Online Lecture Model as an Effort to Improve Higher Education Quality

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ABSTRACT

Modern learning systems based on information technology provide broad coverage that is very suitable for the public that can be accessed in various places and times. This system can be accessed by various levels of society to the middle. One step in developing network technology and information technology for the development of learning systems in tertiary institutions is the online lecture system (in networks) between tertiary institutions. This study addresses issues relating to bold learning systems (in networks) and the disparity in the quality of higher education. The data collection technique used in this research is the study of literature. The results showed that the online college system had a positive contribution to encourage disparities in the quality of higher education in Indonesia. Indications such as 1) Minimizing access to higher education that has certain qualities. 2) Cutting the limitations of facilities that must be resolved as one of the challenges of the low quality of higher education. 3) Removing the limits of understanding on certain material. 4) The online lecture system provides broad access to educational resources, especially in leading universities. 5) The necessary implementation of a strong foundation that is philosophy and emulates Ki HajarDewantara who is strengthened in the cultivation of noble values needed by the nation himself.

Keywords: lecture, daring, study, college

1. INDTRODUCTION

Modern learning systems based on information technology provide quality coverage suitable for millennial communities that can be accessed in various places and times. This system can be accessed by various levels of society from middle to medium. The industrial revolution 4.0 makes it easy for people to connect online, such as social media and can access information quickly.

One step in utilizing network technology and information technology for the development of learning systems in tertiary institutions is the online lecture system (in networks) between tertiary institutions. One of the initiators of this system is the Ministry of Education and Culture of the Republic of Indonesia. The Ministry of Education and Culture through the Directorate General of Higher Education creates a website pditt.belajar.kemdikbud.go.id which is expected to be an effective means for students to learn knowledge without limits. The learning process in this way is considered very good, because learning resources can be used free of charge by thousands of people in need. So, students from tertiary institutions living in remote areas will be able to access courses at leading universities in Indonesia.

This learning process will attract students, because the delivery of data prepared in the media is fun, and easy to digest, so that makes students want to know better. Content that is complete, clear, fosters interest in learning, will increasingly be loved until the growth of intelligent, knowledge-rich societies, even to the point of being able to develop their knowledge through experiments, research, studies that will ultimately be empowered by developing their competencies. To enrich the content of this learning resource Ministry of Education and Culture collaborates with leading universities in Indonesia that have scientists, researchers, innovators, and co-creators in the field of information and communication technology and are knowledgeable in their fields. Ideally, if this learning resource is able to be accessed by many users, it is

cheap, and dynamic, it should be able to be produced by lecturers in tertiary institutions in order to foster higher education technoprenourship.

The quality of higher education is a demand, both from the general public, students and parents as well as by the government as responsible for higher education nationally [1].

The constructive steps taken by the Ministry of Education and Culture were taken because there were still disparities in the quality of higher education in Indonesia. Some indicators of the quality disparity of tertiary institutions are: 1) there are still many tertiary institutions with very limited capacity. 2) Low affordability of tertiary institutions due to uneven distribution results in an increase in tuition and accommodation. 3) Most universities do not yet have adequate and quality educational resources. 4) Higher education quality is more centralized in Java so that students outside Java lack access to good and quality education. 5) Many universities are still in the stage of incubation / guidance by the government in providing satisfactory services 6) Higher education is still low in ensuring the fulfilment of quality graduates [2].

Seeing the urgency of this online lecture system and the phenomenon of distance differences in the quality of higher education, this research was conducted to answer the problem of disparity. Considering there are still many universities that still doubt the success of the online learning system. Lecturers are still half-hearted or even afraid to carry out online lectures. The results of this study are expected to be a breath of fresh air for the development of online learning model formulations in tertiary institutions.

Based on the background description above in this study will examine and answer the problem formulation as follows: First, how is the formulation of cross-college online learning models through education management studies? Second, how does the contribution of online learning model formulations contribute to reducing the quality gap in higher education?

