, the context of faculty errors serves as edifying elements for their forgiving acts, thus accepting their faculty in their totality. Such forgiveness is an element that further enables them to understand the lived texts (experiences) of the faculty in the context of their strengths and weaknesses. In helping the faculty address their problems, administrators, in their capacity, take the initiative to approach the individual erring faculty, thus giving opportunities for the faculty to explain why certain errors occur. With this concern one administrator confidently shares, *"Sometimes I go out to their faculty room, to greet them, or just to encourage them to tell me what they wanted to tell me; I usually approach them individually; If I am angry, I just shut my mouth, reflect and pray."* Besides this sharing, two administrators were fully aware of their unexpressed emotional turbulence in dealing with the erring faculty. They handle such displeasures calmly and meditatively because they simply want to cultivate peaceful working relationships within the institution. The administrators further state the following, *"I never showed them my displeasure, I try to cultivate the habit of always smiling but they know that I am disappointed; Instead of telling them their wrongdoing, I only keep quiet, go to the chapel, meditate, and pray for peace"*. In leading the faculty, continuous efforts are exerted to prevent and overcome faculty errors and such efforts are spelled out through implementing rules and policies. The faculty is thus properly guided in resolving their wrong practices. Three administrators expressed the following statement, *"We have sets of rules on how to manage the faculty"*, and such rules are used as bases in decision making processes, particularly in allowing the erring faculty realize of their violations. By observing due processes, further sanctions may be implemented against the erring faculty who repeatedly commit the same violations. Such a situation is thus illustrated, *"We call their attentions and give them reminders. If we find that they are becoming recidivists then we give sanctions or due punishment in accordance with pertinent provisions of the Civil Service Commission"*. The crafted rules and policies are applicable to every faculty and such rules are made to help administrators in maintaining fair treatment to the faculty. As an administrator clearly stated, *"I have to show care for every faculty member, no favoritism"*.

In the context of the psychology of forgiveness, administrators express their ideas and suggestions in meaningfully and receptively manner. Disregarding that such element in leadership practice can cause strong faculty resistance against given reminders. To express their words of corrections into corrective actions, administrators thus help courageously improve the perceived wrong practices of the faculty and accept faculty in their strengths and weaknesses. Such tactful approach is demonstrated to help the faculty realize their problems by letting them air out their concerns and help them address their problems. To confirm this, two administrators further elaborated the following, saying, *"I usually talk with the erring faculty. I have not formed the habit of not talking with anybody even if I am angry."* With such courageous action, administrators are motivated to probe further, to listen well to the faculty prior to making fair judgment on the matter at hand. Such concern was shared by eight administrators in the following statement, *"If there is a problem, I consult the faculty and help them address that problem informally particularly about their feelings, experiences including their strengths and weaknesses; I ask what their problem was and allow them explain their sides."* Listening to the faculty opens the opportunity for administrators to take the most appropriate suggestions and alternatives for the solution of faculty problems, without discounting their wholeheartedly forgiving attitude. As an administrator clearly explains this, "*As long as they do in conformity with principles which we have all agreed upon, there is no problem; If there are visible mistakes or perceptions and I can talk to them, correct their perceptions, then they are forgiven; I always encourage faculty to be open, to come at any time to tell me what they want about their suggestions, what they feel. I maintain open line communication; I tell them, 'let us learn from our shortcomings, let us rise over mediocrity'; I usually give them advice, directions, recommendations or suggestions to address their wrongdoing; I try to help the faculty in their difficulty such as in regard to computers and other teaching materials."*

Interestingly, in the philosophy of forgiveness, the move of the administrators is not only based on the human aspect of the faculty, but transcends to a higher level of approaching their faculty with a compassionate heart. Transcendental-ness in helping the faculty cope with their problems has paved the way for administrators to further forgive and accept their erring faculty, thus allowing them to start the job anew with a new spirit. Forgiveness occurs on the bases of logical reasons. Administrators patiently explain and enlighten the faculty about such practices just in order to prevent the misunderstanding of their forgiving attitude. Such is clearly made through open communication between administrator and faculty. In regard to such situation, the following were cited, *"Forgiveness depends on the reasons for violation; I can easily forgive, we only have to talk; If there is something that is not in conformity with what I expect of them, we talk".* The administrators' forgiving acts are implicitly expressed by recommending the best solutions to faculty problems. Administrators are not merely 'listening' to the faculty, but helping them ease problems, by giving the best options to solve these problems. Three administrators confirm such efforts as they vehemently express, *"After talking, I recommend solving the problems; My forgiving acts are also expressed by recommending them to take the necessary steps to overcome their problems; I did not say 'I forgive you', but I only talk to the Human Resource and the Dean to come up with the decision of continuing her services."* Such recommendations signify continuous guidance in achieving satisfactory teaching performance. As one administrator expressed, *"If they have any difficulty, they always approach and consult me or they come and ask my advice; They make the needed adjustments. It is already fine with me, as long as they change."*

Discussion

Meditating the forgiving practices of the Filipino school administrators, the significant elements of forgiveness serve as inevitable phenomenon in the organizational life of the school. As reflected in this study, forgiveness is consciously lived as intersection of art and science (Fig. 1) of a select group of Filipino school administrators. By practicing forgiveness, administrators demonstrate understanding of and concern for the faculty in their totality, i.e. their strengths and weaknesses.

The anthropology of forgiveness (caring as *mindfulness*). The anthropology of forgiveness emerges as one of the elements, which is basically shown in the context of administrators' efforts to know and understand their faculty's behaviors. It dwells on administrators' mindfulness about faculty efforts to cope with the challenges in their teaching performance. These elements cannot be simply disregarded since they have consequently ignited faculty strengths and energy in performing the given tasks and responsibilities (Witvliet, 2005).

Bottom, Gibson, Daniels, and Murnighan (2002) aver that anthropological research requires an understanding of forgiveness in the context of more tangible and substantive way rather than simply an explanation of one's mistakes. Though the explanation is necessary but it simply serves as the reduction of disapproval, perceived injustice and desire to punish (Shapiro, 1991). The anthropology of forgiveness depicts a meaningful approach of these administrators to treat the faculty in the context of human nature (Restrepo and Escobar, 2005). Hence, the forgiving act is a call to mindfulness of human imperfections and helps them better understand the faculty in the context of natural human phenomenon (Schwartz, 1983). Forgiveness is practiced in order to bring freedom to erring individual faculty members (Arendt, 1958). Being mindful to help the faculty is indicated by their alertness to help them cope with weaknesses. In the meantime, the administrators' active mindfulness enables them to distinguish one faculty life events from that of the others (Langer and Piper, 1987), without immediately executing unnecessary and immature judgments (Berceli and Napoli, 2006). It is a demonstration of the administrators' lived awareness by developing flexibility and adaptability (Orr, 2002) in responding to faculty (emotional) experiences. Mindful administrators see such experiences as opportunities of promoting acceptance rather than avoidance, decreasing rumination about past and future events (Berceli and Napoli, 2006). Such administrators consider indifferences within the organization as predicaments to their successful leadership performance. Predicaments refer to undesirable situations, character, conduct, skills, or motives of a certain individual, which range from minor embarrassing to major transgressions (Schlenker, 1980). Having identified such predicaments, mindful administrators promptly facilitate remedial efforts in order to repair or at least minimize the damage that has occurred (Schlenker and Darby, 1981). Further reflection indicates that, such predicaments have led the administrators to understand better conflicts and consider these as effects of individual differences (Hall, 1991, cited in Ang and Louis, 2005). The positive attitude of these administrators enables them to be open-minded (Sinkula et al., 1997), primarily in looking into possibilities of successfully and confidently handling predicaments. They further realize that conflicts and turbulence in the organization are aspects of human phenomena in exploring new knowledge or information with critical inquiry (Adler, 2004). Such open-mindedness engenders the value, which measures receptivity to new and possibly different ideas (Cegarra-Navarro and Cepeda-Carrión, 2008) suggested by the faculty.

The sociology of forgiveness (caring as *situatedness*). Meanwhile, the caring experience of these school administrators' signifies the sociological nature of forgiveness within certain extent as well. Forgiveness is practiced in the context of being with other people and is born as administrators' concerns to care for their faculty in a sympathetic and acceptable manner. In this context, administrators situate themselves in how to approach the erring individuals without consequently having hard feelings on the part of the faculty. To situate refers to dasein (Heidegger, 1962), which means to locate the way of being-in-the-world in relation to broader social, political and cultural context (Campbell, 2001). Such *situatedness* forms a basis for preunderstanding (Wojnar and Swanson, 2007) or as Heidegger (1962) calls it a forestructure of understanding. Hence, for practical reasons such *situatedness* is crucial to the integrity (Allix and Gronn, 2005; Ang and Louis, 2005) in understanding human welfare of the faculty. Knowing the faculty different personalities enables administrators to take the initiative of approaching the erring faculty individually, to listen and understand the nature of their problems. Meantime, administrators are aware of their own emotional stability, particularly in dealing with their own displeasures. By and large, emotions play significant roles in their organizational life (Fambrough and Hart, 2008). It helps administrators realize and explore acceptable strategies in handling their displeasures in order to divert them to what is positive such as prayers and reflections. Worthington (1998) and Newberry (2001) admit that forgiveness is emotional in nature hence a leader needs to realize his/her emotions such as anger, hurt and the thoughts that these behaviors bring (Thoresen et al., 1998). Emotional awareness is an important part in one's life and work effectiveness (Bar-On, 2000; Gross, 1998) and such is related to one's effort of evaluating his/her own strengths and weaknesses in order to be accurate in his/her actions and words (Tekleab et al., 2008). With such understanding, administrators become more effective and satisfying in their leadership performance (Cote and Miners, 2006; Jordan and Askanasy, 2006).

Administrators are guided by rules and principles (Hochschild, 1983). They are persistently guided by school rules and policies in handling emergent problems. Lampel (2006) avers that rules are developed in response to embarrassing circumstances or catastrophes in the past and, at the same time purport to prevent the occurrence of such events in the future. In other words, rules are made for purposes of anticipating potential problems in the future. Consistency and persistent efforts in problem solving is very much encouraged. It indicates administrators' care for the faculty. Besides, decisions are made within the knowledge of faculty concerned (Bies, 2001; Tyler and Bies, 1990). In effect, the faculty feels fairly treated because they feel that they enjoy the so called distributive fairness, defined as the perceived fairness of outcomes (Adams, 1965; Leventhal, 1976). Good interpersonal relationship has also contributed to the fair communication process between administrators and the individual faculty concerned (Bies and Moag, 1986, cited in Whisenant and Jordan, 2008). Respect and dignity are constantly manifested in their manner in dealing with their faculty members (Greenberg, 1990; Colquitt, 2001; Colquitt et al., 2001).

The psychology of forgiveness (caring as *tactfulness*). Reflecting deeply on the nature of administrators' forgiving attitudes, there exists the psychological element, too. It is a phenomenon signified by the administrators' tactful manner in approaching the individual erring faculty. To be tactful is vital (Lando and Donnerstein, 1978) as it is indicative of administrator' concerns for the upsetting or offending faculty. As this study indicates, administrators practice tactful manners proactively. They have the courage to face and talk with the erring faculty without prejudging, carefully handle obstacles that hinder them from establishing good communication. Such courage is considered as a dynamic phenomenon precipitated by a perceived threat (Finfgeld, 1998). It is admitted though that the ability to be courageous involves a long time process (Finfgeld, 1999) particularly to push administrators beyond the norm to be productive and make a positive contribution (Finfgeld, in press) in dealing with the erring faculty. Being courageous promotes a healthy and significant quality of organizational life (Bournes, 2002). As experienced by administrators in this study, courage to talk with the faculty enlightens them to know the true reasons for faculty problems. In the effort to know these problems, administrators solicit directly from the faculty the needed information in the problem solving process. They have the courage to probe further to find the truth of the matter, which might be different from what is previously known (Hornstein, 1986, as cited in Jablin, 2006). Tactfully, the administrators are able to encourage the faculty to live the rules and policies as expected. They help the faculty interpret the policies in context. Such appropriating means brings things into proper focus and circumstance.

The philosophy of forgiveness (caring as *transcendental-ness*). Understanding the philosophy of forgiveness gives a clearer grasp and meaningful insights of forgiveness as a complete suspension and alleviation of judgment (Atteberry, 2000). As an action in response to an emotional event, Newberry (2001), for his part, confirms the views of senior philosophers among others are Downie, R.S. (1965), Moore, K.D. (1989), Ewing, A.C. (1970), Hughes, M. (1975) and Murphy, J.G. and Hampton, J. (1988) which viewed forgiveness as an act of overcoming resentment.

This understanding helps administrators transcend their concept of forgiveness from their human tendencies to be humane in dealing with the faculty, albeit extra efforts are needed in the process. Such an element helps the administrator forgive the erring faculty, nevertheless patiently helping faculty members see the wrongdoing they have committed. There is room for administrators to treat the faculty as human persons; help them realize their mistakes they have done with the attitude of forgoing their displeasures (Hieronymi, 2001). Administrative effort of transcending refers to a metaphysics of experience, which means, going beyond and beneath the ordinary common sense and taken-for-granted evidence in one's daily life (Edie, 1964). In such a case, administrators raise the faculty upward to a higher level, going beyond the limit, independent from the range of human phenomena but rather within the range of knowledge. The transcendental-ness of these administrators' efforts is shown through their sincere acts of helping the faculty free from their ignorance, prejudice and superstitions. Mistakes are part of human nature. Nevertheless, such nature has to be aware of and well understood. Administrators appreciate much the language of understanding by allowing disagreements come to a meeting point in concept and reality. Mere explanation is not sufficient, but further efforts are facilitated to help the faculty improve over their weaknesses. Forgiveness is purposely applied to improve and guarantee change of weaknesses. A turning point from the old practice to renewed behavior and attitude is observed, hence human errors are perceived simply as an opportunity to learn and change heart for the better (Hieronymi, 2001). Administrators promote their forgiving attitudes in this way, by enabling the faculty to work longer in the institution. Recommendation for hiring is given with the purpose of helping the faculty improve their working performance. Administrators are exerting their best to help the faculty cope with problems. Seeing improvement in the life and performance of the faculty, forgiveness deserves to be lived in its contexts.

Conclusion

The need for forgiveness in the realm of administrative practice is an imperative. Its power of shaping organizational life, relationship and success cannot be underestimated. Though its practice varies in degree and intensity, depending on one's perspective, orientation and belief, it is interesting to note how a select group of Filipino academic administrators incarnate forgiveness in their leadership practice. As shown by the findings of this study, forgiveness, as an element of care-driven leadership, is interpreted as the interaction of art and science. This intersection clearly describes the anthropological, sociological, psychological and philosophical dimensions of forgiveness. These dimensions are indicative of how caring leaders are challenged to create the nurturing kind of relationship tempered by their forgiving acts. The individual and collective views of Filipino academic administrators in this study demonstrate the need for the forgiving practice for purposes of strengthening the bond and mutual relationship with their faculty. Hence, forgiveness in this study is interpreted as a heart-moving action, a form of human communication which accommodates the erring faculty into the spirit of organizational endeavors in order to successfully achieve organizational vision, mission, goals and objectives.

As an art and a science, forgiveness requires the willpower on the part of the administrators to overcome anger, disappointment, dissatisfaction and hatred. Such effort is concretized through their willingness to renounce their desire to punish for an offense being committed. The spirit of forgoing punishment is a gift, which gives the administrators the opportunity to share their virtuous actions with their faculty. A forgiving heart is expressed through their humility in understanding faculty failure and flaws as an inevitable aspect of human limitations. Care-driven administrators are being challenged continually to recognize and accommodate the faculty when confronted with struggles in a more humane and proactive way.

Practicing forgiveness is not a one-shot administrative duty. It involves leading the faculty with a compassionate heart and seeing perfections in the imperfect. Practicing forgiveness is an opportunity for administrators to let the faculty 'return' to the right track of what is expected of them. It is a form of strong organizational relationship through which mutual help and support becomes integral in maintaining sound human relationship. Working with such a spirit, forgiveness provides better and more peaceful relationship between and among individual faculty members. Having an open heart to forgive others enables administrators to cross the official boundaries of selfishness and reaches out to embrace the faculty. Practicing forgiveness enables the administrators to realize the human element of the faculty. It is the opportunity for the administrators to view penalty or sanctions for unbecoming behaviors of the faculty only as last resort to address the problem. Besides, forgiving does not mean the administrators condone the faculty 'sins' toward educational organization but rather to provide more space for improvements in a humane and positive manner, after an admission of guilt on the part of the faculty.

A new set of educational leadership principles is hereby emerged i.e. to lead with a compassionate and forgiving heart in dealing with the erring faculty members. The educational leaders need to be mindful of the faculty's performances on the given responsibilities. Bearing in mind that at a certain extent the faculty is an individual who serves as alter ego of the school administrator in dealing with students and other stakeholders. Since the faculty members have their human weaknesses and strengths, the administrators are expected to use the language in a tactful and respectful manner. The state of 'being into sin' is not of unique characteristics of the faculty alone; it is the state of being that everyone can fall into. Hence, the school administrators should be able to transcend themselves above their 'animal' instinct that harbors emotions and anger and willing to become persons with emphatic hearts. The absence of forgiveness in the educational leadership creates a gap between the administrators and faculty, which promotes hatred, anger, resentment and sadness among the individuals; hence such negative emotions hamper students' learning achievements.

Although limited empirical studies on forgiveness exist, its practice in educational leadership calls for deeper probing and investigation, which includes the faculty, as recipients of administrators' lived forgiving experiences. The emerged intersection of art and science in the context of forgiveness may be used as sound basis in the development of a metric system. This can ascertain the extent to which forgiveness is practiced and adhered to anthropologically, sociologically, psychologically and philosophically by educational leaders. The richness of forgiveness, as an emerging construct to be understood and explored in educational leadership literature, opens avenues for more empirical investigation. The use of the mixed method approach of research poses a big challenge to educational research enthusiasts of establishing more empirically grounded papers and discourses on forgiveness.

REFERENCES

Adams, J.S. (1965), "Inequity in social exchange", in Berkowitz, L. (Ed.), Advances in Experimental Social Psychology, Vol. 2, pp. 267-299.

Adler, J. (2004), "Reconciling open-mindedness and belief", Theory and Research in Education, Vol. 2, No. 2, pp. 127-142.

Al-Mabuk, R. H., Dedrick, C. V. L., and Vanderah, K. M. (1998), "Attribution retraining in forgiveness therapy", Journal of Family Psychotherapy, Vol. 9 No. 1, pp. 11–30.

Allix, N., and Gronn, P. (2005), "'Leadership' as a manifestation of knowledge", Educational Management

Administration and Leadership, Vol. 33 No. 2, pp.181-196.

Ang, I., and Louis, B. (2005), "Guest editorial: the predicament of difference", Ethnicities, Vol. 5 No. 3, pp. 291-394.
Arendt, H. (1958), The Human Condition, Chicago: University of Chicago Press.

Atteberry, J. (2000), "Reading forgiveness and forgiving reading: Antonin Artraud's 'Correspondance Avec Jacques Riviére'", Modern Language Notes, Vol. 115 No. 4, pp. 714-740.

Bar-On, R. (2000), "Emotional and social intelligence: insights from the emotional quotient inventory", in Bar-On, R. and Parker, J.D.A. (Eds.), The Handbook of Emotional Intelligence, Jossey-Bass, San Francisco, pp. 363-388.

Berceli, D., and Napoli, M. (2006), "A proposal for a mindfulness-based trauma prevention program for social work professional", Complementary Health Practice Review, Vol. 11 No. 3, pp. 153-165.

Bies, R.J. (2001), "Interactional (in)justice: the sacred and the profane", in Breenberg, J. and Cropansano, R. (Eds.), Advances in Organizational Justice, Stanford University Press, Stanford, CA, pp.89-118.

Bies, R. & Moag, J. (1986), "Interactional justice: communication criteria of fairness", in Lewicki, R., Sheppard, B. and Bazerman, M. (Eds.), Research on Negotiations in Organization, Vol. 1 No. 1, pp. 35-55.

Bono, G., McCullough, M.E., and Root, L.M. (2008), "Forgiveness, feeling connected to others, and well-being: Two longitudinal studies", Personality and Social Psychology Bulletin, Vol. 34 No. 2, pp. 182-195.

Bottom, W.P., Gibson, K., Daniels, S.E., and Murnighan, J.K. (2002), "When talk is not cheap: substantive penance and expressions of intent in rebuilding cooperation", Organization Science, Vol. 13 No. 5, pp. 497-513.

Bournes, D.A. (2002), "Having courage: a lived experience of human becoming", Nursing Science Quarterly, Vol. 15 No. 3, pp. 220-229.

Cameron, K. and Caza, A. (2002), "Organizational and leadership virtues and the role of forgiveness", Journal of Leadership and Organizational Studies, Vol. 9 No. 1, pp. 33-48.

Campbell, R. (2001), "Heidegger: truth as aletheia", in Small, R. (Ed.), A Hundred Years of Phenomenology: Perspectives on a Philosophical Tradition, Burlington, VT: Ashgate. pp. 73-89.

Cegarra-Navarro, J.G., and Cepeda-Carrión, G. (2008), "Why open-mindedness needs time to explore and exploit knowledge", Time and Society, Vol. 17 No. 2/3, pp. 195-213.

Coleman, P.W. (1998), "The process of forgiveness in marriage and the family", in Enright, R.D. and North, J. (Eds.), Exploring Forgiveness, University of Wisconsin Press, Madison, pp.75-94.

Colquitt, J.A. (2001), "On the dimensionality of organizational justice: a construct validation of a measure", Journal of Applied Psychology, Vol. 86 No. 3, pp. 386-400.

Colquitt, J. A., Conlon, D.E., Wesson, M.J., Porter, C.O.L.H., & Ng, K.Y. (2001), "Justice at the millennium: a meta-analytic review of 25 years of organizational justice research", Journal of Applied Psychology, Vol. 86 No. 3, pp. 425-445.

Cote, S., and Miners, C.T.H. (2006), "Emotional intelligence, cognitive intelligence and job performance", Administrative Science Quarterly, Vol. 51 No. 1, pp. 1-28.

Côte, J., Salmela, J.H., Baria, A., & Russell, S.J. (1993), "Organizing and interpreting unstructured qualitative data", Sport Psychologist, Vol. 7 No. 2, pp. 127-137.

Creswell, J.W. (1998), Qualitative Inquiry and Research Design: Choosing among Five Traditions, Sage Publications, Thousand Oaks, CA.

de Guia, K. (2005), Kapwa: The Self in the Other, Anvil Publishing, Pasig City.

de Mesa, J.M. (2006). "'Pandaraya' as Sin: A Contextual Interpretation", Hapag, Vol. 3 No. 1, pp. 117-167.

Downie, R.S. (1965), "Forgiveness", The Philosophical Quarterly, Vol. 15 No. 59, pp. 128-134

Edie, J.M. (1964), "Transcendental phenomenology and existentialism", Philosophy and Phenomenological Research, Vol. 25 No. 1, pp. 52-63.

Enright, R.D. and Coyle, C. (1998), "Researching the process model of forgiveness within psychological interventions", in Worthington, E. L. (Ed.), Dimensions of Forgiveness. Templeton Foundation Press, Philadelphia, pp. 139-161.

Enright, R.D., Freedman, S., and Rique, J. (1998), "The psychology of interpersonal forgiveness", in Enright, R. D. and North, J. (Eds.), Exploring Forgiveness. University Wisconsin Press, Madison, pp. 46-62.

Ewing, A.C. (1970), The Morality of Punishment, Montclair, N.J.

Fambrough, M.J., and Hart, R.K. (2008). "Emotions in leadership development: a critique of emotional intelligence", Advances in Developing Human Resources, Vol. 10 No. 5, pp. 740-758.

Faulkner, G. and Sparkes, A. (1999), "Exercise as therapy for schizophrenia", *Journal of Sport & Exercise Psychology*, Vol. 21 No. 1, pp. 52–69.

Ferch, S. R. (1998), "Intentional forgiving as a counseling intervention", *Journal of Counseling and Development*, Vol. 76 No. 3, pp. 261–270.

Ferch, S. R. and Mitchell, M.M. (2001), "Intentional forgiveness in relational leadership: a technique for enhancing effective leadership", The Journal of Leadership Studies, Vol. 7 No. 4, pp. 70-83.

Finfgeld, D.L. (1998), "Courage in middle-aged adults with long-term health concerns", Canadian Journal of Nursing Research, Vol. 30 No. 1, pp. 153-169.

Finfgeld, D.L. (1999). "Courage as a process of pushing beyond the struggle", Qualitative Health Research, Vol. 9 No. 6, pp. 803-814.

Finfgeld, D.L. (in press), "Courage in young adults with long-term health concerns", in Miller, J.F. (Ed.), Coping with Chronic Illness: Overcoming Powerlessness, F.A. Davis, Philadelphia. (pp. 145-164).

Gassin, E.A., and Enright, R.D. (1995), "The will to meaning in the process of forgiveness", Journal of Psychology and Christianity, Vol. 14 No. 1, pp. 38-49.

Greenberg, J. (1990), "Looking fair versus being fair: managing impressions of organizational justice", in Cummings, L.L. and Staw, B.M. (Eds.), Research in Organizational Behavior, 12, 111-157.

Goulding, C. (2005), "Grounded theory, ethnography and phenomenology: a comparative analysis of three qualitative strategies for marketing research", European Journal of Marketing, Vol. 37 No. 3/4, pp. 294-308.

Gudykunst, W.W. (1994), Bridging Difference: Effective Intergroup Communication, Sage Publications, Thousand Oaks, CA.

Hardy, J., Gammage, K., and Hall, C. (2001), "A descriptive study of althlete self-talk", Sport Psychologist, Vol. 15 No. 3, pp. 306-318.

Heidegger, M. (1962), Being and time (J. Macquarrie and E. Robinson, Trans.), Harper & Row, New York.

Hieronymi, P. (2001), "Articulating an uncompromising forgiveness", Philosophy and Phenomenological Research, Vol. 62 No. 3, pp. 529-555.

Hill, E. W. (2001), "Understanding forgiveness as discovery: implications for marital and family therapy", Contemporary Family Therapy, Vol. 23 No. 4, pp. 369-384.

Hochschild, A.R. (1983), The Management Heart, University of California, Berkeley, CA.

Hodgson, L.K., and Wertheim, E.H. (2007). "Does good emotion management aid forgiving? Multiple dimensions of empathy, emotion, management and forgiveness of self and others", Journal of Social and Personal Relationship, Vol. 24 No. 6, pp. 931-949.

Hornstein, H.A. (1986), Managerial Courage: Revitalizing Your Company without Sacrificing Your Job, John Wiley, New York.

Hughes, M. (1975), "Forgiveness", Analysis, Vol. 35 No. 4, pp. 113-17

Jablin, F.M. (2006), "Courage and courageous communication among leaders and followers in groups, organizations, and communities", Management Communication Quarterly, Vol. 20 No. 1, pp. 94-110.

Jordan, P.J., and Ashkanasy, N.M. (2006), "Emotional intelligence, emotional self-awareness, and team effectiveness", in Druskat, V.U., Sala, F., and Mount, G. (Eds.), Linking Emotional Intelligence and Performance at Work: Current Research Evidence with Individuals and Groups, Lawrence Erlbaum, Mahwah, NJ, pp. 145-163.

Kearns, J.N., and Fincham, F.D. (2004), "A prototype analysis of forgiveness", Personality and Social Psychology Bulletin, Vol. 30 No. 7, pp. 838-855.

Komives, S.R., Lucas, N., and McMahon, T.R. (1998), Exploring Leadership: For College Students who Want to Make A Difference. Jossey-Bass, San Francisco, CA.

Kruger, D. (1988). An Introduction to Phenomenological Psychology (2nd Ed.), Juta, Cape Town, South Africa.

Lampel, J. (2006), "Rules in the shadow of the future: prudential rule-making under ambiguity in the aviation sector business", International Relations, Vol. 20 No. 3, pp. 343-349.

Lando, H. A., and Donnerstein, E. I. (1978), "The effects of a model's success or failure on subsequent aggressive behavior", Journal of Research in Personality, Vol. 12 No. 2, pp. 225–234.

Langer, E.J., and Piper, A.I. (1987), "The prevention of mindlessness", Journal of Personality and Social Psychology, Vol. 53 No. 2, pp. 280-287.

Leventhal, G.S. (1976), "The distribution of rewards and resources in groups and organizations", in Berkowitz, L. and Walster, W. (Eds.), Advances in Experimental Social Psychology, Academic Press, New York, pp. 92-129.

McCullough, M. E., Exline, J. J., and Baumeister, R. F. (1998), "An annotated bibliography of research and related concepts", in Worthington, E. L. (Ed.), Dimensions of Forgiveness: Psychological Research and Theological Perspectives, Templeton Foundation Press, Philadelphia, pp. 197-217.

McCullough, M. E., Pargament, K. I., and Thoresen, C. E. (2000), "The psychology of forgiveness: history, conceptual issues, and overview", in McCullough, M. E., Pargament, K. I. and Thoresen, C. E. (Eds.), Forgiveness: Theory, research, and practice, Guilford Press, New York, pp. 1–16.

McCullough, M.E. (2008), Beyond Revenge: The Evolution of the Forgiveness Instinct, Jossey-Bass, San Francisco.
Moore, K.D. (1989), Pardons: Justice, Mercy and the Public Interest. New York.

Murphy, J.G., and Hampton, J. (1988). Forgiveness and Mercy. New York.

Newberry, P.A. (2001), "Joseph Butler on forgiveness: a presupposed theory on emotion", Journal of the History of Ideas, Vol. 62 No. 2, pp. 233-244.

Orr, D. (2002), "The uses of mindfulness in anti-oppressive pedagogies: philosophy and praxis", Canadian Journal of Education / Revue canadienne de l'éducation, Vol. 27 No. 4, pp. 477-497.

Paleari, F.G., Regalia, C., and Fincham, F. (2005), "Marital quality, forgiveness, empathy and rumination: a longitudinal analysis", Personality and Social Psychology Bulletin, Vol. 31 No. 3, pp. 268-378.

Pingleton, J. P. (1997), "Why we don't forgive: a biblical and object relations theoretical model for understanding failures in the forgiveness process", Journal of Psychology and Theology, Vol. 25 No. 4, pp. 403–413.

Restrepo, E., and Escobar, A. (2005), "Other anthropologies and anthropology otherwise: steps to a world anthropologies framework", Critique of Anthropology, Vol. 25 No. 2, pp. 99-129.

Ryan, G.W. and Bernard, R.H. (2003), "Techniques to identify themes", Field Methods, Vol. 15 No. 1, pp. 85-109.

Schlenker, B.R. (1980), Impression Management, Brooks/Cole, Monterey, CA.

Schlenker, B.R., and Darby, B.W. (1981), "The use of apologies in social predicaments", Social Psychology Quarterly, Vol. 44 No. 3, pp. 271-278.

Schwartz, T. (1983), "Anthropology: a quaint science", American Anthropologist, New Series, Vol. 85 No. 4, pp. 919-929.

Seligman, M.E.P. (1999), "The president's address", American Psychologist, Vol. 54 No. 8, pp. 537-568.

Shapiro, D.L. (1991), "The effect of explanations on negative reactions to deceit", Administration. Science Quarterly, Vol. 36 No. 4, pp. 614-630.

Sinkula, J.M., Baker, W.E., and Noordewier, T. (1997), "A framework for market-based organizational learning: linking values, knowledge and behavior", Journal of the Academy of Marketing Science, Vol. 25 No. 4, pp. 305-318.

Stone, M. (2002), "Forgiveness in the workplace", Industrial and Commercial Training, Vol. 34 No. 7, pp. 728-286.

Street, A. (1998), "Informing inside nursing: ethical dilemmas in critical research", in Shacklock, G. and Smyth, J. (Eds.), Being Reflective in Critical Educational and Social Research, Falmer, London.

Stuart, A. (1990), "Mindfulness, an important concept for organizations: a book review essay on the Work of Ellen Langer. The Academy of Management Review, Vol. 15 No. 1, pp. 154-159.

Tekleab, A.G., Sims, H.P., Yun, S., Tesluk, P.E., and Cox, J. (2008), "Are we on the same page? Effects of self-awareness of empowering and transformational leadership", Journal of Leadership & Organizational Studies, Vol. 14 No. 3, pp. 185-201.

Thelwell, R.C., Weston, N.J.V., and Greenlees, I.A. (2007), "Batting on a sticky wicket: identifying sources of stress and associated coping responses for professional cricket batsmen", Psychology of Sport and Exercise, Vol. 8 No. 2, pp. 219-232.

Thompson, L. Y., Snyder, C. R., Hoffman, L., Michael, S. T., Rasmussen, H. N., Billings, L. S., and Heinze, L. (2005), "Dispositional forgiveness of self, others and situations", Journal of Personality, Vol. 73 No. 2, pp. 313–359.

Thoresen, C.E., Luskin, F., and Harris, A.H.S. (1998), "Science and forgiveness interventions: reflections and recommendations", in Worthington, Jr., E.L. (Ed.), Dimension of Forgiveness: Psychology Research and Theoretical Perspectives, Templeton, Philadelphia.

Trenholm, S. (1999), Thinking through Communication: An Introduction to the Study of Human Communication, Allyn and Bacon, Needham Heights, MA.

Tyler, R.R., and Bies, R.J. (1990), "Beyond formal procedures: the interpersonal context of procedural justice", in Carroll, J. (Ed.), Applied Social Psychology and Organizational Settings, Erlbaum, Hillsdale, NJ, pp. 77-98.

Valle, R.S., & Halling, S. (Eds.), (1989), Existential-Phenomenological Perspectives in Psychology; Exploring the Breadth of Human Experience, Plenum Press, New York.

Younger, J.W., Piferi, R.L., Jobe, R.L., and Lawler, K.A. (2004), "Dimensions of forgiveness: the views of laypersons", Journal of Social and Personal Relationships, Vol. 21 No. 6, pp. 837-855.

Wertheim, E. H., Love, A., Peck, C., and Littlefield, L. (2006), Skills for Resolving Conflict: A Cooperative Problem Solving Approach, Eruditions, Emerald.

Whisenant, W., and Jordan, J.S. (2008), "Fairness and enjoyment in school sponsored youth sports", International Review for the Sociology of Sport, Vol. 43 No. 1, pp. 91-100.

Witvliet, C.V.O. (2005). "Unforgiveness, forgiveness, and justice: scientific findings on feelings and physiology", – Handbook of Forgiveness, Routledge.

Wojnar, D.M., and Swanson, K.M. (2007), "Phenomenology: an exploration", Journal of Holistic Nursing, Vol. 25 No. 3, pp. 172-180.

Worthington Jr., E.L. (1998), "The pyramid model of forgiveness: some interdisciplinary speculations about unforgiveness and the promotion of forgiveness", in Worthington Jr., E.L. (Ed.), Dimension of Forgiveness: Psychology Research and Theoretical Perspectives, Templeton, Philadelphia.

Perceptions of Entrepreneurship As a Career: Evidence From Selected Tertiary Schools Across Programs in the Philippines

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ABSTRACT

Various literatures have shown that the students' likelihood of choosing entrepreneurship as a career is usually high for those who are taking entrepreneurship as a course. There is scarce empirical evidence, however, on the attractiveness of entrepreneurship to students across programs. This study aims to examine the factors associated with the students' attractiveness to entrepreneurship and how do students across programs differ in their perceptions towards entrepreneurship, barriers to pursue with this career, as well as their motivational factors. The survey was conducted among students from five universities in the Philippines who are taking Entrepreneurship, other business-related courses, and non-business courses. A sample size of 294 was drawn using non-proportionate quota sampling. Analysis of variance, t-test, cross tabulations, and Spearman's rank correlation were used.

It was revealed that students viewed entrepreneurship as an avenue to get rich, to meet interesting people, and to provide employment and other benefits to the society. However, they considered fear of tough competition, loss of free time, and excessive irregular working hours as barriers which were perceived differently by the students across programs. Some personal factors such as age, gender, year level, and number of months taking major subjects were found to be related to the attractiveness of entrepreneurship. Finally, the students expressed that their university education has provided them with good tools for entrepreneurship, it highlights entrepreneurship as a career alternative, and it has an atmosphere that induces and encourages entrepreneurship. The students expressed that they want to be trained on marketing skills, commercialization of innovations, accounting and management of the enterprise, and internationalization of business.

Keywords: **Entrepreneurship, attitudes, motivational factors, barriers to entrepreneurship, entrepreneurial training**

Introduction

The Philippine government recognizes the entrepreneurial efforts in enhancing economic growth, generating employment opportunities, improving living standards, and mobilizing resources for greater productivity.Harnessing the creative talents and promoting a culture of entrepreneurshipamong students is vital in achieving these objectives.

According to the Department of Trade and Industry (2013), Micro, Small, and Medium Enterprises (MSMEs), which account for 99.6 percent of total registered enterprises, contribute 62% and 35.7% of the employment and value-added sectors in the country, respectively. Despite its major contribution to the economy, Philippine SMEs still face challenges on business environment, access to finance and markets, productivity and efficiency.

Higher education, governments, and practitioners have been recognizing the role of education and training in providing the youth with the necessary entrepreneurial skills. Various reforms have been done to promote employability or self-employment among university graduates. One of these is the effort of providing entrepreneurship education to shape students' skills and facilitate entry into self-employment or create their own jobs. The Commission on Higher Education (CHED) has pushed the formal integration of entrepreneurship education pursuant to RA No. 7722 as embodied in Memorandum Order No. 17 (CMO # 17) Series of 2005 – Curriculum Requirement for Bachelor of Science in Entrepreneurship. Based on the CHED directory, there has been an increase in colleges and universities offering business and entrepreneurship courses. Some have indicated the integration of entrepreneurship in their schools, as a full course leading to a degree, a track, or as a major subject.

Entrepreneurship education will increase students' interest in becoming entrepreneurs at some stage after graduation (Friedrich &Visser, 2005). Studies on the role and effectiveness of entrepreneurship training have been explored in many countries. Research has revealed a link between entrepreneurship training and a higher propensity to venture (Petridou et al.,2009; Menzies&Tatroff, 2006) as well as the effect of training on promoting entrepreneurial culture in society in order to facilitate in designing and developing training interventions (Gholami&Jalilvand, 2012). They further revealed that the elements of entrepreneurship training including fostering attributes, stimulating motivations, and increasing skills have significant impact on promoting entrepreneurial culture. Permand et al. (2012), however, analyzed the effectiveness of skills training programs to foster employability and productivity among youth in developing countries. They analyzed the impact of providing entrepreneurship training to young university students and focus on their decision to enter self-employment (Permand et al., 2012). Card et al. (2011) found positive effects on the labor earnings shortly after the students had finished the program. The fundamental skill to create an idea and transform it into a viable growth-oriented business forms an unconditional and integrated necessity in entrepreneurship training programs (Antonites, 2003).

The most revealing finding is that the interest of university graduates in entrepreneurship has traditionally been low (Karhunen et al., 2008; Verkhovskaya et al., 2007; Chepurenko, 2008). This was complemented by a finding that entrepreneurial activity in the Philippines is in general relatively low in international comparison.Efforts were also focused on the perceptions of entrepreneurship as a career option by the students in some countries (Kabuil&Maalu, 2012; Karhunen et al., 2008; OECD, 2012; Oriarewo et al., 2013; Davey, Plewa, &Struwig, 2011; Luiz&Mariotti, 2008; Brijlal, 2011). Most of them revealed that while majority of students had a positive perception of entrepreneurship as a career option, fear of failure, lack of sufficient knowledge to start and run own business, and the inadequate funds to start business. The study also revealed that there was no significant difference in theperception of entrepreneurship between students who had had prior exposure throughBusiness Studies subject at school and those who had not studied the subject. It was alsoobserved that students who had parents/ guardians in self-employment were not highlymotivated to go into entrepreneurship so as to continue in family business (Kabui&Maalu, 2012). Moreover, more male students than female students indicated interest in starting a business. However, not only those who are into entrepreneurial training are landing into self-employment but the graduates of other courses as well (Brijlal, 2011).

In spite of these numerous studies on perceptions on entrepreneurship as a career option, not much is known about the attractiveness of entrepreneurship and how does it differ across programs in the Philippines, the factors associated with the students' attractiveness to entrepreneurship,and how do students across programs differ in their perceptions towards entrepreneurship. In the process, this paper also determines the students' motivational factors as well as barriers to entrepreneurship as a career option.

Hypotheses

The following hypotheses were formulated: (1) Entrepreneurship is being perceived differently by the college students across programs; (2) the barriers to entrepreneurship are experienced differently by the students across programs; and (3) attractiveness to entrepreneurship is significantly related to selected personal factors.

Methodology

The study employed a descriptive, correlational, and comparative research designs. A total valid sample size of294 was drawn using nonproportionate quota sampling. College students in several universities in Cavite and Metro Manila such as De La Salle University-Dasmarinas, Cavite State University-Imus Campus, University of the East, San Beda College, and Adamson University taking up Entrepreneurship; other business courses (Economics, Accountancy, Management, Marketing); and nonbusiness courses (engineering, Information Technology, Computer Science, Hotel and Restaurant Management) served as the respondents.

Data were collected via self-administered questionnaire which was adapted from an existing survey instrument which had been used in a number of studies conducted in Russia and Finland. The questionnaire made use of close-ended questions on a five-point Likert scale such as Completely not(1), Not much (2), Don't know (3), Rather strongly (4), and Very strongly (5). Descriptive statistics, analysis of variance, t-test, Spearman's rank correlation, and cross tabulations were employed.

Results and Discussion

1.0 Demographic Characteristics

The total number of students who responded to the questionnaire was 294 drawn from all year levels. Most of them (52.4%) were third year students across programs, followed by the fourth year (28.9%), while the rest were second (11.6%), and first year students (7.2%)(Table 1). All year levels were considered because it is believed that development of entrepreneurial skills and capabilities may develop at the early stage of the tertiary schooling where the basic foundations of entrepreneurship are being introduced. Sample respondents were mostly taking business courses such as Economics, Management, and Accountancy (62%). Others comprised of those who are taking Entrepreneurship or Entrepreneurial Management (17%); while the rest were takers of degree in Engineering, Hotel and Restaurant, and Technology courses (21%). Moreover, majority (56%) of the respondents were female (Table 2).

2.0 Views about entrepreneurship

Perception plays a critical role in one's decision to venture into self-employment which can further be shaped by endogenous and exogenous factors. Table 3 shows that majority of the students who are formally trained in the entrepreneurship program (92%) responded very strongly when asked about their plan to have their own enterprise in the future, and this differs significantly with the response of the other groups of students ($p< .01$). This did not conform with the findings of Kabui and Maalu (2012) in their study in Kenya that those students who would not want to pursue a career in entrepreneurship are higher (18.3%) than those who had not studied business (10.3%).

Expectedly, entrepreneurship students find it very attractive compared to the non-business and those who are taking other business courses ($p< .01$). This is consistent to their response when they expressed their strong appreciation to entrepreneurship ($p< .05$). Less than one third of the respondents viewed that entrepreneurs do not care for environmental issues (p< .05) while only few of them perceived that entrepreneurs are unscrupulous pursuing their self-interest (p< .05). When asked about their views about their university education, the entrepreneurship students stressed that their schools provided them with good skills (p< .01). and encourage entrepreneurship as a career option (p< .01)..

3.0 Motivational factors for entrepreneurship

Students were given 13 statements stating the factors that can motivate them towards a career in entrepreneurship. Table 4 shows that the students are motivated to venture into business in the future because this will give them an opportunity to meet interesting people and will serve as a means to achieve their goal in life. They also believed that they will have an opportunity to get rich because if they will only put their heart into it, all their efforts will be translated into a higher income.This is consistent with the structure opportunity model (Henderson & Robert, 1999) which indicates that an increase in personal income was a high motivation to start business. When the motivational factors were compared across programs, their views that entrepreneurship generates employment to others; it provides society with more benefits, it is a future form of self-employment, and it their suits character were found to significantly differ (p< .05) as shown in Table 5. Those who take up entrepreneurship perceive lucrative opportunities from entrepreneurship while others do not.

4.0 Barriers to entrepreneurship as a career option

It can be gleaned from Table 6 that students are not so much threatened by the internal and external barriers to entrepreneurship which can be shown in their responses. While competition in the market is normal, the entrepreneurship and other business courses students are relatively less risk averse with tough competition than the nonbusiness students (p< .05). The same is true with the free time that they will forego when they indulge into business since this undertaking requires a lot of time (p< .10). This is also related to their perception that entrepreneurship necessitates excessive working hours, hence they have the fear of foregoing some of their leisure time (p< .05). However, only a small percentage of the entrepreneurship students considered this as a barrier (4.1%) while 10.3% of the nonbusiness students very strongly agree that it is a barrier to a business undertaking. It was also found that there is a significant difference in their perception that debt obligation is another barrier to entrepreneurship (p< .10). Kabui and Maalu (2012) identified insufficiency of funds, stiff competition, and insufficient knowledge on how to run the business as possible barriers to their entry into entrepreneurship.

In summary, it is quite observable that a greater number of nonbusiness students are more adamant to venture into business due to the fears mentioned. Entrepreneurship students and those who are taking other business courses, however, perceive less risk in situations because rather than looking at the disadvantages and threats, they focus on advantages and opportunities (Palich&Bagby, 1995). In the study of the World Economic Forum (2010), fear of failure, cultural barriers, and role of family and friends had the greatest influence on students' perception of entrepreneurship.

5.0 Interest in participating in an entrepreneurial training

Education levels and the availability ofentrepreneurship training programs are possible determinants of perceived skills. When asked about the interest in participating in an entrepreneurial training program as a part of their university education, the nonbusiness students had the highest percentage response of 98%. The respondents were also asked to assess the components of the program that they see as important in entrepreneurial training. Training on marketing skills was the most preferred by the participants, followed by commercialization of innovations, and third in rank was on accounting and management of the enterprise.

6.0 Factors associated with students' attractiveness to entrepreneurship

Personal factors as antecedents of attractiveness to entrepreneurship include age($p < .05$), gender($p < .05$), year level($p < .05$), and the number of months the students had taken their major subjects($p < .01$). It seems plausible that if the become more exposed to major subjects, the more they can recognize entrepreneurship as a career option. Specialized entrepreneurial courses can be collectively considered as personal human capital or the potential entrepreneur's knowledge capital. Knowledge as a critical resource can positively influence self-efficacy and eventually the intention to start a new business (Chang et al, 2009). Regarding the influence of gender, females showed a higher level of interest on entrepreneurship than males. This finding did not conform with the study of Matthews and Moser (1996) and Delmar and Davidson (2000) who found otherwise. Age and the year level were, likewise, found to have correlation with entrepreneurial attractiveness.

7.0 Conclusions and Recommendations

The students taking entrepreneurship course consider entrepreneurship as a very attractive career alternative compared with the students taking other business-related and nonbusiness courses. This justifies their very strong response when asked about their plan to have their own enterprise in the future. It was found that the responses of the groups of students differ significantly when they expressed their strong appreciation to entrepreneurship. On their views about entrepreneurship education across programs, they asserted that their schools provided them the knowledge and skills that they need to run their own business and they have been encouraged to pursue entrepreneurship as a career option. When the motivational factors were compared across programs, their views that entrepreneurship generates employment to others; it provides society with more benefits, it is a future form of self-employment, and it their suits character their responses were significantly different.

The result that students across programs are attracted to entrepreneurship should serve a starting point for tertiary institutions to strengthen entrepreneurship education. As a matter of fact, the Department of Education can also integrate more entrepreneurship concepts and principles in their subjects to properly prepare the students to self-employment. In both levels, the support activities and the lecture contents can be adjusted in a way that will stir the entrepreneurial interest of the students.It has been expected that students taking entrepreneurship are the most appreciative and interested to take part in entrepreneurial training. Surprisingly, all students across programs expressed high interest to be trained more on entrepreneurship. Given the training preference of the students, the entrepreneurial education enhancement can be focused on marketing skills, business innovations, accounting and financial management, and internationalization of business. Schools should be more aggressive in encouraging students to self-employment since students across programs are inclined to be very optimistic in their views about entrepreneurship.While these are just views and perceptions of the students, a longitudinal study can be done to further look at whether students' interest to become self-employed has become a realization and if not, what hindered them from venturing into entrepreneurship. This is where interventions of the concerned institutions will come in if problems and constraints will be identified. In this case, the development of entrepreneurial skills and capabilities of university students as potential entrepreneurs of the future is in key role.

In the 27th Confederation of Asia-Pacific Chambers of Commerce and Industry (CACCI) in March 2013, CACCI SME Development Council Chairman George Abraham said that one of the problems why the Philippines' SME growth is slow is the lack of effective partnerships for SMEs which, according to Abraham, can be addressed by the creation of networks of shared resources, services, and knowledge. This is where academic institutions will enter into the picture. The academe-industry partnership/linkage should be strengthened to address the key challenges and constraints that continue to prevent the Micro, Small, Medium Enterprise (MSME) sector from realizing its full potential and boosting the country's industrial growth. To move the economy faster, there is a need to push from the base. Finally, the results of the study will serve as a basis of framework for SME development in the ASEAN region. This will accelerate the pace of SME development and enhance the competitiveness and dynamism of ASEAN SMEs to improve SME contribution to overall growth and development of the ASEAN region.

Table 1. **Distribution of respondents by year level, 2013**

Year	Frequency	Percent
First	21	7.1
Second	34	11.6
Third	154	52.4
Fourth	85	28.9
Total	294	100.0

Table 2. **Distribution of respondents by program and by gender, 2013**

Program	Frequency		Percent	
	Male	*Female*	*Male*	*Female*
Entrepreneurship	17	33	34	66
Other business courses	73	110	40	60
Non-business courses	38	23	62	38
Total	128	166	44	56

Table 3. **Perception of respondents towards entrepreneurship (% very strongly), 2013**

Perception	Entrep course	Other business Courses	Non-business Courses
Plan to have own company***	92	79	70
Very strong appreciation of entrepreneurship**	37	32	21
Entrepreneurship is very attractive***	64	31	33
Entrepreneurs are unscrupulous pursuing self-interest**	10	9	10
Entrepreneurs do not care about environmental issues**	31	32	23
University education provided good tools for entrep***	38	29	13
University education highlights entrepreneurship as a career alternative***	27	26	12
University encourages entrepreneurship***	38	26	17

Table 4. **Motivational factors for entrepreneurship, 2013**

Statement	Average Rank
Opportunity to meet interesting people	4.56
Achieving an appropriate goal in life in accordance with one's own abilities	4.41
Opportunity to get rich	4.35
Interesting and varying tasks and duties	4.24
Result-based income	4.20

Table 5. **Comparison of motivational factors for entrepreneurship by program (%), 2013**

Factor	Entrep	Other business Courses	Non-business Courses
Provide employment**	68.0	64.8	36.1
Provide society with more benefits**	44.9	45.1	31.1
A future form of employment**	52.0	44.5	29.5
Opportunity to get rich*	59.0	58.0	45.0
Entrepreneurship suits character**	31.0	32.0	23.0
The government provides excessive support *	36.0	29.0	18.0

Table 6. **Barriers to entrepreneurship by program (%), 2013**

Response	Entrep	Other business Courses	Non-business Courses
Fear of tough competition**	12.5	10.5	24.1
General negative opinion on entrepreneurship*	4.0	5.0	10.0
Excessively irregular working hours**	4.1	5.6	10.3
Loss of free time*	12.5	13.3	22.4
Fear of debt*	10.4	12.2	17.2

Table 7. **Interest in participating in entrepreneurial training, 2013**

Program	Frequency	Percent
Entrepreneurship	48	96
Other Business Courses	176	96
Non-Business Courses	60	98
Total	294	100

Table 8. **Preferred trainings on entrepreneurship education, 2013**

Program component	Mean Rank
Marketing skills	4.56
Skills of commercialization of innovations	4.44
Skills of accounting and management of the enterprise	4.39
Internationalization of business	4.22
Practical information on entrepreneurship	4.20

Table 9. **Relationship of some personal factors to attractiveness of entrepreneurship**

Factor	Significance
Age	.018
Gender	.014
Year level	.016
Number of months taking major subjects	.000

REFERENCES

Brijlal, P. (2011). Perceptions and knowledge of entrepreneurship: A survey of final year university students. African Journal of Business Management.5(3):818-825

Card, D., P. Ibarraran, F. Regalia, D. Roasas-Shady, and Y. Soares. (2011). The labor marketimpacts of youth training in the Dominican Republic." Journal of Labor Economics, 29 (2).

Chang,E. Memili, E. Chrisman, J. Kellermans, F. and Chua, J. (2009) "Family social capital, venture preparedness, and start-up decisions – A study of Hispanic entrepreneurs in New England" Family Business Review, 22 (3): 279-292.

Davey, T., Plewa, C., and Struwig, M. (2011). Entrepreneurship perceptions and career intentions of international students, Education + Training, 53(5):335 – 352

Delmar, F. and Davidsson, P. (2000) "Where do they come from?Prevalence and characteristics of nascent entrepreneurs" Entrepreneurship and Regional Development, 12: 1-23.Department of Trade and Industry. (2013)

Friedrich, C. and Visser, K. (2005). South African entrepreneurship education and training, 29-44 De Doorns: Leap Publishing, South Africa.

Gholami, M. R. and Jalilvand, M. R.The effect of training on promoting entrepreneurial culture:Evidence from Iran, Journal of Basic and Applied Scientific Research, 2(10)10025-10030, 2012, TextRoad Publication.

Kabui1 E. W. and Maalu, J. K. (2012) Perception of entrepreneurship as a career by students from selected public secondary schools in Nairobi, DBA Africa Management Review, 2 (3):101-120

Karhunen, P., Ledyaeva, S. Pesonen, A., Mochnikova, E., and Vasilenko, D. (2008). Russian students' perceptions of entrepreneurship.Results of a survey in three St. Petersburg universities Entrepreneurship development –project 2

Luiz, J. and Mariotti, M. (2008). Perceptions regarding entrepreneurship in anemerging and culturally diverse economy:A South African survey. Working Paper Number 95. Retrieved from www.econrsa.org/papers/w_papers/wp95.pdf

Matthews, C. and Moser, S. (1996) "A longitudinal investigation of the impact of family background and gender on interest in small firm ownership" Journal of Small Business Management 34 (2): 29-43.

Menzies, T.V. and Tatroff, H. (2006), The propensity of male vs female students to take coursesand degree concentrations in entrepreneurship", Journal of Small Business and Entrepreneurship, 19(2): 203-223.

OECD (2012).Culture: Entrepreneurial perceptions and attitudes, in Entrepreneurship at a Glance 2012, OECD Publishing. Retrieved from http://dx.doi.org/10.1787/entrepreneur_aag-2012-26-en

Oriarewo, G. O, Chukwujioke, K. A. and Aondoseer, A. (2013). Entrepreneurial perceptions and knowledge among graduates of Nigerian universities. International Journal of Scientific and Research Publications, 3(6):1-8 Retrieved from www.ijsrp.org

Palich, L. and Bagby, D. (1995). Using cognitive theory to explain the entrepreneurial risk –taking: Challenging conventional wisdom. Journal of BusinessVenturing.10(6):425-438. Retrieved from olim.org/wiki/uploads/Articles/PalichBagby1995RiskTaking.pdf

Petridou, E., Sarri, K. and Kyrgidou, L. (2009), Entrepreneurship education in higher educational institutions: The gender dimension, gender in management: An International Journal, 6 (4): 547-558.

Premand, P., Brodmann, S., Almeida, R., Grun, R., and Barouni, M. (2012). Entrepreneurship training and self-employment among university graduates: Evidence from a randomized trial in Tunisia. Discussion Paper No. 7079.

World Economic Forum. (2010).Global education initiative: Europeanround table on entrepreneurshipeducation. Brussels, Belgium

The Effectiveness of the English Plus Program of Bicol University

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ABSTRACT

English Plus is a non-credit course meant to address the English Language deficiency of incoming freshmen by providing them enabling skills to cope with the rigors of college. It aimed to address the lack of readiness of college entrants, through the improvement of crucial English language skills, particularly grammar rules and proper usage. After 11 years of implementation, there have only been two recorded formal assessments of the program. This third evaluation tackled the aspect of its effectiveness in order to advance sound policy recommendations useful in its continued implementation.

The 3-phased project used the descriptive-evaluative method of research. It was anchored on the Constructivist's Paradigm which maintains that "individuals construct new knowledge from their experiences, either by accommodation or assimilation."[1] Considering this theory, it was found that nowhere in any point of the evaluation did it appear that the English Plus takers exceeded or even approximated the competencies of the non-takers. This means the failure of the English Plus Program to provide the competencies for the students to fare better in higher English courses. A closer look at the tests likewise identified verbs and prepositions as the greatest weaknesses of students in English.

The research further suggested the move from separation of language and content instruction to more integrated approaches such as those advocated by functional theories of grammar. It likewise urged the use of communicative learning approaches in the classroom. Finally, it recommended revamp in the different areas of program implementation.

***Keywords*: Professional Education, Learning Outcomes, Mother Tongue-Based Instruction**

English Plus is a non-credit course meant to address the English Language deficiency of incoming freshmen by providing them enabling skills to cope with the rigors of college. It aimed to address the lack of readiness of college entrants, through the improvement of crucial English language skills, particularly grammar rules and proper usage. After 11 years of implementation, there have only been two recorded formal assessments of the program. This

1 "Constructivism," Microsoft Encarta, 2007

third evaluation tackled the aspect of its effectiveness in order to advance sound policy recommendations useful in its continued implementation.

Objectives

1. a. Determine the respondents' mean scores in the pre-test and post-test;
   b. Establish whether there is significant difference between the results of the pre-and post-tests;
   c. Determine strengths and weaknesses of the respondents in terms of grammar skills; (Study 1)

2. compare the level of performance of English Plus takers and non-English plus takers in terms of grammar use in line with skills and knowledge learned in English General Education Courses (GECs) as measured through a common assessment given at the end of English 1 (Study 2) and English 2 (Study 3) for the purpose of establishing whether there is significant difference in the level of performance of English Plus takers and non-English Plus takers;
3. identify the strengths and weaknesses common to or peculiar to English Plus takers and/or non-English Plus;
4. determine any areas for improvement in the English Plus program; and
5. forward recommendations towards the furtherance of the program.

Procedure/Methodology

The study employed the descriptive-evaluative method of research, which is quantitative in nature. This method was specifically applied through the administering of the English Plus pre-test and post-test, as well as the post-tests given at the end of English 1 and English 2.

Findings

Study 1

Pre-test mean score. For the pre-test, respondents arrived at a mean score of 43, which is reflective of Average Proficiency, based on the given equivalent interpretations. Since this is a pre-test, this is an acceptable starting level, especially since respondents are incoming freshmen and are expected to have gained knowledge from their English classes both in elementary and high school.

Post-test mean score. For the post-test, mean score was computed to be 55, which is a clear 12 points higher than the pre-test mean score. A score of 55, through still within the bracket of Average Proficiency, is found to be much higher than 43, the pre-test mean score. On their own, one may conclude that the English Plus program has been effective, but to validate this, a further test of significant difference was used.

Test of Significant Difference

The Pre-test and Post-test scores were recorded and computed for significant difference, using the paired sample two-tailed t-test since it involves two (paired) dependent sample means. Using the t-test, computation arrived at the result 3.23186E-82, interpreted to mean that there is significant difference between the two means.

This result shows that the English Plus Program currently offered by Bicol University through the College of Arts and Letters is effective, at least in the attainment of its immediate learning outcome, and is recommended to be continued.

Study 2

This component of the research project established the significant difference in the level of performance of English Plus takers and non-English Plus takers. The comparison is intended to show whether the English Plus takers, after a 54-hour intensive grammar learning, now possess the competencies of the non-takers, as this is the very essence of the summer course.

The t-tests indicate that there is a significant difference between the test results of the respondents who took English Plus and those who did not. Going back to the research framework of the study, it was pointed out that performance of English Plus takers parallel to or exceeding that of non-English Plus takers will be interpreted as a positive effect of the program. In this case, the significant difference leans on the negative side, which means that, English Plus has in fact no carry-over effect on students taking English 1.

Study 3

This is a discussion of the performance of English Plus takers in English 2, phase 3 of the research project. The intention is to likewise evaluate the carry-over effect of English Plus, if any, in the attainment of specific course objectives dealt with in Writing in the Discipline. In a way, this is intended to either validate or disprove findings in phase 2 of the research.

A close look at the average scores of the respondents on evaluating the research activity undertaken in class, the figures pointed out to the same findings. The non-EP takers were likewise the better performers.

Over-all performance of EP takers and non-EP takers in College English

Both phases of evaluation revealed that the non-EP takers definitely scored higher than the EP takers. Nowhere in any point of the second level evaluation did it appear that the latter exceeded or even approximated the competencies of the former. Referring to the research framework, this could only mean the failure of the English Plus Program of Bicol University, at least for the given scope, to provide the supposed enabling competencies for the students to fare better in higher English courses.

Areas for Improvement in the English Plus Program

The initial findings on its effectiveness as revealed in study 1 suggest a positive note. There is a significant difference in the pre test and post test scores, implying that after 54 hours, the students relearned the basics of grammar. However, going further on a second and third level evaluation eroded the seemingly affirmative indicator of effectiveness. Studies 2 and 3 proved that there is no carry-over of this learning in both English 1 and 2, which ironically is the essence of the program – to provide the grammar competencies required of college English.

Specific areas for improvement are on teaching methodology, instructional materials, and teachers.

Recommendations for the furtherance of the program

1. Reevaluate its implementation. At this point it becomes imperative to go back to the heart of the program –to provide coping skill so that students feel more prepared to handle the learning outcomes of higher English subjects.
2. Continually update and evaluate teaching methodologies and materials. Needs vary and continue from all points. Periodic assessment must be initiated to ensure that needs are properly addressed.
3. Select and Continuously Train Teachers. An evaluation can distinguish the effective from the ineffective.
4. Initiate Feedback System where English teachers evaluate the progress of students and recommend measures in further developing their skills.

5. Periodically evaluate the program for decision-making purposes.

Perceived Impact of Results

The research results will redound to sound decision by implementers. It could only be two ways – furtherance or discontinuance. The researchers, however, urge the furtherance, or at least, a going back to the primal intentions and direction of the program until it self-phased out.

Conclusions

The researchers advance these conclusions:

1. The English Plus Program is effective in accomplishing the immediate learning output of the course.
2. That the non-English Plus takers evidently and conclusively performed better in both GEC's, thus the English Plus Program failed to provide the enabling competencies that would have allowed the English Plus takers to approximate the level of performance of the non-English Plus takers.
3. That improvement is always a choice, not simply an option, thus the areas are many but are substantially anchored on policy implementation
4. That specific measures can be undertaken to improve the implementation of the program before the full impact of K to 12 to higher education.

Recommendations

The following are recommended:

1. That English Plus be continuously implemented, considering the recommended measures, in the succeeding years prior to the full advent of K to 12 and its impact to higher education
2. That the measures outlined in this research for the furtherance of the program be considered. Also, because the strengths and weaknesses of the students have already been identified, it is recommended further that these be utilized in the crafting of materials and selection of strategies for instruction.
3. It is recommended that basic policies be revisited and previous research results be taken into account.
4. It is recommended that a revamp in the different areas of implementation be done, and that after the program is phased-out, English Plus is offered as a special program to be lodged at the BU Language Center.

REFERENCES

A Guide to Learning English, December 12, 2012, <http://esl.fis.edu/grammar/langdiff/english.htm>

Astin, Alexander et al. " Principles of Good Practice for Assessing Learning." General Education Assessment Resource Center, n.d.

Bartolata, Jocelyn. "Learning Styles and Teaching Techniques in English Plus of Bicol University." Unpublished Dissertation, Bicol University, 2004.

CHED Memo No. 59

"Constructivism," Microsoft Encarta, 2007

Department of Education-National Testing and Research Center (2008) as quoted by Jade Ocfemia Alberto, "Cooperative Learning Techniques in Enhancing Competencies in Science and Health V" (Unpublished Master's Thesis, Bicol University, Legazpi City, 2009).

Functional Theories of Grammar, December 12, 2012, http://en.wikipedia.org/wiki/Functional_theories_of_grammar

Lorica, Joan. "The Effectiveness of English Plus in Bicol University." Unpublished Undergraduate Thesis, Bicol University College of Arts and Letters, 2008.

Masangya, Elaine M. and Louella Lozada, An Investigation on the Relationship between the Language Exposures and Errors in English Essays of High School students, December12, 2012, < http://philippine-esl-journal.com/Volume-2-em.php>

Pepper Marcelo, "English Proficiency is Key to Landing a Job," February 10, 2010 <http://planetphilippines.com/current-affairs/english-proficiency-is-key-to-landing-a-job/>

Prepositions, December 12, 2012, < http://www.ego4u.com/en/cram-up/grammar/prepositions>

What is Communicative Language Teaching,? December 13, 2012, http://www.cal.org/resources/digest/gallow01.html

What is Functional Grammar? December 12, 2012, http://anenglishpage.tripod.com/christie.html

Development of Competency-Based Modules in Bartending; Instructional Strategies and Problems

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ABSTRACT

The development of a set of instructional module that is intended to respond to the needs of the bartending students provide general background on the basic concepts, manipulative skills, technical know-how, good and safe habits of work and other related knowledge and concepts necessary in preparing the individual for bartending employment career.

Using descriptive research, fifty students and five teachers participated in this study. The objectives covered the following: 1. Design and develop a set competency-based Bartending modules; 2. Determine the educational significance of the module to the learners; 3. Identify the teaching methods or strategies preferred by the teachers in teaching Bartending that markedly complemented the use of competency-based Bartending modules; 4. Discover the instructional problems met by the instructors and the solutions they offered in solving these problems.

The findings revealed after the seven (7) modules were developed, evaluated, and pilot tested, that bartending modules were beneficial and significant to the learners as they can provide high-level competency-based learning and assure graduates productivity that can improve their socio-economic position with a weighted mean rating of 4.16. Whereas, five (5) preferred methods, strategies and techniques that favorably supports the use of CBBMs are: Illustration, Lecture-demonstration/Simulation, Question and Answer, Discussion, and Lecture. The instructors experienced moderately serious problems that were not directly associated with the use of the developed modules but they came up with four solutions. Among these solutions are: 1) hire additional qualified teachers for BSHRM; production of the competency-based learning module for students; 3) procurement of equipment/facilities necessary in the performance of simulated activities and 4) enhance linkages with private entities for students' immersion/practicum to compliment the delinquency of food and beverage laboratory. It was concluded that the developed modules proved to be valid and effective learning tools in the study of Bartending and could be associated with the use of illustration and lecture demonstration/simulation instructional interventions. On the basis of the findings and conclusions cited it could be recommended that the production of competency-based modules be provided for students' learning and allow other conclusive evidences that would support modular instruction's effectiveness.

Introduction

Wines are categorized using a number of different methods. Sometimes they are grouped into different categories by grape variety, region of origin, by color, by the name of the wine maker or by production technique. A bartender (also known as a barkeep, barman, barmaid, or a mixologist), according to Wikipedia (2013), is a person who serves usually alcoholic beverages behind the bar in a licensed establishment. A bartender can generally mix classic cocktails and as such must be well verse with various wines so that in the course of time it has become a very promising profession. This explains why bartending as a course is offered among BSHRM students.

In this study the main focus is the development of a set of instructional module that is intended to respond the needs of the bartending students. It humbly attempts to provide general background on the basic concepts, manipulative skills, technical know-how, good and safe habits of work and other related knowledge and concepts necessary in preparing to the individual for bartending employment career. This instructional modules therefore present complete understanding of Basic Bartending.

The primary objective that the researcher realized in this study was the development of competency-based Bartending modules intended to use by the tertiary students in Hotel and Restaurant Management at the Partido State University, San Jose Campus, San Jose, Camarines Sur. In the realization of this objective, the following specific questions for sought: 1) What competency-based learning Modules on Bartending can be developed? 2) What are the educational significances of the competency-based modules to the learners? 3) What are the teaching methods or strategies preferred by the teachers in teaching Bartending that markedly complemented by use of competency-based Bartending modules? 4) What instructional problems have been meet by the instructors in using the modules in what solutions were offered by them to solve this problems? What are the problems have been met by the instructors in using the modules and what solutions were offered by them to solve these problems?

Methodology

Research Design. The study made used of the descriptive method of research. According to Libero (1996) descriptive research "involves describing, analyzing and interpreting the conditions that now exist. It involves some kind of comparison and contrast, and may attempt to discover relationship." This method, the researcher assumed, can best describe and interpret the answers to questions 1 to 4 as indicated in the aforementioned research objectives. It used Persimo's (2011) study as the main related study.

Procedure. After determining the participant's cognitive level the researcher prepared the competency-based Bartending modules. For purposes of attaining content validity a review panel was organized. The drafted modules after having been validated undergone necessary adjustments giving considerations to suggestions made. After the modules have been adopted the researcher determined the educational significances of the said competency-based modules to the learners and this was achieved using a Likert-type survey questioner. The participating instructors were likewise asked to indicate those instructional problems encountered when using the said competency-based modules as well as the solutions employed by them to solved those problems.

Respondents. Fifty(50) BSHRM I and II students participated in this study using purposive sampling. Five(5) instructors of the BSHRM likewise participated during the validation as well as during the formal research processes. The total number of fifty-five(55) was taken from two (2) classes, academic year 2011-2012. Finalization of report was done 1st semester of academic year 2012-2013.

Table 1. Distribution of Respondents.

Respondents	F	%
Faculty members	5	.09
Students	25	.45
Bartending I	25	.45
Bartending II		
Grand Total	**55**	**100**

Locale. This study was conducted at ParSU-SJC, in San Jose, Camarines Sur because the participants were students and teachers there.

Research Instrument. The researcher used survey questioners, one (1) for the content validity, and the other one (1) as the main survey instrument where the later was subdivided into three (3) parts-Part-1,assested the instructional methods and strategies employed; Part 2, assessed the educational significant of the modules; Part 3, assessed the problems encountered. Focused interview solicited the solutions offered to solve those problems. The researcher used a 5 point scale for providing qualitative interpretation in each category:

Scale			**Interpretation**	
5	-	Always	Very Serious	Highly Significant
4	-	Very Often	Serious	Significant
3	-	Often	Moderately Serious	Moderately Significant
2	-	Sometimes	Not Serious	Less Significant
1	-	Seldom	Not a problem	Not Significant

The computed weighted mean is interpreted using Calderon's (2000) range:

Range					**Interpretation**	
4.50	-	above	-	Always	V Serious	H Significant
3.50	-	4.49	-	V Often	Serious	Significant
2.50	-	3.49	-	Often	M Serious	M Significant
1.50	-	2.49	-	Sometimes	N Serious	L Significant
Below 1.50			-	Seldom	N a Problem	N Significant

Statistical Tools. The data gathered were treated using the simple frequency count and percentage technique and weighted mean.

Results and Discussion

Competency-based bartending modules developed. There were seven (7) competency-based modules developed, validated, and tried out. These modules represented various lessons such that: Lesson 1 (Module 1) – Bar Terms; Lesson 2 (Module 2)- Laboratory Tools and Equipment; Lesson 3 (Module 3)- Preparation for service; Lesson 4 (Module 4)- Bar Operation; Lesson 5 (Module 5)- Beverage Personnel; Lesson 6 (Module 6)-Basic Mixing Rules; Lesson 7 (Module 7)-Serving Wine. The competency-based modules in bartending followed the TESDA format and each contained the following important parts: a) Lesson title, b) Objectives, c) General, d) Specific, e) Preview, f) Lesson-Activities, g) Program Check, h) Feedback for progress Check. Every modules or lesson possessed an evaluation measure (progress check) intended to determine learner's learning performance. This, in a way would outright inform the learner of his own learning process. It would provide the learner another option to improve his progress.

Table 2. Competency-Based Bartending Modules Developed

Program Title	Module Number	Lesson Number	Title
1. Bartending	1	1	Bar Terms
2. Bartending	2	2	Laboratory Tools and Equipment
3. Bartending	3	3	Preparation for Service
4. Bartending	4	4	Bar Operations
5. Bartending	5	5	Beverage Personnel
6. Bartending	6	6	Basic Mixing Rules
7. Bartending	7	7	Serving Wine

Educational significance of the CBBM. The respondents found the competency-based bartending modules educationally beneficial and significant to the learners, as shown by the average weighted mean rating of 4.16. This finding was supported by all the indicators rated significant but it could be attributed most to the following indicators rated very significant: a) that the module can provide high-level competency-based learning assures graduates productivity that can improve their socio-economic standing in the community (Mw=4.62); and, b) the module can improve parents' and community's confidence to the University in terms of effectiveness in educational deliverance (Mw=4.56).

Table 3. Educational Significance of the CBBM.

Indicator	Mw	Q.I
1. The module can provide high-level competency-based learning which could eventually assure graduates' productivity and improve their socio-economic well being.	4.62	V. Sig.
2. The module is self-paced. Students can either advance or catch-up whenever they were unable to attend regular classes.	3.68	Significant
3. The module can improve parents' confidence as regard to pedagogical effectiveness.	4.56	V. Sig.
4. The module can serve as a refresher or reviewer for students.	4.08	Significant
5. The module serves as a learning and instructional material for students, non-students, and instructors.	3.84	Significant
Average	**4.16**	**Significant**

Teaching Methods or Strategies Preferred by the Teachers in Teaching Bartending. The whole function of instruction is the effective promote of learning. Anything done in the most efficient way is accomplished by certain methods, strategies, and techniques. Methods, strategies, and techniques facilitate learning. In this study, the researcher assessed the teaching methods or strategies preferred by the teachers in teaching Bartending that would favorably support the use of CBBMs. As revealed, the following five (5) preferred methods, strategies and techniques were always used (presentation is based on priority): Illustration (Mw=4.82), lecture-demonstration/ Simulation (Mw=4.76), Question and Answer (Mw=4.72), Discussion (Mw=4.62), and Lecture (Mw=3.60). The methods, strategies, and techniques sometimes used were Trip (Mw=2.22), and Symposium (Mw=1.92).

Table 4. Common Methods, Strategies, and Techniques Preferred by the Teachers

Methods and Strategy	Mw	Q.I.
1. Project method	3.38	Often
2. Demonstration method with actual "hands-on"	3.08	Often
3. Lecture method	3.60	Always
4. Lecture- Demonstration/Simulation	4.76	Always
5.Illustration method	4.82	Always
6.Field trip	2.22	Sometimes
7. Discussion	4.62	Always
8. Question and answer	4.72	Always
9. Symposium	1.92	Sometimes
10. Interview	2.76	Often
11. Reporting	3.44	Often
12. Problem solving	2.92	Often
13. Laboratory method	4.46	Very Often
14. Team teaching	2.40	Sometimes
Average	**3.51**	**Very Often**

Instructional Problems Met in Using the Modules and Solutions Offered. There were seven (7) instructional problems met by teachers in teaching Bartending using the competency-based Bartending modules. As revealed the teachers experienced moderately serious problems, shown by the average weighted mean of 2.82. This can be attributed to the very serious problem encountered along lack of qualified teachers in its BSHRM Bartending course (Mw=4.82) and the serious problem along inadequate equipment and facilities necessary in the performance of simulated activities (Mw3.54). All other indicators were rated moderately serious problem such as the lack of advanced instructional technologies that would complement modular instruction (Mw=2.66), inadequate supplies/ materials necessary to carry out actual activities (Mw=2.72), and lack of laboratory rooms that would support the various activities required in the module (Mw=2.56) with the exception of two other indicators along inadequate knowledge in the use of the module (Mw=1.28), and having overcrowded/oversized classes (2.18).

There were four solutions unanimously offered by the teacher-respondents in minimizing the existing problems as revealed by the focused interview – hire additional qualified teacher for BSHRM Bartending course; production of the competency-based learning module to provide every student a copy; procurement of equipment/ facilities necessary in the performance of simulated activities; and, enhanced linkages with private companies engaged in hotel and restaurant operations for students' immersion/practicum to compliment the absence of standard laboratory and advanced technologies.

Table 5. Instructional Problems Met by the Teachers

Instructional Problem	Mw	Q.I.
1. Inadequate knowledge in the use of the module.	1.28	Not a problem
2. Having overcrowded/oversized classes.	2.18	Not serious
3. Lack of laboratory rooms that would support the various activities required in the module.	2.56	Moderately Serious
4. Inadequate equipment/facilities necessary in the performance of simulated activities.	3.54	Serious
5. Inadequate supplies/materials necessary to carry out the actual activities.	2.72	Moderately Serious
6. Lack of qualified BSHRM Bartending teachers.	4.82	Very Serious
7. Lack of advances instructional technologies that would complement modular instruction.	2.66	Moderately Serious
Average	**2.82**	**Moderately Serious**

CONCLUSIONS/RECOMMENDATIONS

The aforementioned findings indicated that the developed modules proved to be valid and effective learning tools in the study of Bartending. The instructors were using varied instructional methods, strategies, and techniques in teaching Bartending and their priority proved to be more on the use of illustrations and lecture-demonstration/ Simulation. Illustration would supplement the absence of advance teaching technologies while demonstration with simulation would complement the absence of modern laboratory.

On the basis of the findings and conclusions cited it could be recommended that modular instruction in Bartending should be further studied allowing more module enhancement and the inclusion of other important variables not verified by the current study. In this manner it would allow stronger conclusive evidences that would support modular instruction's effectiveness. Above all, in this manner it would allow the Campus the chance to provide those instructional barriers cited in this study.

REFERENCES

Aquino, Gaudencio V. 1967, Fundamentals of Effective Teaching. (Manila: Navotas Press, 1967).

Calderon, Jose F. 2000, Statistics for Educational Research Simplified, Educational Publishing House, Ermita, Manila, Philippines.

De Villicrs, Marq, Water: The Fate of Our Most Precious Resource. Houghton Mifflin, 2000. Informed and engaging history humankind's mismanagement of this nonrenewable resource.

Gabanyi, Stefan. WhiskfEfY. Abbeville, 1997. Handbook with more than 1,000 entries on everything from individual brands to the history of single-malt scotch.

Jackson, Michael, ecL Michael Jackson's Complete Guide Single Malt Scotch 3rd ed. Running, 1994. Ratings and information on more than 300 malts.

Johnson, Hugh. Hugh Johnson's Modem Encyclopedia of Wine. 4th ed. Simon & Schuster, 1998. Wine and wineries of the world.

Librero, Felix, 1996, How to A Write Thesis Proposal, Some Practical Guidelines, Philippines: Institute of Development Communication, UP Los Baños, College of Agriculture, Laguna.

Parker, Robert M., Jr. Parker's Wine Buyer's Guide. 5th ed. Fireside, 1999. Evaluates recent vintages, prices, and ratings more than 7,500 wines from the major regions,

Persimo, Salvacion C. 2011, "Modules in Housekeeping Services," (Unpublished Master's Thesis, Partido College, Goa, Camarines Sur)

Robinson, Jancis, ed. The Oxford Companion to Wine. 2nd illus. ed. Getty Center for Education in the Arts, 1999. Growing grapes, production, regions, vintners, and history.

Serrano, Mary Ann, 1988. "Instructional Modules for the Enrichment of Teaching Chemistry in the Secondary Schools" (Unpublished Master's Thesis, University of Saint Anthony, Iriga City)

Steiman, Harvey- The Wine Spectator's Essentials of Wine: A Guide to the Basics. Running Press, 2000. A straightforward, detailed guide.

The Wine Spectator's Ultimate Guide to Buying Wine. 7th ed. Running Press, 2000. A comprehensive, standard reference from the preeminent wine publication; lists current prices for more than 30,000 wines.

Waymack, Mark H., and James F. Harris. The Book of Classic American Whiskeys. Open Court, 1995. Merits of various whiskeys, with history, distilleries, tasting notes, and instructions on making them.

