Information Literacy Competency, Desired Mindset, and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction

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Lorelie A. Oregano

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Abstract

This study aimed to determine the current level of information literacy (IL) competency, desired mindset, and academic performance of secondary students in a private Christian basic education institution in a highly urbanized city. The study intended to prove that there is a significant difference and relationship between the level of effectiveness of students' IL competency and desired mindset to their academic performance. A quantitative descriptive-correlational methodology, and utilizing a researcher-made questionnaire based on the i-Competency Model was employed. Indeed, the competency in IL and the desired mindset of students exhibited significant improvement as they progressed through various grade levels, particularly when they attended library IL instructions. The findings significantly supported up the researcher's goal of providing library IL instruction to assist students develop their IL competency and desired mindset as they progressed through their academic journey. As the output of the study, the researcher proposed an enhanced library IL instruction which makes use of games as a support tool for teaching IL. Students' involvement in these various IL activities and attendance to library IL instruction benefited their learning, thus, it is recommended to be continuously conducted as it made a significant contribution to the enhancement of the respondents' level of IL competency and improve their academic performance. It is further recommended that the administrators should consider to integrate the library IL instruction into the typical curriculum. Librarians and faculty members are encouraged to continue to promote collaborative IL instruction, recognizing its value, purpose, and contribution to students' academic development.

Keywords: information literacy, information literacy competency, desired mindsets, academic performance, secondary students

Table of Contents

5. Summary, Findings, Conclusions, and Recommendations

List of Tables

List of Figures

Chapter 1

Introduction

Background and Rationale of the Study

Information literacy is a critical skill for survival in the Information Age and those who have this skill do not succumb to information overload, instead they excel and become proficient in acquiring, evaluating, and utilizing information to address specific situations or make well-informed decisions (American Library Association [ALA], 1989). There are so many sources of information, such as libraries, social media, and the internet which are easily accessible and vulnerable due to their authenticity, validity, and dependability (Association of College and Research Libraries [ACRL], 2000). According to the American Association of School Librarians (AASL), information literacy is the ability to recognize the need for information, and to identify, locate, appraise, and successfully use that knowledge from a variety of sources to solve real-world problems (2009).

Information literacy (IL) competency is a critical topic that is high on the list of essential competencies for 21st -century learners. High school students require a proficient understanding and execution of IL processes and competencies to face the challenges of the global information ecosystem they inhabit. (ACRL, 2015). It is crucial for every global citizen to undergo training in 21st-century competencies, especially on Media and Information Literacy (MIL), where the development of ICT skills is an essential component (Bhatt, 2016). Students should have the competency which are the outputs or results of having training and instruction so that they will be competent in finding, using, and evaluating information that will help them do better in their academic performance. Thus, students should be taught how to develop their IL competencies (Aharony & Gazit, 2019).

Banik and Kumar (2019) investigated 325 students' academic performance and

IL competencies. They investigated the impact of these IL competencies on students' academic performance by first measuring the level of these IL skills and then examining the IL competencies on their learnings using the OLS method to estimate linear regression. According to their study, the majority of the student's GPA (grade point average) is moderate, ranging from 3.01 to 3.50, and their level of IL competency is low, ranging from 10 to 20. Furthermore, they also discovered that the number of hours spent on studying and attending classes, the earnings of the family, the previous academic performances, and most of all the IL competency are important factors that affect their GPA.

According to the study of Obille (2013), which is supported by Lanning and Gerrity (2022), librarians must lead IL instruction because it is their area of expertise. They also stated that students who received instruction from a librarian performed better than those who did not. Henninger (2021) also emphasized that in the digital age of the twenty-first century, all knowledgeable professionals dealing with information including librarians, should provide IL instruction to students.

Abrigo (2018) used a quasi-experimental research design for the assessment, in which students were divided into two groups, one of which took the pre-test. The pre-test assessed students' knowledge of the topics covered in the Integrated Information Literacy Program. At the end of each module, the identical test was administered. Descriptive statistics, the difficulty index, and the paired t-test were employed to examine the pre-test and post-test data. Through collaboration with subject teachers, it was discovered that library lessons or instructions, as well as IL competency, can be integrated into classroom lessons. Different strategies and techniques for teaching library lessons and IL competency were identified through collaboration between teachers and librarians, allowing students to attain a higher post-test average score of 18.16 compared to the pre-test average of 11.83. Thus, libraries and librarians should

provide IL instruction to assist students in developing their IL competency, as discovered in the study of Abrigo (2018), which results indicated that after attending library IL instruction, students' IL skills improved. Library IL instruction is a part of library services where librarians conduct classroom lectures in collaboration with the faculty.

Consequently, in 2020, the Philippine Department of Education (DepEd) directed all institutions to follow and implement the MELCs, or Most Essential Learning Competencies, to assist students in developing practical and lifelong skills, particularly in the new modalities. MELCs are being established to address the challenges associated with the current pandemic while also striving for Filipino students who are well-rounded and have 21st-century skills. Learning competencies are awareness, comprehension, abilities, and perceptions that students must demonstrate in every learning experience the students have (Gonzales, 2020). As a result, project iLearn was conducted in the Philippines where media and information literacy are taught, as DepEd recognized the need to strengthen these areas of literacy and incorporate it into classroom-based learning, particularly in light of the abundance of information sources available today (DepEd, 2022).

In a private Christian Basic Education institution located in a highly urbanized city, the school librarian provided library IL instruction to supplement students' learning and knowledge about information and its sources. This is collaborative teaching with the faculty in a variety of topics, especially those concerning information resources to support students' needs in performance tasks and research assignments. These IL instructions have been conducted since the school year 2009-2010 and continue to do so even during this pandemic, in which the mode of instruction is blended, either face-to-face or online. It is therefore the purpose of this study to determine how information literate the secondary students of a private Christian Basic Education institution in a highly urbanized city are, as well as the level of their IL competency when they seek,

use, evaluate, and disseminate appropriate information.

Additionally, the researcher, who has been teaching IL instruction to secondary students, wants to know if they can develop their IL competency not only for assignments, performance tasks, and research but also in their daily lives. In this new normal, these skills should adequately prepare them for higher education and more difficult tasks, allowing them to become informed and learned individuals.

Moreover, based on the study's findings, the researcher will improve the library IL instruction that goes beyond merely helping students develop 21st-century IL competencies. This enhanced library IL instruction will design activities that would be in more creative and varied ways to increase student engagement and learning, as Yap and Peñaflor (2020) did in their study, in which they integrated games such as the Library InfoLit Race (Kazakhstan) and Library Amazing Race (Philippines). The library can introduce a variety of games that incorporate IL competencies, and allowing students to develop desired mindsets through these educational games.

Objectives of the Study

This study intended to assess the current level of information literacy competency and desired mindset of secondary students in a private Christian Basic Education institution in terms of their performance of information literacy activities and to determine the relationship between the respondents' level of information literacy competency and desired mindset to their academic performance.

Specifically, the study aimed to answer the following:

1. What is the demographic profile of respondents when they are categorized according to grade level, attendance to library information literacy instruction, and mode of library information literacy instruction?

2. What is the current level of respondents' information literacy competency in terms of performance of information literacy activities when taken as a whole and

categorized according to grade level, attendance to library information literacy instruction and mode of library information literacy instruction?

3. What is the current level of respondents' desired mindset necessary to accomplish information literacy activities when taken as a whole and categorized according to grade level, attendance to library information literacy instruction and mode of library information literacy instruction?

4. What is the current level of respondents' academic performance in terms of their final GWA (general weighted average)?

5. Is there a significant difference in the respondents' level of information literacy competency when categorized according to grade level, attendance to library information literacy instruction and mode of library information literacy instruction?

6. Is there a significant difference in the respondents' level of desired mindset when categorized according to grade level, attendance to library information literacy instruction and mode of library information literacy instruction?

7. Is there a significant difference in respondents' level of academic performance when categorized according to grade level, attendance to library information literacy instruction and mode of library information literacy instruction?

8. Is there a significant relationship between the respondents' level of information literacy competency and their academic performance?

9. Is there a significant relationship between the respondents' level of desired mindset and their academic performance?

10. What enhanced library information literacy instruction can be provided by the library based on the results of the study?

Hypotheses of the Study

The following are the hypotheses formulated for this study,

1. There is no significant difference in the respondents' level of

information literacy competency when categorized according to grade level, attendance to library information literacy instruction and mode of library information literacy instruction.

2. There is no significant difference in the respondents' level of desired mindset when categorized according to grade level, attendance to library information literacy instruction and mode of library information literacy instruction.

3. There is no significant difference in the respondents' level of academic performance when categorized according to grade level, attendance to library information literacy instruction and mode of library information literacy instruction.

4. There is no significant relationship between the respondents' level of information literacy competency and their academic performance.

5. There is no significant relationship between the respondents' level of desired mindset and their academic performance.

Theoretical Framework

Educators, researchers, and practitioners are constantly looking for new ways to teach information literacy. As a result, various higher education institutions and professional associations have developed information literacy standards and models to serve as guidelines for providing information literacy standards.

This study examined theories associated with information literacy competency, yet none was found to have the direct association to this. However, information literacy has been observed to operate within the constructivist paradigm, following the foundation laid by Vygotsky (1978) in understanding learning and knowledge construction within social contexts through his Zone of Proximal Development theory as cited in Kerr & Todd (2009).

The American Library Association or ALA and Association for Education Communication and Technology or AECT have proposed *Information Power* to provide

foundation for information literacy standards (ALA, 1998). Similarly, Association of College and Research Libraries (ACRL) has produced *Information Literacy Competency* (ACRL, 2000). In 2012, ACRL established a task force to propose a revised framework and this endeavor resulted in the creation of the *Framework for Information Literacy in Higher Education*. As detailed in ACRL's recommendations in January 2015, the framework is made up of six frames, each comprising a key notion in information literacy, a series of knowledge activities, and a set of dispositions (ACRL, 2015).

Several approaches were also presented, and various studies were conducted across a wide-range of information literacy standards and frameworks and found out that students still do not possess the desired levels of these information literacy competencies. As a result, a year later, cyber-wellness concepts have now been incorporated to the IL competencies which give birth to the i-Competency model by Nanyang Technology University in Singapore (Majid et. al., 2016).

Hence, this study adopted the context of the i-Competency model which is considered as the most fitting framework for it adeptly illustrated the attributes of the students as they endeavor to acquire information literacy competencies and desired mindsets. These attributes refer to the characteristics of an individual who possesses information literacy, which includes the combination of knowledge, abilities, and attitude that create the foundation of information literacy competencies (Majid et. al., 2016).

This theoretical model promotes the three desired mindsets of collaborative information literacy process, social responsibility, and attitudes in addition to five sets of competencies which are: defining information task/analyzing information gap; selecting information sources; seeking and evaluating information from sources; synthesizing and using information; and appraising the information process and product (Majid et. al., 2016). This model was also developed from the Eisenberg and Berkowitz's The Big 6 Model of Information and Technology Literacy which covers the six tasks required to

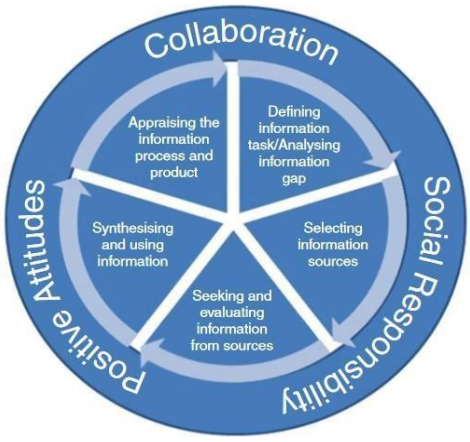
demonstrate and understanding of information literacy competencies. According to them, students, whether consciously or subconsciously, go through the six stages of the Big 6 Model (Eisenberg & Berkowitz, 2000; Eisenberg et al., 2010).

Information literacy tasks or activities are grouped into a collection of approaches and tools by the i-Competency model along the dimensions of information seeking, establishing information needs, and analyzing information gaps. Each task's key techniques, such as selecting information sources, seeking and evaluating information from the selected information sources, synthesizing and using information, and evaluating the information process and end product, are easily identified.

These IL activities provide a useful framework for gathering information to define an information-literate individual's competencies and skills. Moreover, a positive attitude toward finishing an information task, responsible collaboration for group information seeking and use, and social responsibility for moral information seeking and use are three mindsets that are necessary to complete these information literacy activities and will help students develop their information literacy competencies. These IL competencies and mindsets are meant to be instilled in students as part of the educational process and for the improvement of their academic performance.

Figure 1

The i-Competency Model for IL Standards

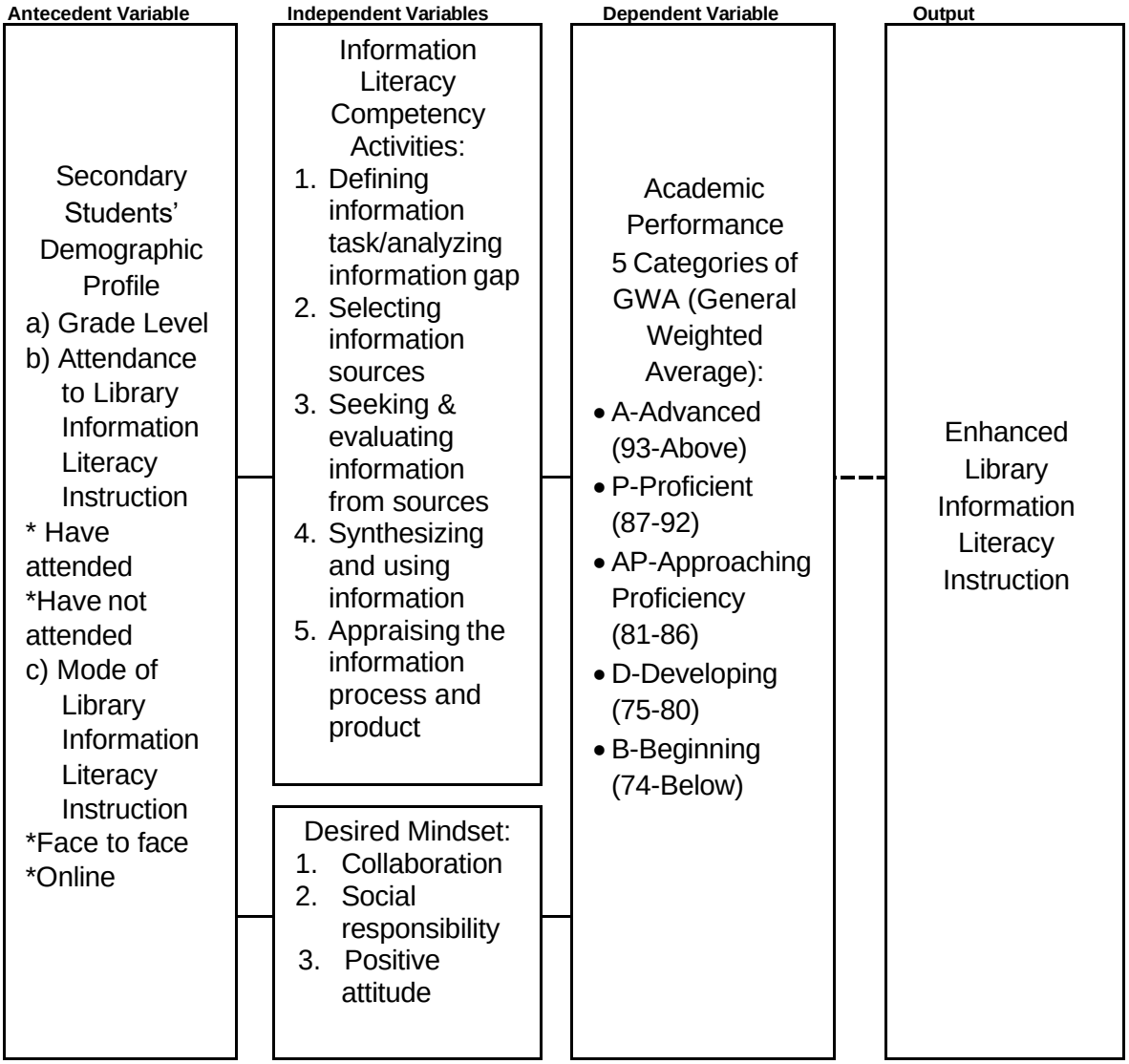


Conceptual Framework

This study uses the i-Competency Model for IL standards as its conceptual model framework to investigate students' information literacy competencies through performing various information literacy activities. This model formed the basis for the conceptual framework of the study (Majid et al., 2016), depicting five information literacy activities and three components related to the desired mindset.

Figure 2

Diagrammatic Presentation of the Independent and Dependent Variables of the Study



The effective utilization of the five IL activities and three components of the desired mindset contributes to proficient and effective information seeking and usage. These qualities are considered desirable for an individual to be considered information literate in today's rapidly evolving information landscape (Mokhtar et al., 2010).

Looking at the conceptual framework, the researcher demonstrates how variables support the study's findings and make them more relevant to the research questions addressed by the study's objectives. When students actively participate in their learning process and utilize various information resources, they are able to acquire and generate new knowledge. Making connections between pieces of information and comprehending how they are related is an essential aspect of learning.

Engaging in activities that involve bibliographic research, task performance, and information retrieval and utilization can be a valuable contribution to the development of students' information literacy competencies, which, in turn, can lead to improved academic performance.

Definition of Terms

The following terms are defined conceptually and operationally in the context of this study for a better understanding:

Academic Performance

Academic performance is a crucial component of the group of variables influencing students' achievement. It also has a huge impact on education, especially as a practical method of assessing how well students are learning (Tus, 2020).

As used in this study, academic performance refers to the level to which a student has achieved the established academic objectives, typically assessed through their GWA (General Weighted Average) for a specific school year. A student's GWA is influenced by a variety of factors, and one such factor is their information literacy competency.

Desired mindset

This refers to the desired attitude in individuals who demonstrate a positive outlook that aim for improvement in mental perspective and developing cognitive abilities and literacy skills (Moneva & Tribunalo, 2020).

As used in this study, desired mindset involves desirable thoughts, positive attitudes, and behaviors that interpret and respond to certain situations contributing to respondents' confidence and ability to cope with the challenges, which may lead to the development of literacy competencies and successful academic performance.

Information literacy (IL)

This is a set of critical thinking abilities that entails recognizing the need for knowledge, finding and assessing information, and successfully and morally utilizing information (ALA, 1989). Information literacy also refers to a set of skills enabling individuals to recognize when they need information and to efficiently find, evaluate, and effectively use the information they seek (ACRL, 2015).

As used in this study, information literacy refers to a collection of abilities required for an individual to search, access, evaluate, use and apply information in order to make educated life decisions.

Information literacy (IL) competency

Information literacy competency refers to abilities and attitudes that help an individual understand when and why information is needed, where to get it, how to assess, manage, and how to combine, use, and transmit it ethically and legally (Anunobi & Udem, 2014). It also promotes independent learning by providing students' ability to appraise, control, and apply knowledge; and it is increasingly recognized as a critical result for how students interact with information in their environment, making them aware of the explicit actions required for accessing and using information (ACRL, 2015; ALA, 2000).

As used in this study, information literacy competency includes not just a set of skills but also a combination of skills, knowledge, and attitude that K-12 students should develop. Information literacy (IL) competency, as a broader concept, spans beyond cognitive traits such as the application of theory, concepts, or implicit knowledge relating to information. It also includes functional and behavioral characteristics such as technical, interpersonal, and social skills, as well as incorporates ethical principles, particularly in the lawful and ethical seeking, accessing, and use of information.

Information literacy (IL) instruction

This refers to the individuals' comprehension and capacity to recognize personal information needs, evaluate current knowledge and spot gaps, locate, review, and evaluate information and data professionally and ethically, apply recently learned material, and present the results are all influenced by this IL instruction and collaborative teaching (Bapte, 2019).

As used in this study, IL instruction are library information literacy lessons that were conducted in collaboration with the faculty teaching students to use the library and its resources as a source of information; challenging them to think creatively and critically about their search for information sources; and supporting students' growth as knowledge creators, lifelong learners, and participants in academic activities.

Secondary students

This comprises lower secondary education referred to as Junior High School learners and upper secondary education known as Senior High School learners. In the Philippines, secondary school lasts six years, from grades 7 to 12 (DepEd, 2019).

As used in this study, it refers to the secondary school or high school learners who are enrolled in a private Christian basic education institution in Bacolod. This is composed of the Grades 7 to 10 learners who belong to the junior high and Grades 11 to 12 who are the senior high.

Significance of the Study

The following groups will benefit from the study's findings:

Administrators and Institutions

The results can be used to evaluate curricula and create learning objectives that integrate information literacy into students' lessons and support their academic and personal success.

Faculty

The findings of this study may also be useful in evaluating the learning guides for each subject to integrate IL competencies to address students' concerns related to information literacy and learning behavior.

Librarians

The study's findings and conclusions will be used to evaluate and redesign library information literacy instruction which is effective and beneficial to the development of students' IL competencies and behavior towards learning.

Students/Learners

Secondary students, in particular, will be able to identify and develop their current level of IL competencies to properly use, evaluate, and disseminate, solve problems, think critically, and use information sources ethically. This will also allow them to develop their attitude to be knowledged creators, lifelong learners, and successful not only in their academics but also in their daily lives.

Future researchers

Librarians and other information specialists may utilize this study to support their references in the future. The study's conclusions, analysis, and inferences will significantly add to the body of knowledge already known in the field.

Scope and Limitations of the Study

This descriptive study's goal is to examine and evaluate the secondary students' present level of information literacy competency and desired mindset in a private Christian Basic Education institution. The final GWA (general weighted average) for the academic year 2022–2023 was used to measure the impact of IL skills on students' academic achievement in this study and this data was accessed from the school's record with the permission of the respondents and upon the approval of the school's registrar, as stated in Part 3 of the research questionnaire.

The researcher-made survey questionnaire was based on the i-Competency Model which was created by the Members of NTU's Information Literacy Research Group in Singapore in 2015. It was distributed to all students in grades 7 through 12, and was comprised of IL competencies activities divided into five categories and three desired mindsets. The mode of delivery of the IL instructions, whether face-to-face or online, as well as the attendance of the aforementioned students, whether they attend or not, was evaluated on how these affect the students' academic performance in terms of their GWA.

The study employed various statistical tools for analysis. The frequency distribution table was utilized to present the number of tallies and their corresponding percentage. Additionally, the mean and standard deviation were calculated as each Likert scale item was treated as a continuous variable. This allowed for the application of a t-test for independent samples.

To assess the variations in respondents' information literacy skills, both overall and when categorized by academic achievement components, Analysis of Variance (ANOVA) was employed. Furthermore, the study used Spearman rank-order correlation (Spearman's correlation) to determine the significance of the relationship between the effectiveness of students' information literacy competencies and their academic

performance in the blended mode.

This study was limited to secondary students from Grades 7 to 12 who are enrolled in a private Christian Basic Education institution in the school year 2022-2023. The data was gathered and processed from May to June 2023. The total enumeration method was used because the study's goal, as stated in the research title, was to cover the given group and assess the IL competency and desired mindset of the entire population. Nevertheless, out of the 391 secondary students, only 362 actively participated in the survey. This could be due to the respondents having the freedom to choose whether or not to participate, or perhaps some individuals were simply unavailable or absent during the data collection period.

The research questionnaire was conducted face to face to the respondents by grade level and each item in the questionnaire was read and explained by the researcher. The informed consent and assent both in English and in Hiligaynon were also explained. The procedure of the study was thoroughly discussed in the data gathering procedure section. All information gathered during this study were kept private and strictly confidential.

Furthermore, except for those believed to have evident effects on the specific claims and concepts incorporated in this research study, regardless of year or period, the scope of the related literature used to challenge or support theories and concepts from this study only included works from 2017 until the school year when this study was conducted. The researcher also discovered that there is a scarcity of related literature and local studies on secondary students' information literacy competency and desired mindset. Some were studied many years ago, but few, if any, were discovered recently.

Chapter 2

Review of Related Literature

The current generation of learners is bombarded with information from more sources than ever before. To deal with the massive amount of information they would encounter in school, life, and work, they need to learn skills that previous generations did not. While schools should continue to identify basic information that students must know, they should also teach information literacy, or the ability to find, interpret, use, and communicate information from a variety of sources (Chan, 2021).

Information can be presented in a variety of ways, including text, data, images, and multimedia. As a result, students must be articulate in their information needs, find this information efficiently and think critically about resources, manage the abundance of information available, and evaluate critically and use this information ethically.

The review of literature for this study aims to provide an overview of related topics. First, studies on information literacy, information literacy competency, and desired mindset. What is already known, and what should be. Second, reviews on the importance and significance of the library information literacy instruction being conducted by the libraries. Finally, studies on the usefulness of information literacy competencies on secondary students' academic performance, particularly in the Philippines.

Information Literacy (IL)

What was known about information literacy? The term information literacy was introduced in 1974 by Paul G. Zurkowski, who served as the president of the Information Industry Association (IIA) at that time (Badke, 2010). The ability to perceive the need for information and the skills to effectively search, assess, and use the essential information define information literacy (ALA, 1989). There are several literature reviews that examine the Library and Information Science (LIS) literature for information literacy (IL) definitions

during the ACRL's Information Literacy Competency Standards for Higher Education.

These reviews traced the evolution of IL definitions based on Addison and Meyer's framework of IL definitions which were grouped into three categories: 1) a set of skills, 2) a way of thinking, or 3) a social phenomenon or practice. These categories provide a framework to follow the progression of IL definitions (2013).

Information literacy's conceptual framework has been updated to reflect the idea that it is a collection of linked skills, including reflective thinking according to the American Library Association (ALA), Association of College and Research Libraries (ACRL) division. Information discovery includes, among other things, finding information, comprehending how information is produced and valued, using the information to produce new knowledge, and engaging in communities of learners in an ethical manner (ACRL, 2015). For the school populations in the PreK-12 division, ALA originally defined Information literacy as a set of abilities requiring individuals to recognize when information is needed and have the ability to locate, evaluate, and use effectively the needed information. The ability to recognize the need for information, as well as the ability to identify, locate, evaluate, and effectively use the information to solve a practical problem, is defined as information literacy (AASL, 2009).

We are linked to information through knowledge sites that we utilize to create our information landscapes (Lloyd, 2019). Information literacy (IL) is not only a fundamental but also a critical skill for twenty-first-century learners. Learners can now access information from any location and at any time by using their personal computers or mobile devices (Aharony & Gazit, 2019).

What should be? What exactly is twenty-first-century information literacy? These days, the importance of information literacy is rising quickly. The genuine definition of information literacy is the ability to identify the need for information and the capacity to identify, locate, assess, and successfully apply the knowledge to address a practical

problem (Banik & Kumar, 2019).

Given the increasing usage of information and communication technologies (ICT) for information-related tasks, numerous recent studies on information literacy (IL) have also evaluated students' proficiency in effectively utilizing ICT. In 2018, the International Association for the Evaluation of Educational Achievements (IEA) conducted an international computer and information literacy study (ICILS), which aimed to assess the CIL or computer and information literacy competencies of eighth-grade students (Fraillon et al., 2019).

Two decades ago, Proclamation No. 614 was issued by Pres. Gloria M. Arroyo in the Philippines to endorse UNESCO's Call for Action during the United Nations Literacy Decade Launch in Bangkok, Thailand in September 2003. In this proclamation, she recognized that literacy is a basic right that is not available to about 2.4 million Filipinos who are aged 10 and above and are considered functionally illiterate, as well as around 7.8 million who are basically illiterate, and 3 million out-of-school youth who are at risk of falling back into illiteracy if they are not given immediate attention. In addition, Asia is home to around 600 million of the 860 million non-literate people worldwide, which is almost 70% of the total population. As a result, the Literacy Coordinating Council (LCC) and other government and private sector organizations that promote literacy were tasked with coordinating inter-agency activities to achieve the objectives of the United Nations Literacy Decade (UNLD), according to the Office of the President (2004).

Recently, the Department of Education (DepEd) wishes to promote information literacy among students in order to assist them in discerning accurate data, particularly during a global health crisis. Information, whether supported or not by scientific evidence, is widely available and has the potential to influence people’s decisions, policies, and opinions in all aspects of life. According to the DepEd Undersecretary, there is a link between a lack of information literacy and a student's level of reading

proficiency. In the 2018 Programme for International Student Assessment (PISA), the Philippines finished last out of 79 countries in the Organization for Economic Cooperation and Development (OECD) global survey among 15-year-old students. Indeed, according to the PISA results, information literacy played a significant role in our poor reading performance. Teaching the youth to be responsible internet users and knowing what is factual will change Filipinos' online presence (CNN Philippines Staff, 2020).

