Lecturers Mobilizing Metacognitive Strategies in Zoom for EFL Classroom an Innovative Practice Amidst Covid 19

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Article Info	Abstract
	Purpose The goal of this study is to investigate student's metacognitive skill online learning via Zoom app during the Covid-19 pandemic. The online lectures are the primary method of instruction. Lecturers and students mostly used Zoom apps to deliver lectures amidst Covid 19 pandemic. **Methodology** This study used quantitative research and the data collection was conducted through questionnaires on student's metacognitive skill spread by google form to the EFL students at a private university completed a questionnaire via Google Form. There were 24 students in total. **Results/Findings** This study results showed students perception online learning via Zoom was used its highly involved student's metacognitive skill. It is considered as an effective platform to enhance students' interactions and engagement. **Implications** This study result in Zoom class lecturer develops metacognitive strategies to support higher order thinking skill and 21th century skill of students. This result of the study can be used by other educators in mobilizing metacognitive strategies.

1. Introduction

Information and communication technology (ICT) advancements have permeated numerous industries, including education, particularly learning. By using e learning, students will have access to online learning at any time and from any location (Allen & Seaman, 2017). To put it another way, distance learning can be considered as a synonym for electronic learning (e-learning), which is defined as the use of technology to connect people with one another and/or with educational resources for the goal of education (formal or informal) (Gillett-Swan, 2017).

Many different tools, including Zoom apps according to (Guzachchova, 2020; Helda, & Zaim, 2021; Roza, 2021; Wellner, 2021; Nadezhda, 2020) can be used to facilitate online learning today. Video conferencing and content sharing are both available through Zoom's Meetings and Webinars service, which uses the cloud. It aids helps for teachers, for example, in bringing their students together in a frictionless atmosphere to accomplish more. Zoom is the market leader in cloud-based video and audio conferencing, collaboration, chat, and webinars for

mobile devices, PCs, phones, and room systems. Zoom is easy to use and reliable.

Students can learn more by interacting with teachers using Zoom's features. Zoom encourages. Teacher can offer the topic in many ways with Zoom for sharing materials and integrate e-learning. A wonderful way for teachers to strengthen the intercultural abilities of students is to share engaging content such as films, articles, and presentations using Zoom's screen sharing. Also, the students can use active questioning to assess and evaluate their learning by having their teachers encourage them to apply it in lessons and after they've seen it. Educators might also invite students to record and share a video reflection on their lessons. Live video conferencing has been used successfully in distance learning in a number of previous studies 8 (Callas, 2004; Bertsch, 2007; Schreiber, 2010).

Knowledge of how to learn and comprehend teachings is referred to as metacognitive capacity (Kallio, 2017). As a result, metacognitive skills play an essential role in boosting the quality of learning outcomes, as metacognition is now used to manage and monitor how students think during the learning process. Students obtain metacognitive knowledge, or knowledge that can be utilized to influence cognitive processes, as they learn about how their brains work. Metacognition is also associated with the ability to reflect, draw conclusions, and put those insights into action. Learning success is influenced by metacognitive abilities (Kallio, 2017; Veenman, 2014).

Metacognitive abilities can aid in the advancement of students' meaningful contributions, which may have a chance impact on their academic performance. Student metacognitive services are an important goal since these abilities aid kids who have gained self-regulation. They will be responsible for their own learning development and will adjust their learning plans as necessary to meet the mission's requirements. Self-regulated Because self-regulated learners have more control over their learning process, they become independent learners who increase their cognitive learning results. Hence, metacognitive abilities have been linked to various fields of knowledge such as literature, mathematics and information technology amongst others, with the conclusion that individuals with excellent skills have superior cognitive performances.

Students' grasp of the problem stated, solution planning, confidence in and personal control of problem-solving behavior and emotions were improved by a metacognitive-based approach (Veenman, 2014). Higher degrees of problem solving success would be achieved by utilizing sophisticated cognitive and metacognitive processes (Lee, Yeo & Hong, 2014). In order to produce self-reflective pupils, teachers should cultivate students' metacognitive abilities in conjunction with other cognitive abilities. Students should aware of how they learn do better in school. Also, metacognitive skill encourages and promotes reflective thinking, as well as builds self-confidence and self-awareness, both of which are necessary for making good judgments. Metacognitive activities represent a multidimensional concept with three self-regulation components, namely planning, monitoring, and assessment, (PME) or the students have known their positive role in learning which is what we're mostly interested in this research (Muis et al., 2015). Metacognition plays a significant role in whether or not a problem solving effort is a success. Numerous studies have found, however, that kids are under-exposed to it and have poor metacognitive skills as a result.