Experimental Study on the Effectiveness of Housekeeping Services Module

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ABSTRACT

The principles and purpose of modular instruction can be viewed to increase focus on individual instruction (Goldschmid and Goldschmid, 1973) but not limited to enrichment and remediation (Macarandang, 2009) in higher education but likewise to generate a new generation of self-directed learners (Sarmiento, 2007) because the modules help students acquire knowledge and information even in the absence of a teacher (Ruguian, 2007). Many studies support these views

To increase evidences that may suggest effectiveness in using modular approach as compared to contemporary lecture method, Partido State University San Jose Campus addressed the needs to evaluate and assess the proposed set of modules in Housekeeping Services under study.
Using descriptive-experimental research design, twenty-five matched non-randomized students were selected from the BSHRM-Housekeeping Service at Partido State University, San Jose Campus as respondent samples. The experimental class was exposed to the modular approach while the control group was exposed to the usual lecture (contemporary) method. The objective is to develop, asses, and try out a proposed set of modules in Housekeeping Service. Data were statistically treated using the percentages, mean weighted, independent t-test and were correlated.

This study used five (5) modules that were developed, evaluated, and pilot tested where each module contained: program title, module number, module title, time range, insights, objectives, instructional activities, pretest, information sheet, check yourself, posttest, key terms, key to correction and references. The findings revealed that modules attained good characteristics along: specific objectives, content, languages used, effectiveness of learning, and evaluation activities. The pretest-posttest and summative test showed higher mean gain indicating that the modules were valid and effective, the posttest mean scores of the experimental group showed higher weighted mean than those of the control group. The computed t-ratios of the experimental group , except for module 2, were found significantly higher than the computed t-ratios of the control group.

It was concluded that the parts and components were effective in realizing the objectives of every lesson and was able to meet academe-industry competency requirements. It may allow ample exposure of the instructors and students to modular instruction. However, more experiments may be essential to further test its validity and reliability.

Thus, it may be recommended that the modules should be used by the BSHRM-Housekeeping Services but should be continually be assed and updated. The development of instructional modules may also be recommended to improve student participation in classroom.

Introduction

The principles and purpose of modular instruction can be viewed to increase focus on individualized instruction (Goldschmid and Goldschmid, 1973) but not limited to enrichment and remediation (Macarandang, 2009) in higher education but likewise to generate a new generation of self-directed learners (Sarmiento, 2007) because the modules help students acquire skills, knowledge and information even in the absence of a teacher (Ruguian, 2007). Many studies that were concluded accepted the significance of this theory.

To increase evidences that may suggest effectiveness in using modular approach as compared to the contemporary lecture method that would suit the learning needs of the students under the local setting of Partido State University, San Jose Campus, thus, there emerges the need to evaluate or assess the proposed set of modules utilized in Housekeeping Services for the BSHRM tertiary students during the academic year 2010-2011. Likewise this addressed the University's direction in encouraging the use of innovative and effective research-based pedagogical approaches that would enrich the tertiary curriculum.

Methodology

Research Design. The descriptive-qualitative design was primarily adopted but guided by Macarandang's (2009) work being her major related study. It used two whole HRM-Housekeeping Services classes and since random assignment was inapplicable, the quasi-experimental design was selected. To Trochim (2006), "A quasi-experimental design is one that looks a bit like an experimental design but lacks the key ingredient – random assignment." To Librero (1996) descriptive research "involves describing, analyzing and interpreting the conditions that now exist. It involves some kind of comparison and contrast, and may attempt to discover relationship." The researcher utilized the method in validating and in assessing the characteristics of the modules. Tertiary instructors in HRM validated the modules in terms of specific objectives, content, effectiveness for learning, and evaluation activities.

Procedure. Initially the researcher conducted survey of the target population background purposely focused on the respondents understanding levels as well as in gaining a thorough appreciation of the research. Peer review (Jurors) composed of "Panel of Experts" was initiated to evaluate the drafted modules and questionnaires so that necessary adjustments could be made. Behavioral statements/questions for the Check Yourself (How much do you know?) aspect reflected the module's content that was totally linked to its objectives. These steps were made as a guarantee of the theoretical framework transformation into achievable and measurable knowledge, opinions, perceptions and attitudes (KOPA) based on the identified independent (modules developed and modular approach) and dependent variables (effectiveness of module characteristics and instructional approaches). Validation of the module was done by the tertiary academic faculty but counter validated by the 25BSHRM-Housekeeping Services students of the experimental class. As a whole, validity was established by the "Panel of Experts", by the tertiary academic faculty members, and the experimental class. Pilot testing established the Effectiveness of the modules' characteristics and the modular instruction. According to Radhakrishna reliability indicates the accuracy of the measuring instrument (the modules and assessment instrument). "the pilot test seeks to answer the question; does the questionnaire consistently measure whatever it measures?" Focused interviews further reinforced validity and reliability of the modules and the modular approach. The scholastic gains of the modular (experimental group) and contemporary (control group) instructions in HRM-Housekeeping Services reflected the necessary data that would directly answer questions relative to its effectiveness.

Respondents. The respondents of this study, using purposive sampling, were the seventy-five (75) tertiary BSHRM-Housekeeping Services students and tertiary academic faculty members. This number is distributed among fifty (50) students for the two sections representing the modular (experimental) class and the contemporary (control) group, who were officially enrolled and the twenty-five (25) selected tertiary academic faculty members with regular teaching loads during the academic year 2010-2011. All other instructors on official leave of absence (personal, sick, or scholars) were excluded to participate during this study for obvious reasons. The juniors, comprised of ten (10) experts were excluded.

Table 1. Distribution of Respondents

	N	%	Total	%
Faculty members	25	33.333	25	33.333
Students				
Experimental group	25	33.333	25	33.333
Control group	25	33.333	25	33.333
Grand Total	**75**	**100**	**75**	**100**

Research Instrument. The researcher used four data gathering tools. These are the: (1) Teacher-made assessment checklist, (2) documentary analysis, (3) unstructured interview, and (4) focused interview.

The researcher used the 5 point scale for providing qualitative interpretation:

Scale		**Interpretation**	
5	-	To a very great extent	(TV GE)
4	-	To a great extent	(TGE)
3	-	To a moderate extent	(TME)
2	-	To the least extent	(TLE)
1	-	To the very least extent	(TVLE)

The computed weighted mean is interpreted using Calderon's (2000) range:

Range				**Interpretation**	
4.50	-	above	-	To a very great extent	(TVGE)
3.50	-	4.49	-	To a great extent	(TGE)
2.50	-	3.49	-	To a moderate extent	(TME)
1.50	-	2.49	-	To the very last extent	(TLE)
Below 1.50			-	To the very least extent	TVLE)

Statistical Tools. The data gathered were treated using the simple frequency count and percentage technique, weighted mean, independent t-test, and correlated t-test.

Results and Discussion

Parts and Components of the Modules

There were five modules developed, evaluated, and pilot tested where each module contained fourteen parts. The identification of these parts has passed strict compliance based on the Panel of Experts' corroboration.

Parts of the module. Every module that was pilot tested contained: Program Title, Module number, Module title, Time range, Insights (What this module is about?), Objectives (What is expected to learn?), Instructional activities (Steps needed), Pre-test, Information sheet, Check yourself (How much do you know?), Post-test, Key terms, Key to Correction, and references.

Components of the module. A total of five (5) modules for Housekeeping Services were developed, evaluated, and pilot tested containing 23 lessons.

Table 2. Components of BSHRM-Housekeeping Services Module

Program Title	Module Number	Module Title	Number of Lessons	Time Range
1. Housekeeping Services	1	Housekeeping Organization	5	5 hrs.
2. Housekeeping Services	2	Housekeeping Professional	6	8 hrs.
3. Housekeeping Services	3	Prepare Guestrooms	5	15 hrs.
4.Housekeeping Services	4	Laundry Service	5	7 hrs.
5.Housekeeping Services	5	Valet/Butler Service	2	5 hrs.

Assessment of the Characteristics of the Modules

The essential characteristics of the set of modules that were assessed in this study included the specific objectives of each lesson, the learning content, the language used, the effectiveness for learning, and the evaluation activities.

Comparison on the assessment made between the Housekeeping Services students and academic tertiary faculty members on the different indicators describing the specific objectives, content, language used, effectiveness of learning, and provision for the evaluation activities both groups of respondents manifested in agreement that to a great extent these modules possessed good characteristics, as shown by its composite mean of 4.58; implying high acceptability level by college Housekeeping Services students.

Table 3. Assessment on the Characteristics of the Modules

Characteristics	SA		FMA		CMw	OI
	Mw	QI	Mw	QI		
1. Specific objectives in each lesson in the module	4.63	TVGE	4.54	TVGE	4.58	TVGE
2. Content of the Modules	4.54	TVGE	4.54	TVGE	4.54	TVGE
3. language used in the modules	4.59	TVGE	4.60	TVGE	4.60	TVGE
4. Effectiveness for Learning	4.48	TVGE	4.63	TVGE	4.56	TVGE
5. Evaluation activities	4.64	TVGE	4.56	TVGE	4.60	TVGE
Composite Mean						

Test of difference on the assessment made

The test of difference that was carried out regarding the assessment of the modules' characteristics made between the BSHRM-Housekeeping Service students and the academic faculty members based on the composite weighted mean results using .05 level of significance at 2.26 critical value for most indicators and 2.28 for language used, revealed the following:

a. Specific Objective	-	Not significant	(.070)
b. Content	-	Not significant	(.878)
c. language used	-	Not significant	(.856)
d. Effectiveness of Learning	-	Not significant	(.023)
e. Evaluation Activities	-	Not significant	(.288)

Since all the obtained t-values were found lower than the critical values it showed that no significant difference on the BSHRM-Housekeeping Services students' claim and those of the academic faculty members' assessment on the various characteristics of the modules that were develop. This proved that exposures of the students to the Housekeeping Services modules made them equally aware along with their college instructors in an in-depth understanding of the modules' impact in terms of those observable characteristics. This futher supported the principle that there is ni single methodology that is so effective to the learning process, implying among other that college students may learn through different methods or techniques thereby posing a challenge among college teachers to be more assertive in trying to maximize learning through utilization of effective and innovative modes of instructional intervention.

Table 4. Assessment of the Modules' Characteristics

Indicators	**Mean Score**		**Test of Significance**			
	Students	*Faculty*	*t- Value*	*t- Critical*	*Level of Sig.*	*Finding Conclusion*
Specific Objectives	4.63	4.54	070	2.26	.05	Accept H. Not
Significant Content	4.54	4.54	.878	2.26	.05	Accept H. Not
Significant Language used	4.59	4.60	.856	2.77	.05	Accept H. Not
Significant Effective for Learning	4.48	4.63	0.23	2.26	.05	Accept H. Not
Significant evaluation Activities Significant	4.46	4.56	0.228	2.26	.05	Accept H. Not

Significant Difference between Pre-Posttest gain scores and Summative Test Results

To determine the pre-posttest gain the researcher considered the mean scores for each module between the experimental class and the control group, and also the summative test result.

The posttest mean scores of the experimental group (bold face) showed very much higher than those of the control group (module 2 – 15.64/13.36; module 3 – 31.64/28.20/; module 4 – 17.20/13.64; module 5 – 13.32/9.68; and, summative – 75.88/65.48) except for module 1 where the control group got higher mean score of 29.08 as against 28.88. The computed t-ratios were all greater than the critical t-value or tabular value of 2.064 at .05 probability level; module 1 – 6.085, module 2 – 5.495, module 3 – 8.733, module 4 – 6.490, module 5 – 6.024 and summative test – 6.777. the computed t-ratios of the experimental group, except for module 2, were found higher than the computed t-ratios of the control group.

Table 5. Pre-Posttest Mean Scores in each Module and Summative Test Result

TEST GROUP	Mean Score		GAIN SCORE	t-ratio	Conclusion
	Pretest	*Posttest*			
Module 1 Expt'l	17.88	28.88	11	6.085	Significant
Control	*24.32*	*29.08*	*4.76*	*1.431*	*Not significant*
Module 2 Expt'l	9.52	15.64	6.12	5.495	Significant
Control	*10.40*	*13.36*	*2.96*	*7.689*	*significant*
Module 3 Expt'l	16.56	31.64	15.08	8.733	Significant
Control	*15.76*	*28.20*	*12.44*	*1.2587*	*Not significant*
Module 4 Expt'l	12.48	17.20	4.72	6.490	Significant
Control	*10.84*	*13.64*	*2.80*	*1.388*	*Not significant*
Module 5 Expt'l	7.72	13.32	5.60	6.024	Significant
Control	*7.36*	*9.68*	*2.32*	*1.0819*	*Not significant*
Summative Expt'l	**52.08**	75.88	23.80	6.777	**Significant**
Control	*45.20*	*65.48*	*20.28*	*2.2773*	*significant*

Conclusion/Recommendations

The aforementioned findings indicated that the developed modules proved to be valid and effective learning tools ion the study of the housekeeping services. On such isolated case where the control group got higher t-ratio for module 2, focused and instructed interviews revealed that covertly the control group students were able to avail module 2 of the experimental class; thus, further supported the researcher's claim that the modules were highly satisfactory and valid instructional tools.

On the basis of the findings and conclusions cited it could be recommended that more try-outs are essential. In this manner it would allow ample exposure of the instructors and students to modular instruction thereby gaining strong conclusive evidence, modular instructional mastery and professional expertise. Above all, the usage of the developed modules would not be limited merely to supporting innovative instructional modes but moreover to align students' learning pacing that would eventually improve learning acquirement particularly among absentee students so that by this means it would discourage future drop-outs.

REFERENCES

Goldschmid, Barbara and Marcel L Goldschmid, 1973, Modular Instruction in Higher Education: A reveiew, Elseveir Scientific Publishing Co., Amsterdam, Netherlands. [Accessed: 16 January 2011] http://resources.metapress.com/pdf-preview.axd

Macaramdang, Mercedes A. 2009, "Evaluation of a proposed Set of Modules in Principles and Methods of Teaching," E-International Scientific Research Journal, ISSN: 2094-1749 Vol.1 Issue:1

Sarmiento, Alfie P. 2007, "Learning Modules: Self Learning Kit in Criminology," http://www.rkmfiles.net-aricle/109-learning-modules-self [Accessed: 7 January 2011]

Ruguian, Victoria M. 2007, "Effectiveness of Modularized Instruction in Kinematics," mariano marcos State University science and technology Journal, Volume 1. No. 1, July-December, Batac, Ilocos Norte

Trochim, William M.K 2006, Research Methods Knowledge Base http://www.socialresearchmethods.net/kb/quasiexp.php [Accessed: 16 January 2011]

Calderon, Jose F. 2000, Statistics for Educational research Simplified, Educational Publishing House, Emita, manila, Philippines.

Librero, Felix, 1996, How to write A thesis proposal Some Practical Guidelines, Philippines: Institute of Development communication, UP Los Baños, College of Agriculture, Laguna.

Performance of Students in Food and Beverage Services: An Assessment

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ABSTRACT

The performance analysis is a vital tool to measure the strengths and weaknesses of competency-based instruction. Food and Beverage Services is one among the qualifications that a student taking the BSHRM course has to obtain. To determine the performance level, there is a need to analyze the result of the assessment done by the TESDA Accredited Assessor in Food and Beverages Services and identify if there is a significant impact in terms of enrollment and assessment result.

The significance on the perception of the students served as basis to improve and enhance the program curriculum. The researchers limited their study to students of Partido State University taking BSHRM course for three consecutive years from 2009-2011 following the revised curriculum effective school year 2009-2010 based from CMO No.30 series 2006.

This study gave factual and concrete information on the performance level of the students in food and beverage services along the following objectives: 1. Determine the performance level of the food and beverage students, 2. Analyze the performance level whether there is a significant impact in terms of enrollment and assessment result, and; 3. Identify the competencies necessary to enhance the curriculum.

Findings revealed that the performance level of the students in food and beverage services as assessed by the accredited assessors shows a difference of 21-23% in the total number of enrolment with the number of passers in the assessment.

Comparing the number of passers against the number of takers of the food and beverage services, academic year 2008-2009 had the highest number of assessee while academic year 2009-2010 had the least number of assessee, and that A/Y 2008-2009 had the highest number of passers while A/Y 2010-2011 has the least number of passers. Employing the t-test for independent groups, the result reveals a computed value of 0.85 and the critical value of 2.776, with the degree of freedom of 4, and therefore, the hypothesis is accepted. In terms of the performance level of the students, the significant relationship of the number of enrolment and the number of assessee was analyzed using the Pearson's Moment Correlation. Based from the result the computed value is 0.47 and the critical value is 12.706, the correlation value is 0.42. Thus, there is a moderate relationship between

the number of enrolment and the number of passers. Hence, hypothesis was accepted.

Based from the results, the researchers concluded that performance level of the students in food and beverage services in the assessment has a significant impact on the enrolment. This study further recommends to strengthen the requirements with various activities in food and beverage that will enable the students to be exposed to hands-on training.

Introduction

Food Service is one of the components in hospitality under the Travel and Tourism Industry. This is the major segment in hotels, restaurants and other organizations whose primary concern is to satisfy guest needs and wants. It is one of the famous and fast growing industries in the century.

In response to the adherence of the government, the Partido State University-San Jose Campus has the flagship in tourism and hospitality. As per BOR Resolution # 07 series of 2009, the BSTM and BSHRM Programs were ladderized. Students of the said program are mandated to take an assessment with the qualifications as required in the curriculum.

To thoroughly have a global outlook in food and beverage services, students should acquire knowledge, skills and attitude in Food and Beverage Services. To ensure that students could easily understand what is being done in the actual application to be globally competitive in the market, at the end of the course students were presumed that they must have ample knowledge in Food and Beverage Services, develop their skills and attitude to be a competent and qualified food service attendant.

Competition will be the people skills seeking the highest level, creating the new level of concierge as the world demand to travel improve facility and service quality. (Sec. Ramos, 2012 during the 1st International Hospitality and Tourism Conference.) The result of the assessment done by the Accredited TESDA Assessors from 2009-2012 will be the basis of this study.

Statement of the Problem

The study seeks to assess and analyze the performance of the students in Food and Beverage Services. This critically answers the following questions:

1. What is the enrolment profile of the food and beverage students?
2. Is there a significant impact in terms of enrolment and assessment result?
3. Does performance level of the students affect the number of enrollees?
4. Is there any significance in enrolment and in the result of the assessment?

Significance of the Study

This study will give factual and concrete information on the performance level of the students in food and beverage services. The level of performance of the students will serves as basis to improve and enhance the curriculum of the program.

Scope and Delimitation

In the course of the study, the researchers traced the performance level of the students in food and beverage services procedure. This study is only limited to students of Partido State University-San Jose Campus taking BSHRM course for three consecutive 2009-2010 based from CMO No. 30 series 2006.

The Researchers used the documentary analysis in the study to gather factual and comprehensive data. This method was adopted to find the most evident data that could help enhance the curriculum of study.

Statistical tool

To test and analyze the data presented, t-test and pearson moment correlation was used to find out whether or not the assessment has a great impact in the enrolment.

Result and Discussion

The result and discussion of the data gathered using the appropriate statistical tool was analyzed and presented in each table.

Problem 1 : What is the enrolment profile of food and beverage students?

Table 1 : Enrolment Profile

Indicators	Male	Female	TOTAL
2010-2011	31	66	97
2010-2009	36	73	109
2009-2008	32	74	106

Findings:

Table 1 shows the enrolment profile of the students in food and beverage services, it was noted that 2009-2010 has the highest enrollees with a total of 109 students while 2010-2011 has the lowest enrollees in food and beverage services with a total of 97students.

Conclusion:

The researchers therefore conclude that enrolment in the food and beverage services subject varies effective S/Y 2009-2010 and has a difference of 11%, thus, there is a need to evaluate the enrollees.

Recommendation:

The researcher recommends to reevaluate the admission policy to come up with a certain strategy that will encourage more enrollees.

Table 2 : Enrolment vs. FBS Assessment Result

Indicators	Enrolment		Competent		COC		NAE		Dropped	
	Male	*Female*	*Male*	*Female*	*Male*	*Female*	*Male*	*Female*	*Male*	*Female*
2010-2011	31	66	28	55	2	2	0	2	1	7
2009-2010	36	73	23	61	1	0	8	10	4	2
2008-2009	32	74	25	64	0	1	5	6	2	3
Total	**99**	**213**	**76**	**180**	**3**	**3**	**13**	**18**	**7**	**12**

Findings:

Presented in Table 2 is the enrolment and the assessment result for three consecutive years from 2008-2011. It includes the number of enrollees and number of the students who passed the National Certificate II known as competent in their chosen field; the number of students with Certificate of Competency; the number of students who have not taken yet the assessment examination; and the number of students who failed to pursue their food and beverage services subject.

Based from the data presented in Table 2, it was noted that for three consecutive years there is a difference of 21-23% in the total number of enrolment with the passers in the assessment. Likewise, the indication of COC, having no assessment exam and those students who dropped the subject is a clear indication that needs to be addressed for enhancement.

Conclusion :

It was concluded that there is a need to enhance the strategies to reduce the difference in the total number of enrolment and the number of passers during the assessment.

Recommendations:

It is therefore recommended that faculty should attend trainings and seminars to cope with the innovations and techniques in the field of passion.

Table 3 : Number of Assessee vs. NC II Passers

no.	x-test	y-test	$x - \bar{x}$	$y - \bar{y}$	$(x - \bar{x})^2$	$(y - \bar{y})^2$	
1.	87	83	-0.33	-2.33	0.11	5.44	
2.	85	84	-2.33	-1.33	5.44	1.78	
3.	90	89	2.67	3.67	7.11	13.44	
Total	262	256			12.67	20.67	
Mean	87.33	85.33					

$$t = \frac{\bar{x} - \bar{y}}{\sqrt{\left[\frac{\Sigma(x - \bar{x})^2 + \Sigma(y - \bar{y})^2}{n_1 + n_2 - 2}\right]\left[\frac{1}{n_1} + \frac{1}{n_2}\right]}}$$

$= 0.85$

0.05 two tails

df = 4

u = 0

Table 3 shows the number of assessee and the number of students who passed the Assessment in Food and Beverage Services NCII, Item No. 3 covers the school year 2008-2009 which has the highest number of assessee while Item No. 2 covers the school year 2009-2010 which has the least number of assessee, and that Item No. 3 had the highest No. of Passers while Item No. 1 has the least number of passers. Applying the statistical tool using the t-test for independent groups, the result reveals a computed value of 0.85 and the critical value is 2.776, with the degree of freedom of 4, and therefore, the hypothesis is accepted.

Conclusion: It was concluded that the performance level of the students in food and beverage services affects the assessment result.

Recommendation:

It is therefore recommended that performance level of the students be the basis to strengthen the learning approach to cope with the standard set for every qualification.

Table 4. No. Enrolment vs No. Passers

no.	code	x-test	y-test	x^2	y^2	xy	
1.	00001	106	89	11236	7921	9434	
2.	00002	109	84	11881	7056	9156	
3.	00003	97	83	9409	6889	8051	
Total		312.00	256.00	32,526.00	21,866.00	26,641.00	

$$r_{xy} = \frac{n\ \Sigma xy - \Sigma x\ \Sigma y}{\sqrt{[n\ \Sigma x^2 - (\Sigma x)^2]\,[n\ \Sigma y^2 - (\Sigma y)^2]}}$$

$= 0.42$ $\quad r^2 = 0.18$

$$t = \frac{r}{\sqrt{\frac{1-r^2}{n-2}}}$$

$= 0.47$

0.05 two tai

n =

df =

Table 4 presents the significant relationship of the number of enrolment and the number of assessee in analyzing the performance level of the students using the pearson moment correlation. Based from the result the computed value is .47 and the critical value is 12.706, the correlation value is .42, therefore there is a moderate relationship, hence, hypothesis is accepted.

Conclusion:

We therefore conclude that the performance of the students has a strong relationship with the number of enrolment per school year.

Recommendation:

Based from the findings and conclusion, the researchers therefore recommend to maintain the standard and deeply give attention to those students with low performance.

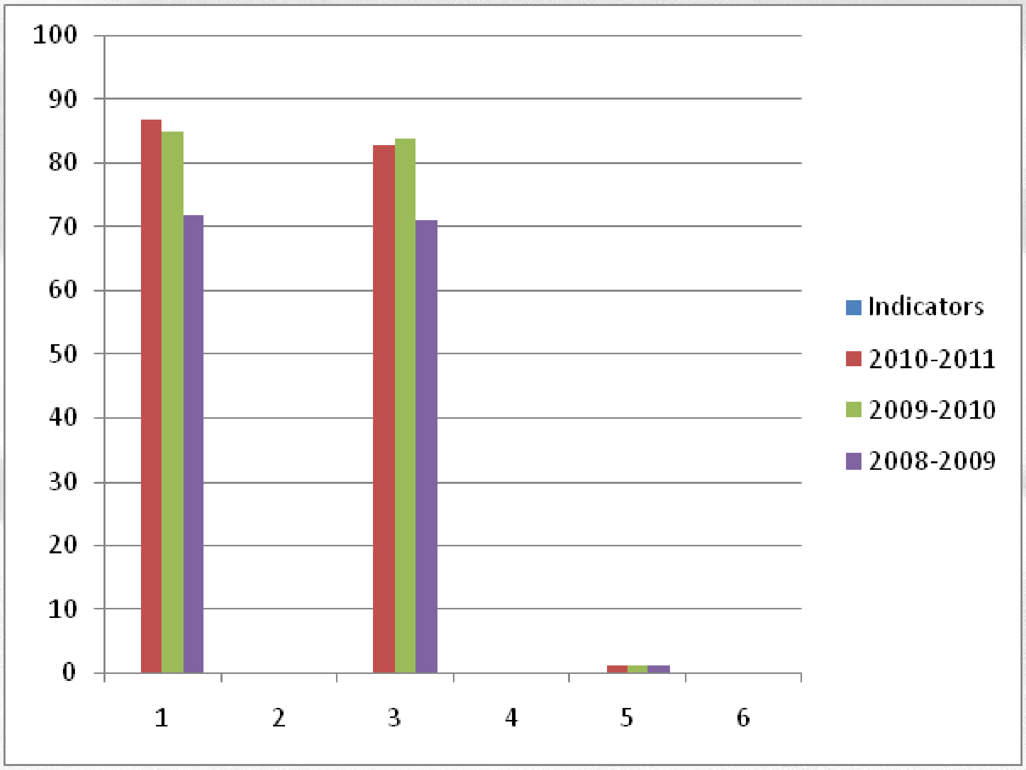

Figure 1. **The number of Assessee and the number of NC II passers**

REFERENCES

Roldan, Amelia. Food Service and Bartending

Roldan, Amelia. Restaurant Operation and Management

Andrews, Sudhir. Food and Beverage Management

TESDA Training Regulation for Food and Beverage Services NCII

Improving Professional Education Learning Outcomes through L1- Mother Tongue-Based Instruction

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ABSTRACT

Language is the key to communication and understanding in the classroom. While there are many factors in delivering quality basic education, the use of language is undoubtedly important for it promotes learning.

This action research investigated the influence of Mother Tongue based instruction on the students' professional education performance. It specifically sought answers to the following questions:

1. **What is the students' Professional Education pretest performance before using L1- Mother Tongue Bilingual instruction?**
2. **What is the students' Professional Education posttest performance after using L1- Mother Tongue Bilingual instruction?**
3. **Is there a significant difference between the Professional Education pretest and posttest performance using L1- Mother Tongue Bilingual instruction?**

Using the quasi-experimental design, thirty-five (35) education students who were purposively selected, participated in the study. Validated researcher-made instruments, a 45-item test on Professional Education and a questionnaire on students' attitude towards the use of L1 in the classroom were used to gather data. The experiment was done in two months where the students act as facilitators of learning in mother tongue or first language. Mean, standard deviation, and t-test were used as statistical techniques.

Findings revealed that participants manifested a good pretest and posttest performance, however, t-test results showed that a significant difference existed between their pretest and posttest performance. The use of mother tongue bilingual instruction had improved their professional education performance.

Keywords: **Professional Education, Learning Outcomes, Mother Tongue-Based Instruction**

Introduction

Language is the key to communication and understanding in the classroom. While there are many factors in delivering quality basic education, the use of language is undoubtedly important for it promotes learning. It is through language that people develop thoughts, shape experiences, explore customs, structure the community, construct laws, articulate values, and give expression to hopes and ideas.

English as second language is necessary, however, the students' first language is still considered as one way to bring them to better comprehension of the concepts and recall of ideas during the classroom interaction. The students' use of mother tongue as bilingual education helps students to learn. 'Mother Tongue is a common language that is freely and comfortably spoken by adult generation both at home and outside to their successors in a community and reflect one's culture and ethnic backgrounds. It is the means by which different groups within the society maintain their identities (Senadeera, n.d.).

According to Boonroj (2010), one way to achieve the goal of education is by delivering childhood and primary education through mother tongue. Mother Tongue based education starts from where the learners are and from what they already know or learning to speak, read, write and think in their first language (Nolasco, 2011).

While teaching in the mother tongue for the first six years makes children better language learners, introducing other languages also improves the students' skills in the mother tongue. Students from bilingual programs outperformed students in monolingual programs, even when the monolingual programs were instructed in the mother tongue. Furthermore, studies show that students who receive instruction in their mother tongues become more successful second language learners (http://language magazine.com/?page_id=3164).

Bolitho (1983 in Ferrer, n.d) points out that at some stage in teaching, teachers have to allow the learners to say what they want to say, and to allow them sometimes to use their mother tongue. Without mother-tongue education, every child's right to learn, to become a skilful adult, and able to participate independently in society, is at risk (Churr, 2013).

The present Philippine government integrates Mother Tongue Based Multilingual Education (MTBMLE) as a main component of the new K-12 Law (RA 10533). Such education reform initiative recognizes the learner's language and knowledge system as effective starting points for further learning. Success in education requires a relevant curriculum that can be taught and learned in a local language and builds upon the knowledge and experience of the teachers and learners (Iverson E. Danish Education Network, 2008).

Research has shown that mother tongue-based schooling significantly improves learning. Educational theories suggest that children learn best from a familiar starting point. Learning should begin with what a child knows and understands. Thus, children learn best when using a language they speak and understand well. Learning to read and write is easier in a familiar language and academic concepts are best learned and understood through their first language. Using the Mother Tongue first builds a strong foundation in both language learning and concept learning and provides a good bridge to the second and third languages.

Based on the theoretical underpinnings, assumptions, and findings in researches, the use of the mother tongue is very substantial and significant in the total learning process.

Wolff (2011) articulated that language is not everything in education but without language, everything is nothing in education (Rinon and Miraflor, n.d.). Teachers, therefore, should not prevent learners to shift to the mother tongue when they cannot express their ideas. Dorngei and Kormos' (1998). As Nguyen, Thi, Thanh Nhan's (2010) emphasized that the use of the mother tongue, as the language in instruction, does not hinder learning.

One of the first and main advocates of mother tongue use in the communicative classroom has been David Atkinson (1987 and 1993). Atkinson points out the methodological gap in the literature concerning the use of the mother tongue and argues a case in favour of its restricted and principled use mainly in accuracy-oriented tasks.

His views, however, are reflections of his own personal experience as a teacher and not the result of measures of comparative achievements of students taught in different ways or of perception-based surveys. The present study aimed to investigate the effects of mother tongue instruction on the students' learning outcomes in Professional Ed subject- Social Dimensions of Education. The study, particularly sought answers to the following questions:

1. What is the students' pretest performance in Professional Education subject before using the Mother Tongue Bilingual instruction?
2. What is the students' posttest performance in Professional Education after using the Mother Tongue Bilingual instruction?
3. Is there a significant difference between the pretest and posttest performance in Professional Education subject before using the Mother Tongue Bilingual instruction?
4. Is there a significant difference between the pretest and posttest performance in Professional Education subject after using the Mother Tongue Bilingual instruction?

Methodology

This quasi- experimental study aimed to investigate the effects of Mother Tongue Bilingual instruction on the students' learning outcomes in Professional Education subject. A comparison group pre-test/post-test design (O1 X O2 O1 O2) was used where the performance in Professional Education subject of the same group, before and after the intervention, was determined and compared. Quasi-experimental design is the same as the classic controlled experimental design except that the subjects cannot be randomly assigned to either the experimental or the control group, or the researcher cannot control which group will get the treatment (http://www.csulb.edu/ ~msaintg/ppa696/ 696quasi.htm).

The participants of the study included the thirty-five (35) Education students of Southern Iloilo Polytechnic College-Western Visayas College of Science and Technology, Miagao Campus, Miagao, Iloilo, Philippines. Purposive sampling was used in the study. The group composed of three different majors - BSEd Social Studies, Math, and Filipino and taking Education 11- Social Dimensions of Education subject, was purposively chosen as the participants of the study. The independent variable was the use of L1- students' first language or mother tongue known as " kinaray-a" as language medium in teaching the Social Dimension of Education subject. The dependent variable was the students' performance in Education 11- Social Dimensions of Education. Their performance in recalling and understanding the concepts in the subject was determined.

The instrument used was the 45 item teacher made- test. The items which include the different concepts and its applications were validated by the panel of jurors who teach Professional Education subject. It was retested among the students who took the same subject for the reliability and time element of the conduct. Data collection was divided into these phases: pretest/posttest preparation and validation, sampling selection, pre-teaching, implementation of the eight -week lecture, and post-teaching. After the test was prepared and validated, the students were given the pretest and posttest. The group was taught using the mother tongue for eight weeks. The students were grouped according to the assigned topics. Each group was given the time to discuss the topics in mother tongue bilingual teaching. The interaction was also done in mother-tongue bilingual method. Students were free to discuss in their native tongue, "kinaray-a". After the eight-week lectures, the students were given the posttest. The students were also made to prepare an individual journal where they can write their perception and feelings about the use of mother tongue bilingual teaching. Data were analyzed and evaluated using the appropriate statistical processing techniques.

The data gathered for this study were subjected to appropriate computer-processed statistics as the mean, standard deviation, and t-test.

Results

The following tables show the descriptive data analysis and interpretation of results on the participants' pre and post-intervention performance in Professional Education.

Table 1. **Students' Pretest Performance Prior to MTBI**

	N	Mean	SD	Description
Pre-test	32	22.69	4.61	Good

The table shows that the participants had a good pretest performance in Professional Education subject before using the Mother Tongue Bilingual instruction, (M=22. 69, SD = 4.16).

Table 2. **Students' –Post-test Performance using MTBI**

	N	Mean	SD	Description
Post-test	32	25.72	5.71	Good

After the intervention, with the use of Mother Tongue Bilingual instruction, the students' performance was good, (M=25.72 SD = 5.71) . This reveals that the students maintained their performance with the use of mother tongue bilingual instruction.

Table 3. **T-test results on the Participants' Pre-and Post Professional Education Performance and Mother Tongue Based Instruction**

	N	Mean	sd	df	p value	Remarks
Pre-test	32	22.69	4.61	31	0.000	Significant
Post-test	32	25.72	5.71			

p-value<0.05*(significant)

Table 3 shows the pre-test and post-test performance in Professional Education subject of the participants prior to and after using the Mother Tongue Based Instruction. Results in Table 3 revealed that the p-value of 0.000 is less than the probability value of 0.05, hence, a significant difference existed between the pretest and posttest performance in Professional Education subject of the participants with the use of Mother Tongue Bilingual instruction. The null hypothesis which states that there was no significant difference between the pretest and posttest Professional Education performance of the students using the Mother Tongue Bilingual instruction, was rejected.

Findings

The participants manifested a good performance in Social Dimensions of Education subject prior to the use of the Tongue Bilingual instruction. After the intervention, using the mother tongue - the kinaray-a during the discussion, the students still showed a good performance. However, with the big increase in the mean scores, t- test results showed that a significant difference existed between the participants' pretest and posttest performance in the Social Dimension subject. This means that the use of mother tongue has contributed to the improved performance of the students in recalling and applying of concepts in Social Dimensions of Education subject.

Concluding Observations

The use of the first language especially in the early years of the child in school is important. In college, as students tackle higher learning, mother tongue based bilingual instruction must be considered. In the current study, the use of L1 or "kinaray-a" during the discussion improved the students' performance in acquiring knowledge and concepts in the professional education subject, specifically, Social Dimensions of Education. Students showed a favourable attitude and response to the use of mother tongue, as manifested in the enhanced performance in the subject. There are areas which showed a positive response of the students especially on the understanding and recalling of concepts and issues, aside from the confidence they have gained while expressing themselves in the first language. The acquisition of knowledge and reasoning are the instruments for bringing about intellectual development which are possible through language, or the mother-tongue of the students (Dushi, 2012). The use of mother tongue has boosted confidence and academic performance. It is a key factor for education and the success of other development efforts (Boonroj, 2010).

The use of the Mother tongue in carefully crafted techniques can be twice as efficient, that is, reaching the same level of second language proficiency in half the time, without any loss in effectiveness, as instruction that ignores the students' native language (Hammerly, 1991 in Butzkamm, 2003).

Implications

The findings, based on the use of mother tongue, particularly the use of the native language like kinaray-a, may have implications for policies regarding the medium of instruction in improving the students' recall and understanding of concepts in Professional Education subject. The teaching of the mother tongue is important because on it depends the growth of the learners – intellect, knowledge, expression, creativity and productivity.

Mother Tongue based education, should, therefore, start from where the learners are and from what they already know or learning to speak, read, write and think in their first language (Nolasco, 2011).

The use of mother tongue must be promoted in school, that is, using it in a bilingual education program, in the acquisition of the concepts, language, and literacy (Cummins, 2013),

Becoming literate and fluent in the first language is important for overall language and cognitive development, as well as academic achievement (Ball, 2010).

Recommendations

The use of mother tongue bilingual based instruction may be promoted in learning profession education concepts in the classroom. Benefits may be derived out of the use of the students' first language since, it gives them the opportunity to recall better the ideas and concepts as they express themselves freely with confidence and ease.

The instructors or professors may allow students to use the mother tongue at the students' convenience since, learning is more productive if they are free from pressures of understanding the grammar or vocabulary of the language while presenting or expressing their ideas and knowledge.

Classroom discussions appear to be more interesting while students use the first language or in bilingual way for they can express themselves meaningfully.

The use of mother tongue may be effective in other areas or subjects of interest, which the researcher find useful or beneficial. Follow-up studies may be conducted to prove its effectiveness in students' performance, competence, and other skills in different fields.

REFERENCES

Aquino, G. (1988). Principles and methods of effective teaching. Manila: National Book Store, Inc.

Balce, M. E. (2010). Teaching quality Science Education in Filipino. Retrieved January 17, 2014 from http://mlephil.wordpress.com/2010/02/26/teaching-quality-science-education-in- filipino/.

Boonroj, (1020). Use of mother tongue vital, studies show. Retrieved January 12, 2014 from http://www.nationmultimedia.com/home/2010/11/15/national/Use-of-mother-tongue-vital- studies-show-30142230.html.

Butzkamm, W. (2003). We only learn language once. The role of the mother tongue in FL classrooms: death of a dogma. Retrieved March 19, 2014 from ttp://www.fremds prachendidaktik.rwth-aachen.de/Ww/programmatisches/pachl.html.

Calderon, J. (1998). Foundations of Education. Manila: Rex Book Store. CHED Memo. No. 30, s. 2004. Revised policies and standards for undergraduate teacher education program.

Churr, C. (2013).The right to mother-tongue education : practicable or not? Retrieved January 17, 2014 from http://reference.sabinet.co.za/sa_epublication_article/obiter_v34_n2_a6.

Cummins, J. (2013). Bilingual children's mother tongue: why is it important for education? Retrieved January 18, 2014 from http://iteachilearn.org/cummins/mother.htm.

Dekker, D. Et al (2010) Mother tongue based multilingual education and classroom strategies Retrieved January17, 2014 from http://mlephil.wordpress.com/2010/03/04/mother-tongue-based-multilingual-education-and-classroom-strategies/.

Deller, S. and Rinvolucri, M. (2004). Using mother tongue. Retrieved January 15, 2014 from http://www.tefl.net/reviews/using-mother-tongue.htm.

Dushi, G. (2012). Importance of teaching mother-tongue to a child> Retrieved January 18, 2014 from http://www.preservearticles.com/2012010920340/importance-of-teaching-mother-tongue-to-a-child.html.

Ferrer, V. (2002).Using the mother tongue to promote noticing: translation as a way of scaffolding learner language. Retrieved January 16, 2014 from http://www.teachenglishworldwide.com /Articles/Ferrer_mother%20tongue%20to%20promote%20noticing.pdf.

Grolier New Webster Dictionary (1992). USA: Grolier, Inc.

Iverson E. (2008). Mother tongue as bilingual education. Danish Education Network. Retrieved January 10, 2014 from http://uddannelsesnetvaerket.ngoforum.dk/rdb/1205421604.pdf.

Kavaliauskienė, G. (2009). Role of mother tongue in learning English for specific purposes. ESP World, Issue 1 (22), Volume 8, 2009, Retrieved January 15, 2014 from http://www.esp-world.info.

Legendre, J., et al. (2006). The place of mother tongue in school education. Retrieved January 18, 2014 from http://assembly.coe.int/ASP/Doc/XrefViewHTML.asp?FileID=11142 &Language=EN.

Marzook M. Alshammari, M. M. (2011). The use of the mother tongue In Saudi EFL. Classrooms Retrieved January 17, 2014 from http://journals.cluteonline.com/index.php/JIER /article/ view/6055.

Ndamba, G. T. (2008). Mother tongue usage in learning: an examination of language Retrieved January 1 6 , 2014 from http://www.jpanafrican.com/docs/ vol2no4/2.4_Mother_ Tongue _Usage _in_Learning.pdf.

Nhan, N. T. (2010). Students' use of mother tongue in Theefl speaking class: a case multiple case study of freshmen students at Felte, Ulis, Vnuh. Retrieved January 16, 2014 from www.scribd.com/doc/32025889.

Nolasco, R. M. D. (2010). Why children learn better while using mother tongue. Philippine Daily Inquirer Family, Social Issues. Retrieved January 17, 2014 .from http://opinion.inquirer. net/inquireropinion/columns/view/20100910-291594/Why-children-learn-better-while-using- mother-tongue.

Nordquist, R. (n.d.). Mother tongue. Retrieved March 18, 2014 from http://grammar.about. com/od/mo/g/mothertongueterm.htm.

Oluwole, D. A. (2008). Impact of mother tongue on students' achievement in English language in Junior Secondary Certificate Examination in Western Nigeria. Retrieved January 18, 2014 from http://www.academia.edu/2436342/The_Impact_of_ Mother _Tongue _on Students_Achievement_in_English_Language_ in_ Junior Secondary_Certificate Examination_in_Western_Nigeria.

Paulson, R. (2011).Mother tongue-based multilingual education (MTBMLE) in the Philippines: The effects of training on teacher attitudes towards mother tongue instruction. Retrieved January 17, 2014 from http://citation.allacademic.com/meta/p493028_index. html.

Pflepsen, A. (2011). Improving learning Outcomes through Mother Tongue-Based Education. Retrieved January 15, 2014 from http://www.rti.org/brochures/eddata_ii _mother _tongue_ instruction.pdf.

Rinon, B. B. et al. (n.d.). Teaching literature in the mother tongue: its impact on the learning process and appreciation of one's culture. Retrieved January 17, 2017, 2014 from http://www. spumanila .edu.ph/data/FICL/FICL%20 Presentations/CS4%20.

Senadeera, S. (n.d.). Importance of learning of the mother tongue in an adopted country. Retrieved January 18, 2014 fromhttp://www.tamilsydney.com/content/view/122/37/.

http://mother-tongue-development.wikispaces.com/.
http://grammar. about.com/od/mo/g/mothertongueterm.htm.

http://www.rti.org/brochures/eddata_ii_mother_tongue_instruction.pdf

Impact of Social Environment on Student Integration and First-year Academic Performance: Case Study

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ABSTRACT

Since the selection of the University is a balanced choice for most of the students, the first semester is a reality test to confront the choice with the reality. In a Case Study in Lebanon this article compares the findings of two distinct research methods to analyze retention rate. First, a cross analysis between Spring students' status as dropped-out, retained, but change of major, and retained in the same major and their previous answers in their Fall Admission survey identifies criteria of a sub population at risk based on the social criteria influencing a student to select his/her University, along with student social environment during the first year: proximity to home, friends, part time job, grant… Second, the retention of students is analyzed along several factors: chosen major, admission score, commuting time and three, social integration criteria: sport activities, in the dorms (or not), and number of classmates from ones High Schools. Our findings confirm our hypothesis of the impact of the social integration criteria in the retention rate along others factors more commonly identified in the literature.

Key words: **retention rate; social environment; first-year integration**

Literature review of University selection models

Several conceptual models tried to strictly measure the quality of an institution, but others tried to integer all aspects of student choices. As a synthesis of the criteria developed by Keith (2001) and Benjamin and Hersh (2002), several criteria enter into consideration to define performance indicators of the capacity of a university. The conceptual model considers three dimensions: Student selectivity, teaching capacity and research capacity. Even though those performance indicators measure capacity of an institution, they do not measure directly the value added of the university as defined by Harvey and Green (1993) as per the knowledge, skills, and competencies that students develop as a result of their education. As an incentive to choose a university Diamond et al. (2012) has developed a conceptual model based on previous works. On the benefit side, she distinguishes the academic reputation, employment opportunities of the program, and course and career interest when on the costs side, she considers distance from home and daily commuting effort, the direct and indirect tuition costs and the opportunity to have financial aids.

Several case studies have been presented to identify major trends in choosing a university. In the USA, distance from home tends to be ranked higher by students from lower socio-economic groups (Diamond et al., 2012). Pryor et al. (2012) have the following findings on the CIRP survey across the USA. Less than 20% of the students live with their family or relatives. On the contrary, less than 10% of our students are living in the University dorms. Students who plan to live at home also have different reasons for choosing their particular University than students in dorms. Students living at home have the following pattern: it was very important to live near home (49%), their parents wanted them to attend this University (23.3% vs. 13.2%), the tuition cost was a significant reason to attend their University (57.3% vs. 40.1%) and they are less likely to finance their first-year expenses through loans (48.7% vs. 62.3%) but rather will prefer to have a job (55.6% vs. 47.8%) including full-time jobs (14% vs. 5.9%). Furthermore Pryor et al. (2012) have identified that scholarships and grants decrease, and student loan increase. Nauffal and Nasser (2007) have focused their work on Lebanese students as stakeholders and on their perceptions of quality in higher education comparing French and American Education. Francophone and Anglophone institutions share quality of academic services. Nauffal et al. (2007) findings reflect to some degree that the concerns of management at the Francophone university are essentially the knowledge formation of students although the Anglophone institution concerns include the mental and physical development of the students with more integrated student affairs bodies.

Literature review of first-year attrition rate

Darlaston-Jones et al. (2001) worked on the psychological and social impact of the transition to university, which can sometimes lead to failures. The choice of the major is most of the time due to the support and sometimes the environmental pressure or, on the contrary, because it is an indirect way to oppose a certain family tradition. Since the selection of the University is a balanced choice for most of the students, the first semester is a reality test to confront the choice with the reality. The environment change challenges the adaptability of the students. In extreme cases, anxiety can lead to a sort of mental paralysis or anesthesia. A successful orientation is based on an accurate representation of life at the university, on the development of centers of interests and more essentially on the adjusted self-perception of the success in the university.

How to conceptualize students' thoughts and opinions as expectations in order to define their persistence? Anderson (1982) distinguishes between forces that promote persistence generally and those that promote academic achievement. Three theories provide a framework on retention: Astin's conceptual model of input-environment-outcome (I-E-O) (Astin, 1975), Tinto's Student Integration Model (Tinto, 1993) and Beans' Student Attrition Model (Bean, 1982). Bean developed a model along three factors individual (motivational factors), environmental (student background factors), and institutional factors (academic performance). Those frameworks are not entirely overlapping to explain students' persistence. Based on Beans' Model, the expectancies framework defined by Bank et al. (1992) segregate expectations such as self-labels, own norms and attributed norms from other social expectancies. Those expectations are better predictors of students' persistence rather than social expectancies. Some cases studies have found interesting results based on those conceptual models. Based on Astin's conceptual model of input-environment-outcome (I-E-O), Lewallen (1993) found that being undecided about major choice or career choice was not significantly associated with persistence. Berger and Milem (1999) have confirmed the importance of student integration with peers and professors based on a conceptual model inspired by Astin's and Tinto's models. This case study reflects Brawer (1996) suggestion to implement student retention strategies including mentoring in order to improve retention rates within the Northern American context.

As an incentive to drop out of university, one of the findings of Krause (2005), considering first year retention rates in an Australian institution, was that a greater proportion of low socio economic students are dropping out than other categories. Hare (2010) identified key reasons in the Australian context to improve the retention rate, it is much cheaper to retain a student rather than to find a new one in addition there are negative psychological and emotional costs to be taken into consideration. Paramita (2011) has analyzed Student Transition Rates in an Australian Higher Education Institution and has identified the following results: Part-time students sustained a greater attrition rate than full time students; Senior students experienced lower attrition rate than other commencing students; Postgraduate students had higher attrition rate than undergraduates; Domestic students sustained greater attrition rate than international students; Students majoring in Education experienced lower attrition rate than other fields

Our Case Study

This work focuses on the first-year retention considered in the context of a private university located in Lebanon. Nasser (2007) have studied the worthiness and effectiveness of mathematical remedial courses in the same University: one of the findings was the impact of the remedial courses on the attrition rate. In our previous work (Khalil, 2013) we couldn't identify an inflation in the historical GPA abundantly studied by the literature since 2007 until now. Following the different definition of retention rates proposed by Paramita (2011), our work makes the distinction between dropped-outs (the students who leave the university), retained inside the university, but change of major, and retained in the same major.

This study examines patterns of attrition in two ways. First, qualitative data collected from an 2013'Entry survey were analyzed and categorized into themes and cross-tabulated with dropped-outs, retained, but change of major, and retained in the same major students. Specifically, two research questions were addressed: (1) what were the primary reasons of dropped-out students to choose the university and the major? And (2) in what ways are the students who dropped out or changed major significantly different from the students retained in the same major? Second, 2006-2012 institutional data were used to compare drop-outs students with retained students in this period. The retention of students is analyzed along several factors: Chosen major, admission score, commuting time and third, social integration criteria: sport activities, in the dorms (or not), and number of classmates from their high schools. Our findings confirm our hypothesis of the impact of the social integration criteria on the retention rate. Students with an oppressing social environment (difficulties to pay the tuition, loneliness, and long commuting time) are giving up more easily the University than other students.

Part 1 Entry survey: Impact of social criteria influencing student decision

In Lebanon, the choice of university is driven by the language of study (English, French or Arabic), the nature of the degrees offered, the quality of the education, the cost, the cultural and religious adhesion and safety (Nauffal, 2007). The civil wars surround Lebanon with the increasing number of refugees from Syria and Palestine have an economic and safety impact on student decision to choose a university.

Methodology

Instrumentation

A questionnaire was adapted from the 47th annual Cooperative Institutional Research Program (CIRP) Freshman Survey (Pryor et al., 2012) which described the benefits incoming students see in attending the university and considerations in deciding which university to attend. The list of criteria was further modified through discussions with the admissions' director and associated admissions personnel plus a review of the literature. To qualify the initial set of criteria, a preliminary survey was conducted on a pilot of several sophomore students. This questioning process produced a final list of criteria. While not exhaustive, these criteria are thought to be the most commonly used by prospective students and their parents. The final questionnaire was then designed to determine the relative importance of these criteria.

The Entry Survey offers an online way to survey students as they enter their major and gather information that helps measuring the perceptions and expectations of the newly admitted students. Respondents were asked to rate in importance each criteria on a seven-point scale where a "7" was extremely important. The distance between each attribute is assumed equal intervals and therefore the quantitative measures assigned to the qualitative attributes will be used in parametric tests. This study was based on the Fall 2013 entry survey which was conducted on the cohort 2013 during October and November 2013. The reliability of the scale was measured with Cronbach's alpha, Cronbach's alpha was in the acceptable range of .92, across the main dimensions of the study. The response ratio of 21 % was high enough to ensure a confidence level of 95% and a margin of error of 6%.

Treatment of Data

In Blue System (Explorance), the results of Fall 2013 was populated with the Spring 2013 demographics of dropped-outs, retained, but change of major, and retained in the same major students. SPSS version 11.5 was used in processing the data for ease and accuracy. Correlations, means and standard deviations; and Chi2-test were used to find and compare the perceptions of the actual /expected values in the university.

Key findings of the entry survey compared with the CIRP Freshman Survey

As a preliminary analysis of the survey, we identified and analyzed four pairs of correlated answers with a high Pearson correlation ($P< 0.01$) (2-tailed).

In the first bloc of questions related to influencers "friends" and "classmates" are highly correlated $R2= 0.67$. In the second bloc of questions related to the choice of the University the "quality of the programs" and the "professionalism" are highly correlated $R2= 0.66$. In the last bloc of questions related to the choice of majors, two opposite groups of factors have been identified. The "interest in the programs" and the "belief in good career opportunities" are highly correlated $R2= 0.66$. The "intention to transfer to another major" and the fact that "their entrance exam limited their options" are highly correlated $R2= 0.65$. Logically, the "interest in the programs" and the "belief in good career opportunities" versus "the intention to transfer to another major" and the fact that their "entrance exam limited their options" negatively correlate ($R2= -0.33$).

Referring to the findings of Pryor et al. (2012), in our case study our student profile is different from US student profile. Mainly, the majority of the students (90%) are at home contrary to the CIRP Freshman Survey results. Students in dorms and at home are similarly using loans or family resources to finance their education. Students living with family are 60% likely to be pursuing their degree while balancing work responsibilities, when 80% in dorms are planning to get a job to help pay for education expenses. The level of students working full-time (13%) is similar to the US level (14%). Similarly to CIRP Freshman Survey findings, results of the entry survey of students showed that parents (76%), along with other family, classmates and friends (46%), were the most influential sources of information. Furthermore beside personal contacts, a student's visit to campus was influential (25%).

Our questionnaire made a distinction between three levels of child-parent interaction: general parents' influence, the fact that parents influence the choice of the university and the fact that parents decide the major of their children. Even 76% of the students discussed their choice with their parents, only 35% of them considered that their parents have an influence in the choice of their University and only 14% of the students acknowledged that they choose their major because their parents wanted it.

Following the model proposed by Diamond et al. (2012), our findings are similar to Diamond's works. Most of the students (85%) consider quality and reputation as the most benefit along with accessibility and safety (64%). Regarding financial issues, financial aids (65%) are seen as more important that tuition fees (53%) themselves. Since the survey was not covering graduate students, we couldn't compare the undergraduate expectations with graduate expectations.

Cross analysis of the Entry Survey with retention factors

Using Blue software we repopulate the Fall 2013 survey with additional demographics of Spring 2014 divided into three groups identifying dropped-outs, retained, but change of major, and retained in the same major..

We have done two similar analyses to cross analyze the survey. All criteria of the questionnaire were ranked based on a Chi2-Test to identify the dependence and independence with dropped-outs, retained, but change of major students versus retained in the same major students. Due to the small number of dropped-outs, we had to regroup dropped-outs, retained, but change of major students to calculate a Chi2-Test. Then we performed a Pearson Correlation for each group of students.

The decision to drop out, remain, but change of major, and remain in the same major is independent from the choice to work for financing the education (Chi2 (2, 282) = 0.74 $p<0.05$) and from the fact that the University was their first choice or not (Chi2(2, 282) = 0.10 $p<0.05$). Furthermore, the discussions of joining the University with parents, friends and others relatives are steadily independent from the decision to drop out, remain, but change of major, and remained in the same major (Chi2(2, 282) ~3 $p<0.05$).

Cost, financial aids and faculty reputation are considered to be more important by dropped-outs, and retained, but change of major students in evaluating the educational product. Dropped-outs, and retained, but change of major students are more influenced by far by the cost of the tuition fees (Chi2(2, 282) =19 $p<0.05$) and by the possibility of receiving financial aids. Along with the findings of Nauffal (2007), dropped-outs, and retained, but change of major students have a higher expectation than retained in the same major students on the professionalism of the instructors (Chi2(2, 282) =6 $p<0.05$) and are challenging the value for money. Finally they are less influenced by parents and classmates.

Dropped-outs, and retained, but change of major students are significantly (Chi2(2, 282) =13 $p<0.05$) more among those who choose their major "because their entrance exam limited their options", and among those who are already (after only two months at the University) "expecting to transfer to another major as soon as possible" (Chi2(2, 282) =9 $p<0.05$).

To confirm those results and to be able to segregate behavioral factors for dropped-outs, and retained, but change of major students, we operated on those two groups a Pearson Correlation. The sub-group of dropped-outs was identified with a significant Pearson correlation at the 0.01 level (2-tailed) with the fact that entrance exam limited their options (R2=0.163), and incidentally that they are expecting to transfer to another major (R2=-0.121). The fact that parents choose the major (R2=-0.110) was less significant but still highly correlated among the 24 criteria used. The cost of the tuition is of less influence in the decision to drop out (R2=-.064). The sub-group of retained, but change of major students was identified with a significant Pearson correlation at the 0.01 level (2-tailed) with a high importance of the cost of tuition fees (R2=.207), and on less significant base at the 0.05 level (2-tailed) with the influence of their parents (R2=.149) and their classmates on their initial decision (R2=0.139).

Logistic regression model including previous predictors

Logistic regression was used to predict "drop-out or change of major" decision from a set of twenty two predictor variables. Our first logistic regression model is based on eight predictors related to the cost of education ("sensitive to tuition costs", "sensitive to financial aids", and "intend to take a student loan"), to the level of the student ("my entrance exam limited my options", "intent to transfer to another major"), to the influencers ("influenced by classmates", "my parents choose my major") and to the social integration ("interest in Sports"). It had a -2 Log Likelihood statistic of 200 and a Cox & Snell R Square of .092. The sensitivity of prediction of drop-out or change of major is 7.5 %, and the specificity of prediction is 98.7%; the overall success rate in classification is 85.2%. As a first strategy, it may be particularly important to understand the differential needs of students who are under their parent's pressure and frustrated to have chosen to enter a reputable university but not in their expected major and are planning to change. This issue is more central for students from low-income family where the cost of the tuition fee as a return on investment is critical.

A more performing logistic regression model is based on three predictors: two variables from the responses ("my entrance exam limited my options", "sensitive to tuition costs"), and one demographic variable ("enrolled in a Small Major"). It had a -2 Log Likelihood statistic of 192 and a Cox & Snell R Square of .120. The sensitivity of prediction of drop-out or change of major is 27.5 %, and the specificity of prediction is 98.7%; the overall success rate in classification is 88.2%. A strategy to improve the retention rate could be to closely monitor the sub group at risk of students who are frustrated to have chosen to enter a reputable university but not in the major and are planning to change. Almost 77% of the students who choose their major "because their entrance exam limited their options" are expecting to transfer, and effectively only 30% of them did a transfer or left the University after the first semester. In comparison, only 7% of the students who have got their first choice major intend to change major after two months, and effectively only 23% of them did a transfer after the first semester.

Part 2 Students retention predictors including social integration

Methodology

Instrumentation

Six recent cohort data obtained from student enrollment database from a private university in Lebanon. Data includes the students who were enrolled and non-enrolled in the University. Several transformations of the demographics were necessary to understand the data. The number of remedial courses that students take at the university was classified into two sub-groups (0 to 2 remedial courses and 3 and more remedial courses). The students were grouped in two groups according to their GPA (0-1.99 and 2-4). The distance from home was calculated in average time to commute based on Google map. The home location data were then grouped into three sub-groups ("less than 30 min", "between 30 min and 1 hour", "more than one hour") and a group of students who are living in dorms. The analysis used also the registration data of students into sport activities.

Treatment of Data

Again SPSS version 11.5 was used in processing data.

Identification of key factors of attrition

Admission score and major choice as factors of attrition

The six recent cohorts do not include the last cohort used in the entry survey studied in part 1. It is important to find similar factors that can explain entry survey results. We focused on two factors: the admission score and the type of majors categorized by size: the big majors are indeed the most competitive ones and the middle and small majors are respectively less competitive. Low admission level and returning status (dropped-outs or retained students) are highly dependent (Chi2(2, 4276) = 58.8 $p<0.05$).

Type of major and returning status (dropped-outs or retained students) are dependent (Chi2 (2, 4276) = 18.5 $p<0.05$). In the sub-categories of medium and high admission scores the retention rate is strongly independent from the size of the major (Chi2 (2, 2519) = 0.10 $p<0.05$). However, in the sub-category of low admission scores, the drop-out rate in small majors (17%) is higher than in medium and big majors (12%) (Chi2 (2, 1757) = 12.3 $p<0.05$).

As comprehensive intermediate result, the superposition of the facts that a student is in both sub categories – low admission score and small major- has a non-linear increasing effect on the likelihood to leave the university. This result can be closely linked to the stereotype of dropped out students defined in Part 1: their "admission score limited their options" to choose a competitive major, thus they end-up in a small major where they think that they "intent to change major as soon as possible".

Commuting time as factor of attrition

The university is in the middle of a dense urban area with a half a dozen of competing universities in less than one-hour drive. As a preliminary analysis, Table 1 shows a strong correlation between the distance of the University from home and the number of students from a given high school. For a given high school, students are choosing one of the closest Universities that match other criteria (level, language, tuition cost, sect...). (Note: this analysis does not include foreign students).

Table 1. **Distance from home and average number of High Scholl classmates**

Distance from home	less than 30 min	between 30 min and one hour	More than one hour
Average number of high school classmates	31	15	3

In the following study, we assume that proximity to home covers two correlated dimensions – the impact on commuting time and the number of high school classmates in the University. The first factor (commuting time) reflects an ease of access to the University facility and the second, the number of high school classmates, reflects an ease to be socially integrated in the University.

First, we ensured that those three sub-groups of commuting time ("less than 30 min", "between 30 min and one hour", and "more than one hour") have a comparable set of students. As preliminary tests, we ensured that the admission score distribution is independent from the sub groups of commuting time (Chi2 (2, 4276) = 4.75 $p<0.05$). As second preliminary test, the distribution of the students in the majors is independent from the sub groups of commuting time (Chi2 (4, 4276) = 7.9 $p<0.05$).

The mean of students' GPA is negatively correlated with their commuting time. We found that the longer the time to commute the more fragile the students are. This result is true at any level of GPA as per the table 2 below. In the category of high GPA, The percentage of non-returning students in the sub-category of students commuting more than one hour and having high GPA is three times greater than students in the sub-category of students commuting less than 30 min and having high GPA. The percentage of non-returning students in the sub-category of students commuting more than one hour and having low GPA is 1.75 times more important than students in the sub-category of students commuting less than 30 min and having low GPA.

Table 2. **Percentage of leaving students according to their GPA and Commuting time**

	Commuting time	less than 30 min	between 30 min and one hour	More than one hour
GPA	2.00+	1%	2%	3%
	0-1.99	19%	24%	35%

As a comprehensive analysis, students commuting more than one hour are underperforming compared to their classmates and are extremely exposed to attrition especially if they do not have high school classmates. As previously presented, the students with high commuting time are suffering both from tiredness and loneliness or lack of social integration.

Dorms as factor of retention

To improve our analysis on social integration we have decided to analyze the effect of living in the dorms. Eighty percent of the students in dorms have their parents' home at more than one hour from the University. Students living in dorms have a similar GPA distribution than students living at home (Chi2 (2, 1175) = 1.56 $p<0.05$). Students living in dorms have half the drop-out rate (9%) than students living at home at more than one hour from the University (18%): living in Dorms increases retention not performance.

Sport as a factor of retention

To improve our understanding of the importance of social integration, we have analyzed the relation between participation of students in sports clubs as factor of retention. The Student Affairs Office provides around thirty free sports activities. We have preliminarily ensured that the distribution of the students in dorms and students participating in sports activities are independent (Chi2 (1, 2742) =0.93 $p<0.05$). In the sub-category of students living at more than one hour from the University, those who are involved in sports activities have a lower drop-out rate (10%) than those who are not (17%).

Logistic regression model including social integration predictors

Logistic regression was used to predict drop-out students from a set of seven predictor variables: "Small Major", "More than one hour", "Low GPA", "Installment Due", "Dorms", "Sport activity", "Low admission level". It had a -2 Log Likelihood statistic of 2920 and a Cox & Snell R Square of .137. The sensitivity of prediction of drop-out is 4.4 %, and the specificity of prediction is 99.6%; the overall success rate in classification is 91.5%.

This work identified a number of sub populations at great risk to either drop out or change major in the university, their surrounding creates weak social integration and facilitates failure. The first group at risk is composed by students who choose a major due to limited options ending up in a small major with few classmates (i.e. less opportunities to have a social integration), not in their field of interest. The second group at risk is composed by students with heavy commuting time ending up in a university with few high school classmates (i.e. less contacts to have a social integration) and tired by long commuting times. In addition, this work identified a number of means to increase the retention rates such as facilitating dorm access for students who live far and promote sport activities. Those strategies are in the spirit of social integration.

REFERENCES

Anderson, E. (1982). Forces Influencing Student Persistence and Achievement. Journal of Counseling Psychology, Vol. 32, No. 1, pp. 94-103.

Astin, A. (1975). Preventing Students from Dropping Out, San Francisco: Jossey-Bass Publishers

Bank, B., Biddle, B., Slavings, R. (1992). What Do Students Want? Expectations and Undergraduate Persistence. Sociological Quarterly, Vol. 33, No. 3, pp. 321-335.

Bean, J. (1982). Conceptual Models of Student Attrition. In E.T. Pascarella (Ed.) New Directions for Institutional Research: Studying Student Attrition, No. 36, pp. 17-28, San Francisco, Jossey-Bass

Benjamin, R. and Hersh, R. (2002). Measuring the difference college makes: The Rand/CAE value added assessment initiative. Peer Review, 4, 7-11.

Berger J and Milem F, (1999) The Role of Student Involvement and Perceptions of Integration in a Causal Model of Student Persistence

Research in Higher Education, Vol. 40, No. 6 (Dec., 1999), pp. 641-664 , SpringerBrawer, F.B. (1996) "Retention-Attrition in the Nineties", published at the ERIC website: http://www.ericdigests.org/1996-4/retention.htm (accessed July 31, 2014).

Darlaston-Jones, D., Cohen, L., Drew, N., Haunold, S., Pike, L. , Young, A. (2001) Addressing Attrition: Why we Need a Unified Approach to Transition Issues, a paper presented at the Teaching & Learning Forum 2001 and published at: http://otl.curtin.edu.au/tlf/tlf2001/darlaston-jones.html (accessed July 31, 2014).

Diamond A.,Vorley T., Roberts J., Jones S. (2012). Behavioural Approaches to Understanding Student Choice, published at:http://www.heacademy.ac.uk/assets/documents/research/Behavioural_Approaches_to_Understanding_Student_Choice.pdf (accessed July 31, 2014).

Hare, J. (2010). Higher university drop-out rates cost $1.4bn, in The Australian, October 20, 2010 published at: http://www.theaustralian.com.au/higher-education/high-university-drop-out-rates-cost-14bn/story-e6frgcjx-1225940860074?nk=b749ecfbd4f87ba8a1ee3295330cdc54 (accessed July 31, 2014).

Harvey, L. and Green, D. (1993). Defining quality. Assessment and Evaluation in Higher Education: An International Journal, 18(19), 9-34.

Keith, B. (2001). Organisational contexts and university performance outcomes: The limited role of purposive action in the management of institutional status. Research in Higher Education, 42(5), 493-516.

Khalil, L., Lahoud, M. (2013), Corrections And Workaround To Manage Classic Bias In Student Evaluation Of

Instructors, 13th Annual SEAAIR Conference 7-9 October 2013 Jogjakarta Indonesia published at: http://www.seaairweb.info/conference/2013Proceedings.pdf (accessed July 31, 2014).

Krause, K. (2005). Serious thoughts about dropping out in first year: trends, patterns and implications for higher education, published in the journal Studies in Learning, Evaluation, Innovation and Development, Vol. 2, No. 3, pp. 55-68. published at: http://www98.griffith.edu.au/dspace/handle/10072/15410 (accessed July 31, 2014).

Lewallen, W. (1993). The Impact of Being Undecided on College-Student Persistence. Journal of College Student Development, Vol. 34, pp. 103-112

Li, G., Killian, T. (1999). Students Who Left College: An Examination of Their Characteristics and Reasons for Leaving. Paper presented at Association of Institutional Research annual conference at Seattle, WA.

Nasser R, Nauffal D., (2007) The worthiness and effectiveness of mathematics remedial courses: A Case Study, Lebanon, 7th Annual SEAAIR Conference, 5 – 7 September 2007, Bangkok, Thailand p 350 published at: http:// www.seaairweb.info/conference/2007Proceedings.pdf (accessed July 31, 2014).

Nauffal D., Nasser R. (2007) Differences between anglophone and francophone higher educational models: students' perceptions of the quality of performance outcomes, 7th Annual SEAAIR Conference, 5 – 7 September 2007, Bangkok, Thailand p 122 published at: http:// www.seaairweb.info/conference/2007Proceedings.pdf (accessed July 31, 2014).

Paramita, A. (2011), Student Transition Rates in an Australian Higher Education Institution 11th Annual SEAAIR Conference November 2-4, 2011, The Empress Hotel, Chiang Mai, Thailand p 110 published at http:// www.seaairweb.info/conference/2011Proceedings.pdf (accessed July 31, 2014).

Pryor J., Eagan K., Palucki Blake L., Hurtado S, Berdan J., Case M., (2012) The American freshman: national norms fall 2012, cooperative institutional research program (CIRP) at the higher education research institute (HERI) AT UCLA published at: http://www.heri.ucla.edu/monographs/theamericanfreshman2012.pdf (accessed July 31, 2014).

Tinto, V. (1993). Leaving College: Rethinking the Causes and Cures of Student Attrition, 2nd Edition, Chicago: University of Chicago Press

Responding to the Challenges of the ASEAN Integration in 2015

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ABSTRACT

The Philippine educational system is beset with challenges brought about by the implementation of the K to 12 Basic Education Curriculum by the Department of Education and the new revised General Education Curriculum, Outcomes-Based and Typology-Based Quality Assurance by the Commission on Higher Education. Added to this is the establishment of the ASEAN Economic Community (AEC) in 2015.

AEC aims to create a single market and production base by ensuring a free flow of goods, services, skilled labor, investments and capital. Changes should be made by the higher education institutions (HEIs), in order to contribute to the free flow of services and skilled labor. But the news of AEC 2015 reached the Philippine HEIs only after 2010. Are they ready to face the challenges of the ASEAN integration in 2015?

This paper determined how the Philippine HEIs can respond to the challenges of the ASEAN integration as perceived by 40 student leaders and 40 academic administrators of De La Salle University-Dasmarinas.

Findings revealed that HEIs should undertake local and international accreditation, strengthen linkages with foreign universities, send students and faculty to international conferences and/or competitions, benchmark with foreign universities in terms of their course offerings, and synchronize the school calendar with that of the other ASEAN universities.

The Filipino graduates, on the other hand, need to attend international seminars and conferences, pursue graduate studies, learn foreign languages and engage in additional technical/ vocational/skills trainings.

***Keywords*: ASEAN Integration, ASEAN Economic Community, educational system, higher education institutions**

Introduction

The Association of South East Asian Nations (ASEAN) was established in 1967 to promote political and economic cooperation and regional stability. It was originally composed of five states, namely Indonesia, Malaysia, Philippines, Singapore and Thailand. It now has ten members with the addition of Brunei, Vietnam, Laos, Myanmar (Burma) and Cambodia.

In November 2007, the blueprint for realizing theASEAN Economic Community (AEC), originally scheduled in 2020, was adopted and signed by the ASEAN leaders in Singapore during their annual Summit Meeting (http://entrepreneurship.org.ph/index.php?option +com_content &view=article&id).Later on, they decided to accelerate the AEC from 2020 to 2015.

The establishment of the AEC by the end of 2015, according to Remo (2014), is seen to herald "a new era for borderless competition" across industries. It is expected to transform the ASEAN countries into a single market and production base, to be characterized by the free flow of goods, services, skilled labor, investments and capital.

The aim of the AEC, otherwise known as the ASEAN integration in 2015, is noble since "it will narrow the development gap in ASEANand will foster regional cooperation, as well as greater social and economic integration"(http://www.asean.org/communities/asean-economic-community). However, the readiness of the member states has to be considered for this regional situation.

The Philippines, being an original member and a signatory to the AEC 2015, should have prepared the necessary mechanism to ensure that the whole nation will be in sync with the requirements of the ASEAN integration. Yet, majority of the Filipinos do not know about this. As stated in one newspaper, "not known to many is the unawareness of our people – more particularly those residing in the countryside – about the ASEAN Economic Integration 2015. The need for massive efforts to inform our people about the AEC is really a must" (http://www.tempo.com.ph/204/02/asean-integration-2015-its-impact).

Apprehensive views about the AEC and the ASEAN integration were expressed by some groups. Napoleon Nazareno, president and CEO of Philippine Long Distance Telephone Co. (PLDT),announced that"AEC is double edged as it presents both risks and opportunities." He also said that "the governments still have so much to do in terms of enabling legislation and putting in place needed institutional reforms"(Raffler.com).

Similarly, Manuel Pangilinan, chair of PLDT, believed that "the ASEAN Economic Integration slated next year should be clear with particular policies such as the mobility of labor and open skies, where local carriers will directly compete with foreign airlines"(http://www.philstar. com/business/2014/05/22). In the same article, Cherrie Atilano, co-founder and president of the GawadKalinga Enchanted Farm Agricool, said that "we're not ready in terms of agriculture." The same thought was expressed in another article which stated that perhaps, the sector experiencing the greatest apprehension is agriculture, which has historically lagged behind its neighbors in both production and costs (http://www.businessmirror.com.ph).

As Goyer (2013) pointed out, "the AEC 2015 will have enormous and positive impact in the years following 2015, but it is not well understood within our region, let alone outside of it."

The ASEAN integration will not only affect the business and agriculture sectors but the education sector as well. The country's educational system, especially the higher education institutions (HEIs), is currently facing different challenges due to the implementation of the K to 12 Basic Education Curriculum by the Department of Education (DepEd) and the new revised General Education Curriculum, Outcomes-Based and Typology-Based Quality Assurance by the Commission on Higher Education (CHED). As Abad (2014) pointed out, "the PhilippineHEIs are hit by a double whammy. Added to this is a bigger foe looming over the near horizon – the ASEAN 2015 integration."

AEC 2015 requires specific changes to be made by the HEIs in order to contribute to the free flow of services and skilled labor.In the same vein, De Guia (2014) mentioned that "the ASEAN integration necessitates the updating of the education curricula in the country for future graduates to be truly globally competitive."

However, since the news of the AEC 2015 did not reach the Philippine HEIs in 2007 but only after 2010, are they ready to face the challenges of the ASEAN integration in 2015?It is on this note that this study was made.

This study used in part Scenario Building as its framework. According to Moriarty, et al. (2007), scenario building can be described as a story which is based on the analysis and understanding of current and historic trends and events. It includes a consistent description of possible future situations.

The scenario building process is also a future mapping exercise in which a custom scenario is tailored to the organization's specific context and future requirements. This process is an effective tool for spurring discussions on the future requirements of the organization and can often lead to a re-evaluation of existing worldviews and truths. This process also encourages wide participation and stimulates discussions with customers, thereby providing an organization with awareness of the relevant issues and how to address them to better serve its customers (http://www.synocus.com).

The following benefits can be derived from scenario building (http://www.navigator-consulting.com): (a) it challenges managers and stakeholders to think in creative and forward-looking terms; (b) it questions assumptions about the future and about the drivers and forces that influence a specific sector or activity; (c) it draws upon resources within a company as well as within its wider stakeholder group; (d) it fosters group work, communication and planning within the company; and (e) it complements and illuminates standard strategic planning.

The questionnaire was developed with the idea of coming up with measures that the Philippine HEIs can adopt to create scenarios or future plans that will allow them to address the challenges of the AEC in 2015. Through the suggestions given by the respondents, the HEIs can plan and discuss with their stakeholders the course of action needed to prepare the institutions and their graduates for the AEC. In this way, everyone will be more aware of the issues confronting HEIs and their graduates.

The respondents of the study were the academic administrators who serve as the managers of De La Salle University-Dasmarinas (DLSU-D) and the student leaders who are the stakeholders of the university. The results of the study can serve as an impetus to DLSU-D as well as to other HEIs to continue their scenario building so as to be ready for the impact of the ASEAN integration in 2015.

The following questions were answered in this study:

1. What is the level of awareness of the respondents on the ASEAN integration in 2015?
2. What is the perception of the respondents on the effect of the ASEAN integration?
3. What measures can be recommended by the respondents to prepare the Philippine colleges and universities and their graduates for the ASEAN integration in 2015?

Methodology

This study utilized the descriptive research methodsince it focused on the perceptions of the respondents on the items tackled in the study. It made use of a self-made survey form as the source of data. The respondents were asked to rate their level of awareness and the effects of the ASEAN integration through the following scale: 1 – not aware/not probable, 2 – moderately aware/moderately probable, and 3 – highly aware/highly probable. For the measures that they think can be adopted by HEIs and the graduates, they were asked to check as many items as they think are applicable.

There were two sets of respondents that were used in the study: student leaders composed of the officers of the seven college student councils and the University Student Counciland academic administrators composed of assistant vice chancellors, deans, associate deans, department chairs, directors and coordinators.They were chosen as the respondents of the study because the researcher believed that they are in a position of leadershipto give recommendations on what the university can do, as one of the HEIs in the country, to prepare for the challenges of the ASEAN integration.During the data gathering, only 40 or 62.50% of 64 student leaders and 40 or 85.11% of 47 academic administrators were able to return the filled out survey instrument.

The statistical tools used were frequency, percentage, mean andranking.For the mean, thefollowing scale and verbal interpretations were used: 1.00 – 1.67 NA (not aware)/ NP (not probable); 1.68 – 2.34 MA (moderately aware)/MP (moderately probable); and 2.35 – 3.00 HA (highly aware)/HP (highly probable).In ranking, the higher the frequency, the higher the rank.

The following acronyms were used in the tables: SL stands for student leaders, AA stands for academic administrators, and VI stands for verbal interpretation.

Results and Discussion

Problem 1: What is the level of awareness of the respondents on the ASEAN integration in 2015?

Table 1: **Level of Awareness of the Respondents on ASEAN Integration**

Items	SL	VI	AA	VI
1. Are you aware of the plan for ASEAN Integration in 2015 through the establishment of the ASEAN Economic Community (AEC)?	1.78	MA	2.35	HA
2. Are you aware of the following pillars of the AEC?	1.78	MA	2.11	MA
a. Political and security community	1.62	NA	2.05	MA
b. Economic community	1.90	MA	2.21	MA
c. Socio-economic community	1.82	MA	2.10	MA

Table 1 shows that the students are only moderately aware (with 1.78 mean) of the plan for ASEAN integration in 2015 through the establishment of the AEC but the administratorsare highly aware of it(with 2.35 mean). It can be construed from the data that the administrators have a high level of awareness over the students since they have more opportunities to be informed about this topic which is the common theme now of the seminars/conferences/ conventions where administrators and faculty are invited to participate.

However, both students (with 1.78 mean) and administrators (with 2.11 mean) are only moderately aware of the pillars of the AEC. In fact, the data further show that the students are generally not aware (with 1.62 mean) of the political and security community that will also be established as part of the AEC.

These data imply the need to educate both the students and the administrators on the pillars of the AEC and the corresponding objectives of establishing each one.

Problem 2:What is the perception of the respondents on the effect of the ASEAN integration?

