STUDY HABITS OF PRE-SERVICE TEACHERS: BASIS FOR THE DEVELOPMENT OF ACADEMIC ENHANCEMENT PROGRAM

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ABSTRACT

This study intended to quantify the five domains of study habits of pre-service teachers and their perceptions on the necessity of a possible remedial program, which is alternatively named as Academic Enhancement Program (AEP) for this specific research. This quantification procedure applied descriptive and inferential statistical tools to determine the significance of differences among the study habits of the respondents who were classified according to year level and area of specialization. The results revealed that university students in the same year level are more likely to have a similar degree of study habits ($p>.05$, $U=7.00$, $p=.251$, $SD=.15297$) than when compared to their areas of specialization ($p<.05$, $K=10.820$, $p=.004$). Thus, the researcher recommends a specialization-wide program that will not follow a universal approach but instead will focus on the identified strengths and weaknesses of pre-service teachers under a specific specialization.

Keywords: academic achievement, remediation, domains, non-parametric, teacher education

Introduction

Over the last decades, a plethora of evidence-based institutional researches was conducted to justify the definition and link of study habits as a non-cognitive predictor to school success. Sharma and Vyas (2017) described study habits as "student ways of carrying out the task of studying by using various techniques and ways in the field of study to afloat self" (p. 377). Given this meaning that suggests limitless parameters, it is incontestable that study habits could be considered a factor in the attainment of maximum potentials of university students throughout their stay in a higher education institution (HEI). Sherafat and Murthy supported this by reiterating that "the link between study habits and academic achievement has a strong association and this variable is one of the most important topics in the educational world" (2016, p. 162). Possibly, this owes to the improvement of knowledge acquisition of students gearing towards greater grades (Shahzadi & Ahmad, 2011). For localization, Mendezabal (2013) has quoted Crede and Kuncel in Philippine-based research, articulating that study habits are one of the attitudinal or non-cognitive constructs that could be held more reliable for the increase of educational outcomes of any learners. This is in comparison to the recognized cognitive determinants for better academic performance in the past such as higher grades, test competence, and standardized results.

Nevertheless, no matter how much empirical explorations were done to substantiate the connection of study habits to school success, it is still not seen as a strong basis for the development of comprehensive remedial education. Munene, Peter, and Njoka (2017) mentioned that most remediation internationalization is concentrated on the enrichment of subjects that were underachieved by students due to a variety of reasons that involve learning and behavioral problems, poor living status, and inaccessibility to quality education among others. Like so, Luoch (2016) asserted that there is other remediation internationalization that appears to be unclear onto what it intends to achieve since it only focuses on learners "who have failed to make the threshold in the placement tests or the approved instruments that enable them to get into regular university courses" (p. 2288).

Pondering the result gaps provided by these scholars, the present researcher initiated this study with an effort to utilize study habits as a variable in constructing a remedial education for pre-service teachers to thrive in their education. Undoubtedly, it could be proven that study habits and their probable influences on the students can somehow go beyond their stay in the university for four to five years, as the effects remain and are extended throughout their career years: crafting lesson objectives, creating instructional materials, and arranging schedules to balance work and other social responsibilities. These statements agreed with the descriptive correlation analysis of Siahi and Maiyo (2015), saying that "the development of good study habits is equally relative and helpful not only in academic work but in career actualization" (p. 135).

This scrutinized literature even implied that study habits, as a variable, depending on the indicated context of inquiry. In this recent research, study habits are operationally explained as a set of practices or routines that university students, mainly pre-service teachers, execute in a regular mode to learn from and comply with classroom activities. The general objective was to quantify the five domains of study habits of pre-service teachers in De La Salle University-Dasmariñas and their perceptions on the necessity of remedial education. This quantification procedure further determined the significance of differences among the study habits of the respondents who were classified according to year level and area of specialization. More so, the results aimed to help administrators and faculty in formulating a possible remedial education that could pave the way to the educational advancement of the undergraduates. This remediation is alternatively named as Academic Enhancement Program (AEP), which is operationally defined as a scholastic means of targeting concerns of pre-service teachers in the College of Education who are challenged in sustaining excellent study habits and in acquiring better academic standing.

