

**THE IMPACT OF AI TOOLS OR CHATBOTS ON GRADE 12 HUMSS ACADEMIC
PERFORMANCE: A QUANTITATIVE STUDY AT FRANCISCO RAMOS NATIONAL
HIGH SCHOOL**

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**RESEARCH PAPER SUBMITTED TO THE FACULTY OF THE DEPARTMENT OF
EDUCATION, FRANCISCO RAMOS NATIONAL HIGH SCHOOL,
IN PARTIAL FULFILLMENT OF THE REQUIREMENTS
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Approval Sheet

In partial fulfilment of the requirements in Inquiries, Investigations, and Immersions this research paper entitled "THE IMPACT OF AI TOOLS OR CHATBOTS ON GRADE 12 HUMSS ACADEMIC PERFORMANCE: A QUANTITATIVE STUDY AT FRANCISCO RAMOS NATIONAL HIGH SCHOOL", prepared and submitted by Arhess Sofia B. Pabilona is hereby recommended for Oral Examination.


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Dedication

This project is heartily dedicated to my beloved parents:

Mr. Romeo P. Pabilona And Mrs. Vesminda B. Pabilona

Who had been their constant source of inspiration, for untiringly support their children and teaching them so that the task could be accomplished and completely done in time.

This research study is also humbly dedicated to their research teacher Ms. Cassandra Pearl Emperado for giving their strength and discipline to tackle all the task and duties with patience and determination.

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We also wish to thank our teachers for their guidance and for refining our research questions to enhance clarity and comprehension. My gratitude extends to the selected respondents from Grade 12 at Francisco Ramos National High School. Your participation in my survey was crucial, and I appreciate your time and effort. To my cherished parents, we thank you for your understanding and for your financial and emotional support.

Finally, I extend my thanks to our adviser, peers, and classmates, and to everyone who contributed their time and effort towards the completion of this paper. Your contributions have been invaluable, and I am deeply grateful.

RESEARCH ABSTRACT

This research investigates the impact of artificial intelligence (AI) tools on the academic performance of Grade 12 students, with a focus on Community Engagement, Solidarity, and Citizenship (CESC) subjects. Employing a quasi-experimental research design, data was collected through surveys to assess student engagement and perceptions towards AI tools and traditional study methods. Descriptive statistics and t-tests were utilized for data analysis. Findings indicate varying levels of student engagement with AI tools, with diverse usage patterns observed. While student perceptions towards AI tools and traditional study methods were generally negative, they also revealed potential effectiveness. However, students reported moderate challenges in using AI tools, suggesting a learning curve. Notably, there was no significant difference in post-test scores between students who used AI tools and those who did not, thus accepting the null hypothesis. This suggests that while AI tools hold promise for enhancing learning experiences, they may not guarantee academic success and could present challenges for students. This research contributes to understanding the complexities surrounding the integration of AI tools in education and underscores the importance of considering student perceptions and challenges in their implementation.

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Chapter I

Background of the Study

Nowadays, the education system here in the Philippines is much more difficult than in previous years. Because of the COVID-19 pandemic, it caused a lot of changes in the education system, which caused a delay in all classes. The education system wants to get back to how it was, wherein they are forced to compress all the lessons, which makes it more difficult for students. To make it easier to manage lots of lessons, some students used artificial intelligence to finish their work quickly and with less effort. Artificial intelligence means teaching computers to do things that humans usually do. It's like giving them brains to learn from information, solve problems and make choices.

To understand how artificial intelligence affects the performance of Grade 12 HUMSS students at Francisco Ramos National High School, a quantitative research approach was employed. In 2024, technology is changing a lot of things, including how we learn in school (Karaköse & Tulubas,2024). So the researcher did a study to see if AI can improve the grades of Grade 12 students.

This study happened because the researcher wanted to know if using AI can make students learn better. The researcher compared the test scores of students who use AI with those who do not, to see if AI helps students do better in school. This study is important because it can help schools decide if they should use more AI in classrooms to help students learn.