Table 2: **Perceptions of the Respondents on the Effects of ASEAN Integration**

Items	SL	VI	AA	VI
1. Can AECtransform the ASEAN countries into a single market and production base, characterized by the free flow of goods, services, skilled labor, investments and capital?	1.93	MP	2.28	MP
2. Can the Philippine colleges and universities participate well in the ASEAN integration in 2015?	2.20	MP	2.33	MP
3. Can the Filipino graduates compete in the AEC?	2.18	MP	2.45	HP

Both students (with 1.93 and 2.20 means) and administrators (with 2.28 and 2.33 means) perceive that it is moderately probable for AEC to transform the ASEAN countries into a singlemarket and production base, characterized by the free flow of goods, services, skilled labor, investments and capital and that Philippine colleges and universities can participate well in the ASEAN integration in 2015. However, the students believe that it is only moderately probable (with 2.18 mean) for the Filipino graduates to compete in the AEC. The administrators, on the other hand, believe that these graduates have high probability (with 2.45 mean) of competing. This may be due to their belief in the quality of education that they are providing.

Problem 3: What measures can be recommended by the respondents to prepare the Philippine colleges and universities and their graduates for the ASEAN integration in 2015?

Table 3: **Recommended Measures for the Philippine Colleges and Universities**

Items	SL		Rank	AA		Rank
	f	%		*f*	%	
1. synchronize the school calendar with that of the other ASEAN universities	18	45.00	13	37	92.50	2.5
2. align the curriculum with that of other ASEAN universities	31	77.50	6	36	90.00	4
3. include additional subjects in the curriculum like Asian culture, languages, legal systems, labor and immigration laws, and the like	31	77.50	6	33	82.50	10
4. undergo school and/or program accreditation both by local and international agencies	35	87.50	1	32	80.00	11
5. strengthen linkages with other universities both in Asia and the rest of the world	34	85.00	2.5	37	92.50	2.5
6. collaborate in research undertakings with other universities abroad	31	77.50	6	34	85.00	7.5
7. encourage faculty members to publish in internationally recognized journals	20	50.00	11.5	35	87.50	5
8. benchmark with otheruniversities abroad in terms of their course offerings	21	52.50	10	38	95.00	1
9. benchmark with other universities abroad in terms of their best practices in instruction, faculty and student development activities	23	57.50	9	34	85.00	7.5
10. send students and faculty in an exchange program abroad	27	67.50	8	30	75.00	12
11. review the present admission and retention policies for students	17	42.50	14	25	62.50	14
12. implement an international internship program for students	32	80.00	4	29	72.50	13
13. hire more foreign faculty	8	20.00	16	16	40.00	16
14. admit more international students	11	27.50	15	20	50.00	15
15. allow students and faculty to participate in international conferences and/or competitions	34	85.00	2.5	34	85.00	7.5
16. adhere to the qualifications framework recognized by the other ASEAN members	20	50.00	11.5	34	85.00	7.5

It can be seen from Table 3 that the ranking of the recommendations for Philippine colleges and universities differ between the students and the administrators.

For the students, the first in their list, as ranked by 35or 87.50%, is the accreditation that the schools need to undertake from local and international agencies. Since accreditation is a voluntary activity undertaken by the school to ensure that quality education is met by the provision of learning conditions beyond the minimum requirements, the students adhere to the importance of accreditation as a means to produce graduates who can compete with those coming from the other ASEAN countries. Accreditation from international agencies is adhered by the students with the belief that in this way, the quality of education that will be observed by the Philippine HEIs will be of international standards.

The next two items which were ranked by 34 or 85% of the studentsas 2.5 are: (a) strengthen linkages with other universities both in Asia and the rest of the world and (b) allow students and faculty to participate in international conferences and/or competitions. Looking at these two items, it can be noticed that both refer to exposure to activities outside of the Philippines. It may be implied from these answers that the students believe that when schools in the Philippines, together with their students and faculty, are exposed to other schools abroad, there is a great possibility that improvements can happen because they will be able to benchmark on the best practices done in the other schools in terms of instruction, curriculum, faculty and student development activities, research undertakings, and the like.

For the administrators, the first in their list, as ranked by 38 or 95%, is benchmarking with other universities abroad in terms of their course offerings. This may be due to the belief of the administrators that when Philippine schools have almost the same course offerings with those of other schools abroad, there is a great possibility that foreign students will flock to the Philippine schools because the programs they offer are comparable with those offered abroad. An additional incentive is the low cost of education in the Philippines. The next two items which were ranked by 37 or 92.5% of the administrators as 2.5 are: (a) synchronize the school calendar with that of the other ASEAN universities and (b) strengthen linkages with other universities both in Asia and the rest of the world. Similar with the implication of the first ranked item, synchronizing the school calendar with those of other schools will provide more opportunities for international student mobility, as well as faculty exchange. Strengthening foreign linkages, just like the view of the students, will provide the Philippine schools with the best practices in instruction, curriculum, faculty and student development activities, research undertakings, and the like that they can adapt.

From these responses, the Philippine colleges and universities can create a scenario where there is an influx of foreign students who will avail of their programs. This will lead to certain changes in the school calendar, admission and retention policies, teaching content and methodologies that will have to be done in the schools.

Table 4: **Recommended Measures for Filipino Graduates**

Items	SL		Rank	AA		Rank
	f	%		*f*	%	
1. pursue graduate studies	25	62.50	2.5	31	77.50	2.5
2. engage in additional technical/vocational/skills training like those provided by TESDA	20	50.00	5	33	82.50	1
3. enroll in short-term certificate programs related to their BS degrees	19	47.50	6	27	67.50	5
4. apply for extra years of internship abroad	21	52.50	4	21	52.50	6
5. attend international seminars and conferences	33	82.50	1	29	72.50	4
6. learn foreign languages	25	62.50	2.5	31	77.50	2.5

Table 4 shows some recommendations that the Filipino graduates can follow to prepare for the effects of the ASEAN integration in 2015. Just like in Table 3, the ranking of the recommendations given by the students and the administrators also differ, except for two items.

For majority of the students, 33 or 82.50%, Filipino graduates need to attend international seminars and conferences. It can be implied from this answer that exposure to seminars and conferences attended by international delegates will provide the Filipino graduates with an insight on the delegates' knowledge, skills and attitudes which may inspire or challenge them to further improve themselves. Tied on rank 2.5 and answered by 25 or 62.50% of the students are (a) pursue graduate studies and (b) learn foreign languages. Pursuing graduate degrees will ensure the graduates of becoming more globally competitive by acquiring additional knowledge and skills in their chosen field. Learning foreign languages, on the other hand, will serve as a vehicle of the graduates to communicate with more peoples of the world, thereby opening the doors for other job opportunities abroad.

For the administrators, ranked 1 by 33 or 82.50% is engaging in additional technical/vocational/skills training like those provided by TESDA. Acquiring additional skills will be beneficial to the graduates since there will be opportunities for an alternative career here and abroad. It will also provide the graduates with additional credentials for promotion. Tied on rank 2.5 and answered by 31 or 77.50% of the administrators are (a)pursue graduate studies and (b) learn foreign languages which are similar with the answers of the students.

These responses will make possible the creation of a scenario where schools will be offering enrichment programs for their graduates to equip them with additional knowledge and skills. This will provide benefits to both the schools, through financial gain, and the graduates, through extra credentials.

Conclusions and Recommendations

AEC and the ASEAN integration are inevitable events to happen in 2015. Yet, the responses from the student leaders and the academic administrators of DLSU-D show that their level of awareness on the nature and objectives of the AEC is not very clear. It may be construed that this is the same situation with the other schools in the Philippines. If this is the case, it will be difficult for the country's educational system to prepare its citizens for the challenges of the regional integration. What needs to be done is to have massive information dissemination on the AEC. Fora and conferences with faculty and students on what AEC is, what challenges should be faced with the coming of the AEC, and other related issues and concerns should be undertaken. Speakers from different sectors (educational, business, agriculture, tourism, and the like) can be invited to shed light on these matters. Interaction between and among students and faculty from local and foreign universities can also be planned to give a wider perspective on the opportunities, as well as threats, of the AEC.

Since the schools are the best instrument of the government to educate the people, there is a need for a concerted effort on the part of the Philippine government to increase the awareness of the Filipinos on what's in store for them come 2015. As Abad emphasized (Valente, 2013), "the Philippine government still has a lot to do." Mechanisms should be in place, legislative measures should be undertaken, structural transformation should be done in all areas of the Filipinos' lives or else, they will once again take the back seat and be passive watchers of the development that is happening in the other ASEAN countries.

On the other hand, the recommendations given by the respondents can be used as guides by almost all Philippine HEIs in preparing for 2015. They may prepare several scenarios based on their available resources so that their plans and programs will be reflective of what changes and innovations they would like to embrace. This will intensify their readiness for the integration and increase the chances of their graduates to compete globally. In this way, the Philippine schools will be able to help achieve the goal of AEC, specifically the free flow of services and skilled labor.

Acknowledgement

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REFERENCES

Abad, A. (2014). ASEAN 2015: Philippine education's boon or bane? Keynote lecture for the 10th Council of Deans and Educators for Business IV-A Conference, 27 February 2014.

De Guia, J. (2014). CDAP highlights career development in ASEAN 2015. DLSU-D SWC Stories, SY2013-2014 issue.

Goyer, J. (2013, September 19). "Why the 2015 deadline for the ASEAN economic integration?"Asia Pacific Bulletin.

Moriarty, P., Batchelor, C., Abd-Alhadi, F., Fahmy, H., and Inwrdam (editors) (2007).Scenario building (compiled by SilvanWidler). http://www.sswm.info/category/planning-process-tools/decision-making/decision-making-tools/situation-and-problem-analys-3.

Remo, A. R. (2014, April 30).ASEAN integration not happening in 2015.Philippine Daily Inquirer.

Valente, C. (2013, October 26). ASEAN integration in 2015 and its implications on labor. (http://www.manilatimes.net/asean-integration-in-2015-and-its-implications-on-labor/47994)

http://entrepreneurship.org.ph/index.php?option+com_content &view=article&id; de Vera, Ian Jester, downloaded 2014 June 28)

http://www.asean.org/communities/asean-economic-community. (Initiative for ASEAN integration and narrowing the development gap)

http://www.businessmirror.com.ph.ASEAN integration.

http://www.navigator-consulting.com/page/scenario-planning/benefits

http://www.philstar. com/business/2014/05/22.Phl industries not ready for ASEAN integration, biz leaders warn)

http://www.synocus.com/index.php/strategy-development/scenario-building.html

http://www.tempo.com.ph/204/02/asean-integration-2015-its-impact. ASEAN integration 2015: Its impact 2014 Feb 14.

Raffler.com (2014, June 26). PLDT exec: ASEAN integration 'double-edged'.

Developing Strategic KPIs for HEIs

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ABSTRACT

Acknowledging that any organization's top management always has a voracious appetite to know of its performance, the same also holds true for the HEIs (Higher Education Institutions) as all university councils and executive management would like to have a better understanding of how they are performing, albeit relative to other HEIs. The adage of "management through measurement" still holds strong as the HEI strategic KPIs (Key Performance Indicators) provide important indications of the institution's performance that could lead to better and well informed decision making that affects the HEI. To better understand the strategic KPIs' importance, this paper is aimed at reviewing the extent of strategic KPI development through a secondary research approach and providing a technical approach of how HEIs can develop their institutions' strategic KPIs. While this paper's emphasis is on developing strategic KPIs specific to the case study, these KPIs will include key tactical KPIs on learning effectiveness which are more operational but also serve as key indicators of the strategic direction and accomplishment measures of the institution. The proposed approach uses a secondary research methodology based on literature reviews and strategic plans of HEIs to review the types and nature of KPIs developed, and what KPIs can be used to determine the performance of the HEI. A HEI case study in the Middle East, with its strategic plan is used to illustrate this approach of how a typical HEI can identify and develop its own set of strategic KPIs based on its strategic plan.

Introduction

Most HEIs have strategic and operational plans and these contain strategic objectives which usually relate to the performance outputs or outcomes that are measured at a relatively high level and mainly medium term in nature. A key aspect of performance management deals with performance measurement which is to "measure and monitor" progress or achievement against these pre-defined objectives which are normally SMART (Specific, Measurable, Achievable, Realistic and Time-framed). A key way to monitor academic progress is to "measure progress or trends" (e.g. retention rate has increased by 5% over the previous year") or compare across different units (e.g. graduation rate of the Engineering doctorate is 10% higher than the Arts doctorate over the previous year). To determine and support these performances, normally a HEI will need to develop a set of strategic KPIs to ensure that they know their performance in areas of importance to the HEI. Though strategic KPIs are important, there are specific issues of:

- ***Purpose and intent of KPIs*** – Basically, the intent of strategic KPIs (what is distinctive and important to the institution) is to ensure that the strategic direction (long term policies and goals rather than short term priorities) and its strategic measures provide information of strategic performance which is the primary intent of the Governing Board or Executive Management. The tactical implementations which are normally delegated to the President of the HEI and its team would mean that the Governing Board will ultimately be responsible for its delegation of "strategic performance management" to the executing board.
- ***Relationships to Strategic Planning*** – Institutional KPIs are strategic rather than operational as it should "focus on what makes it distinctive" that reflects the mission of the HEI as opposed to being operational at the college or program levels. This dictates that strategic KPIs should flow from a well-constructed Institutional Strategic Plan and should be part of the HEI's strategic planning process in key areas of importance.
- ***Number of KPIs and its value*** – CUC (2006)identified 10 areas that the HEIs should focus on as the main areas of performance management for all HEIs and suggested a range of 10 – 20 high level indicators supported with more detailed performance indicators at the lower levels of operations for more in-depth, analytical and informed decisions making. These lower levels indicators in key operational areas are the direct owners of these PIs (Performance Indicators) that informs on and support the higher level PIs which is the strategic KPIs.

Though most HEIs have strategic plans, many are lacking in strategic KPIs that provide institutional performance measures. ABC University is such a case where it hired an international consulting group to develop its strategic plan. ABC University isa case study used to exemplify the development of strategic KPIs. Itis a typical HEI which has a strategic plan, called the ABC 2030 "Towards Excellence" Strategic Plan, wherestrategic KPIs were not defined. Based on this ambiguity, ABCUniversity would need to identify a set of strategic KPIs that helps the top management measure, monitor and manage its accomplishment and achievement of its longer term goals.As such, the research aim of this paper is, "To determine a set of Strategic KPIs for ABC University".

Research Methodology

As the development approaches for strategic KPIs used by most HEIs is very diverse and multifarious, this research will use a secondary research approach that reviews two main sources of:1) literature of research conducted on the development and design of strategic KPIs of a HEI and 2) those KPIs defined in the strategic plans of a typical HEI. The use of the research reports on strategic KPIs of HEI was to identify typical common issues and widely accepted practices in the issues and challenges, development and design, scope and utilization of strategic and operational KPIs. The initial literature review identified 5 research reports as follows:

i. Pollard, E., Williams, M., Williams, Joy., Bertram, C. and Buzzeo, J., of IES (Institute for Employment Studies) and Drever, E., Griggs, J. and Coutinho, S., of NatCen (National Center for Social and Economic Research, entitled:
   a. *How should we measure higher education? A fundamental review of the Performance Indicators Part One: The Synthesis Report (November 2013)*
   b. *How should we measure higher education? A fundamental review of the Performance Indicators Part Two: The Evidence Report (November 2013)*

ii. CUC (Committee of University Chairs) titled:
   a. *CUC Report on the Monitoring of Institutional Performance and the Use of Key Performance Indicators (November 2006)*
   b. *CUC Report on the Implementation of Key Performance Indicators: Case Study Experiences (June 2008)*

iii. HR (Hanover Research) *on Non-academic Key Performance Indicators for Administrative Support Units* (used by a variety of U.S. universities to measure the performance of non-academic, administrative support units that cover the metrics for Finance, human Resources, student Administration/Student Services and Facilities units).

In the second main source of secondary data of identifying strategic KPIs in Strategic Plans, the key terms of 1) "strategic plans with strategic KPIs" 2) "strategic KPIs"3) "Strategic KPIs for education" and4) "Strategic KPIs for academic or education"were randomly goggled and these resulted in 6,030,000 hits in 0.47 sec", 3,820,000 hits in 0.22 sec", 9,510,000 hits in 0.22 sec", 9,940,000 hits in 0.26 sec" respectively. Based on this approach, the top 30 documents were selected and reviewed to identify whether the two main aspects of "strategic objectives" and "KPIs" exist in the same strategic plan or just "strategic KPIs" in any document, and this resulted in the following set of documents:

i. Strategic Plans with KPIs of:
   a. The Penn State Strategic Plan 2009 – 2014 (USA)
   b. The Pennsylvania State University (May 2008), Strategic Indicators: Measuring and Improving University Performance (USA)
   c. University of Toronto Performance Indicators 2012 Comprehensive Inventory (Canada)
   d. Manchester State University ASPIRE 2010 – 2014 Metrics and Key Performance Indicators and ASPIRE III (2014 – 2018) (UK)
   e. NEIU (Northern Illinois University) KPI Progress Report for the Strategic Plan (USA)
   f. University of Greenwich Strategic Plan 2012 – 2017: Summary (UK)
   g. Manchester Metropolitan University Corporate Strategy 2012 – 2017 (UK)
   h. Ball State University Strategic Plan 2012 – 2017, Education Redefined 2.0: Advancing Indiana (USA)
   i. Lancaster University Strategic Plan 2009 – 2015 (UK)
   j. University of Wollongong Strategic Plan 2008 – 2010 (Australia)
   k. Binghamton University 2010 – 2015 Strategic Plan Key Performance Indicators (USA)
   l. Qatar University Strategic Plan 2010 – 2013 (Middle East)

ii. The 75 KPIs every Manager needs to know (September 05, 2013).

iii. The Pennsylvania State University (2008) Innovation Insights, "Developing Strategic Performance Indicators", Office of Planning and Institutional Assessment (USA).

iv. Georgiadou, E. of Middlesex University London (UK), power point presentation of "Role of Key Performance Indicators in Higher education Quality Enhancement".

v. NASPA International Assessment & Retention Conference, Baltimore, Maryland (USA) (June 2010) power point presentation of "The Assessment movement toward key performance indicators".

vi. Seybert, J. A., of National Higher Education Benchmarking Institute, Johnson County Community College (USA), power point presentation of "Identifying Key Performance Indicators: The Foundation of an Institutional Dashboard".

The approach utilized in this research were reviewed and tabularized for "frequency of occurrence" (note that the full tabular analysis runs to 110 pages and will not be shown here). This identified 19 key categorical areas of focus where 988 different types of strategic KPIs or PIs were identified as shown in Table 1. It should be noted that there were similarities across all these categorical areas or KPIs, but the key difference lies in the "terminology" used. As such, each categorical area and its appending KPIs were analyzed on a pairwise basis of similarity.

Table 1: **Comparative Analysis of most frequently used Institutional KPIs**

CUC (Committee of University Chairman) Report 2006	# of KPIs	Most common indicators used in Dashboard of US Universities	Research (2014) of 11 randomly selected universities	# of KPIs
Institutional Sustainability	7		Institutional Sustainability	6
Academic Profile and Market Position	7	• Admissions • Enrolment • Academic Information • External Rating	Education (Teaching and Learning)	87
Student Experience and Teaching and Learning	8	• Student Outcomes • Student Engagement • Satisfaction	Student Focus	208
Research	8	Research	Research	82
Knowledge Transfer and Relationships	7		Partnership /Collaborations	12
Financial Health	8	Financial Indicators	Financial	78
Estates and Infrastructure	6	Physical Plant	• Infrastructure • Technology • Resources	103 34 103
Staff and HRD	6	• Faculty • Satisfaction	• Faculty • Satisfaction	20 25
			Community and University Environment	48
Governance, Leadership & Management	5		Planning / Governance	7
			Internationalization	34
			Stakeholders Engagement	11
			Social / Society	33
			Environmental	15
			Innovation	12
			Access / Affordability	6
			Diversity	18
TOTAL	61		TOTAL	927

Research Findings

A stringent research methodology is not applied due to the diversity in the understanding and application leading to the development of strategic plans and KPIs, and the diversity in the use of terminology or the grouping of the categorical areas of focus which are dependent on the institution's context and aspirations and unique focus. Though a stringent methodology is not used, a systematic approach based on the basic mission and functioning of a typical HEI with stated strategic goals and strategic objectives and related KPIs or PIs in each of the focus areas of operation is the main criteria used for the first level basis of analysis.

A second level of analysis is the criteria used to determine the KPIs. This is based on the CUC (2006) reports of which the top 10 KPIs recommended were chosen as a set of coherent KPIs with the following criteria:

a. Critical to the success of the institution;
b. Strategic – i.e. high-level and of interest to governance
c. Relevant to all types of institution;
d. Able to cover all the main areas of strategic activity and risk which governors or executive management need to monitor on a continuing basis for a HEI.

In the description of KPIs (CUC, 2006), ***performance measures*** is defined as "where the numerical indicator is a precise or robust measure of the factor of interest (e.g. student number, building condition, financial outcomes) and ***performance indicators*** as "which are not necessarily a numerical indicator" (e.g. teaching quality, student satisfaction, or sustainability index) are included in this research. Normally for performance indicators which cannot be measured directly, a proxy measure is developed (e.g. absenteeism can be used as a proxy for staff commitment).

Based on this methodology, some of the key findings:

1. **Analysis of ABC 2030 University Strategic Plan and its KPIs** – The ABC 2030 which was officially published in May 2009 and revised in December 2012 (revised but unpublished form) showed that there were 9 Strategic Objectives and 49 recommendations. Basically, the ABC 2030 is more structured as an issue/recommendation framework which is not typical of the structuring of a typical HEI Strategic Plan. As such, no strategic or operational KPIs were identified in its ABC 2030.

2. **Mapping of ABC 2030 onto the widely accepted categorical areas of KPIs** – While ABCUniversity do not specify its KPIs in the ABC 2030, the longer meaning of the strategic objectives of the ABC 2030 (as defined in Table 3 but shown here using the shorter name) are mapped onto the 12 generic areas where KPIs are typically specified in their focus areas in their strategic plans. The next to best and appropriate mapping and its results and its details are:
   a. Strategic objective #3: Less is more; Strategic objective #4: Stronger graduates and Strategic objective #6: Supportive learning environment are mapped into two key areas of Student Focus (Student Experience) and Community and University Environment
   b. Strategic objective #7: Sustainable future is mapped onto Financial and Institutional Sustainability
   c. Strategic objective #1: Good everywhere can be mapped onto Research and Educational Offers (Teaching and Learning)
   d. Strategic objective #2: Distinctive faculty can be mapped onto Staff (Human Resource Management)
   e. Strategic objective #5: Building bridges can be mapped onto Internationalization, Stakeholders/ Social/ Society Engagement and Responsibilities and Partnerships / Collaborations / Knowledge Transfer

   Though it is not related toGovernance, Leadership, Management, Planning,Strategic objective #8: Flexibility and Accountability and Strategic objective #9: Organizing for purpose were put in this category as this is not typical of what a HEI will put in a strategic plan or define any KPIs in these areas. Other areas that were not clearly or explicitly covered by ABCUniversity in the 12 generic areas wereInfrastructure/ Technology/Resources and Innovation/Access/Affordability/Diversity). This resulted in a set of 32 KPIs that have relevance to ABCUniversity based on the ABC 2030 University 9 Strategic Objectives.

3. **Number of KPIs used** –The number of KPIs identified from this secondary research process ranged from a low end number of KPIs ofNorth Illinois University (12) and Manchester Metropolitan University (16) and University of Wollongong (23) to the high end of Qatar University (138), Ball State (113), University of Toronto (99) and Binghamton University (92) and Manchester State University (63) with two in the middle end of University of Greenwich (32) and Lancaster University (30). This can allude to the fact that there is a range of KPIs which the HEI can set up based on their institution's context and requirements, noting that some of the higher end numbers could be re-classified as operational KPIs due to the specific and more detailed focus areas of measurement of performance.Details of the categorization of the very frequently used KPIs are shown in Table 2as summarized from the ABC University Research Report DoQ – 01/2014 (Teay, 2014).

Table 2: **12 Key Categorical Areas of KPIs as used by different HEI**

Key Categorical Areas where KPIs are identified	# of KPIs (similar occurrence) of HEI studied in each category
Infrastructure / Technology / Resources	246
Student Focus (Student Experience)	216
Financial / Institutional Sustainability	99
Research	96
Education Offers (Teaching and Learning)	94
Faculty / Staff (Human Resource Management)	51
Community and University Environment	48
Internationalization	34
Stakeholders/ Social / Society Engagement and Responsibilities	59
Others (Innovation – 12; Access / Affordability – 6; Diversity – 18)	36
Partnerships / Collaborations / Knowledge Transfer	19
Governance, Leadership, Management, Planning	12
TOTAL	988

4. **Categories of focus and coverage** – The overall findingscame up with 19 categorical areas of focuswhereby these are typically used by HEIs and later reduced into 12 main focus areas (Table 2) where important KPIs are set and developed in:
   a. # 1 Student Focus / Student Experience and Teaching and Learning (216);
   b. # 2 Estates and Infrastructure (6) / Infrastructure and Technology (103 each = 206 in total) and Technology (34);
   c. # 3 Academic Profile and Market Position (7) and Education (Teaching and Learning) (87);
   d. #4 Financial Health (86) and Institutional Stability (6);
   e. # 5 Research (90);
   f. # 6 Stakeholders/ Social / Society Engagement and Responsibilities (59);

g. # 7 Faculty / Staff and HRD (51);
h. # 8 Community and University Environment (48); and
i. # 9 Others (Innovation – 12; Access / Affordability – 6; Diversity – 18) totaling 36;
j. # 10 Partnerships / Collaborations / Knowledge Transfer (19) and lastly Governance, Leadership, Management, Planning (12).

This is only an approximate determination of the key focus areas where KPIs are developed and ranked in grouping of similar terminologies from the original 19 to 12 as shown above based onthe most frequently used KPIs as used by the HEIs (Table 2).

Development of the Strategic KPIs of ABC University

The overall selection of the proposed set of 32 ABC strategic KPIs was selected based on the following criteria that the selected KPIsshould have (Table 3):

- Are within the requirements of the 9 Strategic Objectives of ABC University
- Comprehensively address the requirements of the main areas important and critical to the key focus areas of a typical HEI.

From the original 32 sets as identified through the secondary research approach, it underwent a further round of expert opinion of 3 Saudi administrators and 3 consultants in quality management in the university. This approach came up with a final set of proposed 18 ABC Strategic KPIs which are highlighted in yellow as shown in Table 3. The whole research approach yielded a total of 18 Strategic KPIs (which are highlighted in yellow in the Table 3) that are deemed relevant and critical to provide an overall picture of performance of ABCUniversity comprehensively and holistically as shown below:

Table 3: **Proposed Strategic KPIs of ABC University**

Key Categorical Areas where KPIs are important	Strategic Objectives of ABC	Proposed Strategic KPIs for ABC that measures strategic performance
Infrastructure / Technology / Resources		• % of internal / external clients "satisfied" or "strongly satisfied" with services by all functional units (finance, IT, HR, procurement, Business operation, Housing, Student services, Library, External relations, Institutional research) • Teaching and Research Space as a proportion of Total Space
Student Focus (Student Experience)	• Strategic objective #3: Less is more (Reduce ABC's student volume, increase the share of graduate students and raise entry requirements)	• Student satisfaction with university life experience • Retention and Graduation Time Series for undergraduate and PGs • Percentage of students graduated in the last 3 years who are recognized in the areas of academics, or profession, or contribution to society at the national or international level (%)

Key Categorical Areas where KPIs are important	Strategic Objectives of ABC	Proposed Strategic KPIs for ABC that measures strategic performance
	• Strategic objective #4: Stronger graduates (Enable ABC students to learn hard and soft skills throughout their academic life) • Strategic objective #6: Supportive learning environment (Create an engaging environment at ABC for faculty, students, and staff)	• Proportion of students entering undergraduate programs who complete those programs in minimum time • Students overall rating on the quality of their courses (Average rating of students on a 5 point scale overall evaluation of courses) • % of students involved with university community events • % of faculty / staff involved with university community events
Community and University Environment		
Financial / Institutional Sustainability	• Strategic objective #1: Good everywhere; Great in focus areas (Strengthen our comprehensive university with academic areas of research and teaching excellence)	• Endowment Per FTE faculty / staff • Total auxiliary and other revenue generated
Research		• Number of refereed publications in the previous year per full time equivalent member of teaching staff. • Number of citations in refereed journals in the previous year per full time equivalent teaching staff. • Proportion of full time member of teaching staff with at least one refereed publications during the previous year • Ratio of internal research and innovation funds in proportion to the total number of full-time faculty members • Ratio of external research and innovation funds in proportion to the total number of full-time faculty members • PGR research performance in publications, presentations and posters • % of faculty who get research grant / contract funding
Education Offers (Teaching and Learning)		• % of public who are "strongly or very satisfied" with academic standard demonstrated by university • Faculty Student Ratio (Comparisons with Peers / with mean of Peers / Ratios Using Different Faculty Inclusions –based on Faculty FTE) • Graduate Enrolment as a Percentage of Total Enrolment

Key Categorical Areas where KPIs are important	Strategic Objectives of ABC	Proposed Strategic KPIs for ABC that measures strategic performance
Staff (Human Resource Management)	• Strategic objective #2: Distinctive faculty (Attract and develop distinctive faculty)	• Percentage of the full-time faculty members obtaining academic or professional awards at the national or international level. (%) • 9.5.2 Percentage of full-time faculty members participating in professional development activities during the past year • % of support staff who participated in professional developmental activities related to their work area
Internationalization	• Strategic objective #5: Building bridges (Build bridges among ABC constituencies and externally with local and international groups)	• Percentage of students participating in Education Abroad • Number of international visiting faculty scholar • Percentage of Total Undergraduate Enrollment by International Status • Percentage of Total Undergraduate / Graduate Enrollment by International Status
Stakeholders/ Social / Society Engagement and Responsibilities		• Evaluation of satisfaction of employers/ business operators/ users of graduates / alumni /parents/ graduates on competency of graduates • Proportion of full time teaching and other staff actively engaged in community service activities
Partnerships / Collaborations / Knowledge Transfer		• # of signed and effective MOUs
Others (Innovation – 12; Access / Affordability – 6; Diversity – 18)		• % increase in # of new technologies / patents / intellectual property
Governance, Leadership, Management, Planning	• Strategic objective #8: Flexibility and Accountability (Create a performance contract between ABC and the government) • Strategic objective #9: Organizing for purpose (Establishing an organization and governance that supports ABC's goals)	(No KPIS were identified as explained earlier, they are not typical in other HEIs)
	Total # of Proposed Strategic KPIs for ABC University = 32 KPIs The final set of 18 Strategic ABC KPIs highlighted in yellow was determined through a round robin expert opinion of the consultants of the university.	

Conclusion

While there are many approaches whereby the strategic KPIs of a HEI can be developed, this paper attempts to present another approach whereby the case study HEI already has a strategic plan, but no strategic KPIs are defined in this plan. In order to identity the institution's KPIs, a secondary research into key literature in the development of strategic KPIs, and strategic plans with strategic KPIs of universities was used. These approaches identified a final set of 12 key categorical areas where strategic KPIs were developed, and the case study institution's strategic objectives was mapped into these 12 areas, with 32 frequently used strategic KPIs within the context of the institution, and a final set of 18 selected through a focus group opinion.

REFERENCE

i. ABC University Strategic Plan "ABC 2030 Towards Excellence", 2009 and 2013, ABC University Press

ii. Pollard, E., Williams, M., Williams, Joy., Bertram, C. and Buzzeo, J., of IES (Institute for Employment Studies) and Drever, E., Griggs, J. and Coutinho, S., of NatCen (National Center for Social and Economic Research, entitled:

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d. Manchester State University ASPIRE 2010 – 2014 Metrics and Key Performance Indicators and ASPIRE III (2014 – 2018) (UK)

e. NEIU (Northern Illinois University) KPI Progress Report for the Strategic Plan (USA)

f. University of Greenwich Strategic Plan 2012 – 2017: Summary (UK)

g. Manchester Metropolitan University Corporate Strategy 2012 – 2017 (UK)

h. Ball State University Strategic Plan 2012 – 2017, Education Redefined 2.0: Advancing Indiana (USA)

i. Lancaster University Strategic Plan 2009 – 2015 (UK)

j. University of Wollongong Strategic Plan 2008 – 2010 (Australia)

k. Binghamton University 2010 – 2015 Strategic Plan Key Performance Indicators (USA)

l. Qatar University Strategic Plan 2010 – 2013 (Middle East)

vi. The 75 KPIs every Manager needs to know (September 05, 2013).

vii. The Pennsylvania State University (2008) Innovation Insights, "Developing Strategic Performance Indicators", Office of Planning and Institutional Assessment (USA).

viii. Georgiadou, E. of Middlesex University London (UK), power point presentation of "Role of Key Performance Indicators in Higher education Quality Enhancement".

ix. NASPA International Assessment & Retention Conference, Baltimore, Maryland (USA) (June 2010) power point presentation of "The Assessment movement toward key performance indicators".

x. Seybert, J. A., of National Higher Education Benchmarking Institute, Johnson County Community College (USA), power point presentation of "Identifying Key Performance Indicators: The Foundation of an Institutional Dashboard".

xi. Teay, S, (2014), Developing Strategic KPI of ABC University, KSU Deanship of Quality Research ReportDoQ – 01/2014, King Saud University

South East Asian Higher Education at the Cross Roads

Nirwan Idrus[1]

ABSTRACT

Realizing that achievements of higher education have been waning in recent decades, developed nations generally have attempted to address it by introducing novel teaching and learning methods and styles with varying successes. Many developing countries appear to be rather hesitant to seriously attack the problems. Many different reasons may be advanced for this, political, apolitical, and financial as well as management. The real reason it would seem is the lack of political will everywhere and at all levels in addition perhaps to the lack of knowledge about what and how to improve.

This paper proposes something more fundamental about higher education. It contends that modern higher education had not kept up with development in other areas including technology, generational shifts and their impacts on teaching and learning. Again, on the one hand this is a reflection of the lack of will power and leadership resulting in the perpetuation of anachronistic teaching and learning methods and practices which have been proven detrimental to current generation of higher education students evidenced by graduate unemployment for example. Various researches have been done by the author which showed that SEA higher education needs fundamental revamping if it wants to keep up with higher education development in the modern world. These will be discussed in the presentation.

Keywords: **South East Asia, higher education challenges, higher education revamp**

Introduction

At the outset the expectations of the Asian Economic Community (AEC) will be outlined. These will be discussed in relation to the relevance of and to current higher education (HE). The argument advanced by this paper is that little of HE seems to have been discussed by the rules and little evidence is available to show that those responsible for HE are doing anything to prepare for AEC at least in the short and medium term if not in the long term.

It must also be recognized that things, not only electronics or IT or computer, are moving at a much faster rate than ever envisaged. In itself it is already a challenge for all. Those involved in the planning and execution of educational

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changes will be hard-pushed to make teaching and learning (T&L) a lot more effective compared to traditional T&L. This obviously requires lecturers to be not only flexible but importantly able to find and practice the most appropriate T & L methods and styles to do so.

The author contends that the major drawback of a lot of SEA's lecturers in HE is their inability to see the need to change in the way they do their jobs.

This paper will expand on these in the following sections and sub-sections.

Nevertheless it has to be recognized, although lacking research-based results, personal observations and anecdotal examples point to the fact that generations of closed and orthodox family traditions and culture had been ingrained in the way growing offspring are being brought up even today. Shaw (1999) highlighted these but limited his focus to Confucian influences. Whether Confucian teaching is equated to 'Asian Beliefs' is not clear but again observations have shown that not just those who believe in Confucianism are practitioners of the sorts of things that the former had been accused of by Shaw. Many if not all Muslims in welcoming a new baby always pray that their new born will be 'saleh' or 'saleha' (depending on its gender) and will always respect his/her parents and be an obedient son or daughter. Now, even if the words are not the same, a part of the Confucian tenets is almost exactly that. Of this should not be taken as to imply that in the 'west' offspring are born rude to their parents are in fact encouraged to be so. Excesses of course prevail everywhere and regrettably that is also so in parents who wanted their children to be always obedient to them, would not do anything that their parents do not like and so on.

It is therefore not surprising that the resulting adults of such families will be at least practice some even if not all of the culture they learnt during their childhood and adolescence. Some of these become teachers, lecturers and professors. A lot of them even if they go overseas, outside Asia, they look at the liberalized behaviour of western teenagers for example, would look at it as decadence and not to be brought back home. Their minds are therefore closed and it is through observations that one learns of their attitudes, policies and beliefs that would not also accept anything good from the west, even if they had been proven to bring benefits to all, west or east.

It is indeed going to be a long time before changes happen in this. As things are moving ahead, it is inevitable that they will be left behind, their resistance to change may in fact be increased and in education and higher education, the teaching and learning practices resulting will simply be debilitating as such anachronistic beliefs are bequeathed to the offspring and their offspring etc.

AEC

As one would expect, an economic community is normally reflected by free-flows of goods, services, investments, capitals, and skilled labour, priority integration of sectors and intra-regional and extra ASEAN trades in food, agriculture and forestry. It is naïve and illogical to think that these can be achieved without changing current education generally and HE in particular. A very simple measure and evidence of this need is the increased graduate unemployment reported in the news in SEA as well formal reports (UNESCO, 2012; Philippine Studies Group, 2012; van der Kroef, 1960).

The AEC Blueprint (2008) provides more details on the contents of the AEC aims but it suffices to say that HE in ASEAN needs to change to achieve an effective AEC. Without equivalent education levels in ASEAN then a level playing field within AEC is hardly achievable and without changed education standards and practices in T&L global competition will remain an illusion.

The current/traditional T&L

As far as T&L are concerned, one could obviously go back as far as one wish. However in this paper we will start at around 1980. Combs (1981) predicted education's future demands. In developed countries a number of Education

Reforms have been carried out over the years (Butler, 2007; COAG 2013; Snook et al 1999; Morgan 2014). Indeed, we all know that education either formal and modern or old and traditional has existed for a long time. Nevertheless, Murray (2008) claimed that "The educational system is a living lie." and proceeded to provide evidence. In essence he says that the best educational system in the world, viz. the US educational system that many of us are awed by and attempt to emulate in our respective countries, doomed our graduates to mediocrity. Murray's argument is simply that there are too many students going to HE and too many are let through. In his opinion only 20% of these are eligible. He contends that in order to sustain his conclusions others have had to be conditioned to join in when their talents are really not in it. Ken Robinson (2001) reiterated this point in one of his videos (see refs) when he told audience about a girl whose mother thought to be *hyperactive* until she took the daughter to a psychiatrist or psychologist who showed the mother that the daughter was not hyperactive at all but in fact had dancing talent. The girl proceeded to become a world renowned ballerina. One shudders to think what would have happened had she been given suppressants for her alleged hyperactivity as normally the case now. The world would have lost a great artiste and would be poorer because of it.

In brief, T&L in the region has been and seems to be dominated by ***rote learning*** where assessments are normally by *testing memory* rather than testing knowledge. Idrus (2012) carried out an analysis of all exam questions at a university in Malaysia over a full academic year and found that 96% of the questions and of the time they indeed were testing memory and not knowledge.

While technology has been recognized even at the remote corners of the world, education seems hesitant to do so, with the consequence that our education systems, particularly in South East Asia (SEA), are well behind that in more developed countries (Aruna, 2012; Idrus, 2013a, b; Idrus, 2014; Idrus et al, 2014; Pangulangan, 2005; Shaw, 1999). To be sure there has been sporadic 'tries-out' by individual lecturers and teachers. Few if any institutionalized practices of updated T&L in SEA seem to exist. It is hoped that with the establishment of AEC in 2015, impetus will be given to revolutionizing education and higher education in the region. Regrettably, it has to be said that the AEC planners as reflected in its *Blueprint*, had forgotten about the pivotal roles of education in achieving any of AEC's published aims and desires. For one, without all of the AEC's member countries having at least equivalent if not equal educational, innovative and creative skills levels, how does anybody ensure equity across the region? Surely interchangeability of skills and expertise is a strength that AEC should have considered at the outset to espouse the region's global competitiveness.

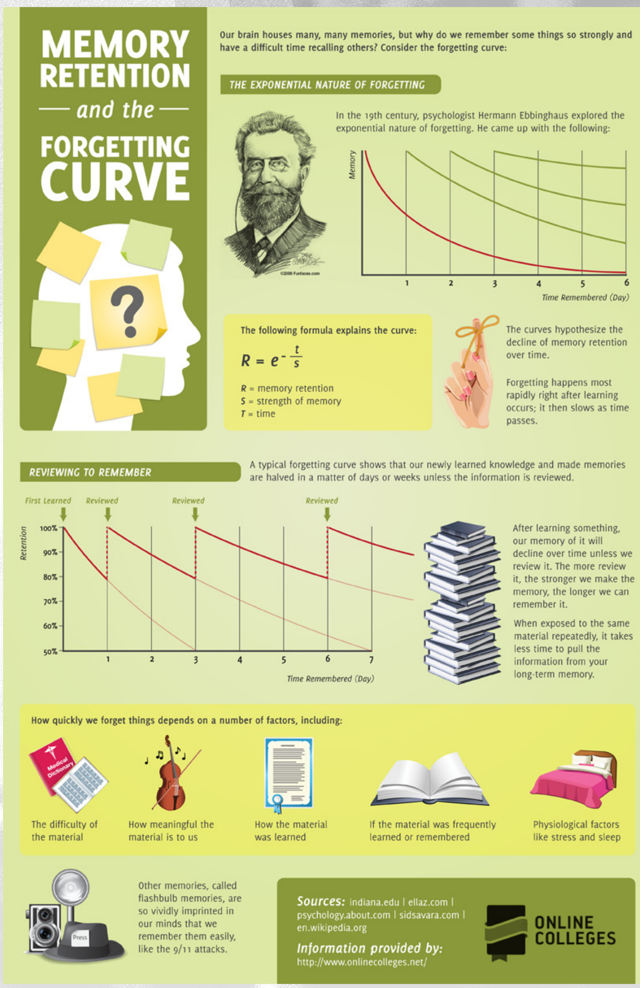

Figure 1 – **Ebbinghaus' experiments in Memory Retention and the Forgetting Curves**

As shown in Fig. 1 above, Ebbinghaus demonstrated the shortfalls of memories and memorization. One expected educators in the region would have taken notice of this and modified their teaching methods appropriately. But rote learning is still king in education in the region. A Year 10 student in Malaysia, Leong Zue Wei (2012), described precisely the observations of debilitating T&L made in this paper. The student started by blaming parents for their autocratic culture, but one could ask where did they get such culture if not in turn from their teachers/lecturers.

Personal *crusades* though slow appear to be the only way at the moment, certainly in Malaysia, to change T&L. Again these are sporadic and happening in some universities and within them only in some programmes in some faculties. Anecdotal evidence points to the autocratic management systems at schools and universities. Penalties can be tragic for the educator (and family) if s/he does not tow the line. Perhaps in some cases these are imagined but personal experiences of many educators support such management fiasco (Idrus, 2005-2014). Obviously this is another very important area to be addressed by university and school governance.

The closeness of SEA nations in the educational characteristics of their students was explored in Idrus et al (2014) through a survey of a total of 976 university students in Malaysia, Indonesia and The Philippines. The correlations in all the factors measured between these students are better than 0.94. The Cronbach¯ of the questionnaire is maintained well above the acceptable threshold of 0.7 in all the three countries.

To indicate the debilitative effects of the T&L styles in SEA a comparison against North American students was carried out. Literature research was conducted on students born after 1980 and on their study characteristics in North America. Much has been written about them therefore the literature research was adequate (Jones et.al, 2010; Oblinger & Oblinger, 2005; Palfrey & Gasser, 2008; Philip, 2007 *as some sample*). Table 1 resulting from the author's own research shows these differences in the responses to the various survey questions. The SEA students surveyed missed out seven out of twelve of characteristics of the North Americans'. Both groups are Net Gens. Following further analysis (*current research*) it was discovered that the seven that SEA students do not have are characteristics that depend on T&L.

Table 1 – **Net Gens characteristics in North America and Southeast Asia**

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	/	x
6	They tend to teamwork, prefer experiential activities and use technology	/	/
7	They prefer to be involved in creating rather than being passive recipients	/	x
8	Students coming to college expect a 'transformative education'	/	x
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	/	x
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	/	/

/ = Yes ; × = No ; ? = Responses are vague and ambiguous thus cannot be taken as positive

NTH AMER = North American; M/I/P = Malaysian, Indonesian, Philippines

However, we must not be consoled by this, because it is nothing more than the *lowest common denominator*. AEC aspires to be a strong community to face global challenges and competition and it cannot achieve this when its education quality is at the lowest common denominator.

Personal observations showed that in some respects Singapore and Vietnam have changed their education systems and their T&L. Several years ago, Vietnam established the philosophy of *'Doi Moi'* which strongly advocated trade and commercialism within the strict discipline of communism. This had filtered through to education and thus T&L. Problems in other SEA nations would be different but they should seriously take note of this because the ubiquitous T&L in SEA is obsolete and anachronistic for the needs of the countries and the students in this day and age.

Roles of governance in education

Technology, curricula and conducive environment at schools and universities allowing valuable critical thinking and innovations appear to be the necessary but not sufficient conditions to move forward to achieve the aims of AEC's. Educationists, educators and education experts as should engineers and scientists must be able to communicate well with and to their community in general. It is generally recognized that except perhaps in two or three countries in Asia and much less in SEA, knowledge including IT illiteracy is still a big challenge perhaps caused by poverty. In all these, sincerity to help is mandatory in addition to patience and ability to listen as well as the ability to talk 'their language' as misunderstanding could be very expensive.

Governing bodies of schools and universities in SEA must therefore be open minded, able to accept what currently may be termed as esoteric ideas in education and educating and even potential improvements which are considered risky. As the governing bodies are responsible to steer the institutions, it behooves them to be highly professional, well informed and preferably have an environmental scanning capability as well as regular reviews and updates. Such stewardships must also include the selection of the most appropriate management characters who will in turn appoint the most appropriate academics and administrative personnel. Standard Operating Procedures (SOPs) including Policies, Rules and Regulations, form the next important determining quality factor for an institution. The absence of these basic provisions will prove detrimental to AEC particularly in achieving its honorable plans.

Conclusion

South East Asian HE is indeed at the cross roads particularly in the face of realizing AEC in 2015. This paper has shown that AEC's deliberations had either glossed over education and HE or had forgotten about the pivotal roles of education/HE in the roles of AEC.

Much needs to be done by all ASEAN to address the tests posed by the challenges highlighted in this paper. Some potential ways to address them have been discussed. Those who have seen it earlier is well on their way but surely too big a difference between them and the others will not create peaceful and friendly joint development of AEC. Therefore governments, school and university governors and Board of Directors will have to make a significant decision which road to follow at this stage and into the future.

REFERENCES

Aruna P. (2012) Employers: Fresh graduates not suitable and are liabilities. The STAR online, May 16, 2012. http://www.thestar.com.my/News/Nation/2012/05/16/Employers-Fresh-graduates-not-suitable-and-are-liabilities/

Butler G., (2007) "Higher Education: it's evolution and present trend." Journal of Australian Political Economy, Vol.60 pages 28-53.

Combs A.W. (1981) What the future demands of education. Phi Delta Kappan Int., 62: 369-372

Council of Australian Governments (2013) National Education Reform Agreement, Commonwealth Govt. of Australia

Jones C., Ramanau R., Cross S., Healing G. (2010) Net generation or digital natives: Is there a distinct new generation entering university? Comp. Educ. 54: 722-732

Idrus, N., (2005-2014) Personal communications with academics in several universities in Indonesia and Malaysia. These have never been published

Idrus N., (2012) Report on Exam Questions Analysis [Proprietary Report], Malaysia

Idrus N., (2013a) Opinion Page: Should Quality be part of lecturers' tool - kit in Malaysia? Journal of Institutional Research in South East Asia, 11, 1, May/June

Idrus N., (2013b) Opinion Page: Will the pursuit of university ranking help? Journal of Institutional Research in South East Asia, 11, 2, Oct/Nov

Idrus N., (2014) Opinion Page: Are Universities teaching what they should be Teaching? Are we teaching the right thing? Journal of Institutional Research in South East Asia, 12, 1, May/June

Idrus N., Ng P.K., Jee K.S.(2014) Sustaining Quality in Higher Education in Southeast Asia through Understanding Generational Changes. Journal of Applied Sciences 14 (160: 1819-1827.

Leong Z.W. (2012) Aceing students are not that smart, STAR Educate, 01 July 2012, Kuala Lumpur, Malaysia

Murray C. (2008) Real Education. Crown Publishing Group a div of Random House, New York.

Oblinger D.G. & Oblinger J.L. (2005) Educating the Net Generation. Educause Publishers, UK, ISBN-13:9780967285320, Pages: 264

Palfrey J. & Gasser U. (2008) Born Digital: Understanding the First Generation of Digital Natives. Basic Books, New

York, ISBN-13:9780465005154, Pages:375

Pangulangan R. (2005) Rote Learning in schools: Asia's handicap, Philippine Daily Inquirer, A14, April 2005

Philip D. (2007) The knowledge building paradigm: A model of learning for net generation students. http://www.ict-21.ch/com-ict/IMG/pdf_Phililp.pdf.

Robinson K., (2001) Out of your minds –Learning to be creative, Capstone Publishing Ltd, Chichester, West Essex (A Wiley company) ISBN 13 978-1-84112-125-3(P/B)

also view the following videos on creativity and educational changes, featuring Ken Robinson:
http://www.ted.com/playlists/124/ken_robinson_10_talks_on_educ
http://www.youtube.com/watch?v=iG9CE55wbtY
http://www.youtube.com/watch?v=qFA3K0G2XlA
http://www.youtube.com/watch?v=r9LelXa3U_I
http://www.youtube.com/watch?v=zDZFcDGpL4U
http://www.youtube.com/watch?v=9X0CESnGQ8U&feature=related

Shaw S.M. (1999) The next century can be Asia's if it abandons its Confucian ways and embraces the wisdom of democracy and capitalism. Time Asia, http://edition.cnn.com/AsiaNow/time/asia/magazine/1999/990823/shaw_viewpoint.html (Accessed 21 Jan 2003)

Snook I., Collins G., Adams P., Harker R., Adams R., O'Neill J., Clark J., Pearce D., Codd J. (1999) Educational reform in New Zealand 1989-1999: Is there any evidence of success? Massey University, New Zealand

The ASEAN Secretariat (2008) The Asian Economic Community Blueprint, published by the ASEAN Secretariat, Manila, The Philippines, ISBN 978-979-3496-77-1

The Philippine Studies Group (2012) Unemployment among university graduates in Southeast Asia is on the rise – the highest is in Indonesia and Philippines, retrieved 17/7/2014 from http://philippinestudiesgroup.tumblr.com/post/20068556663/unemployment-among-university-graduates-in-southeast

The Rt Hon Nicky Morgan MP (updated 2014) Reforming qualifications and the curriculum to better prepare pupils for life after school Department for Education, UK Government
https://www.gov.uk/government/policies/reforming-qualifications-and-the-curriculum-to-better-prepare-pupils-for-life-after-school

UNESCO (2012) Graduate Employability in Asia, UNESCO Bangkok Asia-Pacific Regional Bureau for Education, Published by UNESCO, ISBN: 978-92-9223-395-2

van der Kroef, J.M. (1960) The Educated Unemployed in Southeast Asia: A Common Problem in India, Indonesia, and the Philippines, Jnl Higher Education, XXX1, 4, April.

Sampling Designs and Formulae in Business and Management Research

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ABSTRACT

The study sought to determine commonly employed sampling designs in student business/management research. It made use of documentary analysis to 64 research books, 72 statistics books, and 150 undergraduate and graduate student researches. Results show that at most, only 58 of 136 research and statistics books discuss probability sampling designs, the most common of which are simple random sampling, cluster sampling and stratified sampling. Seventy three (73) out of 150 thesis/dissertations that have sampling design utilized proportionate stratified sampling (45) and simple random sampling (28). A maximum of 19 books (out of 136) presented sampling formulae, most frequent (19) of which is that one that estimates population mean, with infinite population followed by the formula that estimates population proportion with infinite population. All 73 student manuscripts used the sampling formula that was specified in only three books, the formula that requires only population size and margin of error, which is a derivative of the sampling formula that estimates population proportion in a finite population.

***Keywords*: Statistics, Sampling designs, Sampling formula, Albay, Philippines**

Introduction

Research plays a very vital role in global development. It has caused and still effects the entry of technology that facilitates man's activities, made medical breakthroughs that save and prolong the lives of billions of people, revolutionized farming that tremendously increase the food yields of lands and helped build facilities that significantly lengthen the storage life of edibles.While research is indispensably important, it is likewise skills-based. Among these skills imperatively necessary is sampling. Sampling reduces the cost of doing research. While doing a complete enumeration would provide a better picture of the population than covering a sample, there are a number of critical reasons why in many instances, a researcher has to study just a sample. Extreme danger, impracticality, infeasibility, and cost are among them.Practically many researches employ the sampling formula that requires only data onpopulation size and an assumed margin of error. There are however researchers and statisticians who are reluctant to recommend it because other uniquely important formulae are available.

This study determined the commonly employed sampling designs and formulae in student business/ management research,specifically identifying the probability sampling designs discussed in statistics and research books, thesampling designs frequently used in business/ management researches, the sampling formulae specified in such books, and the formulae frequently employed in said researches.

Results of this study could pave the way for the enhancement of textbooks in statistics, as well as the inputs of teachers, addressing the "sampling" issues which could eventually fast track the conduct of quality research and the ensue of new knowledge.

Related Literature

Problems on sampling are not uncommon in both research proposals and completed papers. The analysismade by Purnawan (n.d.) on 30 research proposals from the English education departmentof a university revealed that 26 of them have a methodological flaw on research design that (includes sampling) and method of data analysis. Thomson (1999) mentioned the incorrect interpretation of statistical significance as among the common methodology mistakes in educational research. In the study of Kikola and Qorro (2007), reviewers asked by the researchers ranked number 1 as weaker aspect of research proposals, unsatisfactory sampling procedure. Of the 131papers studied, Williamson (2003) found out that 89 (68%) reported their samples as random when they were in fact either convenience or a population.

The study of See (2010) showed that fourteen of the78 (17.95%) papers had complete sampling procedure. The remaining 64 (82.05%) all had only partial sampling process. This deficiency in the sampling includes not mentioning the population or the general sample type or the probability sample class or the sample selection. Some even claimed of probability sampling yet also named convenience sampling. He also uncovered that thirty (38.46%) of the manuscripts have consistent sample type and statistical method. The other 48 (61.54%) had incompatible sample and statistical tool, most of them non-probability samples employed with inferential analysis and probability samples where no inference was made- especially for one-variable (non-comparative) analysis.

Sampling is a subject that has been taught and is taught in higher education institutions. It is always a part of research statistics. It is periodically applied by research students and professionals.Yet, professors, students, and professionals from universities and other institutions from many countries still ask questions on how to determine sample size, what sampling design to use and when to make an inferential analysis (Kowalsky , et.al., 2013).This undertaking presents a comparison of the sampling designs and formulae discussed in research and statistics textbooks and those actually used in student researches.

The data on sampling designs and formulae being taught to students were taken from a complete enumeration of 64 basic research text/reference books and 72 statistics text/reference books for business, education, nursing, sciences, engineering, agriculture, and other disciplines not for statistics majors which were listed and were available in the libraries of four higher education institutions in Albay, Philippines, supplemented by those personally purchased by the authors for the purpose of this study. The theses and dissertations were 150 undergraduate and graduate final manuscripts of management and business administration students submitted within March 2010 and April 2013 purposively selected from the list in the libraries of four colleges and universities in the province of Albay, Philippines. The analysis was made by three researchersguided by the specific objectives/research problems. Simple descriptive statistics namely frequency count and percentage were used in the analysis.The preparation of the research protocol and content analysis guide was done from November 4-30, 2013. Data collection, organization and analysis were accomplished in December 1-20, 2013. The terminal report was prepared from January 5-30, 2014.

Results and discussions

Probability sampling designs discussed in statistics and research books

Table 1. **Sampling designs frequently discussed**

Probability sampling design	Research books, n= 64		Statistics books, n= 72		Total, n =136	
	Frequently	*Percent*	*Frequently*	*Percent*	*Frequency*	*Percent*
Simple random sampling	34	53.13	24	33.33	58	42.65
Stratified random sampling	30	46.88	22	30.56	52	38.25
Proportionate stratified random sampling	11	17.19	1	1.39	12	8.82
Disproportionate stratified random sampling	8	12.50	0	0	8	5.88
Optimum allocation stratified random sampling	1	1.56	1	1.39	2	1.47
Systematic random sampling	28	43.75	16	22.22	44	32.35
Cluster random sampling	30	46.88	14	19.44	44	32.35
Multi-stage random sampling	9	14.06	3	4.17	12	8.82

Table 1shows that at most, only less than one-half of the textbooks in research and statistics discuss simple random sampling, stratified random sampling, systematic random sampling, and cluster random sampling.

Non-presentation of random sampling designs implies that these books are focused on descriptive statistics. While they include chapter in inferential analysis, they did not talk about and illustrate random sampling designs. This is an inadequacy because probability sampling is indispensable to inferential analysis.

Sampling designs frequently used in business/ management researches

Table 2. Sampling designs frequently used

Probability sampling design	Frequency, n =73	Percent
Simple random sampling	28	38.36
Cluster random sampling	0	0
Stratified random sampling (proportionate)	45	61.64
Systematic random sampling	0	0
Multi-stage sampling	0	0
Cluster random sampling	44	32.35
Multi-stage random sampling	12	8.82

Of the 150 manuscriptsexamined, 73 papers used probability sampling. Table 2 displays that from these 73 student researches, 28usedsimple random sampling and 45 employed proportionate stratified random sampling. The seeming popularity of stratified random sampling could be attributed to its easy mathematical application and the prevalence of researches that describe their populations with two or more characteristics inviting researches to stratify according to these characteristics. Simple random design is also commonly applied because of its relative simplicity in computation and selection.The zero use of cluster, systematic and multi-stage sampling may be ascribedto the relative "complexity" in the process of their size determination and the selection of the elements from the population. The relatively small populations involved in student researches could also be a reason.

Sampling formulae specified in statistics and research books

Table 3. **Sampling formulae frequently specified**

Probability sampling design	**Research books, n= 64**		**Statistics books, n= 72**		**Total, n =136**	
	Frequently	*Percent*	*Frequently*	*Percent*	*Frequency*	*Percent*
Formula that estimates population mean, infinite population	2	3.13	17	23.61	19	13.97
Formula that estimates population mean, finite population	0	0	10	13.89	10	7.35
Formula that estimates population proportion, infinite population	3	4.69	11	15.28	14	10.29
Formula that estimates population proportion, finite population	0	0	5	6.94	5	3.68
Formula that requires only population size and margin of error	0	0	3	4.17	3	2.21

Very few statistics books and fewer research books discuss sampling formulae (Table 3).The most frequent formula discussed is the formula that estimates population mean with infinite population , which is given below

$n = z^2\ \delta^2$ where n is sample size, z = standard score based on an assumed confidence level
e^2 δ= standard deviation, and e = margin of error (in ratio/interval measure)

(Pegula, 2008; Lind, et.al___; Berenson, et.al, 2006; Weirs, 2005; Moore, 2004; Larson &Faber, 2003; McClave & Sincich, 2003; Moore, et.al, 2003; Davis, et.al, 2002; Pelosi, et.al, 2001; Triola, 2001; Cooper &Schindler,1998; Healey, 1996; Sincich, 1996; Anderson, et.al, 1996;Hamilton, 1996; Triola, 1995; Mendenhall & Reinmuth, 1982; Hertzman & Mueller, 1980)

This is followed by the formula that estimates population proportion with infinite population presented below

$n = z^2PQ$ where n is sample size, z = standard score based on an assumed confidence level
e^2 P is assumed proportion in decimal, Q =1-P, , and e = margin of error (in decimal)

(Berenson, et.al, 2006; Weirs, 2005;Larson& Faber, 2003; McClave & Sincich, 2003;Duckworth, 2003; Davis, et.al., 2002; Pelosi, et.al, 2001; Anderson, et.al., 1996; Sincich, 1996; Bordens& Abbot, 1996; O'Sullivan & Rassel, 1995; Mendenhall & Reinmuth, 1982) Third is the formula for estimating population mean with finite population size given below.

$$n = \frac{N\delta^2}{\frac{(N-1)e^2 + \delta^2}{z^2}}$$

where N = Population size; δ^2 = Variance of the variable being measured; e = Margin of error in terms of the value of the variable being measured; z = Standard score based on an assumed confidence level *(Lind, et.al.___; Berenson. et.al., 2006; Weirs, 2005; Newbold, et.al., 2003; Davis, et.al., 2002; Anderson, et.al.,1996; Madsen & Moeschberger, 1983; Mendenhall & Reinmuth, 1982; Neter, et.al., 1966)*

Fourth is the formula for estimating population proportion with finite population size given as follow.

$$n = \frac{NPQ}{\frac{(N-1)e^2 + PQ}{z^2}}$$

where P= proportion between two variables of nominal measure in decimal form; Q = 1-P
e = margin of error in decimal form; z = standard score based on an assumed confidence level
(Weirs, 2005; Newbold, et.al., 2003; Davis, et.al., 2002; Anderson, et.al., 1996; Mendenhall & Reinmuth, 1982)

The least frequent among the books (3 of 136) is the formula that requires only population size and margin of error.

$$n = \frac{N}{Ne^2 + 1}$$

(Nuque& Feliciano, 1984; Mendehall & Reinmuth, 1982; and Pagoso, et.al., 1978)

The very low frequency of textbooks in research and statistics that present, explain and illustrate formulae that calculate probability sample size is worth looking into. It is common knowledge that in business and management research, sample surveys, among other research designs and strategies, are very often conducted by students, teachers and professionals. For the books to miss this important topic is indeed surprising but interestingly an opportunity to explore.

Sampling formulae frequently employed in business/management researches

All 73 manuscripts that claimed to have employed probability sampling and actually calculated sample size used the derivative formula that estimates population proportion, with finite population,but P, Q & z not visible in the formula. The sampling formulae for estimating population means, while most frequently discussed in the statistics books have not been used by any of the analysed student researches.Perhapsthis seemingunattractiveness of the method is due to therequired variance, δ2, which, after all, is one of the unknown variables sought to be measured by the research. For studies involving new populations, this technique appears to be absurd. The formulaewould be most useful when probing populations that have already been studied in the past.

In many sampling computations involving the same population but measured for differentvariablesthat cover both ratio/interval and categorical measures, the formula that needs only population size and margin of error is the most popular, This could be credited to the very few mathematical steps involved in its calculation and only population size is required as an input parameter. It is also unexpected that a formula rarely available in statistics and research textbooks would be so popular among research students. In the same manner, it is also startling that a formula that is widely known to and used by researchers would not be taught in books designed for future researchers.

$$n = \frac{N}{Ne^2 + 1}$$

(Nuque& Feliciano, 1984; Mendenhall & Reinmuth, 1982 and Pagoso, et.al., 1978)

Provided by Yamane in 1967 (Kasiuleviciusi, et.al,, 2006), many researchers wonder where this formula came from. Unknown to many, it is derived from that one that estimates population proportion with finite population.

$$n = \frac{NPQ}{\frac{(N-1)\,e^2}{z^2} + PQ}$$

How P, Q, and z became invisible in the formula will be discussed in this paper.Following is the stepwise proof for the derivation of the formula.

$$n = \frac{NPQ}{\frac{(N-1)\,e^2}{z^2} + PQ}$$

Population size (P), Q, and z disappeared because they were replaced by actual values. Population size, P is assumed to be 0.5, which automatically results to a Q value of 0.5 since Q = 1-P = 1-0.5 = 0.5. The number 0.5 is the P value that yields the highest possible sample size, as determined by this author and. as explained by Madsen &Moeschberger (1983, p. 314),

> “The quantity of PQ always lies between 0 and 0.25. It assumes a maximum value of 0.25 when P = 0.5. Consequently the largest value of n is at this value. To be on the safe side, we can use this large value”.

The standard score (z) of 2 arises from a confidence level of 95.44 per cent. How this was determined is presented in the following process-set the confidence level at 95.44% or 0.9544, from this value, define the level of significance, 1-0.9544= 0.0456, the matter is two-tailed, so divide 0.0456 by 2 , resulting to 0.0228, subtract this value from 0.500; 0.500-0.0228 = 0.477, locate the z value of 0.4772 from the z table.The critical value, z = 2. How the minus 1 in N-1 disappeared is explained below

> “When N is very large the sample size formula reduces 1 to zero...”(Mendenhall & Reinmuth, 1982, p 72)

Substituting the assumed actual values to P, Q, and z and removing 1 thus translates our equation to the following.

$$n = \frac{NPQ}{\frac{(N-1)\,e^2}{z^2} + PQ} = \frac{N\,(0,5)(0.5)}{\frac{N\,e^2}{2^2} + (0.5)(0.5)}$$

$$n = \frac{0.25N}{\frac{Ne^2}{4} + 0.25} = \frac{0.25N}{\frac{Ne^2}{2^2}} = \frac{(4)0.256N}{(4)0.25\,Ne^2 + 1} = \frac{N}{Ne^2+1}$$

While the formula seems to depend only on the known size of the population and the assumedmargin of error in decimal, its proof of derivation shows that it presupposes the following: a very largepopulation size (N), a confidence level of 95.44 per cent, and a proportion (P) of 0.5. It is originally designed for research variables with categorical measure. Using this derivative formula, a maximum sample size each will result for any given margin of error, no matter how big the population is.It must also be noted that when the size of N does not make 1 negligible, the derivative formula is

$$n = \frac{N}{(N-1)e^2 + 1}$$

Conclusions

On the basis of the findings, it is concluded that there is a mismatch between the sampling designs and sample size-calculating formulae discussed in textbooks, and logically the substance of what teachers deliver; and those actually used by students in the conduct and analysis of their theses and dissertations. There is also a gap in the sampling designs contained in such books and the sampling formulae they cover. Incongruously, the sampling formula least presented in the books is the formula used in all manuscripts that involved sampling. This presupposes that Statistics books authors lack information about the experience of student researchers and real-life situations like the findings of this paper and the need to make clear illustrations of the uniquely important but unattractive formulae. This is a clear-and-present opportunity to improve text/reference books on the subject and to provide supplemental materials to teachers, and consequently to help our research students on the matter.

Recommendations

In order to bridge the mismatch in the sampling designs and formulae between the textbooks and the theses and dissertations, and what the teachers may have been delivering, authors and publishers, as well as professors, may do an analysis of the contents of their text/reference books based on the findings of this paper, validate it by analysing business and management thesis and dissertation manuscripts and research journals, and make the necessary enhancement of their books to be published in the future, or the contents of what mentors teach, addressing the uncovered “sampling” issues. It will be important to cross over to and “immerse” with student researches and get first-hand feedback. Statistics books, as well as the teachers who communicate them, will need to change the approach on presenting sampling from a very hypothetical one into something that is practical and user-friendly. Seminars and trainings based on the findings of this research , and a publication on easily accessible and usable programs on sampling formula selection and sample size calculation are suggested. This approach may be able to motivate student researchers to apply the otherwise seldom used but uniquely more appropriate sampling designs and formulae, the final outcome of which will be quality research outputs.

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REFERENCES

Anderson, David R., D.J. Sweeney, and T.A. Williams.(2004). Essentials of Modern Business Statistics with Microsoft Excel, 2e. South-Western, 5191 Natorp Boulevard, Mason, Ohio 45040 http://www.swcollege.com

Cooper, Donald R. and P.S. Schindler. (1998). Business Research Methods. Irwin-McGraw-Hill Boston USA

Cozby, Paul C., P.E.Worden, and D.W. Kee. (1989). Research Methods in Human Development. MayfieldPublishing Company.1240 Villa Street. Mountain View, California 94041.

Davis, Duane, J. Utts, and M. Simon. (2002). Statistics and Research Methods for Managerial Decisions.Second Edition. Brooks/Cole, 511 Forest Lodge Road, Pacific Grove, CA, 93950 USA

Elmes, David G., B.H. Kantowitznd H.I. Roediger III. (1995). Research Methods in Psychology. 5th ed. West Publishing Co.610 Opperman Drive P.O. Box 64526

Fishbein M.A. and E. Ajzen. (1975). Belief, attitude, intention and behavior: an introduction to theory and research, Reading, MA, Addison Wesley.

Freedman David, R. Pisani, R. Purves, and A. Adhikari. (1991). Statistics.Second Edition.W.W. Norton &Company, NY.

Gay, L.R. and Peter Airasian. (2000). Educational Research Competencies for Analysis and Application.SixthEdition. Merrill, Upper Saddle River, New Jersey.

Glass, Gene V. and K.D. Hopkins. (1984).Statistical Methods in Education and Psychology.Allyn and Bacon, Boston

Hamilton, Lawrence C. (1996). Data Analysis for Social Scientists A First Course in Applied Statistics.Duxbury Press, Boston.

Healy, Joseph. (2002). Statistics A Tool for Social Research. Sixth Edition.Wadsworth/Thomson Learning, 10 Davis Drive, Belmont, CA 94002-0563, USA.

Heiman Gary W. (1999) .Research Methods in Psychology.Houghton Mifflin Co.Boston.

Hertzman, William R. and F.W. Mueller. (1980). Statistics for Business and Economics. Allyn and Bacon, Inc.,Boston

Hildebrand, David K.and Lyman Ott.(n.d.)Statistical Thinking for Managers. 2nded.Horim,

MosheBen and Haim Levy. (1981). Statistics Decisions and Applications in Business and Economics.Random House, New York.

Howell, David C. (1997). Statistical Methods for Psychology.Fourth Edition.PWS Publishers. 20 Park Plaza. Boston, Massachuesetts 02116.

Howell, David C. (1987). Statistical Methods for Psychology.2nd ed. PWS Publishers.20 Park Plaza. Boston, Massachuesetts 02116.

Huntsberger, David V., D.J. Goft and P.B. Billengsley. (1980). Statistical Inference for Management and Economics. SecondEdition.Allyn and Bacon, Inc., Boston.

Jaccard, James and M.A. Becker. (1997). Statistics for the Behavioural Sciences. Third Edition. Brooks/Cole Pub. Co., NY.

Kazmier, Leonard J. and N.F. Pohi.(.n.d.) Basic Statistics for Business and Economics.Second Edition.McGraw-Hill, Inc. NY.

Kowalsky, Lukasz, Duc, A., Senates, E.,Singh, N., Memon, M., Madi, T., Moore, K., Sangngam, P., Hernandez, E., andPhing, Y. (2013). Q&A. ResearchGate. Online. Available https://www.researchgate.net/home.Home.htmlDecember 20, 2013

Larson, Ron and B. Faber. (2003). Elementary Statistics Picturing the World. Second edition. Prentice Hall Upper Saddle Drive NJ 07458

Levin, Jack and James Alan Fox. (2004). Elementary Statistics in Social Research The Essentials. Pearson Education, Inc. New York.

Levin, Richard I. (1978). Statistics for Management.Prentice-Hall, Englewood Cliffs, NJ.

Madsen, Richard W. and M.L. Moeschberger. (1988). Introductory Statistics for Business and Economics. Prentice-Hall, Inc.Englewood Cliffs, NJ.

Mason, Robert D., D.A. Lind and W. Marchal. (1999). Statistical Techniques in Business and Economics.Irwin-McGraw-Hill. USA.

McClave, James T. and Terry Sincich.(2006). A First Course in Statistics. Ninth Edition..Pearson Prentice Hall. Upper Saddle River, New Jersey 07458.

Mendenhall, William, Robert J. Beaver, and Barbara M. Beaver. (1999). Introduction to the Practice of Statistics.10th ed. Duxbury Press, ITP, NY.

Minium, Edward W. (1978) .Statistical Reasoning in Psychology and Education.2nd ed. John Wiley & Sons, NY.

Moore, David S., George P. McCabe, William M. Duckworth and Stanley L. Sclove. (2003). The Practice of Business

Statistics Using Data for Decisions. W.H. Freeman and Company, NY.

Neter, John, W. Waserman, and G.A. Whitmore. (1966). Fundamental Statistics for Business and Economics. Abridged 4thEdition.Allyn and Bacon, Inc. Boston.

Newbold, Paul, W. Carlsen and B. Thorne. (2003). Statistics for Business and Economics. Fifth edition.Prentice Hall Upper Saddle Drive NJ 07458

Nuque, Simplicio, R., F.T. Felciano and F.B. Uy. (1984). Fundamentals of Business Statistics for College.Merriam & Webster, Inc., Manila, Phils.

Ott, Lyman. (1984). An Introduction to Statistical Methods and Data Analysis. Second Edition. Duxbury Press, Boston

Paguso, Cristobal, G. Garcia, and C.R. Guerrero De Leon. (1978). Fundamental Statistics for CollegeStudents.Sinag-tala Publishers, Inc., Manila, Phils.

Pelosi, Marilyn, T.M. Sandifer, and U. Sekara. (2001). Research and Evaluation for Business.John Wiley and Sons, Inc. 605 3rdVaenue, NY, NY.

Polit, Denise F. and Cheryl Tatano Beck. (2008). Nursing Research Generating and Assessing Evidence for Nursing Practice.8thEdition.Wolters Kluwer, Lippincott Williams &Wilikns, NY USA.

Purnawan, Ari. (n.d.). Common Flaws in Students' Research Proposals. English Education Department, Yogyakarta State University, Indonesia.

Sanchez, C.A. (1998). Methods and Techniques of Research.Third Edition. Rex Printing Co. Inc., Q.C., Phils.

Santos, Kevin Carl P. (2012) .Ranked Sampling. The Philippine Statistician. 2012. Vol. 61 No. 2..Pp.123-126.

See, E.S. (2010). The Adequacy, Appropriateness and Correctness in Statistical Analyses in Graduate Researches in Higher Education Institutions in Albay, Philippines. Unpublished Research. Bicol University, Legazpi City.

Sincich, Terry. (1996). Business Statistics by Example. Fifth Edition. Prentice-Hall, Upper Saddle River, NJ 07458

Silverman, Franklin H. (n.d.) Research Design and Evaluation in Speech-Language Pathology and Audiology Asking and Answering Questions. Prentice Hall,Englewood Cliffs, New Jersey, 07632.

Sirug, Winston. (2011). Introduction to Business Statistics A Comprehensive Approach. Mindshapers, Co., Inc., Manila, Phils.

Smith.Herman W. (1991).Strategies of Social Research.3rd ed. Holt, Rinehart and Winston, Inc. The Dryden Press, Saunders College Publishing.

Spector, Paul E.(1982). Research Designs. SAGE Publications The Publisher of Professional Social Science Research. London.

Sprinthall, Richard C. (1997). Basic Statistical Analysis.Allyn and Bacon A Division of Paramount Publishing, 160 Goulf Street, Needham Heights, Massachusetts 02194

Thomas, Jerry R., and J.K. Nelson. (1996). Research Methods in Physical Activity. Third Edition.Human Kinetics. P.O. Box 5076. Champaign IL. 61825-5076.

Touliatos, John and W.H. Compton. (1988). Research Methods in Human Ecology/Home Economics.Iowa State University Press. Ames, Iowa 50010.

Triola, Mario F. (2001). Elementary Statistics Using Excel. Addison and Wesley, NY

Walker, Jefferey T. and Sean Maddan. (2005). Statistics in Criminology and Criminal Justice Analysis and Interpretation.Second Edition. Jones and Bartlett Publishers International, Barb House, Barb Mews, London W670A UK.

Walpole, Ronald E, (1982). Introduction to Statistics.ThirdEdition.McMillan Pub.Co.,Inc., NY.

Weinbach, Robert W. and Richard M. Grinnel, Jr. (1995).Statistics for Social Workers.ThirdEdition.LongmanPublishers USA.

Weirs, Ronald M. (2005).Introduction to Business Statistics.Fifth edition. Thomson Brooks/Cole 10 Davis Drive Belmont CA 94002

Weiss, Neil A. (1995). Introduction to Statistics.Fourth Edition. Addison-Wesley Pub. Co.,NY.

Williamson, G.R. (2003)Misrepresenting random sampling: A systematic Review of research papers in in the Journal of Advanced Nursing. Journal of Advanced Nursing, 2003:44(3):278-88

Willis, R.E. and N.L. Chervany. (1974). Statistical Analysis and Modelling for Management Decision-Making.

The De La Salle University Dasmarinas K12 Undertakings and its Challenges to the Academic Community

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ABSTRACT

In SY 2011-2012, the DLSU-Dasmarinas administration initiates to come up with a task-force committee represented by the different sectors of the university to formulate ways on how the institution will address the challenges in the forthcoming implementation of the K12 curriculum in the Philippines. Outcomes of this areviable recommendation in the following: 1) financial stability; 2) research undertakings; 3) curriculum enhancement which includes creative programs and senior high school; 4) staff mobility; 5) quality assurance and others. Most of these undertakings are forwarded by the committee to concern offices/ sector and these are the opportunities and challenges that the academic sector was considered.

This study utilized use a qualitative type of research analysis on how the university responded well and took the initiativeson how these undertakings will berealizedespecially in the academic sector. It will also find out the challenges and opportunities that the university will be facing in the full implementation of the K-12 program since the university is also taking the opportunity of offering the K12 curriculum starting SY 2014-2015.

Key Word: **curriculum enhancement, K12 challenges, basic education program**

Introduction

The Enhanced Basic Education Act of 2013 in the Philippines, or the K-to-12 Act that establishes a "universal kindergarten" and introduces Grades 11 and 12 to high school education in both public and private schools was endorsed by the Dep Ed Secretary Armin Luistro, FSC to provide a quality 12 year basic education program that each Filipino people is entitled to. The said Republic Act No. 10533 willinstitutionalize the system of education that truly imbues our youth with the skills they need to pursue their dreams as stated by President Aquino and it was promulgated in May 15, 2013. Though it's already a law the government needs to provide an implementing rules and regulations which were disseminated in September 2013.

By signing that bill into law, both public and private school needs to abide and implement the new system of education in the basic education curriculum program to make the Filipino students at par with their peers in other countries. It is also expected the public and private school sector compliance with national educational policies, plans, and standards (Sections 21-22, BP 232)

This initiatives, though beneficial with the students in preparing them to be globally competitive will truly affect the colleges and universities in the Philippines in the full implementation of the K12 by year 2016.

While many have touted on its impact to the basic education curriculum, to the economy, and to our bid in synchronizing our educational system to world standards, rare is the discussion on its impact to tertiary education. The urgent challenge that administrators need to think about is how to cushion the impact of this new cycle to enrolment. But of high importance is the evaluation and re-engineering of the curriculum to address the changes in the cycle. Thus, the colleges and universities will face a log in enrollment for two academic years 2016-2018 because there are no incoming freshmen. Abad also added that it is a four year cyclethat there will be a50% enrollmentdecline from 2017-2020 and for almost two years faculty members will have no load.

The K12 implementation is also in line with the ASEAN integration to make the manpower competent and competitive globally, the DLSU-Dasmarinas makes this as an opportunity and challenges, thus, the administration took the initiatives to formulate the task force committee, compose of the representatives from the different sector of the university. The main tasked is to evaluate the impact of the k12 curriculum to the university and give recommendation or alternatives solution in the implementation of the k12. The task force committee has also form the workingcommittee per area that was identified by the core group, they will play a vital roles in the whole process because they will dwell on the details of the recommendation identified to ensure that all areas are covered and they are expected to collaborate to come up with the possible solutions on the financial stability, research undertakings, curriculum enhancement, staff mobility and quality assurance among others.And in the formation of the working group, the purpose is to engage the members of the academic community to be part of the solution in the K12 endeavors. In each of these groups will sit the member of the task force whose role includes bringing to the task force discussion from each working group in order to facilitate merging of all possible items that need to be put forward to the Executive Council and eventually to the Board of Trustees.

