INTERNET-BASED LEARNING MEDIA IN THE DIGITAL ERA OF EFL LEARNING IN ENGLISH EDUCATION MASTER PROGRAM

Yohanes Gatot Sutapa Yuliana
Universitas Tanjungpura
yohanes.gatot.sutapa.y@fkip.untan.ac.id

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Abstract: The use of the internet for education has experienced a very significant development of a sine qua non condition. Internet technology, which has a large enough influence in the world of education, demands an inner awareness of professionalism from all around its influence. This research is to reveal the tendency of the internet as a medium of learning activities which are acceptable, fun, relevant and adaptable to the progress and demand of Master Students of English Department of FKIP UNTAN. With the ADD design from ADDIE, tailored to the needs and limitations of activities, this research took the subject of the master students for learning target oriented to the creation of the EFL learning management development using internet technology. It was revealed that the findings inspires something new in the students’ spirit of self-directed learning with their authentic and contextual inner awareness. Even, besides positioning the lecturer as a co-learner, it can also be a reference for the development of EFL learning strategies in a more integrated and maximum way to cope with the learning outcomes targeted in the digital era. This may contribute to the development of human resources for prospective EFL lecturers and teachers in West Kalimantan for a more comprehensive and effective settings of learning activities.

Keywords: internet, learning, EFL, development

Introduction
In a modern English as a Foreign Language (EFL) learning system that puts forward the process as an entity of interaction, facilitation, attractiveness, and effectiveness of learning and learning activities, the media has a very important position in it. Internet media was created, developed, and adapted to the various needs of the meaning of learning to increase students’ understanding in the process of scientific struggle and international relations. After the lecturer determines the choice of media that has been used, then in the end the lecturer is required to be able to provide understanding to students in the learning process in an effective, fun, and liberating manner.

In line with the rapid development of technology and the changing times that are increasingly digitalistic, without boundaries, the use of the Internet for education has experienced a very significant development of a sine qua non condition. Internet technology that has a big enough influence in this world of education, requires mutual awareness of each individual who is around the influence. Learning media with Internet technology is a learning method that tends to be borderless and becomes a mandatory alternative in the cyber era, where the current education system also uses the internet as a medium for the learning process. [Ghazali, 2014] underlined his study by stating that the internet allows students to study via computers at their respective places without having to physically go to lectures in class like conventional lectures. The current learning media that requires
students to be active and independent makes the role of digital system learning very important. Strong, ready moment, and easy internet access is very helpful in finding materials, learning reference materials, models, and international scientific experiences.

Currently, there are many conventional learning sources, one of which is books, which are starting to be secondly prioritized by the user community, including students, even though books are presented with relevant and up-to-date learning materials. The internet continues to move to become one of the main choices that are practical and readily available for seekers of material other than books. What students are looking for can immediately appear as they wish, so it is more time efficient and students can easily understand the material. The application media provided are also very diverse, so students don't get bored easily. Students can also gain more understanding to complete the time in class with their friends.

As a media based without boundaries of space and time, the use of internet media in the learning process has provided convenience and attractiveness for learning activities, especially related to the map of the Kalimantan region which spreads upstream/inland. [Ema & Ardian, 2021] state that educators can do learning together at the same time using groups on social media such as WhatsApp (WA), telegram, Instagram, zoom applications or other media as learning media. Thus, educators can ensure that students take part in learning at the same time, even though in different places. Educators can give measurable assignments in accordance with the objectives of the material presented to learners. The existence of the internet is a hopeful medium to overcome the problem of limited books in the library, the student's home area which is far from the center of city facilities, and learning resources that are difficult to obtain offline, so internet-based media are used as educational media with plans and developed and utilized, properly and correctly has been able to improve the quality and equity of education in a targeted manner and save time, energy, costs, and other resources. The internet is expected to be able to provide support for the implementation of an interactive communication process between lecturers and students as required in a learning activity.

