PARTICIPATION OF INDONESIAN STUDENTS IN THE ASYNCHRONOUS ONLINE COURSE¹

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Abstract

Online course is a common course in the development countries, since most of the people are able to afford computer facilities. Indonesia, as a developing country, has to face the reality that online course is still rare and regarded as an "alien". Besides the limitation capabilities of the Indonesian people in technology access, there are also many limitation capabilities in the understanding the role of virtual learning. As a country that has an oral culture, students prefer to listen to their teachers. Learning without teacher is something unusual for them. Therefore, the development of on-line course is a challenge.

This article would discuss the participation of Indonesian students in online course, especially an asynchronous online course. The article would discuss the effect that asynchronous online course has on students level of participation in self-directed learning environment, that is a distance education institution. The discussion would be based on the experience of Universitas Terbuka (UT), a distance education institution in Indonesia, in conducting the asynchronous online course. Online course in UT is offered to the students as one of the learning supports. The discussion in this article would be expected to provide information that can be used in developing and enhancing a better asynchronous online course.

Keywords: asynchronous, e-learning, online tutorials, participation, distance education

Introduction

In the developed countries, online course is a common course since people are able to afford computer facilities. The paradigm that teaching and learning could be in the virtual classroom has already been accepted, and it influences human's life. Teaching and learning could be anywhere, where teacher and students do not always meet face to face.

In the developing countries, such as Indonesia, the paradigm of a virtual classroom is still regarded as an "alien". Teaching and learning still have a meaning as an interaction between a teacher and students in the classroom in the physical term. It means

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that the interaction happens in a synchronous time of teaching – learning. It is a difficult thing to accept the new concept that teaching and learning could occur in a virtual classroom and in an asynchronous time.

As mentioned by Darmayanti & Setiani (2003), the reality in Indonesia shows that many books and researches discuss about how to teach in the classroom. Since, the teacher has a dominance in learning in the classroom. Effective teaching means teaching that focused largely upon presentational teaching characteristic. It reflects the dominance of the lecture method in university course (Garrison & Anderson, 2000). It will be difficult for Indonesian researchers to find out books and researches about teaching and learning which is conducted not in the classroom or in virtual classroom. Most of the Indonesian books about teaching discuss about how to teach effectively in the classroom, how to conduct interaction with the students in the classroom, how to motivate students in the classroom, etc.

This article discusses the prior experience of Universitas Terbuka (UT), a distance education institution in Indonesia, in implementing the teaching and learning through the internet which happened in an asynchronous time. The purpose of this article is to describe the participation of the students who were involved in an asynchronous online course, based on the experience of UT. The discussion would be expected to provide a better understanding on how students perceive the different paradigm of teaching and learning in a virtual classroom.

Paradigm of Learning

As mentioned in the beginning of this article, in Indonesia, the common paradigm of teaching and learning, which is a conventional paradigm, is that an interaction between a teacher and students occur in the classroom in the physical term. The other paradigm is that an interaction between a teacher and students could occur in the virtual classroom, where a teacher and students do not meet in the physical term, which has known term widely as an Electronic Learning or *E-learning*. Virtual classroom allows interaction occurs between teacher and students both in a synchronous and in an asynchronous time. A synchronous interaction between teacher and students occurs at the same time or in a real time, e. g online chatting. On the other hand, an asynchronous means that the interaction between teacher and the students possibly occur not at the same time, e. g online tutorial that would be discussed in this article. Table 1 shows the differences that could be noted between those two paradigms.

Conventional learning	E-learning					
Teacher centered	Student centered					
Teacher pace of learning	Student pace of learning					
Face to face learning	Distance learning					
Synchronous time of teaching - learning	Synchronous or asynchronous time of					
	teaching – learning					
Teacher-directed learning	Self-directed learning					
Ability to communicate face to face	Ability to communicate in writing					
Ability to talk in front of the classroom	Ability to use media/computer					
Face to face interaction	Virtual/media interaction					

Table 1. Differences between Conventional and E-learning

In Indonesia, only a few of the educational institutions provide a virtual classroom. One of them is Universitas Terbuka (UT). In the following paragraph, a brief discussion about UT is presented.

Experiences of Universitas Terbuka (The Indonesian Open University)

UT is a state university that uses distance education system. UT provides a selfdirected learning environment that offers an opportunity for the students to arrange their study in a flexible way. As a distance education institution, UT enables its students to study from isolated and rural areas without attend to the classroom.

UT offers programs under four faculties, those are: the Faculty of Economics and Developmental Studies (FEKON), the Faculty of Social and Political Sciences (FISIP), the Faculty of Mathematics and Natural Sciences (FMIPA), and the Faculty of Teacher Training and Educational Studies (FKIP).