2. LITERATURE RIVIEW

2.1. *Basic Concepts of the Online Lecture Model*

The use of telecommunications technology for learning activities in schools in Indonesia is increasingly conducive with the emergence of an online lecture system. The term online is an acronym for "in the network". So, online lectures are one of the methods of learning online or done through the internet network. The online lecture system was developed by the Ministry of Education and Culture of the Republic of Indonesia through the Indonesian Open and Integrated Online Lecture Program (KDITT). KDITT is a

government program in reaching students on a national scale [2].

The objectives of the Integrated Open Indonesian Online Lecture Program according to the Indonesian Ministry of Education and Culture [2] are as follows:

- Increase the availability of educational services

- Increasing the affordability of education services

- Improve the quality/quality and relevance of education services

- Increase equality in getting the quality of education services, and

- Increasing certainty/guarantee of getting good quality education services

There are three things related to the development of online lectures, namely content, channels, infrastructure or information technology (IT) [3]. In connection with the pre-requisite conditions for online learning, there are three things that need to be completed, namely: (a) the teaching and learning process is carried out through an internet connection, (b) the availability of facilities for students in their services, such as print, and (c) the provision of tutors if there are difficulties in the process learning [4]. Besides that, there are additional requirements, such as: (a) the organizers of e-learning activities, (b) positive lecturers and students in the main functions of the internet, (c) the design of the learning process system that can be learned by all students, (d) the existence of an evaluation process from a series of student learning processes, and (e) feedback mechanism from the organizer.

Thus, it can simply be said that online learning is a learning activity that utilizes networks (Internet, LAN, WAN) as a method of delivery, interaction, and facilitation and is supported by various other forms of learning services.

The benefits of online learning according to [5] consist of 4 things, namely:

- Increasing levels of learning interactions between students and teachers or instructors (enhance interactivity),

- Enabling learning interaction from where and when only (time and place flexibility),

- Reaching students in a broad scope (potential to reach a global audience),

- Facilitate the improvement and storage of learning materials (easy updating of content as well as achievable capabilities).

According to [6], explaining that there are several activities that must be present in online learning, namely: 1) Increasing student attention, 2) Conveying learning objectives to students, 3) Encouraging students to recall memories of information they have learned, 4) Presenting specific stimuli, 5) Giving instructions for learning, 6) Obtaining student performance, 7) Providing informative feedback, 8) Assessing student

performance levels, 9) Improving retention and transfer of learning [7].

2.2. The function of philosophy in the science of education

Philosophy is the view of life of a person or group of people which is the basic concept of the life that is aspired. Philosophy is also interpreted as an attitude of someone who is aware and mature in thinking things deeply and wants to see in broad and comprehensive terms with all relationships. Philosophy and education go hand in hand, giving and receiving. Each of them is a tool and the end for the other. They are processes and products [8].

Table 1. Short cut keys for the template

No.	Science philosophy	Education Management
1.	As a tool to find the truth of all phenomena that exist	The achievement of educational goals effectively and efficiently
2.	Defend, support and fight or stand neutral against other philosophical views	The realization of an atmosphere of learning and an active, creative, effective, fun, and meaningful learning process.
3.	Provides an understanding of the way of life, outlook on life and worldview	The creation of students who actively develop their potential to have religious spiritual strength, self-control, personality, intelligence, noble character, and the skills needed by themselves, society, nation, and country
4.	Give teachings about morals and ethics that are useful in life	Fulfillment of one of the 5 competencies of the teaching staff (support for the managerial competence of the teaching staff as a manager)
5.	Being a source of inspiration and guidance for life in various aspects of	Providing education staff with theories about the processes and tasks of educational administration
	life itself, such as economics, politics, law and so on	(supporting the profession as an education management manager or consultant);
6.	Solve scientific problems intelligently and validly	The problem is the quality of education problems because 80% of quality problems are caused by management;
7.	Synthetic-applicative thinking (cross-science-contextual)	The creation of equitable, quality, relevant and accountable education planning;
8.	Critical to scientific or scientific activities	Increasing the positive image of education

Philosophy is not the result of research or experimentation. Right or wrong cannot be tested with facts. Philosophy is the result of thought. Then the thought will also accept or reject [9]. This statement implies that philosophy is the result of thought which of course in the process of improving science there is a classification, the pros and cons. Opinions say that philosophy is science, while other opinions say that philosophy is not related to science.

