

Students' Perceptions about the Use of Interactive Video

Dandi Putra Suherman¹, Bunga Putri Dewi¹

¹Teknologi Pendidikan, Universitas Negeri Padang, Indonesia

dandiputrasuherman8@gmail.com

bunga1535@gmail.com

Abstract

Interactive video using H5P is a feature that can be freely used by Moodle users; however, as a phenomenon in the field, only a small number use it. Based on monitoring through the system at one university, only 0.085% of 10,593 students used H5P in course sessions. In this case, it means that the implementation of the H5P-based interactive video was not carried out well; on the other hand, evaluation is needed. This research involves the perspective of students who have used H5P. This research activity uses a quantitative approach carried out at Padang State University. The research sample involves students taking computer-based learning courses. Students were given a questionnaire to see their perspective on using H5P as interactive content in the learning process. This data was analysed using data analysis techniques. From the results obtained, according to students' views, H5P as an interactive learning media to support the Padang State University LMS system has a positive impact. By looking at the capabilities and efficiency of the existing H5P, of course, this is applied objectively. Hence, to maximise the use of H5P content, students, lecturers, and universities must consider the problems faced, such as networks, devices, technical use of H5P, work orders, navigation, and time, as concluded in this research.

Keywords: interactive content, computer based instruction, H5P, Moodle

Background

The use of H5P (HTML5 Package) as an interactive learning media in online education environments has become a topic of interest, especially when involving learning management systems (LMS) at universities. H5P is a platform that allows developers to work together to create interactive content that can be loaded into videos, allowing students to interact with learning materials personally. However, the implementation of H5P at Padang State University faces several problems, especially in terms of use and integration into study programmes. The initial container is used as an open-source framework where all learning developers can create and share interactive content online. H5P emerged as part of the resulting response to the new evolution of digital education, which is increasingly complex and diverse and also requires more flexible and adaptive tools to be able to support a learning process that will be student-centred. H5P was created as a form of responsiveness to the intersection between developments in web technology, the need for greater interactivity in learning content, and the resulting efforts to create an open learning platform that is universally accessible.

H5P is not only limited to technical aspects; this tool also emerged as a response to the paradigm shift in education, where learning is no longer seen as a passive process centred on the teacher but as an interactive, collaborative experience that allows learners to take on different roles and be more active in the formation of their knowledge. Apart from that, the presence of H5P is also in line with the increasing demand for more creative and diverse learning content. By providing various types of interactive activities such as quizzes, simulations, presentations, and more, H5P provides educators and instructional designers with the tools necessary to meet diverse learning needs.

Overall, H5P reflects a profound shift in learning and technology paradigms. Innovation in digital education is increasingly important in preparing future generations to face complex and diverse global challenges. The use of H5P in a lecture context not only increases student engagement but also enables more open, dynamic, and accessible learning, in line with growing digital education trends. With its flexibility, H5P can be adapted to various learning materials, creating a responsive and engaging learning environment for students in today's digital era. This study aimed to assess the use of H5P in higher education institutions from a perspective. Using H5P as a learning mode in lectures provides various significant benefits. H5P can enrich their learning experience by presenting interesting and challenging interactive content. Activities such as interactive quizzes, simulations, and multimedia presentations not only make learning more engaging but also facilitate deeper understanding through hands-on experience.

Moreover, the use of H5P allows students to study independently and in flexible time. They can access H5P content from anywhere and at any time through the online learning platform, allowing them to learn according to their rhythm and preferences. This is especially useful for students who have busy schedules or different learning preferences. With interactive features such as multiple-choice questions, drag-and-drop activities, and interactive simulations, students are invited to be directly involved in the learning process, which can increase retention and understanding of the material. Not only that, the use of H5P also allows students to receive instant feedback about their performance in learning activities. This helps them to improve their understanding immediately and identify areas where they need additional help. Updates and ways to create learning styles and tools that become active forms of interaction are of course carefully considered by existing capacities; in their form, this becomes a unique part of its own that opens up new projections for institutions to be more open to progress and development. the wheel of education wrapped in technology.

The Objectives and Purposes of Research

This research aims to evaluate and understand the use of H5P as an interactive learning media at Padang State University, with a focus on students' perceptions. The purpose of this research for lecturers is to help lecturers improve the quality of education by providing insight into how H5P can be used effectively in the curriculum. In addition, this research can also help lecturers improve their ability to incorporate interactive learning technology into their learning approaches. Apart from that, it is hoped that students can increase their involvement in the learning process by offering more interactive and interesting content. By providing powerful tools for educators to create learning content that is innovative and responsive to student needs, H5P helps support technology-based learning approaches that promote student engagement and better learning outcomes. In addition, H5P also helps increase educational accessibility by providing learning content that can be accessed online and is compatible with various devices, enabling students from diverse backgrounds to obtain a quality education. In addition, it is hoped that this research will provide a better understanding of how H5P can help them understand the subject matter better. Thus, learning outcomes and student satisfaction are expected to be the results of this research.