In the learning process, among the existing elements, two elements that are classified as important are teaching methods and learning media. These two elements are interrelated and closely related in the process. [Kuo Eng Chang at all, 2006] observed that teacher training programs designed to facilitate technology literacy development. The selection of one particular teaching method has influenced the appropriate type of learning media, although there are still various other elements that must be considered in choosing media, including learning objectives, types of tasks and responses that students are expected to master after learning takes place and the learning context including student characteristics. However, it can be stated that one of the functions of learning media is as a teaching aid that also influences the learning conditions that are arranged and created by the lecturer.

Master of English Language Study Program FKIP UNTAN is one of the educational units that prepares lecturers to further improve their professionalism in learning and teaching English as a foreign language. In order to further improve the quality of graduates, master program is always trying to adapt technology into the learning process, so that the EFL function which is the target of learning can be carried out more optimally,
implementable, and relevant to the Kalimantan terrain which requires motion optimization to traverse the map of a very wide area and sometimes not reachable by development facilities.

Referring to the empirical background mentioned above, the researcher intends to elaborate and develop internet-based media as an alternative to the needs of learning on campus, especially master program students in order to obtain the optimal use value of technology in EFL learning. The study of this research is on the aspects of EFL learning using internet-based media, and how the development of EFL learning in the master program which is to increase students’ creativity in mastering EFL in the digital era.

Learning Media

The term media comes from Latin which is the plural form of "medium" which literally means intermediary or introduction. The general meaning is anything that can channel information from the source of information to the recipient of the information. The teaching and learning process is basically also a communication process, so the media used in learning is called learning media. [Heinich, Molenida, and Russel, 2003] argue that "technology or learning media as a scientific application of the learning process in humans in the practical task of teaching and learning. According to [Heri & Helmi, 2019] media has practical value to generate learning motivation, to make abstract concepts concrete, for example in explaining the stages of EFL through graphic films, overcoming classroom boundaries in displaying objects that are too large such as temples, and can also overcome the differences in students' personal experiences with one another. The media can also display objects that are too small and rare to be observed directly. So in this case the educational media in campus learning is very useful to achieve the goal so that the teaching and learning process can take place effectively & efficiently.

Internet a Learning Media

The internet is an abbreviation of interconnected networking which means a computer network that is interconnected between one computer and another that forms a computer network throughout the virtual world, so that they can interact, communicate, and interact with each other exchange information or exchange data. The internet as a learning medium brings students to study independently. Students can access online from various libraries, museums, databases and get primary sources on various EFL events, biographies, recordings, reports, and statistical data. Students can act as a researcher, become an analyst, not only consumers of information.

Internet-based learning media is an integral component of the learning system. That is, learning media cannot be separated from the learning process. It is as a very strategic instrument, can be manipulated, seen, heard, read or talked about that utilizes networks as a method of seeding, interaction, and facilitation. Without learning media, the teaching and learning process cannot occur. Every teaching and learning process requires the selection and use of at least one medium to convey learning. Because learning media contain information that can be in the form of knowledge or become a means for students to carry out learning activities (reading, observing, trying, doing questions, answering questions, etc.), then learning media is closely related to learning resources. Learning resources are everything that can be used by students to facilitate the learning process so as to achieve learning goals effectively and efficiently. According to [Oemar Hamalik, 1982], learning
media are tools, methods, and techniques that are used in order to make communication and interaction between lecturers and students more effective in the education and teaching process on campus. While the notion of internet-based learning media for example (e-learning) is a learning media using the internet as a medium in order to streamline communication and interaction between lecturers and students in the education and teaching process. Internet-based media may cover: email, google classroom, WA, Zoom, chat medium, video/teleconference, blog, LMS/e-learning, web, and the like.

