**ENGAGING STUDENT – STUDENT INTERACTION USING FLIP MATERIAL IN ZOOM MEETING DURING DISTANCE LEARNING**

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**Abstract**

*Covid -19 pandemic gives dynamic changes in all issues, especially in education. English as both practical and theoretical subjects must be adaptive to technology. It has to engage more active student-student interaction as students are the center of the teaching-learning process. This study was conducted to measure student-student interaction using flip materials in the Zoom meeting through students’ questionnaires and interview. The study is an action research conducted with pre-observation- two cycle experiments and post observation. The Results show that flip- material promotes autonomous learning to support students' join the e-learning virtually and gives students’ better room to engage in the virtual classroom with various discussions. From the results, it can be concluded that introducing flip material provides better and more effective distance learning and Zoom meeting accommodate the student-student interaction through its varied features like breakdown, inbox chat, and poll.*

***Keywords:*** *flipped material, student-student interaction, zoom, distance learning.*

**Introduction**

Based on the circular letter of the director of Politeknik Negeri Jakarta number 13/PL3/HK.04/2020 that all academic activities should be conducted online, challenges lecturers and students to make virtual class using e-learning happen. The challenge faced by appears when an English subject with four language skills should moves online, where interaction cannot be measured and observed directly. Some drawbacks emerge in online learning, such as time ineffectiveness, weak sense of connectivity among students, technical mistakes, primarily the internet connection, assessment, furthermore observation that the teacher should conduct online to get the students’ learning progress, (Gilbert, 2015). Student-students interaction is essential since it performs 4 Cs 21st-century skills in English Foreign Language (EFL).

4Cs as explained by Saleh (2019) consists of socio-emotional and key competence required by 21st-century students to get ready to face expected competence in professional life and global market demand.

This study aims to combine the flipped materials with 4Cs activities by maximizing all Zoom-meeting features. The result will help teachers in answering the distance learning challenge.

During this pandemic, online or distance learning, besides providing flexibility, also shows its burden in interaction since the teacher cannot observe and engages with the students directly. The student-student interaction is getting less mandatory because of the limited time and internet access that both the students and teacher face.

Pešikan&Lalović (2017) divided 4Cs into socio-emotional skills, problem-solving, critical thinking, creativity and innovation, information literacy, and ITC literacy. It will be performed in student-student interaction as stated by Johnson (1981) since socio emotion that appears through peer collaboration can promote the desired educational program.

The platforms that will accommodate the teaching learning process are PNJ e-learning and Zoom meeting as the virtual classroom.

Zoom is a videoconferencing application that provides high quality meeting platform that can make online class live and interactive in real time. This application provides supporting communication features such as, annotate, inbox chat, reaction and pool.

For supporting the real experience of conference and discussion, zoom is the only application providing a breakdown feature that can make group discussion possible and pool feature to trigger students' interest in giving votes to start the class discussion. The Department of Anatomy of Institute of Post Graduate Medical Education & Research, Kolkata, West Bengal, India, also decided to appy Zoom platform in flipped classroom mode i.e.

“the study material would be posted to

the students earlier, followed by the

discussion in Zoom sessions. By the

policy of flipped class, the text

materials must be shared before the

class to the students and the students

would attend the ‘class’ with their

doubts.”

Distance Learning In Teaching English To Medical Students.

This study is highlining teachers’ challenge in exposuring students’ role and comprehension with synchronous Zoom is also explained by Marlini (2020) as a web-based video conferencing tool in client’s mobile app that makes them easier to access and conduct online converence, meeting and class. It is also completed by recording interface, breakout room for Zoom users to work in group, and annotate to text their opinion on screen as the subtitute of offline white baord class function. Zoom appliation is also user friendly that offers quality video, audio, and a wireless screen-sharing performance across Windows, Mac, Linux, iOS, Android, Blackberry, Zoom Rooms, and H.323/SIP room systems.