Conceptual Framework of the Study

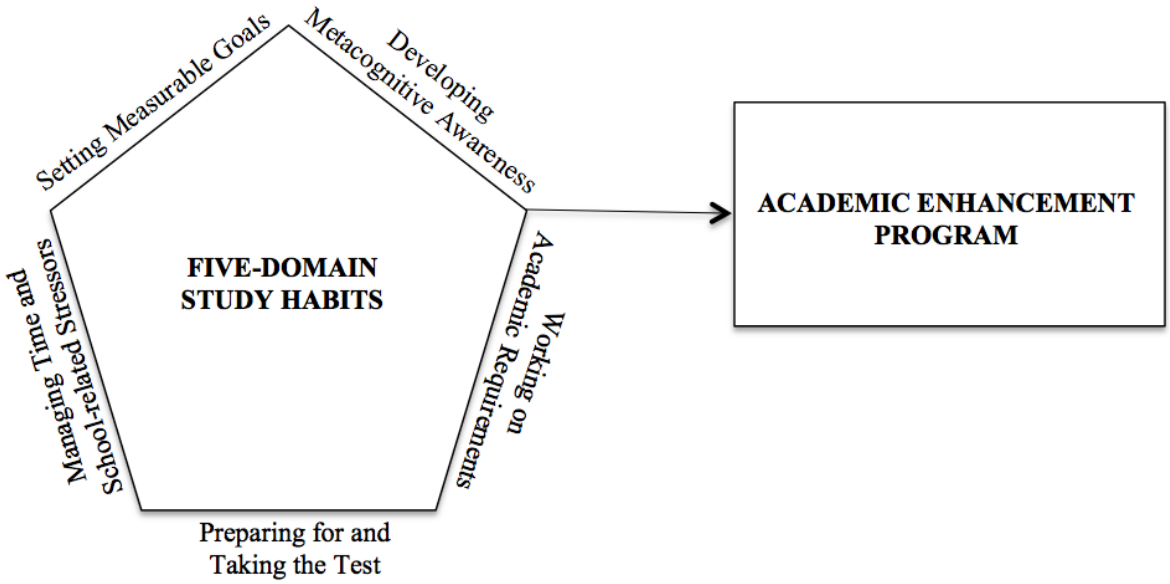

Figure 1. Developing Academic Enhancement Program for HEI Based on Study Habits

Study habits could be appraised in a variety of methods using different research instruments and data gathering procedures. Citing is the work of Amri, Aridah, and ParamIswari (2020) where study habits were calculated through a Study Habits Inventory, a questionnaire devised by Palsane and Sharma in 2003 following a three-point Likert scale with 45 items. The authors used

descriptive statistics and Pearson product correlation in treating the scores obtained from this instrument. Another correlation study computed the level of study habits manifested among learners. This utilized the Study Skill Inventory, a separate tool created by Congos with 49 items and six subscales consisting of test preparation, concentration, time management, textbook usage, note-taking, and memory (Khurshid, Tanveer, & Qazmi, 2012). Otherwise, the action research written by Rutherford (2020) assessed the academic habits of students using a self-made survey. This instrument focused merely on the time management skills and the number of hours spent by the respondents in studying, reading, and practicing mathematics with or without a tutor. The study of Cerna and Pavliushchenko (2015) employed both qualitative and quantitative procedures to evaluate study habits, whereas one-year classroom observations and informal interviews with professors and high-performing students were conducted to develop the Self-Reported Study Habits for International Students (SR-SHI). This inventory tool was distributed to its respondents to recognize the struggling learners in their respective classes.

The cited literature above proved that study habits were measured and could be measured with varying modes, depending on the elements that an institution or a researcher intends to emphasize for a greater purpose. For this particular study, Figure 1 displays how the five domains of study habits were used as the springboard in the development of probable AEP of HEIs for pre-service teachers. The five key constructs stipulated in this research model is a contextualized framework based on the elements of study habits from Bradford University, which were adapted by Lucas and Corpuz (2014). These elements of study habits served as a solid underpinning to research that investigated the correlation of study habits to the academic performance of the students. The descriptive-correlational study of Quinco-Cadosales (2013) anchored the assessment of study skills of first-year students to the elements of study habits published by Lucas and Corpuz. This led to the composition of comprehensive analyses and recommendations on how the academic performance of freshmen students could be improved for enhanced school experience. Initially, it followed six major subthemes that included: (1) motivation, (2) organizing and planning your work, (3) working with others, (4) managing schoolwork stress, (5) note-taking and reading, and (6) and preparing an assignment/project. These subthemes with predetermined study habit indicators, equivalent scoring, and specified feedback for the interpretation of scores were deliberated in this present research, but still underwent contextualization and expert validation procedures considering the target respondents, the locale of the study, and the general objective of this research. These procedures combined similar constructs and separated contradicting items for better analysis, instigating the identification of the five domains presented in Figure 1. These domains pertain to (1) setting measurable goals, (2) developing metacognitive awareness, (3) working on academic requirements, (4) preparing for and taking the test, and (5) managing time and school-related stressors. These were formulated to help the respondents easily ascertain their strengths and weaknesses by evaluating the extent of their study habits.

