Video-Based Learning That Supports the Success of Flipped Classroom for Non-English Faculty

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Abstract. This research aims at exploring Video-Based Learning that supports the success of flipped classrooms for Non-English Faculty. This study uses a descriptive qualitative research design with an interpretive-exploratory approach. It was conducted at Bina Nusantara University, Jakarta from March to December 2020. This study begins with the need analysis of qualitative data of the existing course outlines and the comprehensive literature review. After that, this study analyzed the quantitative data collected from the interview of 3 sample lecturers and the questionnaire of 30 sample students. This research found that (1) the Video-Based Learning that supports the success of flipped classroom for Non-English Faculty is urgently needed by students in universities; (2) it should involve some learning characteristics (a) student-centered learning, (b) internet and library access, (c) ecosystem to generate motivation to learn, and (d) contextual learning experiences; and (3) the English Lecturers and Students of Non-English Faculty have positive perceptions on it. Therefore, the Video-Based Learning that supports the success of flipped classrooms for Non-English Faculty should involve some learning characteristics (a) student-centered learning, (b) internet and library access, (c) ecosystem to generate motivation to learn, and (d) contextual learning experiences. The results of this study have implications to provide additional references in making video-based learning that supports the implementation of the flipped classroom.

1. Introduction

Today's university students are born and raised in the digital age. They are very information technology literate and active internet users. In their daily lives, they are greatly helped by Google products and are also very used to interacting with smartphones. The technology platform facilitates students to access learning from various places and times using personal computers, laptops, tablet computers, and smartphones. Therefore, the use of this technology has made students actively participate in learning.

In connection with the above, many ideas have recently emerged to improve learning models that combine face-to-face learning in class with learning outside the classroom by utilizing technology such as implementing flipped classroom. In line with this, from previous research the students had a positive perception with flipped instruction [1]. And another result of research indicated that the flipped instruction as a better or more efficient method of teaching [2]. On the other hand, among the advantages of the flipped classroom: (a) classroom time can be used more effectively and creatively; (b) teachers using the method report seeing increased levels of student achievement, interest, and engagement; (c) learning theory supports the new approaches, and (d) the use of technology is flexible
and appropriate for 21st-century learning [3]. It means that a flipped classroom is a very useful and efficient method of teaching and appropriate for 21st-century learning.

Now, what is a flipped classroom? A flipped classroom is what was traditionally done in class, now done at home, while what was traditionally done at homework, now done in class. Thus, it can be argued that the flipped classroom is reverse class learning, which is what should be learned with the lecturer in the classroom becomes learning where students must study alone outside the classroom. In other words, in this flipped classroom, learning materials must be studied by students outside the classroom before learning in class. Then, in the class, the lecturer no longer provides learning or explaining the material, but directly does practice questions or other activities such as debates, presentations, discussions, etc. [4].

Furthermore, the Flipped Classroom model has experienced developments since it was discovered. Several variations have been developed, with videos containing learning material as the main feature. Videos based learning can be made independently or search on the YouTube channel. In this case, the most important in implementing flipped classrooms is the preparation of video-based learning that will become learning materials for students outside the classroom. Therefore, video-based learning in this case is a recording of live images to convey learning material so that students achieve learning objectives. Video-based learning is a learning medium that can activate the function of the sense of listening and watching [5].

In connection with the video-based referred to above, the research will discuss video-based that can support the Flipped classroom being developed by Bina Nusantara University. In this case, of course, video-based learning is deliberately made or designed by recording the activities of the lecturer (in this case the researcher himself) to explain the material just like in class. The choice of making this type of video-based learning was made because it was considered the best way in the flipped classroom strategy.

Video-based learning requires students to be able to learn independently. Therefore, this video-based learning approach must be student center learning. It means that learning provides more opportunities for students to construct knowledge independently and is mediated by peers. To explore a further understanding of the material that has been obtained from video-based learning, students still need to download the internet and library access. In this case, video-based learning must be able to create a learning ecosystem that should increase student motivation to learn, and understand the meaning of the subject matter they are learning by relating the material to the context of their daily lives (personal, social, and cultural context).