The development of internet technology allows the use of the functions of various learning media by using a tool called multimedia, which is able to convey information and learning materials in the form of text, images, sound, animation, film, and even interaction. The computer is one of the multimedia tools, because the computer is able to present information and learning materials in all forms, even with computers in real situations that require a long time or are very expensive and contain risks that can be simulated with computers. Through multimedia, abstract concepts can be presented more clearly in the learning process to make it easier for students to understand them. Based on the use and how to use it, learning multimedia can be grouped into two, namely presentation multimedia and independent learning multimedia.

Learning media can go beyond the boundaries of the classroom. Many objects are impossible to see directly in the classroom by students because: the location of the object is very far, the object is too big, the object moves too slowly, the object moves too fast, the object is too complex, the object is easily damaged, the object makes noise. By using the right media, all objects with these properties can be presented to students. Learning media can overcome the limitations and differences in the experiences of students so as to produce uniformity of observations. If students cannot be brought to the direct object being studied, then the object can be brought before the students. The object in question can be in the form of real objects, miniatures, models, or audio-visual recordings. Learning media can also display objects or events that occurred in the past and are no longer available now, for example with pictures/photos, slides, films, videos, or other media for students who clearly know historical objects/events. This is possible because of the fixative nature of media that can capture, store, and re-display an object or event. Thus, objects or events can be drawn, photographed, recorded, or filmed and then stored and can be re-shown as the original event and observed when needed.

Learning media can reach a large audience (distributive ability) and allow them to observe an object simultaneously. With radio or television broadcasts, hundreds or even thousands of (students) can attend lectures/lessons presented by a professor/lecturer at the same time. Likewise, through e-learning, there is no limit to the number of students and time to study the same material over and over again. According to [I Wayan Santyasa,2007], the learning process contains five components of communication, namely lecturers (communicators), learning materials, learning media, students (communicants), and learning objectives. So, learning media are everything that can be used to channel messages (learning materials), so that they can stimulate students’ attention, interests, thoughts, and feelings in learning activities to achieve learning goals.

**Research Method**
This study develops EFL learning through the application of Internet-based media in the master's program of English education. The form of research used in this research is development research. To produce research outputs that are relevant, maximal and significantly efficient as intended, the research method chosen must be in accordance with the stated objectives, namely Development Research with ADDIE design (Analysis, Design, Development, Implementation, Evaluation). However, to see the efficiency and maximize the limitations, the researchers did not implement ADDIE completely but only stopped at ADD, while the IE was recommended to be carried out in the next research and or submitted to other similar researchers.

This development research is implemented to provide an introduction, understanding, and model that is generally intended to respond to EFL teachers and learners in the English Education Master Study Program to be more professional in carrying out service tasks as relevant and up-to-date English educators in accordance with progress, era and technology. For this reason, the researcher did triangulation to cover the validity aspects with the collegial expertise, and viewed that it is relevant.

The procedure of constructing the steps in this research considers the activities of doing needs analysis which cover analysis on learners, analysis on the materials of EFL targeted, analysis of the classroom activities, and analysis on the performance plan of learning result. Beside that, identifying students' characteristics is also important to do for preparing the EFL learning materials which match to the real setting of target quality. For more comprehensive achievement in the learning outcomes, determining: the media, learning resources, online application, and the network devices is important to map for its holistic learning target. The following is the table representing the area of items in learning based on internet mapped.