Identified as the first domain of study habits for this research, goal-setting is seen as a substantial aspect of active schooling. Regarded as a plotting map for success, goals that are formed painstakingly can guide students to divert their focus on the right priorities and to avoid getting off track (Fleming, 2019). As also published in an analysis related to goal-setting learning principles, "goals play an important role to motivate students to become more energetic, to develop suitable learning style and then put their persistent efforts to achieve specific learning outcome and performance" (Abu Bakar, Li, Ng, & Tan, 2014, p. 45). Secondly, metacognitive awareness deals with the knowledge of individuals about their thoughts and the strategies they use to cope with learning concepts. In the assessment directed by Abdellah (2015), relationships of metacognitive awareness to the academic achievement and teaching performance of female pre-service teachers were appraised methodically. The results affirmed that indeed, metacognition could influence learning, as a positive correlation was revealed at the end of the study. This shows that it is important for aspiring teachers to exhibit mindfulness on his or her journey towards knowledge acquisition. In connection to working on academic requirements, the degree of compliance and even diligence of students in submitting assignments, outputs, and projects must be taken into account. The local study of Quinco-Cadosales (2013) agreed that complying with countless academic requirements is one of the keys to surviving in college, especially for students who are newly enrolled in an institution. Likewise, the findings implied that preparing assignments or projects and organizing works could matter in the ongoing growth of learners at the tertiary level. The test-taking skills particularly of pre-service educators should also be monitored as an integral part of study habits since short tests or major examinations comprise a huge percentage both in the computation of general grade point average and actual licensure examination for teachers. Evaluating study techniques before an examination or reflecting on the items during the test itself is attributed to enhancing learning abilities (Simpson, 2015). Thus, it can be concluded that with superior skills in preparing for and taking the test comes greater chances for academic success. Lastly, with the hectic schedules and rigorous training that a student undertakes towards the road to professionalism, effective time and stress management are extremely needed. Coping mechanisms must be planned out with all the responsibilities and demands that a pre-service teacher has to juggle. In a mixed-method design of research that was written by Nasrullah and Khan (2015), it was stated that there is a significant relationship between the time management skills and the school accomplishment of university students. The results lead to the conclusion that well-performing students mostly exhibit good time management techniques. On the other hand, students are prone to different stressors like pressure and other external elements that usually hamper their ongoing development (Devi & Mohan, 2015). With this, they must be equipped as well with the best set of mechanisms and coping strategies that can alleviate the difficulties of being in a competitive university.

The domains elaborated prior are believed to be contributory to the holistic development of students in school, which are manifested similarly in the case of pre-service teachers in De La

Salle University-Dasmariñas. Their adept learning and efficient studying are more likely to be achieved if the aforementioned points are performed excellently—from formulating short and long-term objectives, understanding own cognitive processes, accomplishing tasks, reviewing or answering an examination to handling time and all possible taxing situations. These attainment descriptors of scholastic grinding resulted in the identification of scope for possible remediation, as the researcher began to gauge the study habits of pre-service teachers. This remediation or AEP, as operationally used in this research, could be developed in the future for the commitment to intensify the educational outcomes of these approaching professionals.