Thus, as the global community awaits responsible acts from technological giants to prevent any improper use of influence which results to inappropriate use of information, the responsibility remains on digital citizens to develop digital literacy which also includes acquiring information literacy competency (Henninger, 2021).

The country’s first university-based opinion and survey research unit known as the Boses, Opinyon, Siyasat, at Siyensya para sa Pilipinas or BOSES Pilipinas, has conducted a study and discovered that among 20,000 Filipino students through 25 partner colleges and universities has only an average of 6.9 out of 10 got correct scores which shows that only average has the skills in identifying fake news. The study also highlights that trust in social media and Facebook can hinder one's ability to detect misinformation (*Majority of Filipino Youth Respondents,* 2021).

Batiancila (2006) pointed out that information literacy emerges as a critical component and contributor to the larger aims of lifelong learning and education thus, it is highly recommended to establish a regional information literacy initiative, recognizing the dedication of associations such as the American Library Association (ALA) to cultivating lifelong learners.

This recognition highlights the Association's importance in developing intellectual qualities such as reasoning and critical thinking, allowing students to successfully translate information into innovative creations.

Information Literacy Competency

Even though the phrases are commonly used interchangeably, information literacy, and information literacy competency are not the same. Information literacy competency includes knowledge, abilities, and attitudes related to identifying when and why information is needed, where to acquire it, how to analyze, manage, and apply it, as well as how to synthesize, use, and transmit it ethically and legally. One part of the skill is competency, and competency also includes knowledge and attitude (Anunobi & Udem, 2014).

Information literacy (IL) competency is a critical topic that is high on the list of essential competencies for 21st-century learners. High school students require a proficient understanding and execution of IL processes and competencies in preparation for the challenges of the information ecosystem they inhabit according to ACRL (2015, p.2).

A Stanford University study found that secondary students' information evaluation competencies were lacking. If they lack the information literacy skills to evaluate and reject misleading information while also employing reliable information, students will find it difficult to navigate this new environment. In the digital age, when information and methods of sharing are prevalent and expanding and where false and misleading information is frequently spread, thus, students require IL competencies (Wineburg & McGrew, 2016).

Information literacy competency, according to Wen and Shih (2008), is the possession of the essential skills, and attitudes; the awareness of the significance, processes, and importance of information to fully implement information technology for data collection, analysis, assessment, organization, and synthesis for problem-solving.

Several assessment techniques can be considered to assess students' IL competencies. Some examples of such tests are Research Readiness Self-Assessment

(RRSA, 2008); Standardized Assessment of Information Literacy Skills (SAILS, 2016); Information Literacy Test (ILT, 2016) and Tool for Real-Time Assessment of Information Literacy (TRAILS, 2018); and the tests have been developed for a different level of students and are widely adopted and used by many educational institutions in different countries (Chan, 2016; Scott, 2017).

The 21st learners are considered "digital natives," who spend their entire lives immersed in media-rich digital environments and are constantly connected via social networks, naturally developing information and digital competencies. (Porat et al., 2018). Digital natives are those born after the 1980s. They are quick to process information, multitask, and prefer images to text (Prensky, 2010). Consequently, students who belong to this K-12 generation are now the digital natives, expected to possess the knowledge and competencies needed to use information and communication technologies (ICT) tools naturally (Sorgo et al., 2017).

As a result, various teaching and learning strategies in education are required. Several studies, like Bury (2016), underline the necessity of being proficient in 21st-century abilities, stating that students must be able to approach, critically analyze, and use relevant and credible information. This is critical for navigating today's broad and diversified information ecosystem and its significance of providing complete information literacy competencies to secondary students should be stressed and emphasized (Amusan & Lawal, 2020).

However, this is undoubtedly becoming a problem, especially with secondary students who believe themselves to be information literate. Most of them would not ask for help in figuring out how to find, evaluate, and use information effectively, they also do not know how to distinguish between trustworthy and questionable sources, accurate and incorrect material, and trustworthy and dishonest websites (Spisak, 2018).

There are Asian studies as well, such as in Vietnam, where high school students

significantly overestimate their abilities, particularly superficial knowledge. Furthermore, they face significant challenges, particularly in the evaluation of information and more advanced search strategies. The study found a significant difference between what students believe they have and what they actually have (Ngo et al., 2019).

In the Philippines, the government has implemented media and information literacy (MIL) as an integral core subject in senior high school education starting in 2017-2018. This integration highlights the government's recognition of the significance of MIL education in developing the information literacy competencies of the youth, who are considered one of the most vulnerable groups not just as receivers but also as disseminators of false information. It is therefore imperative for government officials to address these concerns promptly and educate the younger generation, equipping them with the knowledge to understand the role of media in democracy, improve their ability to access and utilize information from credible sources and foster an appreciation for diverse perspectives as to avoid plagiarism (Bautista, 2021).

In a local study at a private college in Roxas City, Capiz, 166 graduate students participated in an investigation of how knowledge affects attitudes toward plagiarism. It was found that although most respondents had a solid understanding about plagiarism, most had difficulty identifying specific instances and practices of plagiarism (Bialen, 2016). Thus, students should be taught about information literacy, introduced to the library and its resources. Students should have their IL competencies and library-seeking behavior develop.

Another study was undertaken locally to assess the IL competency of students attending a college in an urbanized city, focusing on their use of the library. The goal was to look into potential significant differences in these aspects based on age, gender, academic year, and user groups. The findings revealed a significant relationship between students' library-seeking behavior and their information literacy competency.

According to the findings, as students improved their library-seeking behavior, so did their level of information literacy competency (Pansinsoy, 2011).

Desired Mindset

The desired mindset involves desirable attitudes in individuals who are information-literate in today's rapidly evolving information environment. There are interventions targeting mindsets that aim to improve students' mental perspectives, thereby improving their learnings. Students demonstrated a positive outlook and desirable mindsets toward performance assignments when they understood the tasks well and had confidence in their ability to accomplish them. This confidence was supported by their competency in information literacy, which contributed to the enhancement of cognitive abilities among young people (Moneva & Tribunalo, 2020).

The degree to which students believe their intellect can be improved has an impact on their thoughts, behaviors, and, ultimately, their academic success. Understanding and promoting student learning achievement requires understanding the development of their mindset. Thus, the results of their study imply that mindset and academic performance constitute a positive feedback loop (Limeri et al., 2020).

Nonetheless, the theory of mindset was investigated in the study of Macnamara and Burgoyne (2022). According to them, the lack of good intervention results aimed at developing and changing the students’ mindsets would affect their academic performance. Similarly, their research disproved beliefs that growth mindset differs depending on students' level of difficulty or obstacles as confirmed by null findings resulted from theoretical moderating factors about intervention that leads to achievement measurement. The student’s self-confidence was reinforced by their information literacy competencies which motivate this young generation to enhance their cognitive abilities and cultivate mindsets that influence their overall attitude and beliefs (Moneva & Tribunalo, 2020).

Library Information Literacy Instruction

The school library serves as a venue for literacy training, reading, and fostering inquiry-based learning. School libraries aid with teaching and learning throughout the school by making a distinction between student comprehension and achievement (Ayaz, 2017). Blake et al. (2017), stated in their research that literacy information instruction, especially literacy sessions conducted by the library that supplements student's lessons, has a crucial impact on the academic achievement and retention of first-year students in numerous educational institutions. Students who engaged in library information literacy education and received literacy instruction outperformed their peers in academic performance, used more reliable sources of information, and supported their arguments and opinions with relevant literature (Squibb & Mikkelsen, 2017).

As the COVID-19 epidemic compelled educational institutions to immediately switch to virtual instruction, library services also adapted to this new learning mode to provide continuous services, especially library information literacy instruction. Although online learning experiences of secondary students proved to be many challenges, difficulties, and uncertainties but also offered new opportunities (Walker, 2022). Nevertheless, Hariyati et al. (2021), discovered that students' exposure to literary materials was restricted because of the limitations imposed by the two-year-long pandemic. They faced challenges in finding ample time to physically access the library. Instead, they turned to online links and web references, frequently favoring Google as a recognizable resource. This convenience might compromise important library principles, such as ensuring information quality and safeguarding privacy (Georgas, 2013).

According to a study conducted in India between June and August of 2020, students have a positive perception of online or e-learning and readily accepted this new learning system, as well as finding that information literacy competency gained from the modality is significant and useful during the COVID-19 crisis (Khan et al., 2021). Hess's

research in 2014, stated that online instruction in information literacy has been shown to be as impactful for learning as traditional face-to-face instruction. This conclusion was drawn from a quasi-experimental study conducted with sociology undergraduate students at a university in Michigan.

The study of Sundari et al. (2020) compared conventional or face-to-face learning with the blended mode and they found out that that blended mode learning in secondary education during the COVID-19 epidemic in Indonesia were inefficient and ineffective. According to them, blended mode is only accessible for distributing projects and/or homework. However, Sundari et al. study also claimed that the cooperation of all school parties is essential to the success of blended learning during COVID-19. Schools and libraries adapt swiftly to meet the specific demands of their users in this new situation, despite certain problems and limited resources. It was supported by a newer study's findings that the pandemic's effects on IL education have several traits including reacting rapidly to information requests and providing users with information resources, creating and compiling current COVID-19 information situations, and countering incorrect and misleading information (Guo & Huang, 2021).

In Singapore, a group of researchers investigated the IL skills of grade 5 students from 17 different schools. The study focused on the student's proficiency in fundamental IL competencies, including defining information tasks, selecting information sources, seeking information from sources, and synthesizing and using information. To assess these skills, the researchers administered a 38-item multiple-choice test based on the i-Competency model. The overall mean score on the test was 53.39, which fell below the recommended score of 60 or 70 that previous studies have suggested. The two weakest areas of IL skills were synthesizing and using information and seeking information from sources, with mean scores of 45.89 and 48.84, respectively. The researchers concluded that this low score may indicate that the students have not been adequately taught or

exposed to bibliographic knowledge and searching (Foo & Majid, 2016).

The need for information literacy (IL) education has become more apparent as a result of global economic, social, cultural, and technological changes. Due to these changes, various countries, as well as librarian and library organizations, are calling for the development of IL standards and the teaching of IL skills. The two duties of librarians and libraries, according to Henninger (2021), are to assess what encourages educated societies and responsible citizenship and to look into the idea that libraries have a function in a democratic society. The fact that librarians are part of the information profession and that each is an individual, a citizen, an educator, and an informed practitioner was also highlighted by the speaker. They emphasized that in the twenty-first century, the digital age, such an initiative must include all information professionals and informed people. They continued, referring to the various literacies that emerge and overlap in today's world, being informed entails being informationally literate.

Additionally, Abrigo (2018) found in their study with a private institution in one of the cities in Manila, that the collaborative partnership between teachers and librarians is essential when developing an integrated information literacy program. Additionally, students' information literacy competencies improved after attending information literacy instruction, so libraries and librarians should offer library information literacy instruction to help students develop their information literacy competencies. Libraries in the Philippines mostly offer instructional programs that help students gain information literacy skills through the conduct of formal and informal IL sessions. These instructions are helpful and supportive of the student’s learning, classroom lessons and assignments.

The Philippine Association for Media and Information Literacy or PAMIL, which is a professional association composed of MIL educators, trainers, and practitioners, conducted research on MIL teaching methods. In 2019, their study uncovered that the most prevalent classroom activity among interviewed MIL teachers was the analysis and

assessment of media texts. Additionally, it was found by PAMIL that at a specific school, librarians play an active role in the development of the MIL curriculum. Their participation guarantees that the MIL program includes library research, with the assistance of the librarians through the library instruction session they conducted (Tuazon et al., 2020).

The importance of library instruction has been recognized over the years with consistency. Labrador (2014) survey 209 Grade 5 pupils at the University of San Agustin on Panay Island through a qualitative-quantitative descriptive study. The results showed that students had a fundamental knowledge of libraries, information and communication technologies, and library skills. Analyzing the data by gender showed no significant differences in the knowledge levels about library usage, however differences were noted depending on the length of time students had been enrolled in school, their grade level, and grade point average. The positive results were contributed to the continuous library instructions conducted to the students especially as they progress in their grade levels.

Game on! Teaching gamification principles for library instruction is explored in the study by Capdarest-Arest et al. (2019). In this research, the authors applied gamification principles to instruction and observed an increase in learner motivation and engagement. Their unique content session, titled Design, Play, Learn: A Special Content Session to Design a Game for Database Instruction, was created and conducted using multimodal instruction.

In another study by Yap and Peñaflor (2020) which also presented the use of games in academic libraries, including Library Amazing Race in the Philippines and the Library InfoLit Race in Kazakhstan. This method is a useful tool for integrating media and information literacy into collaborative teaching in a learning environment. It also works effectively for engaging students in the process of using the library's resources and services. Walsh (2014) defines gamification as a game-based learning (GBL) technique in which the game mechanics are similar to those of serious games but

customized to imitate particular activities meant to encourage learning and problem-solving in non-gaming contexts. Among the games they introduced are the following: *Don't Fake It!* which is intended to be used for assessing media content, information sources, and information providers. Another one is the *Detour Challenge*, a game designed to improve students' ability to properly cite a variety of sources of information. A game called *Copy Face* where students are tasked by using their creativity and knowledge-creation skills to recreate scenes from DVD covers that they have acquired from the library's audiovisual collections is also a very good challenged for the students' learning and skills.

Academic Performance

Gkorezis et al. (2017) study revealed in their current findings that information-seeking and academic self-efficacy are the two underlying mechanisms through which students' tendency to investigate and seek out new knowledge and experiences results in enhanced academic performance. Their outcomes revealed that both components, either individually or sequentially, acted as mediators or properly explained the effect of exploration on academic attainment. Academic performance is a crucial component of the group of variables influencing students' achievement. It also has a huge impact on education, especially as a practical method of assessing how well students are learning (Tus, 2020).

Furthermore, as reliable sources of relevant knowledge, libraries are critical for students' academic performance and achievement. The study's findings revealed a substantial and dramatic correlation between students' use of the library and their academic progress and achievement (Rodrigues & Mandrekar, 2020). Another study was conducted in a maritime school in Molo, Iloilo, which investigated the impact of library use on academic performance of 363 college students from the six courses offered by the university. Despite the lack of an obvious correlation between library

utilization and academic performance, students retained relatively satisfactory good grades but not that excellent. However, it was concluded that achieving excellence might be accomplished by increasing the library's involvement. To do this, the library's marketing plan should be developed, implemented, and supported by both administrative and academic resources (Gevero, 2010).

The academic performance of secondary students in this study was evaluated using the following levels of proficiency, which was reflected in their report cards after each quarter: Beginning (B), which denotes that students are having trouble understanding what is being taught; they have not yet acquired or developed the necessary prerequisite and fundamental knowledge and/or skills to support comprehension. Developing (D) refers to those students who are still developing their knowledge, abilities, and core understandings; still need help to complete the tasks that have been set for them. Approaching Proficiency (AP) are students who have mastered foundational knowledge, abilities, and basic understandings and can apply these understandings through practical performance tasks with little assistance from the teacher and/or peers. Proficiency (P), at this level, the students are capable of autonomously transferring essential information, abilities, and core understandings through real-world performance challenges. And the highest level is Advanced (A) where the students surpass the core requirements, which were measured in terms of knowledge, abilities, and comprehension, and can transmit them naturally, logically, and flexibly through performance assignments (DepEd, 2020). This was further discussed in details in the methodology of the study.

Information Literacy Competency and Academic Performance

Academic performance is the level to which a student met the set academic objectives. In the past, the GPA for a particular year or semester was used to assess most academic performance. The GPA of a student is affected by an array of factors.

One of them is literacy in information. The capacity to read and write generally is referred to as literacy. There are many different kinds of literacy, including media literacy, technical literacy, information literacy, and visual literacy. These days, the value of information literacy is rising quickly. Information literacy is the capacity to identify information needs, find information, assess it, and apply it effectively to address real-world issues. To be information literate, a person must be able to identify when information is needed and be able to find, assess, and apply that information efficiently (ALA, 1989; Banik & Kumar, 2019).

This study is one of the first to look into the relationships between information literacy (IL), student motivation, and academic success within the context of disciplinary learning. According to the findings, students who constantly engage in synthesizing knowledge and presenting their findings during an entire school year have a better readiness to acquire disciplinary content, which increases their likelihood of earning high grades in the class (Flierl et al., 2018).

In another study, Soleymani (2014) conducted an investigation of the existence of a direct relationship between IL and both formal and informal educational activities. This research was undertaken due to the limited prior exploration of this subject matter. Since there is a substantial positive correlation between IL competencies and students' academic achievement, Soleymani argues that IL competency is among the most important factors that play a pivotal role in achieving educational success. She continued by saying that until a student applies his information literacy abilities, he will never be able to finish his education and become a lifelong learner, they do need these skills. According to Goldstein (2020), IL is necessary for countering misinformation. Particularly amid a worldwide pandemic, digital and information literacy is essential for fostering digital literacy and elevating underprivileged voices in virtual platforms (Buchholz et al., 2020).

In Columbus, Ohio, a study was carried out using the Tool for Real-Time Assessment of Information Literacy (TRAILS) to monitor a group of students over time. The study found that the IL skills of Grade 10 improved significantly from when they were in Grade 7. Additionally, TRAILS was used to assess the IL competencies of students in Grades 5, 8, and 11, and the results showed a positive correlation between better IL skills and higher academic achievements (Bailey & Paul, 2012).

Students can improve their information literacy skills by receiving high-quality instruction and training in both academic and practical areas, becoming interested in problem-solving and applying information, becoming proficient with computers and the internet, and becoming proficient in acknowledging fair use of information. Students' academic performance may greatly increase with the development of IL competencies, which may also contribute to national growth (Banik & Kumar, 2019; Majid et al., 2020). If students are more aware of how information is used socially, politically, and culturally, they will be better equipped to comprehend how articles are made, how to evaluate arguments, and how to apply new knowledge to their scholarly work. In our modern, digitally driven, socially linked environment, these competencies are critical, particularly in this new normal that includes mobile learning, which involves utilizing mobile technology to improve interactions and collaboration between teachers and students (Compton et al., 2017).

According to Queroda and Quimson's (2018) research, students at a public university need to better grasp the economic, legal, and social challenges that surround the usage of information as well as how to access and use it ethically and legally. Information literacy is the foundation for lifetime learning, and fostering lifelong learners should be the core objective of all educational institutions, guaranteeing that individuals have the intellectual talents of reasoning and critical thinking. All students now require different and more sophisticated skills, such as problem-solving, teamwork, and the

ability to learn independently. Students who graduate from high school with no skills or plans for further education are effectively sentenced to a lifetime of subsistence wages and marginal employment. This raises the challenge of educating all students to higher standards and preparing them for a lifelong learning future (Moncada, 2005).

Synthesis

As noted in the literature reviewed, the definitions and concepts of information literacy and information literacy competency have evolved over the years. Research indicates, for varied reasons that shortfalls exist in the information literacy skills and desirable traits of students, especially amid an ensuing pandemic. However, the question arises: who should take the responsibility for this? As the saying goes, with great power comes great responsibility. Hence, we asked ourselves, who should be accountable? Governments, businesses, educational institutions, libraries, organizations, and individuals recognized the need to address this problem across diverse settings. Promoting information literacy has become a crucial objective in every country's education of its citizens.

Nevertheless, this study might help to eliminate these gaps by comparing differences and determining relationships between knowledge assessment and perceptions of information literacy competency and the desired mindset at various levels of achievement, particularly when academic performance is taken into account. Analyzing information literacy skills and desired mindsets, and relating them to the academic performance of students might reveal insights into the best method of instruction for this specific demographic.

Furthermore, a review of the literature demonstrating collaboration between school librarians and faculty served as an opportunity to address gaps in information literacy competency by providing library information literacy instructions especially with the use of gamifications. These collaborations and new approaches helped develop the

level of students' IL competency and desired mindset which can provide the chance to better prepare them, whether they are entering the job market right after high school or pursuing postsecondary education.

The primary goal of this study is to add to the knowledge base and uncovering best practices for developing skill levels by assessing knowledge and perceptions of information literacy competencies, and the desirable attitude especially among secondary students. Being information literate and having the desirable mindset would surely enable students to think critically about the information they encounter, allowing them to evaluate it independently and, as a result, empowering them to govern their educational development and positive attitude as lifelong learners.

As a result, this research would aid in better understanding how secondary students at this Christian Basic Education institution deal with the challenges and difficulties that would arise during this mode of learning innovation. This would allow them to assess their IL competencies and desired mindsets when looking for and using information sources, whether print or online, in assignments, tasks, and research projects. This would also help the librarian develop an enhanced library information literacy instruction to help students improve their information literacy skills through a series of activities carried out by the library in collaboration with the faculty. Most importantly, this study was conducted to demonstrate how students' IL competencies and desired mindset contribute to their academic success in terms of preparing them for college as well as future profession and career.

Chapter 3

Methodology

In this chapter, the methodology of the study is examined, encompassing the research philosophy, approach, and design. The profile of the respondents is also presented, along with a detailed exploration of the research instrument employed, including the methods used for data collection and the design of the questionnaire, including the measurement of constructs. The procedures implemented for data gathering are described, as well as the statistical treatment employed for each objective outlined in the study. Furthermore, the chapter delves into the ethical considerations that were pursued throughout the research process.

Research Design

A descriptive correlational quantitative research design was used in this study for it effectively and thoroughly establishes the features and attributes of a society, situation, or phenomenon (McCombes, 2019). Descriptive research strives to provide a brief overview of the present condition, whereas correlational research seeks to uncover connections among variables and predict future events using current knowledge. Descriptive research is an appropriate method because the researcher's goal in this study is to identify the characteristics of the variables and how they affect each other.

To demonstrate the relationship between an intervention and an outcome, the IL instruction was viewed as an intervention in which IL competencies and desired mindset were evaluated and tested for how well they achieved objectives as measured by a predetermined set of indicators. Since this study was intended to determine whether the chosen respondents' current level of IL competency and desired mindset significantly differ when categorized into such an identified set of indicators which were: having attended the information literacy instruction or not, as well as the mode of learning; the

face to face and the online which were deemed to be the independent variables for this particular study. Moreover, the study also sought to infer the significance of the association between the effectiveness of the student's information literacy competencies and their academic performance in terms of their GWA (general weighted average).

Respondents of the Study

The inclusion criteria were as follows: the respondents of the study consisted of secondary students of a private Christian basic education institution in Bacolod City; they should be from Grade 7 to Grade 10, referred to as the junior high school and Grade 11 to Grade 12 designated as the senior high school. Additionally, respondents must be currently enrolled in the school year 2022-2023, and who actively took part in the data gathering process.

The exclusion criteria for this study were outlined as follows: students enrolled in the elementary level of a private Christian basic education institution in Bacolod City for the school year 2022-2023 were not considered as respondents. Furthermore, individuals who demonstrated an inability or unwillingness to participate in the study, as well as those who were unavailable during the designated time of the data gathering, were also excluded from being respondents.

Since the study's goal, as stated in the research title, was to cover a specific population, the total enumeration method was used to assess the overall population's IL competencies.

In this particular scenario, conducting a total enumeration was feasible and appropriate since the overall population was manageable and can be covered effectively. However, it should be noted that despite this approach, there were respondents who declined to participate and who were unavailable during the designated time. Table 1 represents the distribution of respondents by grade level.

Table 1

Number of Respondents per Grade Level

Grade Level	Number of Students
Grade 7	70
Grade 8	75
Grade 9	70
Grade 10	76
Grade 11	60
Grade 12	40
Total	391

Note: Data was taken from the school registrar's record of enrollment for S.Y. 2022-2023.

Research Instrument

This study utilized the researcher-made survey questionnaire based on the i-Competency model, developed by members of NTU's Information Literacy Research Group in Singapore in 2015 (Majid et al., 2016). The questionnaire was the preferred research tool because it was commonly utilized for gathering data in an organized and convenient format. According to Syed (2016), data collection through a questionnaire is relatively cheap and economical because the researcher does not need to spend much time preparing.

The questions in each section were designed in such a way that the research objectives can be quantified. As patterned in the i-Competency model, the researcher-made survey questionnaire was composed of four parts. These were the following:

Part 1 focused on the respondent's demographic profile which included the name (optional), grade level, attendance to library information literacy instruction, and the library mode of information literacy instruction.

Part 2 was comprised of items on self-assessment of the current level of information literacy competencies which are divided into two sections. The first section

pertains to the 5 categories of IL activities with thirty statements and the second section contains the three desired mindsets necessary to accomplish IL activities. These were rated using a five-point Likert scale measurement of competence (5 – Expert (High level of competence), 4 – Advanced (Moderate level of competence), 3 – Proficient (Average level of competence), 2 – Advanced Beginner (Low level of competence), and 1 – Novice (Very low level of competence).

Part 3 was to identify the level of the academic performance of the respondents as measured by their final GWA (general weighted average), a grouped frequency distribution was used to further classify the GWA according to five categories associated with the school grading system with student grade ranking. The school adopted and implemented DepEd Order No. 021 s. 2019, which introduced five categories to represent the Levels of Proficiency for assessing and ranking learning outcomes (DepEd, 2020). The student's level of proficiency was established by aggregating the results of the student's performance on several levels of assessment. The numerical values derived from the DepEd's assessment and ranking of learning outcomes are shown in the table below:

Table 2

Interpretation of the Five Categories of School Grading System for GWA (General Weighted Average)

Level of Proficiency	Equivalent Numerical Value
B - Beginning	74% and Below
D - Developing	75 – 80%
AP - Approaching proficiency	81 – 86%
P - Proficient	87 – 92%
A - Advanced	93% (and above)

Note: DepEd's assessment and ranking of learning outcomes as per DepEd Order No. 021 s. 2019 (DepEd, 2020).

Aside from using a survey questionnaire to collect data (primary evidence), the study would also use secondary evidence to obtain the final GWA (general weighted average) of the intended respondents, which would be accessed through the school's database from the office of the school registrar upon its approval and if permitted by the respondents.

Validity of the Research Instrument

Three experts in the field of librarianship and research evaluated the survey questionnaire's face validity. For research instrument validation, the study used Oducado's (2020) thirteen criteria. The Content Validity Index/Score was calculated by a data analyst. The validity index based on experts' validation obtained a mean score of 4.7, and the validators signify that they strongly agree, indicating that the research questionnaire is valid. The suggestions, corrections, or recommendations of the validators were implemented to finalize the research questionnaire.

Reliability of the Research Instrument

Drost (2011) describes reliability as the extent to which measures are reproducible when different people measure the construct or skill on different occasions, under different settings, and seemingly with different tools.

The degree to which measures are reproducible when multiple people measure the concept or skill at different times, under different situations, and supposedly using different devices is also characterized as reliability (Carmines & Zeller, 1979; Edwin, 2019).

Reliability testing is required since it refers to the consistency of the measurement device. If the items on the scale hang together and measure the same construct, the scale is considered to have good internal consistency reliability (Huck, 2007). Furthermore, the reliability of the chosen research instrument was tested using the Cronbach Alpha coefficient method, which is the most often used internal reliability

measure.

When using the Likert scale, is regarded as the best measure of dependability. Internal consistency reliability refers to the consistency of the results, which ensures that the various items measuring the various constructs produce consistent scores (Brown, 2002, cited in Taber, 2018).

For a single coefficient alpha test, assuming Cronbach's alpha equals zero in the null hypothesis results in a sample size of less than 30 to obtain a minimum required effect size of 0.7. Therefore, a minimum of 30 respondents were asked to participate in the reliability test (Bonett, 2003). The reliability survey was administered to about 30 junior high school students of a neighboring public national high school, as respondents using simple random sampling and the result of the reliability testing indicated a Cronbach alpha coefficient of more than 0.7, which signifies an acceptable level of reliability as to the survey questionnaire. Each member of the selected demographic group has an equal probability of being chosen when a random sampling method is utilized (Olken & Rotem, 1995).

Data Gathering Procedures

In this study, data was gathered through total enumeration, in which all members of the entire population group were measured since the size of the population was manageable. The aim of this approach is to determine cause-and-effect connections between interventions and results. This study was limited to secondary school students from Grades 7 to 12 who were enrolled in a private Christian basic education institution in the school year 2022-2023. However, out of the 391 secondary students, only 362 actively participated in the survey. This could be due to the respondents having the freedom to choose whether or not to participate, or perhaps some individuals were simply unavailable or absent during the data collection period.

This study was focused on the IL competencies' potential to enhance students'

academic achievement and aimed to achieve this objective. A survey was conducted using a researcher-designed questionnaire that was structured according to the i-Competency model framework. The survey questionnaire covered essential IL competencies and also incorporated a fresh perspective on ethical information usage and collaborative data collection information seeking.

The researcher requested permission from the school principal in writing to conduct a study among high school students currently enrolled for the school year 2022-2023. The researcher also requested the teachers' permission and received their consent to carry out a survey in a face-to-face setting.