Statement of the Problem

This study was able to determine the difference between the academic performance of grade 12 HUMSS students in Francisco Ramos National High School with or without the use of artificial intelligence. The study was conducted during the school year 2023-2024

Specifically, it aimed to answer the following queries:

1. What is the average post-test scores attained by the Grade 12 students who actively utilize artificial intelligence tools in their studies?
2. What is the average post-test scores attained by Grade 12 students who do not utilize artificial intelligence tools in their studies?
3. Is there a significant difference between the students average scores while using artificial intelligence and the average scores of students who do not use artificial intelligence?

Hypothesis

Null Hypothesis (H_0) There is no significant difference between the academic performance of Grade 12 HUMSS students who use artificial intelligence and those who do not.

Alternative Hypothesis (H_A) There is a significant difference between the academic performance of Grade 12 HUMSS students who use artificial intelligence and those who do not.

Scope and Delimitations of the Study

This study focused on investigating the impact of artificial intelligence (AI) on the academic performance of Grade 12 HUMSS students at Francisco Ramos National High School. Specifically, it aimed to compare the academic test scores and achievement of students who have been exposed to AI-assisted learning methods with those who have not by looking into their grades in the subject Community Engagement, Solidarity and Citizenship.

This study only looked at Grade 12 HUMSS-Faith students from Francisco Ramos National High School in Buayan, Kabasalan, Zamboanga Sibugay. The researchers only

focused on how AI was used in classrooms and how it affects students' grades. Furthermore, the study was limited to quantitative data analysis methods to provide a structured and objective assessment of the differences in the academic performance between students exposed to AI and those who are not. This research aimed to provide valuable insights into the potential benefits or drawbacks of AI integration in education.

Definition of Terms

The following terms were used extensively in this study and were taken according to the definition given below:

Academic grade-Refers to the specific score or mark that a student receives for their performance in a particular academic subject or course. It serves as a quantifiable measure of the student's understanding, proficiency, and accomplishment within the educational framework. These grades reflect the effectiveness of various learning methods and resources, shedding light on the impact of artificial intelligence on students' academic performance and overall educational experience.

Academic performance-Refers to how well a student is doing in their studies, typically measured by factors such as grades, test scores, class participation, and overall comprehension of the material being taught. Comparing the academic performance of students with and without the use of artificial intelligence, we can observe notable distinctions in their learning outcomes.

Artificial intelligence-Refers to computer programs or systems that can understand and generate human-like text or responses based on input data. This provides students personalized support, instant feedback, and access to a wide range of educational resources.

Impact-refers to the consequence or result of a specific factor or variable on another. In this study, it is employed to evaluate the potential influence of artificial intelligence on the academic performance of Grade 12 students.

Conceptual Framework

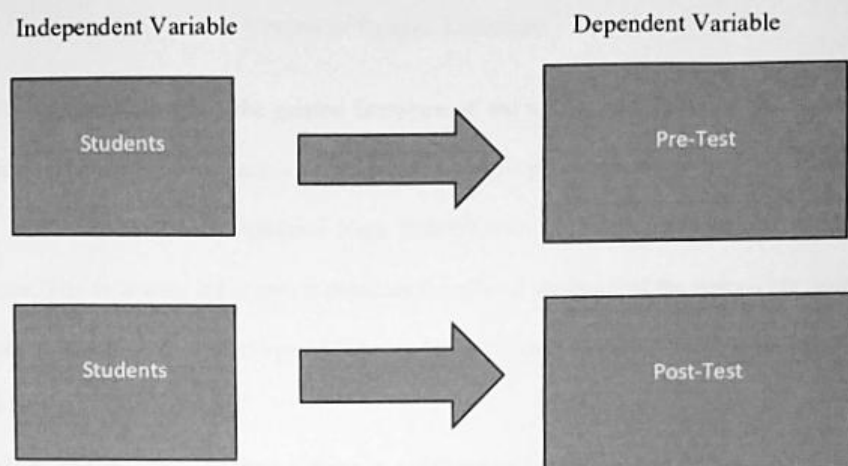


Figure 1. Conceptual Framework

This conceptual framework consist of two variables. The Students as an independent variable and Pre-Test and Post-Test as the dependent variable.