Historically, the pre-service teachers in De La Salle University-Dasmariñas received wide-ranging forms of remediation through both faculty and student-led initiatives. Consultations hours were given and are still being offered by professors to present the computation of grades, clarify questions about the subject requirements, and assist academically challenged students. These are even listed as part of the teaching obligations in the contract and faculty manual of teachers in the university. Since 2014, seminars discussing topics under general education, professional education, and major subjects are prearranged for graduating education-major students. There were also institution and college-wide remedial activities that were created by some student organizations to help fellow tertiary students who are experiencing difficulty in their courses. In the College of Education where the study was undertaken, two of the most notable remediation internationalization were made for pre-service teachers in the past: the Academe Org Tutorial that started the year 2015 and EduKampijo in 2018. Both internationalization was introduced by student groups and reinforced by faculty members and administrators. However, success indicators were not achieved chiefly due to a lack of data-driven support and preparation. This stirred the interest of the researcher to commence with this scholastic work that is centered on study habits in proposing a remediation program or AEP that is based fully on needs and data analysis.

Research Questions

This study aimed to quantify the study habits of pre-service teachers in De La Salle University-Dasmariñas and their perceptions on the necessity of a possible Academic Enhancement Program (AEP). Specifically, it sought to answer the following questions:

1. What is the extent of study habits of pre-service teachers in terms of:
    a. setting measurable goals,
    b. developing metacognitive awareness,
    c. working on academic requirements,
    d. preparing for and taking the test, and
    e. managing time and school-related stressors?;
2. Is there a significant difference between the study habits of the respondents when

grouped according to year level?;

3. Are there significant differences among the study habits of the respondents when grouped according to the area of specialization?; and lastly,
4. Did the quantified results of study habits affect a significant change towards the perceptions of the respondents on the necessity of AEP to improve the performance of pre-service teachers in the university?

Hypotheses of the Study

These hypotheses were put into a test to develop a program: there are no significant differences among the study habits of the respondents when grouped according to the area of specialization and year level. Furthermore, no significant change is revealed about the perceptions of pre-service teachers on the necessity of AEP to ensure school success.

Methodology

The researcher employed a quantitative design of research to generate relevant findings and to produce statistically analyzed interpretations of all the results that were disclosed hereafter. The respondents of this study were 66 pre-service teachers or university students taking teacher education who were equally derived from three different areas of specialization, namely special needs education (SNE), early childhood education (ECE), and physical education (PE), with 22 respondents each. These pre-service teachers were from two different year levels: 33 freshmen and 33 sophomores during the first semester of Academic Year 2019-2020. Since the Philippines transitioned to K12 education system, no to minimal junior and senior education students are enrolled in the country. This resulted in limiting the respondents to the first two levels in the pre-service education.

In computing the sample size, Slovin's formula was used to a total population of 87 pre-service teachers with a margin of error of .05. This stemmed from 71 education students taking degrees in the areas and levels previously cited. The researcher recruited the respondents for this study in compliance with their availability and regular class schedules arranged by the university. Due to unforeseen instances such as illness and off-campus activity, 66 pre-service teachers were surveyed. The respondents involved were all enrolled in the College of Education, De La Salle University-Dasmariñas, an HEI in the Philippines that offers teacher training and education internationalization to aspiring Filipino prime movers of education in the country. De La Salle University-Dasmariñas is known as the premier university in the province of Cavite. Awarded with certifications and recognitions from several award-giving organizations and accrediting bodies, its College of Education continues to promote quality tertiary education.

For the research instrument, the study utilized a researcher-made Five-Domain Study Habits Questionnaire. The researcher listed first the items based on gathered literature that intends to measure the level of study habits in each domain. Upon completing the initial questionnaire, it underwent expert validation with the assistance of different specialists in the field of education, psychology, and even in language to holistically examine the correctness of each detail. This led to the revisions of the questionnaire before its distribution. The questionnaire has a preliminary question and two divided parts. Part I contained 10 items per domain of study habits, which in total compiled 50 items of thoroughly devised statements related to learning practices and routines. Meanwhile, Part II probed the perception of pre-service teachers to the necessity of AEP in refining school achievement. The instrument gauged primarily the view of the respondents on the pertinence of AEP in addressing their challenges to maintain commendable study habits. This did not involve the assessment of efficiency either the effectiveness of the program implementation itself.