Finally, this study focused on exploring the lecturer and students' perceptions on the learning characteristics of video-based learning that supports the implementation of a flipped classroom at Bina Nusantara University. The results of this study are expected to imply in providing additional references when making video-based learning that supports the implementation of the flipped classroom.

2. Methods
This study uses a descriptive qualitative research design with an interpretive-exploratory approach. This research aims at exploring Video-Based Learning that supports the success of flipped classrooms for Non-English Faculty. It was conducted at Bina Nusantara University, Jakarta from March to December 2020. The population is all non-English faculty lecturers and students. The samples were selected using purposive random sampling. This study begins with the need analysis of qualitative data of the existing course outlines and the comprehensive literature review. After that, this study analyzed the quantitative data collected from the interview of 3 sample lecturers and the questionnaire of 30 sample students.

3. Result & Discussion
3.1. Need analysis
Bina Nusantara University (BINUS), one of prestigious university in Indonesia, also accommodate technology in its learning process. In line with its mission to become the world-class university, Bina
Nusantara supports the educators of higher education in fields of research, teaching-learning process, community service and self-development with technology. For fostering educators’ pedagogy skills, BINUS applies several innovative and creative learning methods to its students. One of it is a flipped classroom.

Furthermore, the researchers found that the Course Outlines of Non-English faculty is suitable to apply the flipped classroom. This learning method inverts the conventional classroom based teaching, where the students introduced to the learning materials before the class and during the class time, the students can deepen their understanding through discussion. In addition, every student and academician at Binus University is keen on mobile learning and virtual classroom. Their readiness to be active in taking the flipped classroom is very significant. Based on a survey of flipped classrooms conducted at the university level, it revealed students' more positive perceptions [6].

Seeing the readiness that exists in the non-English faculty at Binus University, it can be argued that Video-Based Learning that supports the success of flipped classrooms for Non-English Faculty at Bina Nusantara University is urgently needed by students in universities, in this case Bina Nusantara University. The learning outcomes are in line with the mission of Binas University.

3.2 Theoretical Analysis
From the literature review, it found that the flipped classroom is a learning strategy that uses a type of learning approach by reversing the traditional learning environment and providing learning content outside the classroom. Before face-to-face sessions in class, students must study learning material through video-based learning. Thus, the key to the success of the Flipped Classroom method is how to make students want to learn the material before entering class. One of them is by providing materials in the form of learning media that are communicative, interesting, audio-visual, moving, all of which can be obtained in video-based learning [7].

Furthermore, the flipped classroom model refers to a form of teaching and learning process, in which students watch video-based learning and learn other materials at home, and then they actively participate in in-class learning [8]. The use of video-based learning has become widely employed in the past years. Many universities and digital libraries have incorporated video into their instructional materials. Developing video-based learning is a complex process that requires thorough planning and a clear implementation procedure. Knowledge of learning theories and instructional implications is a pre-requisite for the successful realization of the learning content with the most appropriate delivery components. Besides, knowledge of the target learners' cognitive characteristics is very important for developing an effective learning medium. Lastly, another factor to consider for the development of video-based learning is the learners' demographical and cultural characteristics as learners' physical characteristics are crucial in the overall success [9].

The mode of lesson delivery at university should be shifted to student-centered in which lecturers will act as a facilitator. The learning activities may include video-based learning requires students to be able to learn independently. Therefore, this video-based learning approach must be student center learning. It means that learning provides more opportunities for students to construct knowledge independently and mediated by peers. To explore a further understanding of the material obtained from video-based learning, students still need to download the internet and library access. Therefore, video-based learning should be able to create a learning ecosystem to increase student motivation and understand the meaning of the subject matter they are learning by relating the material to the context of their daily lives (personal, social, and cultural context). Through these activities, students will be encouraged to develop better communication skills.