2.3. Educational philosophy by Ki Hadjar Dewantara

Ki Hadjar Dewantara has the principle that education should strengthen the cultivation of noble values possessed by the nation itself. This is as an effort to humanize humans. Education gives independence to students even though it is not free. The limits given are related to natural nature.

In the philosophy of education Ki Hadjar Dewantara is known as the system where students are likened to plants. A good farmer understands the characteristics of plants, so an educator must understand the characteristics of his students. If Ki HadjarDewantara focuses on the nation's noble values, don't lose your identity, then complement each other by focusing on personal, love, and self-awareness. An individual should realize that his existence also influences the environment, both other humans and nature. Therefore, education should focus on self-development so that it can benefit themselves and the environment.

3. METHODOLOGY

This research is a qualitative descriptive research. This research seeks to study problems related to online learning systems (in networks) and higher quality disparities in higher education. Data collection techniques used is study of literature [10]. Researchers conduct studies and explorations of online learning systems.

In addition, researchers will examine documents related to online learning systems, including lecture material, lecturer lists, student lists and the like. The method used in analysing the data of this study is descriptive-interpretative.

4. RESULT AND DUSCUSSION

4.1. Cross College Higher Education Model Formulation through Website

Open and Integrated Indonesian Online Learning (PDITT) is one form of technology utilization in learning. PDITT functions to bridge, minimize the gap, availability, affordability, and quality of higher education in Indonesia. On this website, students who have been connected can access several courses that are presented wherever and whenever they want. The courses offered at PDITT can be attended by students from any tertiary institution by the general public.

Requirements that must be met to take part in lectures here are to ensure SKS, course contracts and internal academic requirements of the student's home campus. Students have registered at their respective colleges. So the database entered here can be valid according to data provided by the university.

Lecture activities have been arranged within a certain period. Students can access material in a course in accordance with a predetermined time. Usually each topic is accessed within one week, but that depends on the amount of material in a course.

The Learning Model offered varies according to the material provided. But the majority of PDITT courses use modules, videos / animations and discussion forums as learning material, then end with assignments / quizzes every week.

Forms of assessment are usually in the form of group and individual task assessments, making products, and quizzes. But this depends on the course in question. Students can see the details in the course description concerned.

On the homepage of the website pditt.belajar.kemdikbud.go.id there are four main menus displayed, namely: 1) Online Courses, which are a collection of resources and learning activities in a course package that can be accessed online, according to process standards and standards content, and obtain a certificate that can be transferred, 2) Open Courses, i.e. a collection of learning resources or digital assets that

are packaged in a course package that can be accessed and utilized openly to the public. 3) Open Material, contains learning resources or digital assets that can be accessed and utilized openly to the public. Some materials that can be accessed include Confucian Religious Education, Christian Religious Education, Catholic Religious Education, Islamic Religious Education, Religious Education, Buddhism, Hindu Religious Education, University of Indonesia Public Lecture Collection (13 collections), Air Pollution Control Techniques, Building Planning Wastewater Treatment, Industrial Wastewater Management, Introduction to the Management of Settlement Environment Infrastructure, Evaluation of Planning of Settlement Environment Infrastructure (STD), Ecotoxicology, Environmental Biotechnology, Joni Hermana, Academic Presentation, and Housing Environment Infrastructure. 4) Discussion Forum, which is used as a means of discussion between students, lecturers with students, lecturers with lecturers, and students with organizers.