Framework of the Study

The researchers adapted the Danish Quality Principle but modified to suit the needs of the study. As shown in Fig 1 the evaluation and assessment focus on the K12 curriculum implementation and the existing condition of the university, while the review focus on the possible solutions that may recommended to the administration for adaption and implementation; while the planning stage is the preparation on the implementation of the viable recommendation for the university. Then after the implementation of the recommended solutions, the same cycle will apply to ensure that everything is properly done.

The impact of K12 curriculum nationwide though beneficial and in line with the ASEAN integration to make the Filipino graduates more competent and competitive should not be just swallowed but should be properly evaluated to make everyone in the academic community prepared and responsive. Accordingly the implications of K12 implementation to tertiary education in the Philippines are 1) log of two years in enrollment starting SY 2016; 2) there is a need to redesign the general education and course curriculum 3) focus on employable competencies and life skills of the students.

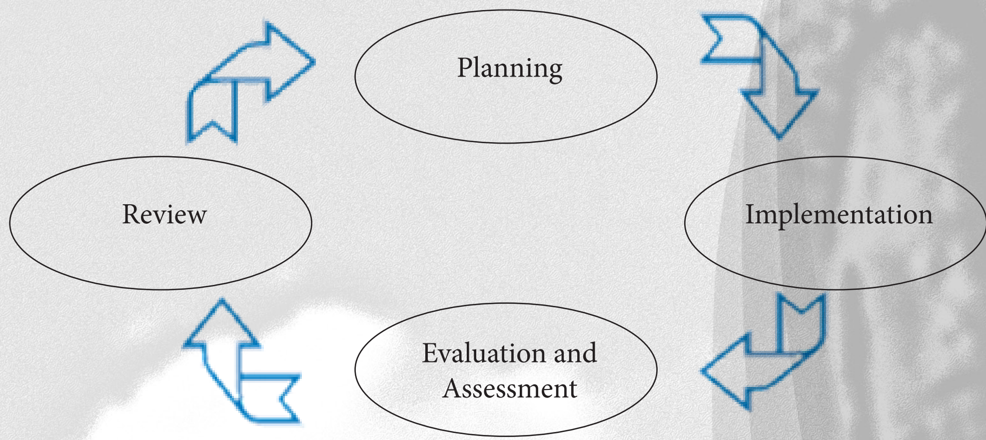

Figure 1 **The Danish Quality Principles**

Methodology

The researchers used the qualitative type of research and analyze all available information and data that focuses on K12 curriculum. Minutes of meeting from the task force committee was also used as references in some of the discussion.

Discussion

Financial Stability

One of the major concerns in the tertiary education is the sustainability of the expenditure allotment for its operation including the miscellaneous, salaries and benefits of the employees. Thus the Finance working committee main task is to assess and review the universities over all capacity and capability of the currentexpenditurethat will become aspringboard inprovidingcreative ways of solutions and recommendation to sustain the university operation during thetransition period of the K12full implementation.

The present financial condition of the university has been examined thoroughly by the working committee members. They identified first the main source of income of the university such as the collections from the tuition, miscellaneous and other fees. Accordingly, based on the actual budget performance requested from the finance division, the large portion of the total tuition fees collected is allocated or expend primarily to the remuneration and benefits of the employees which is more than the 70% .The financial expenses for the salaries is expected to goes higher every year because of the across the board increase demand of the employee over and above to the regular ranking and promotion guidelines implemented by the Human Resource Management Office. This will become one of the major concerns near 2016 because the operating expenses will remain the same but the collection will be the same with the present because of the enrollment decline.

It is also part of the discussion the possible investment portfolio that the university may initiate to sustain the current operation in the future. Moreover, the daily operation needs and other miscellaneous expenses such as water and electricity, constructions of many additional infrastructure facilities in the university as foreseen by the university president that eatsup a lot of fundsfrom the income generated by the university.

And in the university participation in the process of accreditation will also entails them in some financial concern that includes improvement,continues acquisition or upgrading of laboratory facilities and equipment, computer units and other instructional needs in the academic sector. This will also ensure that the quality of education is maintained, and will help the students prepare to be more competitive and equipped with the skills required in their chosen field of expertise and industry needs.

The feasibility study was also prepared and presented for the possible solution in some of the financial concern that will take place. If the university will just be dependent on the present financial collection, there might be a problem in the four cycle of k12 transition. In this light, the committees' float some ideas that will somehow will add and help the university in raising of funds like the front loading opportunities that the university should need to commence. Revenue from this front loading could save to cover up the future expenses and it this not be distributed or allocated for the salary of the employee or as an additional benefits. The committee member also discuss in their meeting that they should convince the DLSUD employees' that during the k12 transition, ranking and promotion for the deserving employee will be temporarily hold until such time that the finances of the university is already stable. An option to temporarily implement the freeze hiring policy to replace the vacant position due to the resignation of some employee or retirement was also occurs. Othersuggestions brought out to have additional income wereoffering of creative courses for possible employment with the partner industry and offering of the available university facilities to the public with corresponding rental charges. In this way, it will help the university creates more income generating alternative over and above of the tuition fees collected from its enrollees.

Research Undertakings

Research is one of the most important components of the university and DLSUD is on its way of strengthening and intensifying the culture of research in the community. Incentive packages are given to faculty members who are engages in research and this is also included in the pointing system in the promotion of the faculty members. Thus, the university as one of the leading institution aggressively partakesin involving the faculty members in research particularly in the development of Cavite in the next 50 years and research related to environment. This is over and above with the institutional research thrust.

In the implementation of K12, one of the major concerns of the University Research Office is on where to get budget for the research incentives and how they could encourage more faculty members in research undertakings. In the discussion transpired in the minutes of meeting of the research committee of the K12 task force, they proposed the possibility of establishing more linkages with the industry partners in strengthening the research opportunities and to support more research funding for those faculty members interested in research activities. More collaborative research involvement is also taken in consideration not only to the industry partner but as well as in the local government unit, agencies and non-government office. They also propose that the faculty members involving themselves in approved research activities will be allow having a research leave. In some of the small group discussion the sustainability of the research budget was raised. And of course how many of the faculty members has the capability in doing research is also another factor to consider. What percentage of the faculty population needed to get involved in the research activities?

Many of the recommendation by the committee members were not focus alone in the research activity but to strengthen and establish more linkages opportunities for the university. This will help them to have more collaborative research work and more research funding opportunities.

The committee envisions that if the proposal will be occurred in 2016, not only the research initiatives will be taken care of the office but as well as the salary of the research faculty. These research opportunities will also support the faculty member that has no teaching load during the k12 transition period. Most of this will be only possible if the linkages of the university will be strengthen thru the effort and participation of the colleges.

Curriculum Enhancement

Curriculum enhancement is the most probable ways that the task forcecommitteehas been thinking of as the most creative ways of giving solutions to K12 undertakings of the university. The seven colleges was all requested to prepare all potential creative courses that the colleges can be offered for a short period of time or the probability of having a double degree program.

The revision of the curricular program offerings in SY 2016-2017 is also needed but the problem is the never ending changes that happen in the curriculum released by the Education Division. The offerings of a standalone senior high school to cover up the population needed in the absence of incoming freshman also attract the attention of the committee and of the member of the academic community. They believe that this will give them the opportunity to transfer and assurance that they still have the leaching load by 2016.Preparation of the university in offering the senior high school is not a big deal because of the readiness of different laboratory andother facilities inside the campus as foreseen by the committee. They also believe that the university can provide or many of the faculty members are highly qualified to handle the senior high school.

Staff Mobility

In one of the lecture given by Atty. Abad, one practical problem posed in the Higher Educational Division Schoolare the logistical issue of faculty over supply during the years 2016 to 2021, during the k12 transition period. It is already accepted and realized that majority of the full time faculty member is affected in this transition period, the university could not also deny the fact, that there are also some offices and staff that may also suffer in the implementation of the K12 because some functions in the university that might not be needed in this transition period, specifically those personnel in charge in the marketing and recruitment of freshmen students or the laboratory technician assign in the laboratory facilities that assist student in the laboratory.

In this aspect, the committee suggested that in case the university will offer a senior high school, the movement of some faculty members may be also consider especially those that need specialization. But this idea is not quite acceptable because of some considerations that need to be agreed by the institution and the faculty members like receiving of different salary scale and benefits for those will be transfer in the senior high school. There should be a meeting of the mind and understanding in both parties (employer and employees) before these things will arise.

The committee assigned in the human resource are also have a lot of recommendation to the administration like early retirement package, personal leave without pay for a maximum of three years or asabbatical leave and or secondment not only to the lasalle institution but as well as in the government position or even in the industry. There are also certain discussion and concern outside the group discussion because other employees is also expecting that the university may offer an early retirement package but there must be a set of criteria on who and how it may be avail. Again there will be a budgetary constrain on the part of the university. Are there enough budgets to finance this purpose? If everyone is willing to avail the offer, how this will be carefully chosen? How to prevent good teacher to avail the retirement package? How to encourage them to stay long?

Though , there is management prerogative that can be implemented to decide in all aspect of the institutional operations including the employment status from hiring to firing, the committee suggested the availability of the implementing guideline that will be communicated to every member of the academic community.

Quality Assurance and Others

When the CMO 46 was released, quality assurance or accreditation is among the area highlighted in maintaining the autonomous and university status in the higher education. And this is also one of the main thrust of the university, to maintain the accreditation level status granted by the Federation of Accrediting Agencies in the Philippines and aim for the institutional and international accreditation status. Because, the university believes that this will maintain its marketability in spite of the k12 implementation and it will help a lot in attracting students.

In the full implementation of the K12 curriculum, the Quality Assurances office feels that this will also affect the initiatives of the university to undergo and sustain the voluntary accreditation undertakings. This activity has also some budgetary concern especially on the areas of recommendation where there is a need for improvement or to invest in support of instruction and of course before and during the actual date of visitation.

There were discussions raised by some group to the committee on how the university will handle the accreditation concern during the transition period. Is there any plan to halt the accreditation activities? Or the university will still pursue the accreditation activities in spite of the K12 implementation?

DLSU-Dasmarinas Challenges

It is really challenging to the university administration to maintain the current operational activitiesduring the transition period of the K-12 implementation. As a challenge every member of the academic community is encouraged to contribute acreative ways of givingsolutions in this problem. The university believes that this endeavor is not a sole responsibility of the administration but a joint responsibility of themembers of the academic community. Everyone should be involved and participates to make the challenges as an opportunity.

After consolidating the recommendation of the working committee, the task force core group endorses the proposal and its recommendation to the Executive Committee.After some deliberation they agreed which committees' proposal will be presented to the member of the Board of Trustees during their meetings. They only choose the recommendation that needs approval before its execution. Furthermore, the consolidated report was handed to the vice chancellor concern tofor proper action. In the recommendation given, the academic sector is the most aggressive andtook the full responsibility inthe implementation of theproposed plan especially those that fall in the curriculum enhancement and opening of High school.

The creative programs

The vice chancellor for academic and research immediately response on how most of the recommendation given be fulfilled. She then appointed acoordinator to handle and manage the creative programs in collaboration to the colleges and department. After a semester theoffice was called the Academy of Continuing Education-Professional Advancement Unit. This unit organizes the offerings of short term courses, certificate, and life-long learning programs for an individual seeking career and personal advancement. They ensure that courses offered are designed to keep professionals abreast with the dynamic organizational environment and create an avenue for individuals to hone their skills and interest and pursue knowledge to attain one's full potential.At present the DLSUD ACE offered 23 short term and certificate programs. The marketing and promotion of the programs is a joint force of the unit and of the colleges in charge of the programs. They also seek the assistance of other offices such as the Student Admission, Registrar and Marketing and Communication. The university believes that this undertaking is one of the best answersand may be pursued even the university is already stable even after the K12 implementation.

The establishment of the High School Department

Instead of just putting up a senior high school, the university administration decided to have the completed secondary education program available inside the university premises though it is already in the third year of implementation of the six years secondary education in the country. A feasibility studies which was presented and approved by the Board of Trustees, inspired the administration to become more aggressive in the preparation of the secondary education.

The necessary document needed in the application of permit and other regulatory requirement in putting up the secondary high school was handled by the academic sector. They ensure that permission and approval from the Department of Education (DepEd) was granted to the university before its operation. On the other hand, on the part of administration and finance, with the full supervision of the Bro. president, they have to assure that there are an enough funds for the construction of the building high school. The university administration, rest assured that they will comply with all the facilities requirement and they may go beyond with the minimum requirement in the fulfillment of a truly lasallian education ministry in the entire province of Cavite.

Again, to achieve this new endeavor, the different offices showed commitment in the establishment of an ideal High School Department. The academic sector headed by the vice chancellor closely coordinated in the administration especially during the construction period to ensure that all facilities needed is not only aesthetically designed but complied with the requirement set by DepEd.

The marketing and recruitment personnel of the Student Admission office have the more challenging role because they will not only market the undergraduate programs of the colleges but as well as the secondary level. In spite of the ongoing construction of the buildings and facilities, the SAdO was able to recruit an applicant which is more than the initial target population for the secondary school which also affect the construction of the building because the classrooms will not be enough if they will just follow the original construction plan. The enrollment size was double compared to the original projection.

More challenges, comes in the DLSUD administration because as previously discuss by the task force committee, the proposal in putting up the high school department is to have a place by those faculty members that will have no longer teaching load in 2016. But since the K12 implementation has no impact yet in the higher educational institution until 2016, the administration could not just full out the faculty member in the tertiary level because of the regulatory requirement for the teachers assigned in the junior high school. They need to hire new faculty members. But the administration is still open its doors to those interested to transfer in high school, with the condition that they will follow all the requirement and policy in the high school.

Now the high school department is in its first year of operation and it still on the process of facing the challenges with the new environment that might be also affect the existing operation of the university.

Financial Resource Challenge

After the implementation of the some recommendation of the task force the financial challenge now to the university is not only in the k12 transition period but as early as now because of the construction expenses and to provide all necessary facilities and equipment for the high school department.

However, In order to have additional financial resources the university took some initiatives of having an additional income and cost cutting measures to have more savings that can be used in the k12 transition period. All members of the academic community are encouraged to participate to have their own creative ways on to contribute to the saving of the university.

One of the actions made by the academic sector to help the university to have an additional income that may be added in the saving of the university is the front loading implementation for the freshmen students. Instead of just having a maximum class size of 40 students, it will become more than 40 students per class especially the freshman. The challenge now on the side of faculty members is to ensure that the quality of education will not be sacrifice even the class size is much bigger that the ordinary required class size of the university. Whatever earning in this front loading activity will not be distributed to the employee as part of the salary or benefit but this will be part of the savings. Aside from the front loading activity, it is also recommended to increase the total number of the target freshmen enrollees.

Research Undertaking

The challenges now in the part of administration in terms of research are to have a more research taker from the faculty members. The funding is only their secondary concern but the challenges of the office is to encourage more faculty members to engage in research and be more aggressive that the research output be submitted and accepted for publication in a reputable or a peer reviewed and scholarly journal. It is also part of the challenges of the university now to encourage and to have more formal agreement with the different industry partner in terms of Memorandum Agreement for the future research collaboration that will provided funding in the university.

Conclusion

After the thorough evaluation and review of the available documents done prepared by the members of the task force committee and the interview done by the researchers to the members of the academic community they believe that the university will be able to sustain the operation of the university during its transition period thru generating alternative source of income like the offering of highschool, opening its facilities to the public sector with corresponding fees, cost cutting measures, freeze hiring, maximize its resources. The utmost cooperation, support and participation of all members of the academic sector in the k12 challenge are needed to ensure the stability of the university in the future. This undertakings and challenges is not the problem of the university alone but of the whole member of the university.

REFERENCES

Task Force Committee Minutes of Meeting.K-12 challenge to Phil. Tertiary Education. Available in http://rodrigo75.wordpress.com/2011/04/19/k-12-challenge-to-philippine-tertiary-education/

Estrada, Joseph Noel. K to 12 Legal Implications and Transition challenges

Estrada, Joseph. K-12 =? Finding answers to legal issues and labor concern

Abad,Ada D. The K12 and ASEAN 2015 transition : Boon or Bane

Appraisal and Barriers to Clinical Performance Among Cavite State University BSN Level IV Students SY 2011-2012 in Affiliated Tertiary Hospitals

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ABSTRACT

The study was conducted to investigate the appraisal and barriers to clinical performances among Cavite State University (CvSU)Bachelor of Science in Nursing (BSN)Level IV students for Academic Year 2011-2012 in affiliated tertiary hospitals. Specifically, it aimed to determine the demographic profile of the students in terms of age, gender and clinical performance (RLE grade) in Medical-Surgical Nursing , the adequacy of exposure for the application of nursing skills in the different affiliated tertiary hospitals in areas of a) Fundamentals of Nursingb) Maternal and Child Nursing c) Medical and Surgical Nursing d) Operating Room e) Pharmacological Nursing f)Therapeutic Nursing Communication g) Nursing Documentation ; determine the extent of barriers to clinical performance encountered by the students in terms of school-related, hospital-related, clinical instructor-related and student-related barriers and identify among the four (4) barriers which significantly affect the clinical performance of nursing students.

The study utilized the descriptive survey method and used frequency, percentages and mean to describe appraisal and barriers. In determining which among the four barriers significantly affected the clinical performance of nursing students, the independent t-test was used while to determine the relationship between the adequacy of exposure to the clinical performance (RLE grade) of nursing students, Pearson product-moment correlation was used.

The results revealed that the respondent's ages ranged from 19 to 26 and above and majority were females aged 19. Most of the respondents earned an RLE grade of 2.00-2.99 indicating a good performance. In terms of the adequacy of exposure, generally, the level IV nursing students have highly adequate exposure in therapeutic nursing communication and nursing documentation while they are adequately exposed to fundamental/ basic nursing, medical-surgical nursing and nursing pharmacology. Furthermore, they have less adequate exposure in maternal and child nursing and operating room nursing. Barriers significantly affecting at a very little ex-

tent student's clinical performance generally includesaccording to rank arethe school-related, hospital-related, clinical instructor-related and student-related barriers. Furthermore, there is a significant relationship between the degree of exposure and the clinical performances of nursing students.

Introduction

The Related Learning Experience (RLE) is a curricular requirement of a degree in nursingwhich is intended to develop competencies and skills of nursing students. With the Commission on Higher Education Memorandum Order (CMO) No. 14, any professional who wishes to take up Bachelor of Science in Nursing in the Philippines must complete a total of 37 units of nursing subjects and 1,887 hours of related learning experiences in nursing subjects/ areas.

Related learning experience is essential to become a competent professional nurse. Although a theoretical and research-based education is essential for nursing, on its own, is not enough. Learning in the clinical setting provides the real world context where nursing students develop the knowledge, skills, attitudes and values of registered nurses. Students have experiences on RLE that cannot be realistically provided in the classroom or laboratory setting. They communicate with patients and their families, interact with and learn from the health-care team, practice skills under supervision of the clinical instructor and learn to deal with the complexity of competing priorities. When students are on clinical placements, they receive feedbacks on their real world performances and are guided to reflect on their live experiences as individuals and nurses. Given the importance of clinical placements, it is imperative that universities find ways to work within the constraints imposed by contemporary practice to maximize the benefits of clinical experiences in terms of student learning.

It is through clinical practice that the students learn more because it is where they apply the theories and principles that they have learned. Related learning experiences also contribute in enhancing their skills and help them to master it, which is a very important aspect that nursing students should possess to avoid malpractices and to boost their competence and confidence. Hence, clinical exposure should be given much emphasis in the main course.

From now, it will always be a challenge to the country's nursingschools to produce health care graduates of high quality. Among the mentioned three best ways of producing reliable nurses, the returndemonstrations and the on-the-job training program seem to have greaterinfluences to the students with regards to the acquisition of knowledge.This had put the practicality and actualization of the theoretical conceptsworthy of a bigger concern for educators. Student's learning of the recenttime becomes more on the application of the theoretical learning. Students' exposure may not be enough to supplement training needs of the students due to factors related to hospital policies, clinical instructor's protocol, and students' refusal to perform a certain skill, and patient's right to refuse as well as anxiety, to mention few barriers.

Hence, appraising and evaluating the clinical performance of the nursing students in the different clinical areas in the hospitals and adequacy of student's exposure can provide baseline information to determine which needing areas for improvement in the current academic policies and course management protocols. Likewise, by determining the different barriers which could hinder the expected learning outcome of the students in their Related Learning Experiences exposure, these findings can be basis for further studies and understanding learner's concerns which when resolved can redound to better quality of educational services to the nursing students.

Objectives of the Study

Specifically, this study aims to:

1. Determine the demographic profile of the students in terms of age, gender and clinical performance

(RLE grade) in Medical-Surgical Nursing course.

2. Determine the adequacy of exposure in the application of nursing skills in the different affiliated tertiary hospitals in areas of:
   a. Fundamentals of Nursing
   b. Maternal and Child Nursing
   c. Medical and Surgical Nursing
   d. Operating Room Nursing
   e. Nursing Pharmacology
   f. Therapeutic Nursing Communication
   g. Nursing Documentation

3. Determine the extent of barriers to clinical performance encountered by the students in terms of school-related, hospital-related, clinical instructor-related and student-related barriers.
4. Determine which among the identified four barriers significantly affect the clinical performance of nursing students.
5. Determine the relationship between the adequacy of clinical exposure and the student's clinical performance (RLE grade).

Methodology

The study utilized the descriptive survey method to appraise the clinical performance and identify the barriers to clinical performanceas perceived by the CvSU BSN Level IV students AY 2011-2012 in the different affiliated tertiary hospitals. The study focused on the adequacy of exposure in the application of nursing skills and the extent of the barriers encountered by the nursing students to their clinical performance.

Population

All Level IV nursing students who were officially and regular students enrolled at Cavite State University who already took selected professional nursing subjects served as the respondents of the study.

Research Instrument

The primary tool used in this study was the self- constructed questionnaire, using simplified questions with 91 number of items. The researchers used the Likert Scale to evaluate the student's adequacy of exposure in the application of skills in the different nursing areas in the affiliated hospitals and to determine the extent of barriers to their clinical performance (RLE grade). For the RLE grade of nursing students, the grades from Medical-Surgical Nursing I and II were gathered and the General Weighted Average (GWA) was extracted from the two RLE grades.

Validation of Research Instrument

Preceding the actual conduct of the survey, the researchers consulted three nursing experts for the assessment of the nursing and medical terms used in the questionnaire for face and content validity. Pre testingof the instrument to ten BSN Level IV students from St. Joseph College in Tanza, Cavite was performed and to test for reliability, the researchers subjected the obtained surveyed data to SPSS 16.0 Cronbach Alpha Test which resulted to .971, showing a very high reliability of the research questionnaire.

Data Gathering Procedure

Prior to the collection of data, the researchers solicited approval from the Dean of the College of Nursing. The researchers secured consent of the target respondents to participate in the study and assured of the data confidentiality. The researchers identified the respondents through the official list of enrollees obtained from the College Registrar upon approval of the school authorities.

Statistical Treatment of Data

In order to determine the demographic profile of the respondents in terms of age, gender and clinical performance (RLE grade) in Medical-Surgical Nursing, frequency and percentage distribution was used. Computation for the mean and standard deviation were applied to determine the adequacy of exposure in the different areas of nursing practice and extent of barriers to clinical performance of nursing students. In determining which among the four barriers significantly affected the clinical performance of nursing students, the independent t-test was used while to determine the relationship between the adequacy of RLE exposure to the clinical performance (RLE grade) of nursing students, the Pearson product-moment correlation was used.

Results

The age of the respondents ranged from 19 to 26 and above and most were females. Most of the respondents (97.8%) earned a rating of 2.00-2.99 which means a good performance and a rating of 3.00-3.99/passed was earned by 2.2 percent of the respondents in their General Weighted Average (GWA) for their level of clinical performance in Related Learning Experiences.

Adequacy of Exposure

The adequacy of exposure to fundamentals of nursing skills in terms of their RLE activities among nursing students were highly adequate in medical hand washing (x=4.62) and vital signs taking (x=4.85) including monitoring of blood pressure, pulse, and respiratory rate as well as the temperature of the patient. They were adequately exposed in turning and positioning of patient (x=3.99), while they were less adequate in providing bed bath (x=2.88), rendering morning care (x=3.32), providing wound care (x=3.11) and offering bed pan (2.94) whereas they were inadequately exposed in assisting in catheterization (x=2.40) which includes the insertion and removal.The mean score of 3.60 signifies that generally, the respondents attained an adequate exposure to Fundamentals of Nursing skills.

Having the lowest mean score of 2.40, the respondents got an inadequate exposure in catheterization skill. The ability to insert a urinary catheter is an essential skill in nursing. Catheterization skill is being taught during the first year (1st semester) and is being applied throughout the four years of the nursing course until one graduated and worked as a nurse. But sometimes, some affiliated hospitals do not allow students to insert/remove urinary catheters. A grand mean of 3.60 signifies that generally, the respondents attained an adequate exposure to Fundamentals of Nursing Skills.In this course on the fundamentals of nursing, traditionally required in the first semester of the program, the student attends classes and gives care to selected patients. A fundamental of nursing course emphasizes the importance of the fundamental needs of humans as well as competence in basic skills as prerequisites to providing comprehensive nursing care (Elsevier, 2009)

Alfaro-LeFevre (2002) cited that basic nursing skills are the skills taught in the beginning courses of the nursing degree or certificate programs. Basis nursing skills include the knowledge necessary for a nurse to perform the basic duties of obtaining vital signs, changing bandages, cleaning wounds, bathing the patients, and performing CPR.

Table 1 shows the adequacy of exposure of nursing students to maternal and child nursing skills in terms of their RLE activities. Nursing students had less adequate exposure in rendering maternal care (x=2.98) such as providing perineal care, Leopold's maneuver (x=3.26) including the FHT monitoring, computation of AOG and EDC, assisting in newborn and placental delivery (x=3.09), providing newborn care (x=2.95), assisting in episiotomy (x=2.76) as well as assisting in episiorraphy (x=2.65), preparation of NSD pack for delivery (x=2.71) and rendering phototherapy to newborns (x=2.70). A grand mean of 2.88 indicates that generally, the respondents have less adequate exposure in Maternal and Child Nursing skills.

Table 1. **Adequacy of exposure of nursing students to maternal and child nursing skills**

RLE Activities	Mean	SD	Verbal Interpretation
Maternal care (perineal care)	2.98	1.042	Less adequate
Leopold's maneuver	3.26	1.117	Less adequate
Delivery (newborn & placenta)	3.09	1.112	Less adequate
Newborn Care	2.95	1.91	Less adequate
Assisted in episiotomy	2.76	1.104	Less adequate
Assisted in episiorraphy	2.65	1.908	Less adequate
Preparation of NSD pack	2.71	1.905	Less adequate
Phototherapy	2.70	1.070	Less adequate

Every semester, almost eighteen schools are affiliated in a certain hospital specifically, availing of the cases in the special area like delivery room. For 18 weeks of related learning experience in a semester, only one to three weeksis allotted to have their RLE in the delivery area. Therefore, students have a short time or inadequacy of exposure. In a group of nursing students, each student should have delivery cases that is why students are waiting for their turn to assist in the delivery process, since in the fourth year, nursing students are required to complete three actual deliveries, three assisted deliveries and three cord care before the application for the nurse licensure examination.

Table 3. **Adequacy of clinical exposure to medical-surgical nursing areas**

RLE Activities	Mean	SD	Verbal Interpretation
Intravenous/IV Therapy (Priming, Spiking)	3.93	1.110	Adequate
Regulating/Monitoring	4.65	.756	Highly adequate
Computing (drops per minute, hours to run)	4.52	.816	Highly adequate
Incorporating medications	3.49	1.011	Less adequate
Removal of IV insertion	3.61	1.090	Adequate
NGT Feeding	3.15	1.032	Less adequate
Oxygenation/ambubagging	2.86	1.027	Less adequate
Deep breathing exercise/ bronchial tapping	3.39	1.097	Less adequate

Table 3 shows the adequacy of exposure to medical-surgical nursing skills in terms of their RLE activities. Nursing students were highly exposed in regulating and monitoring of IV (x=4.65), as well as for the computation (x=4.52) in terms of drops per minute and hours to run. They were adequately exposed in priming and spiking (x=3.93) and removal of IV insertion (x=3.61) while they had a less adequate exposure in incorporating medications (x=3.49), assisting patients in deep breathing exercises (x=3.39), providing NGT Feeding (x=3.15) and rendering oxygenation therapy (x=2.86). A grand mean of 3.85 signifies that generally, the respondents had an adequate exposure to medical-surgical nursing skills.

The amountof exposure to operating room skills in terms of their RLE activities among nursing students were adequately exposed in surgical hand washing (x=3.58), gloving (x=3.63) and gowning (x=3.44) while they had less adequate exposure as a scrub nurse (x=3.07), serving gloves to surgeon (x=2.67), handling of instruments to surgeon (x=3.11), counting of instruments (x=3.08) and performing functions of a circulating nurse (x=3.05). A grand mean of 3.21 signifies that generally, the respondents had a less adequate exposure in operating room skills.

Based on the statistical result, the respondents had a less adequate exposure in operating room skills for the reason that most operating room especially the public ones have insufficient OR cases that's why students have an insufficient opportunity of being the scrub nurse. Furthermore, there are some instances wherein there is sharing of cases since another school is within the same shift scheduleaffecting the likelihood of the students to complete their cases.A nursing student act as a scrub nurse who provides assistance to the surgeons and nurses by constantly supplying and retrieving items such as sponges, needles and instruments, as needed during operation.

There is adequacy of exposure of the respondents to pharmacology nursing skills in terms of their RLE activities. Nursing students were highly adequate in constructing drug studies (x=4.26) whereas they are adequately exposed in terms of reviewing the ten rights in administering medication (x=3.92), computing of medication dosage (x=3.95) and administering oral medications (x=3.62), while they were less adequate in preparing medications via ampule (x=3.39), via vials (x=3.36), via injections (x=3.34), and via topical or inhalants (x=2.92).A grand mean of 3.70 signifies that generally, the respondents had an adequate exposure in pharmacology nursing skills.

Making drug studies is one of the requirements of nursing students in their RLE exposures. Some hospitals let the nursing students prepare as well as administer the medications for the patients. Medication errors are highly avoided that's why the nursing students are guided by their clinical instructors accordingly.

Nursing continues to evolve into an ever more complex health care profession. The need for pharmacology education continues to grow along with changes in the nurse's role. The importance of well-designed and comprehensive pharmacology courses during nursing education is vital for patients nurses administer medications to. The nurse's understanding of pharmacology is important in her role of educating patients about medications, dosages and possible side effects. A nurse who is not knowledgeable about pharmacology can put patients at-risk.

In terms of the adequacy of exposure of the respondents to therapeutic communication skills in terms of their RLE activities. Nursing students were highly adequate in non-verbal (x=4.30) and verbal (x=4.21) therapeutic communication as well as in the nurse-patient interaction (x=4.44) and nurse-significant other interaction (x=4.26) while they were adequately exposed in attending the general endorsement (x=3.66), in the orientation before going to patients (x=4.15), they also participate in nursing rounds (x=3.87) and in providing health education (x=4.19) to patients. A grand mean of 4.33 signifies that generally, the respondents had highly adequate exposure to therapeutic communication skills.

Attending the general endorsement and orientation before going to patients is essential in rendering patient care.Participating in nursing rounds is done by student nurses and involves patients as the focus on the plan of care to be rendered. It is done to improve communication and patient care.

Health education comes in when giving medications, prevention of complications and answers queries of patients and their significant others, for example a student nurse teach a new diabetic how to give self-injections of insulin, foot care, diet and exercise.A nurse must use her total well-being when relating to a patient. According to the ICAS (Interpersonal Communication Assessment Scale, this includes behaviors like eye contact, and touching during communication (appropriate to the situation and cultural background) and the ability to detect inconsistency between verbal and non-verbal communication.

For every clinical exposure, students constantly do nurse-patient interaction to establish rapport and a therapeutic relationship to the patient and their significant others. They serve as patient advocates by helping the patients deal with the health care system. Interpersonal skills are essential for the effective practice of nursing. Indeed, interpersonal contact is the essence of nursing. This can include helping the patient and their family members understand the procedures and treatments, explaining treatment options, and requesting consultation when needed.

A nurse must develop interpersonal skills related to patient care. Patients may see care as simply providing comfort while for nurses it also includes effective communication as they can better assess patient's overall health.

In the adequacy of exposure of the respondents to documentation skills in terms of their RLE activities among Nursing students were found to be highly adequate in activities such as utilizing the nursing care plan as a tool in patient care (x=4.32), constructing DAR or SOAPIE charting (x=4.43), plotting on TPR and VS sheet (x=4.57), putting on the IV flow sheet and IV tag (x=4.54) as well as plotting in the intake and output sheet (x=4.35) and writing on the nurse's notes (x=4.26). Moreover, they were adequately exposed in carrying out doctor's order (x=3.99) and in plotting in the medication sheet (x=3.85). A grand mean of 4.51 indicates that generally, the respondents have a highly adequate exposure to documentation skills.

Nurses operate under both a medical care plan by completing doctors' orders, but also function under a nursing care plan they create for each patient. They watch for common problems (such as after surgery) and develop a plan of care that addresses the whole patient. As the patient's condition changes, so does the nursing care plan and nursing actions.

Nursing students are required to do nursing care plans, drug studies, sample charting, etc. during their clinical exposures in the different affiliated hospitals. Most institutions allow nursing students to utilize the chart of the patients, as well as to write on nurse's notes, carry out doctor's order, plot on the vital signs sheet, on the IV flow sheet, and I & O sheet.

Quan (2008), stated that writing skills need to be proficient enough to provide a reflection of the nurse's observations, which will include the assessment, the identification of problems and issues, the plan and interventions, and an evaluation of the outcomes. The skill with which the nurse writes about the assessment, intervention, and the patients' outcomes will reflect on the quality of the hands-on care he or she provides. The records must be clear, concise, complete, and accurate. Other health care providers will rely on this information to make decisions about the patient's care and needs.

Barriers to Clinical Performance

For the extent of School-related barriers to clinical performance encountered by nursing students, 43.4 percent of the respondents had encountered the school-related barriers to a very little extent, 39.0 percent of the respondents had encountered the school-related barriers to some extent, and 12.5 percent of the respondents had encountered the school-related barriers to a great extent while 5.1 percent had not encountered the school-related barriers. Having a mean score of 2.59, it generally signifies that the respondents had encountered the school-related barriers to some extent such as insufficient hospital affiliation and hospital protocols (x=2.65), suspension of classes due to frequent school activities (x=2.86), suspension of classes due to bad weather condition (x=2.68), suspension of classes due to holiday occasions (x=2.74), inadequate nursing facilities (x=2.76), lesser number of hours than prescribed in the clinical area (x=2.53) and conflict of schedules (x=2.68) affect the clinical performance of nursing students to some extent while extracurricular activities and organization (x=2.38) affects the clinical performance of nursing students to a very little extent. Having a grand mean of 2.59, it generally signifies that the respondents had encountered the school-related barriers to some extent.

In Hospital-related barriers to clinical performance encountered by nursing students, 41.9 percent of the respondents had encountered the hospital-related barriers to a very little extent, 25.0 percent did not encounter the hospital-related barriers, 21.3 percent of the respondents had encountered the hospital-related barriers to some extent, whereas 11.8 percent of the respondents had encountered the hospital-related barriers to a great extent. With a mean score of 2.20, it generally signifies that the respondents had encountered the hospital-related barriers to a very little extent such as inequality of responsibilities and poor treatment to students (x=2.45), ignoring students as vital members of the health team (x=2.25), prohibiting students from access to facilities to enrich their clinical experience (x=2.38), barring out the students in goal setting/planning for patient care (x=2.24), with regards to patient care such as refusing to comply with the nursing procedures provided by the student nurse (x=2.26), being uncooperative, shouts at the student nurse and asks the staff nurse to take over in rendering his/her care (x=2.13) and refusing to participate in nursing care (x=2.04) affects the clinical performance of nursing students to a very little extent while limiting student nurses in carrying out interventions (x=2.66) affects the clinical performance of nursing students to some extent. With a grand mean of 2.20, it generally signifies that the respondents had encountered the hospital-related barriers to a very little extent.

For the extent of clinical instructor-related barriers to clinical performance encountered by nursing students. 39.0 percent of the respondents had encountered the clinical instructor-related barriers to a very little extent, 33.8 percent of the respondents did not encounter the clinical instructor-related barriers, and 19.1 percent had encountered the clinical-instructor-related barriers to some extent, while 8.1 percent of the respondents had encountered the clinical instructor-related barriers to a great extent. Having a mean score of 2.01, it generally signifies that the respondents had encountered the clinical instructor-related barriers to a very little extent such as limiting student nurses in carrying out interventions (x=2.27), inequality of responsibilities and poor treatment to students (x=2.12), ignoring students as vital members of the health team (x=2.12), barring out the students be involved in goal setting/planning for patient care (x=1.97), demonstrating incompetence in the area (x=1.94), displaying "favoritism" in a certain student (x=2.38), inefficient in supervising students in the clinical area (x=2.11) and tardiness (x=2.24) affect the clinical performance of nursing students to a very little extent. Having a grand mean of 2.01, it generally signifies that the respondents had encountered the clinical instructor-related barriers to a very little extent.

For the extent of student-related barriers to clinical performance encountered by nursing students. 50.0 percent of the respondents had encountered the student-related barriers to a very little extent, 22.8 percent of the respondents had encountered the student-related barriers to some extent, and 19.1 percent of the respondents had not encountered the student-related barriers, while 8.1 percent of the respondents had encountered the student-related barriers to a great extent. With a mean score of 2.20, it signifies that generally, the respondents had encountered the student-related barriers to a very little extent, specifically, student's insufficient knowledge in performing a certain nursing procedure (x=2.40), refuse to perform a certain medical procedure assigned because of anxiety to commit clinical errors (x=2.32), and student's negative behaviors such as poor time management (x=2.33), engaging to social networking and computer activities rather than doing RLE reports (x=2.23), poor study habits (x=2.40), lack of initiative in performing nursing procedures (x=2.27) and tardiness on RLE duties (x=1.95) affects the clinical performance of nursing students to a very little extent while being afraid to be humiliated by the clinical instructor in front of the patient (x=2.59) affects the clinical performance of nursing students to some extent. With a grand mean of 2.20, it signifies that generally, the respondents had encountered the student-related barriers to a very little extent.

Among the barriers, it was found out in Table 2 that school-related barriers significantly affect the clinical performance of nursing students to some extent. Therefore, school-related barriers such asinsufficient hospital affiliation and protocols, suspension of classes due to frequent school activities, bad weather condition, and holiday occasions, inadequate nursing facilities, and lesser number of hours of exposure, conflict of schedules and extracurricular activities and organization affect the student's clinical performance.

Table 2. **Significant effect of the extent of barriers to the clinical performance (RLE grades) of nursing students**

Barriers	T	Sig. (2-tailed)	Verbal interpretation
School-related barrier	7.821	.000	Reject Ho
Hospital-related barrier	11.323	.000	Reject Ho
Clinical Instructor-related barrier	12.999	.000	Reject Ho
Student-related barrier	12.875	.000	Reject Ho

T-test is significant at the level of > 2.58.

Table 3 shows the relationship between the adequacy of exposure and clinical performance (RLE grade) of nursing students. There is a slight relationship between the adequacy of exposure in Fundamentals of Nursing skills (r=.036) and the clinical performance of nursing students. The adequacy of exposure in Maternal and Child Nursing Skills (r=-.052) and Medical-Surgical Nursing Skills (r=.064) is moderately correlated with the clinical performance of nursing students. Moreover, the adequacy of exposure in Operating Room Skills (r=.007), Pharmacology Nursing Skills (r=.002), Therapeutic Communication Skills (r=-.038) and Documentation Skills (=-.018) have a negligible correlation with the clinical performance (RLE grade) of nursing students.

Table 3. **Relationship between the adequacy of exposure and the clinical performance**

Adequacy of exposure	Correl (r)	Sig	Interpretation
Fundamentals of Nursing Skills	.036	.676	Slight relationship
Maternal and Child Nursing Skills	-.052	.551	Moderate correlation
Medical-Surgical Nursing Skills	.064	.459	Moderate correlation
Operating Room Skills	.007	.934	Negligible correlation
Pharmacology Nursing Skills	-.002	.982	Negligible correlation
Therapeutic Communication Skills	-.038	.658	Negligible correlation
Documentation Skills	-.018	.839	Negligible correlation

**Correlation level is significant at 0.05 level (2-tailed)

Based on the above significance levels of the adequacy of exposure to skills of the said nursing areas, the decision is accept Ho which means that the adequacy of exposure does not have significant relationship with the clinical performance of nursing students.Student's adequacy of exposure does not signify or influence the clinical performance (RLE grades). There are other factors like skills, attitude, knowledge, interest of students and enthusiasm to learn.

Conclusion

Most of the BSN Level IV students earned an RLE grade of 2.00-2.99 which means a good performance. Generally, RLE exposures were highly adequate in terms of the exposure to therapeutic nursing communication and nursing documentation. Level IV students were adequately exposed to develop skillsin fundamentals / basic nursing, medical-surgical nursing, and pharmacological skills. Furthermore, they had less adequate exposure to catheterization in Fundamentals of Nursing skill, Maternal and Child Nursing skills specifically in performing Leopold's maneuver and assisting in episiorraphy as well as in Operating Room nursing skills which includes handling of instruments to the surgeon.

The school-related, hospital-related, clinical instructor-related and student-related barriers significantly affect the clinical performance of nursing students to a very little extent. Adequacy of clinical exposure providing opportunities for student skills development do not have any relationship with the clinical performance of nursing students.

Recommendations

Based on the results of the study, the following are recommended:

1. The College of Nursing should give attention to the clinical focus of maternal and child nursing skills and operating room skills wherein nursing students have less adequate exposure. Moreover, they should address the identified barrier specifically; the school-related barriers which affected the clinical performance of the nursing students to some extent to develop or formulate appropriate actions to the said problem.

2. The College of Nursing must plan to enhance the skills of the Nursing students more specifically in catheterization, Leopold's maneuver and assisting in episiorraphy wherein nursing students are not that much exposed.

3. For the Operating Room exposure, the Clinical Instructors must develop further the skills of the students specifically in handling the instruments to the surgeon by providing a more focused and intensive return demonstration during the Related Learning Experience Skills Laboratory hours.

4. The administrators of the College must address and formulate plan of action to remove, if not possible minimize the identified barriers to clinical performance, whether it is instructor-related barriers or school related barriers such as school-related barriers such as insufficient hospital affiliation and protocols, suspension of classes due to frequent school activities, inadequate nursing facilities, lesser number of hours of exposure, conflict of schedules and extracurricular activities of student's organization which somewhat affect the student's clinical performance.

5. Clinical instructors are encouraged to strengthen their teaching competencies to meet the academic needs of students and provide awareness as contributing elements on performing the skill acquisition of students and identify areas where they can collaborate to enhance and promote learning of students. Instructors should provide opportunities to student nurses in carrying out interventions, equal assignment of responsibilities and proper treatment of students. They must create a learning environment in the hospital areas which considered students as vital members of the health team by involving students

in goal setting/planning for patient care. Instructors are also encouraged to avoid favoritism among studentsand tardiness which affect the clinical performance of nursing students to a very little extent.

6. To the hospital administrators of the affiliating hospitals, there is a need to review some policies concerning affiliation and training of students for improvement focusing on equality in assigning student's responsibilities and proper treatment to students, students role as vital members of the health team providers, extent of students access to hospital facilities to enrich their clinical experience, encouragement of students' participation in goal setting/planning for patient care, and policies on corrective actions on hospital staffs who offensively treat students unjustly and with humiliating attitudes towards trainees.

7. Future research can be conducted using bigger sample size of nursing studentsincluding those from other nursing schools in the region or in the country for comparison of appraisal and coverage of barriers to clinical performance.

REFERENCES

Albina, Rollan A., A.M.V. Alem, M.M. Cueto. April 2010. Undergraduate Thesis. Academic Performance and Problems encountered among Freshmen and Sophomore Students under the new BSN Curriculum SY 2009-2010. Indang, Cavite

Beck D, Srivastava R, (1991). Percieved level and source of stress in baccalaureate nursing students. Journal of Nursing Education.127-132

Belkin and Gray. (1972). Teachers and Performance of the students. New York

Billings and Halstean. (1998). Teaching in Nursing: A guide for faculty. Journal of Nurse Education., 33 (7), 322-324

Blue, D. & Cook, J.E. (2004). Study of Highschool Restructuring. "High School Dropouts: Can We Reverse Stagnation In School Graduation?" University of Texas, Texas, USA

Burnett P.(1995). The development of clinical learning environment scale. Journal of Advanced Nursing. 1166-1173

Cruzada, A. D., Berenguel, M. D. And Esguerra, K. L. (2008). Undergraduate Thesis. Level of Competency of the 3rd Year Nursing Students Batch 2009 in formulating Nursing Care Plan, Indang Cavite. Cavite State University

David, R.G. (1997). Contours of Academic Performances. 3rd Edition. New Jersey

De Laune, S. Ladner, P.(2006). Fundamentals of Nursing Standards and Practice.3rd Edition. Delmar Learning, A Division of Thomson Learning Philippines.18; 185;29

Desacola, Charito. April 2008. Undergraduate Thesis Study Habits and Academic Performances of BSN Batch 2008 of the Cavite State University Indang, Cavite.Indang, Cavite

Duran, O.P. and Lopez, M.R. (2001) The Related Learning Experience of the Nursing Students of Catanduanes State Colleges at the Base Hospitals, Legaspi City. Aquinas University

Elsevier (2009). Mosby's Medical Dictionary, 8th edition

Fine. (1987); National Research Council, 2001;U.S. General Accounting Office

Frias, J.L. (2000). Academic Performances. 3rd Edition. Clearing House. 45 (3),22-23

Gaberson, K.B., and Oermann, M.H. (1999). Clinical teaching strategies in nursing. Springer Publishing. New York

Haocyck& Huang, 2001. Dropping Out of School Affects Entire Community: Each Time a Youth Fails to Graduate the Impact Affects Everyone.

Hart G, Rotem A. (1994). The best and the worst: Students' experience of clinical education. The Australian Journal of Advanced Nursing .11(3):26-33.

Legaspi (2009) Familial Backgrounds and Factors Affecting Youth Drop-outs in Indang, Cavite. Cavite State University, Indang, Cavite

Marian, M.D. (2006). Academic Performance in education. 2nd Edition. Pasig City, Philippines

Members of the Council of Europe. (1950) Convention for the Protection of Human Rights and Fundamental Freedoms ,First Protocol, Section I ,Article 2.

Mojica, Mariel A., J Mojica, D.NB. Pastor. March 2010. Academic and Licensure Examination Performance of Bachelor of Science in Nursing Graduates of Cavite State University in Indang, Cavite.Indang, Cavite

Oermann, M.H., and Gaberson, K.B. (1998). Evaluation and testing in nursing education. Springer Publishing. New York

Paguican. (2010) School Children Dropout Rising in Philippines.

Palomares, V. C. (1996) ,Professional Nursing Competency Levels of the New Bachelor of Science in Nursing graduates in the Secondary and Tertiary Hospitals, Cagayan de Oro. Liceo de Cagayan University

Piercey, C. (1995). Assessing clinical competencies. In Summers, Latest Edition. A Focus on Learning. 206-211.

Pilliteri, Adele. (2008).Maternal and Child Health Nursing: Care of the Childbearing and Childrearing Family, Fifth

Edition. Volume 1

Quan, Kathy. (2008). Writing Skills

Rodeo, April R. (2006). Demographic Profile, Level of Motivation and Academic Performances of Fourth Year BSN Students at Cavite State University Indang, Cavite SY 2005-2006.Indang, Cavite

Servanda, Michelle R., C.V. Soliven, C.A.P. Tolentino. April 2010. Perceived Factors Affecting Academic Performance of Level III Nursing Students of CvSU SY 2009-2010.Indang, Cavite

Sheila Sh, Huey-Shyon L, Shiowli H. (2002). Perceived stress and physio-psycho-social status of nursing students during their initial period of clinical practice.International Journal of Nursing Studies.39:165-175

U.S. Department of Education, National Center for Education Statistics. (2010). The Condition of education 2010 (NCES 2010-028), Table A-19-2

Wooldridge, P., Scmitt, M, Skipper, J. Jr. and Leonard, R. (1983). Behavior Science and Nursing Theory. C.V. Mosby Company. London. p6

Internet Sources:

http://www.biomedcentral.com/1472-6955/4/6

http://www.deped.gov.ph/factsandfigures/default.aspFactsheet (as of Sept 23, 2010) - Basic Education Statistics

http://www.ehow.com/about_6163234_clinical-performance-nursing-students.html#ixzz1ZhC7Utwj

http://www.gov.ph/2011/07/29/ched-memorandum-order-no-18-s-2011/

http://www.littlemummy.com/2009/11/16/what-motivates-us/

http://pacu.org.ph/downloads/1275670402.pdf

http://www.scribd.com/doc/6237567/Complete-Thesis

http://stti.confex.com/stti/congrs07/techprogram/paper_33862.htm

Dominican Education as Practiced in Aquinas University of Legazpi

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ABSTRACT

Aquinas University of Legazpi as a Dominican institution, forms part of the thread of the Dominican Province of the Philippines, Incorporated. The forerunners of Dominican education exemplify the Pillars of Dominican Life of prayer, community life, study, and ministry/apostolate. As separate institutions, perceptions of stakeholders as regards Dominican education and practices vary. A collaborative research by the Dominican schools was conducted to cull these diverse ideas. This paper validated the outputs on the perception on Dominican education of Aquinas University, specifically how Dominican education is practiced in the institution.

Data show practices found to be inconsistent with the ethnological and phenomenological researches on the same vein. Some practices viewed by the stakeholders to be best in one area are in the bottom, such as the perceptions of the stakeholders on the practices of the administrators on community extension and participation in important school events. These go against the view that cultural activities are necessary for a holistic Dominican education, since the administrators themselves rarely engage in the said activities. Aquinian stakeholders regard them as God-centered and prayerful; this has been refuted by the bottom five practices.

The quantitative, ethnological, and phenomenological results are proofs that the institution must reconcile these differences for a holistic Dominican education. The Aquinians share the perception created among the stakeholders and must take a concerted effort to fill in the inadequacies. What it takes to be a Dominican is evident in the Aquinian community; however, a need to link perceptions with the practices of the Aquinians not only to create a unique and desirable identity, but also to epitomize the true essence of Dominican.

Key words: **lived, experiences, on-campus, working students**

Introduction

Aquinas University of Legazpi, as a Dominican institution, forms part of the thread of the Dominican Province of the Philippines Incorporated (DPPI). The Pillars of Dominican Life are based on prayer, community life, study, and ministry/apostolate which basically are set as Dominican values and guide Dominican education per se; however, perceptions of stakeholders as regards education and practices may vary from an institution to others. Hence, a research project was conducted to cull these diverseperceptions.

This paper examined the perceptions on Dominican education, specifically the idea of Dominican education and how it is seen and/or practiced in the institution. The data provide a vivid vista of the stakeholders' perceptions relative to Dominican education.

Methodology

This is a quantitative research which utilized survey as the instrument. The survey instrument was developed by the Dominican Province of the Philippines Incorporated (DPPI) based on the result of the qualitative research on the same vein. A set of criteria was utilized to facilitate the identification of respondents. Students must have a residency of at least 3 years in the University. This means that one must be in the 4th curriculum year for a 4-year course, or in the 4th year or 5th curriculum year when enrolled in a 5-year course. Employees must also be tenured or full–time and must have been connected with the University for a minimum of 3 years. The study targeted to administer the survey to at least 20% of respondents from every group. Furthermore, the size of each group was considered in determining the number of respondents in each group.A total of 330 respondents were tapped from the four colleges of the University. Two hundred twenty students (220) were taken from the four colleges of the University and 110 were employees. One hundred eight students come (108) from the College of Business Administration and Accountancy; 57 from the Polytechnic Institute; 27 from the College of Nursing and Health Sciences; and 28 from the College of Arts Sciences and Education. Thirty six (36) were non- academic personnel; 61 were academic personnel, and 13 were administrators.

Results and Discussions

On the **school/community**, top 5 observed practices are *conducts recollection and retreat session*s with a mean of 3.4195 ranking first as identified by 2 subgroups, the non-academic personnel and students; respects differences in race and nationality ranked second with a mean of 3. 4091; third is respects differences in religious beliefs with a mean of 3.3860; emphasizes the importance of praying before and after an activity/class and obeys God's teaching as identified by 3 out of the 4 groups with mean scores of 3.3841 and 3.3415, ranked fourth and fifth respectively.

Administrators, faculty, staff, and students are given breaks from their work routine and studies to spare a day for these recollections and retreats. Special sessionson themes facilitated by speakers from otherDominican schools such as University of Sto.Tomas serve as highlight of the gathering. The inspiring talks in these retreats and recollections rekindle among the Aquinian community the Dominican principles, traits, and values. These are manifestations of Aquinas University being faithful as religious community of preserving and transmitting their Dominicancharism in the ministry of higher education (Sanders, 2010). This so far is consistent with the result of the Ethnological research of Paulino and Antioquia(2011) which reveals that Aquinianscenter their lives to Jesus Christ and that Aquinas University teaches students to be Christian in their words, deeds and decisions. Similarly, this was also highlighted in the phenomenological study of Maceda and Bajaro (2011) which emphasized that through recollections students are given the chance to think and contemplate, analyze and examine themselves or other individuals making it an activity of enlightenment and ultimately the pursuit of truth which is one of the Dominican values.

Aquinas University community sees no discrimination, among the students, faculty, and staff in terms of race and nationality. Everyone is welcome to be part of the Aquinian family regardless of one's ethnic or cultural roots and place of origin. With service as one of the four pillars of Dominican charism, the University embraces the challenge of loving God and neighbor as a way of life. (Borgmann, 2001) As a Catholic school, Aquinas University imposes no restrictions on its admission in terms of race and nationality. Korean nationals have been admitted in the University as regular students and others as auditors, who enrolled in selected classes to learn the English language. A handful of Indian nationals are also currently enrolled in the high school and tertiary. In the 80's and 90's, some Indian nationals have successfully finished their college degrees in Aquinas University. This is also reflected as one of the strengths of Dominican Education grounded on respect to all persons as cited in the phenomenological study of Maceda and Bajaro (2011)

Respect for differences in religious beliefs which is the third best practice is observed by the University .The students are treated the same way as the Catholics such that they are invited, but not obliged to attend mass and religious events like the Feast of St. Dominic. Employees are not discriminated due to their religious beliefs. The hiring policy does not cover any section on religion; hence, applicants may be hired regardless of their religious affiliations as long as they meet the qualifications . This characteristic also falls in the same vein with that of the ethnological study of Paulino and Antioquia (2011) that though Catholic in nature, the school ecumenically regards other religion, sect or faith denomination to be part of the school community and be honed as a person, as a Dominican and as an Aquinian.

As one of the pillars of Dominican life, classes, meetings, seminar-workshops, programs, theatre performance, recitals, competitions, and the like are started with prayers.Paulino and Antioquia (2011) deduced the same concept in their ethnological study whereby prayer being one of the four pillars of Dominican is essential to the formation of the Aquinian identity.

Obeys God's teachings encompasses many facets of the Aquinian life. Religious Education subjects are offered every semester from first year to fourth year in all programs of the colleges. These serve as channels for preaching God's words in-depth aside from the homilies given during holy mass and other days of obligations.This encompasses also, a number of Dominican practices such as values formation, integration of Dominican values in Eucharistic celebrations, conduct of recollections, and practices showing high regard to values and life .(Maceda and Bajaro, 2011)

For the bottom 5 practices, implements thoughtfully-planned outreach programs ranked first obtaining a mean of 3.0762; emphasizes opencommunication ranked second with 3.0675 as mean; emphasizes open communication placed second with a mean of 3.0675; third is shows courage toaddress disputes, issues, and crises properly, 2.9877 as mean; practices praying of rosary placed fourth with 2.8693 as mean, and last with a mean of 2. 8593 is provides no room for special treatment as the least practiced as determined by the administration, non-academic and students, except the academic group.

Aquinas University has socially responsive community involvement such as livelihood and literacy programs for adopted communities, tree planting, and immersions (Maceda and Bajaro, 2011); however, it has yet to improve in terms of institutionalizing plans so all units of the University areengaged or atthe very least informed of the conduct of these outreach programs. Various colleges, through the student's organizations, organize outreach programs but few get involved and rarely does the non-academic unit participate.To spread the idea of the value of sharing and service, a good number of the members of the Aquinian family must be immersed in the outreach.

In Aquinas, issues would come into view, but rarely do the members of the community provide time to settle them through communication in spite of the University being an open space for discussion and as a place where one can be himself (Llana as cited in Maceda and Bajaro, 2011). Examples are: issues on salaries and benefits of the employees, promotions and ranking, and budget allocations of student activities. Queries on matters are discussed in Labor Management Council meetings and budget hearings; unavoidably though students and employees would sometimes resort to informal discussions among themselves or with unreliable sources causing issues to magnify since multiple interpretations and misinformationsurface creating more critical sub-issues. Thisis closely linked with the third: *shows courage to address disputes, issues and crises properly.* For the stakeholders, often, issues would rise and die their own natural death which is detrimental to the efforts of the University in integrating and strengthening values education among its employees and students and developing students to live with the Gospel values, instrumental to the development of oneself and the society (Paulino and Antioquia, 2011).

The fourth of the bottom five practices is practices praying the rosary.Despite the effort of the University in using education as means of evangelization and its pursuit of the four pillars which includes prayer, the stakeholders view that effortsto encourage Aquinians to pray the rosary still need to be intensified. Maceda and Bajaro's(2011) phenomenologicalresearch which asserted that Aquinians' possess the commitment to praying, and the ethnological study ofPaulino and Antioquia (2011) which affirmed that being prayerful is one of the spiritual and religious aspects of the Aquinian Christian life, find a weak relation with the result of the present research. The context of praying to most of the members in the community is simply limited to the recitation of prayers at start and at the end of classes or to invocations in programs.One of the notable programs of the Office of the Religious Affairs (ORA) is the visitation of the image of the Blessed Virgin Mary to offices and colleges during October; this practice has to extend to all units of the University, most especially to the students since this is limited to the employees. Since the students form the biggest bulk of the population of the University, they should be the purveyors of spreading the culture of praying.

The findings of Paulino and Antioquia (ethnology),Maceda and Bajaro (phenomenology) both revealed that Aquinas University provides the opportunity for activities that contribute to growth as human person,live morally towards the attainment of freedom and loving service to others, and teach the right dogma, morals and values. These efforts are reflected in the views of the Aquinians in terms of providing no special treatment to any member of the Aquinian community. Aquinians believe in fairness as a way to be able to live with others in a mature way and are possessive of the qualities significant in defining the human person (Paulino and Antioquia, 2011). In this grain, this quantitative research is found to be consistent

On the **school administrators**, top 5 practices are: innovates policieswas rated by the academic and non-academic personnel as the most observed practice with a mean of 3.3364; plans proactively for the future of the institution ranked next obtaining 3.3028 as mean. Third with a mean of 3.2778 is commits deeply to their work as identified by 3 out of 4 subgroups. Fourth and fifth with mean of 3.1835 and 3.1636 arecreates sustainable programs for the extension communitiesand encourages career advancement.

The administrators are perceived to be responsive to the changing trends and demands of the times, by continuously innovating policies to address issues for successfully obtaininggoals and objectives. This is exhibited in various modifications in the procedures for enrollment through computerization, release of budget for activities within 7-working days from the date of filing, and labor-management relation through regular monthly meetings, to name some.This draws link with the findings of the phenomenology study of Maceda and Bajaro (2011) which states that the Dominican way of formation (such as the values of sharing, development, etc.) is a holistic approach in the development of an individual.

Plans proactively for the future of the institution corollary to the first best practice, is observed among the administrators. Careful planning of activities and programs for the students and the employees is scheduled strategically in anticipation of other issues that may affect the course of the institution. Operational planning is conducted before the end of each year, usually every February; to look at factors that may greatly affect the institution such as organizational development, curriculum planning, enrollment, budget, tuition fee increase, salaries and wages, promotion and ranking, and annual curricular, co-curricular, and extra-curricular institutional activities. Rigid discussions among administrators take place in the process, to modify or reshape some policies and/or reconsider some practices that may turn irrelevant to the current organizational set up. This explains as well, why policies sometimes change as often as the administration changes.

Administrators are on call 24/7. This manifests that they commit deeply to work.To them, service is more than just a job, it's a commitment and should be given priority time. Instances of long hours of meetings are a usual scenario and to some extent, holidays are rendered in service to accomplish tasks affecting the operations of the institution. This characteristic of Aquinian administrators is consistent with the result of the phenomenological study of Maceda and Bajaro (2011) which accentuated that human resource is one of the strengths of Aquinian character, showing commitment to the institution and to the programs, not to the personalities.

Creates sustainable programs for the extension communities agreed with the ethnological findings of Paulino and Antioquia (2011). The University organized the Community Services and Training Program (CSTP) which functions as the vehicle in carrying out community extension services and other forms of benevolence; these services are executed with the help of the students, who from their first year as Aquinians were already committed in many extension programs. Ironically, the stakeholders think otherwise. To them, outreach programs need thoughtful planning such as involvement of all sectors in the University, to achieve optimum results based on the objectives of the program.

As a proof that the administration of AUL encouragescareer advancement in employees, a good number of faculty are on scholarship under the Faculty Development Program. These faculty members are supported by the University through a regular pay, full matriculation and tuition fees, food, fare, and even book allowances while pursuing their graduate programs in reputable universities in the country. Annually, representatives from various offices of the University are identified to undergo technical trainings such as those assigned in the laboratories or take personality development courses for front liners.

The University would organize in-house trainings and seminars for all office staff and invite experts as resource speakers. This effort of the administrators mirrors the Dominican way of formation, which is considered as one of its strengths is reflected in the phenomenological study. The different character formation activities reflective of a Dominican culture or values are instituted in the University (Maceda and Bajaro, 2011).

Bottom 5 practices is led by participates inimportant events of school with a mean of 3. 0732, which was pointed out by all employees; second rank is offers a strong faculty recruitment program with a mean of 3.0550; participates in outreach activities ranked third with the mean 3.0306; fourth is supports school projects obtaining a mean of 3.0306, and the least observed according to all employees, with a mean of 2.9262 is implements policies with consistency.

The stakeholders perceive that administrators do not consistently participate in important events in school; some heads would opt to do office work than to take part in activities. This might have been observed when institutional gatherings such as intramurals, University week celebrations, Rokyaw, etc., are held. Such characteristic goes against the findings of Maceda and Bajaro (2011) which emphasized the principle of good leadership among the administrators, since the people who can really steer the wheel limit their tasks to office work. The phenomenological study in fact verbalized that there is an apparent dissatisfaction on the middle management.

In Maceda and Bajaro's (2011) study, students consider the faculty as dedicated and caring. They are perceived to treat one another as brothers and sisters though rivalry exist. They protect one another when opponent comes from the outside. Dr. Bobadilla (as cited in Maceda and Bajaro), identified faculty members as good though imperfect as humans. These ideas do not collaborate with the perception of the stakeholders as regards offeringa strong faculty recruitment program. As such, students attribute to their professors their weaknesses such as their inability to express ideas through oral and written English, or to their Math teachers their failure to compute equations and the low passing rate in board exams.

Faculty screening process is identified as one of the weaknesses in Aquinas University. In recent situation though, screening is rigorous and takes careful consideration of academic qualifications, experience and demo-teaching of applicants. Once all of these are met satisfactorily, the University immediately absorbs the applicant and is taken care of through the Faculty Development Program. Unfortunately, despite the effort of the University to contain assets, it cannot equal the salaries and benefits that government institutions offer; hence exodus is inevitable.

Extension has always been emphasized by the University to work hand in hand with instruction and research in order to effect quality education. In its realization, outreach activities are regularly conducted every semester through the Community Services and Training Program (CSTP) to support this integration. Students and faculty get involved in extension programs such as the REAP (Re-entry Education Agenda Program) of the College of Arts Sciences and Education where they weekly visit Barangay Lamba, an adopted community, to extend free tutorial services to out of school youth. In these occasions of community extension, the administrators are rarely immersed. Participation in outreach activities appears not to be a priority. In most cases, their participation is limited to the mere planning of the program/activity and computation and/or approval of budget.

In relation to the previous, the same observation is seen in the administrators' support in schoolprojects. The expectation of the stakeholders may be satisfied not only through the actual presence of the heads in activities but also in the allocation of funding and the spirit of support and encouragement.

The fifth of the bottom five practices of administrators, implements policies with consistency has been identified by the phenomenological study as one of the weaknesses. According to the findings, programs of Dominican schools have no guaranty to have lasting implementations which may be caused by personal loyalty rather than institutional loyalty. Policies change as often as the administration changes (Maceda and Bajaro, 2011). Project implementations are altered depending on the desires of the new set of administrators; some policies that have been in place for a long time are implemented arbitrarily causing conflicts and issues. Though changes are understood most especially if the goal is to address the changing trends, orientation among those concerned should also be conducted to answer queries regarding modifications.

The **stakeholders/self/ I** perceive see things positivelyas the most observed practice with a mean of 3.5727, most especially in the perspectives of the students. Second in rank with a mean 3.5696 is strive hard to do well in school; 3.5684 is the mean of value the family in the third rank; 3. 5562 as the mean for uphold the truth placed fourth, and with a mean of 3.5424 is put Christ in the center of my life ranked fifth among the top 5 most observed practices in Aquinas University.

On the context of the top five practices of the Aquinians, seeing things positively is observable among Aquinians. In 2006 when Remingravaged a large area of Albay province, AUL was among the schools which incurred severe damages in facilities and equipment. More disheartening is the demise of some students and employees. This however never lost the spirit of hope and tenacity among Aquinians. Within 4 months, traces of the unspeakable destruction vanished. Restorations of infrastructures went on along with several debriefing sessions among the employees and students who lost their loved ones and possessions. This remarkable transformation paved way for the adaptation of the Phoenix as its new logo replacing the age old Pegasus. The Phoenix is amythical bird of great beauty fabled to live 500 or 600 years in the Arabian wilderness, to burnitselfonafuneralpyre,andtorise from its ashesinthefreshness ofyouth andlive through another cycle of years.(http://www.thewhitegoddess.co.uk/articles/ancient_egypt/the_benu_bird.asp).

Truly inspiring is the optimism that resides in each Aquinian. In most trying times, they showed strength and courage by seeing things positively. In hardships from economic to academic life, from personal to professional affairs, the Aquinian community exhibits optimism. This could be attributed to the unique characteristic of the Filipino being jolly and the deep sense of religiosity. As Dominicans, the strong faith in God and the power of prayer that they all believe in immensely helped them survive distress.

Academic excellence is a major goal of Aquinas University; therefore,the administrators, students and faculty share efforts in its attainment. Each believes tostrive hard to do well in school. Though it is also true that one of the weaknesses of AUL is the passing rate in board exams, the school never ceases to tutorial and intervention programs to augment its academic status.

Being among the outlandish cultural values that Filipinos pride themselves of is their so-called "close family ties." It is an old, distinctive trait that Filipinos are well-known for. Filipinos are unique because they care for their family and kin at a level of closeness that is rarely observed or practiced in other cultures or races. In the Philippines, close family ties have always been recognized as one of the core values of families. There exists a strong mutual relationship bonded by love, understanding, and respect towards each family member. Close family ties is indeed a unique nature of a typical Filipino family. (http://idoljve.wordpress.com/2011/08/31/close-family-ties/). This is also evident among Aquinians. They value the family such that its concept is extended to Aquinas being a "family" and not merely an educational institution;hence, the term "Aquinian Family".

Truth being one of the core values of Dominican education is assimilated into the students and employees; this is articulated in the findings of the phenomenological and ethnological angles of. In Paulino and Antioquia's analysis, truth is engrained among the students as one of the Aquinianvalues while in Maceda and Bajaro's scrutiny, regarded it as a character that distinguishes Dominican education among others.Aquiniansuphold the truth as a commitment to draw themselves closer to God in everything they do.

Aquinians are not fully characterized without regarding them as God-centered. Aquinas being a Dominican institution has the task to spread the teachings of Christ using Catholic or Christian education as a means to evangelization.An Aquinian bears the mark of a maka-Diyos by being God-fearing, prayerful, spiritually committed, being Christian in words, actions, and decisions. They value Gospels which are instrumental to the development of oneself and the society. These were reflected the ethnological branch of this study by Paulino and Antioquia.

Finally the Aquinian community primarily the academic and non-academic employees see go to mass during holy days of obligation (3.0887) as the most observed among the bottom 5 practices, and followed by receive holy communion (2.9969) ranked second; carry a rosary wherever I go (2.9907) ranked third, while pray the rosary (2.9600) ranked fourth, and submit myself to confession as identified by all groups to be the least observed (2.8988).

Practices and beliefs don't always adhere; perceptions are not always proven by practice. Aquinianshave strong faith in God. Surprisingly though, some religious practices are not observed. For one, going to mass during holy days of obligation, which is supposedly a genetic practice among Aquinians as a Dominican institution,falls under the bottom five practices. Similarly, receiving Holy Communion and submitting to confession, which are essential Sacraments are also least observed. Another point for contemplation would be praying. Aquinians are committed to praying; this was established in fact by the two mentioned qualitative studies, however praying the rosary and carrying the rosary is a rare Aquinian act.

Presented in the previous discussion were the consistencies and inconsistencies of the phenomenological and ethnological studies with the present in terms of what one thinks and what one does as an Aquinian. The disparities on many aspects of ideas with practices of are quite obvious. Though those mentioned belong to the top bottom 5 practices, they should not be considered as flaws that deter Dominican education since though they may not be regularly practiced by the, they are however still practiced.

Conclusion

The stakeholders' view of the University reflect so much of what Dominican education is as founded on its four pillars of study, prayer, community, and apostolate. Concretely, they are manifested in the conduct of recollection and retreat sessions, respect of differences in race and nationality and religious beliefs, prayer, and obedience of God's teaching.Maceda and Bajaro's (2011) phenomenological findings are closely linked with the said practices along extension, academic activities, values formation, and practices showing high regard for life.

The school administrators on the other hand, exhibit commitment to work and are aggressive in innovating policies to address the demands of the ever changing times. To them, the human resource is one of the instruments of delivering quality Dominican education; hence, provision for career enhancement is always given significant attention. Sustainable programs for extension are also created for community works.Furthermore, the school or community in general see things positively, strive hard to do well in school, values the family, uphold the truth and put Christ in the center of their life. These are found to be united with the findings of the ethnological research of Paulino and Antioquia (2011) which concluded that he AUL community is envisioned to be persons who possess distinct Filipino values, religious, moral, spiritually mature and proficient guided and enlivened by the four pillars of the Dominican.

On the other hand, culled from the quantitative data, were practices that were found to be inconsistent with the ethnological and phenomenological researches on the same vein. More interestingly, some practices viewed by the stakeholders to be best in one area, are considered to be in the bottom such as the perceptions of the stakeholders on the practices of the administrators on community extension and participation in important school events. These go against the view that cultural activities/engagements are necessary for a holistic Dominican education, since the administrators themselves rarely engage in the said activities.On the part of the Aquinians in general, the stakeholders regard them as God-centered and prayerful, but this has been refuted by thethe bottom five practices such as: going to mass during holy days of obligation, receiving holy communion, carrying and praying the rosary, and submitting to confession. It appeared that some perceptions are not truly visible in practice.

The divergence noted from the results of the quantitative, ethnological, and phenomenological studies is a proof that the institution must work to reconcile these differences to bring about genuine and holistic Dominican education. Students, staff, and administrators all share in the perception created among the stakeholders and therefore must also take up a concerted effort to fill in the inadequacies found. To a large extent, what it takes to be a Dominican is strongly evident in the Aquinian community, but there is a need to link perceptions/views of people with the practices of the Aquinians not only to create a unique and desirable identity, but also to epitomize the true essence of Dominican education

REFERENCES

Aadenish09. (August 31, 2011). Close family ties. Message posted to http://idoljve.wordpress.com/2011/08/31/close-family-ties/

Dominican Province of the Philippines.*History of the Dominican province of the philippines*. Retrieved July 5, 2013, from http://opphil.org/ph/history-of-the-dominican-province-of-the-philippines/

Maceda, J. and Bajaro G. (2012) . Phenomenology of domican education as practiced in aquinas university.

(unpublished research) . Aquinas University, Legazpi City.

Paulino, P. and Antioquia C. (2012). Domican education as practiced in aquinas university, an ethnological study. (unpublished research). Aquinas University, Legazpi City.

The White Goddess.*The legend and history of the benu bird and the phoenix*. Retrieved July 9, 2013, from http://www.thewhitegoddess.co.uk/articles/ancient_egypt/the_benu_bird.asp

Comparison of Learning Styles Between Engineering Students and Non-Engineering Students in UNITEN

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ABSTRACT

Students these days learn new knowledge through different methods. Engineering students can learn through approaches that may be totally differentfrom or may be similarto non-engineering students. This research aims to study the different approaches that engineering students used and then compare the results with that of non-engineering students of their peers in the same university, UniversitiTenagaNasional (UNITEN). Using *Barsch Learning Style Inventory*, this paper reports on the different learning style (LS) of the students from the College of Engineering (COE) and College of Information Technology (COIT). It discusses the results based on different genders from each college and presents a comprehensive analysis on the comparison of LS for COE and COIT students.

Introduction

In a university, the lecturers need to interact with students coming from different education paths, backgrounds, cultures and nationalities. Furthermore, some lecturers may need to teach students from different colleges/faculties. For example, a lecturer teaching C-programming needs to give lectures to Electrical & Electronic Engineering students, Mechanical Engineering students as well as Information Technology (IT) students. The understanding of learning styles among the students from different colleges is therefore crucial for educators around the world to perform their duties effectively (Rosati et al, 1988). During the preparation for lectures or tutorial sessions, educators with deep understanding of the students' learning styles (LS) will be able to prepare their teaching and learning materials in such a way that best suit the LS of the targeted students, hence delivering the knowledge more efficiently.

It is not a simple task to determine the students' LS since it can be affected by many external factors. Over the past few decades, many professional LS inventories are developed to assist researchers in determining the students' LS. While the data collection methods can be in the form of interview, discussion, informal chat etc., most of the available LS inventories consist of a set of questions that test on the different styles, which is questionnaire (Sidhu et al, 2010). A few examples of the questionnaire LS inventories are ***ATLAS*** *(Assessing The Learning Strategies of AdultS) Learning Strategies* developed by Conti and Fellenz (1991), ***Index of Learning Styles*** formulated by Felder and Soloman of North Carolina State University, ***Barsch Learning Style Inventory*** (Barsch, 1991).

In this paper, we will report the LS of engineering students and non-engineering students in UNITEN Putrajaya Campus based on ***Barsch Learning Style Inventory***. Since UNITEN Putrajaya Campus consists of only 2 major faculties, namely the College of Engineering (COE) and College of Information Technology (COIT), a substantial numbers of students from both COE and COIT have participated in this study and the results are analyzed based of Visual (V), Audio (A) and Kinesthetic (K) LS. With the available results and analysis, educators are able to differentiate and correlate the differences and similarities in terms of LS for COE and COIT students.

Research Methodology

For the research and study on students' LS, students' feedbacks are very important. Due to its simplicity of the questions, the ***Barsch Learning Style Inventory*** is chosen as the questionnaire used for obtaining students' feedbacks.

The inventory has only 24 questions, which can be answered by students within 5 minutes. It is very essential that the students feel relax and in a calm mind while answering the questionnaire. Hence short questionnaire that can be completed in a short while are more favorable. Moreover the questions are structures and crafted with very simple and concise language that does not require high command of English language to answer them (Hein and Budny, 1999). To ensure that the students were able to answer all the questions with comfort and without much interference, the survey was conducted at the beginning of the class or towards the end of the class. Since it is not time-consuming, the survey carried out does not affect the lecture or learning process in the class.

The 24 questions in this inventory are equally separated to evaluate the students for three types of learning styles which are the visual, auditory and kinesthetic. However the questions are distributed randomly within the 24 questions for each LS. For example, questions regarding visual LS are in questions number 2, 3, 7, 10, 14, 16, 20 and 22. Equal total scores are allocated for each LS and the preference of the students on a particular LScan be determined according to the highest score obtained for a specific LS. When there are two or even all three learning styles have the highest and equal scores, the student is deemed to be able to incorporate 2 or 3 learning styles.

For COE, the targeted students were from different engineering programs offered in UNITEN, namely Mechanical Engineering, Civil Engineering, as well as Electrical and Electronic Engineering. Students from different programs in COIT are Software Engineering, Computer Science and System & Network.

A total of 188 students,both Malaysians and internationals, have taken part in this study, from which 100 students are from COE and 88 students are from COIT.The students are in their 2nd, 3rd or 4th year of their program. Table (1) lists the number of students from different programs in COE and the breakdown in terms of gender. There are 75 males and 25 females from COE.

Table (1) **Distribution of Students With Respect to Programs Enrolled and Gender for College of Engineering (COE)**

Program	No. of Students	Gender	
		Male	*Female*
Mechanical	35	30	5
Civil	30	22	8
EE	35	23	12
Total	100	75	25

Besides, Table (2) shows the students distributions in terms of program and gender for COIT. A total of 62 males and 26 females have participated in this study. The percentage of male and female students from both COE and COIT reflects the similar percentage of male and female students in these colleges. 75 % of COE students are male with the remaining 25 % are female. On the other hand, COIT has about 70 % male students and 30 % of COIT students are female.

Table (2) **Distribution of Students With Respect to Programs Enrolled and Gender for College of Information Technology (COIT)**

Program	No. of Students	Gender	
		Male	*Female*
Software Engineering	40	24	16
Computer Science	25	19	6
System Network	23	19	4
Total	88	62	26

After obtaining the response from the 188 students, the results were recorded into the computer for further analysis. The analysis was carried out based on 7 types of LS or categories (Koh, 2008), which are:-

1. Visual (V), where students' learning is mainly based on the "looking".
2. Auditory (A), where student's learning is mainly based on the "hearing
3. Kinesthetic (K), where students' learning is mainly based on the "touching".
4. Visual and Auditory (VA), where students' learning is achieved through Visual and Auditory equally.
5. Visual and Kinesthetic (VK), where students' learning is achieved through Visual and Kinesthetic equally.
6. Auditory and Kinesthetic (AK), where students' learning is achieved through Auditory and Kinesthetic equally.
7. Visual, Auditory and Kinesthetic (VAK), where students' learning is achieved through all three types of basic learning styles (Koh and Chua, 2012).

Further analysis was done by plotting the graphs from the results. The results for COE were plotted for male and female. Similarly, a graph for 2 different genders was plotted for COIT. Then to compare the LS of students from COE and COIT, a double columns graph was plotted for comparison.

Results and Discussions

This section presents and discuss the results. Analysis and reasons for the trend or variation of LS of students will also be provided. Figure 1 shows the learning style of the COE students in UNITEN and the comparison between male and female. It is clearly shown in the figure that regardless of the gender, majority of the COE students prefer Visual LS, with >48 % of male and >52 % of female are determined to be having Visual LS. This is followed by the AuditoryLS which records >28 % of male and >16 % of female students. The tendency of COE students using Visual and Audio LS are highlighted once again when the analysis from figure 1 indicates that the percentage of student having Visual-Audio (VA) LS is higher than that of Kinesthetic LS. While the percentage of male students having Visual LS is lower than that of female students, it is higher than the percentage of female students for Auditory LS. However the percentages of male and female COE students having VA LS are very similar, that is about 10-11 %.