Research Method

The type of research used is research using a quantitative cross-sectional approach, which uses a concentration of experimental design through computer-based learning. This research was conducted at Padang State University based on the odd semester of the 2023–2024 academic year. The subjects in this research study are UNP students. Quantitative research methods are ways to conduct research using basic data collection in the form of questionnaires. According to Sugiyono (2018, p. 14), the quantitative approach is research that is based on the philosophy of positivism to research certain populations or samples, random sampling by collecting data using instruments, and statistical data analysis.

In this study, data collection was obtained by distributing questionnaires to 98 respondents. This technique of distributing questionnaires to students is carried out to find out students' perceptions that the implementation and use of H5P have reached the extent to which they have touched academics and students.

Result and Discussion

The development of technology and information in the world of education is not only used as a learning resource but also to carry out LMS-based learning process activities, one of which is the creation of H5P-based interactive learning videos in the form of content presented on the e-learning platform that has been created when the teaching and learning activity process is carried out. This H5P-based learning media contains many interactive features for each lesson presented packaged in an attractive form. The following is data from the results of a questionnaire given to Padang State University students:

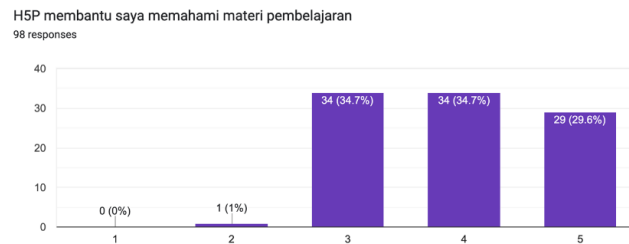


Figure 1. (Data of students who understand the material through H5P)

In Figure 1, there is a student questionnaire on whether H5P can help them understand the learning material. There were around 98 students who responded to this activity, where around 29.6% (29 people) responded with a rating of 5, 34.7% (34 people) responded with the number 4, 34.7% (34 people) responded with the number 3, and around 1.1% (1 person) responded with the number 2. It can be concluded that the use of H5P in this interactive video is mostly very helpful for students in understanding the lesson.

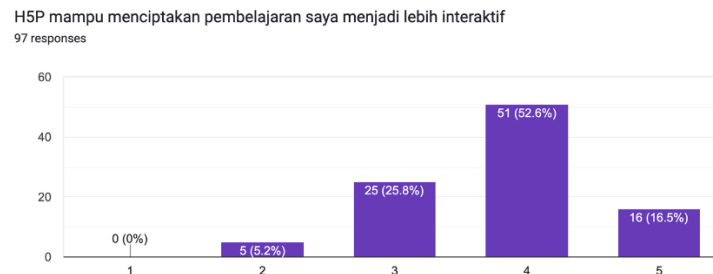


Figure 2. (H5P data is able to create more interactive learning for students)

Based on assessments from 97 students, the use of H5P in interactive videos presented in LMS-based learning shows its effectiveness in increasing learning interactivity. In the total assessments, 16.5% of students gave a rating of 5, which shows a very high level of satisfaction with the use of H5P. In addition, 52.6% of students gave a rating of 4, indicating a fairly high level of satisfaction. A rating of 3 was also given by 25.8% of students, indicating that the majority of students felt they understood the material by using H5P in learning. However, only 5.2% of students gave a rating of 2, which indicates some dissatisfaction with the use of H5P because it does not help understand learning. These results indicate that the use of H5P in interactive videos in LMS-based learning has the potential to help students better understand the material presented.

H5P memberikan ruang untuk latihan dan penilaian diri
98 responses

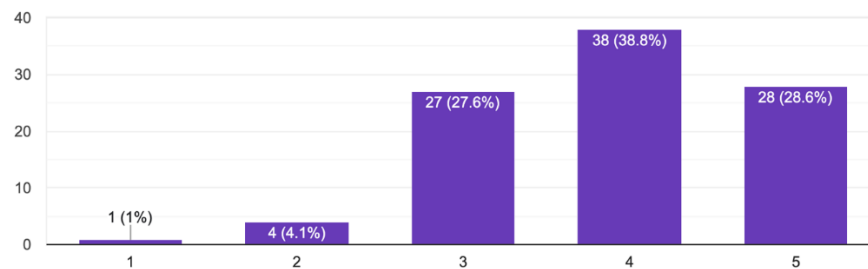


figure 3 . (H5P data provides space for practice and self-assessment for students)

The use of the H5P feature allows students to perform exercises and assess themselves, with a high level of satisfaction. Of the 98 respondents, 28 people (28.6%) gave a rating of 5, which indicates a very high level of satisfaction; 38 people (38.8%) gave a rating of 4, which shows a fairly high level of satisfaction; and 27 people (27.6%) gave a rating of 3. H while 4 people (4.1%) gave a rating of 2, which shows a low level of satisfaction. Only 1 person (1%) gave a rating of 1, indicating a very low level of satisfaction. These results show that H5P has a positive impact in improving the quality of learning and student learning experiences, by providing ample space for practice and self-assessment.

