Evaluating the LMS of One University in the Philippines: Impacts on Pre-Service Teacher Training

John Andrew P. Delgado

Graduate School, State University of Northern Negros, Philippines

Abstract	**Original Research Article**

This study aims to evaluate the Learning Management System (LMS) of one of the universities in the Philippines that offers an education program, which is the Philippine Normal University (PNU) Visayas. The primary objective is to determine how effectively the LMS supports students in their preparation for the teaching profession. At PNU Visayas, the official LMS is known as ePNUV, a platform adopted to support flexible and technology-enhanced learning. The study used a descriptive research design and collected data through a survey. A total of 93 education students from PNU Visayas participated in the study through voluntary response sampling. The survey included 17 questions grouped into five areas: User Experience, Learning Support, Communication and Feedback, Digital Competency and Preparation, and Overall Satisfaction. The tool used in the study was checked for reliability using Cronbach's Alpha and received a high score of 0.979, showing it was very reliable.

The results showed that students rated the LMS highest in the area of Digital Competency and Preparation. They agreed that the LMS helps them learn how to use digital tools (mean = 3.59) and prepares them to teach in a digital environment (mean = 3.62). User Experience and Learning Support were also rated fairly well, with average scores above 3.0. Overall Satisfaction reflected general agreement, with students likely to recommend the LMS. However, Communication and Feedback had the lowest scores, with students finding it harder to communicate with teachers (mean = 3.02) and receive helpful feedback (mean = 3.13).

In conclusion, the LMS is seen as helpful and effective in many areas, especially in preparing students to teach using technology. However, the system could be improved by making communication and feedback with teachers easier and more helpful. These findings can help improve the LMS for future users.

Keywords: Learning Management System, Pre-Service Teachers, Teacher Education, Digital Competency, Descriptive Research

INTRODUCTION

In today's world of education, using digital tools like Learning Management Systems (LMS) has become essential. These platforms help students and teachers communicate, share materials, and support learning both inside and outside the classroom. Philippine Normal University Visayas, known for its mission to lead innovative and sustainable teacher education programs, was chosen as the site for this study. As it aims to develop future-ready teachers and education leaders, exposure to these tools is important because it mirrors the kind of digital learning environments they may one day manage in their own classrooms.

This study was conducted to understand how effective the ePNUV LMS is for students who are preparing to become teachers. Since these students will one day lead classrooms, their experience using a digital learning tool is important. If they have a good experience, it may help them feel more confident using similar tools when they become teachers.

The Commission on Higher Education (CHED) has promoted the integration of LMS in higher education through CMO No. 04, Series of 2020, which mandates flexible learning in response to the pandemic (Roa et al., 2023). Institutions such as the University of Science and Technology of Southern Philippines have evaluated their own LMS implementations, highlighting both benefits and challenges in usability, digital access, and faculty support.

LMS usability is critical because it affects students' ability to navigate and complete tasks efficiently (Al-Fraihat et al., 2020). Engagement and system features are also important; a recent study found that LMSs must offer accessible, well-designed, and functional features such as intuitive navigation,

collaborative tools, and fast-loading content to match the instructional quality of face-to-face delivery (GASJEL, 2024). Lastly, perceived effectiveness reflects whether students believe the LMS helps them develop as future teachers (Kebritchi et al., 2017).

The study focused on five main areas: user experience, learning support, communication and feedback, digital competency/preparation, and overall satisfaction. Understanding these areas will help improve the ePNUV LMS and give better support to students.

The study is limited to 93 education students at PNU Visayas who voluntarily answered the survey. The survey was the only tool used to gather information. While the study does not include the views of teachers or compare ePNUV LMS with other systems, it still provides helpful insights into how PNU Visayas students feel about the platform they use every day.

MATERIALS AND METHODS

This research used a descriptive design to gather and describe how future educators at PNU Visayas perceive the effectiveness of the ePNUV LMS. The study involved 93 education students from PNU Visayas. They were chosen using voluntary response sampling, meaning they joined the study by choice after receiving an invitation. The main instrument used was a survey composed of 17 statements grouped into five categories:

- User Experience
- Learning Support
- Communication and Feedback
- Digital Competency and Preparation
- Overall Satisfaction
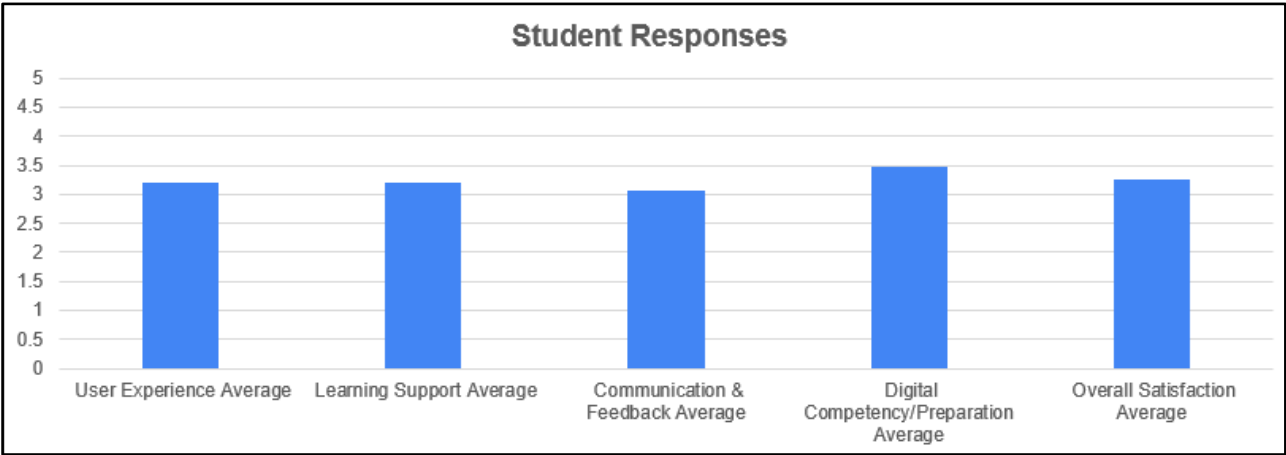
Each statement was rated using a 5-point Likert scale, where 1 means Strongly Disagree, 2 means Disagree, 3 means Neutral, 4 means Agree, and 5 means Strongly Agree. The reliability of the survey tool was tested using Cronbach's Alpha, and the result was 0.979, which shows excellent internal consistency.