Song et al. (2020) and Robinson & Kay (2010) stated because ability to engage in metacognition is critical to learning, it's also support 21th century skill that support students in globalized era. As a result of the foregoing, the goal of this article is to examine how the teachers use Zoom's video conferencing service in order to develop guidelines for setting up efficient video conference sessions for teaching and investigate on how lecturer organize their educational process methodologically so that students' metacognitive skills can be empowered.

2. Research Method

2.1. Research design

This research used quantitative design. This research is a descriptive quantitative study with survey design. The researcher uses online questionnaire to get the data. The statement/questions of questionnaire are about video conferencing using the Zoom platform was used to examine how students at higher education metacognitive skill developed.

2.2. Research instruments and sampling

The study carried out in a faculty teacher training and education faculty students with 77 students EFL third semester students in academic 2021 year. Survey was delivered to all of the students but 24 accepted to reply (11 students from Indonesia language department, 5 students from mathematic department and 8 students from civic education department). The research data were collected from students' perceptions on how practical online teaching via Zoom platform on mobilizing student's metacognitive activities based on Cetin (2014) Indicators; planning, monitoring and evaluating (PME) obtained was based on the data after teaching online via zoom. The questionnaire of metacognitive activities in the zoom modified from Cetin (2014) concept on table 1.

Table 1: Metacognitive activities in the zoom

Metacognitive Activities in zoom	Indicators		
Planning	Students have planning thinking about how to gain information in the zoom class	Students understand the problems and have strategy to recalling materials in the zoom	Students easier to recalling the idea (making prediction) of whether or not the problems had been solved once before in the zoom class
Monitoring	Students easy to thinking about checking the suitability of the concept from content, focus in learning and interaction used to solve the problems in the zoom	Students easy to controlling the calculation accuracy of information step by step, develop confidence in the zoom	Students easy to checking the suitability of the materials, engaged in the discussion, interaction with classmates and lecturer also produce new information in the zoom
Evaluation	Students easy to repeating several steps if an error occurs in the zoom	Students have new strategy or new idea, sharing idea in answering question in the zoom	Students understand the materials, active response, feedback and make conclusions in the zoom

2.3. Data analysis

Data from questionnaire were analyzed using Ms Excel program that quantified the percentage of participants' responses. Then the researchers in this study categorized the result thematically based on the respondent's responses

3. Results

The results of research based on the data from students responded showed that the students really enjoyed using Zoom App during the class amid covid 19. Table 1 showed 40% or 10 respondents strongly agreed category, 32% or 8 respondents agreed category and 24% or 6 of them neutral category the result suggested most of the respondents enjoyed in zoom class.

Table 1: Participants responses on planning

Items	Responses				
	Strongly disagree	Disagree	Neutral	Agree	Strongly agree
I enjoyed classess using Zoom during Covid 19		4.5%	20,5%	33,3%	41,7%
I felt comfortable using Zoom during Covid 19		8,3%	16,7%	41,7%	33,3%
The use of Zoom improves my learning focus		4.2%	33,3%	41,7%	20,8%
The use of Zoom helps me to learn content and assists me engagement and interaction		8,3%	12,5%	54,2%	25%
The use of Zoom helps me to develop confidence in learning		12,5%	20,2%	33,3%	20,5%
The use of Zoom helps enhance my learning skill		13%	13%	34,8%	39,2%

The second statement students felt comfortable using Zoom app as their virtual class. As shown above, 2, 32% respondents stated they felt comfortable, 40 % respondents agreed category, 20% were neutral and while 8% took the disagree option. Many benefits come with using Zoom to do online instruction using Zoom. Based on the data surveyed that they can readily improve focus in learning; 20% of respondents strongly agreed category, 40% of respondents agreed and 36% of respondents in neutral category.

The fourth statement in this survey ask respondents whether online learning via zoom help respondents easy to learn content or materials, activities and interaction support in zoom class showed that 24 % of respondents strongly agreed category, 52% of respondents agreed, 16% of respondents' neutral category and 8% were disagreed which mean using this form allows the educator and the educated to engage more easily. When attending a live Zoom lecture, students can see and hear eye movement as well as hear other students' voices This means that students and professors can see each other's gesticulations, therefore it's a multimodal experience. The Zoom mobile app has also encouraged students to use their smartphones instead of computers, which has the potential to reduce weariness.

Table 1 showed the data in Zoom class respondents felt confidence and easy to understand the materials; 20% of respondents strongly agree, 32% of respondents agree, still 28% of respondent's neutral category and 16% of respondents were disagree. In addition, Table 1 showed participants acquire a better understanding and effective

enhanced learning in Zoom class 33,3% of respondents strongly agree, 37,5 % agree category, 16,7% neutral category and 12,5% disagree. Its indicating participants have a lot of advantages to using online video conferencing.