A specific time frame was allotted to collect data from students according to their grade level. This method was chosen because the respondents are minors, allowing the researcher to personally go through the Informed Consent Forms which were sent to their parents or guardians for approval. The researcher also read, explained, and clarified the Informed Assent, ensuring that students understood and signed these forms before proceeding with the study.

The confidentiality of the respondent's identity was strictly maintained. A unique number was assigned to the survey form they completed. The researcher took the time to explain each item in the survey to ensure that respondents understood the instrument's purpose and goals. It was explicitly communicated that respondents had the right to choose not to participate in the study if they so desired. The survey was estimated to require a minimum of five (5) minutes of their time. All data collected were treated as confidential and solely used for the purposes of the study, with no intention of utilizing it for any other purposes.

Moreover, the researcher submitted a formal letter to the school registrar, seeking permission to access the school's database and obtain the respondents' final general weighted average (GWA). The researcher assured the registrar that the GWA of

the respondents would be treated as strictly confidential and exclusively used for research purposes. The survey took place during the period from May 2023 to June 2023.

Ethical Considerations

The study adhered to the following ethical considerations that should be observed and followed when administering survey questionnaires to respondents:

Risk-benefit Assessment

The self-assessment component of the survey was the only area where respondents might experience minor discomfort or inconvenience, making the study a low-risk endeavor. Respondents might worry about being inaccurately assessed on their knowledge and skills, but the researcher alleviated their concerns by explaining how the study's outcomes could be advantageous. By obtaining insight into their information literacy competencies, they can improve their competencies and knowledge, resulting in enhanced academic performance.

Furthermore, the respondents were informed that the outcomes of the study would be advantageous to them as it would contribute to the development of interventions aimed at improving the information literacy instruction provided by the library. These interventions, in turn, would assist the respondents in enhancing their information literacy competencies.

Moreover, the respondents were informed about data privacy. That no information revealing the respondents' identities would be disclosed or published. The raw data was only accessible to the researcher, the research adviser, and the statistician. The information was tabulated, analyzed, and interpreted while maintaining confidentiality. The researcher ensured that communication with the respondents would be transparent and open.

The study would aid school administrators in assessing the curriculum and

formulating learning objectives that align information literacy with student success initiatives. This included coordinating educational inquiry, and engaging learners in that research process. To effectively teach information literacy to students, teachers, and librarians should update their skills through training and workshops if necessary.

Additionally, future researchers might use this study as a reference and may obtain a literature review from it by using it as a guide. They may even use the results of this investigation to develop a new study.

Parental Informed Consent and Child Assent

To protect the respondents' welfare, the Informed Consent Form was sent to the legally authorized representative. This form was required for participation since the respondents were under the age of 18 and it should be accomplished either by a parent or guardian. In addition to parental consent, the researcher also read and explained to the respondents the contents of the Informed Assent Form before they signed. These forms were written both in English and Hiligaynon.

Withdrawal Criteria

The participation of respondents was entirely voluntary, and they were free to leave at any time if they found the research process uncomfortable, without incurring any fees or losing any benefits to which they might otherwise be entitled, particularly concerning the study's outcome and potential applications. The respondent should notify the researcher that he or she desires to withdraw from the study and may or may not provide a rationale or reasons for doing so.

All accumulated expenses and resources spent in the study were directly covered and provided for by the researcher herself and with the help of the institution with which the researcher was affiliated. The institution supported the tuition fees of the researcher under certain conditions on the services rendered.

Voluntary Non-coercive Recruitment of Participants

Since the respondents were still considered minors, the researcher sent a letter of consent and assent stating their voluntary participation in the study to their parents and guardians. The respondents' involvement was fully optional, the study was offered in such a way that respondents had ample time and opportunity to freely decide whether or not they choose to participate. The respondents did not receive any kind of payment for their participation nor were promised compensation. To alleviate this concern, the researcher explained the study's objectives to the respondents and gave them adequate time to read the informed consent form before starting to answer the questionnaire.

The researcher also made sure that the survey questionnaire was written in simple and clear statements so that respondents can comprehend what the survey instrument was seeking to gather. As the researcher was accessible both personally and virtually, respondents were encouraged to ask questions regarding the study at any point while filling out the survey questionnaire.

Contribution of Results to Local Capacity

The research study has the potential to add to a wide range of knowledge about information literacy in this digital age when information is vast and sources are varied. The findings of the study would greatly contribute to the institution in general, and to the students in particular. The administrators would be able to evaluate learning curricula and the scope of lessons given to the students to ensure that quality instructions would be effective in promoting students learning and developing their information literacy competencies. The secondary students who were the respondents would be helped in assessing their current level of information literacy competencies and be assisted in developing these competencies which they need to become knowledge creators, and lifelong learners and be successful in the future.

The study would also be able to help librarians, particularly those working in school libraries, analyze and improve information literacy lessons so that they are efficient and advantageous for the growth of the information literacy skills of secondary students.

Benefits to Local Communities Building

This research study aimed to collect new information that would benefit not only the target respondents, but also students and school libraries. The study's findings would be used to evaluate, correct, and update traditional library instruction provided by librarians to meet the needs of current generations of learners. This updated library instruction system and practices should integrate information literacy competencies that today's students need to succeed in life. Furthermore, this would be a point of reference for future researchers to the established body of information on the subject being investigated.

Information literacy is the cornerstone of lifelong learning. It enables people from all areas of life to find, assess, use, and generate information to fulfill personal, social, professional, and educational objectives. It equips students with the knowledge and skills they need to become self-directed lifelong learners. Information literacy skills not only enrich a person's life but also provide benefits. Opportunities for people to learn skills that would enable them to support themselves and their families. Individuals with these competencies can participate in the labor force or fully participate in social and civic life, making them good citizens of the community and society as a whole.

Dissemination Plan

This study utilized the researcher-made survey questionnaire based on the i-Competency model, designed by members of NTU's Information Literacy Research Group in Singapore in 2015 (Majid et al., 2016). The researcher sent an email to the authors of the said model asking permission to use the model in the study.

In addition to utilizing a survey questionnaire as a primary data collection method, the study incorporated secondary evidence to acquire the final GWA (general weighted average) of the targeted respondents. This secondary data was obtained from the school's database, specifically accessed through the school registrar's office, following approval and permission granted by the respondents, as indicated in the survey they had completed.

The researcher carried out an in-person survey to collect data from students based on their respective grade levels. The researcher personally reviewed and provided explanations for the contents of the Informed Consent Forms, which were sent to parents/guardians to obtain their approval. Additionally, the researcher ensured that the Informed Assent was comprehended by the students, and had them sign these forms prior to the commencement of the study. The survey was designed to be completed in approximately five (5) minutes of their time.

Consequently, the respondents expressed their commitment to respond to the questionnaire with honesty and integrity, knowing that their personal information, including their names and general weighted average, would be treated with the utmost confidentiality. The researcher emphasized the importance of maintaining confidentiality and information integrity by including a disclaimer at the top of each questionnaire. This disclaimer made it clear that respondents had the right to decline answering any inquiry if they did not provide consent. If they chose to participate, they were encouraged to answer each question or statement in the survey questionnaire voluntarily and transparently.

Disclosure or Declaration of Potential Conflicts of Interest

The researcher acknowledged that potential conflicts of interest pertain to situations in which personal considerations, including financial factors, may compromise the conduct, assessment, or evaluation, and reporting of this research study.

The researcher confirmed that she has no personal conflicts of interest that could arise as a result of the conduct of this research undertaking.

Additionally, the researcher declared that she would report any potential or actual conflicts of interest that might arise during the study to the research ethics committee for immediate and appropriate action.

Finally, the researcher acknowledged that she would be responsible for any potential conflicts of interest that would be deliberately undisclosed.

Statistical Data Analysis & Interpretation

This study used a descriptive method. Descriptive because it provided a reasonably full picture of what was happening at any particular time. It also demonstrated the potential for the formulation of research questions. The following were the data collection procedure, statistical data analysis, and interpretation:

For the first objective, a frequency distribution table was used to determine the demographic profile of the respondents. The variables asked were grade level, attendance to information literacy instruction, and mode of information literacy instruction (face-to-face or online). This frequency distribution table would present number tallies and their corresponding percentages since the different groupings between the said variables to be measured were nominal or categorical in nature.

For the second objective, which pertained to measuring the current level of information literacy competencies of secondary students in terms of performance of information literacy activities when taken as a whole and categorized according to grade level, attendance to library information literacy instruction, and mode of library information literacy instruction.

For the third objective, which determined the current level of the desired mindsets of the respondents necessary to accomplish information literacy activities when taken as a whole and categorized according to grade level, attendance to library information

literacy instruction and mode of library information literacy instruction.

For both of the above objectives, the mean and standard deviation were used as the statistical tool since each Likert scale item was treated as a continuous variable to allow for the use of parametric statistical tests for the ensuing inferential objectives of the study. In this case, since the said Likert scale variables were treated as continuous, the weighted mean scores were utilized. Additionally, the standard deviation coefficient for each item was also presented to check for the degree of variations or spread.

The mean scale and interpretation shown in Table 3 below were used to analyze the findings of objectives two and three.

Table 3

Interpretation for Current Level of Information Literacy Competency and Desired Mindset Necessary to Accomplish Information Literacy Activities

Scale	Mean Range	Interpretation	Description
5	4.21-5.00	Expert	High Level of Competence
4	3.41-4.20	Advanced	Moderate Level of Competence
3	2.61-3.40	Proficient	Average Level of Competence
2	1.81-2.60	Advanced Beginner	Low Level of Competence
1	1.00-1.80	Novice	Very Low Level of Competence

For the fourth objective, which aimed to identify the level of the academic performance of the respondents as measured by their final general weighted average, a grouped frequency distribution was used to further classify the GWA (general weighted average) according to five categories associated by the school grading system with student grade ranking. These five categories are the following: A-Advanced (93- Above); P-Proficient (87-92); AP-Approaching proficiency (81-86); D-Developing (75-80); B-

Beginning (74-Below). Similarly, because the data being measured require some sort of ranking, it was measured as an ordinal variable.

The fifth objective sought to determine if there is a significant difference in the level of information literacy competencies of the respondents when they are categorized according to grade level, attendance to library information literacy instruction, mode of library information literacy instruction.

The sixth objective was to find out whether there was a significant difference in the respondents' level of desired mindsets necessary to accomplish information literacy activities when categorized according to grade level, attendance to library information literacy instruction and mode of library information literacy instruction.

The seventh objective was intended to discover if there was a significant difference in the respondents' level of academic performance when categorized according to grade level, attendance to library information literacy instruction and mode of library information literacy instruction.

For the fifth, sixth and seventh objectives, Independent Samples t-test (for grouping variables with only two categories) and One Way ANOVA (for grouping variables with more than two categories) were used to assess whether the differences between the means of the aforementioned variables were statistically significant or not.

The eighth objective aimed to identify the significance of the relationship between the level of students' information literacy competencies and their academic performance.

The ninth objective intended to determine the significance of the relationship between the level of desired mindsets and their academic performance.

To accomplish both of the aforementioned objectives, the eighth and ninth, Pearson's product-moment correlation analysis was used to determine the relationships between the variables. The magnitude of the Pearson Correlation Coefficient determined the strength of correlations. Should the coefficient value be $0.1 < |r| < .3$ it means that

the relationship is weak. If the value is $0.3 < |r| < .5$ it is said that the relationship is moderate, while $|r| > .5$ implies that there is a strong relationship between the two variables. The use of the Pearson Product Moment correlation approach showed that it was appropriate for the dataset, and the significance was being evaluated and interpreted by checking the effect size shown below.

Pearson Correlation Coefficient (*r*) Value	Strength	Direction
0.50 to 1.0	Strong	Positive
0.30 to 0.49	Moderate	Positive
0.10 to 0.29	Weak	Positive
0	None	None
-0.10 to -0.29	Weak	Negative
-0.30 to -0.50	Moderate	Negative
-0.50 to 1.0	Strong	Negative

Note: Retrieved from Pearson Correlation Coefficient (r) Guide & Examples by S. Turney, 2022, Copyright 2022 by Scribber.

Furthermore, if there is existing significant correlation between variables, the direction of the relationship was observed by looking at the Pearson correlation coefficient. A positive coefficient indicates a direct association (as one variable increases/decreases, the other likewise increases/decreases), whereas a negative coefficient indicates an inverse relationship (as one variable increases/decreases, the other decreases/ increases). The said coefficient was also the basis for measuring the strength of the relationship as shown in the above table.

For the tenth objective, the study formulated propositions to provide enhanced library information literacy instruction that was based on the observation, findings, and inferences established in the discussion of the results.

Consequently, this serves as the foundation for the recommendations that were made with the outcomes concurred.

Chapter 4

Results and Discussion

This chapter presents the findings of the study using the appropriate tables and figures, discusses the analysis of the said findings which is corroborated or contrasted by literature and other researches that have been published and validated as reliable, and presents the inferences of results from the given hypotheses of the study.

Demographic Profile of the Respondents

Table 4 offers an overview of the demographic characteristics of the respondents, including their grade level, attendance to IL instruction, and the mode of instruction they received. The data represented the entire population, as the study utilized a total enumeration method to ensure coverage of the specified group who self-assessed their IL competencies (see Table 1 in Chapter 3).

Self-assessment of IL skills is a popular way for determining students' assessments of their own abilities. To measure the accuracy of students' judgments, researchers usually compare these self-assessments to test-assessed skills (Michalak et al., 2017).

Out of the total 391 secondary students, only 362 actively participated in the survey. This could be because the respondents had the choice to decide whether or not to take part, or it's possible that some were unavailable or absent during the data collection period.

Regarding participation in IL instruction, almost all secondary students, approximately 99.4 percent, attended, with only two Grade 7 students (0.6 percent) being unable to do so, likely due to their absence during the scheduled IL conducted by the library.

The results revealed that the study's largest group of participants consisted of 72 Grade 10 students, accounting for 19.9 percent of the respondents, while the smallest

group was the 37 Grade 12 students, comprising 10.2 percent. It is noteworthy that Grade 10 students represented the highest number, and Grade 12 students represented the lowest among the entire secondary level population.

As to the mode of IL instruction attended by the students encompassed both face-to-face and online modes, with a combined percentage of 66.6 percent. The students who attended face-to-face only had a total of 100, the online mode only had 19 and there were 2 Grade 7 students who were not able to attend in whatever mode.

This implies that the majority of students were able to participate in a blended learning environment that combines in-person and online learning because during the pandemic year, IL teaching was delivered on both platforms to meet class schedules. However, there are some who only attended the online instructions since they live abroad or in other locations outside of the city or province.

According to Hess (2014), online IL instruction can impact learning as effectively as face-to-face instruction, as demonstrated by quasi-experimental research conducted on sociology undergraduate students at one of Michigan's institutions.

However, Sundari et al. (2022), in their study in Indonesia, compared online to traditional or face-to-face learning, and discovered that secondary education services provided during the COVID-19 outbreak were ineffective. Sundari stated that all school parties' involvement is critical to the success of blended learning during COVID-19.

Schools and libraries should adapt swiftly to meet the specific demands of their users in this new situation, despite certain problems and limited resources. Additionally, students' IL competencies improved after attending information literacy instruction, either online or face to face.

As a result, teachers and librarians should provide library IL instruction to help students build their IL competencies. As seen in Abrigo's (2018) study, that collaborative partnership is crucial in the development of an integrated IL program.

Table 4

Demographic Profile of the Respondents According to Variables

Variables	Category	f	%
Grade Level	Grade 7	62	17.1
	Grade 8	71	19.6
	Grade 9	67	18.5
	Grade 10	72	19.9
	Grade 11	53	14.6
	Grade 12	37	10.2
	Total	**362**	**100.0**
Attendance to Library Information Literacy Instruction	Yes	360	99.4
	No	2	0.6
	Total	**362**	**100.0**
Mode of Library Information Literacy Instruction	Face-to-face Mode	100	27.6
	Online Mode	19	5.2
	Both Face-to-face & Online	241	66.6
	None	2	0.6
	Total	**362**	**100.0**

Current Level of Respondents' Information Literacy Competency in Terms of Performance of Information Literacy Activities (Five Categories) When Taken as a Whole and When Categorized According to Variables

The findings in Tables 5a to 5d present the collected data pertaining to the respondents' IL competencies in terms of performing the five categories of IL activities. The data gathered were analyzed when taken as a whole and when categorized according to variables: grade level, attendance to library information literacy instruction and mode of library information literacy instruction.

Table 5a shows the current level of respondents' IL competencies when taken as a whole as the respondents perform the five categories of IL activities. The detailed

findings presented in this table thoroughly assess the respondents' IL competencies for each item under the five categories of IL activity. The results show that the first category, "Defining Tasks and Analyzing Information Gaps," has the highest level of IL competencies, with a total mean of 3.69±0.87, classified as "Advanced," while the third category, "Seeking and Evaluating Information from Selected Information Sources," has the lowest total mean of 3.52±0.96 but is still classified as "Advanced."

As to the IL competencies of the respondents when performing a specific IL activity, the statement "I know the purpose of the task and what should be accomplished" achieved the highest IL competency, scoring 3.80±0.87, indicating an "Advanced" level of proficiency. Interestingly, all IL tasks in the table were rated as "Advanced." The respondents are positively competent with their advanced knowledge when they perform tasks assigned to them, nevertheless, they still need to be supervised when it comes to understanding the problems presented in the tasks.

However, it is noteworthy that the statement "I understand the problems presented in the task" received the lowest score, with a mean of 3.61±0.87. This was supported by Moneva and Tribunalo (2020), who discovered that students demonstrated a positive attitude toward performance tasks when they had a clear understanding of the tasks and self-confidence in their abilities to complete them. Their literacy and digital competencies reinforced their confidence, contributing to the development of cognitive skills in younger generations.

For the second category of the IL activities, the data specifically focused on the respondents’ competencies in selecting appropriate information sources. Among the various competencies assessed, the statement "I know how to conduct an effective internet search in order to find exactly what I'm looking for" achieved the highest IL score, with a mean of 3.84±0.91, indicating an "Advanced" level of competency. The current level of IL competencies of the respondents when selecting information sources

has an overall mean of 3.53±0.92 and interpreted as “Advanced.” This means that most of the students are able to perform this task with no or less supervision. According to Aharony and Gazit (2019), students can get information regardless of their location or time by using personal computers or mobile devices. As stated by Lloyd (2019), the connection to information is built through knowledge platforms individuals use to construct their particular information landscapes.

However, it is sad to note that the statement "I am familiar with the library's resources and how they are organized using call numbers" received the lowest mean score of 3.18±1.03 under this category. This result only led to an interpretation of "Proficient.” This might be that students have the average competency and knowledge about the library because they have less chance to visit due to the pandemic.

It was discovered also in the study of Hariyati et al. (2021) that students' familiarity with literature material was limited due to the constraints posed by the two-year pandemic, as they lacked sufficient time to visit the library. Instead, they relied on links or web references, often opting for Google as a familiar source. Librarians are concerned that students see Google as more than just a competitor to libraries, but as a complete replacement for them. Librarians noted that while Google provides user-friendly features that students love and easy to access, this comfort might compromise fundamental library principles, such as ensuring information quality and privacy protection (Georgas, 2013).

For the total mean for each category of IL activities, the first and second are 3.69±0.87 and 3.53±0.92 which are all interpreted as Advanced. This implies that respondents are competent in their information literacy when it comes to defining information tasks and analyzing information gaps as well as in selecting information sources.

Table 5a

Current Level of Respondents' Information Literacy Competency in Terms of Performance of Information Literacy Activities When Taken as a Whole

Respondents' Information Literacy Competencies in Terms of Performance of Information Literacy Activities (1 to 2 of Five Categories)			
1. Defining Information Tasks and Analyzing Information Gaps	*Mean*	*Std. Dev*	*Interpretation[a]*
I know the purpose of the task and what should be accomplished	3.80	0.87	Advanced
I can recognize the main ideas or concepts of the given task	3.69	0.86	Advanced
I can identify the details needed to respond and finish the task	3.65	0.87	Advanced
I understand the problems presented in the task	3.61	0.87	Advanced
TOTAL MEAN	3.69	0.87	Advanced
2. Selecting Information Sources	*Mean*	*Std. Dev*	*Interpretation[a]*
I know how to conduct an effective internet search in order to find exactly what I'm looking for	3.84	0.91	Advanced
I know when to consult a dictionary, encyclopedia, or any other references	3.72	0.98	Advanced
I understand where to look for the information required for the task	3.70	0.89	Advanced
I can determine which sources will provide answers to the problems	3.61	0.89	Advanced
I am able to make sense of both primary and secondary sources of knowledge	3.37	0.93	Proficient
I know how to conduct an effective internet search in order to find exactly what I'm looking for	3.84	0.91	Advanced
I can understand the primary and secondary sources of information	3.26	0.83	Proficient
I am familiar with the library's resources and how they are organized using call numbers	3.18	1.03	Proficient
TOTAL MEAN	3.53	0.92	Advanced

[a]Legend: 1.00-1.80 N(Novice); 1.81-2.60 B(Beginner); 2.61-3.40 P(Proficient); 3.41-4.20 A(Advanced); 4.21-5.00 E(Expert)

The findings for the third through fifth categories are shown in Table 5a and thoroughly discussed in detail to clearly discuss respondents' IL competencies for each item under a specific category of IL activity. For the third category of IL activities which is the Seeking and Evaluating Information from the Selected Information Sources, it highlights the statement "I can identify if the information and its source is current

relevant, and appropriate to my task" and has the highest IL competency, scoring 3.81±0.90. The result shows that most of the students display an advanced knowledge and ability to identify the currency, relevance and appropriate information for their assigned tasks. This could be the outcome of years of instruction in every library IL instruction, where students were introduced to numerous criteria such as CARP and 5Ws to appropriately and critically analyze the sources of information they seek and use, particularly those obtained online. As teachers and librarians recognize the necessity of being competent in 21st-century abilities, several studies, like Bury (2016), suggest that students must be able to approach, critically analyze, and use relevant and credible information. This is critical for navigating today's broad and diversified information environment.

In the fourth category which pertains to synthesizing and using information, the “I can distinguish between fact, view or opinion” demonstrates a 3.95±0.87 and interpreted as “Advanced” level of proficiency. This infers that most of the students have higher-level reading comprehension where they can detect bias in an information.

They can distinguish between what is factual and what is based on opinion, and they are aware of the concept of misleading information, with around half of them able to provide a comprehensive description of fake news. Furthermore, this implies that in this area, they can work well with less or no supervision. Farmer (2019) supports students' capacity to distinguish between fact, view, and opinion in his study on news literacy and fake news, which included school librarians from California State University. According to the librarians, recognizing advertisements on news websites was the easiest challenge for both middle and high school pupils.

Following a recent study conducted by BOSES Pilipinas (Boses, Opinyon, Siyasat, at Siyensa para sa Pilipinas), an opinion and survey research unit established in the country participated by 25 partner colleges and universities, only 52.5% among

20,000 Filipino students were able to answer six to eight questions correctly, achieving an average score of 6.9 out of 10 in a fabricated news assessment. This underscores the possibility that the young people in the Philippines are fascinated in an environment, potentially a culture, disseminating fabricated news.

Moreover, students' self-confidence in identifying fake news and their actual performance in the quiz does not align as this confidence doesn't necessarily translate to correct fake news identification. BOSES Pilipinas concluded that students nowadays still need more awareness about fake news (Majority of Filipino Youth Respondents Have “Average Skills” in Identifying Fake News: Analysis and Opinion, 2021).

In the last category, the respondents demonstrated a very high IL competency in the activity “I understand what is plagiarism” within the Appraising the Information Process and End Product. The mean score was 4.33±1.05 and interpreted as “Expert.” Notably, among all IL activities in the five categories, understanding plagiarism appeared as the area where respondents showcase their highest IL competencies. The results suggest that students possess outstanding IL competencies, surpassing expectations in their knowledge and understanding of plagiarism.

A study reveals that students in different grade levels have varying levels of awareness and perspectives on the concept of "plagiarism." This finding is consistent with the previous study involving 433 junior secondary school students in Hong Kong, which found differences in self-perceived understanding of plagiarism across distinct grade levels (Chu et al., 2020). However, in one study, 44 senior high school students from a Pangasinan institution took part, and an experimental approach was used to assess respondents' awareness and attitude regarding plagiarism. The study discovered that students who were unaware of plagiarism testing had an average similarity index of 62.80 percent, whereas those who were aware of plagiarism testing only had a similarity index of 16.95 percent, suggesting a 45.84 percent significant difference (Orlanda-

Ventayen, 2018). Furthermore, another study found a link between students' academic performance in inquiry-based learning and their perceived and actual understanding of plagiarism (Chu et al., 2020).

It was further observed that the “I am familiar with the evaluation criteria used to assess the quality of print and online information sources” got the lowest mean of 3.04±1.13 but still interpreted as “Proficient.” Although this IL activity got the lowest mean, but still result showed that the students display a proficient knowledge and ability to identify the currency, relevance and appropriate information which are the criteria used to assess the quality and relevance of information.

This could be the outcome of years of library IL instruction, where students were introduced to numerous criteria such as CARP and 5Ws to appropriately and critically analyze the sources of information they seek and use, particularly those obtained online. As teachers and librarians recognize the necessity of being competent in 21st-century abilities, several studies, like Bury (2016), suggest that students must be able to approach, critically analyze, and use relevant and credible information. This is critical for navigating today's broad and diversified information environment.

The overall mean for the IL competencies of the respondents when performing IL activities was 3.57±0.65 and interpreted as “Advanced.” This implies that students are positively competent, has advanced knowledge and are able to perform assigned task with no or less supervision. They are also knowledgeable in finding and using information. Nowadays, young people are increasingly relying on the internet for information for they find it easy and fast which also coincides with the findings of Amusan and Lawal's study in 2020, which emphasized the need of providing secondary students with complete IL competencies. According to them, these skills play a vital role in enabling students to properly assess and evaluate information from various sources, allowing them to use it for beneficial purposes (McGrew et al., 2019).

Table 5a*

Respondents' Information Literacy Competencies in Terms of Performance of Information Literacy Activities (3 to 5 of Five Categories)

3. Seeking and Evaluating Information from the Selected Information Sources	*Mean*	*Std. Dev*	*Interpretation[a]*
I can identify if the information and its source is current, relevant, and appropriate to my task	3.81	0.90	Advanced
I understand how to determine whether the information gathered is relevant and capable of answering the task at hand	3.69	0.86	Advanced
I am able to narrow search results	3.62	0.95	Advanced
I am able to expand my search parameters or limitations	3.56	0.93	Advanced
I can determine the source's motive for providing information, such as whether they present biased information	3.49	0.96	Advanced
I can tell if the information comes from an expert, and well-respected author, creator, and publisher	3.47	1.03	Advanced
I can evaluate the validity of the sources by looking at the URL and domain names	3.43	1.04	Advanced
I am able to evaluate information content either print or online resources using evaluation criteria tools	3.38	0.94	Proficient
I know the techniques of searching online information such as phrase searching, use of truncations & wildcards & Boolean operators	3.19	1.00	Proficient
TOTAL MEAN	3.52	0.96	Advanced
4. Synthesizing and Using Information	*Mean*	*Std. Dev*	*Interpretation[a]*
I can distinguish between fact, view or opinion	3.95	0.87	Advanced
I can recognize the main ideas and connect them to subordinate ideas	3.72	0.93	Advanced
I can draw information from sources and create new ideas	3.67	0.96	Advanced
I can contrast concepts with different ideas	3.54	0.87	Advanced
I know how to synthesize the information gathered by putting together all the ideas and findings	3.45	0.86	Advanced
TOTAL MEAN	3.67	0.90	Advanced
5. Appraising the Information Process and end product	*Mean*	*Std. Dev*	*Interpretation[a]*
I understand what is plagiarism	4.33	1.05	Expert
I have knowledge about legal restriction in gathering, using and sharing information such as copyright law, data privacy act and others	3.81	1.00	Advanced
I can understand research notes according to the format given in the task	3.77	0.95	Advanced
I understand the basic rules of the APA 7th edition in-text	3.13	1.18	Proficient
I understand the basic rules of the APA 7th Edition referencing	3.12	1.18	Proficient
I am familiar with the evaluation criteria used to assess the quality of print and online information sources	3.04	1.13	Proficient
TOTAL MEAN	3.53	1.08	Advanced
OVERALL MEAN	3.57	0.65	Advanced

[a]Legend: 1.00-1.80 N(Novice); 1.81-2.60 B(Beginner); 2.61-3.40 P(Proficient); 3.41-4.20 A(Advanced); 4.21-5.00 E(Expert)

[*]Table 5a is the continuation of the Table 5a, to show the complete five categories of IL Activities*

Current Level of Respondents' Information Literacy Competency When Categorized According to Grade Level

For Table 5b which shows the current level of IL competencies when categorized according to grade level, it can be noted that Grade 12 has the highest overall mean of 4.11 and interpreted as "Advanced" and the lowest overall mean of 3.22 belongs to Grade 7 which is interpreted as "Proficient." This indicates that the higher the grade level of the responders, the higher their IL competencies also.