Data Collection and Analysis:

The survey was distributed online. The responses were collected, and descriptive statistics such as mean, median, and mode were calculated. These helped summarize how students felt about each item in the survey.

	Questions	Mean	Median	Mode
User Experience	*The ePNUV (LMS) is easy to use.*	3.1827957	3	4
	I can find what I need quickly in the ePNUV (LMS).	3.21505376	3	3
	Submitting assignments and taking quizzes through the ePNUV (LMS) is easy.	3.11827957	3	3
	The ePNUV (LMS) works well on different devices (phone, tablet, laptop).	3.30107527	3	4
Learning Support	*The ePNUV (LMS) helps me understand the lessons better.*	3.16129032	3	3
	The ePNUV (LMS) helps me learn independently.	3.23655914	3	3
	I feel more engaged in my studies when using the ePNUV (LMS).	3.09677419	3	3
	The ePNUV (LMS) helps me keep track of deadlines and activities.	3.25806452	3	4
Communication & Feedback	*I can easily communicate with my teachers using the ePNUV (LMS).*	3.02150538	3	3
	I receive helpful feedback from teachers through the ePNUV (LMS).	3.12903226	3	3
Digital Competency/ Preparation	*The ePNUV (LMS) helps me become confident in using technology for teaching.*	3.19354839	3	3
	I am learning how to use digital tools that are important for future teachers.	3.59139785	4	4
	The ePNUV (LMS) gives me ideas for using technology in the classroom.	3.44086022	4	4
	The ePNUV (LMS) experience prepares me to teach in a digital environment.	3.62365591	4	4
	I believe using the ePNUV (LMS) improves my readiness to become a teacher.	3.50537634	4	4
Overall Satisfaction	*I am satisfied with my overall experience using the ePNUV (LMS).*	3.21505376	3	4
	I would recommend the ePNUV (LMS) to other future educators.	3.27956989	3	3

RESULTS AND DISCUSSION

The results show that students had an average experience with the ePNUV LMS across all areas, with some areas rated slightly higher than others.

- Digital Competency and Preparation was rated highest (e.g., "The LMS experience prepares me to teach in a digital environment" had a mean of 3.62). This shows that the ePNUV LMS helps students feel more ready to use technology in the classroom.
- User Experience (ease of use, device compatibility) had average scores (means ranging from 3.11 to 3.30), which suggests that while students do not find the ePNUV LMS difficult, there is room for improvement.
- Learning Support had similar average ratings (3.09 to 3.25), indicating that students find the ePNUV LMS somewhat helpful in understanding lessons and managing tasks.
- Communication and Feedback scored slightly lower (means around 3.02 to 3.13), suggesting students may want more or better feedback from teachers.
- Overall Satisfaction (e.g., "I am satisfied with my overall experience") had a moderate rating of 3.21, showing that students generally approve of the ePNUV LMS, though it may not fully meet their expectations.

These findings suggest that the ePNUV LMS is doing its job, especially in preparing students for digital teaching. However, areas like communication with teachers and system usability still need improvement to enhance the experience.

CONCLUSIONS

The study found that the ePNUV LMS is moderately effective for future educators at PNU Visayas. Students said it helped them develop digital skills and supported their learning. The highest scores were in Digital Competency and Preparation, which shows that the LMS helps pre-service teachers feel more ready to teach using technology.

User Experience and Learning Support also received good scores. This means students find the platform manageable and somewhat helpful in completing academic tasks. Still, there is room for improvement in areas like ease of use and learning support tools. Communication and Feedback had the lowest ratings. Many students had trouble getting feedback from their teachers or felt the communication features were lacking. This shows a need to improve how the LMS supports interaction between students and instructors. Overall Satisfaction was rated fairly, but not high. While students generally accept the LMS, they do not feel fully satisfied with the experience. Improving feedback, system design, and engagement features could help increase student satisfaction.

These results suggest that the ePNUV LMS supports students in learning to teach with technology, but it still has areas that need work. Making these improvements can help better prepare pre-service teachers and strengthen the university's goal of producing future-ready educators.

RECOMMENDATIONS

Based on the findings, the following recommendations are suggested:

1. Improve communication features to allow smoother interaction between students and teachers.
2. Enhance the platform's usability, especially in making navigation easier and faster.
3. Offer LMS training sessions to students to boost confidence and skills in using digital tools.
4. Regularly collect student feedback to continue improving the LMS based on user needs.
5. Consider adding interactive elements to boost student engagement.

Future research may include teacher feedback or compare LMS in other PNU campuses to get a broader view.

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