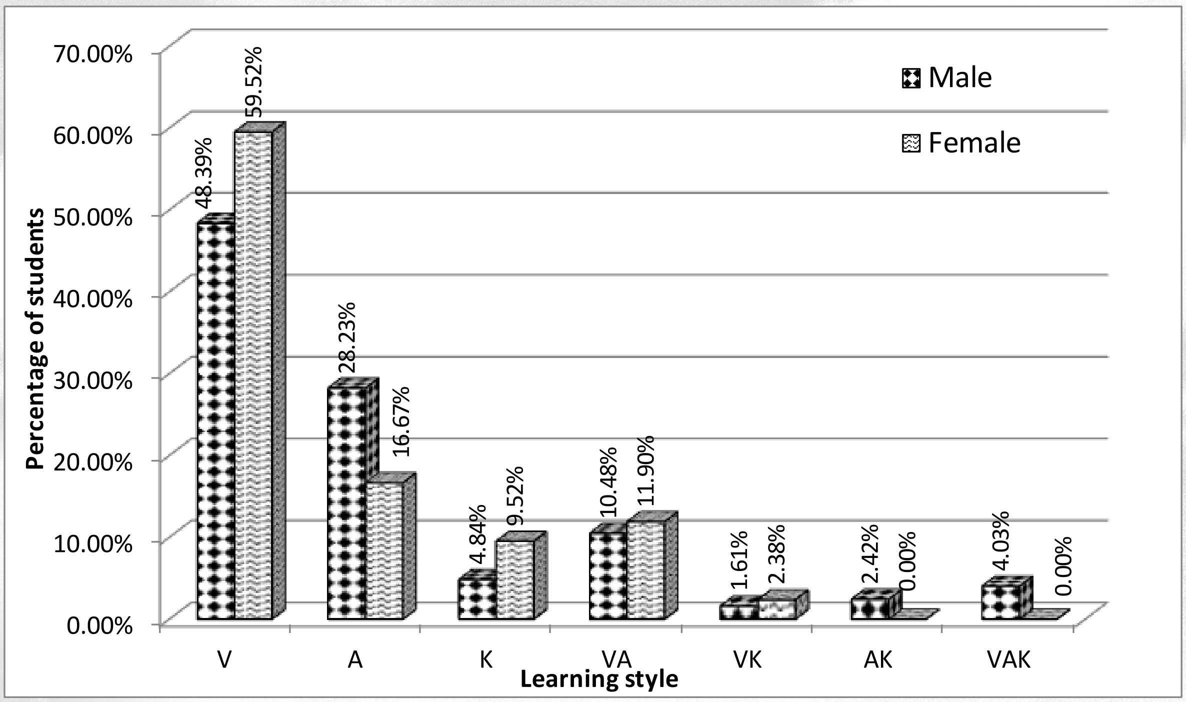

Figure 1. **Comparison of the percentage of male and female students in COE with different preferred learning styles**

Figure 2 presents the results of the inventory for COIT students. Similar to that of COE, male students from COIT prefer to learn through visual LS compared to other LS, with >58 % of the male students indicate that visual is their best LS. However, female students from COIT show a different trend compared to the female students from COE. Although the percentage of female students preferring visual LS is still the highest (>46 %), it is not significantly higher than that of choosing auditory LS (>38 %). This is certainly much different from the percentage difference of >40 % for COE female students between Visual and Auditory LS. Furthermore, it can be noticed that the percentage of female students having VA is much higher than that for COE. This is probably due to the similar amount / percentage of female COIT students choosing Visual and Audio LS. It is also interesting to observe that no female COIT student (out of the 26 students) is having Kinesthetic LS, compared to >9 % of female COE students who choose this LS. From this analysis, we attribute this trend of female COIT students not having Kinesthetic LS to their tendency to rely more on computers / laptops in completing their assignment / work, but not through physical activities such as laboratory experiments (Graf and Liu, 2008). Moreover, female students from COIT are not interested in carrying out hands-on experimental work (Amran, 2010). This trend is alarming especially for subjects which require the student to have practical experience and the educator shall try to expose and explain the importance of having real-life practical application to the students so that they will be sufficiently competitive upon entering the working world (Larkin and Budny, 2005).

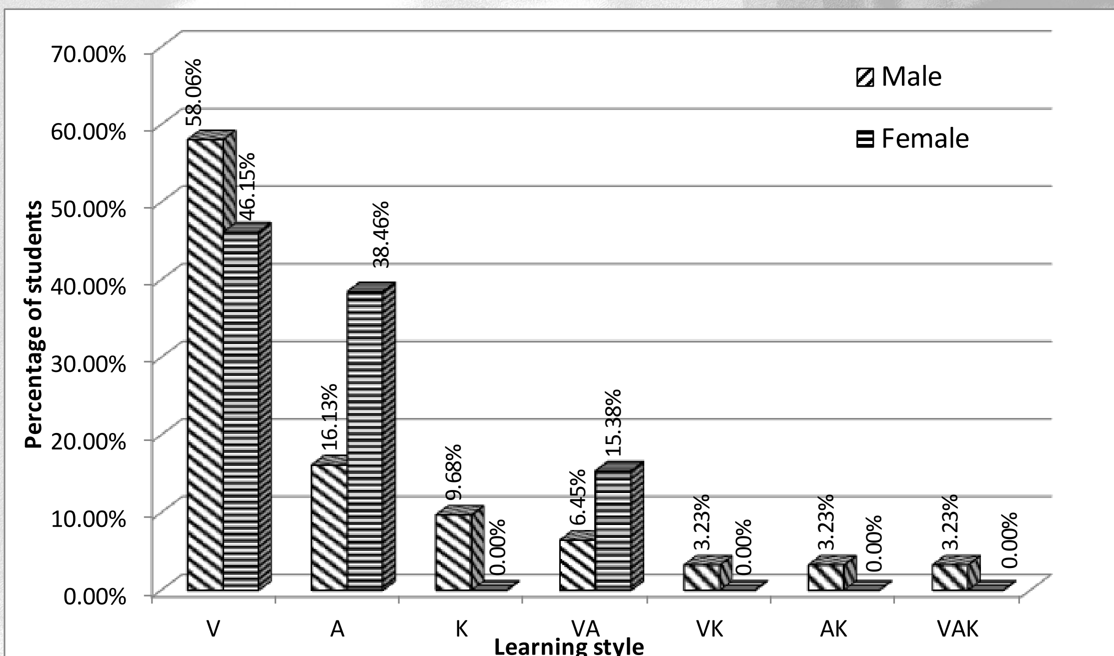

Figure 2. **Comparison of the percentage of male and female students in COIT with different preferred learning styles**

Lastly the comparison of LS between COE and COIT students is done by plotting their comparison (regardless of gender) as shown in figure 3. It can be seen that the overall LS trend for COE and COIT students are very similar, with most students preferring Visual, followed by audio, VA, Kinesthetic. There are very small percentage of students having VK, AK and VAK. It is highly probable that the small percentage is due to both COE and COIT students are not exposed sufficiently to Kinesthetic LS. However this is not gone unnoticed previously as recent studies conducted by Lujan and DiCarlo, and Anu et al. had shown that Kinesthetic learning style is the LS that mostly preferred by Medical Students (Anu et al, 2012 and Lujan et al, 2005). In addition, Reid reported that majority of the students in the hard sciences courses possess Visual LS as compared to students from humanities course (Reid, 1988).

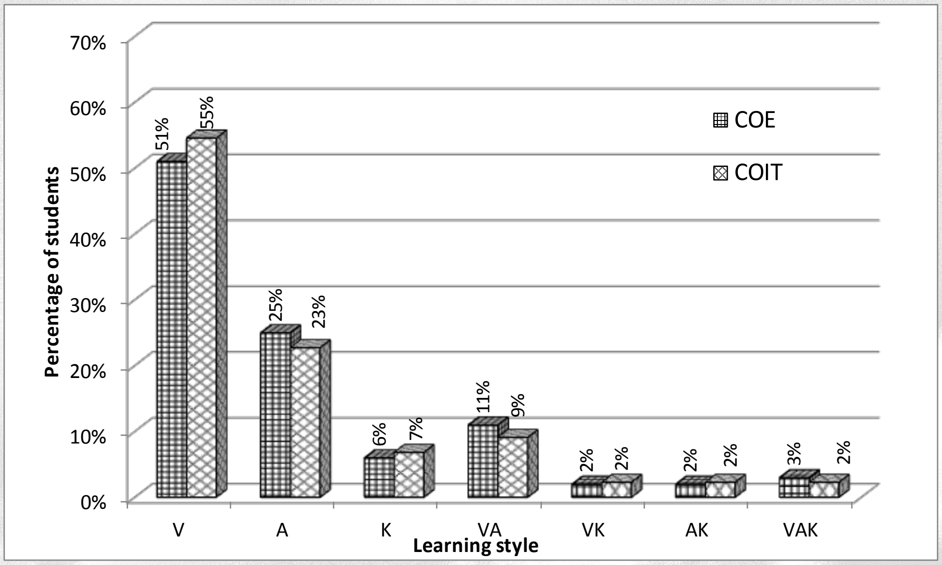

Figure 3. **Comparison of the percentage of students with different preferred learning styles between students from COEand students from COIT**

Conclusion

From the results and analysis obtained from this study, it is clear that visual LS is the most well received LS by both Engineering and IT students in UNITEN. However there is a clear difference between the female students from COE and COIT where female COIT students are more equally distributed between Visual and Auditory LS with quite a high percentage of VA LS. Due to the limited sample size, comparison can only be done between Engineering students and IT students. Further research work can be carried out to compare students from a few more different faculties such as Business, social sciences and Medical faculties. This type of study will need to involve different universities and hence it is not reported here. Nevertheless, this very first study based on UNITEN Putrajaya Campus only has provided an important insight and understanding on the difference in LS for Engineering and non-engineering students in UNITEN.

REFERENCES

Amran, N., Bahry, F. D. S., Yusop, Z. M., Abdullah, S. (2011) Learning Styles of non-science and non-technology students on technical courses in an information management program Education for Information 28 (2010/2011) 325 – 329.

Anu, S., Anuradha, Meena, T. (2012) Assessment of learning style preference among undergraduate medical students – using VAK assessment tool, Intl. J. Medical and Clinical Research, vol. 3, issue 8, 229-231.

S. Graf, Kinshuk and Tzu-Chien Liu, “Identifying learning styles in learning management systems by using indications from students' behaviour," Eighth IEEE International Conference on Advanced Learning Technologies, pg. 482-486, 2008.

T. L. Hein and D. D. Budny, "Teaching to students' learning style: approaches that work," 29th Annual Frontiers in Education Conference, vol. 2, pg. 12C1/7-12C114, 1999.

Koh, Y.Y. "The Study on the change of learning style among engineering students" Proceedings of the 8th SEAAIR Conference, Surabaya, Indonesia 2008.

Koh, Y.Y., Chua, Y.L. "The Study of Learning Styles Among Mechanical Engineering Students From Different Institutions in Malaysia" , The International Conference on Teaching & Learning in Higher Education (ICTLHE) 2012 in conjunction with 4th Regional Conference on Engineering Education and Research in Higher Education 2012 (RCEE &RHEd 2012).

J. A. Lagos Sandoval and P. N. Zapata, "Learning styles, a correlational study in engineering students," Learning styles, a correlational study in engineering students," IEEE ANDESCON, pg. 1-9, 2010.

T. Larkin and D. Budny, "Learning styles in the classroom: approaches to enhance student motivation and learning," 6th Information Technology Based Higher Education and Training, pg. F4D/1-F4D/8, 2005.

Lujan, H. L., DiCarlo, S. E. (2005) First-year medical students prefer multiple learning styles, Adv. Physiol. Educ. Vol. 30, no. 1, 13-16.

Reid, J. M., The Learning Style Preference of ESL Students, TESOL Quarterly, vol 21, no.1, 1987.

P. Rosati, R. K. Dean and S. M. Rodman, "A study of the relationship between students' learning styles and instructors' lecture style," IEEE transactions on Education, vol. 31, no. 3, pg. 208-212, 1988.

M. S. Sidhu, R. Omar and M. S. Shahidan, "Frontiers in Education Conference (FIE)," 2nd International Congress on Engineering Education (ICEED), pg. 110-115, 2010.

Contributory Variables to Passing the Licensure Examination for Teachers Among Certificate in Teaching Students of the Don Mariano Marcos Memorial State University-Open University System

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ABSTRACT

The passing rate of the Certificate in Teaching (CT) students of the Don Mariano Marcos Memorial State University-Open University System (DOUS) in the Licensure Examination for Teachers (LET) is always higher than the national passing rate. This paper discusses the contributory variables to passing the LET by CT students using the descriptive-correlational research design to determine how much variation was caused by the independent variables such as, profile of respondents; academic variables; non-academic variables and tutor related variables to the dependent variables, namely: the level of performance of the students in the LET and the contributory variables to passing the LET by CT students. Documentary analysis and a questionnaire were also used to gather the needed data from the respondents. Out of the 154 LET passers from 1999 to 2008, 111 of them responded.

Analysis of the data showed that the variables significantly related to the level of performance of the respondents in the licensure examination were: marital status; status of employment; Grade Point Average; respondents find time to study despite their hectic schedule at work and at home; some topics were not related to the course; respondents tend to follow their instincts when making important decisions; and tutors met students regularly on time during face-to-face meetings.

The contributory variables to passing the Licensure Examination for Teachers were: marital status; Grade Point Average, and study habits.

Keywords: academic variables, licensure examination; non-academic variables

Introduction

Rationale

The LET is a part of a coherent system that was designed to assess competence and to differentiate between prospective teachers who are not qualified to teach and those who are minimally qualified. The performance in a licensure examination serves as a gauge for students' ability and that of their teachers in preparing them for the exams. On the whole, the result of this test can provide useful information.

Passing the LET is the main requirement used by the Department of Education (DepEd) for all teacher education graduates to earn the title, professional teacher. For non-education graduates, they must comply with the Republic Act 7836 (The LET Law) and with Article II of CMO 30, s. 2004, and shall take 18 units of professional education courses and 12 units of experiential learning courses to qualify for the LET (CMO 52, s. 2007).

The resultof the LET in the Philippines for the past years had been very dismal. Only an average of 27% have passed since 2008. This situation has urged Rep. Arnel Ty of the party-list LPG Marketers Association (LPG/MA) to file House Resolution #1160, asking the House Committee on Higher and Technical Education, the Civil Service Commission and the Professional Regulation Commission to look into the conditions that may have caused the inadequate performance of many graduates in professional licensure examinations (http:/www.sunstar.com.ph/manila/local.news/2011, retrieved, March 4, 2012).

The DMMMSU Open University System (DOUS) offers the Certificate in Teaching to graduates of programsother than teaching, but have the desire to teach in the elementary or secondary level. The subjects are only the professional education subjects which the students need to qualify for the licensure examination.

The passing rate in the LET of the DOUS students is always higher than the national passing rate, but this does not mean that DOUS is already contented with the result. To attain global competence, an educational institution must have a 100% passing rate in its board programs.

It is in this context that the researcher wished to identify the factors that affect the passing of the Licensure Examination for Teachers in order to determine in what way or ways is DOUS helping these students to land a teaching job.

Theoretical Framework.

The framework of this study is rooted in the belief that students' overall performance, including the passing of board examinations develops as a consequence of many contributing factors such as personal and psychological and other factors like school, teachers and peers.

Intelligence is the most basic ability that affects students' performance. According to Woolfolk (1993), "one's intelligence is primarily measured by one's Intelligent Quotient (IQ) because it is believed that IQ is highly predictive of performance."

Reynolds and Walberg (1992) as mentioned by Staver (2001), stated that the nine important factors that influence student achievement are grouped into three sets. The first set, student aptitudes, includes student ability (i.e. prior achievement); motivation; and developmental level (age). The second set, instruction, includes instructional quantity (i.e. amount of time), and instructional quality (i.e. appropriateness for the students. The third set, social-psychological environment, includes educational, home, and peer environment and exposure to mass media outside of school.

In relation to this, a distance education learner must be mature enough to have full responsibility of his own learning. According to Levine (2005), for distance education to make a serious impact on an individual, thatan individual must be a full and active participant in the learning environment. This is also supported by the Law of Readiness of Thorndike which states, "Nobody can force a learner to learn if he/she is not biologically and psychologically prepared."

The Goal Setting Theory of Locke (1990) is also considered relevant in this study. The theory states that specific and challenging goals along with appropriate feedback contribute to higher and better task performance.

This means that goals indicate and give direction to students about what needs to be done and how much effort is required. If an individual sets goals, he will be motivated to achieve these goals because he was the one who sets them. This is a technique used by some students who are reviewing and preparing for the board exams.

The offering of distance learning in Region I, especially in the province of La Union has given opportunity to working and busy students to enrol. This alone has motivated the students to finish the program they enrolled in its prescribed period. Maslow's Needs theory emphasized that when the needs of the individuals are met, either through intrinsic or extrinsic motivation, it makes them use their potentials, values, skills and time to improve their performance.

Statement of the Problem.This study determined the variables affecting the passing of the Licensure Examination for Teachers by the Certificate in Teaching students of the DOUS. Specifically, it sought answers to the following problems:

a. What is the profile of the respondents as to their:
   a.1 personal
   a.2 socio-economic background?

b. What academic variables could affect the passing of the Licensure Examination for Teachers by the respondents?
c. What is the level of performance of the respondents in the Licensure Examination for Teachers?

d. Can the following non-academic variables affect the passing of the Licensure Examination for Teachers:
   d.1 motivation to enrol Certificate in Teaching
   d.2 study habits
   d.3 time management
   d.4 problems encountered while studying
   d.5 emotional quotient?

e. What are the tutor-related variables in terms of their:
   e.1 academic qualifications
   e.2 behavior in the classroom?

f. Is there a significant relationship between the level of performance of the respondents in the Licensure Examination for Teachers and the following:
   f.1 profile of respondents
   f.2 academic variables
   f.3 non-academic variables
   f.4 tutor-related variables?

g. Which among the related variables may affect the passing of the Licensure Examination for Teachers by the Certificate in Teaching students?

Methodology

Research Design

Descriptive-correlational research was used to determine how much variation was caused by the independent variables to the dependent variables. Documentary analysis was utilized to gather data on respondents' home addresses, Grade Point Average in college and their contact numbers, including the educational qualifications of the tutors in Certificate in Teaching.

Population and Locale

Respondents included the 154 passers of the Licensure Examination for Teachers of the DOUS from SY 1999 to 2008. Unfortunately, only 111 responses were collected. Other respondents cannot anymore be located and questionnaires sent to their home addresses via postal mail were returned to the researcher. Some questionnaires were sent via email, since some of them are already abroad and were only contacted by means of their email addresses, facebook accounts or through yahoomessenger . Other questionnaires were sent through relatives and friends who were enrolled at the DOUS. Some respondents were given the questionnaire when they came back to the DOUS to request some pertinent documents.

Instrumentation and Data Collection

The questionnaire used to gather data from the respondents was patterned from the instrument used by Emperador (2004), however, some revisions were made to suit the objectives of the study and the situation in the DOUS.

The statistical tools used in this research were percentages, frequency count, weighted mean and Pearson-product moment correlation. Multiple regression analysis was applied in determining the contributory variables to passing the LET.

The data gathered were tallied, analyzed, classified and presented in tabular form.

Results and Discussion

Personal Profile of the Respondents

More than half of the respondents were single, female and within the age range of 25-29 years old. This could be proven by one of the requirements to enter the program, that is, to have finished a four-year degree course.According to Levine (2005), one very essential characteristics of a successful distance learning student is his willingness to learn, and this is manifested by older and more mature students, since they are already self-directing. A self-directing learner is one who is able to take responsibility for his or her own agenda.

Socio-Economic Background of Respondents

More than half of the respondents were working, of permanent rank and file positions in the government service and were receiving an annual income below Php100,000.00 while they were studying. This findings suggest that since the respondents were generally still young and single, though some were already working, their annual income indicates that theymight still had been supported by their parents in some of their financial needs in school.

Morakinyo (2003) suggested that there exists a relationship between socio-economic status and academic achievement. The findings of this research and the idea of Morakinyo (2003) was also corroborated by Majorbanks

(1996) when he mentioned that socioeconomic status, parental involvement and family size are particularly important factors affecting students' performance.

Academic Variables

Of the 111 respondents, 25 were Bachelor of Science in Commerce graduates, followed by 24 graduates of Bachelor of Science in Nursing. Majority (64.86%) of the respondents graduated from private schools and more than half (57.66%) had a Grade Point Average that ranged from 80-84.This finding reinforces the idea of Barry (2006) when she said that, students' educational outcome and academic success are greatly influenced by the type of school that they attend. The school one attends is the institutional environment that sets the parameters of a student's learning experience. Depending on the environment, a school can either open or close doors that lead to academic achievement.

Performance in the Licensure Examinationfor Teachers

Less than half (42.34%) of the respondents got a rating of 75-76, followed by those who got a rating of 77-78 (27.93%). This result implies that the respondents have gained enough knowledge and skills to pass the licensure examination. This also means that the respondents were prepared intellectually, emotionally and physically for the examination.

Non-Academic Variables

Most of the respondents very highly agree to the first criterion under motivation to enroll Certificate in Teaching, "To pursue a career I love" with a mean rating of 4.34. This implies that the respondents were very much interested in the program, hence they were highly motivated to finish the program they enrolled in. This finding agrees to Gines, et. al. (1998), when they said that, "intrinsic motivation means the desire of the students themselves to learn in order to achieve specific objectives without the need for external inducements."

With regards to the study habits of the respondents, Criterion 3, "I do my own homework," got the highest mean rating of 4.60, followed by criterion 6, "I submit my assignments on time," with a mean rating of 4.58. This findings suggest that the respondents had been responsible enough during the course of taking up Certificate in Teaching since they were able to cope up with the requirements for a distance learning student. This finding supports the statement of Kapunan (1998) that, "learning cannot be effective unless the students are trained to know how to study under desirable conditions. The respondents were already matured enough and have undergone several years of schooling, hence, they can decide on the best strategy in their studies.

Time management of respondents has an overall weighted mean of 3.92, which means that the criteria under this variable were often practiced by the respondents. Criterion 3, "I get things done on time," got the highest mean rating of 4.63. Levine (2005) said that, "probably the most important characteristics of the successful learner in a distance education environment is that the learner must be willing and be able to be self-directing." This self-directing characteristic of a distance education learner was manifested by the attitude of the respondents, by their being able to decide what to learn, how to learn, and when to learn.

The overall weighted mean of 2.80 which was interpreted as moderately affected shows that there were some problems that affected the respondents while taking up Certificate in Teaching. Some affected them highly such as: "Modules that were lightly printed" and "Lack of References." Modules are the primary instructional materials used in the DOUS, and if these were printed very lightly, the students were highly affected since they could not fully understand their lessons. The result also shows that modules and references were of utmost concern of the students, while personal problems such as "Unfriendly DOUS staff," "My religious and social obligations interfered with my studies," and "Difficulty to adapt in the open and distance learning scheme were the least.

The research found out that the respondents very highly agree to the third criterion under Emotional Quotient, "While there are some things that I would like to change, I generally like who I am." This implies that since the respondents were already matured individuals, there actions were based from deep analysis of a certain situation first before they act.

Tutor-Related Variables

Majority (71%) of the 21 tutors in Certificate in Teaching were holders of doctorate degrees, 14.29% are still pursuing their doctorate degrees, and those with master's degree is 9.52%. According to the DMMMSU Faculty Manual, revised edition 2011, the minimum educational qualification for recruitment as a general rule shall be a master's degree or its equivalent in the appropriate specific area of specialization.All the 21 tutors in Certificate in Teaching are licensed teachers. The Licensure Examination for Teachers is a test of the overall knowledge and proficiency of prospective teachers to provide a reliable structure which the practice of prospective teachers can be measured and proven, and it gives access for continuing growth and development (http://www.articles.base.com).

Respondents rated their tutors excellent (4.36). Criterion 5, "My tutors demonstrated a thorough and broad knowledge of the subject matter," got the highest mean rating of 4.57 which implies that the tutors were all equipped with the necessary knowledge of the subjects they taught. Criterion 4, "My tutors used appropriate teaching techniques and instructional aids," with a mean rating of 4.23, shows that the tutors were also resourceful enough to make use of other teaching materials aside from the modules.

Relationship of the Different Variables to the Performance in LET

The performance of the respondents in the LET is significantly related to the marital status (rc=0.240 of the respondents. This implies that, since the respondents were generally single, they were more prepared emotionally and intellectually when they took the examination. The status of employment (rc=-0.238) being negatively significant to the LET performance implies that the respondents who were working got a lower passing score in the LET than those who were not working.

The Grade Point Average (GPA) (rc=0.416) of the respondents is also significantly related to their performance in the LET. This result means that for an examinee to pass a board examination, he or she must have high grades in his or her college days. Students with higher GPAs are ideally prepared intellectually for a wide variety of demanding contexts and activities such as taking the licensure examinations.

On time management, the fifth criterion, "I find time to study despite my hectic schedule at work and at home," (rc=.203) is significantly related to the performance of the respondents to the LET, which means that though the respondents were very busy, they were still able to prepare for the examination. On problems encountered, criterion number 10, "Some topics discussed by the tutor were not related to the course," (rc=0.187) was significant related to the performance in the LET. This means that though the topics were not related to the course, they served as added information to the respondents for their examination.

Under Emotional Quotient, Criterion number 13, "I tend to follow my instincts when making important decisions," (rc=0.223) is significantly related to the passing of the LET. Thisimplies that the respondents were really matured individuals and they used this maturity not only in age but also in wisdom, in answering the questions in the board examination. On tutors behavior, Criterion number 8, "Tutors met their students regularly, on time during face-to-face meetings,"(rc=0.196) which means that the tutors, though the face-to-face meetings in the DOUS were only limited to seven Saturdays were able to impart the needed knowledge and skills to their students for the licensure examinations.

Variables Affecting the Passing of the LET

The regression analysis includes the Model Summary, ANOVA and the coefficients.

Model Summary

Model	R	R Square	Adjusted R square	Std. Error of the Estimate
1	.508	.258	.238	1.13249

a. Predictors (Constant), GPA, Civil Status, Study Habit

The value of R – square which is 0.258 shows that there is 25% variation in the students' level of performance in the LET due to the independent variables: GPA, Civil Status, Study Habit. It could also be seen from the ANOVA Table that all the variables: GPA, Civil Status and Study Habit are significantly related to the rating in the LET.

ANOVA

Model	Sum of Squares	df	Mean Square	F	Sig.
1 Regression	47.795	3	12.422	.238	.000[b]
Residual	137.232	107			
Total	185.027	110			

a. Dependent Variable: Rating
b. Predictors: (Constant), GPA, Civil Status, Study Habit

COEFFICIENTS

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	*Std. Error*	*Beta*		
Constant	2.120	1.244		1.703	.091
3 GPA	.738	.164	.379	4.504	.000
Status	.564	.216	.218	2.615	.010
Stdy Habit	-.574	.246	-.196	-2.333	.022

a. Dependent Variable: Rating

On the basis of beta coefficients, the model shows that Grade Point Average causes 73% positive variation and is significantly related to LET performance. This result shows that there is a positive relationship between GPA and LET performance of the students. Civil Status causes a 56% variation in students' performance in the LET. The t-value is also significant, hence, there is a positive relationship between civil status and |LET performance. Study Habit causes a 57% variation but in opposite direction but its t-value is significant so there is a negative relationship between study habit and LET performance.

The variables that affected the passing of the respondents in the Licensure Examination for Teachers were: Grade Point Average, Marital Status and Study Habit.

Conclusions

From the findings, the following conclusions were derived:

1. The respondents manifested the characteristics of an ideal distance learning student:self-directing, matured and responsible enough for his own learning.

2. The respondents' motivation to enrol, good study habits and excellent time management procedures helped prepare them emotionally, physically and most of all intellectually for the licensure examination

3. All the tutors in Certificate in Teaching were qualified to teach professional education subjects.

4. The variables that were significantly related to the level of performance of the respondents in the licensure examination were: marital status; status of employment; Grade Point Average; respondents find time to study despite their hectic schedule at work and at home; some topics were not related to the course; respondents tend to follow their instincts when making important decisions; and tutors met students regularly on time during face-to-face meetings.

5. The performance of the respondents in the Licensure Examination for Teachers was affected by their: marital status; Grade Point Average, and study habits.

Recommendations

Based from the findings and conclusions of the study, the following recommendations were made:

1. Certificate in Teaching students with lower GPA in college should have additional subjects to better prepare them for the Licensure Examination for Teachers.

2. Study habits of students must be assessed by the Guidance Counselor so that the performance of the students not only in their studies but more in the licensure examination will improve and the percentage of passing will become higher. A seminar or lecture should also be held to improve study habits of students.

3. Students who are about to take the Licensure examination should be encouraged to study harder and prepare for the licensure examination.

4. Strengths and capabilities of the tutors should be maintained by the DOUS by giving additional rewards and incentives. This will encourage them to become more effective in delivering their lessons.

5. An assessment of the curriculum, the library holdings, and other facilities should be conducted regularlyto ensure their adequacy, relevance and effectiveness to the needs of the students as well as the faculty and tutors.

6. Another study should also be conducted utilizing another group of respondents to validate the results of this study. The possibility of using the next batch of LET passers from 2009-2014 as respondents is highly recommended.

REFERENCES

Abellera, P., Corpuz, R., & Sacayanan, E. (2008).DOUS Graduate Tracer Study.DOUS Research & Extension Journal.1, 1-9.

Adeyemo, D.A. (2005). Parental Involvement, Interest in Schooling and School Environment as Predictors of Self-efficacy Among Fresh Secondary Students in Oyo State, Nigeria.Electronic Journal of Research in Educational Psychology [online].Available from: www.sciencedirect.com.[accessed January 15, 2012]

Aquino, Gaudencio (1988). Principles and Methods of Teaching.Mandaluyong City: National Book Store

Barry, Jennifer (2005). The Effect of Socio-Economic Status on Academic Achievement. [online]. Available from: http://soar.wichita.edu [accessed January 13, 2012]

Caccam, Lucilla M. (2003). "Predictors of Academic Proficiency of Graduate Students at DMMMSU Graduate College, City of San Fernando, La Union."Dissertation, DMMMSU Graduate College, City of San Fernando, La Union.

Calderon, Jose F. (1998). Principles and Practices of Teaching.Quezon City: Great Books Trading.

Debono, Manwel, et.al. (2004). Career Outcomes of Graduates 2004: A Career Guidance Tool. [online] Available from: www.um.edu.mt [accessed March 12, 2013]

Dickinson, Joanne (2001). Factors Affecting Goal Completion of Adult Basic Education Students in the Northeast Kingdom of Vermont. [online]. Available from: http:tech.worlded.org [accessed May 21, 2013]

Emperador, Victor, Jr. R. (2004). "Predictive Factors of the Professional Board Subject Performance of Fourth Year Students in Selected Para-Medical Courses in Region 1 for the SY 2003-2004." Dissertation, DMMMSU Graduate College, City of San Fernando, La Union.

Flores, Oscar P. (2002). "Information Technology Instruction Plan for LUNHS." Thesis.DMMMSU College, City of San Fernando, La Union

Hamad, I., et.al. (2001). Political Education Through the Mass Media? A Survey of Indonesian University Students. Asia Pacific Media Educator.11,55-71[online]. Available from: http://ro.uow.edu.au

[accessed January 15, 2013]

Halawa, Ibtesam. (2006). The Effect of Motivation, Family Environment, and Student Characteristics on Academic Achievements. [online].Available from: http:/www.findarticles.com [accessed March 14, 2012].

Kapunan, Rocio R. (1998). Fundamentals of Guidance and Counseling. Manila: Rex Book Store.

Kelly, A. V. (2004). The Curriculum Theory and Practice. 5th ed. London: Sage Publications, Inc.

Levine, Joseph S. (2005). Making Distance Education Work: Understanding Learning and Learners at a Distance. Michigan: Learners Associate.net

Rivera, Filomena V. (1992). Toward Effective Teaching.Rev.ed., Quezon City: National Book Store.

Soriano, Analiza G. (2007). Emotional Intelligence and Transformational Leadership of Student-Leaders and Non-Leaders. Miriam College Faculty Research Journal, 28, 47-60.

Using Licensure Tests to Improve Teacher Quality and Supply. [online]. Available from: www.nap.edu. [accessed March 21, 2012]

LET Performance and Selected Variables Among the 1st Batch of MAPEH Graduates. [online]. Available from: http:/ www.articlesbase.com. [accessed February 10, 2012].

Woolfolk, Anita E. (1993). Educational Psychology.15th edition. Boston: Allyn & Bacon.

Socio-cultural Variables and Ethnocentrism Among Senior College Students: Implications to ASEAN 2015

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ABSTRACT

Global economic interdependence is inevitable. This phenomenon becomes more pronounced as ASEAN countries head off to economic integration in 2015. The Philippines as a member of the Association of Southeast Asian Nations (ASEAN) views the reality of economic integration and interdependence as becoming even more imminent as it moves closer to become integrated as one community in 2015 (Riguer, 2012). Studies have observed resulting psychological processes such as ethnocentrism as well as openness to ideas and consumer products because of global economic turbulence due to increasing interdependence (Shankarmahesh, 2006; Cameron, Kocum, Berry, 2012). This study looked into ethnocentrism and socio-cultural orientations among college students in two biggest universities in a selected city in Northern Mindanao. Causal-comparative research design was used. Using survey questionnaires, data were collected from 267 randomly selected senior students. Structural Equation Modeling (SEM) analysis via Amos 20 feature of SPSS 16 was used to establish the path coefficients. Results indicated good fit revealing significant paths on openness, cultural conservatism, and materialism to ethnocentrism. Findings of this study substantially inform institutional curricular reform decisions to augment current institutional efforts in preparing college students as future labor force for global interdependence.

Key words: **ethnocentrism, economic integration, global interdependence**

Introduction

Global economic interdependence has inevitably grown extremely as an outcome of massive technological progress and policies that are aimed at opening national economies to competition internally and externally (United Nations Secretariat, 2009, 2011). Seeing the world getting more and more connected through various modes of cooperation and integration, the Philippines as a member of the Association of Southeast Asian Nations (ASEAN) views the reality of economic integration and interdependence as becoming even more imminent as it moves closer to become integrated into one community in 2015 (Riguer, 2012). The Philippine Association of Colleges and Universities (PACU) has been consistently raising a more specific concern during its two successive annual conferences: that of the preparedness of college graduates to be an inevitable part of this free flow of services and free flow of skilled labor, -- two of the core aspects of AEC establishment (AEC Blueprint, A2, A5). Competency-based courses are among the highly focused programs in the Philippine colleges and universities where diverse competencies are defined by the Commission on Higher Education (CHED) and the Technical Education and Skills Development Authority (TESDA). There is, however, no clearly defined emphasis on preparing students psychosocially for this economic integration. Studies report of resulting psychological processes such as ethnocentrism as well as openness to ideas and consumer products, among consumers because of global economic turbulence due to this increasing global interdependence (Shankarmahesh, 2006; Cameron, Kocum, Berry, 2012). Ethnocentrism is the belief in the superiority of one's ethnic group (Krayer, 2013) while Shimp and Sharma (1987), distinctively say that it is "the beliefs held by consumers about the appropriateness, indeed morality of purchasing foreign-made product and loyalty of consumers to the products manufacturers in their home country." In essence, highly ethnocentric people take pride in their own values, symbols and people, and hold in contempt the objects and values of other groups. Highly ethnocentric students may find difficulty to integrate themselves as future workforce in this forthcoming integration and interdependence. Ethnocentrism is viewed to be among the new forms of protectionism that are foreseen to ward off international competition as a result of globalization (Porter, 1986; Shankarmahesh, 2006). It is also considered as "one of the most enduring forms of non-tariff barriers of global economic interdependence" (Shimp and Sharma, 1987).

Weinstein (2013) cited various theorists advocating the centrality of ethnocentrism as part of human nature (Lynn, 1976; Mihalyi, 1984; Rushton, 1989). Most people are ethnocentric at one point or another as people best relate to their own cultures, and individuals are mostly unaware though of their own ethnocentric tendencies (Barger, 2008; Cunningham, Nezlek, & Banaji, 2004 as cited by Weinstein, 2013). That is, in this concept, one group considers itself to be superior and qualified while other groups to be unimportant, weak, and inferior. Tomkiewicz, Bass, Gribble (2011) recognized that ethnocentrism may exist among college students even if there are efforts to advance multiculturalism and encourage openness. Their study suggested that ethnocentrism may be a major obstruction in students' career as they face the globalizing market. Within this socio-cultural context, ethnocentric tendencies in high levels may indeed hinder students' own preparation to be part of the future workforce of this global economic interdependence.

Lee Nehrt, a pioneering international business scholar in his seminal book *Business school curriculum and faculty: Historical perspectives and future imperative* (1993), asserted that "it is the responsibility of education to prepare people for the world in which they will be living." Thus, business students and practitioners need to understand how ethnocentrism can influence career success or the success of their employers (Weinstein, 2013).

This study looked into socio-cultural variables that influenced college students' ethnocentricity. Its significance to local and international marketers lies on the beneficial understanding of student-consumers' reasons for buying domestic versus imported goods, in terms of selecting their target markets and in formulating appropriate marketing strategies (Kammarudin, Mokhlis and Othman, 2002). Result of this study would encourage universities to review their business education curriculum. Responsive academic preparations can help students towards a more informed consumer behavior.

Framework

The advent of globalization has brought changes to consumers' behavior and has highlighted the need for a better understanding of the factors that influence consumer behavior such as ethnocentrism (Gupta, 2011). This study assumed that ethnocentrism is better understood within the dynamics of *openness to diversity, cultural* *conservatism, fatalism and materialism* (Kamaruddin, Mokhlis and Othman, 2002; Shankarmahesh, 2006; Gupta, 2011).

Ethnocentrism. Ethnocentrism is fundamentally regarded as a sociological concept that has evolved into a psychological structure centering on the individual's personal systems as well as having a more general-cultural and socio-analytical circle (Kabayashi and Demireli, 2013; Yu and Albaum, 2002; Jianlin, Ning and Qi, 2010). The presence of a cultural structure is considered to be the most important factor in the formation of ethnocentrism, and "people gain the habit of doing certain things by certain ways through dynamism of acculturation and they develop an assessment towards the other groups wrongly or incorrectly" (Kabayashi and Demireli, 2013). Weinstein (2013) cited various theorists advocating the centrality of ethnocentrism as part of human nature (Lynn, 1976; Mihalyi, 1984; Rushton, 1989). The authors stress their concern that ethnocentrism may be a major obstruction in students' future career in the globalizing market. Furthermore, consumer ethnocentrism is said to be influenced by customer's characteristics such as *materialism, fatalism, cultural conservatism and openness* (Josiassen, Assaf and Karpen, 2011; Shankarmahesh, 2006; Gupta, 2011).

Materialism. Belk (1985) defined materialism as "the importance a consumer attaches to worldly possessions that assume a central place in a person's life and are believed to provide the greatest source of satisfaction and dissatisfaction." Belk's scale relies primarily on indicators of emotional reactions and acts as measures of personality. Richins and Dawson's (1992) model, on the other hand, view materialism from a value perspective and argued that as a value, "materialism reflects the importance a person places on possession and its acquisition as a necessary or desirable form of conduct to reach desired end states, including happiness." From both models, it is deduced that highly ethnocentric persons put importance on what they possess including their love of and loyalty to the products manufactured in their home country. It is hypothesized that ethnocentrism is positively related to materialism. Josiassen, Assaf, Karpen (2011) cited a vast amount of research revealing that more ethnocentric consumers tended to be more materialistic (Olsen et al., 1993).

Fatalism. Another consumer characteristic is *fatalism* that is generally described as the belief that what happens, or has happened, in some way is destined to occur (Dennett, 1984; Solomon, 2003). Wildman (2011) cited three categories of fatalism described by Elder (1966): theological fatalism, or the belief that God or some other moral order controls man's destiny and the outcomes of his actions; empirical fatalism, or the belief that phenomena occur for no discernible reason and that outcomes cannot be controlled; and social fatalism, or the belief that one's general position in life is fixed and cannot be changed. This present study used theological fatalism considering the religiosity of Filipinos. Filipinos have been found to be highly religious as shown by their religious beliefs and practices, and religious affiliation (Abad, 1995). Likewise, Türküm (2006) considered fatalism as self-protecting behavior. Viewing fatalism as a self-protecting behavior, the researchers of this present study hypothesized that ethnocentric tendencies are positively related to fatalism. Fatalism, therefore, complements ethnocentric tendencies within the self-protecting context since ethnocentrism while questioning the morality of purchasing foreign-made products, insists on loyalty of consumers to the products manufactured in their home country (Shimp and Sharma, 1987).

Openness to Diversity and Challenges. Openness to diversity has been defined as an attitude of awareness and acceptance of both similarities and differences that exist among people (Sawyer, et al, 2005 & Gregory, 2009). Students, after a host of college involvements in classrooms and outside exposures, are expected to change toward the direction of greater tolerance to individual differences and toward generalized openness to experience (Whitt, Edison, Pascarella, Terenzini, Nora, 2001; Bowman, 2014). Pascarella et al. (1996) defined *openness* as "an orientation toward enjoyment from being intellectually challenged by different ideas, values, and perspectives as well as an appreciation of racial, cultural, and value diversity." Individuals higher in openness will have less rigid views of right and wrong, what is appropriate and inappropriate, etc. (Black, 1990; Caligiuri, Jacobs, Farr 2000). Shankarmahesh (2006), on the other hand, discussed studies that found a negative relationship between cultural openness and consumer ethnocentrism (Shimp and Sharma, 1987; Howard, 1989), but contested such findings and said that it is rather simplistic to generalize that cross-cultural experiences and familiarity with other cultures alone will mitigate ethnocentric tendencies in general. Items in the openness scale of this study indicated more of cultural diversity. *Openness* is seen as an integral outcome of the undergraduate experience and is hypothesized to link negatively with ethnocentric tendencies.

Cultural Conservatism. Conservative persons are those that "show a tendency to cherish traditions and social institutions that have survived the test of time and to introduce changes only occasionally, reluctantly and gradually" (Sharma, Shimp & Shin,1995). In its extreme form, conservatism can manifest itself as religious intolerance, insistence on strict rules and punishments and an anti-hedonic outlook (Wilson and Patterson, 1968 in Sharma et al., 1995). Sharma et al. & Strauss in Al Ganideh and Zaytoonah (2011) strongly asserted that religion is the core of conservatism. Zumbrunnen and Gangl (2007) found evidences that cultural conservatism stands as a distinct strand of conservative attitudes and explained conservatism as the "general belief in the importance of preserving traditional values taking into account its strong religious component." They used two measures to capture cultural conservatism: strong religious element and traditional values. Al Ganideh et al. (2012) found out that there is a proportional relationship between conservatism and ethnocentrism, implying that conservative consumers have high ethnocentric tendencies towards their local products. Further, they concluded that among the variables studied, conservatism has the strongest influence on consumer ethnocentrism.

Considering the literature reviewed and the issues on ethnocentrism, this study sought to explain the phenomenon behind student-consumers' ethnocentrism in terms of their behavior and attitudes. Thus, it explored empirical evidences that materialism, fatalism, cultural conservatism as well as openness to diversity and challenges can influence the degree of ethnocentric tendencies of students-consumers particularly senior students. Thus, two hypotheses were tested based on the assumptions of the study. Given the above discussions, the following hypotheses were drawn:

Hypothesis 1: Ethnocentrism is negatively related to all the socio-cultural variables such as materialism, fatalism, openness to diversity and challenges and cultural conservatism.

Hypothesis 2: Openness to diversity and challenges mediates the relationship between fatalism and ethnocentrism while materialism and cultural conservatism influence ethnocentrism.

Method

This study was conducted in two autonomous universities in Region 10, Liceo de Cagayan University and Xavier University. These universities are the only ones in the region granted Autonomous Status by the Commission on Higher Education for the last five years. Granting of this coveted distinction requires these universities to attain a standard of quality education higher than what is set by the government. There were 267 randomly sampled senior college business students. Quantitative data were gathered using the Ethnocentrism and Socio Cultural Variables Survey Questionnaire. The first twelve items measured *ethnocentrism* from Shimp and Sharma (1987), the succeeding eight items measured for *openness* (Pascarella, Marcia, Nora, Hagedorn, Terenzini, 1996). The four items in the measured *cultural conservatism* (Zumbrunnen and Gangl, 2008), four items measured *fatalism* (Solomon, 2003) and five items measured materialism (Belk, 1985). The instrument underwent reliability test, which the reliability (Cronbach's Alpha) coefficients were within the acceptable limits.

The study employed causal-comparative research design utilizing Path Analysis to confirm hypotheses. Structural Equation Modeling analysis via Amos 20 feature of SPSS 16 was used to establish the path coefficients. The presentation of research results was guided by literature on causal path analyses as reported by Boomsma (2000), Suhr (2000), and Kenny (2012). The estimation procedure utilized "model fit", "strength of the postulated relations between variables of interest", and "reliability of the parameter estimates." The discussion observed frequently used absolute fit indices since the measures provide the major indication of how the proposed theory fitted the data. Thus, in the presentation of the result, their calculation is not dependent on comparison with a baseline model but is instead a measure of how well the model fits in comparison to no model at all (Jöreskog and Sörbom, 1993). Hooper, Coughlan, & Mullen, (2008), therefore, suggested that in this listing of category, the following procedures should be included and measured: Chi-Squared test, RMSEA, GFI, AGFI, the RMR and the SRMR.

Results And Discussion

Table 1 shows the descriptive data of the sample that included scale reliabilities, means, standard deviations and zero-order correlations for all the study variables. The different parts of the scale representing the various constructs have the following Cronbach's Alpha Coefficient (R), namely: ethnocentricity is 0.82; openness to diversity & challenges is 0.82; cultural conservatism is 0.64; fatalism is 0.64; materialism is 0.63. In testing reliabilities an alpha of 0.75 or greater is acceptable for instruments that assess knowledge and skills while 0.50 or greater is acceptable for attitude and preference assessments (Tuckman, 1999; Litzinger, Lee, Wise and Felder, 2005). The alpha values of all the five scales used in this study met this criterion and therefore, the scales are reliable. The range of responses is 1 to 4 where 4 is the highest indicating strong agreement.

Table 1. **Scale Reliabilities, Means, Standard Deviation, and Zero-Order**

Variable	R	Mean	SD	1	2	3	4
Ethnocentricity	.82	3.03	.43				
Openness to Diversity & Challenges	.82	3.39	.42	.417**			
Cultural Conservatism	.64	3.50	.57	.296**	.384**		
Fatalism	.64	3.47	.67	.259**	.413**	.519**	
Materialism	.63	2.79	.57	.355**	.212**	.118	.240**

Correlations (n=205 ~ 207); **Correlation is significant at the 0.01 level (2-tailed)

Ethnocentricity, the dependent variable of the study, had a mean of 3.03, implying that the student-respondents are moderately ethnocentric. Students were likewise *moderate* in their *openness* (3.39), *cultural conservatism* (3.50), and *fatalism* (3.47). However, they perceived themselves to have *low materialism* (2.79). At zero-order correlations, ethnocentricity was observed to be significantly related to *openness* ($r=0.417$, $p<0.01$), *cultural conservatism* ($r = 0.296$, $p<0.01$), *fatalism* ($r = 0.259$, $p<0.05$), *and materialism* ($r = 0.355$, $p<0.01$).

Table 2 below shows the values after the calculation of path coefficients. The values In the last row shows the standard fit criterion as basis for determining the best fit model.

Table 2. **Results of the Calculation of Overall Model Fit Indices of the Hypothesized Models**

Models	x^2								RMSEA
	value	*df*	*prob*	*NFI*	*GFI*	*CFI*	*AGFI*	*RMR*	
Hypothesized Model 1	149.729	6	0.000	.468	.814	.471	.534	.050	.300
Hypothesized Model 2	.120	1	0.729	.999	.999	.999	.997	.001	.000
Standard Fit Criterion	*Not Signficant; Ratio of X^2 to df ≤ 2*			*≥ .95*	*≥ .95*	*≥ .95*	*≥ .95*	*Nearing zero*	*<.06*

Proposed hypothesized model 1 was a poor fit, considering that the X^2 was highly significant implying that the hypothesized model does not fit the sample and so with the other measures that were less than 0.9. RMSEA at .300 was also found to be not significant. Thus, hypothesized model 1 is not acceptable,

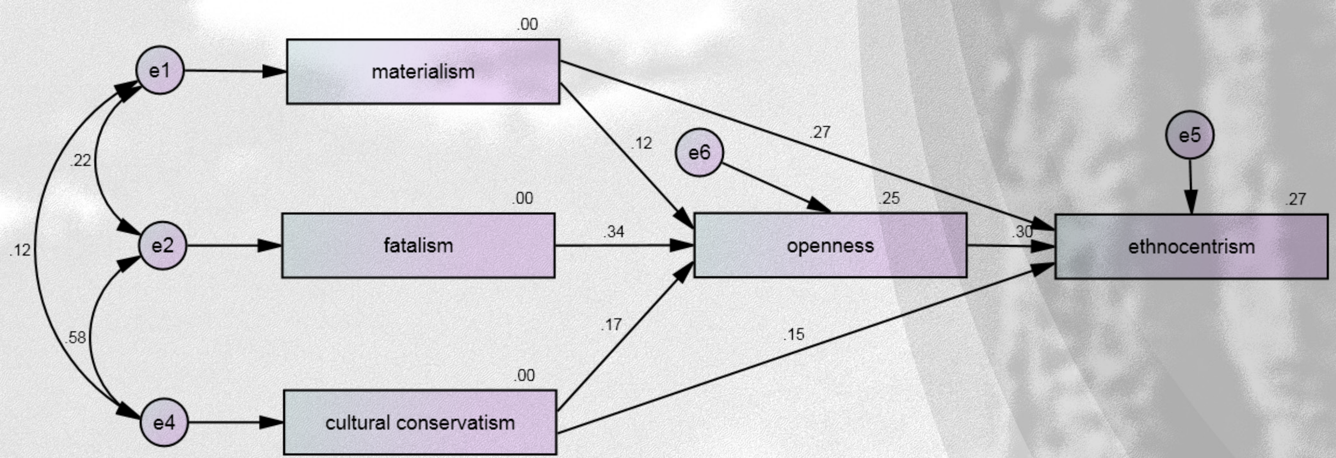

Figure 1. **Hypothesized Model 2: The Best Fit Model**

Figure 1 shows the path coefficients in the diagram representing the best fit model. Fatalism and openness to diversity are endogenous variables or caused variables. Materialism, fatalism, and cultural conservatism are the exogenous variables or the independent variables. From the figure, openness is both a cause and an effect variable shown to influence ethnocentrism but an effect of fatalism. The path coefficients of materialism and ethnocentrism (0.27, p=0.00), cultural conservatism and ethnocentrism (0.15, p=0.01); openness and ethnocentrism is (0.30, p=0.00) disclose the effects of the independent variables on ethnocentrism. Fatalism influenced openness (0.34, 0.03).

Additionally, R2 values show that 25% of the changes in openness could be explained by materialism, fatalism, and cultural conservatism as shown by the equation: openness = 0.34 fatalism + 0.12 materialism + 0.17cultural conservatism. The figure further discloses that 27% of the variations of ethnocentrism could be attributed to openness, materialism, and cultural conservatism. The *structural equation: ethnocentrism= 0.30openness+0.27materialism+0.15 cultural conservatism* explains this condition. The model reveals that among the independent variables, ethnocentrism is greatly influenced by openness followed by *materialism* and supported by *fatalism and cultural conservatism*. The model also indicates that the higher the students' *openness, materialism and cultural conservatism*, the greater are their tendencies to ethnocentrism. It further shows that openness mediates the effect of fatalism on ethnocentrism.

Ethnocentrism is caused by materialism, cultural conservatism, fatalism and openness to diversity and challenges. The results show that openness mediates the effect of materialism, fatalism and cultural conservatism on ethnocentrism, in that the higher the degree of materialism, openness and cultural conservatism, the greater the ethnocentric tendencies of the students. Findings of this study confirm that openness, materialism, and cultural conservatism are predictors of students' ethnocentrism. Students' openness was likewise observed to have greatly influenced ethnocentrism positively in that the greater the openness of the students, the higher their ethnocentrism becomes. It also mediated the effects of fatalism on ethnocentrism. Openness lessened the impact of fatalism seen as positively complementing ethnocentrism. Caligiuri, Jacobs and Farr (2000) asserted that openness as a personality characteristic can ultimately help facilitate the acceptance of cultural diversity and that individuals higher in openness will have less rigid views of right and wrong, what is appropriate and inappropriate. This study proves otherwise and implies that students could less accept of cultural diversity when they have a higher degree of ethnocentrism. While Shankarmahesh (2006) discussed studies that found negative relationship between cultural openness and consumer ethnocentrism (Shimp and Sharma, 1987; Howard, 1989), the findings were challenged and it was said that it is rather simplistic to generalize that cross-cultural experiences and familiarity with other cultures will lessen ethnocentric tendencies in general.

It is inferred that students may have seen nothing immoral in being extremely concern of the country's economy in the context of patronizing domestic products while being opened to discussions with people having diverse culture, which may not necessarily make them or influence them to think or do like other cultures. Although Shankarmesh used cultural diversity openness, the items in the scale of this study indicated cultural diversity such as "I enjoy having discussions with people whose ideas and values are different from my own," "Contact with individuals whose background (e.g. race, national origin, sexual orientation) is different from my own is an essential part of my education" and "Learning about people from different culture is a very important part of my college life."

Similar to openness, materialism influences consumer behavior specifically ethnocentrism. Materialism contributes to ethnocentrism positively in terms of "one values what one possesses." Josiassen, Assaf, and Karpen (2011) after analyzing several studies concluded that the more ethnocentric consumers, the more materialistic they become (Olsen et al., 1993). This affirms the study's stance that the 'possessiveness' aspect of materialism contributes more to ethnocentrism positively in the context of "one values what one possesses" premise. It further inferred that patronizing one's domestic products and valuing one's country's economy are something very important to students.

Further path analysis shows cultural conservatism having positive bearing on ethnocentrism and being a covariance of fatalism. Students in this present study tend to be conservative consumers and possess high ethnocentric tendencies towards their local products. This is also supported by the studies of Al Ganideh and Zaytoonah (2011). The nature of their responses to cultural conservatism and fatalism leans more on the students' religious element and traditional values, which might have influenced their responses opting to be more loyal to the country's products. Although one of the two university-samples is non-sectarian, the religious tradition of the founders has been kept alive in the various practices of the university. Students expressed highest agreement on the items 'I believe that our country needs to return to more traditional values when it comes to issues like marriage, family and sex" and "My religion gives me a great deal of guidance in my day-to-day living." The students' high possessiveness (materialism) and protectionism are believed to influence ethnocentrism.

There are serious and practical implications that can be drawn from the study beyond the theoretical implications that the socio-cultural variables influence ethnocentrism. First, moderate ethnocentrism (mean =

3.03) implies that students' tendency to swing from high ethnocentrism at one time to low at another time reveals ambivalence. This was seen on their highest agreement on the items that "It is best to purchase domestically made products because it helps the country's economy" and "Only those products that are not available in the country should be imported" and their high disagreement on the items "Foreigners should not be allowed to put their goods in the local market because this hurts the economy and puts people out of work." Most people are ethnocentric at one point and may manifest another behavior according to how people best relate to their own cultures; individuals are mostly unaware though of their own ethnocentric tendencies (Weinstein, 2013; Barger, 2008; Cunningham, Nezlek, & Banaji, 2004).

The positive causal path of materialism, openness, and cultural conservatism to ethnocentrism calls for the consistent management of these variables to ensure the readiness of students for global interdependence. Studies recognized that students' ethnocentrism is part of human nature just as the other socio-cultural variables: materialism, openness, fatalism, and cultural conservatism. These attitudes and behaviors can become major obstructions in students' career in global context if their interplay is not fully understood.

Conclusion

Students' moderate ethnocentrism is desirable but the positive influences of socio-cultural variables such as materialism, openness, and cultural conservatism on ethnocentrism can become imminent threats to their readiness for ASEAN 2015. Ethnocentric attitude including the behaviors that influence it has to be toned down if students are to cope in an increasingly interdependent world. If college students are to be successful in today's multicultural business world, they need to understand the dynamics of ethnocentrism and cultivate "a culturally sensitive frame of reference and mode of operation" according to Weinstein (2013) citing (Scott, 1998 and Rosado, 1994). The findings of this study compel universities to review their curriculum and pay attention to the approaches and outcomes that define students' preparedness for interdependence other than the professional competencies expected of them.

Thus, it is imperative for universities to institutionalize efforts to deepen students' self-awareness of one's ethnocentric tendency for them to be equipped with the appropriate knowledge, attitude, and the means to address ethnocentric issues to facilitate workplace success and integration into this socio-economic interdependence of nations. Helping students recognize the interplay of materialism, openness and cultural conservatism to ethnocentrism prepares them for better quality of life.

Together with the core values of the institution, the dynamics of ethnocentrism with materialism, openness and cultural conservatism should be integrated into the institutions' curriculum maps, syllabus, and learning guides for business management students. Such conscious effort should be well implemented through classrooms and non-classroom programs and be seriously monitored to ensure that students are fully prepared students for life and for their entry to global economic interdependence.

REFERENCES

Abad, R. G. (1995). Filipino religiosity: Some international comparisons. Philippine Studies Ateneo de Manila University , 43 (2), 195-212.

ASEAN Secretariat, ASEAN Economic Community Blueprint (2008). Retrieved from http://www.asean.org/archive/5187-10.pdf

Al Ganideh, Saeb Farhan, El Refae, Ghaleb, Al Omari, Maher. Antecedents to consumer ethnocentrism: A fuzzy logic-based analysis study. Journal of Administrative Sciences and technology, 2012 (2012) article ID 693619, 14 pages

Altintas, M., Tokol, T. (2007). Cultural openness and consumer ethnocentrism: An empirical analysis of Turkish consumers. Marketing Intelligence & Planning, 25 (4), 308-325

Bowman, N. (2014). Conceptualizing openness to diversity and challenge: Its relation to college experiences, achievement, and retention. Innovative Higher Education, 39 (4), 277-291

Caligiuria, P., Jacobsb, R., Farr, J. (2000). The attitudinal and behavioral openness scale: Scale development and construct validation. International Journal of Intercultural Relations, 24 (1) 27 46

Cameron, J., Kocum, L., Berry, J. (2012) Security, ethnocentrism and attitude toward globalization: An international test of the multiculturalism hypothesis. Paper presented at the annual meeting of the ISPP 35th Annual Scientific Meeting, Mart Plaza Chicago

Cleveland, M., Papadopoulos, N., Laroche, M. (2009). Cosmopolitanism, consumer ethnocentrism and materialism: An eight-country study of antecedents and outcomes. Journal of International Marketing, 17 (1), 116-146

Gupta, N. (2011). Globalization does lead to change in consumer behavior: An empirical evidence of impact of globalization on changing materialistic values in Indian consumers and its aftereffects. Asia Pacific Journal of Marketing and Logistics, 23 (3), 251-269

Gupta, N. (2012) The impact of globalization on consumer acculturation: A study of urban, educated, middle class Indian consumers. Asia Pacific Journal of Marketing and Logistics, 24 (1), 41-58

Kayabasi, A. and Demireli, C. (2013). A comparative analysis of consumer ethnocentrism tendencies: An empirical study of Turkish and Azerbaijani university students. International Journal of Marketing and Technology 3, (7), 155-181.

Kamarrudin, A., Mokhlis, S., Othman, M. (2002). Ethnocentrism orientation and choice decisions of Malaysian consumers: The effects of socio- cultural and demographic factors. Asia Pacific Review 7 (4), 555-574

Karpen, J. A. (2011). Consumer ethnocentrism and willingness to buy: Analyzing the role of three demographic consumer characteristics. International Marketing Review, 28 (6), 627-646

Riguer, M. (2012). ASEAN 2015: Implications of people mobility and services. Working Paper Series 2012. Institute of Labor Studies retrieved from http://ilsdole.gov.ph/wp-content/uploads/2013/01/Riguer-ASEAN-2015-Implications-of-People-Mobility-and-Services.pdf

S Tamer Cavusgil (ed). (1993). Internationalizing Business. Michigan: Michigan State University Press.

Shankarmahesh, M. (2006) Consumer ethnocentrism: An integrative review of its antecedents and consequences. International Marketing Review, 23 (2), 146-172

Sharma, S., Shimp, T., Shin, J. (1995). Consumer ethnocentrism: A test of antecedents and moderators. Journal of the Academy of Marketing Science, 23, 26-37

Shimp, T.A., Samiee, S., & Madden, T.J. (1993). Countries and their products: A cognitive structure perspective. Journal of the Academy of Marketing Science, 21 (4), 323-330

Solomon, R. (2003). On fate and fatalism. Philosophy East and West, 53 (4), 435-454

Tomkiewicz, J., Bass, K., Gribble, A. (2011). Potential pitfalls of ethnocentrisms in a globalizing world. College Street Journal 45.2 , 369-375

Turkum, A. (2006). Are fatalism and optimism an obstacle to developing self-protecting behavior? Study with Turkish sample. Social Behavior and Personality: An International Journal, 34 (1)

United Nations, General Assembly, Globalization and interdependence: role of the United Nations in promoting development in the context of globalization and interdependence: report of the Secretary-General, A/64/310 (2009), Retrieved from http://www.un.org/Docs/journal/asp/ws.asp?m=A/64/310

United Nations, General Assembly, Globalization and interdependence: sustained, inclusive and equitable economic growth for a fair and more equitable globalization for all, including job creation: report of the Secretary-General, A/66/223 (2011), Retrieved from http://www.un.org/Docs/journal/asp/ws.asp?m=A/66/223

Weinstein, D. (2013). Exploring ethnocentrism in business courses and businesses. Business and Management Research, 2 (3), 120-136.

Wildman, J. (2011) Cultural differences in forgiveness: fatalism, trust, violations, and trust repair efforts in interpersonal collaboration (Dissertation). Florida: University of Central Florida

Yeniyurt, S., Townsend, J. (2003). Does culture explain acceptance of new products in a country? An empirical investigation. International Marketing Review, 20 (4), 377-396

Zumbrunnen, J., Gangl, A.(2008). Conflict, fusion, or coexistence? The complexity of contemporary American conservatism. Political Behavior, 30 (2), 191-221

Social Development and Operational Frameworks for Philippine Higher Educational Institutions Towards Poverty Reduction[1]

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ABSTRACT

This paper briefly presents global and local poverty incidence, its causes and specific actions being done to address it in the context of globalization, as well as the importance of education, particularly that of the higher educational institutions (HEIs) towards poverty reduction. Such goal is included as one of the ASEAN Economic Community (AEC) thrusts in narrowing the development gap and accelerating economic integration through human resource development among others.

In the above context, this paper primarily focuses on globalization and the Philippine Development Plan 2011-2016, solely in relation to education since they encompass a lot of major components. By looking into these two aspects and its link, including the global frameworks for poverty reduction, this paper proposes new social development and operational frameworks for the same purpose that may specifically be forged and applied to State Universities and Colleges (SUCs) in the Bicol Region, being tagged now as the poorest region in the Philippines. Since such frameworks have not yet been utilized for the evaluation of SUCs, this paper is only delimited to the presentation of such frameworks, and the global and local contexts wherein they are derived. Hence, actual data on the SUCs' evaluation and its methodology may not yet be presented. However, it is hoped that such frameworks, which are culled through a review of related literatures, will be used in the near future in the evaluation of SUCs vis-à-vis poverty reduction efforts, and thereby promote social development.

Key words: **Challenges of Globalization, Incidence and Causes of Poverty, Social Development Framework, Higher Education, Poverty Reduction**

Introduction and Background of the Study

Poverty Incidence and Its Causes. The World Bank (2014) records tell us a promising success of economic growth in developing countries. However, it is still a chagrin fact that poverty still haunts some of the regions in the world. The current percentage of population per region that falls under poverty tells us that Sub-Saharan Africa (48.5%) still remains on top, followed by South Asia with 31.0% (World Bank, 2014). And among the members of

South Asia, particularly the 10 Association of Southeast Asian Nations (ASEAN), four of them have recorded certain percentage of poor population. In particular order, Indonesia ranks first (20.4%), followed by Cambodia (18.6%), the Philippines (18.4%), and Thailand (0.4%) for the year 2009 (World Bank, 2014).

The primary causes of the African exceptionalism are as follows: geopolitics (focusing on heritage of colonialism) (Kates and Dasgupta, 2007), poor governance (Hyden, 2007), as well as failure of international governance providing sufficient public sector investment and aid to make global markets accessible in the era of globalization, geographic causation (Owki, Ndeng'e, Kristjanson, Arunga, Notenbaert, et al., 2007) or environmental determinism (Landes as cited in Peet and Hartwick, 2009), poverty trap - in which poverty itself, hunger and disease, rapid population growth, environmental degradation and poor governance are all mutually reinforcing (Sanchez, Palm, Sachs, Denning, Flor, et al., 2007; Mabogunje, 2007; Sachs, 2005), insufficient efforts of civil society institutions (Mabogunje, 2007), and lack of economic growth (Collier, 2007). For Sachs (2005), factors such as failure of governance, lack of innovation and lack of six major kinds of capital – such as human capital, business capital, infrastructure, natural capital, public institutional capital that underpins peaceful and prosperous division of labor, and knowledge capital that raises productivity and promotes physical and natural capital - contribute more to the prevalence of poverty (Peet and Hartwick, 2009, pp.135-136).

In general, being in a globalized world, the above contexts cannot be solely experienced in the Sub-Saharan Africa. They could also be said in the South Asia Region, particularly in the Philippines, having ranked third with percentage of poor population as per WB data (2009-2010). Such status is upheld by Millennium Development Goals (MDGs) with its number one goal, i.e. eradication of extreme poverty and hunger, for the said region. Such goal is also the overarching expected outcome, i.e. inclusive growth and poverty reduction, of the Philippine Development Plan (PDP) for 2011-2016.

Sharing the same fate of being poor in particular is the Philippines' Region V, i.e. Bicol.[2] While it ranked 6th as having the highest poverty incidence among families all throughout the country with 32.3% rating (National Statistical Coordination Board, 2012), recent data from the National Economic and Development Authority (NEDA) tells us otherwise. Eduarte (2014) and Calleja (2014) reported separately, but unanimously, that the Bicol Region is the nation's top poorest region in the country, according to NEDA, due to its highest percentage share of poor population, i.e. 2.3 million or 9.9% of the country's 23.8 million poor population in 2013, from among the 17 regions in the country – which means that about one of 10 poor people in the country comes from Bicol (Calleja, 2014). Factors causing such incidence in the Region include unemployment (Calleja, 2014), insurgency problem, high power rates, and lack of industries or the need for more investments to create jobs in the region (Eduarte, 2014). In relation to the globally identified factors, they all boil down to lack of economic growth and poor governance.

Institutional Responses to Poverty. Different government and non-governmental agencies had forged various coalitions to combat poverty incidence. Some of these are the institutionalization of the Organization for Economic Co-operation and Development (OECD), with its mission to improve the economic and social well-being of people around the world, the traditional power quad – the US, EU, Japan and Canada, BRICS (Brazil, Russia, India, China and South Africa), IMF-WB, the Group of 20, the Basel-based Financial Stability Board (Lobe, 2013), Asian Development Bank (ADB), and alike. However, they 'fall short on poverty reduction' (Lobe, 2013) and 'leave the poor gasping' (Perera, 2013) by not letting the middle-income and poorer countries like some members of the Association of Southeast Asian Nations (ASEAN) - Brunei, Myanmar or Burma, Cambodia, Indonesia, Laos, Malaysia, the Philippines, Singapore, Thailand and Vietnam, and the SAARC – Afghanistan, Bangladesh, Bhutan, India, Maldives, Nepal, Pakistan and Sri Lanka (Deen, 2013), to get into the super powerful trading agreements, and for their voices to be heard in fora governing global finance respectively (Perera, 2013; Lobe, 2013). Hence, other countries are either left making their own, espousing foreign frameworks, or forging their own coalitions like, the New Rules for Global Financial Coalition (Lobe, 2013), the MDGs, ASEAN Economic Community (AEC) 2015, ASEAN Regional Economic Integration – composed of the 10 ASEAN Countries plus the eight members of the SAARC (Deen, 2013), and the Philippine Development Plan (PDP) 2011-2016 to address the said challenges.

Operational Frameworks on Poverty. With the above scenario, Sachs (2005) proposes an 'operational plan' whereby the UN, governments, and civil societies – a kind of tripartite cooperation or coordination3 – should all participate to fulfill the MDGs that targets eradication of extreme poverty and hunger, among others, by 2015. He maintains that breaking the poverty trap involves donor-based investments that would raise the level of capital per person high enough to sufficiently meet basic needs. Without outside donor funds, the necessary investments simply cannot be financed. Ending global poverty by 2025 requires a global compact between rich and poor countries, as with the UN Millennium Project, whereby the rich countries follow through on their previous pledge to provide 0.7% of GNP as aid or official development assistance (ODA), as being administered by the OECD. His proposal is quite consistent with the OECD's operational framework (see figure 1), or the interplay of various stakeholders, that is, working with governments, businesses and labor, and civil society organizations in the name of shared commitment to market economies backed by democratic institutions and to the wellbeing of all citizens (OECD, n.d.).

(a) Sach' **(b) IMF-WB**

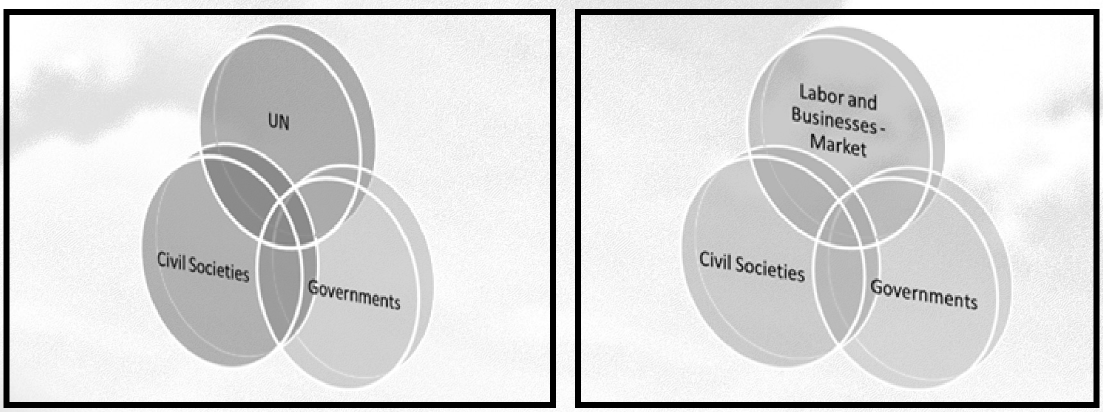


Figure 1: **(a) Sach's and (b) IMF-WB's OECD Operational Frameworks**

Similarly, Sachs and OECD's operational framework is also being used by the ASEAN and SAARC, i.e. convergence of government agencies, private sector, and corporate and small and medium enterprises (Torres, 2014, March 23), in its aim to strengthen 'regional economic integration' by 2020 for SAARC, and 2015 for the ASEAN. This move of the ASEAN and SAARC countries gets an approval from the UN Under-Secretary-General and Executive Secretary of the Economic and Social Commission for Asia and the Pacific (ESCAP), Dr. Noeleen Heyzer, by stating that 'regional solutions, through regional cooperation, can be the way for us to forge more sustainable economic growth, close development gaps, and help lift tens of millions of people still in poverty' (Deen, 2013).

Importance of Education in Poverty Reduction. Amidst the above specific actions on poverty, Kates and Dasgaputa (2007), Mabogunje (2007), Bio (2012), and even the AEC Secretariat (2011) collectively agree on the importance of education as a way out of poverty. Kates and Dasgupta (2007) specifically stresses that 'education and science are also seen as a mechanism to escape the poverty trap'. Likewise, Mabogunje (2007) argues that 'increased national and international aid in the form of credit funds should be made available and that national efforts should continue to improve the capability of poor people through education'. Bio (2012), in addition, would assert that West African political leaders must understand that they have a duty to promote good governance, 'clean' elections, and human progress by investing in education and healthcare as means of increasing their countries' human capital base and also reducing income inequality. To address these concerns, however, education must be first entailed to face the challenges of globalization, as discussed below.

Globalization and Higher Educational Institutions (HEIs)

When we talk about globalization, Mishra (1999) considers it as a process that which includes national economies becoming more open thus more subject to supranational economic influences and less amenable to national control. It is about turning the whole world into a giant market place where national boundaries mean, or should mean little. In general, the said processes are referred to as 'the action at a distance, time space compression, and shrinking world' (Held, 2000). And it does not only bring us economic transformation, but also political, technological and cultural changes (Giddens, 1999). In other words, it has multiple and overlapping consequences (Urry, 1998). Having stated the said definitions, 'change, globalization and development' in this paper will be used interchangeably since the changes, which the aforesaid authors are referring to, are similar to the characteristics of development - 'economic, social, and cultural progress, including finer ethical ideals and higher moral values' (Peet & Hartwick, 2009, p. 3).

Challenges of Globalization to HEIs. There are more than 900 studies and 47 articles and book reviews on higher education and globalization. This is an indication that globalization, indeed, seriously affects the domain of HEIs. The commonalities in such collections of literature can be summarized in three specific issues or challenges of globalization to higher education – that truly highlights the need or importance of considering international and political dimensions in any social development thrusts. They are as follows:

1. The rapid increase in market globalization and technological advances leads to an increasing demand for access to tertiary institutions in order to meet the increasing requirement for professionally or technically trained population (Beltran-Villava, 2001; Almarcha-Barbado, 2001).

The number of students in higher education in the world increased from 51 million in 1980 to about 82 million in 1995. In some 20 countries, the number of students enrolled in HEIs exceeds one million. Of these 20 countries, at least half are in developing countries, mostly in Asia and South America. In other words, globalization and its explicit demand for global competitiveness and flexibility (Mishra, 1999) serve as a main driving force for such increase of students in HEIs. Hence, it could be said that HEIs truly play a part in the formation of a globally competitive and flexible population in big numbers. However, in order to make their students more 'globally competent learner(s)' (Zesotarski, 2001, ERIC Review), HEIs must face the next challenge.

2. Globalization also challenges HEIs 'to create new educational systems that are designed for an era of increasing cultural and economic globalization' (Banathy in Jenlink, 2001), or to meet the demand for the aforementioned population. This is not a simple task to realize.

Realistically, there are several factors that may influence the creation of such system. For one, in the process of creating a new educational system, a cultural or value conflict is likely to occur. This happens when HEIs compete with technically specialized institutions for higher learning while maintaining their over-all goal of a balanced and comprehensive education (Almarcha-Barbado, 2001), or their role as the gatekeeper of the core values of a nation (Smolicz, 1998). To make the matter worst, Levin (in Zeszotarski, 2001) maintains that the ideology of globalization reduces people, ideas, goods and services to mere economic value in the name of global competitiveness, thus lose the scholastic value of education.

Two, HEIs must also consider other domains like economic and information technology, which are important in the creation of new educational systems. In the economic domain, HEIs are being pushed to do more with less and to seek other (private) sources of revenue because of a decrease in state funding and the loss of their primary economic support (Zeszotarski, 2001). In this regard, SUCs are confronted with the growing pressures to adopt an 'entrepreneurial logic' to increase revenue (Gantam and Contreras, 2001) for the advancement of the information domain 'such as email, voice mail, World Wide Web and internet, and computer applications for the management of administrative and instructional activities' (Zeszotarski, 2001).

Lastly, creation of new systems to adjust with the ASEAN integration calls for an overhaul of the entire Philippine educational systems from the basic, secondary to tertiary education. Recently, the basic and secondary educational systems have to be changed into the K-12. Because of this, several implications have to be noted: (1) HEIs have to change their educational programs comes 2016, since some of the basic courses offered in the first two years of university life of students will be studied in Grades 11 to 12; (2) some, if not most, professors teaching general education courses in SUCs may also be displaced. It is either they may have to retire soon, re-tool, or be possibly employed in the K-12 system, but with same university or professorial salaries, which may be detrimental to the national budget; and (3) policies of the Civil Service Commission (CSC), Commission on Higher Education (CHED), and all SUCs on hiring and promotion based on vertically articulated degrees of the faculty members may also be affected just in case they will opt to re-tool.

3. State institutions are also forced to adopt an international standard (Room, 2000) in the process. While this might yield positive results like upgrading the educational standards, it exerts a downward pressure on local policy choices (Mishra, 1999), although it is still unclear as to how far policy choices are affected by the pressures of globalization and the processes of international standards-setting (Room, 2000).

Aside from budget constraints, another factor that has to be considered is the issue on who will set the international standard, and who would handle its actual implementation. This is considered problematic, considering the fact that globalization and international standard-setting are viewed as political processes (Room, 2000). It would be arduous for all HEIs to accept one international standard and ruling even within HEIs themselves. Neither would the so-called best universities in the world would acquiesce to the idea, without losing their upheld values, standards, and cultural identity or prestige. There is always a competition for the top 10 rungs of the academic ladder as revealed by surveys on the best universities in the world.

The next section generally presents the main components of the 2011-2016 Philippine Development Plan, specifically its social development thrusts in relation to HEIs.

The Philippine Development Plan (PDP) 2011-2016

The PDP as forged by Philippine Government thru the National Economic and Development Authority (2011) has a lot of components. It has the following nine (9) main goals from 2011 until 2016: (1) macroeconomy, (2) competitive Industry and services sectors, (3) competitive and sustainable agriculture and fisheries sectors, (4) accelerating infrastructure development, (5) towards a dynamic and resilient financial system, (6) good governance and the rule of law, (7) social development, (8) peace and security, and (9) conservation, protection, and rehabilitation of environment and natural resources. In this study, the general provisions included in the social development component of the said plan, as well as the specific elements contained in the education component will be given more emphasis because of its utmost relevance to the topic at hand.

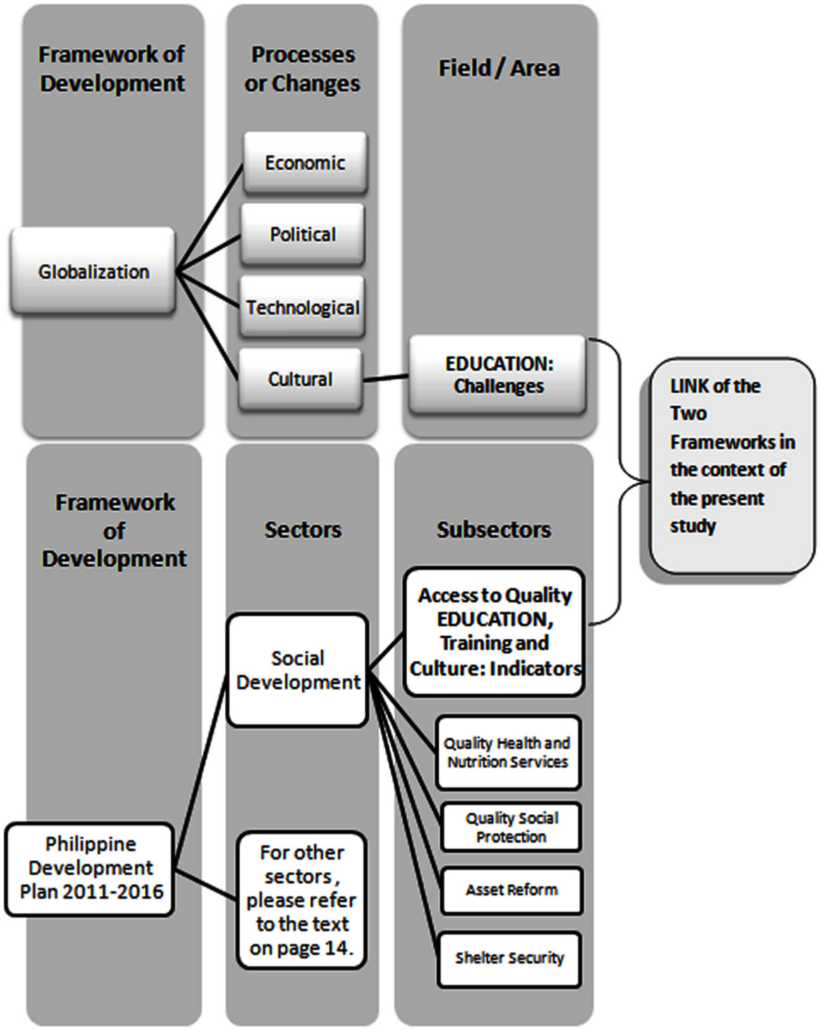
As far as social development is concerned, the said plan has the following components or sub-sectors, as already mentioned in the introduction: (a) access to quality health and nutrition services, (b) access to shelter security, (c) access to quality social protection, (d) access to asset reform, and last but not the least, (e) access to quality education, training and culture.