Concerning the treatment of the data collected, these descriptive and inferential statistical tools were selected to obtain relevant findings pertinent to the development of the program: *Statistical mean and ranking* for question number one to three to locate in a scale the computed central tendency; *Median and range* to position all the domains in the order provided its lowest and highest mean for questions two and three; *Mann-Whitney U Test* to distinguish the differences between two independent samples stipulated in number two, which pertain to the two-year levels; *Kruskal-Wallis One-way ANOVA by Ranks* for number three to check the significance of differences among the three different independent samples, referring to the three areas of specialization, and ultimately, frequency, percentage, and the *McNemar Change Test* to ascertain the findings for question number four. The researcher engaged the before-and-after approach of *McNemar Change Test* only to confirm if there was a significant change towards the perceptions of the respondents on the necessity of AEP. Therefore, it is not the actual program implementation that was measured in this study. Instead, it quantified the insights of the respondents on the need for AEP in improving the performance of pre-service teachers after knowing the level of their study habits.

Results and Discussion

Upon thorough computation of all the data gathered, these findings were obtained to develop a possible AEP. This will support the educational needs of pre-service teachers in De La Salle University-Dasmariñas who are specializing in early childhood education (ECE), special needs education (SNE), and physical education (PE). The results below underwent in-depth interpretation and analysis to upkeep with the statistical values presented in the tables. For the Likert scale used in this research, the range was equally divided to interpret the weighted mean computed in each domain.

Range	Verbal Interpretation
1.00 – 1.80	Never (N)
1.81 – 2.60	Seldom (Sm)
2.61 – 3.40	Sometimes (Ss)
3.41 – 4.20	Often (O)
4.21 – 5.00	Always (A)

Problem 1. What is the extent of the study habits of pre-service teachers?

Table 1: Study Habits of First-Year Pre-service Teachers in De La Salle University-Dasmariñas

Domains of Study Habits	First Year-ECE			First Year-SNE			First Year-PE		
	Mn	Rank	VI	Mn	Rank	VI	Mn	Rank	VI
a. Setting Measurable Goals	4.14	3.5	O	4.01	5	O	3.35	4	Ss
b. Developing Metacognitive Awareness	4.20	2	O	4.24	3	A	3.52	2	O
c. Working on Academic Requirements	4.35	1	A	4.35	1	A	3.72	1	O
d. Preparing for and Taking the Test	4.14	3.5	O	4.26	2	A	3.41	3	O
e. Managing Time and School-related Stressors	4.11	5	O	4.05	4	O	3.05	5	Ss
Total Mean	**4.19**	**1**	**O**	**4.18**	**2**	**O**	**3.41**	**3**	**O**

Note. Mn=Mean; VI=Verbal Interpretation

Table 1 exhibits the range of study habits of first-year pre-service teachers who are specializing in three different majors. These study habits were divided into five domains, which accumulated varying mean scores. Nevertheless, the total mean indicates that respondents from first year-early childhood education earned the uppermost mean with 4.19 or often. It is followed by first-year-special needs education pre-service teachers with 4.18 or often, and lastly, respondents from first year-physical education obtained the third rank with a mean score of 3.41 or often. It could further be seen that *Working on Academic Requirements* garnered the highest mean among the five domains of study habits, while the domains related to *Setting Measurable Goals* and *Managing Time and School-related Stressors* acquired the lowest.

These results should be considered, knowing that an achievable goal is an important factor for school success. Usher and Kober (2012) in their summary report mentioned that researchers hinted that goals could motivate students to strive harder, particularly if the ones who set them embrace these goals. Likewise, students should equip themselves with excellent time management, as this also affects how stress is being handled during school tasks and personal achievements (Nasrullah & Khan, 2015). The low scores in these domains of study habits should be improved, since it could bring a direct influence on the general motivation, studying skills, and academic performance of the respondents. Efficient abilities in identifying goals will merit positive outcomes in the end, while stable time and stress management potentials could result in a more relaxed working space for pre-service teachers.