Table 2: Participants responses on interactions and engagements

Items	Responses				
	Strongly disagree	Disagree	Neutral	Agree	Strongly agree
The use of Zoom App motivated participants to actively participate in class activities, giving feedback, discussion and sharing ideas		8%	29,2%	29,2%	29,2 %
The use of Zoom App made it easier for participants to be more engaged in the class discussions		12,5%	29.2%	41,7%	16,7%
The use of Zoom App increased respondents' interaction orally or via chat with instructor and respondent's classmates			20,8%	50%	25%
The use of Zoom App increased respondent's engagements with others		8%	16,7%	41,7%	29,2%
I felt comfortable Using Zoom App during online class comparing to other online applications		12,5%	20,8%	37,5%	25%
I felt comfortable using Zoom App during online because the activities during the Zoom sessions motivated me to learn the class content more than the ones in the traditional face-to-face class meetings		12,6%	29,2%	41,7%	16,7%

The benefit of video conferencing Zoom apps obtained participants metacognitive skill namely critical. The use of Zoom App motivated participants to actively participate in class activities, giving feedback, discussion and sharing ideas showed on Table 2. In this condition, participants in the input-elaboration-output stages of their own thought processes and can utilize models to better organize their own thought processes and learning in Zoom 28% of respondents strongly agree, 28% of respondents agree, 32% neutral and 8% of respondents were disagree category.

Critical thinking and problem-solving skills showed when participants engage in discussion and easy to sharing ideas. Here, the results showed that the use of Zoom App made it easier for participants to be more engaged in the class discussions 16% of respondents strongly agree, 40% of respondents agree, 32% neutral and 12% disagree. From Table 2 showed respondents metacognitive skill indicated on the statement the use of Zoom App increased respondent's interaction orally or via chat with instructor and respondent's classmates with 6 subject (24%) stating they strongly agree, 48% of respondents agree and 24% were neutral category.

Respondents felt comfortable Using Zoom App during online class more than google meet, WhatsApp video call meeting, Skype, Stream yard and the traditional face-to-face class meetings. The good point of zoom then another platform showed that there were 28% of respondents strongly agree, 44% of respondents agree, 16% of respondent's neutral and 8% of respondents disagree. In addition, it showed that respondents felt comfortable using Zoom App during online because the activities during the Zoom sessions motivated respondent to learn the class content more than the ones in the traditional face-to-face class meetings 24% respondent stating they strongly agree, 36% agree, 24% neutral and 12% disagree. The participants also felt It was easier to participate in group activities in the Zoom sessions in comparison to the traditional face-to-face class meetings 16% of respondents stating strongly agree, 40% agree, 32% neutral and 12% disagree.

Table 3: Participants' responses comparison between online and traditional ones

Items	Responses				
	Strongly disagree	Disagree	Neutral	Agree	Strongly agree
I was easy to understanding the problems during the class in the zoom		12,5%	37,5%	33,3%	16,7 %
I was easy to recalling the idea of whether or not the problems had been solved once before during the class		16,7%	16,7%	41,7%	25%

From Table 3 above, metacognitive activities they were easy to understanding the problems during the class in the zoom of as shown above 4 (16%) respondents strongly agree category, 8 (32%) respondents agree category, 10 (40%) neutral category and 3 (12%) were disagree. Because metacognitive thinking skills are closely linked to other higher-order thinking skills, this suggests that students' metacognitive thinking skills should be developed and empowered; this can be seen during the learning process where students' ability to answer questions about critical

thinking skills is good in other words, they can formulate the main problems and reveal the facts. In addition, it showed that respondents easy to recalling the idea of whether or not the problems had been solved once before during the class of 24% respondents strongly agree category, 40% agree, 20% neutral and 16% were disagree.

Based on the data that these findings suggest that students use metacognition skills to help them learn recalling the ideas. Students will benefit greatly from this because it will help them better understand abstract topics that are notoriously tough to grasp. The majority of students develop their own metacognition abilities on their own. The teacher's involvement is critical in helping students improve their metacognition skills through the use of effective learning tactics and approaches in teacher training and education faculty.