With regard to access to quality education, training and culture sub-sector, especially in the higher education, there should be an increase in the following elements or indicators: (1) enrollees, (2) graduates, (3) faculty with Master's degrees, (4) faculty with Doctorate degree , (5) accredited programs, (6) graduates of Expanded Tertiary Accreditation and Equivalency Program (ETEEAP), (7) beneficiaries of Student Financial Assistance Program (STUFAP), (8) ladderized education program (LEP), (9) national passing percentage in licensure examinations. These indicators will also be used in this study in assessing the HEIs in the region as to whether or not they are contributing to the social development goals of the region in particular and of the country in general.

Globalization and Philippine Social Development Thrusts' Fusion: A Proposed Social or Higher Education Development Framework

Based on the aforementioned presentation and discussions of globalization's challenges and implications to HEIs, as well as that of the PDP 2011-2016, it is hoped that a clear connection of the two areas may now be established. As presented above, globalization does not only entail economic changes, but also political and cultural – wherein education plays an important role in society's pattern maintenance. Similarly, the Philippine Plan presents more specifically its thrusts on social development wherein higher education is a major component. In other words, both of them talks about education as part of social changes in our society. This would be clearer if we also make a simple illustration of their connection, which may form part of a new social development framework in relation to HEIs, i.e. when globalization's and Philippine's development indicators in the field of higher education will be taken as one. Please refer to figure 2 for the link of the two development frameworks, i.e. globalization and Philippine Development Plan. General descriptions of the said frameworks had already been given above.

Figure 2: **Link of the Two Development Frameworks**



With the established and illustrated general link between globalization and the PDP, a simple Venn diagram may be given to specifically illustrate the link between them. Please see figure 3. Education becomes their binding element.

As for the particular factors within the education component, globalization has the following sub-elements: there must be (1) an increase in access to tertiary education (PDP pegs it at 16% at least), (2) an increase in educational system without culture or value conflict with the sponsors, with increase in resource base and information technology, and (3) an adoption of international standards without downward pressures on its local policies, more resources in its accreditation application and without politics. Please figure 3a.

As for the PDP, its education has the following sub-elements or indicators: (1) enrollees – the number of enrollees should increase by at least 16% by the end of the PDP, (2) graduates – its number must increase by at least 21%, (3) faculty with Master's degrees – at least 30% of the faculty members should have a master's degree, (4) faculty with Doctorate degree – at least 20% of the faculty members should have a doctorate degree, (5) accredited programs – its programs must at least have 15% accredited ones, (6) graduates of Expanded Tertiary Accreditation and Equivalency Program (ETEEAP) – must have an 300% increase, (7) beneficiaries of Student Financial Assistance Program (STUFAP) – must have at least 5% increase, (8) ladderized education program (LEP) – must have at least 6% increase, (9) national passing percentage in licensure examinations – must have at least 16% increase. These indicators, based on the PDP target results, will also be used in this study in assessing the HEIs in the region as to whether or not they are contributing to the social development goals of the region in particular and of the country in general. Please see figure 3b.

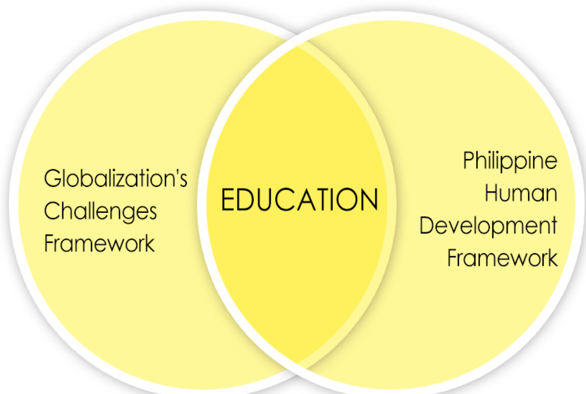


Figure 3: **Proposed New Social Development Framework for Higher Education**

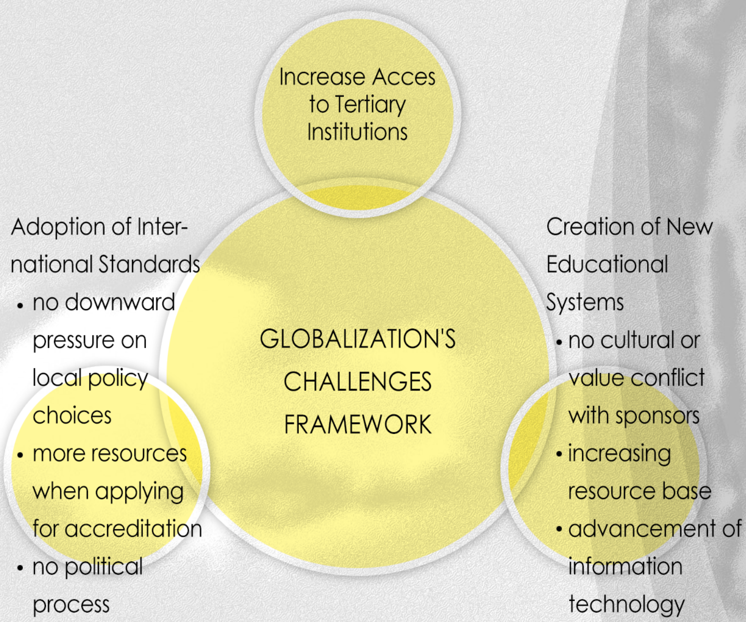


Figure 3a: **Further Illustration and Components of Globalization's Challenges Framework**

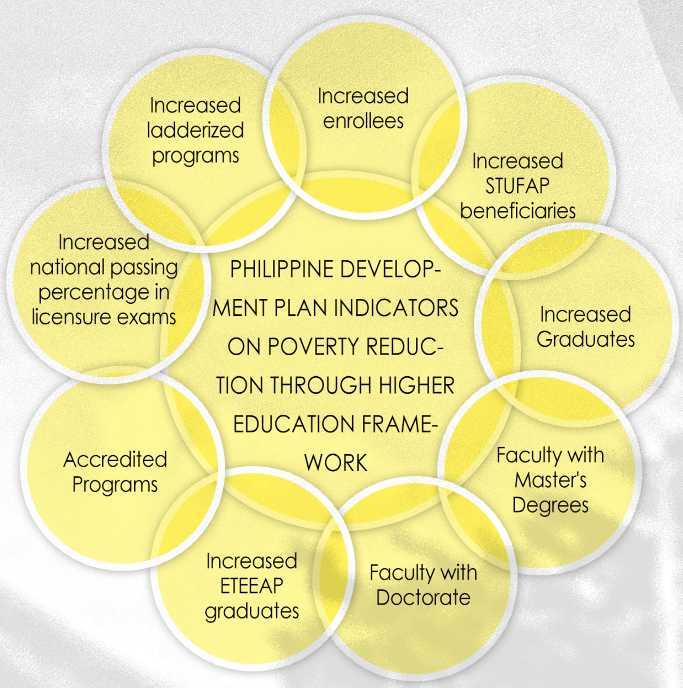


Figure 3b: **Further Illustration and Components of the Philippine Development Plan Indicators on Poverty Reduction Through Higher Education Framework**

Further Discussions, Analyses and Conclusion

With the above presentation on the causes of poverty its proposed solutions and link to globalization and higher education, it could be said that poverty reduction is indeed a complex task, which requires complex solutions. This has been proven by various causes and solutions proposed by different governments and non-government organizations.

Much had been said about the topics at hand. I would just like to focus on few more things, like Landes' (1998) geoeconomic or geopolitical ideas and determinism, Sachs' (2005) and OECD's (n.d.) operational framework or donor-based investments and IMF-WB debt relief on poverty reduction, the MDGs and ASEAN goals, the role of the civil societies, and the importance of education as one of the keys to poverty eradication.

As regards Landes' (1998) and Sachs' (2005) geoeconomic and environmental determinism, it could not always be argued that environment will always be the determining factor why there are poor people. This had been refuted by the cases of Switzerland, Saudi Arabia, Singapore and north of England, which have all environmental constraints but proved otherwise (Peet and Hartwick, 2009, p. 135).

OECD and Sachs' (2005) donor-based investments and IMF-WB debt relief initiative towards poverty reduction seems to be flawed as well. While it positively aims to eradicate poverty through donations, such solution poses two critical concerns: economic and ethical criticisms (Peet and Hartwick (2009). For the economic aspect, Peet and Hartwick (2009, p. 138) say it all:

> Under all existing aid and debt relief schemes, to get their money poor countries have to agree to open their markets to foreign competition, privatize public enterprises, withdraw the state from service provision, reduce state budgetary deficits, reorient their economies toward exports, add "flexibility' to their labor markets, and so on. ... Supplicant countries have to restructure their economies neoliberally ('maintain sound macroenomic policies') so that they reward foreign investment.

For the ethical aspect, I wallow in pain reading Peet and Hartwick's (2009) commentary. They say it truthfully but painfully as well (Peet and Hartwick, 2009, p. 138):

> After reading an argument on the supposed benefits of foreign aid, all the while assuming that the aim is to make people healthier for their own sake, we are told that the rich countries should invest in poor countries for the sake of their own security, to prevent failed states, to prevent the poor from becoming terrorists!

It is with the above two major criticisms that made me further adhere to the radical causation of poverty, that is, 'poverty results from extreme inequalities. Poor people are poor because rich people take so much of the income (financial wealth, such as bank accounts, bonds, stocks, life insurance and mutual funds) the economy produces' (Peet and Hartwick, 2009, p. 8).

As regards the MDGs, I am one with Akyuz (2014), Chief Economist of the South Centre, who asserts that MDGs cannot be achieved by 2015 in response to poverty reduction. 'It is not possible to reach an international agreement on all important dimensions of economic and social development and environmental protection... (because) development targets would naturally be selective, leaving out many dimensions to which several countries may attach particular importance,' he says. As such, the World Bank and its new partners, the Youth Network and the

Global Poverty Project, is leading the special call for action to end poverty by 2030 (World Bank, 2014).

Similarly, the thrust of the ASEAN and SAARC for an economic integration comes 2015 towards similar concern with the MDGs is likewise unattainable with such a very close timeline. We really have to be realistic that there are still a lot to be done to realize its objectives, and more time is needed, as Menon (in Torres, 2014), an ADB lead economist at the Office of Regional Economic Integration, maintains. These include, among others, (1) removing barriers to trade in sensitive areas such as agriculture, steel and the increasingly important areas of services; (2) removing border barriers such as quantitative restrictions, border administration, and even closures; (3) removing behind-the-border constraints related to logistics, transport, infrastructure bottlenecks, and weak institutions; (4) promoting greater labor mobility of skilled workers and better regulation and management of unskilled labor movements; and (5) narrowing the development divide, that is, ensure that the less developed economies of Cambodia, Lao PDR and Myanmar catch up more rapidly to other economies in the region.

These are 'gigantic tasks' to be done, and barely six months to go will not be practically enough. Nevertheless, SAARC Secretary-General Ahmed Saleem emphasizes that 'regional cooperation is important because in a globalizing world, regional integration is being increasingly considered as building blocks in the progress towards globalization, especially from the point of view of trade and commerce' (Deen, 2013).

On the role of civil societies in poverty reduction, the following, among others, can be critically said (Connolly, 2007, pp. 13, 15-16): (1) their advocacy role, which is the key element and promoter of democracy, may be weakened; (2) working for aid harmonization and effectiveness in the context of the international declarations like the 2005 Paris Declaration on Aid Effectiveness assumes that CSOs should work within the framework of these plans to central government or donors in delivering the plan. This again weakens the idea of diverse and independent civil society; and lastly, (3) while dealing with conflict is a necessary precondition for development, the aid given to CSOs may be shifted to the focus of aid from the poorest countries to areas that are of strategic interest to major donors, just like in the case of debt write-off in Iraq alone in 2005, which was $14 billion – over 13% of global ODA. Iraq, together with Afghanistan, Pakistan, Egypt and Indonesia, topped the list of recipient for ODA wherein major OECD states have security interests.

The first and the last critiques are never far from the Philippine reality. It is a general knowledge in the country that the PDAP funds had been greatly misused by some high ranking officials in the country in cahoots with CSOs. It would have been better if the millions, if not billions of pesos, that they inappropriately spent was used to finance more basic and other social services for the Filipino people like that of higher education. It could have resulted to more human capital needed in the context of globalization, and thereby possibly reduced poverty incidence in the country.

Having said all of the above as background for higher education thrust towards poverty reduction, and with the complexities of the issues at hand, this paper hopes to emphasize the need to go basic, the need to start once again from simple steps – to education, which could lead to great things – like the emancipation of the poor regions in the world in general, and the Philippines and the Bicol Region in particular from extreme poverty as envisioned by the United Nations.

Facing such complexities would never be considered as an easy task. In this context, espousing the proposed new social development (see Figures 3, 3a, and 3b) framework towards poverty reduction for HEIs may be of help. It may be a bit easier to achieve such goal, if such development framework is espoused with the Sachs' operational framework together with the following considerations in mind: (a) incorporation of selfless interests from the stakeholders or donors, (b) businesses learning from the community development models and integrating them into their corporate social initiative programs (Hudtohan, 2014), (c) 'global solidarity and responsibility' as echoed by

Nobel Peace Prize Awardee, Betty Williams, and (d) 'global citizenship' as espoused by Daisaku Ikeda, a Buddhist thinker, who, in a peace forum at the UN Headquarters on February 20, 2014, repeatedly stressed the importance of fostering an awareness of our role and responsibility as global citizens, and the necessity for such awareness to be achieved through a brand new program of education that deepens understanding of challenges facing humankind and promotes a shared pledge among all people 'not to seek one's happiness and prosperity at the expense of others' (Le, 2014). As such, a new operational framework may be forged. Please see figure 4 for further illustration.

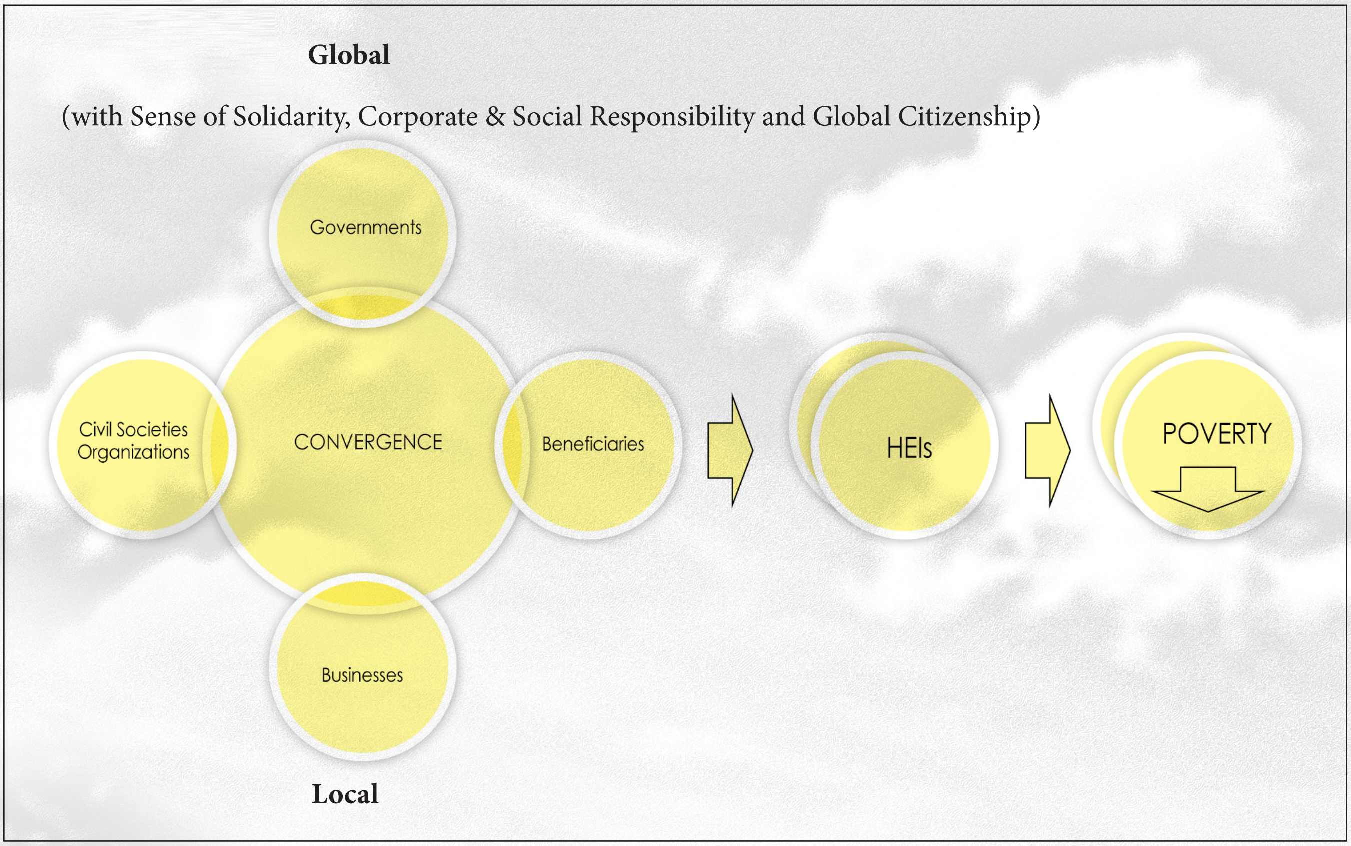


Figure 4: **New Proposed Poverty Reduction Operational Framework for HEIs**

With the above convergence or collaboration of several stakeholders, together with real and personal efforts from the beneficiaries themselves to better off their lives without necessarily begging or waiting for donations from donors, CSOs, and governments whether global or local, the said challenges of HEIs in particular, and that of governments in general towards poverty alleviation will soon be realized. This would mean HEIs should transcend beyond the realm of its traditional manifest and latent functions, or educational imperatives.

Endnote

[1]This paper is a huge part of my 2014-2015 dissertation writing entitled the State Universities and Colleges (SUCS) in Region V, Philippines: its status and prospects vis-à-vis globalization and social development thrusts on poverty reduction under the PhD in Social Development Program at the Philippine Women's University, Manila, Philippines. The proposed social development and operational frameworks, which are culled from review of related literatures, will be used to evaluate the status of SUCs in relation to the above concern and eventually complete the dissertation writing. The evaluation has not been done yet, hence, only such frameworks are presented in this paper.

[2] Based on the 2012 data of the National Statistical Coordination Board (NSCB, 2012), Bicol Region ranks 6th as the poorest region in the Philippines following Autonomous Region for Muslim Mindanao - 48.7%, Regions VIII or Eastern Visayas - 37.4%, XII or SOCCSKSARGEN – 37.1%, IX or Zamboanga Peninsula – 33.7%, and X or Northern Mindanao – 32.8%.

[3]The Philippines is likewise employing the help of civil societies through the Partnership for Development Assistance in the Philippines, Inc. (PDAP) (formerly known as the Philippine Development Assistance Programme, Inc.). It started as 'a consortium of Filipino and Canadian non-government organizations (NGOs), which was founded in 1986 as a non-stock, non-profit organization, to become an effective instrument in reducing poverty and inequity in the Philippines' (PDAP, 2014, April 21). At present, it claims to have 6 member networks with more than 300 community-based members and partner NGOs, and a distinguished character in promoting and developing rural enterprises for poverty reduction.

REFERENCES

A. Books and Articles

Almarcha-Barbado, A. (2001). "The Mission of the University. Higher Education and Competitiveness: The Globalization of the Markets," Revista Espanola de Investigadores-Sociologicas, Vol. 93, Jan-Mar pp 205-220.

Appelrouth, S., and Edles, L. (2012). Classical and Contemporary Sociological Theory (Text and Readings), 2nd ed. USA: Sage.

Beltran-Villalva, M. (2001). "The Bricall Report as Pretext," Revista Espanola de Investigadores Sociologicas, Jan-Mar, pp. 235-242.

Chen, S. and Ravallion, M. (2007, October 17). Absolute Poverty Measures for the Developing World, 1981-2004. Proceedings of the National Academy of Sciences, 104(43), 16757-16762. doi: 10.1073/pnas.0702930104. Also available at http://www.pnas.org/content/104/43/16757.full.pdf+html.

Collier, P. (2007, October 17). Poverty Reduction in Africa. Proceedings of the National Academy of Sciences, 104(43), 16763-16768. doi: 10.1073/pnas.0611702104. Also available at http://www.pnas.org/content/104/43/16763.full?sid=6e74d897-47e9-407c-b718-642f978b4c69.

Dasgupta, P. (2004). World Poverty: Causes and Pathways (A Plenary Lecture delivered at the World Bank's Annual Bank Conference on Development Economics, Bangalore, India 21-22 May 2003). World Bank Conference on Development Economics. Washington, DC: World Bank.

Gantman, F., and Contreras, M. (2001). "Argentine Universities in the Age of the Knowledge Society," Organization, vol. 8 no 2, pp 243-250.

Hayden, G. (2007, October 17). Governance and Poverty Reduction in Africa. Proceedings of the National Academy of Sciences, 104(43), 16751-16756. doi: 10.1073/pnas.0700696104. Also available at http://www.pnas.org/content/104/43/16751.full?sid=71056cef-61a8-4113-ab68-3ec300c3f4a2.

Held, D., and Macgrew A. (Eds.). (2000). The Global Transformation Reader: An Introduction to the Globalization Debate. USA: Blackwell Publishers Ltd.

Hudtohan, E. (2014). Corporate Social Initiatives. ASEAN Economic Community 2015: Opportunities And Threats (Call for Paper), April 29, 2014.

Jenlink, P. (2001). "Designing Educational Systems for the Twenty-First Century," Systems Research and Behavioral Science. Vol. 18, no. 4 p. 283.

Ka Ho Mok (2000). "Impact of Globalization: A Study of Quality Assurance Systems of Higher Education in Hong Kong and Singapore," Comparative Education Review, Vol. 44, no. 2, p 148.

Kates, R., and Dasgupta, P. (2007, October 17). African Poverty: A Grand Challenge for Sustainability Science. Proceedings of the National Academy of Sciences, 104(43), 16747-16750. doi: 10.1073/pnas.0708566104. Also available at http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2040431/.

Mabogunje, A. (2007, October 17). Tackling the African "Poverty Trap": The Ijebu-Ode Experiment. Proceedings of the National Academy of Sciences, 104(43), 16781-16786. doi: 10.1073/pnas.0704765104. Also available at http://www.pnas.org/content/104/43/16781.full?sid=7fd00596-9c65-422c-a52e-2376a45e739d.

McGinn, N. (1996). "Options for Higher Education at the Time of Latin America's Entry into the World Economy," Revista Paraguaya de Socialogia, Vol. 33, no. 95, pp. 7-24.

Mishra, R. (1999). Globalization and the Welfare State. USA: Edward Elgar Publishing, Inc.

National Economic and Development Authority. (2011). Philippine Development Plan 2011-2016 Results Matrices. Pasig City, Philippines: NEDA.

Okwi, P., Ndeng'e, G., Kristjanson, P., Arunga, M., Notenbaert, A., et al. (2007, October 17). Spatial Determinants of Poverty in Rural Kenya. Proceedings of the National Academy of Sciences, 104(43), 16769-16774. doi: 10.1073/pnas.0611107104. Also available at http://www.pnas.org/content/104/43/16769.full?sid=7fd00596-9c65-422c-a52e-2376a45e739d.

Peet, R., and Hartwick, E. (2009). Theories of Development, 2nd Edition. New York: The Guilford Press.

Perez-Franco, L., and Cardenas-Cabello, C. (1998). "The Internationalization of Higher Education System. An assessment of the Mexican Case," Sociological, vol. 13, no. 36, pp 253-278.

Rafer, N. (2002). Poverty Alleviation Strategy of Asian Development Bank vis-à-vis the Philippine Social Reform Agenda: A Review of Planning Practice Frameworks. A Paper Submitted to the School of Social Work and Social Policy, University of Queensland, Australia.

Room, G. (2000). "Globalization and Concurrent Colleges for Higher Education," The Globalization of Higher Education (edited by Peter Scott). UK: SRHE and Open University press.

Sachs, J. (2005). The End of Poverty: Economic Possibilities for Our Time. New York: Penguin.

Sanchez, P., Palm, C., Sachs, J., Denning, G., Flor, R., et al. (2007, October 17). The African Millennium Villages. Proceedings of the National Academy of Sciences, 104(43), 16775-16780. doi: 10.1073/pnas.0700423104. Also available at http://www.pnas.org/content/104/43/16775.full?sid=03aa016c-9e86-43fa-8835-cdcc42f0aee6.

Smolicz, J. (1998). "From Traditional to Modernity: Higher Education in an Ear of Global Change," Education and Society, Vol. 16, no. 1, pp. 15-26.

Urry, J. (1998). "Contemporary Transformations of Time and Space," The Globalization of Higher Education (edited by Peter Scott). UK: SRHE and Open University press.

Zeszotarski, P. (2001). "Globalizing the Community College: Strategies for Change in the Twenty-First Century (Book Review)," Community College Review, Vol. 29, no. 3, pp. 94-98.

Zeszotarski, P. (2001). ERIC Review: Issues in Global Education Initiatives in the Community College," Community College Review, Vol. 29, no. 1, p. 65.

B. Electronic Materials

Akyuz, Y. (2014, March 24). Beyond the Millennium Development Goals. Available at http://www.ipsnews.net/2014/03/beyond-millennium-development-goals/.

ASEAN Secretariat (2011). ASEAN Economic Community Fact Book. Jakarta: ASEAN Secretariat. Available at http://www.aseansec.org/wp-content/uploads/2013/07/ASEAN_AECFactBook.pdf.

Bio, J. M. (2012). The Global Imperative for Poverty Reduction, Job Creation and Democratic Governance in West Africa: Implications for the Geopolitical Realities of World Energy Situation. Available at http://www.juliusmaadabio.com/BiosSpeechinMontereal-Day1.htm.

Calleja, D. (2014, March 25). Bicol, Nation's Top Poorest Region – NEDA. Available at http://bicoltoday.com/2014/03/25/bicol-top-poorest-region-neda/.

Connolly, E. (2007). The Role of Civil Society in Poverty Alleviation and Development. Available at http://www.dcu.ie/~cis/civilsociety.html.

Deen, T. (2013, January 3). Asia Leaps Forward in Regional Economic Integration. Available at http://www.ipsnews.net/2013/01/asia-leaps-forward-in-regional-economic-integration/.

Department of Labor and Employment, Philippines (2011). Incidence of Poverty by Region, Philippines: 1991, 2003, 2006 and 2009. Available at http://www.bles.dole.gov.ph/ARCHIVES/YLS/2011%20YLS/STATISTICAL%20TABLES/PDF/CHAPTER%2012/Table%2012-4A.pdf

Eduarte, A. (2014, March 21). Bicol: Poorest Region in the Country – NEDA. Available at http://www.sorgexaminer.com/index.php?option=com_content&view=article&id=325:bicol-poorest-region-in-the-country-neda-&catid=45:latest-news&Itemid=69.

Giddens, A. (1999). Lecture I – Globalization, BBC Reith Lectures. Available at http://www.lsc.ac.uk/Giddens/reith.htm.

International Monetary Fund. (2014, March 24). Debt Relief Under the Heavily Indebted Poor Countries (HIPC) Initiative. Available at http://www.imf.org/external/np/exr/facts/hipc.htm.

Le, M. (2014, February 24). Global Citizenship Key to World Peace. Available at http://www.ipsnews.net/2014/02/global-citizenship-key-world-peace/.

Lobe, J. (2013, October 26). Key Global Financial Agencies Fall Short on Poverty Reduction. Available at http://www.ipsnews.net/2013/10/key-global-financial-agencies-fall-short-on-poverty-reduction/.

National Statistical Coordination Board (2012). Annual Per Capita Poverty Threshold, Poverty Incidence and Magnitude of Poor Families, by Region and Province: 1991, 2006, 2009 and 2012. Available at http://www,nscb.gov.ph/poverty/.

Organization for Economic Co-Operation and Development. (n.d.). The OECD Mission. Retrieved from http://www.oecd.org/about/.

Perera, A. (2013, November 29). Global Trade Winds Leave the Poor Gasping. Available at http://www.ipsnews.net/2013/11/global-trade-winds-leave-poor-gasping/.

PDAP. (2014, April 21). The Partnership for Development Assistance in the Philippines, Inc. Background. Available at http://www.pdap.net/index.php?option=com_content&view=article&id=114&Itemid=58.

Torres, T. (2014, March 23). ASEAN Economic Integration Not Likely in 2015 – ADB. The Philippine Star. Available at http://www.philstar.com/business/2014/03/23/1303947/asean-econ-integration-not-likely-2015-adb.

World Bank. (n.d.). Percentage of Poor Population per Country. Retrieved from http://data.worldbank.org/indicator/SI.POV.DDAYhttp://data.worldbank.org/indicator/SI.POV.DDAY.

World Bank. (n.d.). Percentage of Poor Population per Region. Retrieved from http://data.worldbank.org/topic/poverty.

World Bank. (2014, April 10). #EndPoverty 2030: Millennials Take on the Challenge. Retrieved from http://live.worldbank.org/millennials-endpoverty-2030.

The Development of Teachers in the ASEAN Economic Community (AEC) Era

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ABSTRACT

The integration of ASEAN countries bring about tremendous changes in the region and the way it interacts with the world. Teachers had certain sets of conduct to follow. It is of importance to accept new perspective for teaching. This research aimed to examine teachers'opinions regarding their perspectives on the necessary changes in their job and the work-related supports they need for their adjustment for entering AEC era. Focus group interviews were performed with new teachers in various educational institutions in order to elicit their opinions regarding the issues they consider could help them to develop themselves in the AEC era. Findings revealed their expectations towards leadership, duties and responsibilities, opportunities for advancement, physical facilities, compensations and relationships with colleagues. These factors could enable teachers to develop in the direction to meet the requirements imposed on them in the AEC era.

Key words: **ASEAN, teachers' duties and responsibility, human resource development**

ASEAN Economics Community

Countries in Southeast Asia are integrating to create a single market in a similar manner to countries in Europe which established the European Union (EU). Although Asian's single market still does not go to the level of integration that Europe is doing, the aims are similar. That is, to integrate the capabilities and resources of member countries and become one economy in order to compete with other countries. The integration of Association of Southeast Asian Nations (ASEAN) creates a market that has higher than USD2.2 trillion GDP with a population of 620 million people (Office of the United States Trade Representative, 2014). The size of the market places ASEAN in the focus of the world because ASEAN becomes the third largest market after China and India regarding number of population. This provides bargaining power to ASEAN as a trading bloc which is much stronger than each single country in the region can be (Wei-Yen, 2005).

ASEAN is founded on 3 pillars namely ASEAN Security Community (ASC); ASEAN Economics Community (AEC); and ASEAN Socio-cultural Community (ASCC) (King Prajadhipok's Institute, 2012). The ASC promotes an ASEAN-wide political and security cooperation to ensure that countries in the region live at peace with one another and with the world at large in a just, democratic and harmonious environment (ASEAN Secretariat, 2014a). The

AEC envisages the following key characteristics: (a) a single market and production base, (b) a highly competitive economic region, (c) a region of equitable economic development, and (d) a region fully integrated into the global economy. The AEC areas of cooperation include human resources development and capacity building; recognition of professional qualifications; closer consultation on macroeconomic and financial policies; trade financing measures; enhanced infrastructure and communications connectivity; development of electronic transactions through e-ASEAN; integrating industries across the region to promote regional sourcing; and enhancing private sector involvement for the building of the AEC. In short, the AEC will transform ASEAN into a region with free movement of goods, services, investment, skilled labor, and free flow of capital (ASEAN Secretariat, 2014b). The ASCC aims for a community of cohesive, equitable and harmonious societies, bound together in solidarity for deeper understanding and cooperation (ASEAN Secretariat, 2014c). The three pillars have different timeframe whereby the economic and social issues are more emphasized than politics and security. Moreover, some issues are yet to be determined whether they should fall into which the pillars, for example, human trafficking can be considered a societal or economic or security issues (Thepchatree, 2009a).

AEC will become enforced in 2015. The movement of workforce will be relatively easier than before. However, there is a problem in inequitable human development among ASEAN countries (Chia, 2014). ASEAN is the region which has a lot of diversity. People residing in the region have different root and hence different cultural values and perspectives. Countries in the region have a blend of Chinese, Hinduism, and Islamic culture. Vietnam is more towards Chinese. Islamic and Hinduism are evident in Malaysia, Indonesia, and Brunei. Cambodia, Myanmar, Philippines, Lao, Singapore, and Thailand have different mixture. Some cultural values are similar or a mixture of neighbor countries but some are different. The long history of ASEAN countries was full of wars and territorial seizure. Hence, ASEAN countries are rather protectionists against each other (Thepchatree, 2009b). ASEAN countries still look at each other with suspicious. Currently, the influence of world economy and globalization force countries in the region to seek for co-operation in order to survive from the competition imposed upon them by other powers in the world (Thepchatree, 2009c). ASEAN member countries started to lower their shields and turn to each other in 1967 to form the Association of Southeast Asian Nation (ASEAN Secretariat, 2014d). ASEAN have to increase the level of co-operation with each other and with other countries in the world such as ASEAN + China, APEC (Asia Pacific Economic Co-operation) and etc.

The changing of the perspective requires people to change as well. Together with larger market, there also are stronger competitions because goods, services, and skilled-workers can cross border to work in member countries comparatively easier than before. Countries that have better and cheaper goods and services as well as quality workers have the advantage to export their goods, services, and personnel to other member countries. The production of goods and services is possible because of human factor. Hence, ASEAN integration calls for a large scale human resource development. In fact, one of the priorities of AEC is to promote human resource development. People in the region need to change their perspectives and improve their quality. They should see the world from the eyes of an ASEAN, not a Thai or Singaporean or Indonesian anymore and compete internationally, not locally. Education system is the important tool for such purpose. Among other education system component, this research focuses on the changing duties and responsibility of teachers and important work related factors that would help them to adjust and function effectively in the AEC era.

Duties and Responsibility of Teachers

Teachers are important ingredient in the human resource development process. Teachers have the responsibility to find new knowledge and transfer it to students. The duties include not only teaching in front of the class and over. Ware County Board of Education Personnel Handbook (2006) suggested teacher duties and responsibilities as follow:

Follow professional practices consistent with school and system policies in working with students, students' records, parents, and colleagues

By following the professional practices, they should have communication and interpersonal skills to interact with stakeholders such as students, parents, colleagues, and administrators. Moreover, they should manage times for advising students and parents. They should contact parents to inform them the school's policies or news. They also have to keep students' records confidential. They should co-operate with school administrators and colleagues to contribute to the schools.

Complies with rules, regulations, and policies of governing authorities and supervisors

Teachers should observe the government's regulations and Education authorities' policies as well as the school procedures and rules. Classes must be conducted as specified in the schedules. They have the duty to enforce schools' regulations on students. Teaching plans, materials, and records must be filed accurately and adequately. Teachers also have to participate in faculty meetings and other school activities.

Teaching professionally

Teachers' use of language both written and oral should be free of errors so as to be model for students. They must have up-to-date knowledge and maintain lesson plans according to the curriculum and school policy. Teachers should assign reasonable amount of homework and assignments to students. Teachers should seek for professional development and share their up-to-date knowledge with students and colleagues.

Likewise, Zeiger (2014) suggested that teachers play multiple roles as learner, collaborator, planner, assessor, and designer for classes. They act as facilitators for students learning, not just a lecturer. They also have to interact with students and parents and assist all sorts of school activities. It is important that teachers should continually acquire updated information in order to perform the duties and responsibilities required from them.

Methodology

The objective of this research was to investigate teachers' expectations regarding their jobs in the AEC era. Since the objective was to elicit opinions on the changing environment and teachers' opinions regarding the adjustments. Focus group interview technique was utilized because the technique can stimulate discussion among informants and generate ideas effectively (Zigmund, 2011). Ten focus groups were recruited from leading 2 public and 3 private universities in Bangkok. New teachers who are working for less than 2 years were invited to participate in the focus groups. Each focus group consisted of 10 teachers. Topics for discussions were the issues they think can enhance their functions in the AEC era. The researcher facilitated the discussion and motivated teachers to express their opinions and concerns regarding AEC and their jobs.

Results and discussion

Data were analyzed and themes were elicited from discussions from the focus groups. Teachers reported their concerns on leadership, duties and responsibilities, opportunities for advancement, physical facilities, compensations and relationships with colleagues which need to be adapted in accordance to the changing environment of AEC. These themes are discussed in the following section.

Leadership

The participants suggested that in the beginning of AEC, leaders should be able to lead them effectively. During the beginning period, they have limited information about other countries, directions of work are essential. Leaders in the modern era should possess technical, human, and conceptual skills. They should have knowledge about other nations such as culture, law and regulations, and etc. Very importantly, they should continually improve themselves following the changes in the dynamic world. Furthermore, apart from knowledge, leaders should perform the task as an instructor who can deliver knowledge and teach followers to perform well. The participants showed their concern that they might have little knowledge on AEC and they need leaders who are capable to provide them with guidelines and information regarding to how to function in the AEC.Furthermore, modern leaders should be fair and honest.

Duties and responsibilities

Duties and responsibilities of teachers should be expanded. Teaching students to be ASEAN citizens is of the highest priorities. Teachers should seek academic as well as practical knowledge. Teachers in the AEC era should have language proficiency in order to learn the education approach of other countries and integrate with Thailand's education system. Good practices should be learned and shared among teachers in ASEAN. Teachers must be able to teach students about the practices, especially about laws and regulations, in ASEAN countries. Teachers should conduct research study in order to learn more about issues in other countries. Joint research project among universities in ASEAN would contribute a lot to joint learning among teachers in ASEAN countries. Moreover, teachers have the duty to create teaching materials and texts that could be shared among countries.

Opportunities for advancement

The participants reported they feel that their have more opportunities for advancement. However, they are concern with the acceptance of education certificates in other countries. Their certificates should be recognized in other countries. That would help them to transfer to teach in other countries, if they wish to. Education institutions should promote the comparable system and practices for advancement along with the performance index that can measure knowledge and skills regarding ASEAN countries.Common standards and certificates should be available for the free flow of skill-workers.

Physical facilities

Universities should provide physical facilities as well as IT system or teaching media that could enable teachers to seek knowledge about other countries. Education and cultural trips and exchanges in ASEAN could be advantages. Education institutions in ASEAN countries should be linked through effective telecommunication network such as the internet or satellite broadcast. Internet connection such as highspeedwifi spot should be provided as well as access to academic and information database.

Compensations

The compensation systems should be revised. Standards must be set in accordance with the requirements for AEC. The assessment system should be modified to reflect capability to function in AEC rather than in Thailand alone, for example, English skill or job experience in other ASEAN countries should be given merits, etc. ASEAN assessment standards should be created in order to create fair and equitable treatment for works within the region. One more issue that the participants raised was about the medical fees for themselves and families especially when working in other countries. Their social security or medical insurance might not cover expenditure when worked abroad. They have to buy other insurance policy to cover their medical expenses abroad which usually are high. The government and university should take this into consideration.

Relationships with colleagues

Teachers should open their perspectives to accept diversity. ASEAN comprises of nations of different race, religion, culture, and etc. Without the acceptance for the differences, any co-operations or integrations would be impossible. Teamwork need to be promoted, especially among teachers in different countries. Collaboration, listening, idea sharing skills are required across nations. Without proper English proficiency and human relationship skills, this task might be difficult. Knowledge should be managed in order to share new information and technology to colleagues. Work norms should be followed strictly in order to avoid conflicts and enhance collaboration.

Conclusion

New teachers realize their need supports in several areas to help them entering AEC effectively. They lack experience dealing with people from other ASEAN countries and need strong supports from their leaders and universities to organize some activities which will help them in the matter. Human resource development plans should be devised in order to provide information and practical training programs to cope with the changes. The organizational systems and culture should also be adjusted in order to be more flexible and receptive to the environment. Moreover, information is of importance. Teachers had limited information about other countries. The improvement of information, structure, and human capital could help Thailand to enter AEC effectively. Research funds, IT facility and others should be offered to teachers. Moreover, communication skills must be acquired in order to collaborate with colleagues in ASEAN. Educators and authorities should aim to provide supports rather than keep measuring the performance without providing supports first.

REFERENCES

ASEAN Secretariat.(2014a). ASEAN Security Community Plan of Action. Retrieved on 28 July 2014 from http://www.asean.org/news/item/asean-security-community-plan-of-action

ASEAN Secretariat.(2014b). ASEAN Economic Community. Retrieved on 28 July 2014 from http://www.asean.org/communities/asean-economic-community

ASEAN Secretariat. (2014c). The ASEAN Socio-Cultural Community (ASCC) Plan of Action. Retrieved 28 July 2014 from http://www.asean.org/news/item/the-asean-socio-cultural-community-ascc-plan-of-action

ASEAN Secretariat. (2014d). History: The founding of ASEAN retrieved on 28 July 2014 from http://www.asean.org/asean/about-asean/history

Chia, SiowYue.(2014). Towards Freer Movement of Skilled Labour in AEC 2015 and Beyond.ERIA Policy Briefs. Retrieved on 28 July 2014 from http://www.eria.org/publications/policy_briefs/towards-freer-movement-of-skilled-labour-in-aec-2015-and-beyond.html

King Prajadhipok's Institute.(2012). A report on the readiness and adaptation of Thailand for the entering into AEC in 2015. Bangkok: S Charoen. [in Thai]

Office of the United States Trade Representative. (2014). Retrieved on 28 July 2014 from http://www.ustr.gov/countries-regions/southeast-asia-pacific/association-southeast-asian-nations-asean

Thepchatree, P. (2009c). The ASEAN Political and Security Community. Bangkok: Thammarsart University Press.

Thepchatree, P. (2009b). The ASEAN Economics Community. Bangkok: Thammasart University Press.

Thepchatree, P. (2009c). Towards ASEAN Community 2015. Bangkok: Thammasart University Press.

Ware County Board of Education Personnel Handbook. (2006). Retrieved on 28 July 2014 from http://www.ware.k12.ga.us/Handbook/Secondary%20Pages/Teacherdutyandrespon.htm

Wei-Yen, D. H. (2005).Roadmap to an ASEAN economic community. Singapore: ISEAS Publications.

Zeiger, S. (2014) What is the role of teachers in education? Retrieved on 28 July 2014 from http://work.chron.com/role-teachers-education-8807.html

Zigmund, G. W. and Babin, J. B. (2011). Exploring Marketing Research (11thed.). NJ: Cengage Learning.

There is a Fantastic Form of Relation between Things: Education in the Fetishism of the Commodities

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ABSTRACT

In capitalist world wherein product, interest, and money dominate most of the social transactions, Marx's concept of commodity fetishism captures the distinctive social relation emerges under capitalism. Commodity fetishism is Marx's general description of the necessary appearance of the capitalist society. This concept shows that the social relation existing between men appears to be a fantastic relationship between things; it is a domination of exchange-relation throughout the society. Given education is an institution that is socially determined, the question emerges: how much of education, precisely its relation (i.e. student-teacher relationship), is transformed and also able to engage and move beyond commodity fetishism? Given such question, this paper shows that although education is not free from the effects and determination of commodity fetishism, it still preserves its humanistic and non-commodified relations. It is preserved by some of its exemplary individual, and of its classroom structure. Education then maintains its distinct capacity to react against the prejudices of the capitalist system. Despite the imposing determination of capitalism, education could still be a fortress of genuine human affairs, and one of the catalysts of change and liberation.

Rationale

> 'What else than the one it is fitting for a man who does not know to suffer?' [Socrates said] 'And surely it is fitting for him to learn from the man who knows. So this is what I think I deserve to suffer'
>
> 'That's because you are an agreeable chap!' [Thrasymachus said] 'But in addition to learning, pay a fine in money too.' […]
>
> 'He has some' said Glaucon. 'Now, for money's sake, speak Thrasymachus. We shall all contribute for Socrates.'
>
> Plato's Republic, 337 d

Education is a product of its time, of its historicity. As a social institution, it is determined by various factors operating in a distinct time of society. Economic, religious, social, political, ruling ideas, and physical and cultural environment, all of these factors interact, forming rich background where particular form of education arises. These different social factors affect the method, approach, ideals, and goals of education.[i]

While affected by these societal conditions, education also transfers important knowledge, values, and skills to maintain the operation and survival of the society. It molds the next generation equipped to make every aspect of the society functional. By doing this, however, education at the same time transfers the unjust prejudices of its time. It perpetuates baseless beliefs and ideas that could harm the society. Education's function then is not purely beneficial; it could also maintain the injustices of the society it serves.

And yet, education could still be freed from the society's prejudices. This capacity is one of its greatest powers. It plays a key role in challenging the unjust prejudices of its own society, and it has been exemplified from time to time in history. Education is self-correcting. It is in this institution where social critiques successfully happen, and this activity provides a force that frees human civilization from erroneous ideas and beliefs that no longer help but now harm its society, and more importantly, dangerous to humanity.

Given this idea of education, the task of this paper is to clarify how education is modified and determined by the changing conditions transpired in the twenty-first century, the capitalist society with its fetish in commodity. The paper also shows how education could possibly engage the structures of capitalism, precisely, how it could possibly react against the unjust prejudices brought by the capitalist society. Thinking through these questions, this paper focuses on the teacher-student relationship, and how much it has been modified by the universalized exchange relation under the capitalist system, the commodity fetishism. This paper points that: although the dominance of commodity-exchange relation has restructured the genuine teacher-student relationship into mere commodity-exchange, where whole educational process has become a process of exchange of valued things, education still preserves its humanistic and non-commodified character. Education then maintains its distinct capacity to react against the confusion of real value brought by the capitalist system. Its individual students and teachers could counter the determination of the system. Their ideas could provide alternative perspectives on how social relations appear, and their passionate wills could impose another way in the capitalist structure. These powers, on one hand, might be out of one's individual strength. But the classroom relation and structure greatly contributes to this ability. Without product in between, classroom engagement is a pure human relation. In in-the-classroom experience, the students and teachers are not mediated by the commodities that confuse what might be the real value of education.

To prove this case, the paper is mainly divided into two parts. The first part provides a discussion of Fetishism of the Commodities, guided on how it was theorized by Marx. This part focuses on the peculiar social relation historically produced under commodity fetishism. The second part, on the other hand, examines how the teacher-student relationship was modified by the commodity fetishism. This part discusses the difference between the commodified education and the pre-exchanged education, underscoring the limits of the fetish, education's potentials and challenge.

The Fetishism of the Commodities and its Distinctive Social Relation

> A commodity appears, at first sight, a very trivial thing, and easily understood. Its analysis shows that it is, in reality, a very queer thing, abounding in metaphysical subtleties and theological niceties.[ii.]
>
> Marx, Capital

i. Commodity and the Relationship between Things

We are now under the remnants of the successful commercial revolution, started at the late twelfth century and still continuing today. The merchant class has successfully challenged, if not dethroned, the powerful status of the church and noble society. Capitalism is successfully established, and at this point, we are now reaping the dangers of successful commerce, unnoticeable at its developing stage. Marx's concept of commodity fetishism captures such distinctive changes in social relation that emerges in the capitalist society. This distinctive social relation is the rule of relation between things over concrete human relation. In Marx words, commodity fetishism is a "fantastic relation between things,"[iii] a phenomenon of *universalization*-and even domination-of the commodity-exchange relation throughout the society, which in effect conceals the concrete social relations and human relations beneath it.

In the *Capital's* section, *The Fetishism of the Commodities and the Secret thereof*, Marx explains how a product, from being an ordinary thing acquires a value or price, which nowhere in any part of a thing can be perceived. An egg in the market, for instance, asserts a price of six pesos, yet nowhere in its shell, yolk, or its white, provides any mark that it should be priced as six pesos. Marx termed this social phenomenon as *fetishism of the commodities*. Here, the *ordinary thing* is transformed into a *commodity*, and produces an appearance that its exchange-value (or product's price, as expressed materially) is intrinsic to the product itself, arising from its substance, and *not something socially conditioned*.

This fetishism, Marx clarifies, is a phenomenon analogous to the fetishism of the religious ideas. God, once was just a product of human mind, appears in the long run to have its own life that He now affects (and even determines) its creator, the human beings. In a similar way, the products of labor, which were first under human manipulation, now in turn affect its human creators as they appear in the market. Commodities, in their fetished appearance, form a market of products that appear to have its own life. Their prices, interacting with each other, appear to be independent from the form of economic production, and even from "the will, foresight, and action of producers."[iv] The market of commodities becomes more powerful that it determines man's actions: the market now turns to "rule the producers" which is supposed to be other way around.[v]

One way the commodities dominate the society is through their creation of a distinctive social relation. Under the fetished commodities, Marx sees the social relation between men "assumes, in their eyes, [a] fantastic form of a *relation between things*."[vi] Because of the universalization and dominance of commodity-exchange practice in the society, *the social relations-or the person to person connection built in the society-appear now as just an exchange relations between things*.

There is a "fantastic relation of things that assumes in our eyes." Concretely speaking, in a worker-capitalist relationship, the workers sell their labor-commodity and the capitalists buy them. It is through exchange of commodity (i.e., the labour-commodity = money-commodity) that made capitalists and the workers appear to relate on each other. By considering only the appearance of exchange, neither the relationship of loyalty, nor force, nor exploitation, nor the social fact of alienated relations are observable, neither even the social relation that forces workers to sell one's labour in a very cheap price is thinkable, what is rather perceivable is a mutual-and even just-commodity-exchange relations between the worker and the capitalist. Same goes on how we confront our electric bills, or exchange our wage to buy rice or fish, what is visible is the plain prices of these things, the fisherman, peasants, and common workers, and their social conditions, are all concealed.

For Marx, it is the commodity-the very cell of capitalism-which is at the root of commodity fetishism and its peculiar social relation. It is through the transformation of the product of labor into a "thing for exchange"-the commodity-form-that makes the product conceals the concrete and qualitative labor (with its differing "sorts," and "expenditure"). Such concealment is further intensified by the guise of a quantifiable object (e.g. gold, silver, or paper); the concrete and the qualitative of labor are shown in a *purely quantitative appearance of the commodity through price, and also of the quantitative relations between products during exchange*. What then tangible in our eyes are prices of products and prices of labors being exchanged, and not the concrete social relations working beneath those appearances.

ii. The Relations' Root and Historical Distinctiveness

Such fantastic relation between things, as Marx claims, is distinctive only in a capitalist society. It is not eternal, but historically produced. It is not present in the feudal society. Under feudalism, as exchanged was not yet universalized, there was no commodity that confused the social relations; the commodities did not play much role in the relationship between individuals. Under feudal life, mutual and personal relationships dominated the social relations. In Marx's view, it was through "*personal dependence*" that its "social relations of production" was set up.[vii] Whether the relationships were between the "serfs and lord," "vassals and suzerains," "layman and clergy," or, whether the connections were out fear, force, or loyalty, the point is that the *relations between them were transparent and not concealed by a mutual commodity-exchange relation*.

By contrasting the feudal social form from capitalism, Marx shows that there was a time wherein products did not have its commodity-form for exchange, and thus did not have an objective appearance in the form of price. Products, during those times, were still lifeless, they had uses but they did not have life that allows them to relate with each other. Things were not in an exchangeable form. They could be regarded as things to be used, to be given, to be offered, or to be thrown, but not to be an equivalent thing to another thing-not a thing that will produce exchange relations. Hence, there was a point in time wherein products did not have its fantastic value in the market, and *where the social relations were transparent and not blurred by the exchanges between products*.

The Education under Fetishism of Commodities

i. From Pre-exchanged to Fetished teacher-student relationship

In view of how Marx conceives the exchange relation arising from commodity-form, it is now relevant to ask: what is now the status of education in the background of the commodity fetishism? Particularly, since at the core of educational practice is teacher-student relationship, i.e. group of individuals, whose activity involved nurturing of one another, of making one another cultured skillfully, mentally, morally, and humanistically, how then this core teacher-student relationship is modified by the social relation spring in the dominance of commodities?

Now, to see clearly the changes happened in teacher-student relations, it is then imperative to have a clear model of an educational relationship free from the illusions of the commodities.[viii] What is noticeable in a pre-exchanged teacher-student relation is their direct and personal relation. Before the universalization of exchange, individuals were bonded solely for their educational goals without any mediation of commodity. Whether that goal is for truth, or for tribe's survival, or to know the workings of the stars, or understand the secrets of heaven, the pursuit to know, understand, learn, and acquire skills were what made people gather, discuss, and teach things with one another.

Socrates, and his relationship with his student, ideally models the pre-exchange relationship of education. Their learning relationship was free from any payments; there was no commodity-exchange involved; there was no mediation of money. Socrates did not charge any payments, and his youth followers did not pay anything. It was a free education ideally seeking for truth untainted even by the rising commerce during Socrates' time.[ix]

However, this status was altered after the education was transformed into a commodity, after the domination of commerce. Although the commercial revolution greatly benefited education, the necessary invention of the registration fees, tuition fees, miscellaneous fees, seminar fees, tutorial rates, and even professors and teachers hourly rates produced new phenomenon in education. It has paved way to a newly objective appearance of education, infected by the fetishisms of the capitalist society. More than simply an activity for certain utility or pleasure, it was transformed into commodity embodying exchange-value. As a result, the relationships involving the teacher and student also undergone modifications in its appearance. The human relationship first bonded by educational ideals now appears as "a relationship between things."

Thus, education is now priced, an economically valuable commodity. This is the logical conclusion following the constitution of commodity as analyzed by Marx. What now objectively appears in our eyes is an exchange relation between tuition fees and salaries. In this structure, the students see its relation to their educators as: Money-Diploma-Money. More than the pursuit for truth, and quest for learning, the immediate appearance of the university (i.e. the group of teachers) and course offering (i.e. collective ideas of the teachers) appears alongside with their prices, and equally important, of how much it can open an opportunity i.e. how much it can generate further income, more commodity. As the structure shows, the price and income appear more fantastically that they then obscure the other value (or let say, the essential value) of educational quest.

Such obfuscation of the educational value is also present in the eyes of the teachers, however in a different form. For them it is not the learning process that has gone obscure, it is rather their teaching experience, the very sense of their teaching profession. The whole activity of sharing and teaching cannot but appear in their eyes in a commodity-form, in a salary form. The salary then is the objective form of their monthly teaching practice. In this form, the value of their labor-its social character, passions, ideals, dedications, energies, even its relations to owners and students-are all summed up, homogenized, and quantified by the piece of papers with exchange power.

In both of the student and teacher's viewpoint, the prices and payments existing alongside with education cannot but obscure what education really is. In that objective appearance, what takes precedence is the economic value, which far from being good is rather a limiting-if not distorted-representation. In such form, the education's human, essential, and even spiritual values are lost. Here, teaching classes and managing schools become money-matters; choosing and attending courses too must be reflective of practical value in commodity production; even enrollment of the students, acceptance and promotions of the professors are all decided in view of economic gains. In this operation, teachers, students, and school owners are now bonded not for the quest education in its genuine sense; they have become traders of commodity, producing material relations. Hence, in reality it is not Socrates' arguments that persuade us, it is of Thrasymachus'-the one who demanded payments, and saw his piece of argument equivalent to a certain piece of money.

ii. The Historicity and the Limits of the Fetish

Certainly, there is nothing new about these ideas: that money rules, and it rules even in the realm of education is no surprise at all-it has been a cliché. But what Marx's analysis of commodity shows is that this rule is nothing but a necessary illusion-again historical-arising from the peculiarities of the commodity-form. It is not a timeless fact that education has price; this system of education and the objective economic value that have sprung alongside with it are not eternal but produced at the advent and rule of the commodity. Thus, in considering the effect of the commodity, it provides a better understanding why education is treated today more of an investment. For instance, that most of the people (e.g. teachers and students) choose the economic value over any other value is not just out of individual desires, greediness, or mental sickness, there is a material condition that nurtures these tendencies, that is, the mystifications and obfuscations of the fantastic form of the commodities are significant factors to consider.

But this does not mean that people no longer have any freedom to choose and act out of their will, that everything is determined by the phenomenon of the commodity. That is not the case. In education, there are exceptional cases and individuals who have managed to move beneath the glittering surface of quantified values to experience the other values (e.g. humanistic) of education. These are clearly exemplified by those students who have chosen their educational path more on the basis of their passion over a certain field, and not merely of its practical economic gains. They are, in a sense, the followers of Socrates. In their eyes, their teachers, especially those who shared their passions, appear to them as their companion towards their educational journey.

Such exceptional cases are also manifested by those teachers whose passion for teaching is undying. They are the modern Socrates, who, with burning hearts and eyes, sacrifices their energies to someway uplift their students. For them, beyond the quantities of hourly classroom rates, the value of teaching conquers the objective value imposed by salaries, and it even conquers some teacher's miserable material conditions, whose income is not even enough to make them live a human existence.

In both instances, they show the limit of capitalism and its rule of fetished of commodity. Certainly, commodity can sculpt and produce a world on its image, mandate immaterial forces to rule over the society, but it cannot overpower everything, especially the human being in its concrete sense. That although it is the commodified education that objectively appears in our eyes, human being has the capacity to move beneath the objective and necessary appearance of education as mere money relations, and see its more essential value.

This ability to move beyond appearance, and preserved genuine education could be just explained via individual factors. It might be caused by the individual greatness of soul, nobility, and strength of will, or because of the lesser material compensation that educational pursuit provides, as the money commodity cannot be a perfect equivalent for the teacher and the student's effort being spent. However, at the structural level, there is a unique relation operating in education that somehow counters the dominating exchange relations. Actual classroom activity, for instance, is distinctive among other types of production since it does not produce any product. There is no object that confronts the teachers and the students that might represent the value of what they are doing at the end of their sessions. What confronts them is the experience itself: either it could be some form of dissatisfaction because of students' incomprehension or teachers' failure to deliver the lesson; or, a positive feeling because the teachers has accomplished their lesson, or students' awe after being enlightened. Either way, it is a human and humanizing experience, it is an experience shared by the person to person engagement.

Education's sanctified value is somehow preserved in this unique relation structured internally within it. The direct bond between the teacher and the student creates an opening-a free space-that slices within surface illusions of commodity, and enlivens the original spark that made educational relationship flourish. This claim certainly needs to be further developed: it needs to establish well whether it is really the structure of education that undermines the fetishes, or it is just a matter of individual heroism. Nevertheless, it seems that the fetishes of the commodity can be removed by the direct and personal relationship teacher-student relationship engages.

The Problem and the Challenge

What the unique educational relationship confirms is its radical potential to react against the current objective appearance of values under capitalism. The exceptional individuals and relations, exemplified by the genuine educators and students, arising periodically, show that it is possible to operate beneath the illusions, the space where the illusions of economic values are no longer sacred but treated on what is worthy of them-as illusions. This possibility creates a small gap over the solid dominating system, a crack that cradles an opening to a thinking that does not merely repeat the mechanism of capitalism but reacts against it. This thinking defies the appearances of capitalism, thus, it also defies the illusory values that define education, human being, social relation, and even the whole society.

But this does not mean that education can radically change everything. In fact, in some sense, there is something pointless about the potentiality possessed by education. Though education can resist some of the illusions, it is still questionable on how much it can oppose the status quo, the dominating fetishisms in almost all of the aspect of the society? In reality, society and education is not changed by mere showing the historicity of human relations and the possible alternative ways of relating (shown in those exceptional cases). Perhaps some exceptional students and teachers could manage to move beneath the eternal appearance of economic values, yet still, they do not alter the mist of commodities. Indeed, the discovery alone is not enough. As Marx would add, the discovery that the atmosphere is composed of different gasses does not in anyway change its appearance, and so with the fetishisms under commodities.

In the surface, it is the same meanings that emerges and imposes in our eyes. Perhaps, we could have a small space where we can feel the humanistic spirit of education, but away from it, we will still be greeted by the commodities-even if we are no longer amazed by its fantastic appearance. Yes, an educator could teach with whole dedication, or a student could choose a program where she can realize her human value; both sacrifice their energies even without financial compensation, but outside of their agitated spirits, the society, operating through the structure of commodity, asserts its own judgment to their work and career path, a judgment that is not merely subjective but has an objective social form. With this, we cannot but be confused, we cannot but see, and at some point we cannot but agree to the objective form that any work or pursuit can only be sensible by its commodity-representation. We cannot but operate in this society that only makes sense of things that are represented through money-commodities, which main issue is of whether the pursuit will profit or will not profit well.

In the end, we realize that the emergence of modern Socrates is not enough. We all know that it was he who died, and it was Thrasymachus who gained the last laugh. Individual heroisms are inadequate to provide substantial change; the dominating system will still reproduce itself, will never stop, and will continue to confuse society unless the mode of commodity-production that produced such confusing illusions suddenly disappear. The point is to change it, the next question is how?

Endnotes

[i.] What is explained so far is a social reading of education. This interpretation was showed clearly by Mulhern in his book A History of Education. He showed here, for instance, how the early medieval education is radically different from the Renaissance education. How the commercial and scientific revolution, the rise of reformation, and the decline of the medieval church and the monarch formulated an education significantly distinct from medieval period, which was fed mainly by theocentric and feudal ideals. See, James Mulhern. A History of Education, A Social Interpretation. New York: The Ronald Press Company 1959.

[ii.] Marx, Capital, 81.

[iii.] Karl Marx, Capital, A Critique of Political Economy, Trans. By Moore, Samuel and Edward Aveling. (New York: Random House, Inc. 1906), 83.

[iv.] Marx, Capital, 86.

[v.] Marx, Capital, 86.

[vi.] Marx, Capital,. 83.

[vii.] Cf. Marx, Karl & Friedrich Engels, The Communist Manifesto (London: Penguin Books 2004), 6; Marx, Capital, 89.

[viii.] This approach in a sense is similar to Marx, that is, of looking at the other forms of production to be able to highlight the distinctive illusions coming from the commodities.

[ix.] This kind of pre-exchange structure also holds true with other ancient educational relationships. In their social form, the master, guru, or the mentor are personally related to their students and disciples in pursuance of their goals, either to be illuminated, or acquire truths, or to pass on their knowledge. There is no commodity involved that mediates the connections.

BIBLIOGRAPHY

Balibar, Etienne. "Ideology or Fetishism: Power and Subjectivism" in Philosophy of Marx. Trans. C. Turner. London: Verso 2007, 42-79.

Cohen, Gerald. "Fetishism" in Karl Marx's Theory of History, A Defence. New Jersey: Princeton University Press 2000, 115-133.

Cole, Luella. "Socrates and the School of Athens" in History of Education Socrates to Montessori. Holt: Rinehart and Winston 1965, 8-41.

Marx, Karl & Friedrich Engels. The Communist Manifesto. London: Penguin Books 2004.

Marx, Karl. Capital, A Critique of Political Economy, Trans. By Moore, Samuel and Edward Aveling . New York: Random House, Inc. 1906.

_________. "Economic and Philosophical Manuscripts" in Marx's Concept of Man. New York: Fredrick Ungar Publishing Co. 1961, 87-196.

_________. "The German Ideology" in Works of Marx and Engels 1845.

Mulhern, James. A History of Education, A Social Interpretation. New York: The Ronald Press Company 1959.

Plato. The Republic. Trans. Allan Bloom. New York: Basic Books 1991.

"Bring Me on Time to My School" Implications of Public Utility Vehicle Drivers' Behavior on Student-Commuters

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ABSTRACT

By 2015, the influx of foreign nationals in the Philippines for education is one of the possibilities brought about by the ASEAN Integration. This scenario had prompted the researcher to study the traffic condition in the province of Cavite, where several colleges and universities are situated, with the perspective that improperly managed traffic in the area will have unfavorable impact in the daily lives of student commuters.

The driving behavior of PUV drivers as one of the contributory factors to poor traffic condition was studied in the current research. Out of the three hundred five jeepney drivers, only twenty eight (9%) of them qualified as respondents. Several means of gathering data such as administration of pre-survey questionnaire, in-depth interview, behavioral observation, and interview with other drivers to validate significant responses were employed by means of indigenous research method of "pagtatanong-tanong" (asking questions) and "pakikipag-kwentuhan" (having conversation with somebody).

The findings revealed that there are personality traits and demographic factors that influence the driving behavior of PUV drivers. It is therefore recommended in this study that several programs and activities to facilitate the discovery, development and enhancement of positive traits among PUV drivers as bases in promoting positive driving behavior be undertaken. Such programs would be essential in ensuring that the students using jeepneys as their primary mode of transport will not be deterred from continuously patronizing it.

Key words: **school, public utility vehicle, behavior, commuters**

Introduction

evidences of this claim (NHTSA 2012 statistical abstract; GMANews.TV, 2010; International Injury and Fatality statistics, 2009). The researcher as a motorist herself often witnesses various vehicular accidents as well as traffic violations done by motorists along the roads and highways in the province of Cavite and in other places she visited. For such, it is no longer surprising for her to see and hear collision of vehicles with horrendous damages, injuries or even death of the motorists and their passengers. Moreover, offenses like reckless driving, over speeding, swerving, negligence on the use of seatbelts, beating the red light, failure to drive in the right lane are also commonly observed. These are somewhat disappointing and irritating to commuters especially to student-commuters due to its possible implications on their psycho-physiological well-being and its implications to their academic performance particularly on attendance and punctuality.

The ASEAN Integration in 2015 could bring many possibilities and opportunities like influx of foreign nationals in the Philippines for education. This scenario had prompted the researcher to study the traffic condition in the province of Cavite, where several colleges and universities are situated, with the perspective that improperly managed traffic in the area will have unfavorable impact in the daily lives of student commuters. Furthermore, this study responds to De La Salle University – Dasmarinas' (DLSU-D) research agenda for the province of Cavite's development in the next fifty years.

Reasons as to what causes VAs and traffic violations cast queries, doubts and challenges in people's minds. Several researches identified drivers' behavior, driver's intoxication, driver's fatigue, poor weather condition, distractions, cell phone usage, road hazards, and the like as causes of car accidents (Dieseruvwe, 2010; Clements, Mahin & Cohen, 2010; Hington & Winter, 2003). If asked, drivers would claim that VAs are caused by mechanical failure, lack of or not maintained and hardly perceived traffic road signs. Majority of offenders would put the blame to the other drivers. As a general human reaction, it is an instinct to protect one's self against anything that would create anxiety or harm to the ego that is why driver offenders commonly blame others for the offense they committed. This can be attributed to Freud's concept on defense mechanism (Ryckman, 2008).

As a common understanding, accident is a sudden, unforeseen and undesirable event, although, most accidents could have been avoided if proper care and anticipation were undertaken. From this argument, VAs and traffic related incidents (TRI) can be viewed in a different perspective: if accidents can be prevented and/or avoided then there is a great possibility that the driver's behavior and attitude have influence over the incident; and these behavior and attitude might have been impinged on by the individual's characteristics, thoughts, emotions and events in his life. Thus, the researcher aimed to investigate and unveil possible factors that might have prevented the driver-respondents from causing VAs and/or TRIs. It also touched the establishment, maintenance and improvement of traffic peace and order condition within the province through the implementation of research-based recommendations concerning people, technology and policies on land transportation. This would be essential in ensuring that the students using jeepneys as their primary mode of transport will not be deterred from continuously patronizing it.

Conceptual Framework

The study was patterned in the concept of positive psychology being described by Seligman as a field concentrated on discovering the positive qualities individuals possess, and how to utilize these qualities in building human strength and/or in assisting them gain success (Feldman, 2008).

Figure 1 shows the relationship of the different variables of the study wherein several demographic factors as well as personality traits of the PUV drivers were considered as possible factors that contributed to the kind of driving behavior they exhibit. The framework also shows the intent to investigate the implications of PUV drivers' driving behavior to student-commuters. The results of the investigation are the bases in conceptualizing a program to develop and enhance positive driving behavior to facilitate a positive travelling experience among student-commuters.

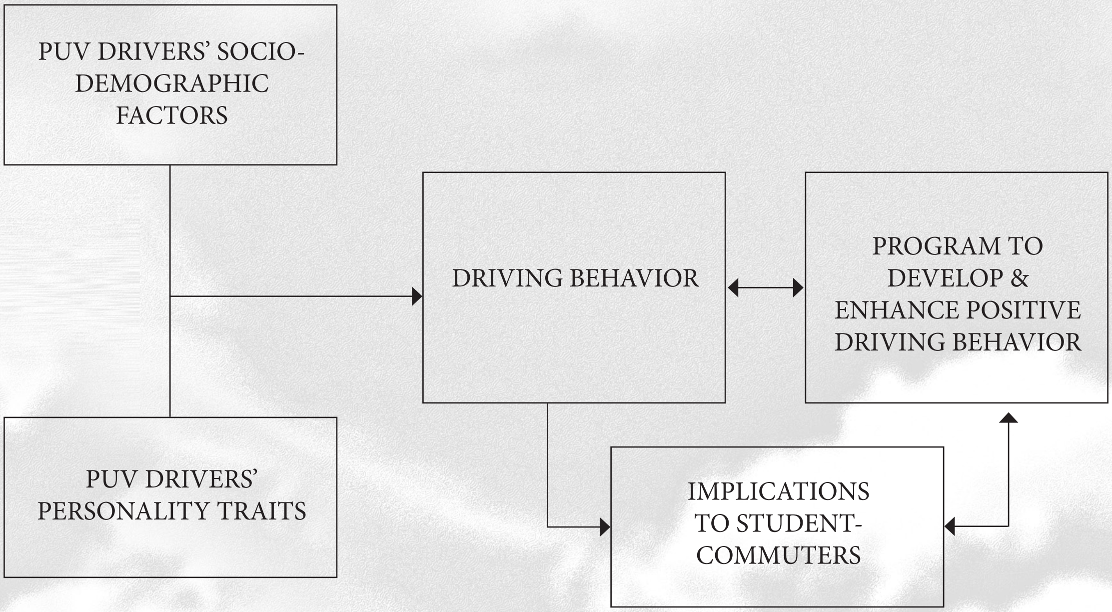

Figure 1. **The paradigm of the study showing its variables.**

Methodology

A descriptive qualitative research design with a purposive sampling technique was used in this study. In consideration to the nature of the respondents, the indigenous research method of "pagtatanung-tanong" (asking questions/interview) and "pakikipagkwentuhan" (having conversation with somebody) were utilized in gathering data.

Two groups of respondents were tapped for the study: the students and the drivers. There were 100 DLSU-D student-commuters who were asked through an ambush interview about their opinions on the implications of driving behaviors of PUV drivers on them. Half of the group was interviewed in the East campus and the other half in the West campus. The other group of respondents was the drivers of PUVs, specifically the jeepney drivers from the low land municipalities of the Province of Cavite. A pre-survey questionnaire to identify qualified driver-respondents was initially administered followed by a semi-structured interview guide to discover the positive characteristics of the drivers that might have prevented them from causing VAs and/or TRIs. To qualify, the jeepney driver should have never caused any VA (with another vehicle, person or own vehicle) and/or apprehended by a traffic law enforcer for any TRI after the first year of experience as driver. Out of the 305 initial driver-respondents, only twenty eight (9.18%) met the criteria. Their responses in the initial screening were validated through interview with some drivers in their respective jeepney terminals and also during the research gathering process of pakikipagkwentuhan. In the process of conversation wherein a driver-respondent was found to have encountered or caused any VA or TRI, he/they was/were automatically excluded from the list. The conversation with the driver-respondents and their significant behavioral reactions were recorded using an electronic gadget to ensure accuracy of capturing their responses. Their significant behavioral reactions – facial expressions, gestures, laughing, crying and the like served as guide to validate the sincerity and honesty of their verbal responses. Consistency of responses were established, interpreted and analyzed to form conceptual themes in relation to the problems of the study.

Results and Discussion

1. The profile of the driver-respondents in terms of the following demographic factors: (a) age; (b) educational attainment; (c) civil status; (d) number of children; (e) religious affiliation; and (f) family income.

1.1 Age

All of the driver-respondents are in their adulthood stage with an age range of 22 to 65 years. Following Erikson's Psychosocial Development, 57.14% are in the early adulthood stage, 39.29% are in the middle adulthood and 3.57% belong to old age. Adults are individuals who have completed their growth and strength, and are ready to assume their status in society or to assume responsibilities of adult life along with other adults (Engler, 2008; Hurlock, 1982). This means that their age corresponds to the expected developmental milestones with the role they are assuming as responsible and productive individuals for their families and society.

The significant responses of the driver-respondents reflect that age has influence on driving behavior – that older people are more patient, responsible and less aggressive in driving compared to younger individuals and that attitude and behavior tend to change as the drivers get older. Looking into the physiological development of individuals, it was theorized that adolescent brains or that of younger persons have not yet reached its full development, thus is still developing which may cause inadequate control of impulsive behavior (Frisman, 2010). It implies that the brain is continuously developing as a person grows older and the more it is developed the more that the individual gains control over his behavior. Psychologically, the change in the respondents' behavior concurs with Allport's concept that personality is dynamic – moving and changing like every other thing as it grows (Engler, 2009). Moreover, the change in their behavior as they grow older seemed to have influenced by their ability to process circumstances with a negative attitude towards vehicular accidents and violations of traffic rules and regulations. They tend to be more careful in driving because they do not want to encounter and cause accidents themselves and to be summoned by law enforcers due to violations.

1.2 Civil Status and Number of Children

Among the 28 driver-respondents, only one is still single while the 27 are all married with children. Accordingly, the love and concern for the family and/or children have a great impact on driving behavior as revealed by the respondents' significant statements. They admitted that their family (the wife and the children for those who are married or parents for the one who is still unmarried) serve as their inspiration while working hard in the roads and highways. Keeping in mind that there is a family waiting for them at home, and thinking of their children's needs and future make them avoid behaviors and decisions that may cause accidents and to avoid committing violations of traffic rules and regulations. Their behavior is directed towards a goal to provide their family's basic needs, support their children's studies, and the desire for life preservation – to keep themselves away from danger for their love ones. The love that exists between the drivers and their family members is one of the factors that pull them to exhibit positive driving behaviors. "Adults in the concept of "Generativity" in the psycho-social stage of development of Erikson face the tasks of being productive in their work and raising their families or otherwise looking for the needs of young people (Shaffer, 2009).

1.3 Educational Attainment

Majority of the driver-respondents have reached High School (39.28 %) and Technical-Vocational (32.14 %) levels, while 10.71% have reached the tertiary level and 17.85% in the Elementary. Despite variations in the level of educational attainment, the data shows that the respondents were able to attend formal education. This enables them to read, interpret and understand traffic signages, advisories and traffic lights necessary in driving. On one hand, it was established from the respondents' statements that educational attainment itself has no major effect on exhibiting positive driving behavior. They strongly believed that discipline and positive attitude matters most for a positive driving behavior than educational attainment. They mentioned that there are individuals who have attained higher level of education or have acquired degrees but are boastful, aggressive, inconsiderate and discourteous in the roads, and are not disciplined enough to follow traffic rules and regulations. This finding contradicts with the study conducted by Mendoza (2004) where her data showed that drivers without college degree have significantly stronger intentions to commit violations relative to college graduates.

1.4 Religious Affiliation

The data shows that the respondents have different religious affiliations such as Catholic (53.57 %), Born Again Christian (17.86 %), Iglesia ni Cristo (14.29 %), and Iglesia ng Dios na Buhay, Mormons, Protestant, Seventh day Adventist with 3.57% each. The religiosity of Filipinos can be reflected from the country's diverse religious beliefs and practices which plays a big part in the Filipino culture (Hallig, 1982). The effect of religious affiliation to driving behavior cannot be established in this study because of the limited representation of each religious sect. However, the data gathered in this variable reflects that the respondents' sense of spirituality or faith seems to have more influence on their driving behavior. Their belief that there is a God who is always there to guide, protect them from danger/accident and care for them is very visible in their responses. They entrust their fate to Him believing that He has the power to control circumstances/events that may happen for the rest of the day including the blessings or earnings they will have from their trips. Other significant information captured from this variable is their unselfishness and concern for others. When praying, they do not only ask favor for themselves but for the safety of their passengers as well. Having a deeply religious self-concept as Christians, the driver-respondents also claimed that they try to live up with the teachings of Christ by being courteous, kind, compassionate and considerate to their passengers and to fellow drivers/motorists, and by being compliant to traffic laws. Accordingly, they exercise these Christian virtues so that God in return will listen to their prayers. In application, being religious is one of the positive characteristics of Filipinos as cited by many research findings (McCann, 2009; Mostajo,2010; Rivera,2007).

1.5 Family Income

The average daily net income of majority of the driver-respondents is Php300-Php400 (39.29 %) while the others have Php500 – Php600 (25.00 %), Php700 – Php800 (17.86 %), Php100 - Php200 (10.71 %), and Php900 – Php1000 (7.14 %). Analyzing their responses related to this variable, the sense of spirituality can also be mirrored as regards their belief of a loving and providential God who grants their wishes and provides what they need. That God even directs them where to pass and the right timing when to get more passengers so that they will earn more even without running speedily to compete with other drivers. For them, they need not to race with the other drivers to catch more passengers because it is God who provides passengers for better earnings in a day. They train their children not to be luxurious and to be satisfied with what they have at the moment and for the family to spend only for their basic needs, health, and education. Being frugal is a Filipino trait listed in the summary provided by Church and Katigbak (2000) in their research.

2. The characteristics of the driver-respondents that may have prevented them from causing vehicular accidents and/or traffic related incidents.

Table 1 **The assimilated positive traits and behaviors of the jeepney driver participants.**

Extent of the Implementation of PCR	Interpretation
PERSONALITY DIMENSIONS	DRIVERS' POSITIVE TRAITS
CONSCIENTIOUSNESS (pagpapahalaga sa kaayusan)	not a risk-taker, self-disciplined, being orderly, compliant, cautious, responsible, perseverant, diligent, health conscious
PERCEPTIVENESS (pag-unawa sa mga pangyayari)	ability to anticipate, focused, observant, has presence of mind, has positive outlook, alert, reflective/insightful, ability to cognitively restructure
AGREEABLENESS (pakikipagkapwa-tao)	values smooth interpersonal relationship, helpful, compassionate, considerate, caring, loving, patient, non-confrontational, with sense of humor, emotionally-controlled
SPIRITUALITY (pagka-mapanampalataya)	has strong faith, has trust in God, religious, hopeful

Inspired by the big five personality traits by McCrae and Costa (Armstrong, 2012) and the study conducted by Church and Katigbak (2000) regarding Filipino personality, the positive characteristics of the driver-respondents assimilated into four personality dimensions such as conscientiousness (pagpapahalaga sa kaayusan), perceptiveness (pag-unawa sa mga pangyayari), agreeableness (pakikipagkapwa-tao) and spirituality (pagka-mapanampalataya) are presented in Table 1 specifically translated in the Filipino language. The various positive traits manifested by the drivers assimilated to form the themes are specified across the personality dimension as shown in the same table.