Table 2*: Study Habits of Second Year Pre-service Teachers in De La Salle University-Dasmariñas*

Domains of Study Habits	Second Year-ECE			Second Year-SNE			Second Year-PE		
	Mn	Rank	VI	Mn	Rank	VI	Mn	Rank	VI
a. Setting Measurable Goals	3.95	5	O	3.57	5	O	3.71	1	O
b. Developing Metacognitive Awareness	4.06	4	O	3.84	2	O	3.67	2	O
c. Working on Academic Requirements	4.16	2	O	4.09	1	O	3.41	4	O
d. Preparing for and Taking the Test	4.08	3	O	3.60	4	O	3.06	5	Ss
e. Managing Time and School-related Stressors	4.22	1	A	3.78	3	O	3.53	3	O
Total Mean	**4.09**	**1**	**O**	**3.78**	**2**	**O**	**3.48**	**3**	**O**

Note. Mn=Mean; VI=Verbal Interpretation

Table 2 displays the study habits of second-year pre-service teachers, which were also distributed into five different domains that are similar to the first table. The total means reveal that the respondents from early childhood education, special needs education, and physical education who are enrolled in the second year attained the mean scores of 4.09, 3.78, and 3.48, respectively. These statistical values of three areas of specialization gained an equivalent verbal interpretation of often.

Comparing the numerical figures from Table 1 to table 2, the total means of study habits shared analogous ranking. However, Table 2 denotes more variety of positions in a scale of central tendency, as per the specific enlisted domains are concerned. The individual computed mean scores in each of the five domains did not depict parallel ranking for the topmost and the least

domain of study habits. As the findings in Table 1 presents almost similar first and fifth ranks, the responses in Table 2 go in another direction when grouped according to their year levels and areas of specialization. This could be linked to gender and socio-economic status (Khan, 2016) or time management, teaching strategies of professors, and studying environment, (Yap, 2019). These factors, though not all included in the scope of this study, infer interesting discoveries that other researchers could explore in the future.

Problem 2. Is there a significant difference between the study habits of the respondents when grouped according to year level?

Table 3: Study Habits of Pre-service Teachers When Grouped According to Year Level

Year Levels of Pre-service Teachers	*N*	Mn	VI	Minimum	Maximum	Md	R
a. First Year	5	3.93	O	3.73	4.14	3.94	.41
b. Second Year	5	3.78	O	3.58	3.89	3.84	.31
		3.85	**O**				

Note. N=Total number of domains for study habits; Mn=Mean; VI=Verbal Interpretation; Md=Median; R=range

Table 3 implies that the combined scores of all pre-service teachers from two-year levels produced an overall mean of 3.85 or often. Between these levels, first-year pre-service teachers achieved a greater level of study habits with Mn=3.93 or often and Md=3.94, whereas, respondents in the second year only had Mn=3.78 or often and Md=3.84. Though the mean and medians scores of two-year levels are dissimilar, both still took a verbal interpretation of often.

Table 4: Test Statistics of Mean Scores and Year Levels Using Mann-Whitney U Test

	Mean Scores
Mann-Whitney U Test	7.000
Wilcoxon W Signed Ranks	22.000
Standard Deviation (*SD*)	.15297
Z	-1.149
p-value (2-tailed)	.251

For Table 4, the Mann-Whitney U Test specified that the p-value is greater than the .05 significance level (p>.05). Thus, the researcher retains the null hypothesis. There is no significant difference between the extents of study habits of pre-service teachers when grouped according to year levels (U=7.00, p=.251, SD=.15297).

In another study that employed advanced inferential statistics, no correlation has also been found between the study habits and age of university students (Mashayekhi et al., 2014) or year level for this specific research. This means that students who are younger or older with different study habits do not automatically equate to a significant difference. Age or year level could be a contributing factor, but not enough to substantiate the claim that it is a marking force that can disturb the level of study habits among learners or the pre-service teachers for this matter.

Problem 3. Are there significant differences among the study habits of the respondents when grouped according to the area of specialization?

Table 5: Study Habits When Grouped According to Area of Specialization

Areas of Specialization	*N*	Mn	VI	Minimum	Maximum	Md	R
a. Early Childhood Education	5	4.14	O	4.05	4.26	4.13	.21
b. Special Needs Education	5	3.98	O	3.79	4.22	3.93	.43
c. Physical Education	5	3.44	O	3.24	3.60	3.53	.36
		3.85	**O**				

Note. N=Total number of domains for study habits; VI=Verbal Interpretation

Table 5 suggests that among the three areas of specialization from both year levels, the pre-service teachers in early childhood education ranked first with Mn=4.14 or often and Md=4.13; next are from the area of special needs education with Mn=3.98 or often and Md=3.93; and finally, respondents taking physical education as a major got the lowest with Mn=3.44 or often and Md=3.53.