<table>
<thead>
<tr>
<th>Stage</th>
<th>Task</th>
<th>Functions</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Analysis</td>
<td>Learners’ characteristics analysis</td>
<td>Students’ basic information analyzer and manager</td>
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<tr>
<td></td>
<td></td>
<td>Students’ score system analysis</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Targeted material analysis, analysis of materials, and online-teachers</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Internet browser</td>
</tr>
<tr>
<td></td>
<td></td>
<td>URL browser, recorder, URL resource bank</td>
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<tr>
<td>2. Design</td>
<td>Developing course outline</td>
<td>Syllabus builder</td>
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<tr>
<td></td>
<td>Developing unit and lesson plan</td>
<td>Unit plan builder</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Lesson plan builder</td>
</tr>
<tr>
<td>3. Development</td>
<td>Preparing teaching materials and internet</td>
<td>Course page editor and manager</td>
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<tr>
<td></td>
<td>pages such as online-handouts, assignments, learning worksheets, etc.</td>
<td>Educational page editor</td>
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<td></td>
<td>Course page editor</td>
<td>Learning worksheet editor</td>
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<td></td>
<td>Slide editor</td>
<td></td>
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<tr>
<td>4. Practice</td>
<td>Information, test questions, and slides</td>
<td>Test editor &amp; manager classroom use.</td>
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<td></td>
<td>Carrying out class-teaching activities</td>
<td>Daily-course bulletin</td>
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<td></td>
<td>Online evaluation &amp; communication</td>
<td>Online-synchronous communicator</td>
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<td></td>
<td>Online asynchronous communicator</td>
<td>Online-asynchronous communicator Online</td>
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</tbody>
</table>
Research Results and Discussion

In some typical data collected, it was the authentic findings that technological progress can be developed in a positive direction for the world of education. It is in line with the results of observation, questionnaires and interviews conducted regarding to this internet-based learning. It can also be identified that several results of the study, including the following: student responses to the online lecture system, student responses to the materials presented online, student responses to the role of online lectures to increase student learning independence, and student responses to the management of online lectures by lecturers, and student inputs for improving the online lecture system are revealed.

From the recapitulation of the results of the questionnaires, data can be obtained that overall, the dominance of Yes which is a positive response of students in internet-based EFL learning (e-learning system) illustrates the integration of students' positive behavior in responding to the use of internet media to improve their EFL learning achievement. They realize that technology must be used in supporting their learning activities, although here and there it still has to be perfected and improved; especially the connection and network infrastructure.

Moreover, lecturers are also encouraged to be creative in delivering internet-based learning. This is in line with the findings of [Ardian and Pramudya, 2018] in their research which explains that technological progress can be developed in a positive direction for the world of education. Not only utilization and convenience, but also towards planting and strengthening student character values. The alive convenience obtained is used as capital in improving the condition of the wider social-academic environment which is in a condition of apprehensive character. Online learning activities are carried out to provide direction and guidance to students so that students are active in implementing distance learning during this pandemic. Lecturers see the online learning process is sometimes able to create a self-directed learning process where based on there awareness students really need to learn throughout their own perspectives and interests. Lecturer mentoring strengthens the students to be more relaxed and understand what to do personally at their level of achievement.

Moreover, lecturers are also encouraged to design comprehensive and interesting instructionals so that students don't get bored. Required to be active in the class group whatsapp,
to accommodate any obstacles faced by students. For assessing, students are given the task of working on questions, making a collaborative project or practicing a scene in the learning material by making a video of the assignment and sending it to the lecturer. Lecturers are also encouraged to be creative in delivering online learning by understanding its characteristics. At this stage the lecturer prepares additional materials according to the draft of the teaching plan prepared at the design stage and the actual teaching needs, and then places the finished material on the internet site for students to review before and after class.

Most of the available tools for internet-based development and course management creates the necessary support for the production of instructional internet pages and provide assistance with the preparation of additional teaching materials such as worksheets and study slides. Therefore, the main task in this stage is to produce all the materials (learning worksheets, slides, etc.) required for the production of instructional internet pages and the implementation of teaching activities in an internet-based support environment. On of them, for this setting, is the use-case diagram. It is a diagram model that is used to describe the expected functional requirements of a learning system. By creating use case diagram in their process of learning, students are strengthened to relate learning-association lines based on their inner awareness. Therefore, use case represents opportunities of interaction between the learner and the learning system on their self-access. It also means that a learner is an entity that is an active human creating interaction with the system to perform certain tasks. Thus, learning can be understood as an awareness-moment to associate the learning environment to the center of creativity and innovation. It is touching the self-direction and aspects of interaction to maximize their eagerness of being much more humanistic and “homo sapiens” rather than artificial intelligence.