2.1 Conscientiousness (pagpapahalaga sa kaayusan). This dimension reflects attitudinal characteristics that refer to the jeepney drivers' trait of having deep concern for order and discipline manifested through specific traits listed in Table 1. It consistently appeared in their significant statements that they tend to be very careful in driving and in making decisions to prevent accidents and/or any discomforts. It also appeared that the participants are non-risk-takers leading them to be cautious in their driving behaviors. As a result, they tend not to be reckless and not to over-speed even when other drivers do to catch more passengers ahead of the road. The non-risk-taking behavior of the jeepney driver participants is similar to the findings of the study conducted by Mendoza (2004)

When it comes to being orderly, compliant and disciplined, the drivers' significant statements show that they are obedient in following traffic rules and very cautious in observing traffic signs and lights. These traits are tested and manifested in incidents where they are tempted to beat the red light, to counter-flow during traffic, to swerve to overtake, to suddenly stop when a passenger asked to be dropped-off or to get on board, to obstruct while waiting for passengers, and the like. When asked about "drinking when driving", all of the respondents confirmed that this can cause car accident. Majority of them are non-alcohol drinkers and very few are occasional drinkers. In support to this result, Church and Katigbak (2000) in their research review concluded self-discipline as one of the observable Filipino traits.

Furthermore, the respondents seemed to be conscious with their health and hygiene with a perspective that being healthy and feeling fresh while working have an influence over ones thoughts and feelings. For them, uncomfortable feelings due to illness affect driving behavior and decision making. They cited the need to have enough rest and sleep at night for the next day's hard work and to take a bath before leaving for work to feel fresh and clean. This finding again conforms with the study of Church and Katigbak (2000) as they mentioned being clean and neat as a Filipino trait.

Conscientiousness maybe interpreted and analyzed in Julian Rotter's internal locus of control. He theorized that internally controlled individuals assume that their behaviors and actions are responsible for the consequences that happen to them (Engler, 2009). The drivers assume that the kind of driving behavior and decision they make can lead to either safety or mishaps. In such case, they try their best to have control over their decisions and actions in order to prevent unfavorable incidents in the roads.

2.2 Perceptiveness (pag-unawa sa mga pangyayari). This attribute as another personality dimension refers to the drivers' ability to cognitively process events, circumstances and challenges positively in order to manifest favorable driving behavior shown through characteristics listed in Table 1 across this personality dimension. They manifest the ability to foresee what may happen as a consequence of a wrong decision, behavior or action. For the respondents, being careful, focused, observant and alert while driving is very vital to avoid accidents and violations to traffic laws. They recognized the following practices needed to be observed in order to prevent mishaps: anticipating pedestrians who would suddenly and carelessly cross the streets; watchful with vehicles that instantly swerve and make inappropriate movements; staying on ones lane; focusing ones attention with the movements of other vehicles for immediate action and decision; being alert using your senses of sight and hearing; and glancing at the rear mirror and side mirrors for a wider vision in observing the environment. Again, the research conducted by Church and Katigbak (2000) had the same findings as they quoted that Filipinos are conscious with one's environment and has foresight.

Other traits exhibited for perceptiveness are having positive outlook, and ability to restructure unfavorable thoughts. For instance, they tend to be hopeful for a better trip on the next schedule or on the following day when they do not have enough passengers instead of allowing the situation affect their thoughts and feelings. They also have creative ways to cope with traffic situations and changes in weather condition from a very hot summer to cold and rainy days. Understanding this behavior in a psychological perspective, Adler's theory on individual psychology states that every individual possesses positive characteristics and abilities from which they draw power to creatively shape their personality, life style and future known as the creative power of the self (Feist & Feist, 2003). The innate creativity of the self makes every individual genuine and resourceful in handling positive and negative events in his/her life in order to survive. In application, the driver participants utilize several creative ways in dealing with events and challenges in their lives while working to prevent unfavorable circumstances that may eventually happen from a bad mood or wrong decisions. Mostajo (2010) concluded in her study that "creative coping" is one of the protective factors of Filipino children to survive adversities they encounter.

Another specific trait they manifest for perceptiveness is being insightful. The drivers tend to reflect on and avoid previous cases of accidents and other traffic related incidents by taking them as learning experiences. Bandura with his cognitive social learning theory emphasized on the individual's learning that results from observing the behavior of others which he called model arguing that the person attends carefully to the model's behavior, actively digests, or encodes, what he observes, and then store this information to memory (Shaffer, 2009; Feist & Feist, 2003). In the respondents' case, the behavior being observed and stored in their memory are the accidents they witnessed or the negative driving behaviors of other drivers that lead to accidents or apprehensions by law enforcers due to the violations committed.

2.3 Agreeableness (pakikipagkapwa-tao). This, as another personality dimension, refers to the innate favorable interpersonal characteristics and behaviors of the jeepney drivers in relating with people (family members, fellow drivers, passengers and pedestrians). The respondents of this study exhibit agreeableness by valuing smooth interpersonal relationship called "pakikisama" accompanied by other traits like being loving, caring, helpful, humble, patient, understanding, compassionate, emotionally-controlled, non-confrontational, and sense of humor. As commonly observed, the "pakikipagkapwa-tao" of Filipino drivers is manifested in several circumstances like willingness to extend help to other drivers whenever the situation calls for it. This pro-social behavior of sharing and helping of the drivers is a sign of altruism, an agreeable character to show concern for the welfare of others that is intrinsically motivated (Shaffer, et.al, 2009). The Filipino character of agreeableness as one of the findings of the current research is supported by McCann (2009) when she mentioned pakikipagkapwa (being kind to fellowmen), matiisin (longsuffering), and matiyaga (persevering) as Filipino attributes.

Being emotionally-controlled and having sense of humor are of great help in maintaining positive driving behavior because it helps the driver manage their emotional reaction towards circumstances. They become more patient and non-confrontational in handling unfavorable attitudes and behaviors of fellow drivers and passengers. Moreover, they exhibit sense of humor by showing the ability to laugh at unfavorable attitudes of others or to view events lighter instead of reacting negatively to them. The drivers' ability to control their emotions can be explained by the theory on emotional competence wherein emotional self-regulation is one of its elements – the capacity to control emotions and to adjust emotional arousal to an appropriate level of intensity to achieve one's aims. It involves the ability to manage our feelings, our physiological reactions associated with these feelings, our emotion-related cognitions, and our emotion-related behaviors (Shaffer, 2009). Sense of humor to cope with challenges as Filipino trait is the same as the findings of Mostajo (2010) and Church & Katigbak (2000).

Agreeableness can be associated to the concept of Erich Fromm on relatedness when he conceptualized that humans have five basic needs to meet in order to develop fully and one of these is to relate with other people and to love productively (Engler, 2009).

2.4. Sense of Spirituality (pagka-mapanampalataya). This personality dimension refers to the driver-respondents' belief of the presence of a God whom they can lean on and ask for guidance, care, safety, protection and blessings. This is expressed through their faith, trust in God, hopefulness, and religious practices. Spirituality elicits positive driving behavior in a way that the drivers try to live up with what they believe is righteous in the eyes of the Almighty like being obedient with the traffic rules and regulations, being patient and understanding in dealing with passengers and other drivers and motorists who seem to create conflict with them, and being compassionate with passengers who do not have enough money for their fare. The driver-respondents expressed their faith by citing a short prayer before going out for work and upon arriving home from a hard day's work to show gratitude to God for listening to their plea. Religiously speaking, faith according to Hebrews 11:1 is the substance of things hoped for, and the evidence of things not seen. It is an act of believing and holding on to something you do not literally see and touch, yet you believe its presence and you hope for its fulfillment (Mostajo, 2010).

In a psychological analysis, this trait can be explained through Julian Rotter's theory on Locus of Control – the extent to which a person believes that reinforcements are controlled by his/her own behavior or by people or outside forces such as luck or fate (Engler, 2009). He furthered that externally controlled people believe that control is out of their hands. External locus of control is somewhat relevant to the spirituality of the driver participants when it come to their fate when going out of their homes to work. Spirituality is a Filipino character that has been concluded in many researches (Mostajo, 2010; Abregana & Udarbe in McCann,2009; & Rivera & Villa, 2007)

3. Implications of driving behaviors of Public Utility Vehicle drivers to student-commuters

The student-commuters focused their responses on the poor driving behavior and attitude of PUV drivers and perceived several implications of these behaviors on their psycho-emotional and psycho-moral/spiritual well-being. For them, riding on a PUV driven by somebody with poor driving behavior could create fear/anxiety, irritability and unfavorable impact on values and perspectives.

Among the different personality factors, it is the emotional aspect that was identified by all of the student-respondents to have negative implications on them. For instance, as regards safety, they fear of being hurt and/or of losing one's life if they meet an accident due to the drivers' recklessness – over speeding, swerving, cutting other vehicles, sudden stopping of the vehicle and the like. These drivers according to them are inconsiderate of the passengers' feelings and safety. The student-respondents also fear that they might experience verbal abuse due to discourteous, argumentative, and ill-mannered drivers which may bring them the possibility of getting into or may get involved into trouble. They mentioned that there are drivers who speak in a loud-scary manner when asking for their fare even if they have already paid. This circumstance according to the students frightens them and sometimes tempts them to shout back. Additionally, they also fear of being victimized of dishonesty by the driver regarding the amount they have to pay and the change they should actually receive from their bills. Accordingly, there are jeepney drivers who pretend not to hear them when they ask for the change which is very irritating and disappointing to the students. Likewise, the students also mentioned of getting irritated when trapped in a heavy traffic caused by undisciplined drivers which eventually affects their mood for the rest of the day.

In relation to school performance, the student-commuters fear the implication of the jeepney drivers' unfavorable driving behavior to their punctuality and/or attendance. Some of them said that there were instances when they were late and/or marked absent in class due to traffic or accident caused by careless drivers, or because the driver of the PUV they are riding with was apprehended by a traffic law enforcer due to traffic violation. These incidents had forced them to walk hurriedly, run, and contend with other passengers to look for another PUV ahead of the road just to be in school on time. Moreover, they also mentioned instances where the PUV driver drives unpleasantly and slowly because he stops in every corner or place where he saw potential passengers even if no one is stopping him. The worst implication, according to them, is the fear of receiving low/failing mark in class due to excessive tardiness/absences.

Furthermore, an unfavorable implication on values formation was also recognized in the spirit of social modeling. The poor driving behavior may be interpreted positively or imitated by the minor-student believing that it is alright to violate traffic rules as long as you will not be caught and you will reach your destination on time. Some of the student-respondents mentioned that they like it when the PUV driver is driving speedily or beating the red light especially in the morning when they are already late in school or to their appointment. Bandura conceptualized in the cognitive social learning theory that individual's learning may result from observing the behavior of others called model – where the person carefully attends to the model's behavior, encodes what he observes, and store this information to memory (Shaffer, 2009; Feist & Feist, 2003).

Considering the possibility of having more foreign nationals to avail of Philippine education by 2015, there is a probability that foreign students who will encounter PUV drivers with poor attitude and driving behavior will acquire the concept of generalization in learning. The foreign students may cognitively create an impression/thought that all Filipino drivers have poor habits and unfavorable driving behaviors which may restrain them from using PUVs as mode of transport.

In summary, the following thoughts have been identified by student-commuters as implications of poor driving behavior of PUV drivers: (a) fear/anxiety; (b) irritability; (c) misguidance on values formation; (d) generalization; and (e) negative effect on academic performance.

4. Program to develop and enhance PUV drivers' positive traits to exhibit positive driving behavior.

The following recommended programs/activities are aligned with the personality dimensions conceptualized from the results. These programs shall be endorsed to the respective heads of government units or institutions concerned for support and implementation. Non-government organizations may also be tapped to help in the realization of the research proposal's goal. Some of the recommended activities in the program are intended to be carried out in the jeepney terminals to turn the waiting and idle time of the drivers to a productive one. The end goal of the program is to improve the traffic condition in the province of Cavite through modification of jeepney drivers' "driving behavior" so that students using PUVs as primary mode of transport will not be deterred from patronizing it. .

According to many behaviorists, behavior can be shaped by using different techniques like positive and negative reinforcement, conditioning, and modeling (Skinner, Pavlov & Bandura in Feldman, 2008). In application, B.F. Skinner's concept on behavior modification through reinforcement can be relevant to reforming a positive driving behavior from a negative one. For instance, awareness of jeepney drivers with the possible adverse effects/consequences of a car accident as a result of exhibiting negative driving behavior like recklessness and carelessness shown through audio-visual presentations can increase the probability for the jeepney driver to change his driving behavior with a positive one like being more careful among others to avoid and/or prevent the unfavorable experience. Cognitively, the driver would have a clearer vision and anticipation of what may happen which will eventually reform his behavior. In addition, this research recommends inclusion of internal processes like self-awareness and spirituality to modify driving behavior. Being aware of their positive traits and understanding its effect on their behavior would develop confidence in them which may eventually reinforce their positive driving behaviors. In support, the studies conducted by several researchers quoted the importance of modifying driver's behavior to improve traffic condition (Tadeo, 2009; Senserrick, et.al, 2009; & Mendoza, 2004).

4.1 For Conscientiousness

- 4.1.1 Provision of psychological rewards to motivate the PUV drivers to practice positive driving behavior.
- 4.1.2 Facilitation of knowledge acquisition though lectures or workshops related to self-awareness to gain understanding of one's personality traits and behavior; self-care to promote physical and psychological wellness; updates on technical-mechanical functions; and reorientation of traffic rules and defensive driving.
- 4.1.3 Provision and/or installation, monitoring, and maintenance of applicable traffic signages in strategic areas.
- 4.1.4 Wider installation of traffic technological devices in strategic places for a more systematic traffic management system.

4.2 For Perceptiveness

- 4.2.1 Inclusion of topics on responsible driving and other traffic related concerns in the syllabus of applicable courses/subjects in the basic and tertiary levels of education and/or classroom-based activities for awareness and for shaping of behavior.
- 4.2.2 Awareness campaign through campaign materials and advertisements regarding effects of positive driving behavior against negative driving behavior such as audio-visual presentation of accidents and traffic violations played in television networks, Land Transportation Offices and other

government agencies concerned.

4.3 For Agreeableness

4.3.1 Strengthening of Values and Formation Program applicable to driving behavior.

4.3.2 Seminar/Workshop to develop and enhance interpersonal skill such as Assertiveness Training, Social Skills Enhancement Program and Anger Management Activities.

4.4 For Spirituality

4.4.1 Facilitation of Spiritual Enrichment activities such as Guided Bible Studies and Guided Verse Refection and Sharing.

REFERENCES

Armstrong, (2012) Armstrong, M. (2012) Armstrong's handbook of human resource management practice, 12th ed. London: Kogan Page.

Burger, Jerry M. (2004) Personality 6th ed. USA: Wadsworth Thomson Learning, Inc.

Church, A.T. and Katigbak, M.S. (2000) Filipino personality: indigenous and cross-cultural studies. Manila: De La Salle University Press, Inc.

Clements, Mahin & Cohen, L.P.A., Co. (2010) Cincinnati car accidents: most common causes of automobile accidents. Retrieved on April 27, 2010 from http://www.cmclawyers.com/aop/Cincinnati-car-accidents/

Dieseruvwe, S. (2010) Traffic and Safety Guidelines: What causes traffic accidents. Retrieved on March 23, 2010 from http://www.smartmotorist.com/

Engler, Barbara (2009) Personality theories, 8th edition. California: Wadsworth, Cengage Learning.

Feist, J. and Feist, G.J. (2003) Theories of personality, 5th ed. New York: McGraw-Hill.

Feldman, R.S. (2008) Understanding psychology, 8th ed. USA: McGrawHill.

Frisman, Paul (2010) Teen driving behavior. Retrieved on March 27,2012 from http://cga.ct.gov/2010/rpt/2010-R-0353.htm

Hallig, J.V. (1982) Communicating holiness to the Filipinos: challenges and needs, the path to a Filipino theology of holiness. Retrieved on April 27, 2012 from didache.nazarene.org

Hingson, R. & Winter, M. (2003) Epidemiology and consequences of drinking and driving.

National Institute of Alcohol Abuse and Alcoholism. Retrieved on March 27, 2012 from http://pubs.niaaa.nih.gov/publications/arh27-1/63-78.htm

Hurlock, E.B. (1982) Developmental psychology: a life-span approach, 5th ed. NY: McGraw-Hill Co.

International Injury & Fatality Statistics. (2009). Retrieved on August 30, 2012 at http://www.safecarguide.com

McCann, B.C. (2009) Staying alive: Highlighting strengths of the Filipino character, a keynote speech at the 46th Annual Convention of the Psychological Association of the Philippines, Dumaguete, August 13-15, 2009.

McCann, D.P. (2009) Are we having fun yet? Reflections on certain character strengths observed among Filipina Foreign Domestic Helpers (OFWs) living and working in Hong Kong. Paper presented at the 46th Annual Convention of the Psychological Association of the Philippines, Dumaguete, August 13-15, 2009.

Mendoza, A.C. (2004) Application of psychology to the understanding and modification of road user behavior. Retreived on April 27, 2012 from www.aaphilippines.org/roadsafety/files/psychology.pdf.

Mostajo, S.T. (2010) Protective factors among Filipino female young adolescent survivors of sexual abuse. Philippine Association for Graduate Education Region IV-A Journal. ISSN 20946139 Vol.1 No.1, August 2010.

Rivera, A.C. & Villa, N.A. (2007) "iCANCERvive" implication of the support system to cancer survivors' resiliency. De La Salle University-Dasmarinas

Ryckman, R.M. (2008) Theories of personality 9th edition. USA: Thomson Wadsworth.

Senserrick, T. et al., (2009) Young driver education programs that build resilience have potential to reduce road crashes. Pediatrics Vol. 124, No. 5, pp1287-1292. Published on-line on October 5, 2009. Retrieved on April 27, 2010 from http://pediatrics.aappublications.org/cgi/content/abstract/124/5/1287.

Shaffer, D. R. (2009) Social and personality development 6th ed. CA: Wadsworth Cengage Learning.

Tadeo, A. (2009) Common reasons why drivers commit traffic violations. Retrieved on April 27, 2010 from http://www.associatedcontent.com/article/2171157/common_reasons_why_driv...

The NHTSA 2012 statistical abstract: vehicles involved in crashes. Retrieved on August 30, 2012 at www.census.gov

The Holy Bible. Philippine Bible Society

http://www.gmanews.tv/story/92355/. Retrieved on April 23, 2010

The Impact of Police Community Relations to Policy Formulation in DLSU-D

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ABSTRACT

One of the main concerns and responsibilities of any educational institution is the safety and security of its students, not only inside the school premises but also outside of it. If schools would like to expand their enrollment not only among local students but also foreign ones, the school administrators should make their campus a very safe one.

Normally, school administrators can ensure the safety and security of their students inside their campus by the formulation of policies and provision of facilities for this purpose. But how can schools like DLSU-D guarantee their students' safety outside of the school gates?

This question prompted the researcher to determine how police-community relations (PCR) can be utilized by schools like DLSU-D in improving its policies on safety and security. This descriptive research made use of a survey questionnaire to identify the practices in PCR that DLSU-D can incorporate in its school policies for the welfare of its students.

Results of the survey showed that the police officers maintain constant communication with the community and increase police visibility to minimize and/or prevent crimes especially near the schools. DLSU-D can now include in its policy on safety and security the orientation of students, especially the foreign ones, on police policies. Regular meeting with the police officers to discuss the proper ways on addressing crimes, among others, can also be scheduled within the school year.

Keywords: **Safety and Security, Police community Relations**

Introduction

A nation needs a protector from any threats, the lives of its people should be preserved, and their rights and beliefs should be protected. Nowadays, terrorism and coercion from the so-called "outside forces" are much unbridled. These outside forces are the different groups of criminals who have their own way of earning the negative way of living and threatening the security of the nation. Crimes committed by these groups of people are one of the main problems of the Philippines and other nations in the world. As a response to these problems, the law enforcement agencies developed different plans and programs to address these needs with the help of the community through its continuous cooperation. The Philippine National Police (PNP) has developed and implemented different programs and activities through their Police- Community Relations (PCR) and has persuaded support from the community.

Dausan (2009) states what Pace believes that understanding the over-all crime prevention, crime suppression, and the limitations of the criminal justice system are needed to understand the complexity of community relation. Relating the purpose of community relations to the contemporary culture and crime is necessary to glimpse the need for improved community relations. Furthermore, he defines community relations as “the total effort of the criminal justice to become a part of the community” (p.5). The factors that contribute to the police community relations as a whole are human interaction, human relation, community crime prevention, community interaction and public relations. Citizen, components of the criminal justice system and different institutions especially the school, should support and cooperate with each other to confront crime.

Community partnerships should begin particularly in school, which is composed of groups of people like students, teachers, staff and administrators within its area of learning. These groups of people play a vital role in establishing partnerships between the school and the police. Both should play on the same team and police visibility is a positive pointer that they are giving guarantee that the schools are safe and conducive to learning.

Presidential Decree 603 states that the child is the most important asset of the nation. Every effort should be exerted to promote his welfare and enhance opportunities for a useful life. The molding of the character of the child starts at home and other institutions like the school, church, the guild, and the community in general. They should assist the home and the state in the endeavor to prepare the child for the responsibilities of adulthood.

Different sectors and institutions especially the schools are important in helping the country to build a strong foundation and solidity of the future of the children. Furthermore, provincial and national government officials shall see to it that school children and students are provided with adequate school rooms and facilities. Such officials should also see to it that the school environment is free from hazards to the health and safety of the students (Art. 45, PD 603). In the matter of safety and security situation, children’s education can be affected by crime and violence inside and outside of the school. To prevent this obstacle, the school should realize the value of maintaining good community relations, especially with the law enforcement agencies.

According to Pace (2007), mutual trust, cooperation and support of the community and the criminal justice agents are considered as a complex process. The justification of developing good community relations can be best understood from the programs and activities developed and implemented by the community and the police. The police should gain the confidence of the members of the community for them to be able to work hand-in-hand to battle the threats in the society. Support, cooperation and coordination from the different sectors especially the government, school officials and others are necessary in order to solve the problems.

In the same light, McCamey, et al. (2003) mention that the encounters between the police and other citizens can become problematic depending on the number of factors which include the impressions of both the police and the community that are brought to the encounter. Encounter settings (private or public, familiar or unfamiliar), number and types of participants involved, the degree of control exercised by the participants, and what actually happens during the encounter are some contributory factors that make the encounter of the police and the citizens to become problematic. Moreover, police community relations are composed of two components, the human relation and public relation. Reiss (as cited in the work of McCamey, et al., 2003, p.201) believes that “it is possible to exaggerate the difficulties involved in police encounters with other citizens. Most encounters are civil, characterized by some degree of mutual concern, understanding, and respect.” The efforts on behalf of the police to develop and present favorable image consists the public relation component.

In addition, Miller and Hess (2002) reveal that police should actively engage the community in problem solving to develop the community partnerships. Community partnerships and problem solving are the two core components of community policing. Sir Robert Peel (as cited in the work of Miller & Hess, 2002, p.481) believes that in modern policing, community support and participation is important to the police work for them to be effective. He further states that "to maintain at all times a relationship with the public that gives reality to the historic tradition that the police are the public and the public are the police; the police being the only members of the public that are paid to give full-time attention to the duties that are incumbent on every citizen in the interest of the common welfare and existence."

Police-Community Relations is a concept and philosophy of the police designed to have a good and true relationship between the police and the community. These two important components of the society should work together to control, prevent crime, and eliminate threats in the security of everyone. Police becomes a part and member of the community by having an actual interface with society. Having a high crime rate and crime volume affects not only the safety of the members of the community but as well as the economic growth of a country and the future of the children.

With the emergence of the concept of ASEAN Economic Community in 2015, there is a possibility that foreign students will be flocking the Philippine schools since education is much cheaper in the country. In this relation, Philippine colleges and universities should present a safe and secured environment for these students so that their families will allow them to stay in the country and earn their degrees here. De La Salle University-Dasmarinas, being one of the leading higher education institutions in Region IV-A, should be ready to accept more foreign students. It should ensure that its campus is safe and secure. This prompted the researcher to do this research to determine how PCR can be utilized by DLSU-D in improving its policies on safety and security.

Conceptual Framework

The study was guided by the Input, Process, and Output (IPO) model.

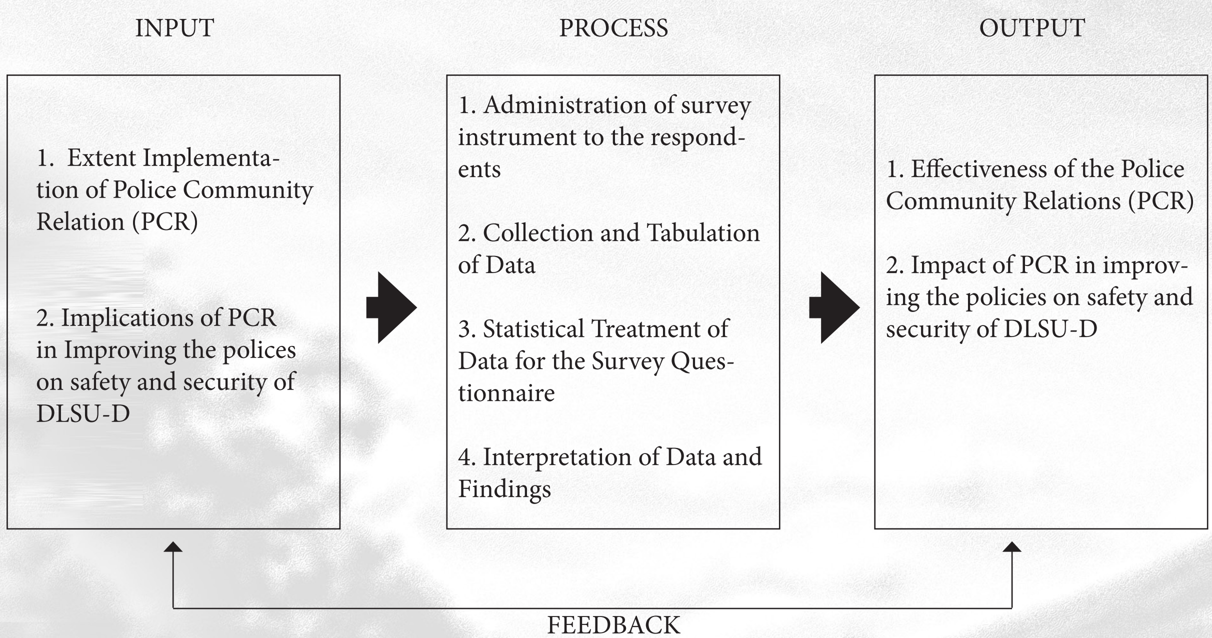

Figure1. **The Conceptual Paradigm of the Study**

As presented in Figure 1, the INPUT focuses on the extent of the implementation of the police-community relation and the implication of PCR in improving the policies on safety and security of DLSU-D. The PROCESS presents the administration of the survey instruments among the respondents; the collection and the tabulation of data; the statistical treatment of data; and the interpretation of data and findings. Meanwhile, the OUTPUT shows the results of the study with regard to the effectiveness of PCR and its impact in improving the policies on safety and security of DLSU-D.

Statement of the Problem

The study determined determine how effective is the police-community relations (PCR) and how can it be utilized by DLSU-D in improving its policies on safety and security.

Specifically, it sought to answer the following questions:

1. What is the extent implementation of Police Community Relations (PCR) as regards the following areas:
   1.1 Building citizens-police partnership;
   1.2 Police adequate response to complaints in the community;
   1.3 Decentralization of police decision making; and
   1.4 Restructuring of police training and education?

2. What is the impact of the result that can be utilized by DLSU-D in improving its policies on safety and security?

Methodology

The study used the descriptive method of research to determine the effectiveness of PCR and how it can be utilized by DLSU-D in improving its policies on safety and security.

The effectiveness of the PCR in District II of Cavite, consisting of Trece Martires City and the municipalities of Imus, Dasmariñas, Carmona, General Trias, Tanza and General Mariano Alvarez was determined through a survey questionnaire answered by community members (students, teachers, barangay and Sanguniang Kabataan officials, professionals and other residents), and police officers, both commissioned and non-commissioned. Four hundred community members and 96 police officers for a total of 496 respondents participated in the study.

Percentage and weighted mean were the statistical instruments used to analyze and interpret the data. Percentage was computed to obtain the relationship of the demographic profiles of each respondent with the total population. On the other hand, weighted mean was computed for the extent of implementation of PCR.

Results and Discussion

The results of the study are presented as follows:

Table 1: Extent of Implementation of PCR According to the Community Respondents as Regards Building Citizens-Police Partnership

Extent of the Implementation of PCR	Mean	Interpretation
Q 1. The PNP (Philippine National Police) is conducting lectures and seminars in barangays And schools regarding the ways on how to eradicate or fight criminalities.	3.2875	Seldom Implemented
Q 2. The PNP is posting and releasing notices pertaining to their crime prevention and PCR programs in the community.	3.4025	Seldom Implemented
Q 3. The PNP is giving the community a knowledge and information pertaining the new laws, rules and ordinances.	3.4450	Often Implemented
Q 4. The PNP conducts programs to build and enhance the good relationship of the police and the community.	3.4975	Often Implemented
Q 5. The PNP helps in resolving problems in every barangay or community.	3.58	Often Implemented
Q 6. The PNP is active in coordinating with the citizens and officals of barangay to know the problems/concerns in the Community	3.6500	Often Implemented
TOTAL	3.4778	Often Implemented

This implies that police community relation on building citizens-police partnership is observed by the community respondents as often implemented. The respondents are aware that the PCR officers are responsible enough in implementing their projects and activities by building a strong citizens-police partnerships.

Table 2: **Extent of Implementation of PCR According to the Community Respondents as Regards Police Adequate Response to Complaints in the Community**

Extent of the Implementation of PCR	Mean	Interpretation
Q 7. The PNP entertain the comments, opinions and suggestions of the community pertaining to the ways on eradicating or fight the criminalities.	3.60	Often Implemented
Q 8. The PNP responds and give solutions in the problems and concerns of the citizens.	3.61	Often Implemented
Q 9. The PNP serves the community very well, by providing quality service.	3.63	Often Implemented
Q 10. The PNP help the citizens in settling and resolving the Problems in the barangay or community.	3.8250	Often Implemented
TOTAL	3.663	Often Implemented

This implies that Police Community officers communicate with the community by regular meeting and implementing projects towards harmonious relationships and maintenance of peace and order in District II of the Province of Cavite.

Table 3: **Extent of Implementation of PCR According to the Police Respondents as Regards Building Citizens-Police Partnership**

Extent of the Implementation of PCR	Mean	Interpretation
Q 1. Police communicate the philosophy and concepts of PCR through open forum, personal and news media or citizen's meetings.	4.6250	Fully Implemented
Q 2. Police discuss with the citizens what are the PNP plans and programs for a specific time and date.	4.4167	Fully Implemented
Q 3. Police officers involved the elected barangay and local officials in the formulation and implementation of PCR programs and activities.	4.4687	Fully Implemented
Q 4. At all organizational levels police participate in two-way communication with citizens and community leaders.	4.5000	Fully Implemented
Q 5. All police personnel commit themselves for the implementation and success of PCR.	4.4479	Fully Implemented
Q 10. Police Community Relation Officer socialize or interact with the community to gather information for the planning of PCR programs.	4.5417	Fully Implemented
Q 12. Police officers coordinate with the other agencies with regards to PCR activities.	4.5833	Fully Implemented
Total	4.5119	Fully Implemented

It can be gleaned from the table that the police-respondents considered building citizens-police partnership as fully-implemented and supported by the mean of 4.5119. It is important to note that the perception of the police-respondents is contrary to the perception of the community-respondents. The former perceived this aspect as fully implemented while the latter is only often implemented.

Table 4: **Extent of Implementation of PCR According to the Police Respondents as Regards Police Adequate Response to Complaints in the Community**

Extent of the Implementation of PCR	Mean	Interpretation
Q 20. Police officers are open-minded to any problem that involves the relationship between the community and the police to immediately respond and formulate a solution.	4.7083	Fully Implemented
Total	4.7083	Fully Implemented

This suggests that there is a sufficient response to the needs of having an answer to every problem regarding peace and order in the community; and as civilian in character, police are approachable and a public servant that you can lean on.

Table 5: **Extent of Implementation of PCR According to the Police Respondents as Regards Decentralization of Police Decision-Making**

Extent of the Implementation of PCR	Mean	Interpretation
Q 6. Chief of police practice and emphasize broad-based participation in policy making.	4.4896	Fully Implemented
Q 7. Police officer consider the comments and suggestions of the public officials in the planning of programs and activities.	4.5417	Fully Implemented
Q 8.The group formulating the programs are composed both PCO and PNCO.	4.4271	Fully Implemented
Q 9. Police identifies the needs in the implementation of PCR plans and programs.	4.4896	Fully Implemented
Q 11. Police Community Relation Officer use the available data and information as basis for the formulation of PRC plans and programs.	4.4792	Fully Implemented
Q 13. Chief of Police decides on what plans and programs for PCR should be implemented in his area of concerned.	4.3438	Fully Implemented
Q 16. Chief of police identify the problems in PCR to come up the solution for the enhancement of the organizational policy and training of the officer.	4.4167	Fully Implemented
Q 17. Police officers are required by the chief of police to undergo a series of seminars or schooling that will help in the improvement of all aspects of PCR.	4.2813	Fully Implemented
Q 18. Chief of Police assigned police officers who are experienced in dealing with the community.	4.3333	Fully Implemented
Q 19. Police officer welcome the comments, opinion, and suggestions of the community and use it as basis for the formulation of organizational policies, methods and procedures.	4.6562	Fully Implemented
TOTAL	4.4458	Fully Implemented

This suggests that the police are closely coordinating with the community, and the programs and activities are based on the needs of their area of responsibility. Also, the voice of the community is being heard and considered in the formulation of a valuable scheme towards a peaceful community.

Table 6: **Extent of Implementation of PCR According to the Police Respondents as Regards Restructuring of Police Training and Education**

Extent of the Implementation of PCR	Mean	Interpretation
Q 14. The police and the community officials meet or attend seminars to come up PCR programs suited to the needs of the community.	4.5104	Fully Implemented
Q 15. Police officers are given seminar to enhance their inter-personal and intra-personal relationships.	4.4687	Fully Implemented
TOTAL	4.4896	Fully Implemented

Impact of the Results to DLSU-D

The result of the survey can be utilized by DLSU-D in improving its policies on safety and security. It is evident that community and the police should work closely.

Moreover, the findings of the study revealed that the extent of implementation of PCR plays a very important role in preserving and maintaining peace and order in the community. A better partnership and open communication between the law enforcement agencies and community members (students, teachers, barangay and Sanguniang Kabataan officials, professionals and other residents) can eradicate and prevent the occurrence of crime. The reality of lack of manpower of the PNP can be solved and can be sustained by tapping the barangay officials and the citizens to work hand-in-hand to fight criminality. Police and citizens are both two important components of the society/community, with regard to ensuring the safety and peace in the community, the former and the latter are both responsible for this matter. The PNP is providing programs and activities to fight the criminality, and they reach out for the help of the community through the Police Community Relation Activities. On the part of the community, they are encouraged by the PNP to report all the crime incidents and suspicious activities in their area for the PNP to do necessary actions. And on the other hand, the community wanted to be understood and heard by the PNP. To bridge the gap between the police and community, PCR Program is designed for the benefit of both groups.

DLSU-D can utilize the results of this study in improving the safety and security policies of the campus such as:

1. Provide a place in the campus where they can post or release new laws, crime prevention tips and other ordinances.
2. Formulate safety and security activities including sponsorship with the police personnel.
3. Include police personnel as official members of the safety and security council.
4. Provide venue for the seminars, workshop or forum that will be facilitated by the police officers.
5. Continue to offer continuing education for the police officers.
6. Help in the sponsorship of the activities

Also both the schools and the police can help in preparing a more active and productive youth. Family, school administrators, staff and faculty should work towards one goal by helping the law enforcers to maintain the peace and order of the community. Other government agencies can make their services accessible to the family especially the youth by linking with schools and universities to reach out them and have a better impact to the safety and security of the hope of the nation, the youth. Effective partnership and teamwork are some of the vital factors to community development, learning and family self-sufficiency.

Partnerships should be considered as connections between the police and the community especially the schools or university. The partnership may involve the use of DLSD-D facilities and equipment; sharing other resources; collaborative fund raising and grant applications; volunteer assistance; mentoring and training from professionals and others with special expertise; information sharing and dissemination; networking; recognition and public relations; shared responsibility for planning, implementation and evaluation of programs and services; expanding opportunities for internships, jobs, recreation and building a sense of community.

School-community partnerships can interconnect together many resources and strategies to enhance communities that support all youth and their families. They could improve schools, strengthen neighborhoods and lead to a noticeable reduction in young people's problems. Building such partnerships requires visioning, strategic planning, creative leadership and new multifaceted roles for professionals who work in schools and communities.

Conclusion

Based on the findings of the study, the following conclusions were drawn:

1. Through the extent of implementation of PCR in the District II of the Province of Cavite, more crimes were solved. Public servants do their best to prevent and control crime by balancing their rapport to the community
2. The Police Community Relation programs and activities are fully implemented in District II of the province of Cavite through the effort given by the police and community. With this relationship, a more peaceful and well-ordered community is being observed. The policemen are responding to the needs of the community vis-à-vis the goal of building a peaceful nation.
3. Full implementation of the Police Community relation has a major role in the improvement of the crime prevention and control as the responsibility of the Cavite police and the community.
4. DLSU-D can use the results of this study in improving its policies on safety and security.

Recommendations

Based on the findings and conclusions, the following recommendations are made:

1. PNP with the coordination of the community should formulate strategic solutions or options that can directly eliminate or eradicate and prevent the number of crimes or socially related problems.
2. Schools or universities should help in organizing a forum as an instrument for the information drive regarding the intensification of the police community relation, and to increase the consciousness of the people regarding criminality.
3. As part of the curriculum, a comprehensive and improved program for the youth to engage, learn opportunities and to create a strong sense of community among leaders, parents and students should be included. In addition, Public Safety courses should be given at least 6 units of this endeavor.

REFERENCES

Dausan, A., Cueto, A., and Buena, E. (2009) Police community relations in the province of Cavite: an assessment

Florendo, Adelene (2008) Revised Police Ethics and Police Community Relations, (Quezon City, Philippines)

Mayhall, Pamela (1998). Police community relation and the administration of justice: 4th edition. Eaglewood Cliffs, New Jersey: Prentice Hall

Miller, Linda & Hess, K. (2002). The police in the community: strategies for the 21st century, 3rd edition. Belmont, California: Wadsworth,c2002

National Police Agency Government of Japan (1991). White Paper on Police 1991 (Japan, 1991)

Pace, (1991). Community relations concepts: human relations, race relations, ethnic group relations and community relations for criminal justice Placerville, Calif. : Custom Pub., c1991.

Preventing Crime:Citizens' Experience Across the world by Anna Alvazzi del Frate
http://www.unicri.it/documentation_centre/publications/issues/r9.php

Police Community Relation by Yvonne Miller
http://www.keeparticles.com/police-community-relations_a13434.htm sept.29,2011

Research proposal on community satisfaction survey by Carolyn Kelly
http://www.articleblast.com/Reviews/General/Research_proposal_on_community_satisfaction_survey/sept.29,2011

Crime and Community by Wendy Kaminer http://www.theatlantic.com/past/politics/crime/kaminer1.htm sept.29,2011

http://www.cavite.gov.ph Sept.29, 2011

http://www.census.gov.ph Sept. 29, 2011

http://www.napolcom.gov.ph/ sept.29, 2011

http://en.wikipedia.org/wiki/Descriptive_research. Retrieved January 14, 2009

www.pnp.gov.ph. Retrieved January 14, 2009

http://en.wikipedia.org/wiki/K%C5%8Dban April 28, 2010

http://en.wikipedia.org/wiki/Neighbourhood_Police_Centre Sept.29,2011

http://www.crc.nsw.gov.au/publications/documents/speeches/documents/prevention

http://www.easternpolicedistrict.org/index.php

http://www.mb.com.ph/articles/327237/16th-police-community-relations-month Sept. 29, 2011

Lived Experiences of On-Campus Working Students

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ABSTRACT

The study explored the lived experiences and struggles of twenty-two (22) on- campus working students of Southern Iloilo Polytechnic College Western Visayas College of Science and Technology, Iloilo Philippines. Specifically, it determined the main factor that motivates students to work on - campus, their time management, self-esteem, and other cognitive, psychological, and physical variables as impact of their work.

Researcher-constructed questionnaire on students' time management and self-esteem was used in gathering the data. Interview with the respondents was also conducted to gather more information about their experiences and related variables. Frequency count, percentage, mean, and chi- square were used as statistical techniques. The following were the results of the study:

Financial problem was the main factor that motivated the students to work on- campus. Working students experienced varied feelings as happiness, sadness, and annoyance, and worry . They were happy for their financial needs were provided; They were happy being responsible and independent, and they met more friends and people as they worked. They were sad being away from their family, especially during the time when they had problems or when they encountered difficulties in their work and studies; they were irritated with students leaving mess or scattering dirt in their area of responsibility; they also were also annoyed with instructors who kept requesting them for additional tasks. They were worried of their low marks and of submitting their projects on time; and how to make do with the money they received for their school fees and other needs.

Despite work pressure, working students had good time management both for studies and work. Majority had a high self-esteem. Majority of the working students had good academic performance.

The study concluded that participants' dual roles in the college as full time student and worker do not seem to affect their self-esteem and academic performance. Although they encountered some difficulties, they seem to manage well their time in studying and working at the same time. They are contented having good academic performance. Their ambition to finish their studies and to have a better future motivate them to pursue struggling. They do not give attention to romantic relationship considering the hardships they encounter.

Key words: **lived, experiences, on-campus, working students**

Introduction

Working while studying is not an easy task, especially for full-time students who work for more hours a week. This can be a tough situation which needs balancing of time between studies and work. Students working as assistants in the campus assume extra responsibilities besides studying, with the goal of earning for school fees and other needs. College costs are high that students also want the amenities that extra money brings.

Working full-time while also studying full-time clearly requires a lot of effort. Putting so much of one's mental and physical energy into this uneasy arrangement usually leaves a feeling of fatigue, stress, or both. Students who work while studying are those who usually belong to families with low average income, where survival is a must. Tuttle (2005) describes them as lower-income students, and to some extent, middle-income students, who have some unmet financial burdens and need to work while studying.

Working while studying could have positive effects on one thing and negative on another, and that it would affect different kinds of students differently (Lederman, 2009). Studies show that students who work are more confident and possess better time-management skills than students who are not employed. In addition to receiving an income, some independence and satisfaction, a part-time job can provide both training and experience. Working teaches students about responsibility and can also reinforce what they are learning in school (http://professionals. college board.com /guidance/prepare/work).

College is all about learning to be a part of the practical world and the challenges that it brings with it. Working does not only give a person a firsthand experience in the field, but it also encourages creativity and productivity in college, since working helps in developing a better understanding of what is being taught (Haqifa, 2013).

However, some researchers have reported that the more time a student devotes to employment, the less he or she has for either academic or social activities (Fjortoft, 1995 in Tuttle, 2005). For some students, especially those in traditionally underserved populations, taking a job is not a matter of choice, but necessity. They need to work to save for college or even to supplement family.

This study seeks to explore the struggles and difficulties of students who study, at the same time, work on-campus. Their self-esteem, academic performance, and time management are also considered, whether these factors are affected by their status as on-campus working students.

The study was anchored on Maslow's Motivation Theory which states that human beings are motivated by unsatisfied needs, and that certain lower factors need to be satisfied before higher needs can be satisfied. According to Maslow, there are general types of needs (physiological, survival, safety, love, and esteem) that must be satisfied before a person can act unselfishly. He called these needs "deficiency needs." As long as we are motivated to satisfy these cravings, we are moving towards growth, toward self-actualization (www.envisionsoftware. com/... /Maslows_Needs_Hierarchy.html).

This study investigated the experiences of on-campus working students. Specifically, it attempted to answer the following questions:

What is on-campus working students' self-esteem?

What is their time management?

What is their academic performance?

What emotional and physical struggles do they encounter as on- campus working students?

What inspire on-campus working students?

Methodology

This quantitative-qualitative study sought to determine the participants' struggles while working as on-campus student assistants. A total of twenty-two (22) regular students were the participants of the study. A validated researcher-made questionnaire was utilized in obtaining data on the participants' behavioural and emotional experiences and other information as self-esteem, time management, and academic performance. Interview through phone calls was also done to obtain needed data and information.

The participants of the study were the twenty-two (22) student-assistants at SIPC-WVCST Iloilo City Philippines. They were assigned in the different offices with specific tasks, working as student assistants from three- to four hours each day.

A researcher-made survey instrument was used in gathering the responses of the participants. This was validated by a panel of jurors of the college. The questionnaires on self-esteem and time management were used. Other data and information as their academic performance and school struggles were also obtained using the open ended questions.

A total of twenty (27) students accomplished the survey questionnaire. Each student assistant was given one week to answer questions as sources of information about them. Questionnaires on self-esteem and time management, and academic performance provided data for the quantitative analysis, while open-ended questionnaires which reveal their behavioural and emotional struggles were used for the qualitative analysis. These were validated for triangulation through interviews with students and faculty in the college where they were connected while working as student-assistants. Interviews through calls and personal meet-up was also done to gain additional information about the participants. The working students' responses were tallied and subjected to appropriate statistical analysis and interpretation.

The data gathered for this study were subjected to appropriate computer-processed statistics. The obtained mean scores were utilized to describe the respondents' self-esteem, time management, and academic performance.

Results

The following tables show that working students' self-esteem, time management, and academic performance.

Table 1 **On-Campus Working Students' Self-Esteem**

Participants	**N**	**Mean**	**Description**
Self-esteem			
Male	14	2.47	Low
Female	8	2.76	High
Total	22	2.58	High

Working students' self-esteem was high, M=2.58. Female working students had high self-esteem, (M = 2.76) compared with males who had low self- esteem, (M=2.47). This implies that working students, especially the females are capable of withstanding quite a lot of changes and help them feel in control of their life. They feel good about themselves, while the male working students may have a number of concerns about themselves or their life. These concerns are likely to feed a negative self-image and could upset their chances of feeling successful or positive about themselves.

Table 2 **On-Campus Working Students' Time Management**

Time Management	N	Mean	Description
Male	14	3.33	Very Good
Female	8	3.23	Good
Total	22	3.29	Very Good

As to time management, male participants had very good time management, while female had a good time management. This implies that working students, especially the males managed their time well in working while studying than females.

Table 3 **On-Campus Working Students' Academic Performance**

Academic Performance	N	Mean	Description
Male	14	2.2	Good
Female	8	1.9	Good
Total	22	2.1	Good

All participants, regardless of sex, had good academic performance.

Qualitative Analysis

Working students experienced varied feelings. They experienced happiness because their needs were provided; they could help their parents and family; they became responsible and independent; and they met more friends; they learned a lot of things, they could earn extra money.

On the other hand, they experienced sadness being away from family, especially during the time when they have problems or they encounter difficulties; they also felt irritated with students scattering dirt or leaving the area they were cleaning messy. They were also annoyed being pressured by faculty making a lot of requests.

Their struggle included: financial problem, the main reason why they applied as working students; They wanted additional allowance to finance their needs especially their projects in school. Being working students was an opportunity for them to finish their studies; They were often tired from working from 2-4 hours each day; Their specific tasks were to clean and assist in their area of responsibility; They could no longer work at home being tired; They were often home late; They slept late at night.

In school, they found it difficult to concentrate on their studies; They made absences from their class; They encountered difficulty in accomplishing their projects due to time constraint and limited financial resources; They missed class reporting or did not do well in the reporting; they got low grades; they found some subjects difficult; However, despite the experiences on work pressure in school, working students showed to have maintained a good academic performance. Majority of the participants got the average GPA with no failing marks. None of them were reported as candidates for drop outs.

They derived inspiration from the thought of finishing their studies and to be able to work; They found their studies more important than their love life, and other people's criticisms. They also derived strength from their family and God.

Findings

The participants' self-esteem, academic performance, and time management are not affected by their status as on- campus fulltime students and working part time from two-fours a day.

While working part time, the participants encountered varied emotions as happiness for earning and being independent; sadness for being far from home; and annoyance of work pressure.

Their ambition to finish their studies and to be able to work inspired them most.

They did not give attention to any romantic love affair.

Conclusions

Working on-campus may not have negative effects on students' academic performance and self-esteem. There seems to be some advantages that working while studying has brought to the working students.

Although they encountered some difficulties, they seem to manage well their time in studying and working, at the same time. They seem to be contented having good academic performance.

Their studies appears to be their priority than anything else.

Implications to Education

For students who work, at the same time, study, has some positive and negative effects on their achievement, self-esteem, and time management. As Furr & Elling, 2000 in Watanabe (2005) stressed that as more students work, they have to balance their academic requirements, extracurricular activities, and employment responsibilities to maintain their lifestyles.

Teachers need to consider the situation of these working students, especially that they are coping with their requirements from time to time. They should see their physical struggle which regular students less experience in the classroom. Studying needs a relaxed frame of mind and for the working students, who are often tired from working may not have a better academic performance. Kleinschmidt, (2013) points out one of the negative effects of working and studying which is plain exhaustion from the routine of being constantly on the go. The less sleep college students get, the more likely anxiety and stress heighten as they try to keep up with their jammed-packed schedules. Steinberg and Dornbusch (1991 in Watanabe, 2005), stated that overloaded students have decreased attitudes toward academics.

Working full time or working for more hours further decreases a student's college grade point average (GPA) and is negatively related to completion of a bachelor's degree (Astin, 1993 in Watanabe, 2005). The college administration may look at the factor of allowing students to work full time or excess time that may affect their academics.

On the other hand, working while studying has also a positive impact on students especially on their psychological well being, leadership skills, and critical thinking (Pascarella and Padgett). Schools must offer a wholesome atmosphere for these on-campus students to enjoy their tasks. While they work hard, they will also feel the value of learning more and developing their skills that can contribute to their growth as individuals.

Recommendations

The study recommends that the college may consider additional finance to augment the working students' financial needs.

Faculty, staff, and students may be informed of their experiences and struggles so that they may show support and cooperation, in any means, to lessen their work pressures.

Special scholarship programs or grants may be established by the college in coordination with the municipality, to extend additional financial support to these working students. Working students may be given a less number of hours of working so that they can manage their academic subjects well.

Parents may consider the struggles and difficulties of their children in college, hence, they should give them support as part of their obligation.

REFERENCES

Agarwal, A. (2008). Time management for working college students - directed to the students earning their bread. Retrieved July 30, 2014 from : http://EzineArticles.com/166158.

Ali, S. A. (2010). Benefits of working while studying. Retrieved May 14, 2014 at https://www.instaforex.com/forex_bonus.php.

Baumeister, R. (2009). Self-esteem. Retrieved July 30, 2014 from http://www.education.com/reference/article/self-esteem2/.

Bradley, K. (2013). Advantages and disadvantages of working while going to school. Retrieved May 14, 2014 from : http://www.ehow.com/info_8446491_advantages-disadvantages-working-going- school.html.

Dickinson, W. (2013). Relationship of self-esteem and academics in children. Retrieved July 30, 2014 from http://www.livestrong.com/article/226308-relationship-of-self-esteem-academics-in- children/.

Grohol, J. (2011). Six tips to improve your self-esteem. Psych Central. Retrieved on July 30, 2014, from http://psychcentral.com/blog/archives/2011/10/30/6-tips-to-improve-your-self-esteem/.

Haqifa (2013). The advantages of working part time while studying. StudyMode.com. Retrieved May 4, 2013, from http://www.studymode.com/essays/The-Advantages-Of-Working-Part-Time-1640319.html.

Huie, J. L. (n.d..). How to build self-confidence and self-esteem. Retrieved July 30, 2014 fromhttp://www.how-to-self.com/self-esteem-confidence.php.

Kavarana, Z. (2013). More students working while enrolled in college. Retrieved May 12, 2014 at http://dailyfreepress.com/2013/01/31/more-students-working-while-enrolled-in-college-study- suggests/.

Kleinschmidt, K. (2013). Negative effects of working and studying. Retrieved May 12, 2014 from http://www.ehow.com/info_8548674_negative-effects-working-studying.html.

Lederman, D. (2009). The impact of student employment. Retrieved May 12, 2014 at http://www.insidehighered.com/news/2009/06/08/work#sthash.ZwDog1WS.dpbs.

Orszag, J. M. et al. (2001). Learning and learning: working in college Retrieved July 28, 2014 from http://www.brockport.edu/career01/upromise.htm.

Rodriguez, A. (2012). Time management tips for the working student. Retrieved July 30, 2014 from http://ezinearticles.com/?Time-Management-Tips-For-the-Working-Student&id=6859393.

Sabo, R. (2011). Five time management tips for working students. Retrieved July 2014 from http://www.schools.com/articles/time-management-tips-for-working-students.html

Tuttle, T. et al (2005). College students working: the choice nexus. Retrieved May 1, 2014 at http://www.indiana.edu/~ipas1/workingstudentbrief.pdf.

Watanabe, L. E. (2005) .The effects of college student employment on academic . Retrieved July 28, 2014 from http://www.urj.ucf.edu/docs/URJmanuscript_Watanabe_080509.pdf

http://www.ehow.com/info_8446491_advantages-disadvantages-working-going-school.html

http://www.idealist.org/info/GradEducation/Resources/Preparing/WorkStudy

http://www.milkround.com/career-advice/uni-life/working/postgraduate-survival-guide-/

http://professionals.collegeboard.com/guidance/prepare/work

http://thesaurus.com/browse/lived+experience

http://www.learnersdictionary.com/definition/campus

http://www.studymode.com/essays/Working-Students-45560614.htm

The Language of Mathematics: Will the Use of L1 Improve Mathematics Performance?

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ABSTRACT

Does language matter in clarifying difficult concepts in Mathematics classes? A descriptive-correlational research aimed at exploring the effectiveness of using L1(Filipino language) in clarifying lessons towards improving Mathematics performance of students at the Pamantasan ng Lungsod ng Maynila, this study places language front and center: students regardless of their age learn best and fast in a language that they understand (Cummins, 1981). The relative scarcity of researches which tie the effectiveness of using one's L1 (Filipino) to Mathematical performance in Philippine classrooms, is here acknowledged and addressed. Thus, the research question, Will the teacher's shift to students' L1 to clarify or further explain difficult terms in Mathematics classes improve students' performance? First year College students at the Pamantasan ng Lungsod ng Maynila enrolled in College Algebra in the Summer of Academic Year 2013-2014 are the subjects of this study. Convenient sampling will be used in data gathering. Initially, a survey questionnaire to determine the students' preference of teacher's medium of instruction in clarifying lessons in College Algebra. A test questionnaire, validated by experts, was developed to assess the students' performance in the pre-test and post-test examination, and the t-Test and Point-Biseral Coefficient Correlation was used to determine the significant difference between the pre-test and post-test mean scores of students in College Algebra and to know the significant relationship between the students' preference of teacher's medium of instruction and their performance in College Algebra. The results of the study are both startling and unexpected vis-a-vis the literature on the teaching of content lessons in the mother tongue: although there is a marked improvement in the students' score in the pre-test and post-test, the gains are modest.

Key words: **L1, code-switching, Mathematics, mother-tongue based learning**

Rationale

A group of tertiary education teachers teaching Math, English, and Filipino conducted a study to investigate the practice of teaching Mathematics using L1(Filipino language), a practice that had never been studied in any formal or sustained manner. While this is neither frowned upon nor overtly encouraged, testing whether there are educational gains to be gained from such a practice has yet to be done.

Apparently, random switching in Mathematics classes is nothing new. In fact, as early as the 1970s, studies have looked at "code-switching" or alternating between two codes as performing invaluable roles "in certain domains and for certain functions" inside Philippine classrooms (Gonzales & Bautista, 1986, p. 24). According to Gonzales and Bautista,

> the code-switching variety assumes another function, not familiarity or sharing but sheer utility. Children coming to school for the first time do not possess sufficient competence in English to allow the teacher to use it as a medium of instruction. Hence, at least initially, even in English Language classes, the teacher uses a two-language presentation which in effect results in the repetition of explanations in two codes, one helping the other for comprehension. Here, one switches codes … to carry on the basic function of communication, in this case, *communication for imparting content in a subject area*. (p. 25; italics added.)

This practice must have been intuitively adopted from received wisdom that a strong foundation in the L1 (Filipino) is more beneficial to learning L2 (English) than early or long exposure to L2 (Stone, 2012), and is resorted to by students when they are presented an opportunity, such as asking questions, restating ideas, regardless of the fact that English is mandated by law in the Philippines as the medium of instruction in many subjects, including Mathematics.

In an informal survey conducted in two Mathematics classes on February 27, 2014, students were asked what language of instruction is preferred in the teaching of Mathematics. In the first class surveyed, 20 students have favored Filipino as the medium of instruction, whereas 15 students favored English. In another class of 25 Freshmen students, 15 students have favored Filipino as the medium of instruction; only 10 students favored English. When asked what reasons they had for choosing English, students have said that since textbooks are written in English, and that Mathematical concepts and theories have no adequate translation in Filipino yet, they preferred that Mathematics be taught in English.

Thus, the goal of this study is to find out whether the use of Filipino, in this research designated as L1 (first or mother tongue) in clarifying, responding to questions, and reinforcing lessons in College where scientific terms and terminologies are commonly taught in English, will improve students' comprehension and test scores. By introducing and discussing concepts in English, and then, by using Filipino—*the language that PLM students know, understand, and are competent in*--to clarify difficult ideas in College Algebra, Mathematics teachers could hopefully improve students' performance in that subject.

A. Statement of the Problem

In conducting this research, the following questions are posed:

1. In clarifying lessons in College Algebra, what medium of instruction do students prefer that their instructor use?
2. What is the level of performance of students in College Algebra in terms of their scores in the pre-test examination?
3. What is the level of performance of students in College Algebra in terms of their scores in the post-test examination?

4. Is there a significant difference between the pre-test and post-test mean scores of students in College Algebra?
5. Is there a significant relationship between the students' preference of teachers' medium of instruction and their performance in College Algebra?

B. Hypotheses of the Study

Based on the problem cited, the following hypothesis will be tested using a 0.05 level of significance.

1. There is no significant difference between the pre-test and post-test mean scores of students in College Algebra.
2. There is no significant relationship between the students' preference of teachers' medium of instruction and their performance in College Algebra

C. Significance of the Study

Hopefully, this study will benefit the following stakeholders in the university:

Students' awareness of the language in which they learn may serve as a factor towards progress in their Mathematics skills. It seems to be the case that students are normally apprehensive when it comes to their Mathematics subjects not only because they regard their computational skills deficient, but also because their linguistic skills also needed improvement. As such, if a student is not proficient in either, the stumbling blocks act as a double whammy. But if they know that they can ask their teacher anything—in Filipino--by way of clarification, then some of this apprehension must surely go away. They may even enjoy the subject itself!

Teachers stand to benefit in researches of this kind by discovering that the medium of instruction can, and does, affect comprehension. Thus, they can tailor-fit their strategies to reach as many learners, or adjust their style to the level of their students. It is also possible that such choice in the medium of instruction will lighten the load of the students, and impact on developing rapport between teacher and learner.

In the new K-12 curriculum crafted by the Department of Education, much stress has been placed on the use of the 'mother tongue', or the learner's native language in the teaching of specific subjects when they go to school. This research is a nod towards the use of mother-tongue based learning initiative of the Department of Education, and in helping shape future professionals with a strong love for, and appreciation of, the Filipino language. English used in technical courses are, of course, still promoted for the reason that English is the mandated language of instruction in subjects such as College Algebra.

Interestingly, this research may be used as a springboard by **Textbook Writers** to produce resources on the technical disciplines which use Filipino as the language of choice. Also, **Researchers** can benefit from, extend, improve or build up on findings contained here, to investigate in other fields where the use of Filipino may become beneficial to stakeholders in education. Such effort could result in the intellectualization of the Filipino language, both as a national language as well as a *lingua franca*. Such researches could contribute to the enrichment of our technical vocabulary and inspire intellectual discourse in areas such as Mathematics.

D. Scope and Limitations of the Study

Since English has always been used in the country in the teaching of Mathematics from Kindergarten onwards, and since it is the language of textbooks, especially those that are used in PLM, English will be used in introducing, explaining, and discussing topics in Mathematics in the present research. We specify, however, that whenever questions are raised, or whenever clarifications are needed, the teacher automatically shifts to Filipino in addressing difficult areas in College Algebra. It should be clearly understood that since the specific objective of this study is to know the efficacy of using Filipino in clarifying lessons in College Algebra, the medium of instruction will still be English. Translation in Filipino of technical terminology in Algebra is not included in this study.

The coverage of the pre-test is limited to Modules 3 to 8 of the College Algebra textbook in PLM entitled, particularly topics on Rational Expressions, Exponents and Radical Expressions, Relations and Functions, Solution on Linear Equation, Solution on Quadratic Equations, and Ratio, Proportion and Variation. The main tools for the study are a survey questionnaire to assess students' preference in the medium of instruction to be used in the clarification of lessons, and a teacher-made Test Questionnaire to assess students' performance in College Algebra.

Review of Related Literature

Students, regardless of their age, learn both content knowledge and literacy in a language that they understand. Unfortunately for a country with a long colonial history, the use of English in the Philippines appears to be simply a continuation of a remaindered past, its use a product more of tradition and desire for elitism rather than for practical utility. Constantino (1991), in "Ang Dominanteng Posisyon ng Wikang Ingles sa Edukasyon" [The Dominant Position of English in Education], has echoed this claim when she says that English is still preferred as the medium of instruction in Philippine classrooms even when Filipino has been proven to be an effective medium in the teaching of Science and Math, in studies conducted by the Institute of Science, Mathematics Educational Development, or ISMED, and in individual theses and dissertations across the country.

Researchers have claimed that building a strong foundation in a student's mother tongue is more beneficial to learning another language than early or long exposure to a second language (Cardenas-Hagan, Carlson, & Pollard-Durodola, qtd. in Stone, 2012). Cummins' Theory reflects the current view that bilingual students have to be competent in their first language as well as in their second language to learn Mathematics better (cited in Nillas, 2002, p. 96). Fleshed out, Cummins theory of threshold hypothesis centers on the notion of a "balanced bilingual", that is, a student who "learned the second language by adding it to his or her competently learned first language" (p. 96). Studies conducted by Dawe (1983) and Clarkson and Galbraith (1992) on bilingual students yielded the findings that students' level of competence in their first language significantly influences their mathematical performance (in Nillas, 2002). Additionally, the developmental interdependence hypothesis suggests that bilingual students' first and second languages are interdependent, and in fact, contribute to the "deeper conceptual and linguistic development of [one or] the other language" (p. 96). As regards bilingual instruction, Conde (1998) investigated the influence of receiving instruction in two languages in a bilingual immersion program. The 4-year performance of the English/Spanish bilingual students was compared with a comparable control group. Data showed that the English/Spanish group performed significantly better than the control group for reading comprehension, mathematics computations, and applications (cited in Nillas, 2002, p. 100).

Several other studies have indicated that the language problem is one of the major factors contributing toward the poor performance of many students in mathematics, especially those who are bilingual and multilingual. Investigated by B. Yushau, bilingual Arabs benefited from key Arabic insertions of Mathematical terms in a class taught entirely in English. Studies have shown that students that are found to be very weak in the language of instruction have the tendency toward ill-comprehension as well as poor participation in classroom discourse (Setati, 2003, in Yushau). Consequently, they cannot meet the desired objectives of their studies due to lack of communication skills, and also puts teachers in a big dilemma on how to correctly assess the sources of student's difficulty: is it mathematics or language? The recommendation made by Setati (2003, in Yushau) in particular calls for a persuasive look at possible code-switching and language approach to address the problem of low mathematical performance.

Closer to home, our own Department of Education, in its DepEd Order 71, series of 2009, has spelled out very clearly the products of local and international researches regarding Mother Tongue-Based Multilingual Education (MTB-MLE). They have affirmed that learners learn to read more quickly in their mother tongue, which in turn allows them to learn more quickly a 2nd or a 3rd language, and that their cognitive competencies are improved more quickly as a result of mother tongue literacy. Specifically, a study conducted in the Department of Education Region IV-B (MIMAROPA) entitled, "Double Exposure in Mathematics: a Glimpse of Mother-Tongue First" confirms the trend discovered elsewhere in the ASEAN region, to wit: "[T]op performing countries in the Trends in International Mathematics and Science Study (TIMSS) are those that teach and test students in science and math in their own languages." This view is also endorsed by Giovanni Tapang (2012), an Associate Professor at the National Institute of Physics at the University of the Philippines (Diliman), who categorically claimed that countries that rank high in maths and science tests, like Hong Kong, Japan, South Korea, Taiwan, Singapore, have basic instruction in these subjects in their local tongue (with the exception of Singapore).

In a paper presented at the First Philippine Conference-Workshop on Mother Tongue-based Multilingual Education held at the Capitol University, Cagayan de Oro City, Philippines, on Feb. 18-20, 2010, Reyes showed that a science class in Grade 4 in a public elementary school in Quezon City learned a lot better when Filipino was used. Advantages include a facilitated learning of key concepts, livelier verbal interaction, and marked improvement in quiz scores, as compared with another Science class where class was conducted entirely in English. The study suggests that using Filipino in teaching Science would be more effective than using English, and should therefore be used as the Language of Learning and Instruction (LOLI) for Science in Grade 4.

Furthermore, Judith Aldaba (1998), in an article she penned entitled "Matematiks sa Filipino" has found out that her students at the De La Salle University learn Mathematics better when she uses Filipino in her lecture and explanation. She averred: "Napansin ko sa aking pagtuturo na kahit ang aklat namin ay isinulat sa Ingles at ang pag-aaral namin ay sa Filipino, ay nagkakaintindihan kami" [I noticed that, even if our textbooks are written in English, and we discuss the subject in Filipino, we understand one another](p. 33). In addition, Constantino (1991) articulated a plan of action for teaching technical subjects, such as Mathematics: teach Math in Filipino, through resources written in English (pp. 103-104). This is also endorsed by Maxima Acelejado (1993) in a lecture entitled "Teknikal na Filipino sa Matematiks" where she confirmed that there is a positive relationship between medium of instruction used and student learning. Further endorsing this view, she advocated that if the use of Filipino facilitates the learning of Math and Science, then it makes a lot of sense to develop the teaching of these subjects in Filipino more fully (in Aldaba, p. 32). This is also borne out by a research conducted by Batalla (2008) in her dissertation that looked at the use of Filipino in teaching College Algebra. She averred: "Napag-alaman din na mas mabilis na mauunawaan ng mga estudyante ang isang aralin kung ipinapaliwanag din ito sa wikang kanilang nauunawaan, sa wikang Filipino, dahil sa kinalabasan ng pagsusulit (pre-test at post-test) na isinagawa sa 30 estudyanteng reaktor" [Based on the results of the pre- and post-tests scores of the 30 student reactors, students learn better and fast if lessons are explained in a language that they understand] (p. xi). Based on the statistical treatment of her data, she concluded that "epektibo ang pagtuturo ng College Algebra sa wikang Filipino" [The use of Filipino in the teaching of College Algebra is effective.] (p. xii).

Like Aldaba, Carlito Salazar, in his article "Ang Filipino sa Inhinyera" also advocated the use of Filipino in teaching Engineering subjects. Salazar used Filipino in his discussions and lectures but retained the engineering terminology; this despite the fact that the medium used in the Board Examination is English. On the third term of the trimester, 1994-95, he lectured in Filipino on all subjects that he handled: PROCDES (Process Design in Chemical Engineering), HEATTRA (Heat Transfer), CHECOMP (Computer Calculations in Chemical Engineering), at MOMETRA (Momentum Transfer). At the end of the term, after the distribution of class cards he conducted a survey whether students were in favor or not in favor of using Filipino in teaching Engineering subjects. The following are the results of that survey: PROCDES (4th year, Industrial Engineering, minor in Chemical Engineering): in favor--31(70%), not in favor--5 (11%) Bilingual 8; PROCDES (4th year Chemical Engineering): in favor--12 (67%), not in favor--5 (28%), Bilingual 1; HEATTRA (3rd year, Chemical Engineering): in favor-- 22 (63%), not in favor--5 (13%), Bilingual 9. The large percentage of students who were in favor of using Filipino in Engineering subjects is obvious. Based on the results shown above, there is a positive sign of students' acceptance of Filipino as a medium of instruction in Engineering Subjects, even in the mid-90s. Some of the comments out of the 16 comments from the students who were in favor of using Filipino are the following: "Mas madaling naiintindihan ang mga teorya at konsepto" [Theories and concepts are more easily understood]; "Mas madaling maitanim sa isipan ang mga leksyon" [Lessons are brought to mind more easily]; "Kung ang diskusyon at mga babasahin ay Ingles, karaniwang mini-memorya lamang ng estudyante ang mga teorya at konsepto nang halos hindi nauunawaan," [Because theories and concepts are only memorized, students come away from lessons without full understanding]; "Napapadali ang proseso ng pag-aaral" [Studying is easily facilitated]; "Mas relaks at at-ease ang mga estudyante" [Students feel more relaxed when Filipino is used inside the classroom]; "Mas buhay at informal ang diskusyon" [Discussions are more dynamic and interactive]; "Mas nagpapartisipeyt ang mga estudyante" [There's more participation coming from students]; "Nawawala ang tension sa klase" [There's less tension in class.] Admittedly, there are comments from students who were not in favor of using Filipino as the medium of instruction inside Mathematics classrooms. To wit: "Ingles na ang kinalakihan at Ingles ang medium of instruction sa halos lahat ng kurso" [English has long been used as the medium of instruction in most subjects in school]; "Siguro sa susunod na henerasyon na lang magsimula sa Filipino, at dapat simulan ito sa elementary at hayskul" [Maybe the next generation of Filipinos could start the use of Filipino in subjects in school, and that this ought to be started at the elemetary level]; "Ang mga libro ay Ingles, mahirap pang mag-transleyt," [Textbooks are in English, which, if translated to Filipino, will likely be difficult]; "Mas nakalilito ang Filipino" [Filipino is more confusing to use.]

Studies have acknowledged the cognitive advantage for the learners in using the mother tongue, according to Rebecca Paulson Stone (2012). In a dissertation entitled "A Professional Development Program for the Mother-tongue based teacher: Addressing teacher knowledge and attitudes about MTBMLE," she looked at the attendant problem of introducing other subjects in English even before the mother tongue has been mastered as counter-intuitive. Instead of learning content subjects more easily, the use of a second language even before the first language had been mastered presents roadblocks to learning. She has argued that the

> lack of access to the language of schooling [English] creates/substantial barriers for children to succeed in school. Changing the medium of instruction to the mother tongue brings with it important benefits that can contribute to improving access and quality for millions of children. A shift to the local language helps to validate the local culture, allowing learners to start from what they already know and move towards the unknown, and building a bridge between the home and the school. In the classroom, it enables rich communication and deeper participation of students, helping learners feel more confident, and building a sense of identity in the classroom. (pp. 6-7)

The present study differs from all the rest because the emphasis or focus in using Filipino as the medium of instruction is limited to clarification of lessons in College Algebra. Although this study is similar to Aldaba's, because of the same subject, intermediate students taking up Mathematics, the study of Aldaba is a perceptive observation of her students' good performance when she uses Filipino in teaching Mathematics. Unlike her study, the present study will undergo full research procedure, where a thorough reading of related literature and data gathering where pre-test and post test examinations to test the efficacy of using L1 as medium of instruction in College Algebra will be conducted. In short, by developing facility in Filipino, students learn better and more. Thus, using Filipino in clarifying concepts used in College Algebra which is taught in English, students are expected to have a fuller understanding of the subject and thus, improve their comprehension and test scores.

A. Conceptual Framework

The initial survey questionnaire and test questions will assess students' level of preference with regards to their preference of language use in clarifying difficult lessons in College Algebra, whereas the test questions will assess the students' performance in the aforementioned subject. The present study is based on the theory of Cummins (1981) that students, regardless of their age, learn best and fast in a language that they understand. This study seeks to know students' academic performance in College Algebra when the teacher uses the medium that they prefer, Filipino, in clarifying lessons.

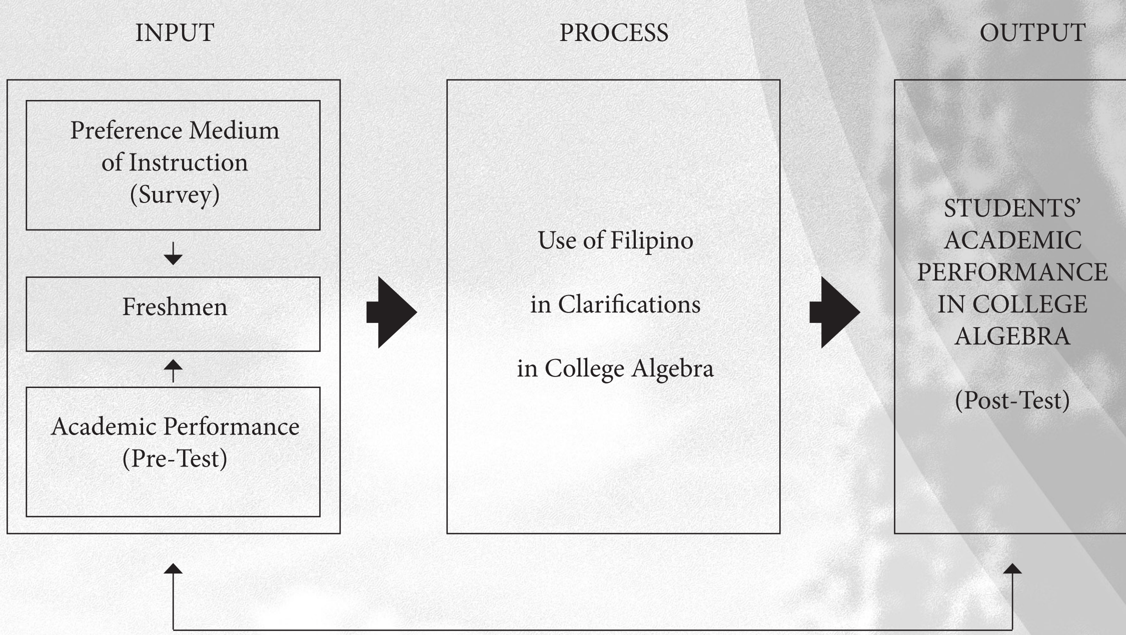

Figure 1. **The Efficacy of Using Filipino in Clarifying Lessons to Improve Performance in College Algebra**

The input shows the survey preference questionnaire for the medium of instruction and the pre-test academic performance of the Freshmen students in clarifying lessons in College Algebra.

Process involves the switching of teacher's medium of instruction in Filipino every time students clarify difficult lessons in College Algebra. After doing so, a post-test will be administered to ascertain the gains in their academic performance. This is to determine if there is a significant difference between the pre-test and post- test academic performance of the students as shown in the output.

However, a line connecting the input and the output can be seen in the illustration. This is because the researchers believe that the medium used in clarifying lessons in College Algebra had something to do with the students' academic performance. The students' level of competence in their first language will significantly influence their mathematical performance (Clarkson & Galbraith, in Nillas, 2000).

B. Definition of Terms

The following terms have been used operationally in this research:

1. Preference means a greater liking for one alternative over another or others.
2. Bilingual is a person who can speak two languages-- which may be both Filipino and English, or English and Spanish.
3. Code-switching or language combination is used to refer to a learner's facility to use two languages simultaneously.
4. Filipino is the country's national language. The Constitution proclaims that it should flourish: "Samantalang nililinang, ito ay dapat payabungin at pagyamanin pa salig sa umiiral na wika sa Pilipinas at sa iba pang mga wika" (Konst. 1987, Art. XIV, Sek 6.).
5. L1 or first language refers to a student's native language. In Manila where the bulk of the student population hails and is serviced by PLM, the first language is Filipino.
6. L2 or second language refers to a student's next language; in the case of PLM students, English is their L2. This is not the case in many parts of the country: a pupil who grows up in the Ilocos region may have Iloko as her L1, Filipino as her L2, and English as her L3.
7. Mother tongue-based learning refers to the enhanced curriculum where "mother tongues" or native languages take precedence over either Filipino or English in the teaching and learning of subjects such as Math and Science.

Methodology

A. Research Design

this research will utilize the descriptive method of research. This research method, according to Venzon (2004) is used mainly for the purpose of observation, description, and documentation aspects of a situation as it naturally occurs and sometimes to serve as a starting point for hypothesis or theory development.

The reason for this choice is to see whether the students' preference of the medium of instruction, when used for explaining or for clarifying difficult topics in College Algebra, will actually produce the desired effect of improving their performance in that subject.

B. Samples and Sampling Technique Used

Freshman students enrolled in College Algebra in the Summer of Academic Year 2013-2014 had been identified as the respondents in this research. Convenient sampling is going to be utilized in data-gathering in so far as it is the suitable method in eliciting the efficacy of using students' preferred medium of instruction in clarifying difficult areas in College Algebra, and in improving their comprehension skills. Furthermore, the lead researcher has been tasked to teach this group of students who had previously failed their College Algebra, and which makes them the ideal population because they all share the same level of proficiency in Mathematics.

C. Instrumentation

Two instruments will be utilized in this research, a Survey questionnaire and a Test questionnaire. Using a survey questionnaire, researchers had determined the preference of the students' use of Filipino as a medium of instruction in clarifying lessons in College Algebra. This survey questionnaire determined the students' preference as to what medium of instruction they will learn best in when it comes to clarifying lessons in Algebra, while a test questionnaire, validated by PLM experts in Math, was used in the pre- and post-tests to know the students' performance. It consists of forty (40) items that assesses how much the students had learned at the end of the study period. The coverage of the test was further limited to modules 3 to 8 of our textbook in College Algebra, particularly on topics about Rational Expressions, Exponents and Radical Expressions, Relations and Functions, Solution on Linear Equation, Solution on Quadratic Equations, and Ratio, Proportion and Variation.

D. Procedures

The researchers began the research process by asking permission from the Colleges of Liberal Arts and Science to conduct a study on assessing the efficacy of the use of Filipino in clarifying lessons in College Algebra.

1. In the second day of the class(April 14, 2014), a questionnaire determining the students' preference as to what medium of instruction they will learn best in when it comes to clarifying lessons in College Algebra had been administered before the conduct of the study. While, the pre-test on lessons in College Algebra which covered topics mentioned above had also been administered.
2. One of the researchers taught lessons in College Algebra using English as the medium of instruction but whenever questions were raised, or whenever further clarifications were needed, the teacher had automatically shifted to Filipino in addressing difficult areas in the teaching of College Algebra. The lessons were executed on April 16, 2014 to May 14, 2014 every MWF 10:00-1:00 pm.
3. After the conduct of the study, post-test was conducted to know the performance of the students in College Algebra subject. The post-test contains items related to content of the lessons in modules 3 to 8. The content of the items in post-test is the same as in the pre-test to know if the students performed better in academics after L1 or Filipino was used in clarifying lessons in College Algebra subject.
4. The scores obtained had undergone statistical treatment to answer the problems stated above. The following statistical methods had been utilized for the analysis of data and interpretation of results through the aid of MS EXCEL.
   a. To determine the preference and performance of students in College Algebra Frequency count, Mean, and standard deviation had been used.
   b. To test the significant difference of the study, t- test had been used.
   c. To determine the significant relationship of the post-test and preferred medium of instruction of students' in clarifying lesson in College Algebra subject, point- biseral coefficient correlation had been used.