Table 6: Test Statistics of Mean Scores and Areas of Specialization Using Kruskal-Wallis Test

	Mean Scores
Kruskal-Wallis H	10.820
Degrees of freedom (*df*)	2
p-value	.004

In connection to the test statistics presented in Table 6, the non-parametric Kruskal-Wallis H Test disclosed that the p-value is lesser than the .05 significance level (p<.05). Therefore, the researcher rejects the null hypothesis. There are significant differences among the mean scores of study habits of pre-service teachers when grouped according to areas of specialization (K=10.820, p=.004).

The numerical figures further explain that the concept of studying as a consistent routine certainly varies from one student to another, and even more, from one area of specialization to another. This analysis affirms the conclusion drawn by Hassan, Sadaf, Aly, and Baig (2018), stating that study habits must be reflected as personal traits and not only a set of academic practices since no students are alike as per the level of this variable is concerned. Fact that the respondents are taking different areas of specialization, there are definite dissimilarities in their study habits or in their approaches concerning their goals, metacognition, school requirements, examinations, time, and stress. This is not to disregard their other individual differences that could contribute additional impact on the results above.

Table 7: Multiple Comparison Procedures of Study Habits vis-à-vis Areas of Specialization

Areas of Specialization	Test Statistics	Standard Test Statistics	Sig.	Adjusted Sig.	Interpretation
a. ECE and SNE	3.400	1.202	.229	.688	Not significant
b. SNE and PE	5.800	2.051	.040	.121	Not Significant
c. PE and ECE	9.200	3.253	.001	.003	Significant

Note. Sig.=Significance level

Taking into account the results in Table 6, multiple comparison procedures were conducted to trace which areas of specialization gotten a significant difference. Table 7 was able to identify that the mean scores of pre-service teachers in the areas of physical education and early childhood education are significantly different with a value of .003, while the remaining comparisons are not significant (ECE-SNE=.688, SNE-PE=.121). The evident incongruence of PE and ECE as two separate but intersecting fields is a remarkable result. This is in reflection of the circumstance that most Filipino pre and in-service ECE teachers are required to teach PE subjects, while pre and in-service PE teachers can handle ECE learners given their preference.

Problem 4. Did the quantified results of study habits affect a significant change towards the perceptions of the respondents on the necessity of AEP to improve the performance of pre-service teachers in the university?

Table 8: Perceptions of Pre-service Teachers on the Necessity of AEP

Year Levels and Areas of Specialization	Before				After			
	Yes	%	No	%	Yes	%	No	%
a. First Year-ECE	3	27%	8	73%	11	100%	0	0%
b. First Year-SNE	8	73%	3	27%	11	100%	0	0%
c. First Year-PE	10	91%	1	9%	10	91%	1	9%
d. Second year-ECE	4	36%	7	64%	9	82%	2	18%
e. Second year-SNE	6	55%	5	45%	9	82%	2	18%
f. Second year-PE	10	91%	1	9%	11	100%	0	0%
Total	**41**	**62%**	**25**	**38%**	**61**	**92%**	**5**	**8%**

Table 8 entails the perceptions of the respondents before and after the study habits were quantified. Before the results, 62% of the total sample perceived the relevance of the program. On the other hand, 25 students, or 38% did not grasp the need for its development and implementation. After the mean scores for study habits were calculated, an increase of 30% transpired to the general percentage of pre-service teachers who agree on the necessity of AEP to intensify the school achievement of pre-service teachers in the university, which gathered 92% of the total sample.

Table 9: Change of Perceptions on the Necessity of AEP

Before	After	
	No	Yes
Yes	3	38
No	2	23

The fourfold table of frequencies in Table 9 signifies the two sets of responses from the same group of the sample. Since the non-parametric test utilized to treat the data merely focused on

the numbers in which changes occurred, it could be understood that 23 respondents originally did not agree on the necessity of the AEP, but following the computation of their study habits, these pre-service teachers shifted to its possible development. Contrastingly, three respondents preferred at first the program, but eventually expressed disagreement following the quantified mean scores of their study habits.