In figure 1, this variable represents students who studied at Francisco Ramos National High School. Students in one group will have access to AI technology or chatbots, while students in the other group will not.

Another variable, is the Pre-Test and Post-Test. The Pre-Test are scores attained by the Grade 12 HUMSS-Faith students and the Post-Test are the scores attained by students who were put into two groups, one group who used AI chatbots and the other one are students who only used traditional study methods in one of their specialized subject which is Community Engagement, Solidarity and Citizenship.

Chapter II

Review of Related Literature

This chapter discusses the related literature of the study. The focus of this research study was to determine the difference between the academic performance of Grade 12 HUMSS students in Francisco Ramos National High School with or without the use of artificial intelligence. The following information provides the related studies that the researcher used to support the research study and will provide bases for the interpretation of the data that shall be gathered later.

Many studies were inquired if there is a difference between using AI and not using it and how it affects academic performance and according to Mendoza, Guevara, Mayorga and Fernandez(2023) things like age, study hours, days studied, and using AI tools had a big impact on grades. This means AI can help predict how well students will do in school.

Students' beliefs about what's normal in their social groups affect how much they want to learn about artificial intelligence(AI). When students feel supported and encouraged by their teachers and friends, they are more likely to be interested in learning AI. Their willingness to learn about AI is influenced by how they see the subject, how confident they feel about it, and how well they think they understand it (Mazedul et al., 2024). Students understand the basics of AI and think it's useful in their daily lives. This means they see the benefits of AI for learning (Slavov, Yotovska & Asenova, 2023).

Also Guan, Zhang and Zhang(2023) found that generative AI, like ChatGPT, has a big impact on how high school students plan their studies. It helps them choose courses, learn in different ways, and set academic goals. This kind of AI makes education more flexible and prepares students for the changing world. ChatGPT can also help teachers with teaching and research, improve how students learn, and help them plan their studies better.

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While Rina(2023) looked at how AI can be used as a tool for students to learn through projects. The results showed that students liked using AI in their learning activities. While using AI tools can save time and help in learning, it also raises concerns about academic integrity and creativity (Bissessar, 2023).However, artificial intelligence influences how ideas are formed and organized, and how technology is managed. On the other hand, it has a negative impact on the development of practical skills for innovation (Hernandez, Sacdalan, Sopoco, Villapondo, & Garcia, 2024).

Furthermore, Booc et al.(2023) conducted a study and the results showed that math students used AI-PCAs a lot during online tests, and this might have led to academic dishonesty. The AI-PCAs seemed smart and helpful, making it hard for teachers to know if students were cheating. As a result, the test results from online learning might not be trustworthy.

Fontanilla, Bautista, Lactao Jr., Villacorte and Santos(2023) delves into the thematic analysis and it highlighted concerns about students depending too much on AI, its impact on writing skills, ethical issues, and how it's used in schools across the Philippines. These findings stress the importance of finding a balance between using AI tools like generators and chatbots and teaching students about academic integrity.

Asirit and Hua(2023) discussed how important it is for schools and policymakers to act now as AI keeps changing industries and societies. To succeed in a world where AI is everywhere, students must learn the basics of AI and how to use it effectively. Because AI is

used in many different ways, institutions need to adjust their processes accordingly. Overall, AI has mostly positive effects on society. But Students need to understand the downsides of AI, but educators also need to make sure technology doesn't replace foundational learning(Fontanilla et al., 2023).

Researchers looked into how artificial intelligence (AI) affects students' school performance and learning. They found that factors like age and how much students use AI tools can affect their grades. Students tend to be more interested in AI if their teachers and friends support them. AI tools like ChatGPT help students plan their studies better, but too much reliance on AI can lead to issues with honesty and creativity. While AI can help with some tasks, it may also stop students from developing important skills. Schools and policymakers need to make sure students learn about AI, but also that it doesn't replace traditional learning. Overall, while AI has its benefits, it's important to understand its limits and make sure it's used wisely in education.