To support the students self-directed learning process, UT offers tutorials, which since 1999 has been developed into four modes of tutorial: face to face tutorial, audio/ radio and television broadcast tutorial, written tutorial, and Internet-based tutorial. For UT, the large number of courses to be tutored as well as the spread of students' location makes it imperative to enhance the potential use of this Internet-based tutorial system in a more comprehensive way (Belawati & Sigit, 2004).

Internet-based tutorial is an asynchronous online course which enable the interaction occurs between tutor and students not at the same time. UT provides Internet-based courses in a few ways, those are:

- 1. **Online course,** which enables the students to access the learning materials and takehome exams, and also enables the students to interact with their teaching assistants through the UT homepage address: <u>http://www.ut.ac.id</u>
- 2. Web-based supplement, which provides learning supplements to the students, such as articles, papers, proceedings, and books that become supplements for the major modules. Web-based supplement could be accessed through the UT homepage address: <u>http://www.ut.ac.id/ol-supp/ba-suple.htm</u>

- 3. Online Tutorial (Electronic tutorial), which has two modes, those are:
 - Online tutorial in group: through this media the students will get the supplement materials. The tutorial is taken care by the tutor of the learning subjects Universitas Terbuka. The tutors are responsible to provide initiation in this tutorial. Through this tutorial, the students will be able to interact with other students by giving topics to be discussed or by responding the topics in the tutorial. The activity of the students in this tutorial will contribute 10% of the final score of the students. This tutorial could be accessed at http://www.ut.ac.id.
 - Individual online tutorial: In case the students have some difficulties in learning their subject, they can ask for assistance from their tutor individually by sending an e-mail to: info@p2m.ut.ac.id.

Online tutorial was first begun to be offered to the UT's students in 1999 (Soleiman, 1999). There was a technical change that caused a change in application of online tutorial, which then was socialized in September 2002 (Darmayanti, 2004).

Participation in Online Tutorials

This article would discuss the participation of the 599 students, as a sample of students population who were involved in online tutorial, were derived from many sources such as faculty coordinator's reports, tutor's reports, computer center and other secondary documents.

UT offers around 1,336 courses under four faculties. The online tutorials were offered to about 167 courses from four faculties in Semester 2002.2 and 2003.1 (Universitas Terbuka Catalog, 2003). The table 2 shows the number of courses offered by faculties in those semester.

Faculty	Number of courses	%
FISIP	59	35
FEKON	18	11
FMIPA	37	22
FKIP	53	32
Total	167	100

Table 2. The Number of Courses Offered by Faculties

Each course was taken care by one to three tutors. However, there were a few courses that have no activities since the tutors did not put any initiation as a requirement of the online tutorials. This kind of problem was differentiated from no activities because of no students participated in the online courses. It explains that participation of the students could be elicited by tutor participation in online tutorial. Table 3 shows the example of tutor activities that derived from a FISIP report in semester 2003.1.

Online Tutorial Activities	Number of courses	%
Grade attached (there were tutorial activities)	25	42,4%
Tutors active – no grade attached. (tutors fulfilled the requirement, possibly no activities from the students)	28	47,5%
No activities from tutors	6	10%
Total	59	100%

Table 3. Online Tutorial Activities by FISIP Tutors

The report of tutorial online activities in FISIP-UT (Darmayanti, 2002; Santosa and Darmayanti, 2003) indicated that the problems in tutorial online activities were:

- 1. tutors did not do their jobs;
- 2. technical problems;
- 3. less computers facilities;
- 4. managerial problems in the faculties;
- 5. students problems, and
- 6. inadequate selection of the courses.

The problems that face by UT, as mentioned from the report of FISIP Online Tutorial, is similar with what Forsyth stated that even the internet has already available, however the use of technology shows some weaknesses, such as:

- putting inappropriate material on the internet
- both the learner and the notional teacher need actively to use the facilities and options provided. Sometimes this does not happen. If there is no interaction, there is no communication. If there is no communication, it is difficult to verify that learning is taking place.

The data also shows a consistency of the problems as mentioned by Robinson (2001). According to Robinson, one of the problems encounters by the open and distance learning application is human resource capacity, such as: many staff lacked adequate knowledge of open and distance application, the level of planning for open and distance learning projects tended too be general and aroused a lot of problems. Errington (2001) explains that it is common for educational technologists to adopt a technical skills -only approach to training- leaving teachers to make their own connections between teaching, learning and the Internet. Some workshops involve teachers sitting in front of a computer screen in lab-like conditions- far removed from their real work setting. Darmayanti (2004) also mentioned that tutors' habits in online tutorial are not easy to be changed, and need time and efforts to change it. The explanation from Errington and Darmayanti might clarify the problem of lack activities by the tutors.