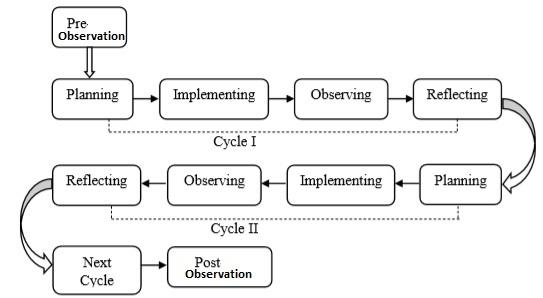
Nowadays, there are more concern on syncrhonous learning using videoconference applications to improve learning service in education such as:Marlini (2020) title Zoom for BIPA online Learning during Covid -19 Pandemic, then Roy et al ( 2020) title A Study on Students’ Perceptions for Online Zoom-app based Flipped Class Sessions on Anatomy Organised during the Lockdown Period of COVID-19 Epoch , and Guzacheva (2020) title Zoom Technology As An Effective Tool For learning with zoom and flipped material.

**Methodology**

This action research was undertaken among the students of semester 5 majoring Informatic Engineering by the end of 2020. This study was conducted after did a simulation of flipped material in September 2020,five months online class stated by Indonesian Goverment due to Covid-19 pnademic prevention and control.

The study was conducted in two circles Every stage consisted of planning- implementing-observing–reflection. The pre-test and post-test will be changed into pre-observation and post observation. The purpose of this study was not to measure the students' comprehension but to measure the success of flipped material to boost student-student interaction in speaking practice.

Necessary permissions have been taken from the department’s authority to conduct this action research at English Communication 2 schedule. Faculties have given the lecturers preference to explore other platforms besides the institution’s legal e learning platform that guves more flexibility for the researcher to explore zoom videoconverence application to support the e-learning. The action research pre and post test stages were modified into pre-and post observation. The flow activities were reflected by the following figure.



**Figure 1. Research Design**

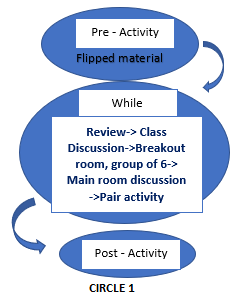
The data was collected in 2 sessions for pre-observation, one session in cycle one, and one session in cycle 2 continued by one session post-observation and student reflection.While the action research itself was conducted into three stages: pre-activity-while and post activity.

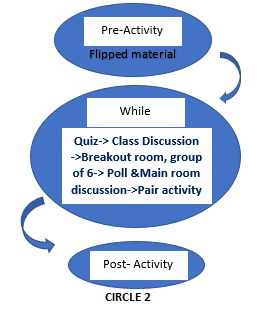
The implementation in cycle one and cycle 2 share the same stages but had different actions. A detailed explanation can be seen in Figure 2.

That figure provides the flow activity during while activity. In the first cycle, the teacher only provideed flipped material. In contrast, in the second cycle, the teacher also provideed a lesson plan to get more overview of the activity.

The while activity in the second cycle is also more detailed by giving a quiz before the action

to make sure the students have done the flipped material. The activities would be seen from the following figure.





**Figure 2. Action Research circle**

The flipped materials given are for the virtual class discussion on chapter 1-4; Companies, Visitor, New Product and Employement; were given in the form of Youtube videos and PPTs containing target vocabularies and sample dialogues. In contrast, the quiz was provided in the form of a Google form format with a short answer.

The data was taken in English Communication 2 class, TI 5, Informatics Engineering program, Faculty Computer, and Informatics Engineering. Thestudy was conducted among 23 students in September 2020. The class consist of 18 boys and 5 girls.

**Resul t**

The result was reflecting three main stages in action result; pre-observation, while observation, and post-observation that finally will be compelled with students' interview reports.

**Table 1. Schedule Implementation Based**

**The Lesson Plan.**

|  |  |  |  |
| --- | --- | --- | --- |
| No | Cycle | Stage Plan | Material |
| 1. | Pre- observation | September 11th, 2020 | Companies |
| 2. | Pre Observation | September 18th, 2020 | Visitor |
| 3. | I | September 25th, 2020 | New Product |
| 4. | II | October 2nd, 2020 | Employment |
| 5. | Post Observation | October 9th, 2020 | Customer Service |

The implementation of the lesson study will be started by delivering flipped materials, reviewing target vocabulary, and main room discussion continued to breakdown into a group of 6 for 15 minutes. Back to the main menu continued to the smaller breakdown and finally closed by in pair activity.