Chapter III

Research Methodology

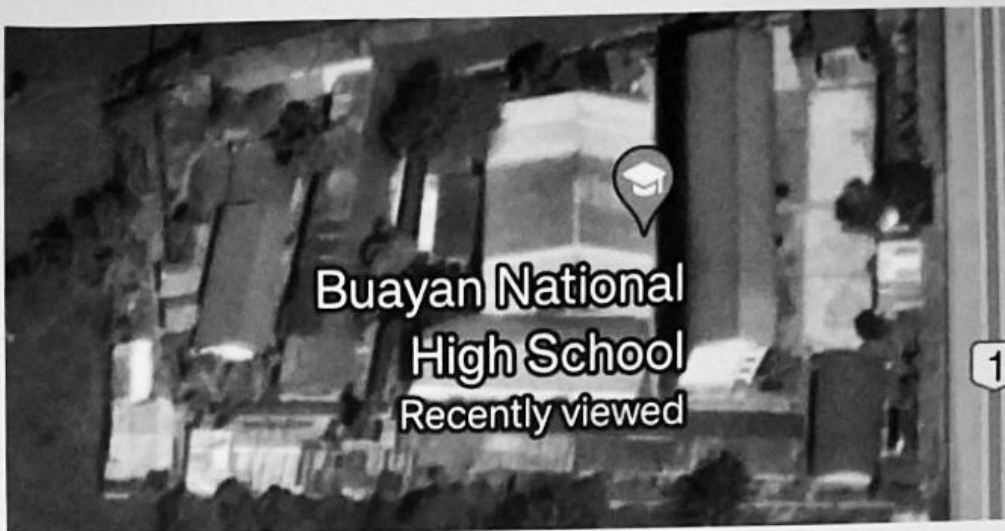
This chapter presents the research methods of the study. It aimed to find out if there's a difference in the academic performance of Grade 12 HUMSS students at Francisco Ramos National High School when AI is used or not. It includes discussion on the research design and research methods covering the research environment, research subjects, sampling techniques, instrumentation, data gathering techniques, and statistical treatment.

Research Design

The researcher used a quasi-experimental research design for this study. This method works well because it helped look at how using AI (artificial intelligence) and not using AI (artificial intelligence) affects the academic performance of Grade 12 HUMSS-FAITH students. This design was good for real-life school situations. It was hard to randomly put students in different classes, and it might not be fair. With a quasi-experiment, the researcher used existing groups of Grade 12 HUMSS-Faith students and compared how they do in the subject "Community Engagement, Solidarity, and Citizenship." One group used AI in their learning, and the other group did not. It helped the researcher see how AI works in education in a real setting with real students. It also lets the researcher analyze things more carefully than just watching what happens. By focusing on one subject and grade level, the researcher sees how AI affects student performance without other things getting in the way.

Research Locale

The research took place in Francisco Ramos National High formerly known as Buayan National High School which is located in Concepcion and Buayan High Way in the municipality of Kabasalan, Zamboanga Sibugay. The researcher selected this location for the study because it has suitable respondents and is conveniently located and accessible.



Research Respondents

The focus of this study was on Grade 12 HUMSS-FAITH students currently attending Francisco Ramos National High School. This study examined two groups of students: one group uses AI tools like ChatGPT and chatbots for schoolwork, while the other group relies solely on traditional study methods. The first group seeks help, improves understanding, and accesses extra materials using AI, while the second group uses traditional study methods exclusively. The research aimed to compare the academic performance or the Grade Point Average of Grade 12 students in one of their specialized subject which is Community Engagement , Solidarity and Citizenship and based on their use or non-use of artificial intelligence.