Materi yang disajikan melalui H5P dapat diakses kapan saja melalui E-Learning (LMS)
98 responses

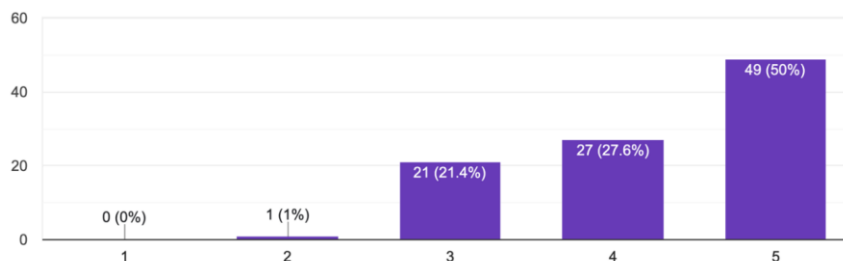


Figure 4. (H5P Material Data can be accessed at any time in e-learning for students)

In this case, a rating of 5 indicates very high satisfaction with the material presented through H5P, while a rating of 2 indicates very low satisfaction. This shows that the e-learning material presented through H5P overall received a positive assessment from the majority of respondents, with only a few low ratings. This is a benchmark showing that the existence of H5P can make it easier for students to participate in learning and can support success in LMS-based learning activities. With this, the H5P feature also makes students' learning experience in the learning process where they can enjoy anywhere, anytime, the material that will be discussed on the e-learning platform so that there is no assumption that they are not carrying out learning activities that must be fulfilled by the students themselves.



Saya akan merekomendasikan sesi mata kuliah ini kepada mahasiswa lain karena menggunakan materi pembelajaran berbasis H5P

98 responses

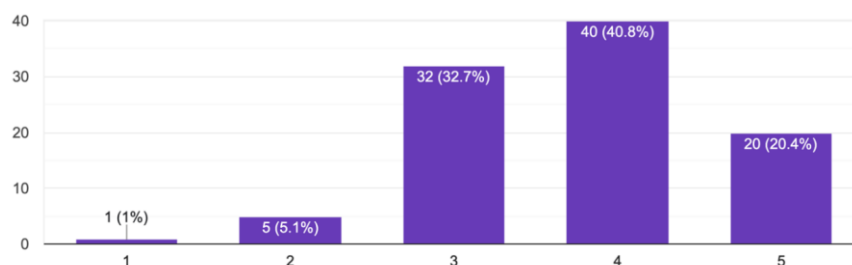


Figure 5. (Data from students who recommend using H5P-based learning materials)

Based on evaluations carried out on students, it turns out that the majority of students feel that it is important for this H5P-based learning to be followed by other students or in other courses. Students recommend this course to other students. The use of H5P learning materials is the main reason to support learning using this interactive video. H5P is a creative and interactive tool that has been proven effective in improving the quality of learning and student engagement. By using H5P, this course offers a more interesting learning approach and allows students to understand the material better.

H5P makes learning more interactive and engaging, which can increase student engagement and improve their understanding of the material. Apart from improving the quality of learning, this innovation makes learning more fun and challenging. Therefore, the researcher highly recommends this course to other students who want to learn in a more creative and efficient way.

Conclusion and Suggestion

Conclusion

In this research, the use of H5P as an interactive learning media at Padang State University is assessed from the student's perspective, as H5P can increase students' understanding of the material and their interest in learning, and students are very happy to use it in interactive videos. However, some students are dissatisfied with it, indicating that using H5P can be difficult, especially if students are unfamiliar with the technology or the user interface is not easy to understand.

In addition, this research shows that lecturers must help students use H5P effectively in learning. Therefore, to maximise the benefits of H5P, there need to be further efforts to build students' skills and to make institutions more systematic in using H5P. Overall, it increases knowledge about the possibilities and obstacles to the use of H5P in higher education institutions and emphasises how important it is to conduct evaluations that involve students' views on the implementation of H5P. It is hoped that the results of this research will provide a better understanding of how H5P can help students understand lesson material, and increase their engagement and learning outcomes.



Suggestion

Based on the results of this research, it is recommended to:

1. Increase training and support for lecturers and students in utilising H5P in learning. This includes training on how to integrate H5P content into the curriculum and how to address technical issues that may arise.
2. Develop more efficient methods to maximize the use of H5P to improve student learning. These strategies may include improving the quality of H5P content, adapting it to student needs and interests, and increasing student accessibility and engagement.
3. Evaluate the use of H5P at universities, including collecting feedback from students and teachers about how effective and impactful the use of H5P is in the learning process.
4. To use H5P more flexibly, think about how it can be used as a tool for independent, flexible learning that can be tailored to students' unique needs and preferences.
5. develop and implement solutions to technical and practical problems students encounter when using H5P, such as networks, devices, navigation, time, work orders, and technicalities of using H5P.
6. help lecturers, students and universities work together to maximize the benefits of H5P as an interactive learning media. This includes assessing and developing H5P content that is innovative and relevant to student learning needs.

By implementing these six suggestions, we can increase the impact of the implications of H5P on LMS-based learning using interactive video media that have been implemented previously and increase the potential of H5P as an innovative and efficient interactive learning tool.

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