***Pre-Observation Result***

This stagewas done at the first and second sessions, on September 11th and September 18th, 2020, to 23 IT-5 students’ academic year 2020/2021. The teacher gave flip material one week before the Implementation through PNJ e-learning. At the Implementation, the review was done by answering the starting point given through the inbox Chat. The observation was aimed to see the interactions among students during class discussion, big group discussion, and smaller group until pair conversation.

**Table 2. The Pre- Observation**

|  |  |  |
| --- | --- | --- |
| No | Stage | Note |
| 1. | Pre  Session 1 | Five students studied the flipped materials |
| Session 2 | Fifteen students saw the videos, and only three students studied the materials. |
| 2. | While  1 | * Five students were active, asking and responding * The students took 60 minutes to answer the questions in inbox chat. * Three breakroom groups didn't practice the dialogue. * Students got confused about the activity. |
| 2 | * Students understood the starting point question in inbox chat and gave a short answer in less than 1 hour. * Students needed to be appointed to answer the question. * One group did not perform a discussion because of a lack of supervision from the teacher. |
| 3. | Post  Session 1 | * Students complete the assignment in pairs. * Students were reluctant to choose their partners. |
|  | Session 2 | * The representative of each group could share the information from their group's discussion. * The groups that had not performed should practice dialogue in the main Zoom, and other groups observed it and gave comments and advice to that group. |

From the pre-observation, it can be seen that students got confused and reluctant because of the less instruction given by the teacher. Most of them came to the class without doing the flipped materials, so they could not identify the target vocabularies and the topic. Simultaneously, the course was dominated by active students. They have studied the flipped materials, while the breakroom as a speaking and virtual meeting feature could not give better benefit since students still did not make good interaction based on the topic given.

Some groups did not conduct the discussion in their breakroom became a critical thing to be considered for the next cycle.

The pre-observation also showed that 4Cs hadn't been reached yet because the group discussion still couldn't be conducted well, which is meant critical thinking and problem solving didn't emerge in the activity.

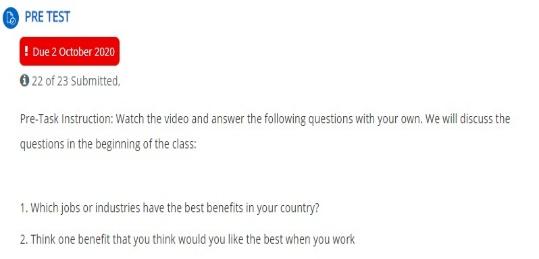
The second session showed better interaction but still on teacher-students level, as more stated in She (2009) defined teacher-students interaction as learner-instructor interaction, where the teacher becomes the instructor delivering the material and controls the class activity.

***While Observation***

The Implementation of the lesson study was started by giving audio instruction for flipped material in the WA group so the student-content, teacher-student, and student-student interaction can be done quickly.

Students' interaction was done one week during flipped material completion, where the teacher only appeared with the audio announcement. In contrast, the instruction understanding had been done through the WA group discussion among them.

The interaction was a success by quiz accomplishment that they did on time with a various answer.



**Pic. 2.quiz report accomplishment**

Since 22 from 23 students have already done the flipped materials, their understanding of the topic discussed was better. It could be seen from the review activity that was done using poll got the answered less than 5 minutes. The first poll activity was asking their experience relating to job interview experience and the student-student interaction run in the main room discussion. The students who haven't had interview experience asked those who had ever joined an interview.

The next pool was about identifying and applying the target vocabulary relating to "benefit". The interaction appears when one student couldn't explain the definition or gave the correct answer; the other student would willingly answer the question. It triggered their socio-emotional skill and guided them to the next gift; critical thinking and problem-solving.