Sampling Technique

The researcher employed systematic random sampling to select 30 participants from the population of 42 Grade 12 HUMSS-Faith students at Francisco Ramos National High School. This investigation aimed to explore the influence of Artificial Intelligence on Community Engagement, Solidarity and Citizenship. Each student was assigned a unique number between 1 and 40. After calculating a sampling interval which is obtained by dividing

the total population by the desired sample size, rounded up if necessary, the researcher selected a random starting point. Subsequent participants were chosen by continuously adding the interval to the starting point. If this addition went beyond the total student count, the researcher wrapped around by subtracting the total population (42) from the number to ensure all students had a fair chance of being selected and a representative sample was obtained.

Research Instruments

For this study, the researcher utilized a questionnaire, specifically a semantic differential. The aim of the instrument is to address the specific questions posed in the statement of the problem. It consists of various parts, including directions, question sections, scaling items, and closing statements. Each sub-factor contains six items, making a total of six items overall. The scale employed for this study is the semantic differential and also, the researcher added an alternative approach question to the questionnaire to provide an even more information that could support the study. The researcher developed the research instrument through acquiring research instrument of related studies of (Smokoska, 2020).

Data Gathering Procedure

Before gathering data, the researcher created research questions that were answered, which determined how many grade 12 students would be included in the study. Then, the researcher obtained their permission by asking for their consent. While gathering data, the researcher makes sure the instructions for answering the research questions are clear to the grade 12 students who are respondents. Then, the completed research questionnaires from the students are collected. After gathering data, the collected information is organized into tables. Next, the researcher examined the responses provided for the research questions to analyze the data.

Statistical treatment

In the data analysis part, the researcher used descriptive statistics to summarize the data collected. It includes things like finding the average, middle value, most common value, and how much the data varies. The researcher also used a t-test to compare things, like seeing if there's a big difference in their academic performance between using artificial intelligence and not using it. Descriptive statistics helped the researcher see the main points of the data, while the t-test helped the researcher decide if any differences they see in their academic grade are real or just random. By using both, they can better understand how using artificial intelligence and not using it might affect the academic performance of Grade 12 students in school.

Chapter IV

Data Interpretation And Analysis

This chapter presents the gathered data from the respondent's perception and the comparison of the grades of Grade 12 HUMSS-Faith students between those who used artificial intelligence tools in their studies and those who do not use artificial intelligence tools but only utilized traditional study methods to their studies at Francisco Ramos National High School.

Table 1: Students who experienced using Artificial Intelligence tools in their studies in the subject Community Engagement Solidarity and citizenship

Category	Frequency	Percentage
Yes	25	83.33
No	5	16.67
Total	30	100

The table shows student responses regarding their experience with AI tools for studying Community Engagement, Solidarity and Citizenship. The majority, accounting for 83.33% (25 students), indicated they use these tools sometimes. Meanwhile, 16.67% (5 students) reported not using AI tools for this subject. It shows that although some students are interested in AI tools for this subject, not everyone uses them regularly (El-Seoud et al., 2023).

Table 2. How often AI(Artificial Intelligence) like chatbots are used in their studies.

	1	2	3	4	5	Total	Weighted Mean	Visual Interpretation
How often do you use AI(Artificial Intelligence) like chatbots in your studies ?	2	11	2	14	1	30	3.37	Never

Legend: 1-3 Never 4-5 Always

Table 2 presents how often Grade 12 HUMSS-FAITH students at Francisco Ramos National High School use artificial intelligence in their studies. The frequency distribution shows that 15 respondents rated the activities as Never(1-3) and 15 respondents rated it as Always (4-5). The total number of respondents is 30. It revealed that an even distribution between students who never/rarely use AI tools and those who often/always use them in their studies(EI-Seoud et al.,2023) related to Community Engagement, Solidarity and Citizenship.