The learning model in the online lecture system is student centred. This learning model is project based. The stages of learning are as follows:

- Initiation. Take a topic that matches the real-world reality and begin with an in-depth investigation. Essential questions are asked to provoke knowledge, responses, criticisms and ideas about the project theme to be raised.

- Planning. Planning contains rules, the selection of activities that can support in answering essential questions by integrating various possible subjects, as well as knowing the tools and various materials that can be accessed to help complete the project.

- Scheduling. Educators and students collaboratively arrange activities in completing projects. This schedule is structured to find out how long it will take to complete the project.

- Supervision. Educators are responsible for monitoring student activities while completing projects. Monitoring is done by facilitating students in each process.

- Assessment. Assessments are carried out to assist educators in measuring the achievement of standards, play a role in evaluating the progress of each student, provide feedback about the level of understanding that students have achieved, help educators in developing the next learning strategy.

- Evaluation. At the end of the learning process, educators and students reflect on the project activities and results that have been carried out. The reflection process is carried out both individually and in groups. At this stage students are asked to express their feelings and experiences while completing the project.

4.2. Findings of Online Learning Systems in improving the Quality of Higher Education

The material in the online learning system is different from conventional learning materials. Online learning material is digital so it requires the help of technological devices. Therefore, the development of online learning systems has advantages over conventional systems, namely:

- Using technology that is cheap and available today. The technology used only uses pdf reader and flash reader because the files provided are in the format of * .pdf fan, and *, .swf.

- Using technology that allows direct interaction on the page, and records the use of material to be able to compare the user's progress in understanding the material presented.

- Using technology that is device independent, so that it can be accessed with a PC, notebook, tablet or smartphone.

- Using multimedia technology to provide interesting illustrations so that it can inspire students to be interested in learning the material.

- Describe information about material in the form of metadata in the Extensible Mark-up Language (XML) language, so that the material is more accessible via the internet.

- Package material so that it is sharable (can be shared) and can be downloaded by anyone wherever he is.

Referring to online findings in higher education as described above, the philosophical school that might be applicable is social / cultural deconstructionism. This is based on the concept of reconstruction education itself. Students are adult learners. As adult learners, students are expected to have character. Therefore, adult education is more focused on social interaction and solving various social problems. Author [11] who states that humans are creators and destroyers of civilization. This is in line [12] who states that schools are agents of change in social reconstruction. This reconstruction must remain by maintaining the characteristics or character of Indonesia.

Ki Hadjar Dewantara has the principle that education should strengthen the cultivation of noble values possessed by the nation itself. This is as an effort to humanize humans. Education gives independence to students even though it is not free. The limits given are related to natural nature. Students must not forget the ideology of their respective nationalities that have the characteristics of their people

5. CONCLUSION

The formulation of online lecture models is a distance learning system that uses technology assistance. Students and lecturers do not need to face-to-face during the learning process. In addition, all learning material and assignments are done online.

The online lecture system has a positive contribution to reduce the quality gap of universities in Indonesia. Some of the indications include 1) minimizing the limitations of access to quality higher education, because universities in remote areas can access higher quality education available in big cities. 2) Break the limitations of facilities which so far have been considered as one of the obstacles in the low quality of higher education. The online college system does not require super-sophisticated and expensive facilities; just use a PC, notebook, tablet or smartphone, which is currently quite affordable by the public. 3) Eliminate the limitations of understanding of certain material. The online lecture system provides a more comprehensive understanding than conventional systems, because the material is displayed digitally and in the form of animation. 4) The online college system provides broad access to educational resources, especially those in leading tertiary institutions.

Adult education by relying on online is more focused on social interaction and solving various social problems, but in its implementation a strong foundation is needed, namely philosophy and understanding the teachings of Ki HajarDewantara which reinforces the cultivation of noble values which are owned by the nation itself.

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