Table 10: Test Statistics of Before and After Perceptions of the Respondents

	Before and After
N	66
Chi-square	13.885
p-value	.000194

The findings in Table 10 detail the test statistics for McNemar Change Test, where it was noted that the null hypothesis is rejected, given that the p-value is lesser than the .05 significance level ($p<.05$). This connotes that there is a significant change in the perceptions of pre-service teachers in terms of the necessity of AEP before and after their study habits were quantified ($X^2=13.885$, $p=.000194$).

The results realized upon treating the data concur with the findings of Kenya-based research. Although this study published by Munene et al. (2017) was done in public primary schools, the respondents who were composed of teachers, administrators, and students still upheld remedial teaching like the AEP as an effective mode to enhance the learning capacity of students in school ($M=4.52$, $SD=.0975$). Undeniably, AEP is seen as a powerful tool to allow students in achieving their maximum potentials and in fostering valuable learning. The advantages it is set to offer will train the respondents in their remaining semesters and years in the university. Henceforth, this could be more beneficial to the tertiary students who will eventually teach and handle classes shortly.

The implication of the Study

Upon reviewing the concluded findings of this present research, the results imply that remedial internationalization or academic enhancement internationalization should not be based alone on grades or subjects where students obtained a failing grade. It should not also follow a one-size-fits-all model where all students who are struggling academically must be placed in a program with similar approaches, notwithstanding their year level or area of specialization. Since most

educational institutions will just do reteaching of lessons on a large group scale, it could neglect the actual problem of the learners. Hence, teachers must be keen instead in creating a remedial program that is holistically responsive in a more reduced and appropriate grouping. Placing students in a program with a lesser number of participants will allow them to focus more and the teacher to prioritize the problematic domain of study habits at the same time. Taking this implication to the actual results of this study, it is disclosed that teacher education students from De La Salle University-Dasmariñas are more likely to benefit in a smaller group classified according to their area of specialization.

Recommendations

Concerning the aforesaid conclusions and implications, recommendations were formed to maximize sensibly the findings produced by this study. Mainly, the university administrators and faculty can consider the definite items for improvement to address the deficient domain of study habits of pre-service teachers. The domains focusing on goal-setting and time-stress management should be the core of a remediation program that needs to be prepared. Students should be equipped with the imperatives of writing specific and measurable goals related to their studies. These goals should be guided with identified success indicators and a dated timeline to monitor student progress and accomplishment. Additionally, student wellness seminars can be conducted to highlight the benefits of maintaining a healthy lifestyle such as having enough sleep, rest, and hydration in increasing attention and alleviating stress.

The remediation or Academic Enhancement Program that will be implemented throughout the school year could be proposed with the positive support of the respondents on its potential development and is recommended to follow a specialization-wide approach and not just simply universal or even year-level system technique. This is to ensure focus on the identified strengths and weaknesses per area of specialization. As the results revealed that there were more significant differences in the study habits of the respondents when grouped according to the area of specialization than to year level, it is believed that a specialization-wide enhancement program will promote more individualized remediation. For future researchers, evidence-based studies problematizing associated themes could be continuously conducted to advance the quality of instruction being provided in every teacher education institution. Subthemes highlighting the needs of pre-service teachers and the factors influencing their holistic growth such as student engagement, field exposures, and professional training could also be considered.

Conclusions

The areas of specialization and year levels critically played as essential variables in producing quality results and analysis for this study, as this cohesively grouped the respondents for the needed treatments. More to that, the recommendation of enhancement program that the researcher suggested was based on the degree of significant difference corroborated from these two variables. The identified topmost and lowermost domain of study habits differed from the majority of the respondents. Nevertheless, the ranking of the three areas of specialization drew evident similarities for both year levels. First on the rank are the pre-service teachers from early childhood education, second is from the special needs education area, and lastly, university students majoring in physical education. As far as the quantified study habits of the respondents according to year level, no significant difference was determined. Herewith, students in the same year level mostly share an equal extent of study routines and practices. When study habits were measured according to areas of specialization, significant differences were identified among their mean scores, specifically the statistical values between physical education and early childhood education pre-service teachers. This shows that even students in the same year level are more likely to have a similar degree of study habits, it is the opposite when juxtaposed with other areas. Ultimately, the level of study habits affects a meaningful change towards the insights of the respondents on the Academic Enhancement Program. With the majority of the samples approving its concept, it is hoped that this will improve the school success of pre-service teachers and better sustain the teaching-learning process in the university.

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