It can be noted also that when taken as a whole, the overall mean of the respondents is 3.57 and interpreted as "Advanced." The IL activities on Defining Information Tasks and Analyzing Information Gaps scores the highest mean of 3.69 and interpreted as "Advanced."

Looking at the findings, these suggest that the respondents' IL competencies served as a measure of their information literacy levels as they progress through their studies. Respondents' IL competencies appear to improve as they advance through the grade levels, and beginning to master fundamental and foundational knowledge to support comprehension and transmit them naturally, logically, and flexibly through performance assignments in order to prepare them to face real-world performance challenges (DepEd, 2020).

According to the Department of Education (DepEd), students are expected to demonstrate learning competencies such as awareness, comprehension, capacities, and perceptions in every learning experience (Gonzales, 2020). These information literacy (IL) competencies, which develop as students' progress through the grade levels, are essential for 21st-century learners. This is especially important because students can now easily access information from any location and at any time using their personal laptops or mobile devices. As a result, information literacy is an essential skill for success in the twenty-first century (Aharony & Gazit, 2019).

Table 5b

Current Level of Respondents' Information Literacy Competency When Categorized According to Grade Level

Information Literacy Competencies	Grade Level													
	7		8		9		10		11		12		As a Whole	
	M	I[a]	M	I[a]	M	I[a]	M	I[a]	M	I[a]		I[a]	M	I[a]
Defining Information Tasks and Analyzing Information Gaps	3.38	P	3.33	P	3.73	A	3.69	A	4.11	A	4.20	A	3.69	A
Selecting Information Sources	3.19	P	3.27	P	3.53	A	3.54	A	3.89	A	4.00	A	3.52	A
Seeking and Evaluating Information from the Selected Information Sources	3.18	P	3.20	P	3.56	A	3.60	A	3.78	A	4.08	A	3.52	A
Synthesizing and Using Information	3.42	A	3.51	A	3.64	A	3.65	A	3.92	A	4.10	A	3.67	A
Appraising the Information Process and end product	3.04	P	3.03	P	3.57	A	3.72	A	3.97	A	4.25	E	3.53	A
Overall Mean	3.22	P	3.25	P	3.59	A	3.63	A	3.90	A	4.11	A	3.57	A

[a]*Legend: 1.00-1.80 N(Novice); 1.81-2.60 B(Beginner); 2.61-3.40 P(Proficient); 3.41-4.20 A(Advanced); 4.21-5.00 E(Expert)*

Current Level of Respondents' Information Literacy Competency When Categorized According to Attendance to Library Information Literacy Instruction

Table 5c shows that the results on the data gathered when the level of IL competency of the respondents is categorized according to "Attendance to Library Information Literacy Instruction" has an overall mean of 3.57 and interpreted as Advanced. Out of the total 391 population of secondary students, only 362 actively participated in the survey and findings revealed that 360 students have attended library IL instruction with a percentage of 99.4, and only two, or 0.6% not able to attend the

library IL instruction (see Tables 1 and 4).

Regarding participation in IL instruction, almost all secondary students, approximately 99.4 percent, attended, with only two Grade 7 students (0.6 percent) being unable to do so, likely due to their absence during the scheduled IL conducted by the library.

The results revealed that the study's largest group of participants consisted of 72 Grade 10 students, accounting for 19.9 percent of the respondents, while the smallest group was the 37 Grade 12 students, comprising 10.2 percent. It is noteworthy that Grade 10 students represented the highest number, and Grade 12 students represented the lowest among the entire secondary level population.

For IL competencies of respondents according to their grade level when performing IL activities, findings revealed that the overall mean for “Defining Information Tasks and Analyzing Information Gaps along with the “Appraising the Information Process and End Product” have both the highest mean of 3.75 and interpreted as Advanced.

For the overall mean of the current level of IL competencies when categorized according to those respondents who attended library information literacy (IL) instruction and participated in IL activities consistently indicated an "Advanced" level of IL competencies in all the IL activities the respondents have performed.

The findings also indicate that students who did not attend library IL instruction have slightly higher mean IL competencies compared to those who attended. However, it’s important to emphasize that the study spanned only one school year. Considering that library IL instruction has been ongoing for more than a decade, it can be inferred and acknowledged that the prior years' instruction and training have likely impacted and cultivated students' information literacy competencies.

Table 5c

Current Level of Respondents' Information Literacy Competency When Categorized According to Attendance to Library Information Literacy Instruction

Information Literacy Competencies	Attendance To Library Information Literacy Instruction					
	Yes		No		As A Whole	
	Mean	Interpretation[a]	Mean	Interpretation[a]	Mean	Interpretation[a]
Defining Information Tasks and Analyzing Information Gaps	3.69	Advanced	3.75	Advanced	3.69	Advanced
Selecting Information Sources	3.52	Advanced	3.71	Advanced	3.52	Advanced
Seeking and Evaluating Information from the Selected Information Sources	3.52	Advanced	3.45	Advanced	3.52	Advanced
Synthesizing and Using Information	3.67	Advanced	3.70	Advanced	3.67	Advanced
Appraising the Information Process and end product	3.53	Advanced	3.75	Advanced	3.53	Advanced
Overall Mean	3.57	Advanced	3.65	Advanced	3.57	Advanced

[a]*Legend: 1.00-1.80 N(Novice); 1.81-2.60 B(Beginner); 2.61-3.40 P(Proficient); 3.41-4.20 A(Advanced); 4.21-5.00 E(Expert)*

During library IL instruction, one of the topics the students learn is about the Big 6 Information Literacy Model which taught them to solve information-related problems, such as task definition, information seeking strategies and data synthesizing and evaluating (Eisenberg & Berkowitz, 2000; Eisenberg et al., 2010).

Students who participated in library IL instruction and received literacy training outperformed their peers in academic performance, used more trustworthy sources of information, and supported their arguments and perspectives with relevant literature,

according to Squibb and Mikkelsen (2017).

Current Level of Respondents' Information Literacy Competency When Categorized According to Mode of Library Information Literacy Instruction

Table 5d, explains the respondents' IL competencies when categorized according to mode of library information literacy instruction. Face-to-face mode has an overall mean of 3.32, online has 3.43 and are interpreted as "Advanced" but participation in both face-to-face and online platforms for information literacy instruction has resulted in a higher level of competency among the respondents who attended which has an overall mean of 3.68 and interpreted as "Advanced." This might be due to library IL instructions were given in blended mode especially during this pandemic.

Results imply that the attendance and method of information literacy instruction have led to a higher level of competency for those who have participated in both face-to-face and online platforms especially when they perform IL activity of Defining Information Tasks and Analyzing Information Gaps which yield a highest mean of 3.69 and interpreted as Advanced.

Blake et al. (2017) stressed in their study that IL instruction, especially conducted by libraries and expert librarians, as noted in Obille's research in 2013, significantly enhances students' learning experiences. This, in turn, has a significant impact on the academic performance and retention rates at various educational institutions. Furthermore, according to Alvarez (2020), some students struggle to adjust to new learning techniques, while the blended learning strategy in the Philippines has obstacles and roadblocks that impede the effective and efficient delivery of educational content. Educators and librarians, on the other hand, are creative in finding ways to motivate and encourage students to continue receiving the high-quality education they deserve. As a result, library information literacy instruction is provided, whether in person or online, to enhance students' learning experiences.

Table 5d

Current Level of Respondents' Information Literacy Competency When Categorized According to Mode of Library Information Literacy Instruction

Information Literacy Competencies	Mode of Library Information Literacy Instruction									
	Face-to-Face		Online		Both		None		As a Whole	
	M	I[a]	M	I[a]	M	I[a]	M	I[a]	M	I[a]
Defining Information Tasks and Analyzing Information Gaps	3.50	A	3.37	P	3.79	A	3.75	A	3.69	A
Selecting Information Sources	3.28	P	3.40	P	3.63	A	3.71	A	3.52	A
Seeking and Evaluating Information from the Selected Information Sources	3.28	P	3.39	P	3.63	A	3.45	A	3.52	A
Synthesizing and Using Information	3.47	A	3.61	A	3.75	A	3.70	A	3.67	A
Appraising the Information Process and end product	3.22	P	3.42	A	3.67	A	3.75	A	3.53	A
Overall Mean	3.32	P	3.43	A	3.68	A	3.65	A	3.57	A

[a]*Legend: 1.00-1.80 N(Novice); 1.81-2.60 B(Beginner); 2.61-3.40 P(Proficient); 3.41-4.20 A(Advanced); 4.21-5.00 E(Expert)*

Current Level of Respondents' Desired Mindset Necessary to Accomplish Information Literacy Activities When Taken as a Whole

Table 6a showed findings and presented an overview of the current level of desired mindsets of the respondents, which are essential for carrying out information literacy activities. Positive attitude to finish and information tasks as well as social responsibility for ethical information-seeking and utilization have both a mean of 3.72±0.92 and interpreted as "Advanced." Overall, the mean score for Desired Mindsets is 3.70±0.92, also reflecting an "Advanced" interpretation.

Table 6a

Current Level of Respondents' Desired Mindset Necessary to Accomplish Information Literacy Activities When Taken as a Whole

Desired Mindsets Necessary to Accomplish Information Literacy Activities	Mean	Std. Dev.	Interpretation[a]
Positive Attitude to Finish an Information Task	3.72	0.92	Advanced
Social Responsibility for Ethical Information-seeking and Utilization	3.72	0.94	Advanced
Responsible Collaboration for Collective Information-seeking and Use	3.66	0.90	Advanced
Overall Mean	3.70	0.92	Advanced

[a]Legend: 1.00-1.80 N(Novice); 1.81-2.60 B(Beginner); 2.61-3.40 P(Proficient); 3.41-4.20 A(Advanced); 4.21-5.00 E(Expert)

This implies that students displayed a favorable attitude and a positive mentality toward performance assignments when they had a clear comprehension of the tasks and confidence in their ability to fulfill them.

This confidence was reinforced by the students' competency in information literacy, which in turn contributed to the improvement of their cognitive skills (Moneva & Tribunalo, 2020). According to Bell (2016), students exhibit desirable mindsets to learn when they perceive both the necessity and capability to acquire and master new skills. Thus, librarians should apply practical and specific principles that can let students engage in activities aimed at encouraging them to be competent in reading and information-seeking (Crow & Henning, 2020).

A study was conducted in Colegio San Agustin-Bacolod (CSA-B) among college students which was to determine if there is a significant difference in the attitude of the students when they use the library and their information literacy competency of in terms of age, gender, year level and user groups. The study discovered a substantial

relationship between students' library-seeking behavior and their information literacy competencies. The findings revealed that when students' library-seeking behavior improved, so did their information literacy competencies as well (Pansinsoy, 2011).

Current Level of Respondents' Desired Mindset Necessary to Accomplish Information Literacy Activities When Categorized According to Grade Level

Table 6b, showed that the overall mean score for respondents' Desired Mindsets to accomplish IL activities when categorized according to grade level is 3.70±0.92, also reflecting an "Advanced" interpretation.

Findings imply that as respondents' progress to higher grade levels, their desired mindsets also appear to rise accordingly. This entails that the desired mindsets observed in the respondents act as indicators of their information literacy levels as they advance in their educational journey. Furthermore, desired mindsets are cultivated and improved through the acquisition of knowledge and skills, as well as the development of values, attitudes, and learning habits, as teachers and librarians collaboratively teach them to be successful in their academic performance.

The degree to which students observe the possibility of enhancing their intellectual abilities has an important effect on their thoughts, behaviors, and, ultimately, their academic achievements. Knowing how to enhance student learning outcomes requires understanding the development of their attitude.

As a result, their findings indicate that mindset and academic accomplishment have a mutually reinforcing relationship (Limeri et al., 2020).

Thus, IL competency and desired mindset refers to the development of fundamental skills and the cultivation of attitudes as individuals gain a comprehensive understanding of the importance, methods, and utility of information, particularly in the context of using information technology for activities such as data collection, analysis, evaluation, organization, and synthesis to facilitate problem-solving (Wen & Shih, 2008).

Table 6b

Current Level of Respondents' Desired Mindset Necessary to Accomplish Information Literacy Activities When Categorized According to Grade Level

Desired Mindsets	Grade Level													
	7		8		9		10		11		12		As a Whole	
	M	a	M	a	M	a	M	a	M	a	M	a	M	a
a. Positive Attitude to Finish and Information Task	3.52	A	3.35	P	3.61	A	3.82	A	4.06	A	4.24	E	3.72	A
b. Responsible Collaboration for Collective Information-seeking and Use	3.47	A	3.21	P	3.69	A	3.82	A	3.89	A	4.16	A	3.66	A
c. Social Responsibility for Ethical Information-seeking and Utilization	3.40	P	3.27	P	3.70	A	3.90	A	4.11	A	4.27	E	3.72	A
Overall Mean	3.46	A	3.28	P	3.67	A	3.85	A	4.02	A	4.23	E	3.70	A

[a]*Legend: 1.00-1.80 N(Novice); 1.81-2.60 B(Beginner); 2.61-3.40 P(Proficient); 3.41-4.20 A(Advanced); 4.21-5.00 E(Expert)*

Current Level of Respondents' Desired Mindset Necessary to Accomplish Information Literacy Activities When Categorized According to Attendance to Library Information Literacy Instruction

Table 6c, showed that the overall mean score for respondents' Desired Mindsets to accomplish IL activities when they have attended library IL instruction is 3.70 and interpreted as "Advanced" and for those who haven't has a mean of 3.50 and interpreted as "Advanced" also. When taken as a whole, the overall mean is 3.70 with an interpretation of "Advanced" as well. In today's fast changing information environment, ideal mindsets are desirable attitudes among individuals who are information-literate. Thus, library IL instructions conducted led to improve students' mental perspectives which contributed to the enhancement of cognitive abilities among young people

(Moneva & Tribunalo, 2020). A study explains the importance of attending library IL instruction, which not only provides support but also incorporates mindset interventions (Claro, Paunesku, & Dweck, 2016). Furthermore, PAMIL discovered that librarians play an active part in the development of the MIL curriculum at a certain school. Their participation ensures that the MIL program incorporates library research, with librarian help provided through the library instruction sessions they delivered (Tuazon et al., 2020).

Table 6c

Current Level of Respondents' Desired Mindset Necessary to Accomplish Information Literacy Activities When Categorized According to Attendance to Library Information Literacy Instruction

Desired Mindsets	Attendance To Library Information Literacy Instruction					
	Yes		No		As A Whole	
	Mean	Interpretation[a]	Mean	Interpretation[a]	Mean	Interpretation[a]
Positive Attitude to Finish and Information Task	3.72	Advanced	3.50	Advanced	3.72	Advanced
Responsible Collaboration for Collective Information-seeking and Use	3.66	Advanced	3.50	Advanced	3.66	Advanced
Social Responsibility for Ethical Information-seeking and Utilization	3.73	Advanced	3.50	Advanced	3.72	Advanced
Overall Mean	3.70	Advanced	3.50	Advanced	3.70	Advanced

[a]Legend: 1.00-1.80 N(Novice); 1.81-2.60 B(Beginner); 2.61-3.40 P(Proficient); 3.41-4.20 A(Advanced); 4.21-5.00 E(Expert)

Current Level of Respondents' Desired Mindset Necessary to Accomplish Information Literacy Activities When Categorized According to Mode of Library Information Literacy Instruction

As to the mode of IL instruction attended by the students encompassed both face-to-face and online modes, with a combined percentage of 66.6 percent. Table 6d, showed the current level of the Desired Mindsets when categorized according to the mode of library IL instruction.

Table 6d

Current Level of Respondents' Desired Mindset Necessary to Accomplish Information Literacy Activities When Categorized According to Mode of Library Information Literacy Instruction

Desired Mindsets	Mode of Library Information Literacy Instruction									
	Face-to-Face		Online		Both		None		As a Whole	
	M	I[a]	M	I[a]	M	I[a]	M	I[a]	M	I[a]
Positive Attitude to Finish and Information Task	3.51	A	3.47	A	3.82	A	3.50	A	3.72	A
Responsible Collaboration for Collective Information-seeking and Use	3.50	A	3.58	A	3.73	A	3.50	A	3.66	A
Social Responsibility for Ethical Information-seeking and Utilization	3.46	A	3.84	A	3.83	A	3.50	A	3.72	A
Overall Mean	3.49	A	3.63	A	3.79	A	3.50	A	3.70	A

[a]*Legend: 1.00-1.80 N(Novice); 1.81-2.60 B(Beginner); 2.61-3.40 P(Proficient); 3.41-4.20 A(Advanced); 4.21-5.00 E(Expert)*

The students who attended face-to-face only had an overall mean of 3.49, the online mode only had 3.63 and for both had the highest which is 3.79, and all were interpreted as "Advanced". But as a whole, the overall mean is 3.70 and interpreted as "Advanced" as well.

This implies that respondents' desired mindsets are nurtured and enhanced through the acquisition of knowledge and abilities, as well as the cultivation of values, attitudes, and effective learning habits. This development occurs as teachers and librarians collaborate to prepare students for academic achievement.

Current Level of Respondents' Academic Performance in Terms of their Final GWA (General Weighted Average)

To answer objective 4, table 7 represents the level of academic performance in terms of respondents' final GWA (general weighted average). Notably, the results revealed that majority of the students, demonstrate proficiency falling within the ranges of 87-92 (Proficient) and 81-86 (Approaching Proficiency).

The overall General Weighted Average is calculated at 87.99±4.29, which corresponds to the interpretation of "Proficient." This demonstrates that the respondents' academic accomplishment, as evaluated by their GWA, reflects a higher level of performance, and serves as a predictor of their abilities and growth as they develop their IL competencies.

The results demonstrate that this set of students has outstanding IL competency, routinely scoring considerably above the average. According to a study conducted by Mushtaq and Khan (2012), numerous factors influence students' academic achievement. While these characteristics are important in predicting academic achievement, their impact varies between individuals and geographical places.

As a result, academic performance relates to how well students attain their educational goals. Prior research has frequently used the GPA earned during a certain school year to assess academic success. Nevertheless, a student's GPA is influenced by numerous elements, with the importance of IL competencies being particularly noteworthy, as highlighted in this research (Ali et al., 2013).

Table 7

Current Level of Respondents' Academic Performance in Terms of their Final GWA (General Weighted Average)

Variable	Category	f	%	Mean	Std. Dev.	Interpretation[a]
Final GWA (General Weighted Average)	93-above (Advanced)	65	18.0	87.99	4.29	Proficient
	87-92 (Proficient)	148	40.9			
	81-86 (Approaching Proficiency)	135	37.3			
	80-below (Developing)	14	3.9			
	Total	362	100.0			

[a]Legend: 1.00-1.80 N(Novice); 1.81-2.60 B(Beginner); 2.61-3.40 P(Proficient); 3.41-4.20 A(Advanced); 4.21-5.00 E(Expert)

Significant Difference in the Respondents' Level of Information Literacy Competency When Categorized According to Grade Level

The result of the data gathered in determining the significant difference between the respondents' level of IL competencies when they are categorized according to grade level, attendance to information literacy instruction, mode of information literacy instruction, and academic performance to answer the objective number 4, is hereby presented in Tables 8a, 8b, 8c, respectively.

Looking at Table 8a, the IL competencies were found to be significantly different when it comes to grade level, $f(5, 356) = 20.094$, $p = 0.001$. This would mean that different grade levels have varying level of information literacy competencies: Grade 7 (3.22±0.60); Grade 8 (3.25±0.53); Grade 9 (3.59±0.53); Grade 10 (3.63±0.68); Grade 11 (3.90±0.53); and lastly, the Grade 12 (4.11±0.57), yielding a p-value which is significant at the 0.05 level (alpha). This would imply that as the grade level goes up, the level of their IL competencies also goes up which actually supports the goal of the researcher in giving the library IL instruction to the respondents.

Table 8a

Significant Difference in the Respondents' Level of Information Literacy Competency When Categorized According to Grade Level

Grade Level	N	Mean	Std. Dev.	F	p-value*	Interpretation / Decision[a]
Grade 12	37	4.11	.572	20.094	0.001	Significant / Reject Ho
Grade 11	53	3.90	.526			
Grade 10	72	3.63	.681			
Grade 9	67	3.59	.526			
Grade 8	71	3.25	.534			
Grade 7	62	3.22	.596			

**Significant at the 0.05 level (alpha)*

[a]Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

Significant Difference in the Respondents' Level of Information Literacy Competency When Categorized According to Attendance to Library Information Literacy Instruction

Table 8b, shows the results on the data gathered when the level of IL literacy of students is grouped in terms of the "Attendance to Information Literacy Instruction".

The resulting p-value suggests that there is no significant difference in the IL competencies of the respondents when they are categorized according to those who attended and those who did not, $t(360) = -0.171$, $p = 0.86$.

As a result, the hypothesis is upheld and not rejected. This might be because 360 participants have participated and only two students not able to attend the IL instruction.

Students who participated in library IL instruction and received literacy training outperformed their peers in academic performance, used more trustworthy sources of information, and supported their arguments and perspectives with relevant literature, according to Squibb and Mikkelsen (2017).

Table 8b

Significant Difference in the Respondents' Level of Information Literacy Competency When Categorized According to Attendance to Library Information Literacy Instruction

Attendance to Library Information Literacy Instruction	N	Mean	t-test	p-value*	Interpretation / Decision[a]
No	2	3.65	-0.171	0.86	Not Significant / Do Not Reject Ho
Yes	360	3.57			

**Significant at the 0.05 level (alpha)*

[a]Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

Significant Difference in the Respondents' Level of Information Literacy Competency When Categorized According to Mode of Library Information Literacy Instruction

Table 8c presented the mode of library IL instruction, it is evident that there are notable distinctions among the different modes. The face-to-face mode has attendees of 100, with a mean of 3.32 signifying as Proficient. On the other hand, online mode has 19 and stands at 3.43, while both face-to-face and online mode has 241 attendees with a mean of 3.68, indicating an Advanced level.

However, there were 2 who were not able to attend in whichever mode of library IL instruction and had a mean of 3.65.

This shows that indeed there is a significant difference when it comes to the mode of IL instruction. Students who attended library IL instruction especially in both face-to-face and online have somehow developed their IL competencies which positively affected their learnings.

The implication of this is that, students' active learning which engages them in activities such as library IL instruction deepen their learning and connection thus resulted to developing IL competencies and progress in their academic pursuit.

Table 8c

Significant Difference in the Respondents' Level of Information Literacy Competency When Categorized According to Mode of Library Information Literacy Instruction

Mode of Library Information literacy instruction	N	Mean	F	p-value*	Interpretation / Decision[a]
Both Face-to-Face & Online	241	3.68	7.699	0.001	Significant / Reject Ho
None	2	3.65			
Online Mode	19	3.43			
Face-to-Face Mode	100	3.32			

**Significant at the 0.05 level (alpha)*

[a]Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

Significant Difference in the Respondents' Level of Desired Mindset When Categorized According to Grade Level

The results of Table 9a to 9c clearly demonstrate that Desired Mindsets of the respondents when categorized according to variables.

Table 9a shows that the grade level, f = 12.971, p= 0.001. As such, the null hypothesis is rejected for it shows significant difference. This implies that the different grade levels, have varying level of desired mindsets: Grade 7 (3.46±0.792); Grade 8 (3.28±0.719); Grade 9 (3.67±0.720); Grade 10 (3.85±0.757); Grade 11 (4.02±0.604); and lastly the Grade 12 (4.23±0.648) having a p-value which is significant at the 0.05 level (alpha).

Thus, it can be deemed there is a significant difference in the level of desired mindsets of the respondents when they are grouped according to grade level. It can also be observed that the higher grade levels have a higher level of desired mindsets as well compared to the lower levels, as can be seen from the results wherein the grade 12 students are found to have a desired mindset of 4.23, rated as being experts; whereas grade 7 to 11 students were either proficient or advanced.

Table 9a

Significant Difference in the Respondents' Level of Desired Mindset When Categorized According to Grade Level

Grade Level	N	Mean[a]	Std. Dev.	F	p-value*	Interpretation / Decision[a]
Grade 12	37	4.23	.648	12.971	0.001	Significant / Reject Ho
Grade 11	53	4.02	.604			
Grade 10	72	3.85	.757			
Grade 9	67	3.67	.720			
Grade 7	62	3.46	.792			
Grade 8	71	3.28	.719			

**Significant at the 0.05 level (alpha)*

[a]Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

Significant Difference in the Respondents' Level of Desired Mindset When Categorized According to Attendance to Library Information Literacy Instruction

Table 9b summarizes the research investigation into whether there is a significant difference in the required mindsets for accomplishing information literacy tasks based on participation in information literacy instruction. The dataset includes two unique groups: those who participated in information literacy instruction (360 individuals) and those who did not (just 2 participants).

The average mindset score for those who attended the information literacy session was 3.70, with a standard deviation of 0.777. In comparison, the non-attending group had an average attitude score of 3.50, with a smaller standard deviation of 0.240. A t-test was used to determine the statistical significance of this variation. A p-value of 0.72 was attributed to the resulting t-statistic of 0.365. The researchers used a preset significance level (alpha) of 0.05 to assess significance. The study does not reject the null hypothesis (Ho) because the obtained p-value (0.72) above the alpha level. As a result, there is no statistically significant difference in the required mindsets for

accomplishing information literacy activities between those who attended information literacy education and those who did not.

Table 9b

Significant Difference in the Respondents' Level of Desired Mindset When Categorized According to Attendance to Library Information Literacy Instruction

Attendance to Library Information Literacy Instruction	N	Mean	Std. Dev.	t-test	p-value*	Interpretation / Decision[a]
Yes	360	3.70	.777	.365	0.72	Not Significant / Do Not Reject Ho
No	2	3.50	.240			

**Significant at the 0.05 level (alpha)*

[a]Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

Significant Difference in the Respondents' Level of Desired Mindset When Categorized According to Mode of Library Information Literacy Instruction

Table 9c shows that there is a significant difference in the ideal mindsets required for accomplishing information literacy activities when the mode of information literacy instruction is considered. The F-value for the One-Way ANOVA test was 3.799 and the p-value was 0.011, both of which were lower than the standard alpha level of 0.05.

This suggests that there are statistically significant variations between the various instructional modes' means. The "Face-to-Face Mode" appears to have a lower mean (3.49) than the "Online Mode" (3.63), "Both Face-to-Face & Online" (3.79), and "None" (3.50).

As a result of these findings, it may reject the null hypothesis (Ho) and infer that there are significant differences in the desired mindsets for information literacy activities among the various groups.

Table 9c

Significant Difference in the Respondents' Level of Desired Mindset When Categorized According to Mode of Library Information Literacy Instruction

Mode of Library Information Literacy Instruction	N	Mean	Std. Dev.	F	p-value*	Interpretation/ Decision[a]
Both Face-to-Face & Online	241	3.79	.770	3.799	.011	Significant / Reject Ho
Online Mode	19	3.63	.845			
None	2	3.50	.240			
Face-to-Face Mode	100	3.49	.745			

**Significant at the 0.05 level (alpha)*

[a]Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

Significant Difference in the Respondents' Level of Academic Performance When Categorized According to Grade Level

The findings shown in tables 10a to 10c gave results on the significant difference in the respondents' level of academic performance when categorized according to variables: grade level, attendance to library IL instruction, and the mode of library IL instruction.

Table 10a clearly displays the differences in results between grade levels. Grade 8 students had the lowest mean score of 3.48±0.79. Grade 9 students, on the other hand, had the highest mean score of 3.99±0.66, which shows how concentrated the data are around the mean and the values are all closely grouped together which make the data more precise. The findings therefore resulted to reject the hypothesis, since indeed there is a significant difference across grade levels in terms of the level of their academic performance.

Academic performance is one of the most important aspects influencing students'

success and achievement for it holds enormous significance in the field of education, acting as an effective means to measure students' advancement in learning (Tus, 2020)

Table 10a

Significant Difference in the Respondents' Level of Academic Performance When Categorized According to Grade Level

Grade Level	N	Mean	Std. Dev.	F	p-value*	Interpretation / Decision[a]
Grade 9	67	3.99	0.66	4.58	0.001	Significant / Reject Ho
Grade 12	47	3.89	0.84			
Grade 11	53	3.81	0.79			
Grade 10	72	3.75	0.90			
Grade 7	62	3.55	0.69			
Grade 8	71	3.48	0.79			

**Significant at the 0.05 level (alpha)*

[a]Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

Significant Difference in the Respondents' Level of Academic Performance When Categorized According to Attendance to Library Information Literacy Instruction

In Table 10b, there is indeed a significant difference in the level of academic performance of the respondents when categorized according to their attendance to library information literacy instruction. A t-test yield a statistical significance of this variation, a p-value of 0.001 was attributed to the resulting t-statistic of 17.44. The null hypothesis is rejected since the obtained p-value is less than the significance level (alpha) of 0.05.