Robinson (2001) suggests several strategies in an organization for accelerating the attainment of critical mass in the use of interactive technologies, such as online tutorial, those are:

• Targeting senior managers and opinion leaders for support;

- Shaping individual perceptions through providing information and evidence of its value;
- Encouraging whole groups (or departments) of users to adopt the innovation rather than individuals alone;
- Providing incentives for early adopters until critical mass has been reached;
- Making its use for a 'real' work purpose and as the sole means of carrying out the work;
- Finding significant champions who will themselves use the innovation in a highly visible way.

As shown in table 4, the largest participation of the students was from students of FEKON, that was 305 students. The lowest participation was from students of FKIP, that was 17 students. The data also show that the percentage of male students participated in online tutorial were higher than the percentage of female in all faculties.

The active and passive columns show the numbers of students' participation. However, the data of students' participation in that column could be from the same students who participated more than one course.

Faculty	S	Sex	Total 1	Active	Passive	
гасину	M (%)	F (%)	Total I	Number/%	Number/%	Total 2
FISIP	137	81	218	147	167	314
	63%	37%		46,8 %	53,2 %	
FEKON	222	83	305	347	175	522
	73%	27%		66,5 %	33,5 %	
FMIPA	46	13	59	40	86	126
	78%	22%		31,7 %	68,3 %	
FKIP	16	1	17	11	7	18
	65%	35%		61,1 %	38,9%	

Tabel 4. Number of Students' Participation in Online Tutorial

Table 4 shows the number of courses that were registered by student who participated in online course. Between 62% to 94% of the students registered one course. The average courses that student registered were between one and two courses. Interestingly, even only a few, there was 0.5% of the students were registered 14 courses.

Faculty	ty Courses Accessibility (%)										
	1	2	3	4	5	6	7	9	12	14	Total
FISIP	165	35	13	2	-	1	-	-	1	1	218
	76%	16%	5%	1%		0.5%			0.5%	0.5%	
FEKON	189	64	24	14	10	2	1	1	-	-	305
	62%	21%	8%	5%	3	0.7%	0.3%	0.3%			
FMIPA	37	9	7	1	4	1	-	-	-	-	59
	83%	15%	12%	2%	6%	2%					
FKIP	16	1	-	-	-	-	-	-	-	-	17
	94%	6%									
	•	•	•	•	•	•	•	•	•	Total	599

Table 5. Courses Accessibility of the Students

The participation of students was different among the four faculties. Even the number of courses offered by FEKON was the lowest, 11%, among faculties, however the number of student participation was the highest, which were 305 students.

On the other hand, even the number of courses offered by FKIP was 32% (53 courses), there were only 17 students participated in online tutorials.

The data shows that the participation of students was high in two faculties. Those are FEKON (305 students) and FISIP (218 students). Therefore, the number of courses offered by each faculty did not describe the number of student participation.

Overall, the data in this article also explain the data from research that conducted by Belawati and Sigit (2004). Their research reveals the participation rate of online courses is low (5,456 student-courses out of 198,750 students-courses for registered courses). These data indicate that we have to find out the factors that causing these problems. One problem that might caused the students low participation was the difficulty to access the Internet facilities in their place (Anggoro et. al, 2001).

Concluding Remarks

The changing of paradigms from face to face teaching-learning in the classroom into teaching-learning in the virtual classroom in Indonesia requires a lot of time, since there are many things need to be considered, especially in changing the habit of the stakeholders.

As discussed in this article, the habit of the stakeholders caused the tutorial online participation is low. However, efforts should be increased to support higher students' participation rate. Since, the research results of Belawati and Sigit (2004) shows that students who participated in the online tutorials have higher course completion rate than those who did not. This indicates that online tutorials have a positive impact on course completion rates as expected.

This article's data also support the research result by Belawati and Sigit about gender issue, as a general assumption, that male students have more opportunity to access internet-based services. It might need a way to support the female students to also have better opportunity to access internet-based service.

The experiences of UT provide contribution for any institutions that would applied asynchronous online courses. A few suggestions that could be applied to change the paradigm of teaching-learning in the classroom into teaching-learning in the virtual classroom in Indonesia is as follows:

- 1. Never ending socialization to change the paradigms to enhance students understanding on the benefit of the internet for their study
- 2. conduct training on how to use computer facilities both for staff and students;
- 3. collaborate with other institutions, such as telecommunication Kiosks or WARNET Association, in facilitating infrastructure.

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