In the first breakdown room, the students were divided into six, and they performed conversation about their benefit preference and their reason. The teacher will visit all the rooms to make sure every group conducted the discussion. In this while activity, the teacher play role of the center of discussion.

The usage of all Zoom features supported the fourth skill, ITC literacy, and the discussion that run well reflexed a good information literacy among students through student-student interaction from pre-activity in the WA group, while in Zoom and post in e-learning assignment.

***Post Observation***

The post-observation was done on October 9th. This part reveals the success of the while activity and the students' interview reflecting the whole action study.

**Table 3. Impact Result Post Observation**

|  |  |  |  |
| --- | --- | --- | --- |
| **No** | **Stage** | **Activity** | **Interaction** |
| 1. | Pre | Send the audio instruction | Students made discussion relating to the audio instruction; they helped each other. |
| Send the PPT, VIDEO, and Lesson plan | They discussed and asked about the lesson plan. The PIC accommodated other students' questions if there was something confusing that they couldn't solve. |
| Quiz | 22 from 23 students do it. |
| 2. | While | Poll | They curious about the poll result; some of them asked all students at the forum about the poll result, the other voluntary answer. |
| Group discussion | They take turns asking and responding and elaborate on the prompt. |
| 3. | Post | Peer assignment | They willingly asked their partner, and when one group consists of an odd member, they managed it by working in groups of three and elaborating on the prompt. |
| The group submits one file, it means that they had been good teamwork. |

Post observation supported Volery (2001)that in distance learning, the teacher plays a key role. However, her existence will only be a catalyst and navigator so that student-student interaction can be explored more.

***Students’ Respond***

Student-student interaction is an activity that focuses on students' feelings and understanding. As stated in Sher (2019) that Student-to-Student interaction will be associated with student perceived learning in Web-based online learning programs. In measuring students perceived knowledge, the study used Hiltz (1994) one -item scale; students perceived learning with six measurements

**Table 4. Hiltz’s Student Perceived Learning and Variable**

|  |  |  |
| --- | --- | --- |
| No | Measure | Percentage |
| 1. | I learned to interrelate the crucial issues in the course material. | 95 % |
| 2. | I gained a good understanding of the basic concepts of the material. | 70 % |
| 3. | I learned to identify the central issues of the course. | 86 % |
| 4. | I developed the ability to communicate clearly about the subject. | 95 % |
| 5. | I improved my ability to integrate facts and develop generalization from the course material. | 95% |
| 6. | I learned concepts and principles in this course. | 95% |

While the interaction was measured by statement number 4, 95% of students agree that they can communicate better because they have already prepared the material from flipped material and can understand the class activity through the lesson plan stated that flip material is a flexible access material through video and PPT. Overmyer & Wilie in Uzunboytu (2015) underlined that flipped material didn't mean a personalized education; that is why teachers' audio instruction, WA group discussion forum, and lesson plan are placed as the students’ guideline to complete the pre-activity.

The varied zoom feature like poll and breakdown also give them room to have a private discussion and more opportunity to express their opinion and to help each other in communication. The effectiveness of the zoom meeting was also revealed by N.Guzacheva **(2020)**. He stated that Zoom’s features allow English teachers to explore and assess the four skills through rich interactions, the share screen makes virtual classroom happens and help the teacher explain the material in detail, the inbox chat can help students write down their opinion, the poll can give interaction activity, and discussion and breakdown room provides speaking practice more possible.

**Conclusion**

From the study conducted, it can answered the main issue about the significance of flipped material to empower the students’ understanding and develop student-student interaction during online learning in using the Zoom platform. It meets the result that flipp material completed with the teachers' audio instruction and WA group discussion forum, is approved to improve students’ autonomous learning material understanding, while the varied features in Zoom meeting develop student-student interaction that gives room for students to ask, respond and interact each other with 4Cs skills. This study will highligh the important of further exploration for e-learning platforms and application to make virtual class as real as possible, and elaboration mixed education approaches to facilitate students exploring their English competences.

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