Abrigo's research in a private institution in Manila City, found out that students' information literacy competencies improved after participating in information literacy instruction, thus she emphasized the importance of collaborative partnerships between teachers and librarians in the development of a comprehensive information literacy program. As a result, libraries and librarians are encouraged to expand their efforts to

provide information literacy teaching, contributing to improving students' IL competencies (2018).

Table 10b

Significant Difference in the Respondents' Level of Academic Performance When Categorized According to Attendance to Library Information Literacy Instruction

Attendance to information literacy instruction	N	Mean	Std. Dev.	t	p-value*	Interpretation / Decision[a]
Yes	360	3.73	0.80	17.44	0.001	Significant/ Reject Ho
No	2	3.00	0.00			

**Significant at the 0.05 level (alpha)*

[a]Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

Significant Difference in the Respondents' Level of Academic Performance When Categorized According to Mode of Library Information Literacy Instruction

A notable difference occurs when respondents' academic achievement levels are categorized according to the mode of library IL instruction they received. Still, the academic performance of the 241 respondents when they attended both the face-to-face and online instruction got the highest mean (3.83±0.80). The One-Way ANOVA test in Table 10c reveals an F-value of 4.60 and a p-value of 0.004, both of which are less than the standard alpha level of 0.05. As a result, the hypothesis is rejected.

Students' academic achievement is significantly affected by their attendance at both face-to-face and virtual library IL instruction. Participating in collaborative teaching sessions conducted by librarians and instructors has greatly contributed to their development of IL competencies. This is corroborated by Hess's study, which discovered that online IL instruction is just as beneficial for learning as traditional face-to-face instruction. A quasi-experimental investigation involving sociology undergraduate

students at a Michigan university has revealed these findings and conclusion (2014).

Table 10c

Significant Difference in the Respondents Level of Academic Performance When Categorized According to Mode of Library Information Literacy Instruction

Mode of information Literacy Instruction	N	Mean	Std. Dev.	F	p-value*	Interpretation / Decision[a]
Both Face-to-Face & Online	241	3.83	0.80	4.60	0.004	Reject Ho
Online Mode	19	3.58	0.69			
Face-to-Face Mode	100	3.52	0.76			
None	2	3.00	0.00			

** Significant at the 0.05 level (alpha)*

[a] Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

Significant Relationship Between the Respondents' Level of Information Literacy Competency and their Academic Performance

The results presented in Table 11 demonstrate a noteworthy and statistically significant relationship between the IL competencies of the participants to their academic performance. It can be seen that the independent variables which are the IL competencies have significant relationship to the academic performance as based on the general weighted average which is the basis for the academic performance and considered as the dependent variable. A Pearson's product-moment correlation was run to assess the relationship between the respondents' current level of IL competency and their academic performance.

Looking at the results, it can be observed that there is a statistically significant relationship between the level of IL competency (3.57±0.65) and the general weighted average (87.99±4.29) of the respondents, $r(360) = 0.503$, $p = 0.001$.

Moreover, the Pearson R coefficient signifies that the correlation between the IL

competency level and academic performance (general weighted average) is positively strong. Thus, it can be said that the level of IL competency has an implication on the level of academic performance as observed in the GWA (general weighted average).

Furthermore, the Pearson R coefficient signifies that the variables have a strong positive correlation (r > .50), based on the Magnitude of Effect Size table by Cohen (1988). It can be surmised that as the level of IL competency increases (decreases), there will also be a significant unit increase (decrease) in the academic performance (GWA) of the students since the correlation is strong and direct.

Table 11

Significant Relationship Between the Respondents' Level of Information Literacy Competency and their Academic Performance

Variables	Mean	Std. Dev.	Pearson's R	p-value*	Decision	Interpretation[a]
Information Literacy Competencies	3.57	0.65	0.503	0.001	Reject Ho	Strong Positive Correlation
Academic Performance (GWA)	87.99	4.29				

**Significant at the 0.05 level (alpha)*

[a]Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

The research conducted by Banik and Kumar in 2019 reveals that a potential increase of 0.012 in students' GPA could be achieved through a corresponding enhancement of their information literacy skill by one unit. The enhancement of students' IL competency can be fostered through a combination of high-quality education and comprehensive training, encompassing both academic and vocational dimensions.

This approach entails cultivating their curiosity for problem identification, honing their abilities to search for and apply information, ensuring proficiency in utilizing computers and the Internet, and fostering competence in ethically using and acknowledging information sources.

As students' IL competency flourish, their academic performance has the potential to experience notable improvement, thereby contributing significantly to the broader national development goals.

Significant Relationship Between the Respondents' Level of Desired Mindset and their Academic Performance

Pearson Product Moment correlation was utilized to determine the significant relationship between the respondents' desired mindsets and their academic performance. This suggests that Pearson R is applicable for the said data.

Based on the results in Table 10, Desired Mindsets (3.70±0.92) and the general weighted average (87.99±4.29) of the students were significantly correlated, $r(360) = 0.374$, $p = 0.001$. Thus, it can be said that Desired Mindsets has an implication on the academic performance based on the GWA of the respondents. Furthermore, the Pearson R coefficient signifies that the variables have a moderate positive correlation ($r \geq .50$), based on the Magnitude of Effect Size table by Cohen (1988).

Moreover, it can be observed that both the mean level of desired mindset and general weighted average of the respondents are interpreted as Proficient, having a value of 3.70 and 87.99, respectively. It can be surmised that the null hypothesis is rejected for indeed the desired mindsets of the respondents has a significant relationship on their academic performance.

It can be noted in the findings that there is a moderate positive correlation in the relationship between the respondents' Desired Mindsets to their Academic Performance. It has a mean of 3.70 and standard deviation of 0.92 and the academic performance expressed in their general weighted average having a mean of 87.99 and standard deviation of 4.29. The purpose of encouraging mindset intervention is to improve a student's frame of mind and hence promote learning, and there is strong evidence that mindset interventions are effective (Pasarelli, 2014).

In the year 2020, Moneva and Tribunalo noted that students displayed positive perspectives and sought-after mindsets in relation to performance tasks and academic performance.

Consequently, there is indeed a significant relationship between the respondents' desired mindsets and their academic performance and the is hypothesis is rejected as demonstrated by Table 11 which shows the normality of distribution of the level of Information literacy competencies and desired mindsets as the independent variable to the academic performance which is the dependent variable.

Table 12

Significant Relationship Between the Respondents' Level of Desired Mindset and their Academic Performance (GWA)

Variables	Mean	Std. Dev.	Pearson's R	p-value*	Decision	Interpretation[a]
Desired Mindsets	3.70	0.92	0.374	0.001	Reject Ho	Moderate Positive Correlation
Academic Performance (GWA)	87.99	4.29				

**Significant at the 0.05 level (alpha)*

[a]Effect Size: Between 0.10 and 0.30 - Weak Correlation; Between 0.30 and 0.50 - Moderate Correlation; Greater than 0.50 -Strong Correlation (Turney, 2022).

In today's rapidly evolving information environment, the sought-after mental dispositions in individuals who possess IL competencies are labeled as the desired mindsets. The primary aim of interventions directed at these mindsets is to enrich students' cognitive viewpoints, thereby fostering an advancement in their learning process.

A study conducted by Moneva and Tribunalo in 2020 revealed that students demonstrated positive attitudes and desirable mindsets when they held a thorough grasp of their assignments and had confidence in their capability to complete them. This self-

assuredness was further nurtured by their proficiency in both literacy and digital skills, thereby contributing to an enhancement in the cognitive capacities of the younger generation.

Students believe their ability to gain intellectual skills is due to their beliefs and attitudes, which eventually contribute to their academic performance and mental development and vice versa (Limeri et al., 2020).

Another study investigated the mindset theory which pertains to students who believe their mindset can change and that they achieve more than students who believe their mindset are fixed. It claimed that students' mindsets differed depending on the level of difficulty or obstacles, and that intervention would contribute to their growth mindset and eventually impact their academic achievement (Macnamara & Burgoyne, 2022).

Furthermore, findings resulted to the consideration that this library information literacy instruction should not be only a requested session but rather integrated into the regular curriculum by employing diverse delivery methods, with the objective of boosting student engagement and ensuring the efficiency and productivity of the instructional process. This library IL instruction can be conducted through both in-person (face-to-face) and online platforms, providing scheduling flexibility and convenience for students, teachers, and libraries.

Finally, in the last research objectives which pertains to the enhanced library information literacy instruction that can be provided by the library based on the results of the study. The findings led to the creation of this library information literacy instruction aimed at enhancing the information literacy competencies of respondents across grade levels, aligned with the researcher's objectives. The proposed enhanced library information literacy instruction is further discussed along with its rationale and objectives.

Proposed Enhanced Library Information Literacy Instruction

Rationale

This enhanced library information literacy instruction was proposed although the findings showed a very satisfactory result when it comes to the library information literacy instruction being conducted by the researcher for several years. The researcher, who is also the school librarian was so inspired with the outcomes of this study; thus, the library IL instruction was proposed to be enhanced so that the students will further provide students with a variety of opportunities and pertinent learning experiences to enhance their literacy, particularly their information literacy competencies, making them informed competent and critical thinkers.

Libraries, as the heart of the institution, plays an increasingly essential role in the educational process, for it reflect the school's educational philosophy, mission, and vision. Libraries in the 21st century have evolved into learning centers that provide maximum satisfaction to their users' information demands through the use of automated, virtual, or digital means where they can access their various services as well as print or electronic resources.

In all libraries, especially in this Christian basic education institution, library instruction is one of the library services which evolved to include not only imparting the fundamental knowledge and skills required for acquiring rich information through the use of library resources and services, but also responding to the learners' ever-changing needs and the school's emerging thrust in today's information age.

This enhanced library instruction makes use of games as a support tool for teaching information literacy. Although some may view gaming in education as a barrier to learning, its educational role is to increase students' motivation and engagement, strengthen students' interaction and collaboration abilities with their peers, and empower them to apply gaming principles and values.

The library can introduce a variety of games that incorporate IL competencies, allowing students to learn and understand through these educational games especially with the use of technology. Educational technology is being used not only to simplify but also to speed up and improve the learning process. The proposed library IL instruction that should be matched with the school's curriculum is designed to focus on a variety of activities that would improve the availability, efficacy, and quality of instruction in a technology environment.

These activities were critical in allowing students to gain new skills while also offering access to information and resources, promoting knowledge and education, encouraging lifelong learning, and meeting community needs.

The objectives of this enhanced library information literacy instruction are to:

A. Reinforce and integrate essential IL competencies to supplement their regular lessons through engaging in IL activities that aim to address challenges related to information-based problems including task definition, strategic information seeking, location and access, information use, synthesis, and evaluation.
B. Develop and refine search strategies in finding information as well as evaluating these sources by using evaluation tools like CRAAP or 5Ws
C. Recognize the academic, legal, and other factors in the creation, access and use of information to avoid plagiarism and copyright issues.
D. Distinguish and use various research tools while adhering to specific requirements, such as The American Psychological Association (APA) 7th Edition of Citation and References, to ensure the prevention of potentially serious consequences resulting from incorrect use of information.
E. Provide this program through either a formal or informal instruction to the Grades 7 through 12 students to help them develop their information literacy competencies.

Proposed Enhanced Library Information Literacy Instruction

Content	Former Traditional Library Instruction	Proposed/Enhanced Library Instruction	Grade Level
Library Orientation A yearly orientation about the library, its resources, services, rules and policies. Library Orientation is believed to be given every opening of the school year to remind students of the usefulness of the library and how it can help them in their information needs	Students in every grade level are gathered in the library. The following activities are conducted: Instruction through a PowerPoint presentation Introduction of the LRC, its resources and services. Presentation of the rules and policies, the services and also the library staff and the different functions they perform. Tour is being conducted to have them familiarized with the resources and services given by the library/learning center.	**Game: Amazing Library Race** A library orientation in a different way of which is more active and engaging. This game encourages students to take an active role in completing the challenge by responding to a provided task or question. *What to do?* 1. Form the groups. Members of the group might be chosen at random, by the teachers, or by the students themselves. 2. Prepare the tasks. The tasks are in a form of questions related to the library, its resources, services and rules. These tasks can include locating certain books, utilizing the library's OPAC, understanding the borrowing process, and outlining the policies and services. 3. Create posts. Each team that is capable of completed a certain task should report to the post assigned for that task. The next post would then be used for the succeeding tasks, and so on. 4. Offer help. Involve library staff members at certain post to guide students as they perform and finish the activity.	Designed for students across various grade levels, with a particular focus on Grade 7 and those who have recently enrolled.
Library Orientation Introducing the Library or Learning Resource Center (LRC), and Its Resources	Students are taught to be more familiar with the library especially their resources and services. Thus, they are exposed to: a. The different types of resources and how they are organized. b. The library system being used in organizing these materials. c. The OPAC to view and access the library materials. .	**Game: Library Scavenger Hunt** This game is another way to help the students to: a. Develop their resource-finding skills as well as their teamwork and collaboration abilities. b. Improve their communication, problem-solving, social and emotional intelligence c. Enhance their information literacy competencies. *What to do?* 1. Find the necessary library material that is required in the task to play the game	Designed for students across various grade levels, with a particular focus on Grade 7 and those who have recently enrolled.

Content	Former Traditional Library Instruction	Proposed/Enhanced Library Instruction	Grade Level
	The instruction is presented through a PowerPoint presentation	2. Familiarize themselves with the different resources of the library especially the general references. 3. Discover the different purposes and uses of the library materials for assignments, performance tasks and research. Proficiently use the Online Public Access Catalog (OPAC) for easy and fast access of these resources.	
Library Orientation Introducing the Library or Learning Resource Center (LRC), and Its Resources	Students learn about information literacy and how to seek, evaluate, and use information effectively. Students are provided information library instructions that focus on these skills. This is accomplished through a PPT presentation and a session of questions and answers as a follow-up.	**Game: Jeopardy: Library Edition** An exciting game which motivates students to actively participate and learn. To have an easy way to review or assess students' knowledge and familiarity with library resources and collections through this engaging game. *What to do?* 1. Prepare the questions or statements with many categories such as library rules, names of library staff and their functions or roles, different types of resources, services offered, and more. 2. Participants is to be divided into groups to play. 3. There can be up to 3 rounds, the easy, moderate and hard 4. This activity can be done in person or as a virtual library instruction through Zoom.	Designed for Grades 8 and 9 students as a supple-mentary or reinforcing instruction, though it is still suitable for any grade level.
Library Orientation Introducing the Library or Learning Resource Center (LRC), and Its Resources	Students learn about information literacy and how to seek, evaluate, and use information effectively. Students are provided information library instructions that focus on these skills. This is accomplished through a PPT presentation and a session of questions and answers as a follow-up.	**Game: Family Feud: Library Edition** It is a popular American game which can be also adapted in library instruction. It features two groups who compete against each other in a trivia competition. However, there is a twist here because it is not based on survey responses but rather on the facts about the library, its collection and the services it offers.	Designed for Grades 8 and 9 as a subsequent or reinforcing activity following the library orientation. But it can also be given or administered to any grade level as deemed necessary

Content	Former Traditional Library Instruction	Proposed/Enhanced Library Instruction	Grade Level
Organization of Library Resources by Dewey Decimal System Introduction to the classifi-cation and organization of books and other library materials or resources through the use of DDC, also known as Dewey Decimal Classification System	A presentation about DDC is conducted, its use and purpose then after that students are taken on a library tour to learn about the classifications of DDC and how books are organized on the shelves. The tour makes it easier for students to find the resources and helps them to access them more quickly and effectively. They are also taught how to use DDC to find books on any topic or subject within the library's resources and collection.	**Game: Dewey Scavenger Hunt** After presenting the different classifications of DDC. Students are to engage in a scavenger hunt designed to teach kids the skill of finding books using the Dewey Decimal Classification System (DDC). *What to do:* This is how to play this game in this library information literacy instruction. 1. Divide the class into three or four groups. Remind them to listen carefully about the instruction. 2. Establish the guidelines for this Dewey Scavenger Hunt. Explain the rules and regulations of the hunt to ensure a fair and enjoyable experience for all but still an educational activity. 3. Give a separate set of instructions to each team, for example, one group may work on locating books through a specific DDC numbers assigned to them, while another group may look for periodicals required clues or hints in a task. 4. Unravel the Clues: When students successfully accomplish the activities assigned to them, they will be given additional directions. They repeat the processes to find the next clue, which leads to an amazing series of discoveries. 5. Create a Clue Trail: Create a series of five clues, each hidden within the right books. These hints serve as stepping stones, leading the teams to their destination. 6. Win the prize. At the completion of the hunt, all teams will gather at the final destination to reveal their well-deserved findings or answers. The team that successfully completes all tasks wins the scavenger hunt! Remind students that this is a fun game that encourages teamwork in an unusual way by combining elements of enjoyment and rivalry while also learning and developing critical thinking skills.	Designed to be provided to Grades 7 and 8 students, as they are the primary focus of the training aimed at familiarizing them with how library resources are organized, thereby preparing them for more advanced levels of learning.

Content	Former Traditional Library Instruction	Proposed/Enhanced Library Instruction	Grade Level
Introducing the different strategies or techniques in finding the information either using the print or online resources.	A power point presentation is given to introduce to the students the different strategies in finding information. They are taught the following steps: Step 1: Define your search question/topic and set limits on your search. Step 2: Break your topic down into key themes or concepts. Step 3: Build a bank of topic keywords and synonyms for your main concepts. Step 4: Plan where you are going to look for information by identifying the information types you need.	**Game: Boolean Logic** This game will help develop the IL skills that are needed by the students in doing their literature search, as a key step in performing good authentic research. It helps in formulating a research question and planning the study. *What to do?* A power point presentation is given to introduce to the students the different strategies and/or techniques such as the Boolean operators, phrase and keyword searching, truncation and wildcard After the presentation, this game is played to apply these strategies/ techniques in finding information. 1. Using playing cards that illustrate Boolean Operators (AND/OR/NOT) to demonstrate their use in word combination. This determines how different operators can affect the results or meaning. 2. Using flash cards to show various truncation and wildcard symbols relevant to word searches 3. Students will be able to create their own combination of words, understand the logic, and will enable them to broaden or narrow their search results.	Designed for the Grade 7 students to support them in the refinement of their information retrieval skills as they start their journey of developing effective search techniques.
Evaluating Sources of Information The authority, relevance, objectivity, currency, and coverage of print and online sources of information vary greatly that students should know.	Students are taught how to evaluate information sources to determine whether they are credible or true, or whether they are relevant and appropriate for their assignment, tasks, or research project. This is done through an instruction using a PowerPoint presentation. After the presentation, questions about the credibility of the source/s, such as.	**Game: Let's Get Critical: Stop and Spot** To teach the students how to evaluate information from different sources by using different evaluation tools like CRAAP Test (Currency, Relevance, Authority, Accuracy and Purpose) or the 5Ws (Who, What, Where, When, and Why). *What to do:* 1. Prepare a presentation featuring different information and its sources. 2. Students will identify which resources are credible or articles	Designed for dissemination to all high school students across grade levels, as they all need instruction on efficiently and effectively seeking their information needs in a quick and successful manner.

Content	Former Traditional Library Instruction	Proposed/Enhanced Library Instruction	Grade Level
	accuracy, objective, currency, coverage, purpose, and so on, are made into a question statement and presented to evaluate students learning about the presentation	3. that are scholarly and which are not. 4. Students will use the evaluation tools such as CRAAP or the 5Ws. This game will let the students STOP, review, and assess, and then SPOT those that lack credibility and intellectual worth.	
Teaching APA In-text Citation and References Students are taught the APA 7th Edition Citation Style to help them get familiar with the rules, format, and punctuation. Content of the lessons and/or instructions vary depending on the grade level of the students.	A power point presentation about In-text Citation and References. The format for each type of source is shown, as well as the rules for each format and punctuation are being explained. Examples are provided to help students get familiar with the rules and format.	**Game: Fun with APA:** Students will learn about in-text citations and references using APA 7th Edition. The lesson is presented through games with emphasis on rules and formats for various types of resources based on the grade level of the students. *What to do?* The following game-based instruction can be introduced. **a. Inquiry-Based Approached** These are the WHEN, WHERE, WHY, WHAT, WHO, and HOW questions that will enable students to get engage in and obtain a deeper understanding of topics and content through this game. By answering the questions, students will be helped to remember and recall rules, ideas, or procedures. Example questions are: WHY they need to cite? WHAT are the rules? WHO are the important people that should be cited? WHERE should to place the citation? WHEN to use the correct punctuation? HOW to apply the rule? L earners After presenting the basic format and rules with examples, the following games are introduced to assess how much the students learned and remembered from the lessons.	Designed to be given to junior high school students spanning from Grades 7 to 10, as they still need guidance on effectively seeking for their information needs in a manner that is both easy and fast, yet valuable and relevant.

Content	Former Traditional Library Instruction	Proposed/Enhanced Library Instruction	Grade Level
		a. Fact or Bluff In simple terms, it's the YES or NO where statements are presented, with one being correct and the other include incorrect format, punctuation, or entries. **b. MCQ or Multiple-Choice Questions** This is an excellent task for students to help them identify the small differences in punctuation and structure. The choices presented are all relatively similar, but the differences highlight common errors that students make when including in-text citations in their writing and when writing their reference page. **c. Library Henyo** This is a famous Filipino guessing game with different categories that can be played to make a guess on the statements being presented which pertain to the rules in the In-text Citation and References using APA 7th Edition	

Chapter 5

Summary, Findings, Conclusions, and Recommendations

The research outcomes stated and explained in Chapter 4 are analyzed and condensed in alignment with the research objectives outlined in Chapter 1. The comprehensive conclusion for the research topic is stated herein, which also provided a critical assessment of the methodology employed to complete the study. Finally, the study's limitations and potential areas for additional research were identified.

Summary

This study was conducted to assess the current level of information literacy competencies and desired mindsets of secondary students in a private Christian Basic Education institution. The assessment was focused on how well these respondents executed information literacy activities and intended to establish the relationship between the effectiveness of students' information literacy competencies, desired mindsets and their academic performance. The specific objectives were addressed through individual findings, ensuring that the study’s inquiries were comprehensively tackled.

This research employed a descriptive correlational approach, utilizing a researcher-made survey questionnaire based on the i-Competency Model designed by Nanyang Technological University. The survey encompassed all secondary students, spanning from Grades 7 to 12, through a total enumeration method. The survey instrument underwent validity and reliability testing to ensure robust data collection for assessing information literacy competencies across the entire student population.

The data underwent analysis through a frequency distribution table, which displayed numerical counts and their corresponding percentages to quantify variables. For continuous variables, such as Likert scales, the mean and standard deviation were employed as statistical measures. Parametric statistical tests were utilized for inferential

purposes, while the standard deviation coefficient gauged the spread of variability for each item's distribution. To assess the significant difference and relationship between information literacy competencies, desired mindsets, and respondents' academic performance, One Way ANOVA and Spearman correlation tests were respectively employed.

Findings

To answer the research objectives of the study, the significant findings were:

1. In terms of the participants' demographic profile, the study involved a total of 362 secondary students, which made up a portion of the total population of 391. The findings revealed that the largest group of participants in the study included 72 students from Grade 10, while the smallest group included 37 students from Grade 12. With the exception of two Grade 7 students who were unable to participate in library information literacy instruction, the majority of secondary students were present. Furthermore, the mode of library information literacy (IL) instruction that combined both face-to-face and online approaches got the highest percentage of attendance.

2. The current level of respondents' IL competencies in terms of performance of IL activities when taken as a whole and categorized according to grade level, attendance to library IL instruction and mode of library IL instruction, it was noted that as the respondents' advance to higher grade levels, the IL competencies also exhibited a notable rise. The students' attendance to library IL instruction in whichever mode, face to face or online, effectively and firmly validated the researcher's goal which is to improve the respondents' IL competencies as they move up to higher grade levels.

3. The current level of respondents' desired mindsets necessary to accomplish IL activities when taken as a whole and categorized according to grade level, attendance to library IL instruction and mode of library IL instruction, the findings revealed that students displayed a favorable attitude and positive mentality which are desirable

mindset as they learn and advanced to higher grade levels. The library IL instruction helped improved students in the development of values, attitudes and learning habits as teachers and librarians collaboratively teach them.

4. The current level of respondents' academic performance is depicted by the final GWA (general weighted average) and it reveals that the majority of them fall within the Proficient category, with grades ranging from 87 to 92. A variety of factors influenced students' academic achievements, with IL competency being an essential contributor, significantly affecting their educational achievements.

5. The study revealed a significant difference in respondents' level of IL competencies when categorized according to grade level, attendance to library IL instruction and mode of library IL instruction. Diverse grade levels exhibited varying levels of IL competencies. Notably, both online and face-to-face library IL instructions yielded significant differences. Surprisingly, the attendance or non-attendance of the respondents to IL instruction did not appear to have a significant impact on their IL competencies since only 2 out of 362 students not able to attend the library IL instructions.

6. When considering the current level of respondents' desired mindsets indicated a significant difference. Findings revealed that the different grade levels, have varying level of desired mindsets also. The higher the grade level, the higher level of desired mindsets as well. However, it is important to highlight that the participation in library IL instruction did not result in a significant difference. Interestingly, individuals who engaged in library IL instruction, whether in-person or online, demonstrated higher mean and standard deviation scores in their mindset compared to those who did not attend.

7. Consequently, the findings revealed a significant difference in the respondents' academic performance across grade levels, in which Grade 9 has the highest mean and standard deviation followed by Grade 12. As to the attendance to

library IL instruction in whichever mode, it also exhibited a significant disparity in the level of the academic performance of the respondents as shown in their GWA.

8. The findings revealed a substantial and statistically significant correlation between IL competencies and the academic achievements of the respondents, as measured by the GWA, a key indicator of academic performance.

9. Likewise, the results revealed a moderate positive correlation between the respondents' level of desired mindset and their academic performance. These desired mindset levels ranged from Proficient to Advanced. The findings strongly indicated that the respondents consistently exhibited positive attitudes and desirable mindsets while developing intellectual skills and IL competencies.

10. Finally, the Proposed Enhanced Library Information Literacy Instruction is presented as an output derived from the study's findings. This enhanced library IL instruction aims to provide students diverse activities designed to foster the development of their IL competencies. The suggested activities are introduced as captivating and interactive games, with the expectation that these will boost students' motivation and engagement, enhance visual skills, fortify interaction and collaboration with peers, and enable the application of gaming principles and values that will be useful in a real-world situation.

Conclusions

Based on the findings, the following conclusions are drawn:

1. The information literacy competencies indeed has a significant contribution to the academic performance of the students since there is a statistically significant correlation between the respondents' IL competencies and their academic achievements. As depicted in the tables, an increase in grade levels corresponds to an increase in IL competencies.

2. The various IL activities they participated in influenced their learning and led

to positive outcomes. It is essential to consistently provide appropriate library IL instructions in order for these skills to be developed.

3. The positive mindsets such as knowing the legal and ethical use of information based on standard practices and proper source attribution can help students achieve their desired perspectives.

4. Finally, this study concluded that as the respondents' IL competencies continue to progress, there is a potential for significant improvement in their academic performance as well as in their desired mindsets, thereby the library IL instruction plays a crucial role in developing these competencies in order for the respondents to achieve the goals and encouraging lifelong learning.

Recommendations

Based on the above findings and conclusions, the following recommendations are offered:

1. It is recommended that library IL instruction be integrated into the regular curriculum instead of providing this only in periodic library instructions. This endeavor aims to foster a sense of approval and fulfillment among administrators and institutions, knowing that learners will develop a higher level of IL competency, ultimately leading to academic success.

2. It is hoped that the study’s outcomes will provide assistance to the faculty in evaluating the learning guides for each subject with a specific focus on effectively addressing students’ concerns regarding information literacy. Additionally, it is also wished that the collaborative teaching be continued for it has demonstrated positive impact on students' learning experiences and the enhancement of their IL competencies. The substantial and labor-intensive efforts invested in preparing for information literacy instruction have proven to be worthwhile, as substantiated by the results of this study.

3. It is encouraged that the librarians should reassess and redesign their

library IL instruction, incorporating diverse lessons and activities that foster the enhancement of the IL competencies among respondents, especially as they advance in their academic journey. The desire is for librarians to continue in providing IL instruction using engaging and purposeful methods, tailored to enhance students' learning experiences. This instructional approach can be conducted through both face-to-face and online platforms, offering flexibility and convenience in scheduling for students, teachers, and libraries.