Video-Based Learning is a learning method that is deemed suitable for today's digital generation for the following three reasons: (a). Creating a fun learning environment and motivating students to learn; (b). Make it easier for students to learn and understand a study material, and (c). Make students more interested in learning through video-based learning they watch.

The criteria for effective video-based learning in higher education should include first, the video has a specific function to enhance the learning experience. So, video designers need to pay attention to what features are contained in the video. Second, video is considered effective if it is related to
learning objectives. Third, there is a learning effect that depends on the students' level. So a strategy is needed to learn effectively and independently from video-based learning [10]. The success of a lecturer in making video-based learning is one of the keys to success in implementing flipped classrooms. The use of video-based learning should be able to activate student creativity by raising critical questions so that learning becomes more meaningful.

Therefore, in this study the video-based learning that supports the implementation of flipped learning at Bina Nusantara University should be designed by involving some learning characteristics (1) student-centered learning, (2) internet and library access, (3) ecosystem to generate motivation to learn, and (4) contextual learning experiences.

3.3 Interview Analysis
The results of the interview data conducted to 3 randomly selected fellow lecturers to show all of them (100%) strongly agreed the video-based learning that supports the success of flipped classroom for Non-English Faculty should involve learning characteristics (1) student-centered learning, (2) internet and library access, (3) ecosystem to generate motivation to learn, and (4) contextual learning experiences. It concluded that the English Lecturers of Non-English Faculty have positive perceptions of the Video-Based Learning that supports the success of flipped classroom for Non-English Faculty.

3.4 Questionnaire Analysis
The video-based learning used in implementing the flipped classroom strategy for this research is video-based learning that has been tested in the previous stage. In this case, the application of video-based learning in flipped classrooms is carried out a few days before face-to-face lectures in class; the lecturer provides video-based learning to students in the form of a Google drive and provides links to students. Students can download the video via the link provided. Students study videos outside the classroom before the face-to-face learning process. Furthermore, lecturers and students met via zoom by giving questionnaires to 30 students. The results revealed that all students strongly agreed that (1). The Video-Based Learning (VBL) they have watched can motivate them to learn independently; (2). Link internet (YouTube or books) instructed in the VBL makes them further understanding about the topic; (3). This Video-Based Learning (VBL) foster their enthusiasm to explore the related material in studying; (4). This Video-Based Learning (VBL) makes them curious to learn English; and (5). The VBL can support the implementation of the Flipped classroom.

Then, all of them (100%) strongly agreed that the Video-Based Learning that supports the success of flipped classroom for Non-English Faculty should involve learning characteristics (1) student-centered learning, (2) internet and library access, (3) ecosystem to generate motivation to learn, and (4) contextual learning experiences.

Therefore, it concluded that all students have positive perceptions on the Video-Based Learning that supports the success of flipped classroom for Non-English Faculty should involve learning characteristics (1) student-centered learning, (2) internet and library access, (3) ecosystem to generate motivation to learn, and (4) contextual learning experiences.

4. Conclusion
The research found that (1) the Video-Based Learning that supports the success of flipped classroom for Non-English Faculty is urgently needed by students in universities, in this case Bina Nusantara University. The learning outcomes are in line with the mission of Binus University; (2) it should involve some learning characteristics (a) student-centered learning, (b) internet and library access, (c) ecosystem to generate motivation to learn, and (d) contextual learning experiences; and (3) the English Lecturers and Students of Non-English Faculty have positive perceptions on it. Therefore, the Video-Based Learning that supports the success of flipped classrooms for Non-English Faculty should involve some learning characteristics (a) student-centered learning, (b) internet and library access, (c) ecosystem to generate motivation to learn, and (d) contextual learning experiences. The results of this study have implications to provide additional references in making video-based learning that supports the implementation of the flipped classroom.
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