Table 4: Participants' responses on evaluation

Items	Responses				
	Strongly disagree	Disagree	Neutral	Agree	Strongly agree
It is easier to check the suitability of the concept from content used to solve the problems during online learning via zoom apps		8,3%	33,3%	37,5%	20,8 %
It is easier to think about repeating several steps if an error occurs		12,5%	25%	50%	12,5%
I tried another way, if an error occurs in the zoom session		8,3%	33,3%	41,7%	16,7%

The statement on whether respondents easy to thinking about checking the suitability of the concept from content used to solve the problems during online learning via zoom apps shows that 5 % of respondents strongly agree, 36% respondents agree, 36% neutral and 8% of them disagree. Its showed that respondents are able to monitor and appraise anything learned, they had used their metacognition skill optimally. Table 4 that asking respondents online class by using zoom app it was easier for respondents to thinking about repeating several steps if an error occurs, 12% of respondents strongly agree, 48% of respondents agree, 28% of respondent's neutral and 12 % were disagree. The question on asking respondents to thinking about trying another way, if an error occurs in the zoom session reveals that 16% strongly of them agree, 40% of them agree, 36% of them neutral and 8% of them disagree. The findings show online learning in zoom class enhanced their metacognitive activities, corrected their own errors, and developed their understanding of concept taught in classroom.

4. Discussions

Based on the findings showed Zoom remains the most popular tool for communicating and conducting education across a screen while maintaining social distance. Using this program has now become a requirement for civilization as a result of the COVID-19 pandemic. We wanted to find out how online learning via zoom applications were in empowered EFL students' metacognitive skill, how lecturer manage their online class with metacognitive activities and whether any findings would be useful to EFL investigators and English skills. This investigation was conducted to find out.

The term "metacognitive capabilities" refers to three different types of skills: planning, monitoring, and Evaluating (PME). Steps in the guided inquiry learning paradigm had mirrored features of metacognitive competence. Planning parts of metacognitive skills include identifying and defining the problem, developing a hypothesis, and formulating a solution strategy (such as designing experiments). In guided inquiry learning, parts of metacognitive skill are monitored by conducting experiments, observing and collecting data, and analyzing that data. Metacognitive ability evaluation factors include making inferential inferences during the inquiry phase. This demonstrates how guided inquiry can be utilized to boost students' metacognitive abilities by integrating with metacognitive strategy (Schraw, 1998; Woolfolk & Margetts, 2012)

According to many research, the adoption of metacognitive methods could be a substantial and more practical strategy for increasing students' learning abilities. The results also showed that despite the training, students still require additional training on how to effectively use brainstorming or mind mapping approaches to generate their ideas, as evidenced by the information they supplied. On the other hand, they reported in another instance that prior to this instruction, they had no idea how to structure their idea from visualizing, listening, to writing, from writing to reading then to speaking in English because metacognitive helped them be more organized in their preparation.

Marks, symbols, and keywords are all approaches they are said to be employing, along with a focus on the primary elements of how they connect to form of their English skills Students that participated in the program's monitoring revealed that they become more self-reliant as a result of being better able to keep tabs on their EFL class processes and progress. It also reflects on how students might check their writing's creation, speaking performance and comprehension processes through self-questioning and revision strategy. Studies such as (North

Central Regional Educational Laboratory, 1995) claim that monitoring can assist students better grasp their difficulties and how to overcome them. Participants are asked about their experiences with self-assessment, self-evaluation, and reflective practice as part of the evaluation approaches.

As part of the preparation phase, students examine their ideas to determine what prior knowledge they have that will assist them in completing the work. Students also determine what steps need to be taken first to aid completion of the task, and they organize their time management accordingly. Metacognitive skills sheets require students to apply their prior knowledge to assist them complete the job at hand. Prior knowledge refers to the skills and knowledge pupils have acquired while studying the subject matter.

In addition, students know and determine what things need to be done first in order to complete the assignment when working on the metacognitive skills challenge. As evidenced by the timeliness with which students collected answers about metacognitive skills, they have also planned their time to work on the metacognitive skills inquiry. When completing assignments, students must use planning skills as well. Student will ask themselves what material should be understood depending on the questions and the time needed for the solution (Sun, 2013) as long as they plan (planning skills). Students monitor their activities (their monitoring skills) to see if they are on the correct track in solving problems, remembering vital information, and checking to see if they are. As long as the student keeps track of the problem, he or she will question themselves what knowledge is relevant to remember and what action to take to resolve it.

The learner can also choose the next steps to take to solve the problem based on the information found in the question. Student checks conformity between what is known and the processes utilized to address the problem when evaluating activity (evaluation skills). Inquiring minds want to know how well they've done in solving the challenge. It can be deduced from the way students explain their reasoning for choosing the solution stages based on prior knowledge.

5. Conclusions

From the findings of the research and discussion, video conferencing via zoom had an impact on students' metacognitive skills, based on the data findings lecturer of EFL class design materials and activities in Zoom class with metacognitive strategies. Zoom apps was found to be more effective at enhancing students' metacognitive skills than another platform, most of respondents recommended Zoom for better e-learning tool, easy to use and integrated also easy share to another ICT. Course materials and student characteristics can also be taken into consideration when lecturers use metacognitive strategies in other courses.

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