4. The results revealed that students or learners' performance of diverse IL activities performed during library IL instructions have been proven to significantly contribute to the enhancement of their IL competencies. Consequently, students or learners are encouraged to consistently and actively participate in library IL instructions to access contemporary and creative methods for acquiring knowledge and literacy.

5. The proposed enhanced library IL instruction represents a modern and innovative approach to involve students in the development of their IL competencies. Nonetheless, it remains a wish for future researchers to explore inventive and pioneering methods continuously. This exploration will contribute to the ongoing progress and enhancement of implementing library IL instructions, ultimately benefiting the overall educational experiences of the students.

6. Finally, as the findings of this study align with the researcher's aim of enhancing respondents' IL competencies across different grade levels, it is hoped that the enhanced framework for library IL instruction, designed to help students develop their IL competencies will be implemented using various delivery methods. The objective is to enhance student engagement and ensuring the efficiency and productivity of the instructional process.

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Appendices

Appendix A

Certification for Turnitin Similarity Checking

REVIEW, CONTINUING EDUCATION and CONSULTANCY CENTER
Central Philippine University
Jaro, Iloilo City
Tel. No. 329-1971 local 1008 email: rceccsec@cpu.edu.ph
Website: rcecc.cpu.edu.ph

February 15, 2024

CERTIFICATION

This is to certify that the thesis entitled **"INFORMATION LITERACY COMPETENCY, DESIRED MINDSET AND ACADEMIC PERFORMANCE OF SECONDARY STUDENTS: BASIS FOR ENHANCED LIBRARY INFORMATION LITERACY INSTRUCTION"** by **Lorelie A. Oregano** has undergone Turnitin Similarity Checking with a passing percentage of 12% and has passed the requirements (Chapter 1-5).

Prepared by:

PINKY E. LUTERO-TONGOL
Staff -in-charged

Approved by:

LENNY ROSE P. MUCHO, EdD.
Director, RCECC

Appendix B

Certification of Technical and Grammar Editing

CENTRAL PHILIPPINE UNIVERSITY
Jaro, Iloilo City

C E R T I F I C A T I O N

This is to certify that the thesis with the title, "Information Literacy Competency, Desired Mindset and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction," by Lorelie A. Oregano has been subjected to technical editing, including proofreading for grammar, spelling, punctuation, and other mechanics of writing.

BELINDA R. VALAQUIO, PhD
Faculty Member
March 14, 2024

Appendix C

Certification of Statistical Analysis

CENTRAL PHILIPPINE UNIVERSITY
Iloilo City, Philippines

SCHOOL OF GRADUATE STUDIES

CERTIFICATE FOR STATISTICAL ANALYSIS

To Whom It May Concern:

This is to certify that the statistical tools, presentation of analysis and interpretation of results of the thesis entitled **"Information Literacy Competency, Desired Mindset, and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction"** conducted by Lorelie A. Oregano, MLIS Candidate, has been thoroughly examined by the undersigned.

This certification is issued for whatever purpose it may serve best.

Given this 15th day of January 2024.

Name of Statistician: Nobel F. Farrar
Highest Educational Attainment: MAEd Mathematics Education

Signature: _____

Appendix D

Transmittals

CENTRAL PHILIPPINE UNIVERSITY
Master's in Library and Information Science
Jaro, Iloilo City, Philippines

April 20, 2023

MRS. NICE CONSUELO C. ALOJAMIENTO
OIC, Principal
Angela Gonzaga National High School
Brgy. Vista Alegre, Bacolod City

Dear Ma'am Alojamiento,

I would like to ask for your permission to conduct a reliability test among the grade 10 students of your school, for my research entitled **"Information Literacy Competencies and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction."**

This study is to fulfill one of the final requirements to pass the MLIS course and also seeks to determine the following:

a. the current level of information literacy competencies of secondary students in terms of their performance of information literacy activities and the desired mindset necessary to accomplish these.
b. the level of effectiveness of their information literacy competencies
c. the relationship between the effectiveness of their information literacy competencies and their academic performance

Furthermore, based on the study's findings, the researcher will create enhanced library information literacy instruction to assist students in developing 21st-century information literacy competencies. This improved library information literacy instruction will result in programs that are more inventive and varied in their approach to increasing student engagement and learning.

The research study will be done using a self-created survey questionnaire that will be given to the target participants of the study. It would probably just take five (5) minutes of their time and be assured that all the results of this study will be used for research purposes only and kept strictly confidential.

Your favorable approval of this request is greatly appreciated. Thank you very much.

Respectfully yours,

LORELIE A. OREGANO, RL
Researcher

Noted by:

ELISA V. GARCIA, RL, PhD
Thesis Adviser

Approved:

NICE CONSUELO C. ALOJAMIENTO

Date: 4-21-2023

CENTRAL PHILIPPINE UNIVERSITY
Master's in Library and Information Science
Jaro, Iloilo City, Philippines

April 24, 2023

To: **MS. ESTHER JANE Y. UY**
Principal

Thru: **MRS. LYNN B. TANJUSAY**
High School Supervisor

Dear Mesdames,

I would like to ask for your permission to conduct a survey among the secondary students in Trinity Christian School from Grade 7 to Grade 12 for my research titled "**Information Literacy Competencies and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction.**" This study is to fulfill one of the final requirements to pass the MLIS course and also seeks to determine the following:

a. the current level of information literacy competencies of secondary students in terms of their performance of information literacy activities and the desired mindset necessary to accomplish these.
b. the level of effectiveness of their information literacy competencies
c. the relationship between the effectiveness of their information literacy competencies and their academic performance

Furthermore, based on the study's findings, the researcher will develop enhanced library information literacy instruction to help increase students' engagement and strengthen their literacy competencies. The study will employ a researcher-made survey questionnaire and probably will require only five (5) minutes of the respondents' time. The findings will be used solely for research purposes and will be kept strictly confidential, subject to legal limitations.

I am hopeful for your favorable approval and endorsement of this request. Thank you very much.

Respectfully yours,

LORELIE A. OREGANO
Researcher/MLIS Candidate

Noted by:

ELISA V. GARCIA, RL, PhD
Thesis Adviser

approved : LYNN B. TANJUSAY
4/26/23

approved : ESTHER JANE UY
4.26.23

CENTRAL PHILIPPINE UNIVERSITY
Master's in Library and Information Science
Jaro, Iloilo City, Philippines

May 6, 2023

To: **MS. ESTHER JANE Y. UY**
Principal

Thru: **MS. JUDITH VINCO**
School Registrar

Dear Mesdames,

Christian greetings!

The researcher is currently conducting a study titled **"Information Literacy Competencies And Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction"** as a requirement for the Master's degree in Library and Information Science. It aims to determine the following:

a. the current level of information literacy competencies of secondary students in terms of their performance of information literacy activities and the desired mindset necessary to accomplish these.
b. the level of effectiveness of their information literacy competencies
c. the relationship between the effectiveness of their information literacy competencies and their academic performance

In this regard, the researcher is seeking your approval to provide access to the final GWA (General Weighted Average) of secondary students in Grades 7-12 who participated in the survey and gave their consent. The researcher would like to assure you that the data gathered will be kept strictly confidential and used solely for research purposes.

I am hopeful for your approval and endorsement of this request. Thank you very much.

Respectfully yours,

LORELIE A. OREGANO
Researcher/MLIS Candidate

Noted by:

ELISA V. GARCIA, RL, PhD
Thesis Adviser

APPROVED BY:

JUDITH B. VINCO
May 10, 2023

Appendix E

Certification of Validation of Experts

CENTRAL PHILIPPINE UNIVERSITY
Iloilo City, Philippines

SCHOOL OF GRADUATE STUDIES

CERTIFICATION

To Whom It May Concern:

This is to certify that the instrument of Ms. Lorelie A. Oregano regarding her study on **"Information Literacy Competency, Desired Mindset, and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction**" has been validated by the experts.

The following are the observations/recommendations:

We find the questionnaire/research instrument to be aligned with the research study, offering essential data to accomplish the study's objectives. It's suggested that the researcher should correct some minor spelling problems. Furthermore, it is essential to ensure that the Informed Consent and Assent documents are thoroughly read and clearly explained to the respondents before their participation.

This certification is issued upon the request of Ms. Lorelie A. Oregano for whatever purpose it may serve her best.

Given this 20th day of February 2023.

LYNN B. TANJUSAY, MAEd, MACDDS
Validator

RHEA B. VALGUNA, RL, MLIS
Validator

JEREMIE C. REPOGIO, MAGC
Validator

Appendix F

Informed Assent Form for the Respondents in English Version

Research Ethics Committee
Central Philippine University

INFORMED ASSENT FORM (IAF)
for Children/Minors
(To be accomplished by the Participants/Respondents)

1. KEY INFORMATION ABOUT THE RESEARCHER AND THE STUDY

Description of Age Group of Children Involved: *12 to 18 years old (Grades 7-12)*
Study Title: *Information Literacy Competency, Desired Mindset, and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction*
Name of Researcher/s: *Lorelie A. Oregano*
Faculty Advisor: *Elisa V. Garcia, RL, MSLS, PhD*
Department/College: *Master's in Library and Information Science*
Institution: *Central Philippine University, Jaro, Iloilo City*

2. PURPOSE OF THE STUDY

Purpose of the Study: *To assess the information literacy competencies of the secondary students and evaluate how effective these competencies are in their academic performance.*

Explain why they are being chosen to take part in the research. *The library has been conducting library information literacy instructions to secondary students, thus, it is the goal of the researcher in this study to assess how these IL instructions support the academic performance of secondary students.*

How many children are expected to take part in the study? *More or less 300 secondary students (from Grades 7-12)*

Duration of the Study: *The study will be conducted in the months of May 2023 until July 2023*

3. PROCEDURE OF THE STUDY

The researcher will conduct the survey to the secondary students, the Grades 7-12, and since you belong to this group, you are considered one of the respondents. The contents of the Informed Consent Forms signed by your parents/guardians and this Informed Assent Forms will be read and explained to you before asking for your participation. The survey will start once the respondents, and that's you students, signed the Informed Assent Forms.

The study will include a survey questionnaire in 3 parts. The 1st part consists of the demographic profile which includes your grade level, and questions pertaining to the attendance to the library information literacy instructions conducted by the library,

whether you have attended or have not attended; and the other one is the mode when you attended this instruction either face-to-face or online. The 2nd part is your self-assessment of the current level of your information literacy competencies when performing the IL activities and the desired mindsets necessary for performing these IL activities. The 3rd part is the level of your academic performance in terms of the final general weighted average.

The survey questionnaire will be conducted by grade level and each item in the questionnaire will be read and explained by the researcher. You will be given the option to indicate your name or not. You will also be given enough time to read and understand each item in the survey. Your questions will be answered to your satisfaction. Each survey questionnaire will be assigned a unique number based on the seat plan for each grade level and section. This will be for statistical purposes only as some of you will choose to disagree in giving the researcher access to your grades. The above-mentioned procedure has been primarily made and intended for this study. The researcher assured you that all information gathered during this study will be private and strictly confidential.

4. INFORMATION ABOUT STUDY RISKS AND BENEFITS

What are the foreseeable risks and discomforts by taking part in the study?

During the conduct of the survey, there is a possibility that certain topics may cause minor discomfort or inconvenience because respondents may worry about being inaccurately assessed or evaluated on their knowledge and skills. The researcher would ease their concerns by explaining how the study's outcomes could be advantageous and helpful to their learning. They will be informed also that their participation is voluntary and that if ever they feel that there might be some potential risks, they can choose whether to participate or not. And if they choose to participate, they can choose to skip questions or stop participating, or discontinue answering if they find it uncomfortable or inconvenient already without incurring any fees or losing any benefits to which they may be entitled particularly to the study's outcome and potential applications.

What will the researchers do to protect the participants against these risks?

The researcher would explain to the participants/respondents every item in the survey. And to protect the participants/respondents, the researcher would read this informed consent signed by their parents, as well as the informed assent will be given to the participants/respondents since they are considered minors. The researcher will properly and thoroughly explain everything stated in the forms. However, if some issues may occur, the researcher will take the time to address these concerns as she is accessible both personally and virtually.

How could the participants benefit if they take part in the study?

The study's findings may benefit the respondents because they will gain an understanding of their information literacy competencies and assess how effective this is in their academic performance. The study's findings will be to the advantage of the respondents for it will provide necessary interventions in improving the information literacy instruction conducted by the library which will help the respondents in enhancing

their information literacy competencies.

How could others benefit?

The study will assist teachers in recognizing the strengths and weaknesses of secondary school students in terms of their information literacy, enabling them to devise effective teaching methods in this domain. Librarians, especially those working in school libraries, can evaluate and analyze their information literacy lessons to identify areas for improvement. By enhancing their instructions, they can promote the development of information literacy skills among secondary students, which can prove helpful and advantageous.

Do the participants have the right to refuse or withdraw from the study?

The participation of the respondents is entirely voluntary, and they are free to leave at any time if they find the research process uncomfortable, without incurring any fees or losing any benefits to which they might otherwise be entitled, particularly concerning the study's outcome and potential applications. The respondent should notify the researcher that he or she desires to withdraw from the study and may or may not provide a rationale or reasons for doing so.

5. CONFIDENTIALITY AND SHARING RESEARCH INFORMATION

How will the researchers protect the participants' information?

All the information gathered is solely for this study. The identity of the participants will be kept private and confidential to the extent provided by law. Their information will be assigned a unique number. The data collected will be stored with the utmost respect for their privacy and confidentiality.

What will happen to the information collected in the study?

Their information will be assigned a unique number which will be based on the seat plan created for every grade level and section. The data collected will be stored with the utmost respect for the respondents' privacy and confidentiality. The electronic copy of the data will be kept and only the researcher has the access to it and it will be protected with a user login and password. Hard copies will be stored in the personal file of the researcher. The data collected will be stored while data analysis is still in progress and will be destroyed after a certain period.

Who will have access to the research records/information?

Only the researcher, research adviser, and statistician have access to the raw data. The information will be tabulated, analyzed, and interpreted while maintaining confidentiality. The researcher ensured that communication with the respondents would be transparent and open.

Will the information be used for future research or shared with others?

The finding of the study will also serve future researchers as a reference to the existing body of knowledge related to the field of study.

6. WHOM TO CONTACT

Name of Researcher/s: *Lorelie A. Oregano*
Email: *lorelie.oregano-20@cpu.edu.ph/lorsoregano@btcsi.edu.ph*
Phone: *0923 577 5055*

Faculty Advisor: *Elisa V. Garcia, RL, PhD*
Email: *lyzzavinco@gmail.com*
Phone: *0921 670 9420*

Study Coordinator: *Professor Ana Mae B. Cantel, RL, MLIS*
Email: *ambcantel@cpu.edu.ph*
Phone: *0956 238 0475*

7. CERTIFICATE OF ASSENT

I have read the foregoing information, or it has been read and explained to me in a language/dialect I know and understand. I have had my questions answered and know that I can ask questions later if I have them. I assent voluntarily to be a participant in this study.

Print Name of Child _____

Signature of Child _____

Date _____
Day/month/year

Parent/Guardian has signed an informed consent ___**Yes** ___**No**

Statement by the researcher/person taking consent

I have accurately read out the information sheet to the potential participant, and to the best of my ability made sure that the participant understands and that the following will be done:

1. *The respondents will be given enough time to understand the contents of the informed consent/assent.*
2. *The researcher will explain the process of the survey and how it should be done*
3. *The researcher will explain each item to be answered in the survey.*
4. *The researcher will guard the identity and the information gathered will be kept confidential*
5. *The study will begin once the informed consent/assent form has been signed*

I confirm that the participant was given an opportunity to ask questions about the study, and all the questions asked by the participant have been answered correctly and to the best of my ability. I confirm that the individual has not been coerced into giving assent, and the assent has been given freely and voluntarily.

A copy of this assent form has been provided to the participant.

Print Name of Researcher/person taking the assent LORELIE A. OREGANO

Signature of Researcher /person taking the assent _____

Date **23 May 2023**
Day/Month/Year

Informed Assent Form for the Respondents in Hiligaynon Version

Research Ethics Committee
Central Philippine University

PORMA SANG PAGPAHIBALO SANG PAG-UGYON (IAF)
(para sa mga kabataan/menor de edad)
(Pagahimu-on sang Partisipante/Nagapakigbahin)

1. IMPORMASYON NAHANUNGOD SA "RESEARCHER" UKON NAGATUON KAG SA "STUDY" (GINATUN-AN)

Ang edad sang sini nga Grupo sang Partisipante: *Naga-edad 12 asta 18 anyos (Grades 7-12)*

Ang titulo sang Pagtuon: *Information Literacy Competency, Desired Mindset, and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction*

Ngalan sang Researcher/Nagatuon: *Lorelie A. Oregano*

Ang Manunudlo kag Manugbulig/Tagagiya: *Elisa V. Garcia, RL, MSLS, PhD*

Departmento/Kolehiyo: *Master's in Library and Information Science*

Institusyon: *Central Philippine University, Jaro, Iloilo City*

2. KATUYUAN SANG PAGTUON

Katuyuan sang Pagtuon:

Para mahibaluan ang ikasarang sa paggamit sang impormasyon sang mga estudyante sa sekondarya/hayskul kag kung ano ini ka epektibo sa ila pagtuon kag grado.

Ipaathag kung nga-a napili sila nga makigbahin sa sini nga pagtuon/pag-usisa.

Ang library nagahatag sang mga pagtudlo nahanungod sa paggamit sang impormasyon sa mga estudyante sa sekondarya/hayskul, tungod sina, katuyuan sang ini nga pag-usisa nga mahibaluan kung ano ka epektibo ang ini nga pagtudlo sa ila pagtuon kag grado.

Pila ka kabataan ang ginatuyo nga mag partisipar sa sini nga pagtuon?

Indi maglabaw ukon kabos sa 300 ka estudyante sa hayskul (halin Grado 7-12)

Ang Kalawigon sang Pagtuon:

Ang pagtuon pagahimuon halin sa bulan sang Mayo 2023 hasta sa Hulyo 2023.

3. ANG PAMAAGI/PROSESO SA SINI NGA PAGTUON

Ang "researcher" o manugtuon/manughusisa, maga hatag sang surbe (palamangkotanon) sa mga estudyante humalin grado 7 tubtub 12, kag tungod kamo katapo sang sini nga grupo, kamo pwede gid makapartisipar. Paga basahon ang kaundan sang "Informed Consent Forms" ukon Porma sang Pahanugot nga napirmahan sang inyo mga ginikanan. Ang surbe maga umpisa pagkatapos ninyo mag pirma sang sini nga "Informed Assent Forms" ukon ang Porma sang Pag-ugyon. Tagaan kamo sang nagakaigo nga tinion para mabasa kag ma-intyendihan ang mga pamangkot sa surbe.

Pagasabton man ang inyo pamangkot kung may ara. Magasugod sa pagsabat ang mga bata/estudyante pagkatapos nga napirmahan na ang porma sang pahanugot.

Ang survey natunga sa tatlo ka bahin. Sa una nga bahin makita ang impormasyon nahanungod sa inyo grado kag pamangkot nahanungod sa inyo pagtambong sa pagtudlo sang “information literacy instructions” ukon ang pagtudlo sg insakto nga paggamit kag pagkuha sang mga impormasyon. Diri man makita kun paano kamo nagtambong, “face-to-face ukon online.” Sa ikaduha nga bahin makita kun paano ang pag lantaw kag pag diskubre sang inyo mga kinaalam nahanungod sa insakto nga paggamit kag pag kuha sang husto nga mga impormasyon kada himo ninyo sg mga IL nga buluhaton ukon mga ulubrahon kag kun ano ang inyo panghunahuna nahanungod sini. Sa ikatatlo nga bahin nahanungod ini sa lebel sg inyo nga mga grado nga nabase sa pinaka ulihi nga resulta ukon ang “final general weighted average (GWA). Kag sa tinion nga wala pa ang inyo grado, ang researcher naga pangayo sang inyo pagtugot akon nga makuha in inga impormasyon sa record sg eskewelahan. Kung maghatag na kamo sang inyo pahatnugot, ang researcher magasulat sa school registrar sang iya pag-aprobar sang sini nga panghangyo.

Ang mga palamangkutanon sang survey ipagahatag sa kada lebel sang grado sang mga kabataan ukon estudyante. Ang kada pamangkot paga basahon kag ipaathag sang researcher. Ang mga partisipante ukon ang mga estudyante may kahilwayan sa pag sulat sang ila ngalan ukon indi. Ang kada papel may ara sang pinasahi nga numero para matandaan kag ini para sa “statistics” ukon estadistika lamang. Ang pasunod ukon proseso sang paghatag sini nga surbe nagakaigo lamang sa sini nga pagtuon kag ang mga impormasyon pribado kag ipaga-sekreto sang “researcher.”

4. IMPORMASYON NAHANUGOD SA RISGO KAG KABUDLAYAN SANG SINI NGA PAGTUON

Ano ang mga ginalantaw nga risgo ukon kabudlayan sa pagpartisipar sa sini nga pagtu-on?

May posibilidad nga ang mga topiko ukon mga tinaga sa sini nga pagtuon/paghusisa maka dulot sang gamay nga pagkabalaka kag pagkahuya tungod magpaminsar kamo nga magsala ang pagkilala sang inyo mga nahibaluan kag ikasarang. Tungod sina, ang researcher magpakalma sang inyo pagkabalaka paagi sa pagpaathag isa-isa sa mga pamangkot nga ara sa surbe para inyo gid ma intyendihan. Dugang pa, iklaro man sang researcher nga ang resulta sang sini nga pagtu-on mangin mapuslanon kag makabulig gid sa inyo ihibalo. Ipabalo man sa inyo nga ang inyo partisipasyon boluntaryo lamang kag kung inyo mabatyagan nga may madulot ini nga risgo, pwede gid kamo mag untat. Pero kung magdisisyon kamo nga magpartisipar, kag mabatyagan nyo nga may risgo, pwede gid ninyo laktawan ang mga pamangkot ukon mag-untat partisipar ukon sabat nga wala sang kabalak-an, bayaran ukon may madula nga benepisyo nga nagakadapat para sa inyo sa sini nga pagtuon.

Ano ang himuon sang researcher para ma protektahan ang mga partisipante sa possible nga risgo?

Ang researcher magapasalig sa magpartisipar nga wala sila dapat sang kahangaw-an kang kahuya-an kung ano gid man ang ila nga isabat sa surbe tungod ang

tanan nga impormasyon kompidensial ukon pagataguon. Ang researcher maga esplikar/paathag nga ang resulta lamang amo ang gamiton sa pagtu-on. Kung may ara gid man pamangkot ukon kabalaka, ang researcher magahatag gid sang tinion sa pag-atubang kag pagsabat sini kay siya handa man personal ukon virtual.

Ano ang kaayuhan nga makuha/mabaton sang mga partisipante sa sin inga pagtuon?

Ang resulta sang pagtuon magahatag sang kaayuhan sa mga partisipante tungod sila makaintyendi sang ila ikasarang nahanungod sa ensakto nga paggamit sang impormasyon kag makahibalo sila kung ini bala makabulig sa ila pagtuon kag grado. Kag ini makabentaha man sa ila kay makabulig ini pagpa-uswag sang pagtudlo sang library sa paggamit sang impormasyon, agud sila mabuligan sa sini nga buluhaton.

Paano ang iban mabuligan sini nga pagtuon?

Ang resulta sang sin inga pagtuon magabulig man sa mga manunudlo sa pagkilala sang ikasarang kag kaluyahon sang mga hayskul nga estudyante sa ila nga nahibaluan sa paggamit sang impormasyon, makahimu sila sang epektibo nga pamaagi sa pagtudlo. Ang mga laybrarians, ilabi na ang nagaobra sa mga libraries para sa mga kabataan, ila husisaon ukon binagbinagon ang ila nga pagtudlo sang sini nga mga leksyon kag makita ang mga dapat pa ayuhon kag namion. Sa pag-ayo kag pagpanami sang ila nga pagtudlo, ila ma pakita kag mahimu ang pag pauswag sang mga ikasarang sa paggamit sang impormasyon sang mga hayskul nga estudyante nga mangin mapuslanon kag magabulig gis sa ila pagtu-on.

May kahilwayan bala ang mga partisipante nga magpangindi, mag-untat ukon magbiya sa pagtuon?

Bulontaryo ang pag intra ninyo sini nga pagtuon, hilway kamo mag-untat bisan ano oras. Kag wala sang pinalidad ukon ano man nga klase sang konsekwensya kag indi kamo pangayuan sang kung ano pa man nga rason. Kun indi kamo mag partisipar, ang mga impormasyon nahanungod sa inyo, pagaseparahon kag pagadulaon sa ensakto nga pamaagi.

5. PAGTAGO KAG PAGHATAG SANG IMPORMASYON SA SINI NGA PAGTUON

Paano amligan sang researcher ang impormasyon sang mga partisipante?

Ang tanan nga impormasyon nga matipon para lamang sa pagtu-on. Ang pagkilala sa mga partisipante kabigon nga pribado kag pagataguon nga amo man ang gina saad sang laye. Ang ila mga impormasyon pagahatagan sang isa ka pinasahi nga numero. Ang mga datos nga matipon pagataguon nga may pag-amlig sang pagkapribado.

Ano ang matabu sa mga impormasyon nga matipon sa pagtuon?

Ang tanan nga impormasyon nga matipon hatagan sang pinasahi nga numero base sa ila nga pulungkuan nga gnahatag sa kada estudyante suno sa ila mga grado kag seksyon. Ang mga datos tipunon nga may pag-amlig sa pagkapribado sang mga partisipante. Ang “electronic copy” pagataguon kag ini pagaprotektahan sang “user log-in kag password” Pagataguon man sang researcher ang mga records nga na imprinta na. Ang mga datos nga natipon pagataguon samtang ang resulta gna proseso pa lang kag pagkatapos sini, ang ini nga mga datos igahaboy sa nagakaigo nga pamaagi.

Sin-o ang nagadumala sang mga datos/record sang mga impormasyon?

Ang researcher, adviser, kag statistician amo lamang ang makakita kag makahibalo sang mga wala pa ma proseso nga datos. Ang impormasyon nga matipon ipaga-listahon, husisaon kag interpretahon pero pagataguon man ini sa iban nga tawo. Ang researcher nagapasalig nga siya handa sa pakighambal sa mga partisipante, wala xa sang pagataguon sa ila ano man nga impormasyon ukon resulta.

Ang mga impormasyon bala mausar sa mga masunod nga pagtuon ukon mahatag sa iban?

Ang resulta sang sini nga pagtuon pwede gid usaron sang iban nga researchers sa ulihi kag ila maging basehan sang parehas man n inga sitwasyon ukon pagtuon.

6. SIN-O ANG PWEDE KONTAKON?

Ngalan sang Researcher/Nagatuon: *Lorelie A. Oregano*
Email: *lorelie.oregano-20@cpu.edu.ph/lorsoregano@btcsi.edu.ph*
Telepono: *0923 577 5055*
Ang Manunudlo kag Manugbulig/Tagagiya: *Elisa V. Garcia, RL, MSLS, PhD*
Email: *lyzzavinco@gmail.com*
Phone: *0921 670 9420*

Koordenitor/Manugpahituhog sa Pagtuon: *Professor Ana Mae B. Cantel, MLIS*
Email: *ambcantel@cpu.edu.ph*
Telepono: *0956 238 0475*

7. SERTIPIKO SANG PAG-UGYON

Nabasahan kag napaathag sa akon ang mga impormasyon sa sini nga pagtuon sa lengwahe nga akon naintyendihan. May ara man ako sang kahigayunan sa pag pamangkot. Nagapasugot ako nga mag partisipar sa sini nga pagtuon.

Ngalan sang Bata/Partisipante _____

Pirma sang Bata/Patisipante _____

Petsa _____
(Adlaw/Bulan/Tuig)

Ang ginikanan nakapirma sa porma sang pagpahanugot ___**Huo** ___**Wala**

Ang mga ginapulong/hambalanon sang researcher nga nagakuha sang pahanugot

Akon nabasahan kag napaathag ang mga impormasyon sa magapartisipar. Kag sa akon masarangan, akon gid ginapat-ud nga naintyendiha sang mga partisipante, kag amo ni ang akon pagahimuon:

1. Ang mga partisipante pagahatagan sang nagakaigo nga tyempo para ma intyendihan and mga kaundan sang sin inga pagpahibalo sang pag-ugyon
2. Ang researcher magapa-athag sang proseso sang surbe kag kung ano ang dapat himuon.
3. Ang researcher magapa-athag isa-isa sang mga dapat sabton sa surbe.
4. Ang researcher magabantay kag magtago sang pagkatawo kag sang impormasyon nga natipon

5. Ang pagtuon maga umpisa matapos nga ang pagpahibalo sang pag-ugyon napirmahan sang mga kabataan/partisipante

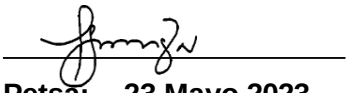
Gina kompirmar ko nga ginhatagan ko ang mga partisipante sang kahigayunan nga makapamangkot nahanungod sa pagtuon, kag ang ila mga pamangkot akon nasabtan sang ensakto suno sa akon masarangan. Gina kompirmar ko nga ang kada isa wala ginpilit sang ila nga pagpasugot, kag ang ila pagpasugot ginhimo nila nga hilway kag boluntaryo.