Table 3. The rating of effectiveness of using artificial intelligence and using traditional study methods of Grade 12 HUMSS-FAITH students at Francisco Ramos National High School

	1	2	3	4	5	Total	Weighted mean	Visual Interpretation
Using Artificial Intelligence tools	1	0	8	16	5	30	3.80	Very Ineffective
Using Traditional study methods	0	1	13	12	4	30	3.63	Very Ineffective

Legend: 1-3 Very Ineffective 4-5 Very Effective

Table 3 examined student perceptions of traditional study methods and Artificial Intelligence (AI) tools in the context of this study on academic performance in Community Engagement, Solidarity and Citizenship for Grade 12 HUMSS-Faith students at Francisco Ramos National High School. Traditional study methods received a weighted mean of 3.63, which falls to very ineffective category. Interestingly, AI tools received a slightly higher weighted mean of 3.80, indicating a perception of very ineffective compared to traditional methods. But the ratings are also closer to very effective which indicates that using AI tools and traditional study methods in their learning has a chance that it's effective. This shows that students do better in their tasks when AI tools are used(Hwang et al., 2020).

Table 4. The difficulty level of using artificial intelligence tools in their studies.

	1	2	3	4	5	Total	Weighted mean	Visual Interpretation
The difficulty level of using artificial intelligence tools in studying.	1	3	11	8	7	30	3.47	Very Difficult

Legend: 1-3 Very Difficult 4-5 Very Easy

Table 4 suggest that Grade 12 HUMSS-Faith students at Francisco Ramos National High School generally find using Artificial Intelligence (AI) tools in their Community Engagement, Solidarity and Citizenship (CESC) subject to be moderately challenging. This is reflected in the weighted mean score of 3.47, where 1-3 represents "very difficult" and 4-5 represents "very easy". It showed that there are several advantages to using AI in education, as well as certain difficulties(Adiguzel, Kaya & Cansu, 2023). According to Woodruff, Hutson and Arnone(2023) some areas have less access to technology and aren't as comfortable using it compared to others.

Table 5. Distribution of Respondents By Their Pre-Test Scores in the Subject :Community Engagement , Solidarity and Citizenship

Pre- Test Scores (30 items)	Frequency	Percentage%
15	3	10
17	2	6.67
18	1	3.33
19	3	10
20	5	16.67
21	4	13.33
22	4	13.33
23	1	3.33
24	5	16.67
25	1	3.33
26	1	3.33
Total	30	100%

The table shows the scores of Grade 12 HUMSS-Faith students during their pre-test in Community Engagement, Solidarity, and Citizenship. It tells us how many students got each scores. Out of 30 items, it shows that 3.33%(1) student got 26 in their pre-test while 16.67% of the students got 20, the same as those who got 24 in their pre-test in the subject. Percentages would help us compare the importance of each grade and see how many students got grades in different ranges (Carlton, 2022).

Table 6. Distribution of Respondents By Their Post-Test Scores Out of 30 items in the subject: Community Engagement, Solidarity and Citizenship

Post- Test Scores (30 items)	Frequency	Percentage %
20	10	33.33
21	3	10
22	5	16.67
23	3	10
24	4	13.33
25	2	6.67
26	2	6.67
30	1	3.33
Total	30	100%

The table shows the scores of Grade 12 HUMSS-Faith students during their post-test in Community Engagement, Solidarity, and Citizenship. It tells us how many students got each scores. Out of 30 items, it shows that 33.33% of the students got 20 in their pre-test while 3.33% of the student got 30 in their pre-test in the subject. Percentages would help us compare the importance of each grade and see how many students got grades in different ranges (Carlton, 2022).

Table 7. The Comparison of The Students Post-Test Scores Out of 30 Items Between Those Who Used Artificial Intelligence Tools or Chatbots And Those Who Only Used Traditional Study Methods in The Subject Community Engagement , Solidarity and Citizenship.