Use case diagrams for e-learning can be visualized as follows:

![Use Case Diagram on Learning Activities](image)

**Internet-based Learning Development**

Relating the social-ties of learning activities, what is important in the success of internet-based learning is an understanding of how learning technology can improve the development of learning activities and how internet can be integrated effectively into existing learning modes. This is to ensure that, regardless of the planned approach and learning outcomes and the learning potential of learning students can be maximized. Furthermore, learning occurs
in social and curricular and physical contexts. Individual relationships within groups or groups that cover learning activities also affect learning outcomes. The curricular context also influences the learning process through certain suggested pedagogical approaches which in turn must match the conditions of the learners, the resources available in the learning environment and the expected outcomes.

The design of learning activities in internet based learning as a technology-rich context must consider several elements involved. 1) Learners, who have learning needs, motivation to learn, previous learning experiences, social and interpersonal skills, preferred learning styles, and ICT competencies. 2) Expected learning outcomes, addition of new knowledge, academic and social skills, increased motivation and abilities develop. Taking these factors into account, the activity is designed to improve the learner's linguistic skills and increase the rate of recruitment and retention by developing the learner's confidence and learning comfort. 3) Learning environment (physical/face-to-face contact, online/virtual, learning resources, equipment, facilities and learning services available and their suitability to the needs of learning students). Learning can occur inside and outside the classroom. 4) Learning activities that direct students to learn to the planned learning outcomes. These activities can combine activities in face-to-face lectures and online activities to spur the development of linguistic skills and allow students to learn to test their understanding without losing confidence in self-motivation. 5) The approach taken is related to the needs and learning styles of the students, the nature of the learning environment, and the expected learning outcomes. The use of digital media in the form of images, videos, audio equipped with communication facilities that allow learning students and lecturers to interact with each other can create an online learning atmosphere similar to a face-to-face atmosphere advance. Ongoing assessment activities in the form of interactive quizzes can be designed to allow students to learn to test and develop their understanding.

The design of using internet based learning through Learning Management System (LMS) brings some practicalities for the students to present materials being learned and the activities of learning. This all reflects the strong inner awareness and intention to maximize learning outcomes through self-directed activities and association with authentic and contextual environment. Here, the function of a lecturer is changing into co-learner and facilitator. Lecturer is not the only center of knowledge anymore but he/she is a friend-learner. This makes the LMS get its flexibility to promote collaborative lesson plan, to design the contextual instructional, to state the learning objective, to provide the students’ activities, determine learning outcomes, to develop interaction types of active-creative performance, to deliver the projects, to construct the assessment instruments, and to reflect the feedback of learning for the grading target. The following is a figure to show how EFL internet based learning functioned as an alternative creation on learning system.

Students: Visit the LMS with Inner Awareness Drive

LECTURER: EFL INSTRUCTIONAL DESIGN

Yuliana. Internet-Based...
Managing internet-based classes is not much different from managing face-to-face classes. The difference is, to manage online classes. Here, the lecturers must prepare written materials or other materials in the form of digital files (text, images, sound, video, etc.) which will be presented online and studied by students. The form can be in the form of writing files (text), image files, animation files, sound files (audio), and even digital video files. In face-to-face lectures, lecturers may not have to prepare lecture materials in writing, because everything will be delivered orally or written on the slides/whiteboard during face-to-face meetings.

**Conclusion**

By utilizing the existing internet network infrastructure in Untan, it is now possible to carry out internet-based online lecture stems as an alternative to the face-to-face lecture system. The Internet-based online lecture system that has been developed in accordance with Untan cyber area can be used by lecturers in the Untan environment, including the English Master Study Program to manage online lectures that can be accessed by lecturers and students both from the Untan environment, as well as from outside or through the internet in general. Implementation of online lectures properly will provide benefits both directly and indirectly to lecturers and students. The obstacles that exist in the implementation of online lectures can be overcome by carrying out continuous system maintenance, providing adequate access facilities and socializing the Internet-based lecture system.

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