Ginhatagan sang sini nga kopya ang mga partisipante.

Ngalan sang Researcher/Nagatuon/Nagakuha sang inyo Pagsugot

LORELIE A. OREGANO

Pirma sang Researcher/Nagatuon/Nagakuha sang inyo Pagsugot



Petsa: 23 Mayo 2023

(Adlaw/Bulan/Tuig**)**

Appendix G

Informed Consent Form for the Parents/Guardians in English Version

Research Ethics Committee
Central Philippine University

INFORMED CONSENT FORM (ICF)
(VERSION No. 01-2021)
(TO BE ACCOMPLISHED BY THE PARENTS/GUARDIANS)

1. KEY INFORMATION ABOUT THE RESEARCHER AND THE

Title of the Study: *Information Literacy Competency, Desired Mindset, and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction*

Name of Researcher: *Lorelie A. Oregano*
Research Adviser: *Elisa V. Garcia, RL, PhD*
Department/College: *Master's in Library and Information Science*
Institution: *Central Philippine University, Iloilo City*

2. INTRODUCTION

I am *Lorelie A. Oregano*, a*n MLIS student* of *Central Philippine University* who is currently conducting a study on *"Information Literacy Competencies and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction.*"

3. BACKGROUND AND PURPOSE OF THE STUDY

For many years, the high school librarian has been conducting library information literacy instruction to the secondary students. These instructions were conducted in various topics and subjects even during the pandemic. It's been the desire of the library that it can augment the learning of the students, especially in their information literacy. This library information literacy instruction is collaborative teaching with the faculty to help the students develop information literacy. Thus, this study is conducted to assess the current level of information literacy competencies of secondary students in a private Christian basic education institution in terms of their performance of information literacy activities and mindsets, and to determine the relationship between the effectiveness of students' information literacy competencies and their academic performance. Also, this study aims to assist librarians in evaluating the library information literacy instructions and if these are really beneficial to the learning of the students.

Moreover, the results of this study will serve as a guide in order to apply necessary interventions such as improving and updating the information literacy instructions or even introducing some literacy programs if necessary to help the students

in developing their information literacy competencies.

Thus, the researcher is requesting you parents that you will give your consent to let your child/children participate in this study.

4. PROCEDURE OF THE STUDY

The researcher will conduct the survey to the respondents from grades 7 to 12. She will read the contents of the informed consent forms signed by the parents/ guardians and explain the informed assent forms to the respondents before asking for their participation. The participants/respondents will also be given enough time to read and understand each item in the survey. Their questions will be answered to their satisfaction. The study will begin once the informed consent form has been signed. The study will include a survey questionnaire in 3 parts.

The 1st part consists of the demographic profile which includes the student's grade level, and questions pertaining to their attendance to the library information literacy instructions conducted by the library, whether they have attended or have not attended; and the other one is the mode when they attended this instruction either face-to-face or online.

The 2nd part is their self-assessment of the current level of their information literacy competencies when performing the IL activities and the desired mindsets necessary for performing these IL activities.

The 3rd part pertains to the level of their academic performance in terms of the final general weighted average (GWA). In cases where the final GWA is not yet obtainable, the researcher seeks approval to retrieve this information from the school registrar's database. The researcher wishes to give you the assurance that any information gathered will be kept strictly confidential and used solely for the purpose of research.

The survey questionnaire will be conducted by grade level and each item in the questionnaire will be read and explained by the researcher. Each participant/respondent will be given the option to indicate their name or not. Each survey questionnaire will be assigned a unique number for statistical purposes only. The above-mentioned procedure has been primarily made and intended for the purpose of this study. All information gathered during this study will be kept private and strictly confidential.

5. VOLUNTARINESS OF PARTICIPATION

Your child's participation in this study is entirely voluntary. It is your choice whether you let them participate or not. The study allows adequate time and the ability to freely consider whether they wish to take part or not. If they choose not to participate or to withdraw from the study at any time, there will be no penalty or other consequences, and without need to give any reason. If at any time they withdraw from the study, their data will be separated and discarded properly.

6. RISKS AND INCONVENIENCES

There is a possibility that certain topics or statements in the survey questionnaire

may cause minor discomfort or inconvenience because respondents may worry about being inaccurately assessed or evaluated on their knowledge and skills. Thus, the researcher would ease their concerns by explaining how the study's outcomes could be advantageous and helpful to their learning. And to protect the participants/respondents, the researcher would read this informed consent addressed to you, parents, and the informed assent given to the participants/respondents since they are considered minors. The researcher will properly and thoroughly explain everything stated in the forms.

The researcher would explain to the participants/respondents that their participation is voluntary and that there might be some potential risks of so that they can choose whether to participate or not. And if they choose to participate, they can choose to skip questions or stop participating, or discontinue answering if they find it uncomfortable or inconvenient already without incurring any fees or losing any benefits to which they may be entitled particularly to the study's outcome and potential applications.

7. BENEFITS

This study's findings may benefit the students as the participants/respondents because they will gain an understanding of their information literacy competencies and assess how effective this is in their academic performance. It will also provide necessary interventions in improving the information literacy instruction conducted by the library which will help the students in enhancing their information literacy competencies.

8. COSTS AND COMPENSATION

There is no amount that is needed to pay in joining this study. There is also no compensation of any form that will be granted to any participant in this study. All accumulated expenses and resources spent in the study are directly covered and provided for by the researcher herself and with the assistance of the institution with which the researcher is affiliated.

9. PROVISION FOR INJURY OR RELATED ILLNESS

During the conduct of the survey, there is no possibility that certain topics may cause injury or related illness. The researcher makes sure that the survey questionnaire is written in simple and clear statements so that participants/respondents can comprehend what the survey instrument is seeking to gather. However, if this occurs, the researcher will take the time to address these concerns as she is accessible both personally and virtually.

10. PRIVACY AND CONFIDENTIALITY

All the information gathered is solely for the purpose of this study. The identity of the participants will be kept private and confidential to the extent provided by law. Their information will be assigned a unique number. The data collected will be stored with the utmost respect for their privacy and confidentiality. The electronic copy of the data will be kept that only the researcher(s) has/have access to and it is protected with a user login and password. Hard copies will be stored in the personal file of the researcher.

The data collected will be stored while data analysis is still in progress and will be destroyed after that period of time. Following research completion, the participants/ respondents will have access to the findings via a forum. The results of this study will also be presented to the administration and the faculty of the institution where the study is conducted to correct some areas of concern.

11. WHOM TO CONTACT?

If you have any questions or clarifications regarding your child/children's participation in the study, you may contact the researcher:

Principal Investigator: **LORELIE A. OREGANO**
Address: **DR. BI CHIN UY LEARNING RESOURCE CENTER TRINITY CHRISTIAN SCHOOL, VILLA ANGELA SUBD., BRGY. VILLAMONTE, BACOLOD CITY**
Contact number: **0923 577 5055**
E-mail: **lorelie.oregano-20@cpu.edu.ph / lorsoregano@btcsi.edu.ph**

If you have questions pertaining to the rights of your child/children as a participant, you may contact:

Chair, CPU Research Ethics Committee
Email: researchethics@cpu.edu.ph
Phone: 329-1971 (local 3336)

12. CERTIFICATE OF CONSENT

I have read the foregoing information, or it has been read and explained to me in a language/dialect I know and understand. I have had the opportunity to ask questions about it and any questions I have asked have been answered to my satisfaction. I consent voluntarily to be a participant in this study.

Print name of participant (student)_____

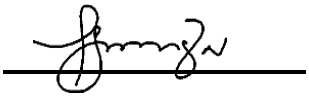
Signature of participant's parents _____

Date (day/month/year) _____

Statement by the researcher/person taking consent (if applicable):

I confirm that the participant was given an opportunity to ask questions about the study, and all the questions asked by the participant have been answered correctly and to the best of my ability. I confirm that the individual has not been coerced into giving consent, and the consent has been given freely and voluntarily. A copy of this ICF has been provided to the participant.

Print Name of Researcher/person taking the consent: **LORELIE A. OREGANO**

Signature of Researcher /person taking the consent: 

Date: **23 May 2023**
(Day/Month/Year)

Informed Consent Form for the Parents/Guardians in Hiligaynon Version

Research Ethics Committee
Central Philippine University

PORMA SANG PAGPAHIBALO SANG PAHANUGOT (ICF)
(VERSION No. 01-2021)

(PAGAHIMUON SG MGA GINIKANAN/TAGABANTAY)

1. ANG IMPORMASYON NAHANUNGOD SA "RESEARCHER" (NAGATUON) KAG SA IYA GINATUN-AN

Title of the Study: *Information Literacy Competency, Desired Mindset, and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction*

Ngalan sang Researcher ukon Nagatuon: *Lorelie A. Oregano*
Ang Manunudlo kag Manugbulig/Tagagiya: *Elisa V. Garcia, RL, PhD*
Departmento/Kolehiyo: *Master's in Library and Information Science*
Institusyon: *Central Philippine University, Jaro, Iloilo City*

2. INTRODUKSIYON

Ako si Lorelie A. Oregano, ang "researcher" isa ka estudyante sa Masters in Library and Information Science sa Central Philippine University sa Iloilo City nga sa sining tion nagahusisa/nagatuon parti sa *Information Literacy Competencies and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction*

3. ANG GINHALINAN KAG KATUYUAN SG PAGTU-ON KAG PAGHUSISA

Sa madamu na nga tinuig, ang hayskul laybraryan naga hatag sg pagtuon nahanungod sa pag gamit sang impormasyon. Ginahandum gid sang library nga makabulig sa pagtuon sng mga estudyante ilabi na ang parti sa paggamit sg impormasyon. Ini nga pagtuon nga ginahatag sang laybraryan upod ini sa mga manunudlo. Ang ini nga pagtuon ginhimu agud nga mahibalu-an ang lebel sang ikasarang sa paggamit sang impormasyon sg mga hayskul nga estudyante sa isa ka pribado kag Kristiyano nga eskwelahan. Ini nabasi sa ila nasari-nasari nga ginhimo sa pagggamit sang impormasyon kag panghunahuna kag pamatasan nahanungod sini.

Ang ini nga pagtu-on naga handom nga matukiban ang koneksyon sang pagka epektibo sang ikasarang sang paggamit sang impormasyon kag resulta sang pagtuon sang mga estudyante sa hayskul.

Ini man makabulig sa mga laybraryan para matakus ang pagkakilanlan sang ihibalo sang mga estudyante sa paggamit sang insakto nga impormasyon kag ini bala nakabulig man sa ila pagtuon.

Dugang pa sini, ang resulta sang sini nga pagtuon mangin giya sa pag paayo

pagid sang pagtudlo nahanungod sa insakto nga paggamit sang impormasyon.

Gani, ang “researcher” ukon naga tuon sini, naga hangyo gid sa inyo bulig, mga ginikanan nga pasugtan ninyo ang inyo kabataan sa pagpa-intra sa ila sini nga pagtuon/paghusisa.

4. ANG PAMAAGI/PROSESO SA SINI NGA PAGTUON

Ang researcher, maga hatag sang surbe (palamangkotanon) sa mga estudyante humalin grade 7 tubtub 12. Paga basahon niya anay ang kaundan sang porma sang pahanugot kag pag-ugyon (informed consent and assent) nga napirmahan sang mga ginikanan antes ang mga kabataan maghatag sang ila sabat.

Tagaan ang mga kabataan sang nagakaigo nga tinion para mabasa kag ma-intyendihan ang mga pamangkot sa surbe. Pagasabton man ang ila pamangkot kung may ara. Magasugod sa pagsabat ang mga bata/estudyante pagkatapos nga napirmahan na ang porma sang pahanugot kag pag-ugyon. Ang surbe natunga sa tatlo ka bahin.

Sa una nga bahin makita ang impormasyon nahanungod sa mga kabataan. Kun ano ang ila grado kag pagtambong sa pagtudlo sang “information literacy instructions” ukon ang pagtudlo sg insakto nga paggamit kag pagkuha sang mga impormasyon. Diri man makita kun paano sila nagtambong “face-to-face ukon online.”

Sa ikaduha nga bahin makita kun paano ang pag lantaw kag pag diskubre sang mga estudyante sa ila kinaalam ukon ikasarang nahanungod sa insakto nga paggamit kag pag kuha sang husto nga mga impormasyon kada himo nila sg mga IL nga buluhaton ukon mga ulubrahon kag kun ano ang ila panghunahuna nahanungod sini.

Sa ikatatlo nga bahin nahanungod ini sa lebel sg ila nga mga grado nga nabase sa pinaka ulihi nga resulta ukon ang “final general weighted average (GWA). Kun ini nga grado indi pa makuha sa sini nga tinion, ginahangyo sang naga-usisa o nagatuon nga maka pangayo sang pag-aprobar sang nagadumala ukon registrador sang eskwelahan. Ang “researcher” nagapasalig nga ang mga grado sang mga bata kag ang ila importante nga mga impormasyon paga halungan kag pagatipigan nga indi ini makita sang iban nga tawo kag ini gamiton lamang para sa sini nga pagtuon kag paghusisa.

Ang mga palamangkutanon sang surbe ipagahatag sa kada lebel sang grado sang mga kabataan ukon estudyante. Ang kada pamangkot paga basahon kag ipaathag sang researcher. Ang mga partisipante ukon ang mga estudyante may kahilwayan sa pag sulat sang ila ngalan ukon indi. Ang kada papel may ara sang pinasahi nga numero para matandaan kag ini para sa “statistics” ukon estadistika lamang. Ang pasunod ukon proseso sang paghatag sini nga surbe nagakaigo lamang sa sini nga pagtuon kag ang mga impormasyon pribado kag ipaga-sekreto sang researcher.

5. ANG BOLUNTARYO UKON KINABUBUT-ON SA PAGPARTISIPAR

Bulontaryo ang pag intra sang inyo kabataan sa sini nga pagtuon kag wala sang pinalidad ukon ano man nga klase sang konsekwensya kag indi sila pangayuan sang kung ano pa man nga rason. Kun indi ang inyo bata mag partisipar, ang mga

impormasyon nahanungod sa ila pagaseparahon kag pagadulaon sa ensakto nga pamaagi.

6. RISGO KAG KABUDLAYAN

May posibilidad nga ang mga topiko ukon mga tinaga sa sini nga pagtuon/paghusisa maka dulot sang gamay nga pagkabalaka kag pagkahuya tungod ang mga naga partisipar magpaminsar nga magsala ang pagkilala sang ila nga mga nahibaluan kag ikasarang. Agud ma protektaran ang mga kabataan, paga basahon ini nga porma sang pahanugot ninyo nga mga ginikanan kag ang porma sg pag-ugyon nila nga mga kabataan tungod sila makabig pa naton nga mga menor de edad pa lamang.

Ang manugtuon/manughusisa maga paathag gid sa kabataan nga ang ila partisipasyon boluntaryo lamang kag basi may posibilidad nga magadala ini sang risgo. Pwede gid sila ka pangindi kun indi sila. Kag kung magdesisyon sila nga maga partisipar, kag kun pananglitan nga may mabasahan sila nga daw sa ila pamatyag indi sila komportable pwede gid nila laktawan ukon di gani untatan ang pagsabat. Wala ini sang bayad kag indi man sila madulaan sang benepisyo nga nagakadapat para sa ila kun matapos na ang ini nga pagtuon/paghusisa.

7. BENEPISYO

Ang ini nga pagtuon magahatag gid sang benepisyo sa mga estudyante kay magadulot ini sa ila sang insakto nga paghangop sang ila ikasarang sa paggamit kag pagkuha sang mapuslanon nga mga impormasyon kag kun ini bala nakabulig sa ila pagtuon. Magahatag man ini sa “library’ sang mga pwede mahimo para mapaayo pa gid ang pagtudlo sa insakto nga paggamit kag pagkuha sang impormasyon.

8. GALASTUHAN KAG BALAYRAN

Ang ini nga pagtuon wala sang bayad kag wala man sang may sweldohan sa maga partisipar. Ang tanan nga galastuhan iya sang nagatuon/nagahusisa kag may bulig nga halin sa institusyon kun sa diin siya nagatrabaho.

9. TIKANG PARA MALIKAWAN ANG HALIT

Wala man sang posibilidad nga ang mga topiko sa sini nga pagtuon makahatag sang halit ukon pamalatian sa maga naga partisipar. Ang manugtuon sini naga sigurado nga klaro kag simple ang mga ginpahayag sa mga pamangkot para dali maintyendihan sang mga naga sabat diri. Pero kung may matabu gid man sa sini nga sitwasyon, ang manugtuon handa maghatag sang tinion para ini masabat, personal man ukon sa “virtual.”

10. PAGKAPRIBADO KAG PAGKATAGO

Ang tanan nga mga na tipon nga impormasyon paga gamiton lamang sa sini nga pagtuon. Ang pagkakilanlan sang mga partisipante magapabilin nga tago suno sa layi. Ang kada impormasyon may nagakaigo nga numero. Pagataguon kag sekretuhon ang mga impormasyon nga makuha. Ang “electronic” nga kopya sang impormasyon

pagataguon sang nagatuon sini kag ini protektado sang “user login kag password.” Ang mga kopya sa papel ipagabutang sang polder. Pagkatapos nga mahusisa ang resulta sang pagtuon, ang ini nga mga kopya pagadulaon ukon pagasunugon. Ang partisipante maka hibalo sang resulta sang pagtuon paagi sa isa ka hinun-anon ukon forum. Ang resulta ipagapresentar ini sa administrasyon kag mga manunudlo sang eskwelahan sa diin ini nga pagtuon ginhimu para mahusisa kag matadlong ukon improbar kung kinahanglanon.

11. SIN-O ANG PWEDE MATAWGAN?

Kun may ara kamo sang i-klaro kag mga pamangkot, pwede ninyo ako ma kontak sa sini nga impormasyon

Ang naga-imbistigar: *LORELIE A. OREGANO*
Adres/Direksyon: *DR. BI CHIN UY LEARNING RESOURCE CENTER*
TRINITY CHRISTIAN SCHOOL, VILLA ANGELA SUBD.,
BRGY. VILLAMONTE, BACOLOD CITY
Contact number: *0923 577 5055*
E-mail: *lorelie.oregano-20@cpu.edu.ph/lorsoregano@btcsi.edu.ph*

Kun may ara kamo sang i-klaro kag mga pamangkot nahanungod sa kinamatarung sang inyo kabataan, pwede ninyo ma kontak:

Chair, CPU Research Ethics Committee
Email: researchethics@cpu.edu.ph
Phone: 329-1971 (local 3336)

12. SERTIPIKO SANG PAGPAHANUGOT

Nabasahan kag napaathag sa akon ang mga impormasyon sa sini nga pagtuon sa lengwahe nga akon naintyendihan. May ara man ako sang kahigayunan sa pag pamangkot. Nagapasugot ako nga mag partisipar sa sini nga pagtuon.

Ngalan sang Partisipante/Estudyante: _____

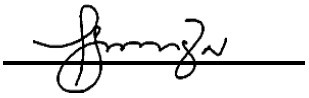
Pirma sang Ginikanan sang Partisipante/Estudyante: _____

Petsa (adlaw/bulan/tuig): _____

Pahayag sang manugtuon nga gapangayo sang pahanugot (kun nagakadapat):

Gina kumpirma ko nga ang mga partisipante may kahigayunan nga mag pamangkot nahanungod sa sini nga pagtuon. Nasabat man sang insakto ang ila mga pamangkot sa akon masarangan. Gina kumpirma ko man nga wala ang mga partisipante ginpilit sa paghatag sang ila pahanugot kundi sila ang naghatag sini sa ila kinabubut-on. May nahatag man nga kopya sining Porma sang Pahanugot sa mga partisipante.

Ngalan sang Researcher/nagakuha sang pahanugot: ***LORELIE A. OREGANO***

Pirma sang Researcher/nagakuha sang pahanugot: 

Petsa: ***23 Mayo 2023***
(Adlaw/Bulan/Tuig)

Appendix H

Research Questionnaire

"Information Literacy Competency, Desired Mindset, and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction"

Dear Respondents,

The researcher is currently conducting the above study as part of the requirements of the Master's in Library and Information Science curriculum of Central Philippine University. The study aims to obtain a better understanding of the level of information literacy competency and desired mindset of secondary students and its effectiveness to their academic performance.

The study's findings will serve as a guide in order to apply necessary interventions such as improving and updating the library information literacy instructions or even introducing some literacy programs if necessary to help you, students, in developing your information literacy competencies.

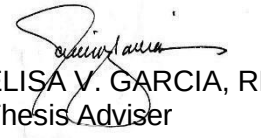
As one of the selected respondents, you are invited to kindly answer all the questions asked below with all honesty and compliance. Please do not leave any item unanswered. The researcher will ensure that all information you will be providing will be kept strictly confidential along with other conditions stated in the informed assent and consent given to you.

Thank you for taking part in this research study.

Sincerely,

LORELIE A. OREGANO
Researcher
MLIS Student
Central Philippine University

Noted by:



ELISA V. GARCIA, RL, PhD
Thesis Adviser

If you have any inquiries, please contact me through
lorsoregano@btcsi.edu.ph
09235775055 / 09639059777

CONSENT TO PARTICIPATE IN RESEARCH

Instruction: Please check all the boxes to confirm your agreement.

- ☐ I voluntarily agree to participate in this research study.
- ☐ I confirm that I have read and understood the questionnaire and have had the opportunity to ask questions.
- ☐ I understand that my participation is voluntary and that I am free to withdraw at any time without giving any reason and without there being any negative consequences. In addition, should not wish to answer any particular question or questions, I am free to decline.
- ☐ I understand that my responses will be kept strictly confidential. I understand that my name will not be linked with the research materials, and will not be identified or identifiable in the report or reports that result from the research.
- ☐ I agree that my anonymized data will be kept for future research purposes such as publications related to this study after the completion of the study.

PART 1: *RESPONDENT'S DEMOGRAPHIC PROFILE*

Instruction: Read each item carefully, supply the necessary information and put a TICK (√) inside the box which is most applicable to you.

Name (Optional):

_____

1. Grade Level ☐ Grade 7 ☐ Grade 8 ☐ Grade 9
   ☐ Grade 10 ☐ Grade 11 ☐ Grade 12
2. Have you attended the information literacy instructions conducted by the librarian? ☐ Yes ☐ No
3. What is the mode of information literacy instruction that have you attended?
   ☐ Face-to-face Mode ☐ Online Mode

PART 2: *SELF-ASSESSMENT OF THE CURRENT LEVEL OF INFORMATION LITERACY COMPETENCIES*

Instruction: Please indicate your perception of your level of information literacy in each area using the following scale:

1 – Novice	2 – Beginner	3 - Proficient	4 - Advanced	5 – Expert
ILC have not yet demonstrated appropriately	*ILC is beginning to develop*	*ILC is average and satisfactory*	*ILC is advanced and above standard*	*ILC is outstanding, beyond expectation*
Not yet competent; and have no knowledge or ability; not able to perform also	Somehow competent; has a little knowledge; and able to perform if supervised	Surely Competent; has adequate knowledge and ability to perform with less supervision	Positively competent; has advanced knowledge and ability; able to perform with no supervision	Absolutely competent; has expert knowledge and ability; performance exceeds expectation

SECTION A: Information Literacy Competencies (5 Categories of Information Literacy Activities)	**1**	**2**	**3**	**4**	**5**
#1 Defining information tasks and analyzing information gaps					
1. I understand the questions/problems presented in the task					
2. I can recognize the main idea/s or the concept/s of the given task					
3. I know the purpose of the task and what should be accomplished/performed.					
4. I can identify the details/information needed to respond and finish the task					
#2 Selecting information sources	**1**	**2**	**3**	**4**	**5**
5. I understand where to look for the information required for the task.					
6. I can determine which sources will provide answers to the questions or problems.					
7. I know when to consult a dictionary, encyclopedia, or any other references.					
8. I am familiar with the library's resources and how they are classified or organized using call numbers.					
9. I am able to make sense of both primary and secondary sources of knowledge. 10. can understand the primary and secondary sources of information					

11. I know how to conduct an effective internet search in order to find exactly what I'm looking for.					
#3 Seeking and evaluating information from the selected information sources	**1**	**2**	**3**	**4**	**5**
12. I understand how to determine whether the information gathered is relevant and capable of answering the task at hand.					
13. I know the techniques of searching online information such as phrase searching, use of truncations & wildcards & Boolean operators					
14. I am able to narrow search results					
15. I am able to expand my search parameters or limitations					
16. I can evaluate the validity of the source by looking at the URL and domain names.					
17. I can tell if the information comes from an expert, and well-respected author, creator, and publisher					
18. I can identify if the information and its source is current, relevant, and appropriate to my task.					
19. I can determine the source's motive for providing information, such as whether they present biased information.					
20. I am able to evaluate information content either print or online resources using evaluation criteria tools.					
#4 Synthesizing and using information	**1**	**2**	**3**	**4**	**5**
21. I can draw information from sources and create new ideas					
22. I can recognize the main ideas and connect them to subordinate ideas.					
23. I can contrast concepts with different ideas					
24. I can distinguish between fact, view or opinion					

25. I know how to synthesize the information gathered by putting together all the ideas and findings; before coming to a general point, observations and conclusions.					
#5 Appraising the information process and end product	**1**	**2**	**3**	**4**	**5**
26. I understand the basic rules of the APA 7th Edition In-Text Citation.					
27. I understand the basic rules of the APA 7th Edition Referencing					
28. I understand what is plagiarism					
29. I can organize research notes according to the format given in the task					
30. I have knowledge about legal restriction in gathering, using and sharing information such as copyright law, data privacy act and others.					
31. I am familiar with the evaluation criteria used to assess the quality of print and online information sources, such as CRAAP, and the 5Ws of Website Evaluation.					

Section B. The 3 (three) desired mindsets necessary to accomplish IL activities	**1**	**2**	**3**	**4**	**5**
a. Positive attitude to finish an information task I observe a positive attitude that encourages me to try new things, to be brave when brainstorming new ideas, and to look forward to working with others.					
b. Responsible collaboration for collective information seeking and use I am motivated to collaborate with others to complete information-seeking projects and to create systems to support such activities.					
c. Social responsibility for ethical information-seeking and utilization I am responsible for acting in a way that benefits society rather than just myself; my decisions and actions should benefit others, if not all.					

PART 3. THE LEVEL OF THE ACADEMIC PERFORMANCE IN TERMS OF THE FINAL GWA (GENERAL WEIGHTED AVERAGE)

Instructions: Please tick the box on which category is the level of your academic performance according to your final GWA (general weighted average):

☐	93 – Above	A	Advanced
☐	87 – 92	P	Proficient
☐	81 – 86	AP	Approaching Proficiency
☐	75 – 80	D	Developing
☐	74 – Below	B	Beginning

In case you do not have yet your final GWA, the researcher wishes to request permission to access this record from the database of the school registrar in order to retrieve this information quickly and correctly. Please tick the box below:

☐ Agree ☐ Disagree

Appendix I

Curriculum Vitae of the Researcher

CURRICULUM VITAE

LORELIE AMALLA OREGANO

Home Address	:	**B3, L31, P4, Charito Heights Subdivision** **Brgy. Granada, Bacolod City, Negros Occidental**
Contact Number	:	**0923 577 5055 / 0963 905 9777**
Email Address	:	**lorelie.oregano-20@cpu.edu.ph** **lorsoregano@btcsi.edu.ph** **jannylor67@yahoo.com**

PERSONAL DATA:

Sex	**:**	**Female**
Civil Status	**:**	**Married**
Citizenship	:	**Filipino**
Age	**:**	**56**
Date of Birth	**:**	**January 11, 1967**
Place of Birth	**:**	**Sipalay City, Negros Occidental**
Spouse Name	:	**Dionisio D. Oregano**

LICENSES/EXAMINATIONS PASSED:

- Librarian's Licensure Examination – License No. 006187 (November 2010)
- Civil Service Examination Passer – Professional Level (1990)

EDUCATION:

Graduate Studies	:	Master's in Library and Information Science Central Philippine University, Iloilo City 2024

College	:	Bachelor in Library and Information Science La Consolacion College – Bacolod Bacolod City, Negros Occidental 2010
	:	Supplemental units in Education West Negros University – Bacolod City La Consolacion College – Bacolod City 2009
	:	Bachelor of Commerce major in Data Processing West Negros University – Bacolod City 1988
Secondary	:	Holy Rosary Academy Sipalay City, Negros Occidental 1984
Elementary	:	Genaro P. Alvarez Elementary School Sipalay City, Negros Occidental 1980

WORK EXPERIENCES:

- **Head Librarian**
  Dr. Bi Chin Uy Learning Resource Center – TCS Library
  Bacolod Trinity Christian School, Inc., Bacolod City
  June 2020 up to the present

- **High School Librarian**
  Dr. Bi Chin Uy Learning Resource Center – TCS Library
  Bacolod Trinity Christian School, Inc., Bacolod City
  May 1997 – May 2020

- **Data Encoder/Loans Officer**
  Marinduque Mining Corporation
  Sipalay Mines, Brgy. San Jose
  Sipalay City, Neg. Occ.
  1989 – 1996

PROFESSIONAL AFFILIATION:

NOCLA (Negros Occidental Librarians' Association)

PASLI (Philippine Association of School Librarians, Inc.)