Used Artificial Intelligence Tools or Chatbots	Used Traditional Study Methods
20	20
20	20
20	20
20	20
20	20
21	22
21	22
21	22
22	23
22	23
23	24
24	24
25	24
26	25
30	26

Figure 1. The Comparison of Students Post-Test Scores Between Those Who Used Artificial Intelligence Tools or Chatbots(15) And Those Who Used Traditional Study Methods(15).

t-Test: Two-Sample Assuming Unequal Variances		
	<i>Use Ai tools/ Chatbots</i>	<i>Use traditional study methods</i>
Mean	22.33333333	22.33333333
Variance	8.238095238	4.095238095
Observations	15	15
Hypothesized Mean Difference	0	
df	25	
t Stat	0	
P(T<=t) one-tail	0.5	
t Critical one-tail	1.708140761	
P(T<=t) two-tail	1	
t Critical two-tail	2.059538553	

In this table, a T-Test was conducted to compare the means of two sets of data: The Post-Test Scores of 15 students who used AI tools or chatbots in their studies and 15 students who used traditional study methods in their studies. Both data got 22.33 for the mean, then 8.24 for the variance of those who used chatbots and 4.09 for those who used traditional study methods. Interestingly, the data reveals no significant difference in test scores between the two groups. Both the AI and traditional methods groups have an average score of 22.33, with scores ranging from 20 to 30. There's also a similar distribution of scores across both groups, with neither having a clear majority in any specific score range. While the highest score of 30 was achieved by one student in each group, there are slightly more students in the traditional methods group who scored the lowest mark of 20. The P(T<=t) two-tail of 1 strongly suggest a significant difference exists between the academic performance of Grade 12 HUMSS students who use AI and those who do not. This suggests that while AI tools have the potential to be beneficial, they may not be a guaranteed path to higher grades(Holmes. Hui, Miao, Ronghuai, 2021).

Chapter V

Conclusion and Recommendation

This chapter presents the conclusion and recommendation of the difference between the academic performance of grade 12 HUMSS-Faith students with or without the use of artificial intelligence in the subject: Community Engagement, Solidarity and Citizenship at Francisco Ramos National High School.

Summary of Findings

The study conducted with Grade 12 HUMSS-Faith students at Francisco Ramos National High School reveals insightful findings regarding the utilization and perception of Artificial Intelligence (AI) tools for studying Community Engagement, Solidarity, and Citizenship (CESC). The majority of students reported using AI tools sometimes, indicating varying levels of engagement within the student population. Table 2 showcased an even distribution between students who never/rarely use AI tools and those who often/always use them, indicating diverse usage patterns which showed that although some students are interested in AI tools for this subject, not everyone uses them regularly (El-Seoud et al., 2023). Moreover, student perceptions towards both traditional study methods and AI tools were generally negative, with AI being rated slightly higher in terms of effectiveness compared to traditional study methods. However, AI tools were still considered potentially effective, suggesting their usefulness in enhancing learning outcomes. Despite this, Table 4 highlighted that students find using AI tools for CESC subject to be moderately challenging, indicating the presence of a learning curve. While in other tables, the table presents results from a T-Test comparing the post-test scores of two groups: 15 students who used AI tools or chatbots and 15 students who used traditional study methods. interestingly, both groups had the same average score of 22.33, with similar score distributions ranging from 20 to 30. However, the

$P(T \leq t)$ two-tail value of 1 indicates a significant difference in academic performance between Grade 12 HUMSS students who use AI and those who do not. However, it's important to note that using AI tools does not guarantee higher grades (Holmes, Hui, Miao, and Ronghuai, 2021), as mentioned in Table 4. Overall, while AI tools have the potential to be beneficial, they may not be a guaranteed path to academic success and could pose challenges for students.

Conclusion

The results found that the average post-test scores of Grade 12 students who actively utilize artificial intelligence tools in their studies is 22.33 and the average post-test scores attained by Grade 12 students who do not utilize artificial intelligence tools in their studies is 22.33. $P(T \leq t)$ two-tail value of 1 indicates a significant difference in academic performance between Grade 12 HUMSS students who use AI and those who do not, therefore rejecting the null hypothesis.

Recommendations

This study suggests several ways to improve future research in a similar field. Firstly, enhancing the questionnaire used for collecting data would provide a better understanding of how students use AI tools. This could mean adding more detailed questions about the types of AI tools students use, how often they use them, and why they use them. Also, making sure the Likert scale used to measure the effectiveness of AI tools and traditional study methods is clear would help ensure that respondents' ratings are consistent and accurate. Additionally, including open-ended questions in the questionnaire would allow students to share more about their thoughts and experiences, which could enrich the analysis process. Furthermore, future studies could benefit from increasing the number of participants and using more advanced statistical techniques, like regression analysis, to explore the relationship between AI tool usage and academic performance more accurately. By implementing these suggestions, future researchers

can build on the findings of this study and gain a better understanding of how AI tools impact the academic performance of students.