E. Statistical Treatment

The following statistical methods will be utilized for the analysis of data and interpretation of results through the aid of MS EXCEL.

1. To determine the preference and performance of students in College Algebra Frequency count, Mean, and Standard deviation was used.
2. To determine the significant difference between the pre-test and post-test mean scores of students in

College Algebra, t-Test was used.

3. To know the significant relationship between the students' preference of teacher's medium of instruction and their performance in College Algebra, Point-Biseral Coefficient Correlation was used.

Results and Discussions

The results of the present study are as follows:

Problem 1: In clarifying lessons in College Algebra, what medium of instruction do students prefer that their instructor use? The summary of the respondents' preference in the medium of instruction for clarifying lessons in College Algebra is presented in Table 1.

Table 1. **Respondents' Preference of Medium of Instruction in Clarifying Lessons**

Student Preference	Frequency (f)	Percentage (%)
Filipino	15	62.5
English	9	37.5
Total	24	100

Table shows that more students (15 out of 24) preferred that their teacher use Filipino in clarifying lessons in Mathematics. It is possible that this response is borne of students' increasing perception that English is a difficult language to study, and that their L1, a language they know and understand well, could serve the purpose of learning Mathematics, just as well as does English. The nine students who had preferred English did so only because textbooks and instructional materials are written in English. The acceptability of the use of Filipino as a medium in instruction in technical subjects is increasingly becoming dependent on students' and teachers' readiness.

Problem 2. What is the level of performance of students in College Algebra in terms of their scores in the pre-test examination? The summary of the performance in pre-test examination in College Algebra of the respondents is presented in Table 2.

Table 2. **Respondents' Performance in the Pre-test**

Grade	Frequency (f)	Percentage (%)	Verbal Description
95-100	0	0	Excellent
89-94	0	0	Very good
83-88	0	0	Good
77-82	0	0	Satisfactory
75-76	2	8.33	Passed
Below 75	22	91.67	Failed
Total	24	100	
Mean			64.84
Standard Deviation			5.31

Table 2 shows only two of the 24 students, or 8.33% "Passed" or got the numerical equivalent of 75-76 in the pre-test for this subject, College Algebra. Majority of them, a whopping 91.67%, got a failing grade, or the numerical equivalent of 74 and lower. An overall mean score of 64.84 results in the pre-test performance had shown a failed mark. It should be noted that this group of participants had flunked College Algebra the previous semester. One reason for the miserable performance output could be students' lack of strong foundational mathematical skills, a finding borne out in testing across the country and elsewhere. Interest and motivation may also be hypothesized as factors, although they were never tested in this particular study.

Problem 3: What is the level of performance of students in College Algebra in terms of their scores in the post-test examination? The summary of the respondents' performance in the post-test is presented in Table 3.

Table 3. **Respondents' Performance in the Post-test**

Grade	Frequency (f)	Percentage (%)	Verbal Description
95-100	0	0	Excellent
89-94	0	0	Very Good
83-88	2	8.33	Good
77-82	8	33.33	Satisfactory
75-76	3	12.50	Passed
Below 75	11	45.84	Failed
Total	24	100	
Mean			75.73
Standard Deviation			5.16

It could be seen from this table that two students or 8.33% got a numerical equivalent of 83-88 (Good) in the post-test; eight students got 77-82 (Satisfactory evaluation); and three students got 75-76 with an equivalent "Passed" mark. Of the total population of 24 students in this Summer class, 11 had failed the post-test in College Algebra. However, it may be noted that there has been an appreciable difference with the result of the post-test vis-a-vis the students' pre-test on their computational skills after just one Summer in College Algebra after Filipino had been used as a medium of instruction for clarifying difficult lessons in College Algebra. Here, the overall mean score had improved based on the results obtained of 75.73.

Problem 4: Is there a significant difference between the pre-test and post-test mean scores of students in College Algebra? The summary of comparison of respondents' Pre-test and Post-test Mean Scores is presented in Table 4.

Table 4. **Comparison of Respondents' Pre-test and Post-test Mean Scores**

	Mean Score	Diff.	Computed t-value	Critical value	df	Level of Sig.	Decision	Interpretation
Pre-test	64.84	10.89	0.268	2.069	23	0.05	Accept Ho	No Significance
Post-test	75.73							

Findings show that there is no significant difference between the mean scores of students in College Algebra. What does this tell us? Simply that, in the tertiary level, Filipinos may not really be making any more distinctions in the use of either Filipino or English when it comes to technical subjects such as Math. However, this is not a categorical claim. We have yet to find out, in another research perhaps, whether a class taught entirely in either Filipino only or English only will perform significantly better in either set-up. It is also possible that the population of 24 students is too small a number for any general pattern to show up.

Problem 5: Is there a significant relationship between the students' preference of teachers' medium of instruction and their performance in College Algebra? The relationship between the scores in the post-test in College Algebra and preference in clarifying lessons is illustrated in Table 5.

Table 5. **Relationship of Scores in Respondents' Post-test vis-a-vis their Preference of Medium of Instruction**

Variables	rpb	tc	tv	Decision	Interpretation
X:Y	0.24	1.16	2.069	Accept Ho	No significant relationship

The table shows that there is no significant relationship in students' post-test and in their preference of the medium of instruction in College Algebra. This is because the students' perception is not a guarantee of their understanding of the subject.

Conclusions

In the light of these findings, the following conclusions are drawn based on this specific study conducted at the Pamantasan ng Lungsod ng Maynila:

1. The use of Filipino or "mother tongue" as the medium of instruction in teaching College Algebra is not an assurance of students' good performance in learning Mathematical skills;
2. Students mathematical foundation is very important to understand more advanced concepts, knowledge and operational skills.

Recommendations

In this regard, the following are recommendations in the conduct of further studies:

1. Adequate number of respondents must be considered to make more valid claims;
2. Aside from Filipino, research on the efficacy of the use of English as a medium of instruction must also be conducted; and,
3. A survey questionnaire consisting of 25 items (Likert Scale format) may be done to help identify students' preference on the medium of instruction preferred in the teaching of College Algebra.

REFERENCES

Aldaba, J. (1998). Matematiks sa Filipino. [Mathematics in Filipino.] In Ang Filipino sa daigdig ng syensya at inhinyera. [Filipino in Science and Engineering.] (pp. 31-51.) Magdalena Sayas (Ed.) Malate, Manila: De La Salle University Press.

Batalla, M. G. (2008). Pagsasalin at kritikal na anotasyon ng sampung tsapter ng aklat na College Algebra nina Spiegel at Moyer. [Translation and critical annotation of 10 chapters of Spiegel and Moyer's College Algebra.] Unpublished dissertation. De La Salle University.

Constantino, P. C. (1991). Ang dominanteng posisyon ng wikang Ingles sa edukasyon. [The dominant position of English in education.] Pagpaplanong pangwika tungo sa modernisasyon: Karanasan ng Malaysia, Indonesia at Pilipinas. (pp. 91-107). Quezon City: Sentro ng Wikang Filipino.

Department of Education. (2009). DepED No. 74 s. 2009. Institutionalizing mother tongue-based multilingual education (MLE). Department of Education. Republic of the Philippines.

Dutcher, N. & Tucker, R. (1995). The use of first and second languages in education. A review of international experience. Pacific Islands Discussion Paper Series Number 1. Washington, D.C.: The World Bank.

Gonzales, A. & Bautista, M.L.S. (1986). Language Surveys in the Philippines. Taft, Manila: De La Salle University Press.

McKay, S. L. (2008). Doing action research. CAPE Alumni Internet Connection. TeacherTalk 34. http://www.cape.edu/docs/ttalkday34.pdf

Nillas, L. (2002). Does language make a difference: A TIMSS-R analysis. The Mathematics Educator, Vol. 6, No.2, 95-112.

Nolasco, R. (2008). The Prospects of Multilingual Education and Literacy in the Philippines.
Retrieved 01 April 2014 from http://www.seomeo.org/_ld2008/documents/Presentation_document/NolascoThe_Prospects_o f_multilingual_education.pdf

Quijano, Y., & Eustaquio, O. (2009). Language-in-education policies and their implementation in Philippine public schools. In K. Kosonen & C. Young (Eds.) Mother tongue as bridge language of instruction: Policies and Experiences in Southeast Asia 84-92. Thailand: SEAMO.

Reyes, R. L. (2010, February) Using Filipino in the teaching of science. Paper presented at the 1st Philippine conference-workshop on mother tongue-based multilingual education. Retrieved on 01 March 2014 at http://mlephil.wordpress.com/2010/02/26/using-filipino-in-the-teaching-of-science/.

Salazar, M. Ang Filipino sa Inhinyera. (n.d.) [Filipino in Engineering.] In Ang Filipino sa daigdig ng syensya at inhinyera. [Filipino in Science and Engineering.] (pp. 58-62.) Magdalena Sayas. (Ed.) Malate, Manila: De La Salle University Press.

Stone, R. P. (2012). A professional development program for the mother-tongue based teacher: Addressing teacher knowledge and attitudes about MTBMLE. Unpublished dissertation, University of Massachusetts, Amherst. Retrieved 01 March 2014 from http://scholarworks.umass.edu/cgi/viewcontent.cgi article=1593&context=openaccess_dissertations&sei-redir=1&referer.

Tapang, G. (2012). Don't teach maths and science in English. SciDev.Net. 20 January 2012. Retrieved 01 March 2014 from http://www.scidev.net/global/migration/opinion/don-t-teach-maths-and-science-in- english.html.

Venzon, L. (2004). Nursing Research: Quest for Quality Nursing. QC: C & E Publishing.

Yushau, B., & Bokhari, B. A. (2012) Language and mathematics: A mediational approach to bilingual Arabs. Retrieved on 01 March 2014 from http://www.cimt.plymouth.ac.uk/journal/yushau.pdf.

A Training Design for the Language Faculty: Viewpoints on Technology Integration

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ABSTRACT

The Language Faculty's competencies in technology integrated instruction is deemed fundamental among higher education institutions. This is primarily due to the increased knowledge of learners in technology integration. Hence, thispaper aims at ascertaining faculty competencies in the use of multimedia aided instruction. Moreover, it sought to design a training module. Faculty proficiency level on pedagogical competencies and inclination towards trainings were also identified. The teachers' perception on these key concepts constituted as reference to the development of the faculty training program . Findings revealed that these teachers need to be trained. Furthermore, it was found that these language faculty were willing to be trained towards a more refined technology integration.

The paper clustered around the concepts of Instructional Design Models. Seels and Glasgows (2005) and Johns (2001) models served as tough theoretical foundations of the study. Needs analysis was conducted penetrating the language and information and communication technology arenas. From here, the researcher came up with the design to develop the training material enlisting pronounced emphasis on language via technology integration.

Research Keywords: **(1.) Training Module,(2.) Language Faculty, (3.) Technology Integration**

Introduction

Modern technology in education matches the certainty of changed roles for both students and teachers. In this growingmodel, students have to be managed by competent teachers who can equally match their skills. Bergman (2006)has identified a fifth key competency, learning to learn. This enables learners to be aware of the learning process. Moreover, it leads to the developmentof learner skills being able to solve problems in the learning situation. Thus,students become capable of building on prior knowledge, gained either from other educational experiences at work or in everyday life.

Chalk-talkas a strategy reflectsteacher control as s/he does most of the talking. Most students have definitely experienced this traditional teaching, understood as the knowledge transfer metaphor (Säljö, 2000). In this teaching environment, the students are seen as passive individuals. Garrison and Anderson (2003) posits that e-learning provides a different learning experience. Further, he states that much of the existing knowledge on the student-teacher relationship rests upon classroom teaching. Hence, it is equitable to consider that this mixture of new and old experiences creates confusion regarding control . Garrison and Baynton (2007) explore the notion of control as the balance between independence, power, and support. In the student-teacher relationship, independence is simply freedom in the students' learning; power deals with the question of responsibility for one's learning; and support grows from the role of the teacher. Thus, confusion can arise for both teachers and students when control shifts between the actors. Therefore, this papergives light on the conceptas to the relevant role of the students in a technology aided classroom instruction. The context of thisresearch is a tertiary course in a nurse education curriculum. It aimed to deal with the following queries:

How do students perform in a technology aided classroom instruction versus a traditional approach?
What are the stages involved in the design of the training module?

Methodology

The study focused on a group of privateuniversity students attending a Nursing course in Cagayan de Oro City. The course was mostly classroom-based, with two mandatory on line submissions at the end of the course. Between the meetings, the students worked in study groups, supported by the use of chalkboard talk. Each week the teachers conducted examinations. Furthermore, as a course requirement, the students underwent practical nurse training at the school's hospital.

The teachers who usedthe chalk-talk strategy were enthusiastic about starting. The teachers took as their starting point by adopting a template that was modified for their particular needs. At the start of the course, the teachers introduced the topics by giving a chalk-talk lecture. Students had the opportunity to ask questions afterwards.

Teachers who used the pure on-line approach were more relaxed. Students were only given instruction s through electronic mails. Further, they were required to submit their work output on line. They were likewise exposed to hospital training with minimum physical supervision.

Using the model of Seels and Glasgow (2005), the researcher began identifying the needs of the students and teachers in a focus group discussion and interview sessions. It was found out that students wanted for technology integration in their classes. Chalk-talk made them sleepy heads in discussions whereas power point presentations energize their senses. With these, the design of the training was done. The design was developed after it was validated by the expert faculty and qualified trainers. Validation was based from the research findings specifically on the needs of the students and the faculty. The final form of the designed training aims to train teachers for them to maximize the integration of technology in their classes thus making learners more interested in the daily lessons.

Results

The outcome of thispaperis presented as follows.It shows the degree of teacher-talk domination, the learning, and the assessment process.Atabular presentation illustratesin capsulized view the details of the research outcome.

Table 1 **The teacher-centered environment**

Teacher-centered teaching	Degree of teacher direction
Class 1	• The students expect teachers to talk more while they are acting passive
	• Teacher direction is strong, and students keep silent
	• Classroom is teacher-dominated

Teacher-Centred Teaching and Reproductive Learning

As reflected,a teacher-centered learning does not employ much reproductive strategy for learning. In this setting, students expected teachers to be authoritarian. The students waited for the teacher to give orders. Instructions should have provided information on "how you shall think and how you shall write and what to focus upon."

Limited background knowledge is not enhanced in this setting. Students' reasoning of assessment was from a perspective of right or wrong, such as looking for an answer in the course. Not much feedback is provided if they did right or wrong. Lot of small assignments had to be accomplished.

Table 2 **The learner-centered environment**

Teacher-centered teaching	Degree of teacher direction
Class 1	• The students expect teachers to facilitate the learning process
	• Teacher direction is strong yet students exercise freedom to participate
	• Classroom is alive with interaction

Learner-Centered Teaching

In the second table shown , the students searched for the reflective moment that gave them support for further reflection. The role of the teacher highlighted an openness that supported students' interpretations and decision-making regarding the task.

As they approached the end of the course, the students began to take extended decisions in relation to the instructions. Classroom taskswere developed more from students' activitiesand practice. More students understood their background knowledge as growing deeper . Their previous knowledge became more profound. Perspectives had become wider.

Discussion of the Findings

It is obviously shown that students enjoyed and learned more in a student centered environment as opposed to the teacher centered classroom. With this result, the researcher designed a training module for language teachers with emphasis on technology integration. The stages involved the focus group discussion and interview of both teachers and students for the analysis stage. The training design was then formulated with the rich output gathered from the forum conducted.

REFERENCES

Bergström, P., &Granberg, C. (2007). Process diaries: Formative and summative assessment in on-line courses. In N. Buzzetto-More (Ed.), Advanced principles of effective online teaching: A handbook for educators developing e-learning. Santa Rosa, California: Information Science Press.

Bernstein, B. (2000). Pedagogy, symbolic control and identity: Theory, research, critique (Rev. ed.). Lanham, Maryland: Rowman& Littlefield Publishers, Inc.

Black, P., &Wiliam, D. (1998). Inside the black box: Raising standards through classroom assessment. Phi Delta Kappan, 80(2), 139-148.

Boyatzis, R. (1998). Thematic analysis and code development: Transforming aualitative information. London and New Delhi: Sage.

Coffey, A., & Atkinson, P. (1996). Making sense of qualitative data. London and New Delhi: Sage.

Garrison, D. R., & Anderson, T. (2003). E-Learning in the 21st century: A framework for research and practice. London and New York: RoutledgeFalmer.

Garrison, D. R., &Baynton, M. (1987). Beyond independence in distance education: The concept of control. The American Journal of Distance Education, 1(3), 3-15.

Harris, M. (2007). Scaffolding reflective journal writing - Negotiating power, play and position. Nurse Education Today, 28, 314-356.

Illeris, K. (2009). Transfer of learning in the learning society: How can the barriers between different learning spaces be surmounted, and how can the gap between learning inside and outside schools be bridged? International Journal of Lifelong Education, 25(2), 137-148.

Langer, A. M. (2002). Reflecting on practice: Using learning journals in higher education and continuing education. Teaching in Higher Education, 7(3), 337-351.

Moore, M. G. (1980). Independent study. In R. Boyd & J. Apps (Eds.), Redefining the discipline of adult education. San Francisco: Jossey-Bass.

Moore, M. G. (1991). Editorial: Distance education theory. The American Journal of Distance Education, 5(3), 1-6.

Mt. Isarog Literatures: A Showcase of Camarinense Cultural Diversity

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ABSTRACT

The study aims to discern the showcase of cultural diversity of Camarinense through Mt. Isarog Literature. The problems were: (1) What are Mt. Isarog Literatures that have been diffused in the places of the Camarinense? (2) Are there variations of Mt.Isarog Literature that showcased the culture of Camarinense? (3.)What are the cultural diversities showcased in Mt. Isarog Literature, in terms of tradition, education, religion and arts.

The research design was Ethnographic-Descriptive Qualitative and purposive or deliberate Non-random Sampling was used.

Results, (1) Forty-four (44) titles of Mt. Isarog Literatures are classified as Folktales, myths and Folklores. Some are distinct stories on phenomenon such as supernatural people, animals; unusual plants and items; historical events; romantic love; faith or religion and Mt. Isarog characteristics.(2) Thirty-seven varieties of Mt. Isarog Literatures and 6 common told stories in all places of camarinense.(3) Some cultural diversities that showcased in Mt. Isarog Literature, in terms of tradition, education, religion and arts. Analysis in various Mt. Isarog Literatures expressed historical events during Japanese occupation, cultural and regional courtship and wedding traditions; farming and harvesting education; religious beliefs such as anito (demigod), anting- anting(amulet) and catholic beliefs; and arts in music, dance and rituals to cure the sick and cast away bad spirits . The study showed significance that: (A) some traditions, beliefs, traits and culture are presently practiced by the old ones; young ones know the literatures and practices but seldom of them patronized and practiced the cultural heritage; b) stories are based on local milieu, people and events which are instruments to recognize, describe, bequeath ethnic literatures and culture; recommendations are:reinforce the patronage of literatures of Mt. Isarog, include them in (k+12) and college curricula;create instructional materials such as video, comic strips and animation that will introduce the literatures of Mt. Isarog and the culture of Camarinense or Bicolanos;increase the diffusion of native culture like in arts, education, tradition and religion publication or printing of the literatures of Mt. Isarog is suggested;propose local government programs/ activities that would support the local culture and literature;and,propose a joint project of NGO and LGU / private and government institutions in formulation of Mt. Isarog festival, featuring its culture and literature, to maintain its identity and remain as mirror of the past of the next generations.

Keywords: Showcase, Literature, Culture, Diversity and Diffused.

Introduction

Literature artistically explains the visible surroundings and the nature of the place, province and region. The examples that are found similar and popular,"Maria Makiling" in Laguna, "DaragangMagayon" in Albay, "Bulusan and Aguingay" in Sorsogon and "Legend of Mt. Isarog" in Camarines Sur.

Literature reflects cultural race. It is an effective way to trace the history, traditions, languages, and cultures of the place that have great relevance to the present.As Genio (2000) said, every kind of literature reflected the behavior, culture, beliefs and even aspirations of every Filipino. Almost all literatures start with folk epics that depict the imagined origins of a people and therefore of a nation (Sionel Jose, 2008, p.6)

The country recognized the importance of folk literatures as stated in the Philippines 1987 Constitution, Article 14, and Section 15. Arts and letters shall enjoy the patronage of the State. The State shall conserve, promote, and popularize the nation's historical and cultural heritage and resources, as well as artistic creations (Law Phil, 2013). The law protects localliteratures for these are country streams to disseminate historical and cultural heritage thus, the law promotes the innovations and artistic treasures of the marginalized folk literatures.. In implementing the law would enrich the thoughts and feelings of students and citizens to patronize the importance of literatures thatenrich the identity of Filipino culture.

There is in our folk literature , history and contemporary life a lot to be mined (Sionel Jose, 2008), encouraged the researcher to study folk literatures in Mt. Isarogwhich could showcase culture of camarinense , and visibly identify the diffusion of the literature conserve and its imbued culture and tradition that would strengthen understanding and awareness. Through the study ofthe different ethnic literature in Mt. Isarog there will be a continuous teaching of local tales to the young generations to be able to know their ancestors' cultures.

Printing of the gathered Mt. Isarog literatures would be the sequel or output of this study. This attempt could contribute to promote Philippine Literature and could respond to the clamor of Lumbera (2007) Philippine Literature is the Filipinos attempt to come to terms with their history and culture. The worst is that Philippine literature is handicapped by the fact there are a very few readers that have access to it mainly because of poverty. The situation implies the neglect of the printed folk literature, and lack of printed materials in vernacular that served as challenge to make it the subject of study.

The researcher believed that linking the past and the present cultures throughliterature is a cultural legacy to the present generation. This research is a great help, first, in the Camarinense, their folk tales will remain in their thoughts and feelings, likewise, they would identify their own cultural identity that would strengthen local identity; second, for the teachers, they wouldhave printed instructional materials in teaching local literature that can be used in K+12 DepEd curriculum and in Literature subjects CHED curriculum ; third, the students, they would be aware of the types of the Mt. Isarogliteratures , camarinenseculture and the cultural diversity in their barangays or towns, and Fourth, and lastly, would awaken the Camarinense'ssenseof value in protecting and appreciating the local .

Statement of the Problem

The study aims to discern the showcase of cultural diversity of Camarinense through Mt. Isarog Literature. The problems were:

(1) What are Mt. Isarog Literatures that have been diffused in the places of the Camarinense?

(2) Are there variations of Mt. Isarog Literature that showcased the culture of Camarinense?

(3.) What are the cultural diversities showcased in Mt. Isarog Literature, in terms of tradition, education, religion and arts.

Scope and Delimitation

This study includedthe selected barangays in towns and cities in the vicinity of Mount Isarog in the province of Camarines Sur. The following are selected by random sampling to be respondents: thirty (30) from the town of Calabanga, divided into ten (10) each in the village of Cumaguinking, Harubay and Lugsad; fifty (50) from the town of Goa, divided into ten (10)each in the barangay of Catagbacan, Digdigon, Hiwacloy, Payatan and San Pedro Aroro: Ten (10) from the City of Naga barangay Panicuason: Sixty (60) from the town of Ocampo, divided into ten (10) each in barangay Del Rosario, Gatbo, Guinaban, San Jose Time, Sto. Niño and Villaflorinda: Forty (40) from the town of Pili, divided into ten (10)each inthe barangay of Curry, Del Rosario, Sto Niño, the Tinangis: Twenty (20) from the town of Tigaon, divided into ten (10) each in the barangay of Consocep, and Libod, and from Twenty (20) in the town of Tinambac, the barangay of Cawayan and Lupi was also divided into groups of ten camarinense respondents .

The study was limited in determining the literature of Mount Isarog that showcased cultural diversityin terms of culture of the Camarinense, classified to tradition, education, religion and arts. Contemporary historical literatures in other towns are not included in the study.

Definition of Terms

Mount Isarog. The focus of the study to determine the diffused literature of the native inhabitants in the mountain. Literature references are used to detect the showcased culture and diversity of cultures inCamarinense.

Camarinense. Refers to the respondents who are the grassroots and native (Agta) living around Mount Isarog and consists of the following villages: Panicuason, Cumaguingking, Harubay, Lugsad, Catagbacan, Hiwacloy, San Pedro Aroro, Digdigon, Payatan, Del Rosario, Gatbo, Guinaban, San Time Jose, Sto. Niño, Villa Florida, Curry, Del Rosario, Sto. Niño, Tinangis, Consocep, Libod, Cawayan and Lupi.

Culture. Defines that culture generally refers to the activity of a community or society. It refers to the habitual behavior and activities of people such as: Tradition, Education, religion and Arts (music and dances) ;a variable used to determine cultural diversity through the diffusion of Mt. Isarog Literatures.

Mount Isarog literatures. Specifying the types of literature such as myths, folktales and folklores that are found in/ about the Mount Isarog.These were the narrated , recorded and documented told stories of native residents.

Showcase-an exhibit or display of an ancient culture, tradition , beliefs or religion or faith, education , practices and arts in Mt. Isarog Literatures

Cultural Diversity – different, unique and rare ancient culture, tradition ,religion, education , practices and arts showcased in Mt. Isarog Literatures

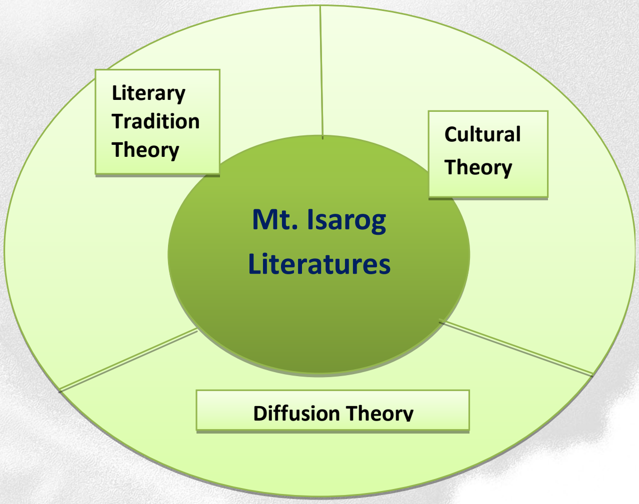
Diffusion- the spread of Mt. IsarogLiteratures tocamarinense. The diffusion process of literatures also processes the transfer of culture.

Methodology

The study is an ethnographic which is a qualitative research that used unstructured and interviews. Purposive random sampling was used .Documentary and content analysis to identify the showcase culture and cultural diversity were the methods used. The procedure involved immersion, recording, collection, translation, verification and validation, description, interpretation and analysis of the gathered data.

Theoretical Framework

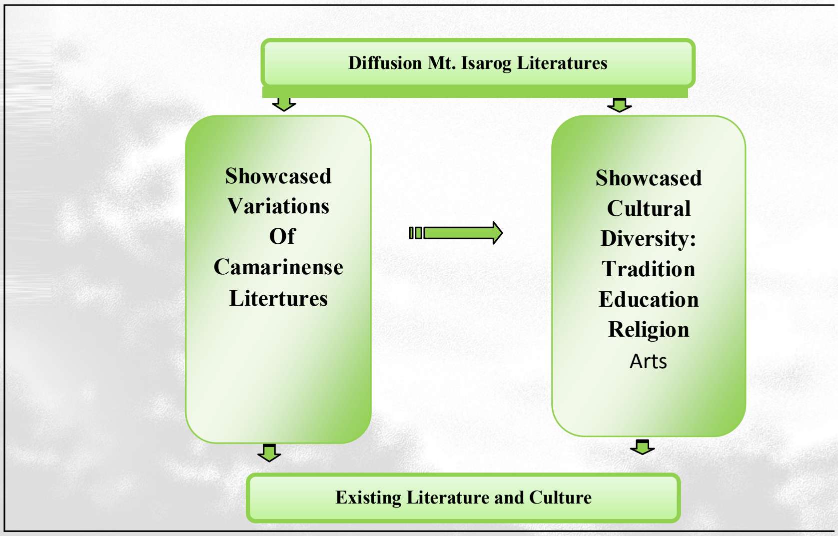
There are theories used as guide to in depth the study of Mt. Isarog Literatures: A showcase of Camarinense Cultural Diversity. Literary Tradition Theory (Gutierrez-Ang , 2009) , relates the work to its literary history by



identifying the tradition to which it belongs. This emphasized the relationship between history and literature by identifying the traditions which it applied. Here it identifies the value of tradition or culture in understanding the interaction on activities of citizens in the literature, or literature revealed the occurrence or event in the area. Literature explainsthe work, culture or traditions of indigenous people. Cultural theory of Turner (2010) discusses that culture can be used to identify theshared customs, beliefs and traditions inherited and translated inraces in a place. The school, family or community shared common culture and literatures that have been introduced in these institutions. The continuous patronage of people in their culture transpired that they know their cultural identityinspite of diversity in culture and literature.The last theory that guides this study is the diffusion theory (Liden& Harris, 2011), explained in this theory the spread of culture, changes, thoughts or ideas, and technology. In proliferation withfeatures, people may patronize or not patronize changes or ideas in which such ideas are inferred in the diffusion of literature in which culture is also diffused.

Conceptual Framework

The study looked into the diffusion of thedifferent Literatures of Mt. Isarog into different barangays .The collected literatures of Mt. Isarog were the bases in the analysis of the showcased types of various literatures. The



provided data on the various literatures were analyzed to identify the showcased cultural diversity in the various literatures of Mt. Isarog . Cultural diversity was identified in terms of tradition, education, religion and arts. Thus, it displayed the similar and different literatures and the existing cultural practices in the place.

Results and Discussion

Table 1. The Literatures of Mt. Isarog told by the Camarinense

Topic Theme	Title of Mt. Isarog Lit.	Story English Translation	Places	Culture
Safeguard and Protection	" Ang Agama" (The Crab),	a sleeping huge crab in the crater of Mt. Isarog, a guard that should not be awaken to avoid the eruption of the mountain	Goa, Tigaon and Tinambac	Respect to tranquility comfort zone
	"Agama at Kasili" (Crab and Fish)	The fighting Agama (Crab) and Kasili (Fish)in the crater of Mt. Isarog so it will not explode.	Ocampo	Competition
	AngAngongolkol	A fearful story of a black water fairy , a strong guard of the bathtub water above Mount Isarog.	Ocampo.	Authoritarian
	AngBulawannaBaka" " The Golden Cattle "	a golden cattle that guarded Mt. Isarog , once it winged to other nearing mountains in Tinambak and Lagonoy that signaled to native villagers of the coming calamity	Tinambac and Lagonoy	Social Mobility
	"AngEngkanto", "The Enchanted"	captivating beautiful fairies (mgadiwata) that protectthe mountain's natural resources against illegal loggers, forest intruders and disturbers of the tranquil woods.	All places	Compassion
	"AngKasili"	A big fresh water fish is said to be the sleeping guard of Mt. Isarog, claimed not to be disturbed for once it happened the mountain would soon spray its wrath.	Naga	Respect to tranquility comfort zone
	Balete Sa Sakduhan" or " The Tree at Well"	" inBalete tree, supernatural creatures remained to safeguard water source in Mt. Isarog. The native Camarinense in Calabanga experienced the presence of underworld creatures while they fetched their drinking water. They exclaimed, "Tabipo!" which means excuse me, asking permission from the unseen creatures to fetch water without suffering incantation.	Calabanga	Respect , protection and conservation
	"BisitangGurang"or " The Old Visitor "	this story is a true experience of an official in barangay Panicuason who admitted that she has third eye. She claimed that sometime in her mid 30's anolderly woman visited to entrust to her the great obligation to take care of the mountain because Isarog is the source of life of the people around. According to respondent, she believes that her old guest was the goddess of Mount Isarog who wasseeking humans help in protecting the environment;	Naga	Delegation, trust or Acceptance of responsibility

Topic Theme	Title of Mt. Isarog Lit.	Story English Translation	Places	Culture
	Bulawanna Mag-inang-Kabayo" the "Golden -mother and child Horse"	the protectors of Mt. Isarog and movable flying towards other Mountains.	Tigaon Pili	Social Mobility
	"DakulangBitis" or the Big Foot"	A true story of a hunter in Mt. Isarog. He mentioned that It was noontime when he caught fish in the big streams on top of Mount Isarog when suddenly his position dimmed and he saw the large footprint on the rocky streams. When he looked at the water, he saw the many large shrimps and fishes jumped up from under water. This unique story of a hunter and once a barangay captain in Libod	Tigaon	Economic Security
	"EngkantadongKanibag" or "Magical Kanibag",	it's about safeguarding the brook and waterfall called Kanibag in Isarog. A story in Pili and Tigaon which have waterfalls;	Pili Tigaon	Respect , protectionand conservation
	"Halas saBukidIsarog""Snake in Mt. Isarog"	a snake that turns white lady. The snake lives in Mt.Isarog to watch the flora and fauna in the mountain.	Ocampo	Respect , protectionand conservation
	"Kapre"	A big black hairytold to be the inhabitant of the mountain to guard its nature;	All places	Respect , protectionand conservation
	"Pako"	Refers to two types of fern located at the top of Mt. Isarog. This story tells thatthe red fern is poisonous and green color is the edible one. According to the natives, you'll see red pako or fern when the withhold fairy guard does not want to give because people might consume all plants.	Goa Tinambac	Deceptive , Respect , protectionand conservation
	"Sir-it"	A dwarf or a tiny people living in Mt.Isarog to guard the bodies of water in Tigaon	Tigaon	Respect , protectionand conservation
	"PutingKabayo" (White Horse)	A guard of Mt. Isarog, flying and roaming around the surrounding mountains.	Ocampo Tigaon	Social Mobility Respect , proectionand conservation
	"TaongMahibo"	A hairy man is said to be giant like who is safeguarding big trees in Mt. Isarog.	Tinambac Goa Tigaon	Respect , protectionand conservation
	"TawongSuhi"	the upside down harsh supernatural creature who is watching and protecting the water falls;	Tinambac Goa Tigaon	Authoritarian Respect , protectionand conservation
	"White Lady"	Her obligation is to protect the mountain	All Places	Respect , protective and conservative
Character	"IsayMaarog" "Who will Imitate"	Explains the story of the local meaning of the term ***isay*** means who and ***maarog*** means imitate.	Goa	Kinship

Topic Theme	Title of Mt. Isarog Lit.	Story English Translation	Places	Culture
	"Isog"	refers to the sense of boldness of native inhabitants is based on the story on passing struggle using bolo every conversation and enjoyment of the native Cimarron (Agta) before the Spaniards. Isog is a symbol of valor inevery wound slashed. The story was narrated by theagta descendants.	Tigaon	Bold , courageous
	"Kasurog",	means allies or comrade is a story in Mt. Isarog which volcanoes are in fight.	Ocampo	competition
	"Mapusog"	tells the strength and greatness of Mt Isarog. These qualities are the reasons why the Mt Isarog is so called "Mapusog"	Pili	Bold , courageous, strong
	"Turog	Is a name taken from Mt.Isarog which means it asleep and should not be awaken, once it happened, a large water-flood would be experienced of the villagers of Naga City.	Naga	Respect to tranquility comfort zone
	"SulongBukid",	the only mountain seen in the area of Pili	Pili	unique
Historical/ Factual	"Guerilla kanHapon" ,or "Japanese Guerrilla "	Memories of old men Camarinense who had their war experiences with the Japanese in MtIsarog . This is all about their courageous fight against Japanese. The said experiences of the native old men are the same in all places. They all remembered their extraordinary and unforgettable story of the rebelnamedPadua during Japanese time;	All places	Bold , courageous, strong unique
	"Pagbangakan Bicol Region",	according to the chronicle of grassroots, it is named Isarog when the Bicol Region was divided into different provinces.	Pili	compliance
	"PinangarankanHapon"	narrated by a native, a Japanese reached the mountain and named it Isarog.	Pili	recognition
	"PitongAnig",	a farmer explained his experienced as he adventured to the seven mountains in Mt. Isarog.	Ocampo	Clear-out
	"Water Shed"	Mt. Isarog forms of waters from the mountain are the drinking sources of the Camarinensewho are living in its circumference	All places	Dependent Acceptance
Religion / Faith	"KinaluhudanniHesus"	seenat the top of Mount Isarog is the kneel marks of Jesus.	Pili	Recognition and acceptance
	"LarawanngMukha" o ang "LadawansaRangas",	Stating that the face of the Blessed Mother sketched on a rock at the top of Mount Isarog.	Goa	Recognition and acceptance
	"PagconsagrasaIsarog",	stating the mass held and the blessing of the priest at the top of Mount Isarog after its strong eruption many centuries ago	Tinambac	Recognition and acceptance

Topic Theme	Title of Mt. Isarog Lit.	Story English Translation	Places	Culture
	"San Pedrohan"	an area at the top of Mount Isarog with large stones with carved shape of a roster of St. Peter. According to the natives around the area, they heard the crowof the rooster even at night.	Ocampo Pili and Tigaon	Recognition and acceptance
Tunnel	" AngKawayan" "The Bamboo"	Referring to the tunnel at the top of Mt. Isa-rogwhere the water flowed to ocean.	Calabanga	Social Mobility
	"EroplanosaIsarog",or the "Plane in Isarog",	is about the danger in Mt. Isarog which her grandparent told her the plane crashed in the crater of Mount Isarog because of the large cyclone that pulled it inside the crater.	Naga	Non interference ambivalence
Trade and Commerce	AngBatang" (The Log)	a big ship passing from the great river to the mouth of the water in the forest foot of Mount Isarog. The log is a magical ship full of forest products , from the enchanted mountain. The ship navigates from and to upstream water pouring from Mount.;	Calabanga, Goa, Naga, Ocampo, Pili, Tigaon and Tinambac	Exploitation Nepo-ticism , deception
	" Barkoni Noah" or "Noah's Arch"	another version of "AngBatang" or "The Log" it is said that from Mt. Isarog is a big ship appeared passing in the spillways of the said barangays and reached Sabang Seaport before it proceeded to the ocean;	Tigaon	Social Mobility, Faith
Love	AngAlamatngBundok-Isarog", (The Legend of Mount Isarog	the name "Isarog" is a son which his name is derived from parents" name Isaray and Di-maarog, the first two syllables of the name of the mother "Isa" and the last syllable of name of the father "rog" are combined.	all places	Bonded family Courtship Dance and music rituals in wedding
	"IsangIrog" mean one love	a romantic story of a man with his dear one. It means Isarog is a name of a man who is loyal to his love one.;	Calabanga, Goa, Naga	loyal
Caution	"Kampana" (Bell)	native respondents in Tigaon who were living near the waterfalls said that this bell shaped rock was on top of the three big rocks in a stream. The bell shaped stone rang when there's strong water current or natural phe-nomenon may happen. They were saying that these three rocks deliberately sounding when there were powerful stream of water and a disaster. The sound of the bell informed the native to prepare for the coming calamity	Tigaon	Religious Social Mobility Tradition-alism
	"TawongNawawara"	the disappearance of some men in the forest that happened once there was calamity or misbehaved in the mountain.	, Tigaon and Tinambac	Deceptive No con-scious

Topic Theme	Title of Mt. Isarog Lit.	Story English Translation	Places	Culture
Wealth	Baka(Cattle)	" Cattle" around the village of Panicuason that brought wealth to the place for its livestock manure is gold. Everyone in the village was looking for this cattle monitored the cattle until it disappeared in the village.	Naga and Ocampo.	Luck, fortune badluck
Death	"KahoynaSinukuan"	a big tree on top of Mt Isarog and all living things any person or any animal closed to it died. There were no greenery around it, except the bones or skeletons of animals and dead plants.	All places	Dangerous fatalism

Mt. Isarog Literatures that have been diffused in the places of the Camarinense

Table 1 Shows that Mt. Isarog Literatures have been diffused in the places of the Camarinense. Forty-four (44) titles of Mt. Isarog Literatures were gathered from the resident natives whose ages are from 15 years old to 98 years old. The literatures are classified as Folktales, myths and fables. Among the numerous titles are mostly of the stories about myths , folklores and folktales. **There are nineteen (19) titles of folktales that display common message to the camarinense , that message is protecting and safeguarding the water resources and other flora and fauna in the said mountain**. The distinctive characters in the stories that are 7 seven magical animals : " Ang Agama" (The Crab), "Agama at Kasili" (Crab and Fish) , AngBulawannaBaka " (The Golden Cattle) " AngKasili" (The Fish), "Bulawanna Mag-inangKabayo" (The Golden Mother and Child Horses), "Halas saBukidIsarog" (Snake in Mt. Isarog), "PutingKabayo"(White Horse); there are ten (10) extraordinary characters who belong to underworld humans: "AngEngkanto", (The Enchanted), "BisitangGurang"(The Old Visitor), "DakulangBitis" (Big Foot), "EngkantadongKanibag" (Magical Kanibag), "Kapre", "Sir-it","PutingKabayo" (White Horse), "TaongMahibo", "TawongSuhi" and "White Lady " ; two (2) unusual plants, "Balete Sa Sakduhan" (Tree at Well) and "Pako" (Fern). **There are six (6) mystical stories that explain the etymology / origin of the names or words that rhyme in Isarog . the meanings of the names of the character titles described the characteristics of the main character or the mountain , the Mt. Isarog:** "IsayMaarog" (Who will Imitate),"Isog" (Boldness),"Kasurog" (Comrad), "Mapusog"(Strong), "Turog" (Sleep) and "SulongBukid" (Sole Mountain), . **Moreover, there are five (5) stories that are depicting facts and history of the place:** "Guerilla kanHapon" , or "Japanese Guerrilla " (Japanese Rebel),"Pagbangakan Bicol Region" (Division of Bicol Region), "PinangarankanHapon"(Japanese Named it),"PitongAnig" (Seven Mountains) and "Water Shed" ; Religion is one of the identified stories in Mt Isarog . **Religion or the catholic faith of the camarinense has been mirrored in the five (5) stories :** "KinaluhudanniHesus"(Kneeled place of Jesus),"LarawanngMukha" o ang "LadawansaRangas",(Portrait) ,"PagconsagrasaIsarog",(Mass in Isarog) and "San Pedrohan" (Place of St. Peter); There are two (2) stories that imply passage of the mountains, and its dangerous location.: " AngKawayan" (The Bamboo) and "EroplanosaIsarog"(Plane in Isarog) ; **Two (2) mystical versions of the a story on enchanted big ship for trade or commerce from the enchanted place in Mt. Isarog** : AngBatang" (The Log) and " Barkoni Noah (Noah's Arch); and the two (2) titles that narrated many cultural practices, and romantic love stories are AngAlamatngBundokIsarog"(The Legend of Mount Isarog) and "IsangIrog"(One Love) romantic love stories that highlighted the interest of the natives to remember Mt. Isarog Literature. There are two mysterious stories that warn the camarinense and even strangers , the "Kampana" (Bell) and the "TawongNawawara" (Disappearance of Man); **One magical story that displays wealth in Mt Isarog** is the Baka(Cattle) and the last unique folktale is the "KahoynaSinukuan" (Tree of Surrender) that connotes conservation and death and danger in the midst of the mountain.

Variations of Mt. IsarogLiteratures that showcased the culture of Camarinense

Based from the collected stories which were gathered through documentation and immersion with the native residents or camarinense in Mt. Isarog , there are Thirty-seven (37) variety of Mt. Isarog Literatures and 7 common told stories in all places of camarinense. Topics are varied, magical(folktales) and historical (saga / legends) or extraordinary and reality. A literature on Mt. Isarog which topic is most common , **safeguard of natural resources or biodiversity in the mountain. This common topic has different characters and details that showcased varied cultural values of the camarinense : respect to tranquility , competition, authoritarian, social mobility, compassion, protection and conservation, delegation, trust or acceptance of responsibility, economic security, deceptive**; Some titles of the story explain the characters of the mountain which show the culture of **kinship, boldness , courageous, competitive, strong, respect to tranquility**; tales that convey h**istorical events** showcased the culture of **boldness, courageous, strength, uniqueness, compliance, recognition, clear-out , dependent and acceptance** ; Some stories have details that traced Hispanic religious influenced and showcased the culture of **faith, loyalty, recognition and acceptance;** Two stories told are about **openings , tunnels and passages** of water which conveyed the culture of **social mobility , non-interference and ambivalence**; literature has the topic story on trade and commerce of Mt. Isarog's natural products, magical voyage of the products to national and international commerce. Such details manifested the culture of exploitation, Nepotism and deception. T**he common legend of Mt. Isarog has completely diffused to Camarinense, it expressed loyalty , love, courtship, marriage , wedding culture and practices; other rare topics which are popular in one place has the topic caution that transferred the culture of belief on superstition ,social mobility, traditionalism; the topic about wealth that implied luck and the topic death that suggested the culture of vulnerability and fatality.**

Cultural diversities showcased in Mt. Isarog Literature, in terms of tradition, education, religion and arts

The 37 variety of Mt. Isarog literatures which are not common to some places and unique in a place implied Cultural diversities. Cultural diversity occurred in Partido area due to its geographical location. Mt. Isarog serves as the partition of the rural and the urban places in lowland. However, the mountain serves as the connection and bonded life and living of the natives or the upland camarinense. During my stay in 23 barangays, most of the residents are relatives or belong in one clan by consanguinity and affinity. This indicates that the integral of cultural heritage of Camarinese. Varieties in culture are gradually happening and uncontrollable since migration and immigration of young grassroots to find better opportunity, marry and stay with the non bicolanosand because of education. This findings is supported by the statement in Bicol Culture (2013) online article that, they (Natives) believe it is safe to stick to the old than take a risk in the new. To some extent however, the educated Bicolano has begun to change gradually.

The cultural diversities showcased Mt. Isarog Literature in terms of tradition are the following: tradition of being conservative and preserve are shown into different faces in the folktale on the safeguard of Mt. Isarog's natural resources. Such tradition showcased varied cultural values of : respect to tranquility, competition, authoritarian, social mobility, compassion, protection and conservation, delegation, trust or acceptance of responsibility, economic security, deceptive; Bicolanos are known of being conservative and reserve. Another showcase of variety of culture is religion. catholic faith or religion , during interview almost all of the respondents confessed their strong believe in the power of Talisman, anting-anting or agimat, taosalipod or unseen creatures like fairies , enchanted creatures or animals and plants. Even the educated ones still used Tabipoor excuse me, the common expression acknowledging the unseen creatures. Similar to the statement of Lopez(2013), that catholic God and heavenly host have replaced the supreme god Gugurang and the minor deities, each of whom has a special function. But the darker side inhabited by witches and monsters seem to live on the minds of some BicolCatholics . The camarinense established strong catholic faith but still hold the ancestor worship in some areas; Every seminasanta, some native camarinense stayed on the top of Mt. Isarog to have anting anting. Another respondent narrated that his grandfather who was a quack doctor was known of his anting- anting and stayed one year in a cave. Mr. Reyes said his grandfather entered the cave during seminasanta and came on the next seminasanta, to have strong power of anting- anting. This indicates that the native camarinense combined the old and the new beliefs. They stayed on the top of Mt. Isarog until Biernes Santo (Good Friday) ends. Education in planting and harvesting old culture is still done by the grassroots. They use the anting- anting in a post-harvest thanksgiving ritual. Bicolano farmers offer food to the spirits of their ancestors. Killing phython and showing the blood on the field before planting is another cultural practice even they use fertilizers and other technology in planting and harvesting. MangEsmael, 57, agta in Ocampo , told me that "mas maraynasabaygamiton an nanudansamgagugurang nan samodernonapaagi, parasigurado. "(It is better to use both the learned practices and tradition of the ancestors and the modern way for the guaranteed result.

Two (2) titles that narrated many cultural practices, and romantic love stories are AngAlamatngBundokIsarog" (The Legend of Mount Isarog) and "IsangIrog"(One Love) romantic love stories that highlighted the interest of the natives to remember Mt. Isarog Literature. These stories showcased the culture of bicolanos in expressing love. The native camarinense are romantic and loyal when it comes once in love. Their intrinsic artistic qualities came out. They showed their feeling in a song or music, dance and rituals which are always part in wedding ceremony. An interesting courtship story of ManayMaming, 78, Hiwacloy Camarines Sur about the courtship of the agtas or native camarinese in the tribe of Mt. Isarog. She narrated the courtship ritual, which is the woman would run to the middle of the forest and hide and the man would seek for her. Once the woman was found it means there would be a wedding. When they returned at the village the woman was carried on his back an indication of acceptance and romance. Another varied culture is the tabak dance of the camarinense in upland of Pili , Calabanga, Tigaon and Tinambac. Tabac dance has been performed by the agtas which they have learned from their ancestors and never transferred or taught to member of the family who has no signs to do the ritual for they used real sharp tabak o bolo . It is a dangerous performance to seek help from the spirits to heal sickness, to receive blessings and to provide security.

Conclusions:

Mt Isarog literature is abundant in Camarinese. They have been diffused in Partido area. Changes in culture and practices in the stories are minimal since the respondents are all living at Mt. Isarog which various barangays are connecting. They are relatives or Kumare and kumpadre that maintain the essence of the integral focal point of the stories. Variety in details happened because stories are not documented . They were transferred through words of mouth . Some Camarinenseleft their place and returned in the place after several years. They acquired new culture and story that could change their narration of the local stories due to his mixed experiences in other places . The same thing may happen to the immigration of new members as wife or husband , new member in the family has another story to tell that might add and subtract to the details of the story. Example , in Agta Tribe in VillaralboTigaon, an old wife was excited to tell a story until she realized that the story she was narrating was about a place in Albay for she was from Albay and stayed in the tribe for almost 30 years.

Several topics showcased culture of the place. Such variety of Literature of and from Mt. Isarog showcased different cultural diversities. Some cultural diversities that showcased in Mt. Isarog Literature, in terms of tradition, education, religion and arts. A unique variation of a story came out, Mt. Isarog Literatures expressed historical events during Japanese occupation, . These Another myth of saga during Japanese occupation is collected from pieces of puzzles of stories which were narrated by the different natives in seven towns, turned to complete l magical historical story of Mayor Lorenzo P. Padua the son of Col. Teopelo Padua. Another historical battles of male natives using Tabak (bolo) known as audacious practiced of agtas and battles of mountains that display courageous attributes of the rural camarinense; Though battles and safeguards are the common literatures gathered stories that have diffused to Camarinense, there are still stories that are peculiar to other places of the respondents but well-known to limited places are Mt. Isarog as setting of the stories that depicts faith or religion.

Cultural practices in courtship and wedding are traditions of camarinense; farming and harvesting education; religious beliefs such as anito (demigod), anting- anting(amulet) and catholic beliefs; and arts in music, dance and rituals to cure the sick and cast away bad spirits . The study showed significance that: (A) some traditions, beliefs, traits and culture are presently practiced by the old ones; young ones know the literatures and practices but seldom of them patronized and practiced the cultural heritage; b) stories are based on local milieu, people and events which are instruments to recognize, describe, bequeath ethnic literatures and culture.

Recommendations:

1. To reinforce the patronage of literatures of Mt. Isarog, include them in (k+12)and college curricula.
2. To create instructional materials such as video, comic strips and animation that will introduce the literatures of Mt. Isarog and the culture of Camarinense or Bicolanos.
3. To increase the diffusion of native culture like in arts, education, tradition and religion publication or printing of the literatures of Mt. Isarog is suggested.
4. To propose local government programs/ activities that would support the local culture and literature.
5. To propose a joint project of NGO and LGU / private and government institutions in formulation of Mt. Isarog festival, featuring its culture and literature, to maintain its identity and remain as mirror of the past of the next generations.

BIBLIOGRAPHY

Gutierrez-Ang, Dr.Jaime.Literacy Tradition Theory-PNU Teachers Guide.Kritika, (Edition). 2009.

Constitution of the Philippines (1987) http://www.seasite.niu.edu/Tagalog/ang_1987_konstitusyon_ng_republi.htm

National Commission for Culture and the Arts (NCCA)http://www.ncca.gov.ph/about-ncca/about-ncca/about-ncca-history-mandate.php(retrieved 2012)

DalisayJr, Jose. Likhaan.Interview of Lumbera. 2007.

Dalisay, Jose Jr. Likhaan: Interview BienvenidoLumbera. UP Press Diliman Quezon City. 2007.(p.281, 284 & 286)

Cael ,Juan. Panayam. Barangay Villaflorida, Ocampo , Camarines Sur. 2011.

Capt. Mendoza. Panayam. Barangay Libod, Tigaon, Camarines Sur.2011.

Castro, Sandy. Panayam. Barangay Harubay, Calabanga , Camarines Sur. 2011.

Maming.Panayam. Barangay Hiwacloy, Goa, Camarines Sur.2011.

Mario.Panayam. Barangay Libod, Tigaon, Camarines Sur.2011.

Genio ,Shirley A. Kwentong Bayan, BakasngSosyo-KulturalnaDimensyon.Di-nalathalangMasteral Thesis, University of Nueva Caceres, Lungsodng Naga, 2000.

Palispis, Epitacio S., Iintroduction to Sociology and Anthropology , 1997

Liden, Danile and Harris, Bronwyn (Ed).(Retrieved 2011) www.wisegeek.com/what-is-the-diffusiontheory.htm.

National Commission for Culture and the Arts (NCCA)http://www.ncca.gov.ph/about-ncca/about-ncca/about-ncca-history-mandate.php(retrieved 2012)

Turner (retrieved 2010) http://www.google.com/ books.hl=tl&lr=&id=PyofmQ_k6VYC&oi=fnd&pg=PR7&dq=turner%27s+cultural+theory&ots=Q96v2HZcT_&sig=MOE9fuqxDxyS87MKrAUo0pvpyPE#v=o

Bicol Culture (2013), http://www.livinginthephilippines.com/Culture-And-Tradition/bicolanos-customs-and-traditions.html

Lopez, Diana (2013), http://www.ncca.gov.ph/about-culture-and- arts/articles-on-c-n-a/article.php?igm=4&i=244

Tracer Study of BSHRM Graduates of Partido State University-San Jose Campus: As Basis for Curriculum Development

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ABSTRACT

Pursuant to Republic Act 7920 otherwise known as the conversion of Partido State College into a University status adheres to promote and lead to sustainable development in the Bicol Region. The PArtido State University-San Jose Campus offers Bachelor of Science in Hotel and Restaurant Management as one of the programs through CMO # 30, series of 2006 and per BOR # 7, series of 2009 as revised, a tracer study for graduates is conducted.

Tracer study is a vital tool to determine the status of graduates after satisfying the requirements in their chosen program. This study deemed necessary to know the number of graduates to improve the curriculum of instruction to be globally competitive and responds to the need of the industry. It used the descriptive-survey method. There were sixty-two (62) respondents who participated in this study among the graduates. Data were treated using descriptive statistics.

Many of the respondents were regular/permanent, mostly occupying rank and file jobs. This was encouraged by the strong focus on TESDA's competency requirements. General communication skills and human relation skills were the most useful competencies acquired during studies in college and were also used in their current job.

From the results, researchers recommended re-alignment of curriculum or intervention activities that would strongly focus on management relevancy; conduct further study to support the first recommendation cited; and, encourage graduates to aim for higher job position as professional BSHRM graduates.

INTRODUCTION

Tracer study is vital tool to determine the status of graduates after satisfying the requirements in their chosen program. This study deemed it necessary to know the number of graduates employed and non-employed, and the relevance of the competencies that will help improve the curriculum of instruction to be globally competitive and responds to the need of the industry.

The BSHRM ladderized curriculum possesses qualifications to enable the students be globally competitive in their chosen field with the international standards. Students were abreast with the knowledge, skills and attitude that will respond to the needs of the industry. These qualifications are the following: food and beverage services, bartending, housekeeping, front office, and bread and pastry production. With the different competencies earmark per qualification it is necessary to know whether these competencies help them, hence, this tracer study.

This study seeks to determine the BSHRM Graduates of Partido State University-San Jose Campus that sought to answer the following:

1. What is the employment/unemployment status of BSHRM graduates for the past three years from 2010-2012?
2. What is the nature of the respondents' employment?
3. What is the most important reason of accepting the job?
4. What is the level of position acquired?
5. What are the competencies useful in their profession?

This tracer study covers BSHRM graduates of Partido State University-San Jose Campus who completed with their studies in March 2010 until March 2012, respectively. This determines the graduate skills set provide them with "fast start" capabilities enabling them to efficiently and effectively contribute to the management from their first day of employment. The inputs of this study will also serve as basis to enhance the curriculum and the management.

METHODOLOGY

This section presents the methods and procedures used by the researchers to ultimately gather the necessary primary and secondary data and information that are essential and have significance in attaining its objectives.

Instrumentation

Data were collected using graduate survey. Data were treated using descriptive statistics (simple frequency count and percentage technique).

Sampling

Using purposive sampling, out of eighty-five graduates from 2010 to 2012 only sixty-two or 72.94 percent participated. Not all respondents could be located particularly if they had relocated from their present address. The distribution of respondents is shown in Table 1.

Table 1. Distribution of Respondents

Respondent	2010	%	2011	%	2012	%	Total	%
BSHRM	12	19.36	11	17.74	39	62.90	62	100

Research Design

This study used the descriptive-survey method of research. The Researchers considers this method to measure the status of BSHRM graduates. This instrument was identified appropriate to gather valuable facts needed in the study.

RESULTS AND DISCUSSION

Employment Status. Table 2 shows the frequency distribution of the respondents according to their present employment status. Out of 62 respondents, fifty or 80.64 percent are employed while twelve or 19.36 percent is not employed. The highest employment frequency rate of thirty-four 58.84 percent is found among the 2012 graduates.

This could be attributed to the teachers' effective instructional interventions like simulated approaches that have been improved overtime allowing stronger skills acquirement among learners matching labor market skills demand.

Table 2. Frequency Distribution of Graduates' Employment Status from 2010 to 2012

Year Graduated	Employment Status				Total	
	Employed		*Unemployed*		*f*	%
2010	9	14.52	3	4.84	2	19.36
2011	7	11.29	4	6.45	11	17.74
2012	34	54.84	5	8.06	39	62.90
Grand Total	**50**	**80.64**	**12**	**19.36**	**62**	**100**

Nature of Present Employment. Table 3 shows the present nature of employment of respondents. The highest number of respondents was employed in 2012 under permanent and contractual bases as shown by fourteen or 22.58 percent in both categories. As a whole, permanent position was shown by twenty-four or 38.51 percent while contractual was seventeen or 27.42 percent. This is indicative that the graduates' performance in terms of knowledge and skills acquired has been used by the students and met the expectations and standards desired by their employers and industry.

Table 3. Frequency Distribution of Graduates' Nature of Present Employment

Nature of Employment	2010		2011		2012		Total	
	f	%	F	%	*f*	%	*f*	%
Regular Permanent	5	8.06	5	8.06	14	22.58	24	38.71
Contractual	3	4.84			14	22.58	17	27.42
Casual								
Temporary			1	1.61	4	6.45	5	8.06
OFW	1	1.61	1	1.61	5	3.23	4	6.45
Unemployed	3	4.84	4	6.45	2	8.06	12	19.36
Grand Total	**12**	**19.36**	**11**	**17.74**	**39**	**62.90**	**62**	**100**

Important Reason for Having the Job. Table 4 shows the frequency distribution of the graduates' reason/s for having the job. The highest frequency of responses was accredited to accepting the job due to its attractive benefits and salaries (33 responses). The second highest frequency of responses was attributed to having strong career challenge through unrelated to the course they graduated (28 responses). The least was having a job in line with the major field of specialization. Gaining work experience was the main driving force for accepting unrelated jobs.

Table 4. Frequency Distribution of Graduates' Reason for Having the Job

Reason	Year Graduated			Total
	2010	*2011*	*2012*	
Job related to BSHRM course	2	1	13	16
Unrelated but has a career challenge	3	6	19	28
Accepted due to salaries and benefits	4	7	22	33
Related to special skills	1	4	22	27
Grand Total	**10**	**18**	**76**	**104**

Level of Position Acquired by Respondents. Majority of the respondents landed jobs of the rank and file category, shown by 47 or 75.81 percent. For the supervisory job category only three or 4.84 percent of the respondents occupied those positions. None ever occupied managerial position. Ladderized curriculum particularly during their first two basic years were strongly focused on TESDA's competency requirements, hence, strong motivation to land rank and file positions are quite evident. Conflicting with CHED interest because BSHRM by its very nomenclature is management-oriented, the University curriculum or instructional interventions and approaches must provide stronger focus on management in its senior years.

Table 5. Level of Position Acquired by Respondents

Nature of Employment	Year Graduated Frequency						Total	
	2010		2011		2012			
	f	%	F	%	*f*	%	*f*	%
Rank and file	9	14.52	6	9.68	32	9.68	47	75.81
Supervisory			1	1.61	2	3.23	3	4.84
Managerial								
Grand Total	**9**	**14.52**	**7**	**11.29**	**34**	**54.84**	**50**	**80.64**

Competencies Useful in the Respondents' Occupation. The distribution of responses as shown in Table 5 suggests that 37 or 59.66 percent of the respondent human relation skills acquired during studies were used in current job. This is followed by 34 or 54.84 percent who signified that their general communication skills acquired during studies in college were also used in current job. Unfortunately, the respondents were found weak in critical thinking skills, shown only by 9 or 14.52 percent. On the contrary, the respondent graduates also demonstrated average in problem-solving skills as shown by twenty or 32.26 percent. As a whole, there existed evidence that graduates have gradually changed from 2010 to 2012 in the acquirement of adequate knowledge and skills that would enable them to perform the tasks in their work adequately to the satisfaction of their employers.

Table 6. Competencies Useful in the Respondents' Occupation

Nature of Employment	Year Graduated Frequency						Total	
	2010		2011		2012			
	f	%	F	%	*f*	%	*f*	%
Communication Skills	4	6.45	7	11.29	23	37.10	34	54.84
Human Relation Skills	4	6.45	7	11.29	26	41.94	37	59.68
Critical Thinking Skills	2	3.23	2	3.23	5	8.06	9	14.52
Entrepreneurial Skills			2	3.23	10	16.13	12	19.36
Problem Solving Skills	3	4.84	5	8.06	12	19.36	20	32.26
Information Technology	2	3.23	5	8.06	5	8.06	12	19.36
Skills								

Conclusions

Many of the respondents are regular/permanent employees; however, mostly are occupying rank and file positions. None ever occupied managerial position. Ladderized curriculum particularly during their first two basic years were strongly focus on TESDA's competency requirements, hence, strong motivation to land rank and file positions are quite evident. General communication skills and human relations skills are the most useful competencies acquired during studies in college and were also used in their current jobs.

Recommendations

1. As a result where most of the respondents landed jobs of the rank and file category re-alignment of curriculum or intervention activities that would strongly focus on management relevancy is encouraged.
2. Conduct a study whose findings would support the first recommendation in this study.
3. Encourage graduates to aim for higher job position being professional BSHRM graduates.

REFERENCES

Benjamin Bolaane; Joseph M. Chuma, Bogadi Toteng, O.B. Molware (2010), "Tracer Study on the Employment Outcomes of the Vocational Training Graduates," Botswana Training Authority. http://www.botswanalmo.org.bw/docs/Documents/BOTA.pdf

Cesar B. Bermundo, Alex B. Bermundo, Simplified Statistics for Beginners, 2004, pp.39

Jarito Verona (2005).,"A Tracer Study of the Employment Status of PUPQC AY 2004-2005," http://www.academia.edu/4018283

Francisco M. Zulueta and Jose R. Perez, Methods and Research Thesis Writing and Applied Statistics, 2010 National Book Store.

University Manual, 2001

CMO #30, series 2006 of Commision of Higher Education

BOR #7 series of 2009, BSHRM curriculum as revised

Employability and Employability Profile of Tourism Management Graduates of PSU-San Jose Campus: As Basis for Curriculum Modification

Jocelyn Amata, Emy S. Lasarte, Cristy Naldoza, Sean A. Sierra and Arnel B. Millesca

ABSTRACT

The Bachelor of Science in Tourism Management (BSTM) course offered by Partido State University San Jose Campus at San Jose, Camarines Sur has existed and supplied the region with graduates for the past 6 years. The course is an advocacy program of the campus being the University's center for tourism studies.

By determining the employability and employment of the graduates the PSU-San Jose Campus can make a complete assessment of the impact of its education and with the essential data, it could make the necessary modifications on their curriculum (Millintong, 2010) so that it could further enhance graduate chances of matching with industry needs. The use of tracer study may answer this need plus an assurance to align to the changing educational, socio-economic, industrial and technological demands (Boaduo, 2009).

This paper therefore aims (General Objective) to examine, evaluate and study the subsequent career opportunities and other employment patterns of tourism graduates from Partido State University to suit its curriculum to current tourism industry demands.

The major findings revealed that respondents worked in the line with their academic preparation but most of them landed on rank and file or clerical jobs instead of managerial or executive positions.

The study recommends the following: 1) Encourage Government to design a management focused competency certification that would differentiate rank and file manpower from management trainees. 2) Introduce overseas on-the-job training. 4) Curriculum transformation in becoming stronger in management relevancy. 5) Encourage graduates to aim for higher job position as professional management graduates.

Introduction

Tracing graduates is very important. By determining the employment and fortunes of the graduates the Campus, according to Millington (2010), can make a complete assessment of the impact of its education on their graduates and by this means with the essential data, the Campus can make the necessary adjustments or modifications on their curriculum or even in instructional delivery. In so doingit could further enhance graduates chances of matching graduates with industry needs and the probability of achieving employment and employment success will be higher. The use therefore of a tracer study will be more of an attempt to get an assurance for improving the quality of the course offered so that it couldmeet the changing educational, socio-economic, industrial and technological demands of the current century (Boaduo, 2009). According to Zainab, Edzan & Rahman (2004) it is essential for any higher education institution to conduct tracer study andconstantly evaluate its curriculum not because it wants its content to remain relevant and of high quality but in order to meet the demand of the prevailing job market. To Guzman & Castro (2008), these are challenges for the universities to meet the demand for employable graduates because of "the changing nature of the work environment, the emergence of technology-driven processes, and the diversified needs of clientele" which had made the workplace complicated for graduates to match.

This paper therefore aims (General Objective) to examine, evaluate and study the current and subsequent career opportunities and other employment patterns of BS Tourismand BS Tourism Management graduates from Partido State University-San Jose Campus (PSU-SJC). Further, the results of this study would attempt to describe the following:

1. demographic characteristics of graduates majoring in BSTourism and BSTourism Management at PSU-San Jose Campus including: sex, civil status, province & region, location of residence and education.
2. number of graduates who are employed and who are currently unemployed.
3. nature of employment of graduates.
4. number of graduates who take alternative jobs outside their knowledge and skills training environment.
5. if the academic curriculum in college is relevant to their job.
6. what competence learned in college the graduates has developed as employability skills needed for career in the tourism industry.
7. number of graduates with professional degree but work at sub-professional jobs.

It is therefore predicted that the findings of this study would assure high employment and employability rate and would lead to curriculum enhancement.

Materials and Methods

Using convenient sampling only twenty-four questionnaires were distributed to all those who were earlier contacted and signified their willingness to participate in the survey. These graduates were taken from graduates during the academic years 2006-2007 to 2011-2012 (6 Investiture rites). The Investiture Program being the official graduation program which contained the listing of graduates together with some other relevant information was tallied with the registrar's records and used as bases for documentary analysis in identifying participants. Activities as to the mode of obtaining higher response rate like the use of email, co-researchers, and students graduates were considered by the members of the research circle.

Instrumentation

Data will be treated using descriptive statistics (simple frequency count and percentage technique) with the aid of the Microsoft Excel 2007 Statistical Package.

Sampling

The participants of this study that earlier signified their willingness to participate were the twenty-four graduates of Bachelor of Science in Tourism (BST) and Bachelor of Science in Tourism Management (BSTM) from Academic Year 2006-2007 to 2011-2012. The civil status, gender, education, residence, age, and place of work will be described and reflected.

Research Design

The descriptive method of research was employed in this study. The independent variables are the civil status, gender, education, residence, and age. The dependent variables are employment and employability. Please find the study framework anchored on the concepts of employability advocated by Yorke and Knight (2003) (as cited in Gusman& Castro,2008) "in the concept relating to the ability of graduates to overcome job challenges and the ability of the graduates to become employed". Where employment or being employed stands to having a job and employability is the state of being employable which means having the qualities needed for employment. The participants' qualities (independent variables) will condition them of being employable because of their education and competencies required of the job. The acquired knowledge and competencies or skills needed by the tourism industry (that were acquired from the University) will allow them higher chances of employability.

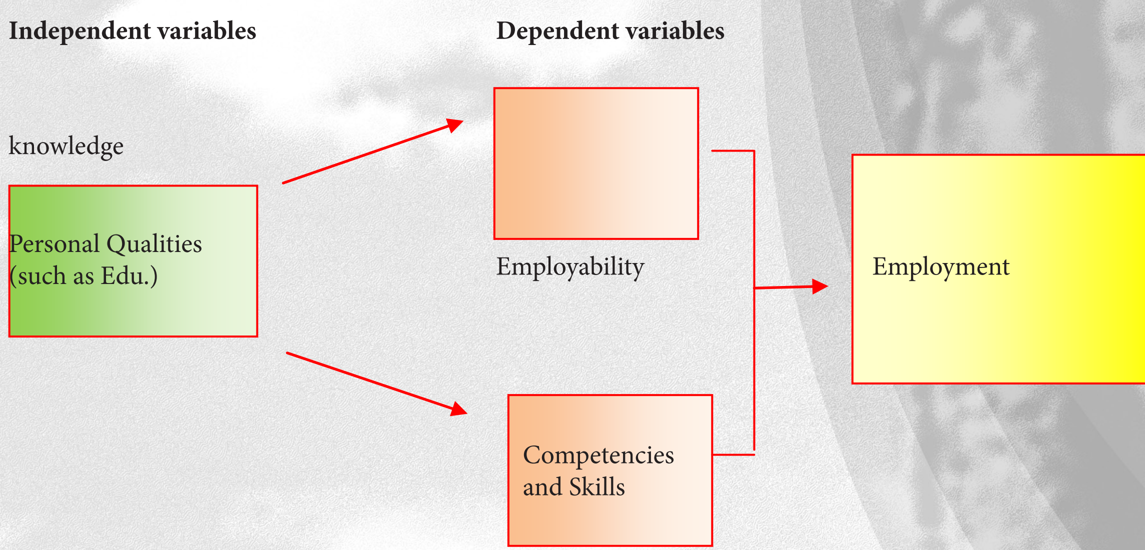

Figure 1. **A schematic model of employability**

Measures

The researchers used a modified Graduate Tracer Survey (GTS) as the primary data gathering instrument. This instrument was patterned after the Jarito Verona, "A Tracer Study of the Employment Status of PUPQC AY 2004-2005" and Lourdes College GTS.

The different graduation programs of the different academic years and the records of the graduates available from the Registrar's Office were verified. After the names have been taken, their parents were contacted as regards to the address of the participants. Once the address of the participants had been taken, through mobile phone, email, courier services, graduates, and friends or relatives, they were contacted personally by the researchers so that the questionnaire were given to them and retrieved after completion. Structured or focused interview was solicited personally or by phone after participants signified their willingness. When all the data were taken and made available, they were tabulated, treated statistically, analyzed and presented in tabular or graphical forms and supported with discussion of the findings.

Results and Discussion

Problem No. 1.

Describe the demographic characteristics of graduates majoring in BSTourism and BSTourism Management at PSU-San Jose Campus including: sex, civil status, province & region, location of residence and education.

Table 1. Demographic Data of Respondents

Characteristic		f	%
Sex Distribution	*Male*	8	33.33
	Female	16	66.67
Civil Status	*Married*	4	16.67
	Single	20	83.33
Province & Region	*Cam.Sur (Region V)*	24	100
	Others		
Location of Residence	*City*	2	8.33
	Municipality	22	91.67
Educational Attainment	*BSTourism*	11	45.83
	BSTourism Management	13	54.17

Findings:

Table 1 summarizes the demographic characteristics of the respondents. More than half of the respondents were female, sixteen or 66.67 percent. Twenty or 83.33 percent were single. All respondents came from the province of Camarines Sur, Region V. Majority, as shown by twenty-two or 91.67 percent were residents from the municipalities. All respondents possessed a degree in Tourism, 11 or 45.83 were BSTourism and 13 or 54.17 percent were BSTourism Management.

Conclusion:

Majority of the respondents are female, the highest frequency of respondents is single, most of the respondents reside in the province within Partido, and holder of BSTourism orBSTourism Management by degree.

Recommendation:

Problem No. 2

Describe the number of graduates who are employed and who are currently unemployed.

Findings:

Table 2 shows the frequency distribution of the respondents according to their present employment status. Out of 24 respondents, twenty-three or 95.83 percent are employed while only one or 4.17 percent is not employed indicating higher percentage of employed are graduates of tourism management course.

Table 2. Frequency Distribution of Graduates' Present Employment Status

Course	Employment Status				Total	
	Employed		Employed			
	f	%	*f*	%	*f*	%
BST	10	41.67	1	4.17	11	45.83
BSTM	13	54.17			13	54.17
Grand Total	**23**	**95.83**	**1**	**4.17**	**24**	**100**

Conclusion:

Almost all of the respondents are presently employed.

Recommendation:

It is recommended that a career campaign be strengthened and strategized to attract more enrollees in the program considering that it yielded positive result in terms of employment.

Problem No. 3

Describe the nature of employment of graduates.

Findings:

Table 3 shows the present nature of employment of graduates. The highest number of respondents was employed under contractual basis as shown by eleven or 45.83 percent. Nine or 37.50 percent and the second highest number of respondents employed, were occupied by regular/permanent positions. There were three or 12.50 percent casuals and one or 4.17 percent remained unemployed.

Table 3. Frequency Distribution of Graduates' Nature of Present Employment

Nature of Employment	f	%
Regular/Permanent	9	37.50
Contractual	11	45.83
Casual	3	12.50
Temporary	-	-
Self-Employed	-	-
Unemployed	1	4.17
Grand Total	**24**	**100**

Conclusion:

Many of the respondents are contractual employees. This may be attributed to the fact that most of the respondents landed in their jobs just months after graduation.

Recommendation:

Encourage graduates to aim for higher job position as professional tourism management graduates and likewise encourage the Government especially the Commission on Higher Education (CHED) to design a management focused competency certification different from those granted by TESDA. TESDA's National Competency (NCII) certification is designed to assess skills possessed by non-degree holders. BSTourism and BSTManagement graduates are professionals expected to exude and demonstrate management competencies. This will differentiate rank and file manpower pool from management trainees.

Problem No. 4

Describe the number of graduates who take alternative jobs outside their knowledge and skills training environment.

Findings:

Table 4 shows the frequency distribution of the graduates who took alternative jobs outside their knowledge and skills training background. Out of 24 respondents, eighteen or 75 percent were employed in line with their academic training while six or 25 percent were not employed in their chosen field.

Table 4. Frequency Distribution of Graduates Working in Their Chosen Field.

Course/s	Employment Status				Total	Percent
	Chosen Field	Percent	Diff. Field	Percent		
BST/BSMT	18	75	6	25	24	100
Grand Total	**18**	**75**	**6**	**25**	**24**	**100**

Conclusion:

Most of the respondents worked in line with their academic preparation.

Recommendation:

Transformation of curriculum into becoming stronger in management relevancy particularly during the last two senior years rather than TESDA's competency-based approaches good during their first basic two years in the ladderized curriculum. Stronger study in this aspect is highly recommended.

Problem No. 5

Describe if the academic curriculum in college is relevant to their job.

Table 5. Academic Curriculum Relevance to Tourism Industry Jobs

Response	f	%
The curriculum is relevant to tourism industry jobs	18	75
The curriculum is not relevant to tourism industry jobs	6	25
Grand Total	**24**	**100**

Findings:

Respondents were asked about theirself-perceived academic curriculum relevance to tourism industry jobs. Majority of the respondents responded positively indicating that the curriculum was relevant to tourism industry jobs, shown by eighteen or 75 percent. Only six or 25 percent responded negative.

Conclusion:

Majority of the respondents positively indicated that their course is related to their present jobs.

Recommendation:

Transformation of curriculum into becoming stronger in management relevancy particularly during the last two senior years rather than TESDA's competency-based approaches good during their first basic two years in the ladderized curriculum. Stronger study in this aspect is highly recommended. Observe that most of the respondents landed jobs of the rank and file/clerical category because of less management orientation.

Revisiting of the curriculum and introduction of overseas on the job training are also recommended so that graduates may become globally competitive and could land a job abroad upon possible absorption of their cooperating agencies.

Problem No. 6

Describe what competence learned in college the graduates has developed as employability skills needed for career in the tourism industry.

Table 6. Competence Learned in College the Graduates Developed as Employability Skills Needed for Career in the Tourism Industry.

Employability skill	f	%
General communication skills	15	62.50
Working well with fellow employees (Human relations skills)	14	58.33
Entrepreneurial and innovative approaches in making important presentation	6	25
Applying information to new or broader contexts	6	25
Contributing to group problem-solving	8	33.33
Critical thinking in initiating changes to enhance productivity	6	25

Conclusion:

General communication skills and working well with fellow employees or human relations skills are the most useful competencies acquired in college.

Recommendation:

Strengthen the curriculum and encourage or challenge the university or student organizations to conduct or participate in more trainings and seminars on communication skills and personality and human relations development .

Problem No. 7

Describe the number of graduates with professional degree but work at sub-professional jobs.

Findings:

Many of the graduates landed jobs of the rank and file or clerical category, shown by 17 or 70.83 percent. Some landed on technical or supervisory job category as shown by 4 or 16.67 percent. Few were fortunate to land on a managerial or executive position, shown by 2 or 8.33 percent.

Table 7. Present Job Level of Respondents

Job level	f	%
Unemployed	1	4.17
Rank and file/Clerical	17	70.83
Technical or Supervisory	4	16.67
Managerial/Executive	2	8.33
Consultant		
Grand Total	24	**100**

Conclusions:

Majority of the respondents landed on rank and file or clerical jobs.

Recommendations:

Encourage the Government especially the Commission on Higher Education (CHED) to design a management focused competency certification different from those granted by TESDA. TESDA's National Competency (NCII) certification is designed to assess skills possessed by non-degree holders. BSTourism and BSTManagement graduates are professionals expected to exude and demonstrate management competencies. This will differentiate rank and file manpower pool from management trainees.

REFERENCES

Millington, Clair (2010), *The Use of Tracer Studies for Enhancing Relevance and Marketability in Online and Distance Education*. Barbados Community College [Accessed: 15 November 2010] http://wikieducator.org/images/e/el/PID-424.pdf

Boaduo, Nana Adu-Pipim (2009), *Tracer Study as a Paradigm for the Enhancement of Quality Course Programmes Development in Higher Education Institutions in South Africa*. University of North-West, Patchefstroom Campus, South Africa..

Zainab, A.N.; Edzan, N.N,; Susana, Siti& Rahman, Abdul (2004), *Tracomg Gradiatestp Ascertaom Curriculum Relevance*. University of Malaya, 50603 Kuala Lumpur, Malaysia, Malaysian Journal of Library & Information Science, Vol. 9, No. 1.

Guzman, Allan B. de & Castro, Belinda V. de (2008), *Employment and Employability Profile of a Selected Group of Filipino College Graduates*. KEDI Journal of Educational Policy- ISSN 1739-4341-Korean Educational Institute.

Yorke and Knight (2003) as cited Guzman, Allan B. de & Castro, Belinda V. de (2008), Employment and Employability Profile of a Selected Group of Filipino College Graduates.KEDI Journal of Educational Policy-ISSN1739-4341-Korean Educational Institute.

Jarito Verona, (2005) "A Tracer Study of the Employment Status of PUPQC AY 2004-2005"http://www.academia.edu/4018283/

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