PLAI-NIRLC (Philippine Librarians Association, Inc. - Negros Island Region Librarians Council)

Appendix J

Decision Letter

Central Philippine University	RESEARCH ETHICS COMMITTEE	
	REC DECISION FORM	REC Form No. 22-1 Version No.: 03 Date of Effectivity: 29 July 2022

Date: April 20,2023

NAME OF PROPONENT: **LORELIE A. OREGANO**

Institution: CENTRAL PHILIPPINE UNIVERSITY

Re: *"INFORMATION LITERACY COMPETENCIES AND ACADEMIC PERFORMANCE OF SECONDARY STUDENTS: BASIS FOR ENHANCED LIBRARY INFORMATION LITERACY INSTRUCTION"*

REC code: 2023-74-MS-OREGANO

Dear Ms. Oregano

This is to acknowledge receipt of your request and the following supporting documents dated **March 01, 2023**:

1. Letter of application for research ethics review addressed to CPU- REC Chair
2. Accomplished REC Application (Form 07-1)
3. Full protocol/Research proposal (Chapters 1, 2 and 3) with references.
4. Validated Research Instrument/Questionnaire for Quantitative Research
5. Certificate of Validation for researcher-made questionnaire preferably from (3) three experts in the field, not by the adviser and panel members
6. Informed Consent Form (CPU-REC template)
7. Assent Form for minor respondents/participants (CPU-REC template)
8. Certificate of Technical Review/Approval sheet of proposal signed by (3) three members of the technical panel and the Dean
9. Turnitin Similarity Certificate from CPU-RCECC
10. Budget (if applicable)
11. Curriculum Vitae/Resume of the Researcher/Investigator and Co-Researchers with 2x2 photograph
12. GANTT Chart/Timelines/Table of schedule
13. Official Receipt of Ethics Review paid to Account No. A098
14. Two (2) Hard Copies *(Soft Bound in Blue or Black cover)* of the above documents placed inside a long clear plastic envelope
15. Soft Copy of the above documents emailed to researchethics@cpu.edu.ph

The above documents underwent **Full Review** which generated the following list of recommendations:

1. Please implement Arial 11 to all parts of the manuscript.
2. Please ensure compliance with pagination format. For example, the first page of Chapter 1 must be page 1 (but not indicated).
3. For the paradigm, it is suggested that the categories will not be included.

- *This form contains the CPU-REC recommendations. Please comply within (15) days and wait for the Ethical Clearance before the conduct of the study.*

4. The chapter 2 of the study requires work. To support the discussion, the research or the body of literature must be expanded. Chapter 2 should include more studies.
5. Please revise date of conduct of study in the Scope & Limitation section, as second semester is already ending
6. Under the Ethical Considerations, include discussion on
   - risk & benefit assessment by identifying the type of risk expected from your respondents . You may choose from the following (negligible risk, low risk, minimal risk, more than minimal risk, moderate risk or high risk) and explain how to mitigate such. .
   -Suggest to state that the Assent Form must be accomplished by the child respondent. Consent Form will be accomplished by the parents/guardians
   - disclosure or declaration of potential conflicts of interest
   - Since Google Form will be used for the conduct of the study, clarify how a signed consent will be acquired. If you will opt for the use of electronically signed consent, discuss also.
7. In the Data gathering procedure state that a letter to the office-in charge (e.g. registrar) will be sent to access the GWA of the students .
8. Submit a copy of the approved letter from the office in-charge
9. For the Statistical Analysis, please include references for the interpretation of strength of correlation.
10. On Inform Consent Form:
   a. #2, #4, #5: remove the statement "allow your child to participate"
   b. #3, explain further on the "background" of the study
   c. #6, please add details on the possible risks & inconveniences, Example: There is a possibility that certain topics might come out which may cause anxiety, distress and agitation
   d. Submit translated ICF (Hiligaynon) version.

DECISION: [☐] Approved [☒] Minor revision
[☐] Disapproved [☐] Major revision

Very truly yours,

Joy G. Raso, PhD.
Chair, CPU-REC

Date: April 20, 2023

- *This form contains the CPU-REC recommendations. Please comply within (15) days and wait for the Ethical Clearance before the conduct of the study.*

Appendix K

Resubmission (1st)

Central Philippine University	RESEARCH ETHICS COMMITTEE		
	RESUBMISSION FORM	REC Form No.	07-1
		Version No.	03
		Date of Effectivity	29 July 2022

General Information			
*Title of the Study	Information Literacy Competencies and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction		
Version number/Date	03 / 02 May 2023		
*REC Code	2023-74-MS-OREGANO	Study Site:	Trinity Christian School, Bacolod City, Neg. Occ.
*Name of Researcher	Lorelie A. Oregano	Contact Information	Tel No. n/a Mobile No. 0923 577 5055 Fax No. n/a
*Co-researcher (if any)	n/a		Email: lorelie.oregano-20@cpu.edu.ph
*Institution of researcher/s	Central Philippine University		
*Address of Institution	Jaro, Iloilo City		

REC Recommendations	*Response of Researcher*	*Section and page number of revisions*
1. Please implement Arial 11 to all parts of the manuscript	Implemented. Arial 11 is now the font being used.	The full protocol research proposal
2. Please ensure compliance with pagination format. For example, the first page of Chapter 1 must be page 1 (but not indicated).	Implemented. The pagination format is complied. The study has now page numbers including the preliminary pages. Chapter 1 is page one but not indicated/visible.	The full protocol research proposal

3. For the paradigm, it is suggested that the categories will not be included	Implemented. The categories are not included anymore in the paradigm	Chapter 1; Conceptual Framework: Page 8
4. The chapter 2 of the study requires work. To support the discussion, the research or the body of literature must be expanded. Chapter 2 should include more studies	Implemented. Additional studies were added.	Pages 15, 16, 17, 18, 20, 21, 22, 23
5. Please revise date of conduct of study in the Scope & Limitation section, as second semester is already ending	Implemented and revised already.	Scope and Limitations – pages 12 & 13 For the Gantt Chart, please see attached file
6. Under the Ethical Considerations, include discussion on - Risk & benefit assessment by identifying the type of risk expected from your respondents. You may choose from the following (negligible risk, low risk, minimal risk, more than minimal risk, moderate risk or high risk) and explain how to mitigate such. . - Suggest to state that the Assent Form must be accomplished by the child respondent. Consent Form will be accomplished by the parents/guardians - Disclosure or declaration of potential conflicts of interest - Since Google Form will be used for the conduct of the study, clarify how a signed consent will be acquired. If you will opt for the use of electronically signed consent, discuss also.	Implemented and revised each area as suggested/recommended.	Chapter 3 Methodology – page 29 Ethical considerations page 35 - Risk & Benefit – page 35 - Consent & Assent Forms – page 36 - Disclosure or declaration of potential conflicts of interest – page 40 - Conduct of the study is now explained in the Data Gathering Procedures – page 34 and in Dissemination plan – page 39

7. In the Data gathering procedure state that a letter to the office-in charge (e.g. registrar) will be sent to access the GWA of the students	Implemented	Chapter 3 Methodology – page 29 Data Gathering – page 35
8. Submit a copy of the approved letter from the office in-charge	Implemented	Please see attached file
9. For the Statistical Analysis, please include references for the interpretation of strength of correlation	Implemented	Chapter 3 Methodology – page 29 Data Analysis & Statistical Tool - Page 43
10. On Inform Consent Form: a. #2, #4, #5: remove the statement "allow your child to participate" b. #3, explain further on the "background" of the study c. #6, please add details on the possible risks & inconveniences, Example: There is a possibility that certain topics might come out which may cause anxiety, distress, and agitation d. Submit translated ICF (Hiligaynon) version	Implemented	On Informed Consent Form: a. Remove already the statement "allow your child to participate" b. Explained further on the background of the study c. Added details on the possibility of causing minor discomfort and inconvenience d. Please see attached file

Name and Signature of Researcher: LORELIE A. OREGANO _____

Date: April 30, 2023

Name and Signature of Adviser: ELISA V. GARCIA, RL, PhD _____

Date: May 2, 2023

Appendix L

Resubmission (2nd)

Central Philippine University	RESEARCH ETHICS COMMITTEE		
	RESUBMISSION FORM	REC Form No.	07-1
		Version No.	03
		Date of Effectivity	29 July 2022

General Information			
*Title of the Study	Information Literacy Competencies and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction		
Version number/Date	03 / 02 May 2023		
*REC Code	2023-74-MS-OREGANO	Study Site:	Trinity Christian School, Bacolod City, Neg. Occ.
*Name of Researcher	Lorelie A. Oregano	Contact Information	Tel No. n/a Mobile No. 0923 577 5055 Fax No. n/a Email: lorelie.oregano-20@cpu.edu.ph
*Co-researcher (if any)	n/a		
*Institution of researcher/s	Central Philippine University		
*Address of Institution	Jaro, Iloilo City		

REC Recommendations	*Response of Researcher*	*Section and page number of revisions*
1. Please implement Arial 11 to all parts of the manuscript	Complied. Arial 11 is now the font being used. *Note: Table of Contents is highlighted since this is the part where Arial 11 font is not implemented in the previous submission*	Table of Contents - preliminary pages ii - iii and the Full protocol research proposal (From title page towards the last which is the survey questionnaire)

2. Please ensure compliance with pagination format. For example, the first page of Chapter 1 must be page 1 (but not indicated).	Complied. The pagination format is revised. The study has now page numbers including the preliminary pages Chapter 1 is page one but not indicated/visible. *Note: There is no need to highlight since this implemented in the full protocol*	The full protocol research proposal (From title page towards the end)
3. For the paradigm, it is suggested that the categories will not be included	Complied. The categories are not included anymore in the paradigm of the diagrammatic presentation of the variables *Note: Conceptual Framework Section including the Figure 2 - Diagrammatic Presentation of the Variables are highlighted*	Chapter 1; Conceptual Framework: & Figure 2 - Page 8
4. The chapter 2 of the study requires work. To support the discussion, the research or the body of literature must be expanded. Chapter 2 should include more studies	Complied. Additional studies were added in Chapter 2 - Review of Related Literature. The following are the revisions: - *Additional studies added to each topic/subject.* - *Synthesis* *Note: The studies that were added for each topic are highlighted. Please see/check Column 3 for the details about the specific topics with pages indicated*	Chapter 2 – RRL Studies are added to: Information Literacy Pages 15, 16, 17, & 18 Information Literacy Competency Pages 18, 19 & 20 On Library Information Literacy Instruction Pages 20, 22 & 23 Synthesis Page 27
5. Please revise date of conduct of study in the Scope & Limitation section, as second semester is already ending	Complied. Revised already. The date of the conduct of the study is reflected in the Scope & Limitations which is May 2023 – July 2023 (highlighted) For the Detailed Schedule of the Study and the Gantt Chart - revised and highlighted	Scope and Limitations – Pages 12, 13 & 14 For the Detailed Schedule of the study and the Gantt Chart, please see attached file

6. Under the Ethical Considerations, include discussion on: - Risk & benefit assessment by identifying the type of risk expected from your respondents. You may choose from the following (negligible risk, low risk, minimal risk, more than minimal risk, moderate risk or high risk) and explain how to mitigate such. - Suggest to state that the Assent Form must be accomplished by the child respondent. Consent Form will be accomplished by the parents/guardians - Disclosure or declaration of potential conflicts of interest - Since Google Form will be used for the conduct of the study, clarify how a signed consent will be acquired. If you will opt for the use of electronically signed consent, discuss also.	Complied. Revised each area in the Ethical Considerations as suggested & recommended: - Risk and Benefit assessment – It is explained the potential risk that might be encountered by the respondents/participants. See Column 3 (*highlighted)* *Also added in the Ethical Considerations are the following*: - Parental Informed Consent & Child Assent – it was stated in the Informed Consent Form that it is to be accomplished by the parents/guardians and the Informed Assent Form to be accomplished by the respondents/participants *(highlighted)* - Disclosure or declaration of potential conflicts of interest – already added in the protocol *(highlighted)* *Revisions are highlighted in:* - Data Gathering & Dissemination Plan where it is stated there that the researcher will not use Google Form anymore instead it will be conducted face-to-face since the approach will enable the researcher to read and explain properly to the respondents the contents of the ICF and IAF which will be both in English and Hiligaynon.	Chapter 3 Methodology Ethical considerations page 35 a. Risk & Benefit assessment– pages 35 & 36 b. Parental Informed Consent & Child Assent Forms – pages 36 & 37 c. Disclosure or declaration of potential conflicts of interest – page 40 d. Conduct of the study is now explained in the: • Data Gathering Procedures – pages 34 & 35 • Dissemination plan – page 39
7. In the Data gathering procedure state that: *A letter to the office-in charge (e.g. registrar) will be sent to access	Complied. The Data Gathering procedure is being explained. It is mentioned that a letter is to be sent to the school registrar requesting to access the GWA.	Chapter 3 Methodology Data Gathering – page 35

the GWA of the students * The date to conduct the Study	The date of the conduct of the study is stated that it will be in the months of May 2023 to July 2023 *(highlighted)*	
8. Submit a copy of the approved letter from the office in-charge	Complied. The letter approved and signed by the school registrar requesting to access the GWA is one of the attached files	Please see attached file
9. For the Statistical Analysis, please include references for the interpretation of strength of correlation	Complied. The table for the interpretation of the Strength of Correlation has a note – "Retrieved from Pearson Correlation Coefficient (r) Guide & Examples by S. Turney, 2022, Copyright 2022 by Scribber" *(highlighted)*	In Chapter 3 Methodology Data Analysis & Statistical Tool – Table #3 Page 43
10. On Inform Consent Form: a. #2, #4, #5: remove the statement "allow your child to participate"	a. Complied. In ICF - Statements are now rephrased to remove the "allow your child to participate" *(Highlighted in English and Hiligaynon version*	On Informed Consent Form: a. Remove already the statement "allow your child to participate" in #2, #4, #5 as highlighted
b. #3, explain further the "background" of the study	b. Complied. Background was further explained as revised in #3 of the ICF *(Highlighted in English and Hiligaynon version)*	b. Background & Purposes -was further explained. Item #3 of the ICF is highlighted
c. #6, please add details on the possible risks & inconveniences, Example: There is a possibility that certain topics might come out which may cause anxiety, distress, and agitation	c. Complied. Possible risks & inconveniences were further explained in #6 that the survey questionnaire may cause minor discomfort or inconvenience because respondents may worry about being inaccurately assessed or evaluated on their knowledge and skills. It is considered as minimal or low risk that the researcher would address by explaining to them the goal/objective of the study which is advantageous to them as they will gain a better understanding of their information literacy and it will be effective in their academic performance	c. Added details on the possibility of causing minor discomfort and inconvenience – #6 is highlighted
d. Submit translated ICF (Hiligaynon) version	d. Complied. Submitted ICF or Informed Consent Form which is translated to Hiligaynon.	d. Please see attached file

Additional: e. Submit translated IAF (Hiligaynon) version	e. Complied. Submitted IAF or Informed Assent Form which is translated to Hiligaynon	e. Please see attached file (previous email)

Name and Signature of Researcher: LORELIE A. OREGANO

Date: May 8, 2023

Name and Signature of Adviser: ELISA V. GARCIA, RL, PhD.

Date: May 8, 2023

Appendix M

Ethical Clearance

OFFICE OF THE RESEARCH ETHICS COMMITTEE
CENTRAL PHILIPPINE UNIVERSITY
Lopez Jaena St., Jaro, Iloilo City, Philippines
329-1971 to 79 local 3336

ETHICAL CLEARANCE

REC Form No.22-2
Version No.: 04
Date of Effectivity: 29 July 2022

Date of Approval: May 22, 2023

REC Code: **2023-74-MS-OREGANO**

Protocol Title: ***"Information Literacy Competencies and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction"***

Version No. 02

Researcher/s: Lorelie A. Oregano

Upon resubmission of the following documents, Research Proposal Chapters 1, 2, and 3 with references and Informed Consent Form, the above protocol is hereby **APPROVED** by the CPU-REC. This ethical clearance is valid from **May 22, 2023** to **May 22, 2024**.

The researcher/s are hereby required to submit the following:

- √ Progress Report on or before **June 22, 2023** to researchethics@cpu.edu.ph
- √ Final Report Form and one (1) copy of the completed protocol **within one (1) month** after completion of the study.

For any amendment or alteration in the protocol that will change the nature, or the level of risk involved after approval, the Research Ethics Committee must be notified through writing and accomplishing the following forms as needed: Protocol Deviation Form, Serious Adverse Events, Amendment Form, and/or Early Termination Report.

Very truly yours,

JOY G. RASO, PhD.
Chair, CPU-REC

Date: 5/22/23

Appendix N

Protocol Review of Progress Report

OFFICE OF THE RESEARCH ETHICS COMMITTEE
CENTRAL PHILIPPINE UNIVERSITY
Lopez Jaena St., Jaro, Iloilo City, Philippines
329-1971 to 79 local 3336

PROTOCOL REVIEW OF PROGRESS REPORT	REC Form No. 09-1
	Version No. 00
	Date of Effectivity: 29 July 2022

Instructions to the Researcher: Please accomplish this form and ensure that you have included in your submission the documents that you checked below (in Section 3 Checklist of Documents).

GENERAL INFORMATION

*Title of Study	Information Literacy Competency, Desired Mindset and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction		
REC Protocol No.	2023-74-MS-OREGANO	*Study Site	Bacolod City
*Name of Researcher	Lorelie A. Oregano		
*Contact No.	09235775055 / 09639059777	*Email Address	lorsoregano@btcsi.edu.ph
*Co-researcher (if any)	None		
*Institution	Central Philippine University		
*Address of Institution	Jaro, Iloilo City		
Ethical clearance effectivity period:	May 22, 2023 – May 22, 2024		

PROGRESS REPORT

1. Start of study: December 2022
2. Expected end of study: February 2024
3. Number of enrolled participants: 391 Secondary Students
4. Number of required participants: 391 Secondary Students (Total enumeration)
5. Number of participants who withdrew: None

6. Deviations from the approved protocol:

The approved title by the Research Ethics Committee was "Information Literacy Competency and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction" However, the panel recommended to include the "Desired Mindset" since it was also a variable that is included in the research objectives and questionnaires. Thus, the final title now is "Information Literacy Competency, Desired Mindset and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction"

7. New information (literature or in the conduct of the study) that may significantly changethe risk-benefit ratio: None

8. Issues/problems encountered: None

Recommendation:

DECISION:	[☐] Ask for further information [☐] Noted and Accept report
Comments (Identify items for revision)	

Primary Reviewer: _____
Signature over Printed Name

Date: _____

Signature of Researcher: _____

Date: 15 October 2023

Appendix O

Final Report

OFFICE OF THE RESEARCH ETHICS COMMITTEE CENTRAL PHILIPPINE UNIVERSITY Lopez Jaena St., Jaro, Iloilo City, Philippines 329-1971 to 79 local 3336	
FINAL REPORT FORM	REC Form No. 13-1 Version No. 01 Date of Effectivity: 29 July 2022

GENERAL INFORMATION

* REC Protocol Number	2023-74-MS-OREGANO	* Date (DD/MM/YYYY)	February 15, 2024
* Protocol Title	Information Literacy Competency, Desired Mindset and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction		
*Principal Investigator/s	Lorelie A. Oregano		
Department/College	School of Graduate Studies – MLIS Department		
*Contact No.	09235775055	*Email Address	lorsoregano@btcsi.edu.ph
Co-investigator/s (if any)	N/A		
Contact No.	N/A	Email Address	N/A
*Institution of Researcher/s	Central Philippine University		
*Address of Institution	Jaro, Iloilo City		
Effective period of Ethical Clearance	From: May 22, 2023 To: May 22, 2024		
Primary Reviewer/s			
*Type of Study	☐ Clinical ☐ Epidemiology ☐ Observational study		
	☐ Document Review ☐ Individual based ☐ Genetic		
	☒ Social Survey ☐ Others, specify _____		
*Review Status	☐ Full Board ☒ Expedited		

FINAL REPORT

1. Start/end of the Study: December 2022 – February 2024

2. Number of enrolled participants: 391 Secondary Students

3. Number of required participants: 391 Secondary Students (Total enumeration)

4. Number of participants who withdraw: None

5. Deviations from the approved protocol:

   The approved title previously was “Information Literacy Competency and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction” However, the panel recommended to include the “Desired Mindset” since it was also a variable that is included in the research objectives and questionnaires. Thus, the final title now is “Information Literacy Competency, Desired Mindset and Academic Performance of Secondary Students: Basis for Enhanced Library Information Literacy Instruction”

6. Issues/problems encountered: None

7. Summary of findings:

   1. In terms of the participants' demographic profile, the study involved a total of 362 secondary students, which made up a portion of the total population of 391. The findings revealed that the largest group of participants in the study included 72 students from Grade 10, while the smallest group included 37 students from Grade 12. For the library IL instruction, the majority of secondary students were present with the exception of two Grade 7 students who were unable to participate due to some reasons. Furthermore, the mode of library information literacy (IL) instruction that combined both face-to-face and online approaches got the highest percentage of attendance.

   2. The current level of respondents’ IL competencies in terms of performance of IL activities when taken as a whole and categorized according to grade level, attendance to library IL instruction and mode of library IL instruction, it was noted that as the respondents’ advance to higher grade levels, the IL competencies also exhibited a notable rise. The students’ attendance to library IL instruction in whichever mode, face to face or online, effectively and firmly validated the researcher's goal which is to improve the respondents' IL competencies as they move up to higher grade levels.

   3. The current level of respondents’ desired mindsets necessary to accomplish IL activities when taken as a whole and categorized according to grade level, attendance to library IL instruction and mode of library IL instruction, the findings revealed that students displayed a favorable attitude and positive mentality which are desirable mindset as they learn and advanced to higher grade levels. The library IL instruction helped improved students in the development of values, attitudes and learning habits as teachers and librarians collaboratively teach them.

4. The current level of respondents' academic performance is depicted by the final GWA (general weighted average) and it reveals that the majority of them fall within the Proficient category, with grades ranging from 87 to 92. A variety of factors influenced students' academic achievements, with IL competency being an essential contributor, significantly affecting their educational achievements.

5. The study revealed a significant difference in respondents' level of IL competencies when categorized according to grade level, attendance to library IL instruction and mode of library IL instruction. Diverse grade levels exhibited varying levels of IL competencies. Notably, both online and face-to-face library IL instructions yielded significant differences. Surprisingly, the attendance or non-attendance of the respondents to IL instruction did not appear to have a significant impact on their IL competencies since only 2 out of 362 students not able to attend the library IL instructions.

6. When considering the current level of respondents' desired mindsets, it also indicated a significant difference. Findings revealed that the different grade levels, have varying level of desired mindsets also. The higher the grade level, the higher level of desired mindsets as well. However, it is important to highlight that the participation in library IL instruction did not result in a significant difference. Interestingly, individuals who engaged in library IL instruction, whether in-person or online, demonstrated higher mean and standard deviation scores in their mindset compared to those who did not attend.

7. Consequently, the findings revealed a significant difference in the respondents' academic performance across grade levels, in which Grade 9 has the highest mean and standard deviation followed by Grade 12. As to the attendance to library IL instruction in whichever mode, it also exhibited a significant disparity in the level of the academic performance of the respondents as shown in their GWA.

8. The findings revealed a substantial and statistically significant correlation between IL competencies and the academic achievements of the respondents, as measured by the GWA, a key indicator of academic performance.

9. Likewise, the results revealed a moderate positive correlation between the respondents' level of desired mindset and their academic performance. These desired mindset levels ranged from Proficient to Advanced. The findings strongly indicated that the respondents consistently exhibited positive attitudes and desirable mindsets while developing intellectual skills and IL competencies.

10. Finally, the Proposed Enhanced Library Information Literacy Instruction is presented as an output derived from the study's findings. This enhanced library IL instruction aims to provide students diverse activities designed to foster the development of their IL competencies. The suggested activities are introduced as captivating and interactive games, with the expectation that these will boost students' motivation and engagement, enhance visual skills, fortify interaction and collaboration with peers, and enable the application of gaming principles and values that will be useful in a real-world situation.

8. Conclusions/Recommendations:

Conclusions:

1. The information literacy competencies indeed has a significant contribution to the academic performance of the students since there is a statistically significant correlation between the respondents' IL competencies and their academic achievements. As depicted in the tables, an increase in grade levels corresponds to an increase in IL competencies.

2. The various IL activities they participated in influenced their learning and led to positive outcomes. It is essential to consistently provide appropriate library IL instructions in order for these skills to be developed.

3. The positive mindsets such as knowing the legal and ethical use of information based on standard practices and proper source attribution can help students achieve their desired perspectives.

4. Finally, this study concluded that as the respondents' IL competencies continue to progress, there is a potential for significant improvement in their academic performance as well as in their desired mindsets, thereby the library IL instruction plays a crucial role in developing these competencies in order for the respondents to achieve the goals and encouraging lifelong learning.

Recommendations:

Based on the findings and conclusions, the recommendations are:

1. It is recommended that library IL instruction be integrated into the regular curriculum instead of providing this only in periodic library instructions. This endeavor aims to foster a sense of approval and fulfillment among administrators and institutions, knowing that learners will develop a higher level of IL competency, ultimately leading to academic success.

2. It is hoped that the study's outcomes will provide assistance to the faculty in evaluating the learning guides for each subject with a specific focus on effectively addressing students' concerns regarding information literacy. Additionally, it is also wished that the collaborative teaching be continued for it has demonstrated positive impact on students' learning experiences and the enhancement of their IL competencies. The substantial and labor-intensive efforts invested in preparing for information literacy instruction have proven to be worthwhile, as substantiated by the results of this study.

3. It is encouraged that the librarians should reassess and redesign their library IL instruction, incorporating diverse lessons and activities that foster the enhancement of the IL competencies among respondents, especially as they advance in their academic journey. The desire is for librarians to continue in providing IL instruction using engaging and purposeful methods, tailored to enhance students' learning experiences. This instructional approach can be conducted through both face-to-face and online platforms, offering flexibility and convenience in scheduling for students, teachers, and librarians.

4. The results revealed that students or learners' performance of diverse IL activities performed during library IL instructions have been proven to significantly contribute to the enhancement of their IL competencies. Consequently, students or learners are encouraged to consistently and actively participate in library IL instructions to access contemporary and creative methods for acquiring knowledge and literacy.

5. The proposed enhanced library IL instruction represents a modern and innovative approach to involve students in the development of their IL competencies. Nonetheless, it remains a wish for future researchers to explore inventive and pioneering methods continuously. This exploration will contribute to the ongoing progress and enhancement of implementing library IL instructions, ultimately benefiting the overall educational experiences of the students.

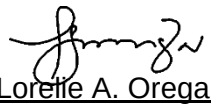
6. Finally, as the findings of this study align with the researcher's aim of enhancing respondents' IL competencies across different grade levels, it is hoped that the enhanced framework for library IL instruction, designed to help students develop their IL competencies will be implemented using various delivery methods. The objective is to enhance student engagement and ensuring the efficiency and productivity of the instructional process.

9. Actions for dissemination of study results:

- The study results which led to the creation of Enhanced Library Information Literacy Instruction will be disseminated and be conducted to the secondary students as an updated and improved library instruction which can surely help them in augmenting their lessons and develop their information literacy competencies.

- If other school libraries/librarians will be interested to also follow this Enhanced Library Information Literacy Instruction, it will also be made available to them as long as it serves the purpose and can be of best use to their students' information literacy needs. A request letter can be made addressed to the researcher to avail of this library instruction.

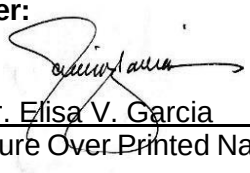
Researcher/s:



Lorelie A. Oregano
Signature Over Printed Name

Date: February 15, 2024

Adviser:



Dr. Elisa V. Garcia
Signature Over Printed Name

Date: February 19, 2024