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April 12, 2024
Ma. Helen S. Jarcia
School Principal
Francisco Ramos National High School

Dear Ma'am,

Greetings of peace!

In partial fulfillment of our requirements for our subject 3I's (Inquiries, Investigation and Immersion), I am Arhess Sofia Pabilona a grade 12 HUMSS-Faith student in Francisco Ramos National High School formerly Buayan National High School, I would like to ask formally for a permission to conduct a research study entitled "The Difference Between The Academic Performance of Grade 12 HUMSS- Faith Students With or Without The Use of Artificial Intelligence in The Subject: Community Engagement, Solidarity and Citizenship at Francisco Ramos National High School.

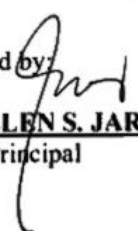
The purpose of this study is to determine the difference between the academic performance of Grade 12 HUMSS- Faith students with or without the use of artificial intelligence in the subject: Community Engagement, Solidarity and Citizenship. The researcher addresses these issues with the research methodology survey questionnaire and academic record that will be analyzed to understand the difference between the academic performance of Grade 12 HUMSS- Faith students that utilizes artificial intelligence tools to their studies and to those who do not. Rest assured that the data that will be gathered will remain confident and to be used for academic purposes only.

We believe that you are with us to finish the requirements for us to comply for our subject. Thank you for your time and attention to this matter. Your approval to conduct this study will be greatly and highly appreciated.

Recommending Approval:


CASSANDHRA PEARLA A. EMPERADO
Teacher

Approved by:


MA. HELEN S. JARCIA
School Principal

Appendix A

Research Instrument

Name(optional):

Grade & Section:

Directions: For each statement, please circle the number that best represents your feelings.

Remember there are no right or wrong answers. Please rate the following statements by circling the number that best represents your opinion. Use a scale from 1 to 5, where 1 indicates strong disagreement and 5 indicates strong agreement.

1. Do you ever use AI tools like chatbots or educational apps while you're studying Community Engagement, Solidarity and Citizenship?

Yes No

2. How often do you use AI(Artificial Intelligence) like chatbots in your studies ?

Never 1 2 3 4 5 Always

3. How would you rate the effectiveness of artificial intelligence tools in enhancing academic performance?

Very Ineffective 1 2 3 4 5 Very Effective

4. How would you rate the effectiveness of traditional study methods (without artificial intelligence tools) in enhancing academic performance?

Very Ineffective 1 2 3 4 5 Very Effective

5. How would you describe the difficulty level of using artificial intelligence tools in studying?

Very Difficult 1 2 3 4 5 Very Easy

6. What is your average GPA(Grade Point Average) in the subject Community Engagement, Solidarity and Citizenship?

Curriculum Vitae

Name : Arhess Sofia B. Pabilona
Date of Birth : May 18,2006
Place of Birth : Buayan Kabasalan Zamboanga Sibugay
Present Address : Buayan , Kabasalan , Zamboanga Sibugay
Parents
 Father : Romeo P. Pabilona
 Mother : Vesminda B. Pabilona



Educational Background

Senior High School (School) : Francisco Ramos National High School
 (School Address) : Concepcion , Kabasalan , Zamboanga Sibugay
 (Strand/Track) : Humanities and Social Science (HUMSS)

Junior High School (School) : Francisco Ramos National High School
 (School Address) : Concepcion , Kabasalan , Zamboanga Sibugay
 (Month & year graduated) : July,2022

Elementary (School) : Buayan Elementary School
 (School Address) : Buayan , Kabasalan , Zamboanga Sibugay
 (Month & year graduated) : 2017