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## INDONESIAN ELEMENTARY SCHOOLS TEACHERS' ATTITUDE TOWARDS VIDEO CONFERENCING PLATFORM IMPLEMENTATION DURING COVID-19 PANDEMIC

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### ABSTRACT

This study is identifying elementary schools teacher attitudes towards video conferencing platform implementation during Covid-19 pandemic. The research aims include (1) to identify teachers' attitude towards implementing video conferencing platforms for learning (2) to identify teachers' challenges encountered during implementing video conferencing and how to overcome that challenge. The 103 elementary schools teachers were included. The teacher selected by simple random sampling techniques. The questionnaire's content is based on teachers' attitudes toward using video conferencing in the classroom during the COVID-19 epidemic, as measured by the following indicators: efficiency, effectiveness, motivation, and variety of obstacles. The elementary schools teachers' attitude shows positive responses to video conferencing in learning such as providing various learning activities, providing flexibility in teaching process, easiness to access learning materials, and ease in assessing and monitoring students' learning progress. Furthermore, the result reveals the majority of the elementary schools teachers faced technical issues and availability as obstacles in implementing a video conferencing platform. The majority of elementary schools teachers were able to resolve these technological difficulties by exploring other teaching strategies and seeking professional advice.

**Keywords:** Elementary Schools Teacher, Teachers' Attitude, Video Conferencing, Distance Learning, Learning During Pandemic.

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## INTRODUCTION

Every country, including Indonesia, is experiencing a panic because to the Covid-19 pandemic. The first case in Indonesia appeared on March 2<sup>nd</sup>, and the cases are still peaking up until today. As the institutions which have responsibility to minimize the Covid-19 spread out, the Indonesian government released several regulations and decrees to tighten up health protocol including cities lockdown known as a PSBB (Pembatasan Sosial Berskala Besar). This lockdown regulation is believed as an effective way to limit local transmission. However, this decision is massively affected by human activity including in the educational process.

Nowadays, many teaching and learning processes in Indonesia are conducted through online systems. This online learning is also referred to in the government regulation which was released in March 2020. The regulation addressed the provision to conduct learning during pandemic situations, including online learning. There are 4 main point of this Indonesia Ministry of Education decree, that is: (1) using online learning during study from home and provide meaningful learning; (2) Learning process is emphasizing in integrating the learning material and recent issues about Covid-19 pandemic; (3) Learning activities should be concerned to the learner accessibility to learning facilities; (4) Learning product and learning activities result is assessed by using qualitative technique.

There are several formats of learning strategy that teachers use during online learning, including video conference implementation. Video conferencing is not new technology, it has been used broadly

since 1967. However, video conferencing just started being used in the educational system for the last 2 decades. According to Gladovic et al (2020) Video conferencing has not only been used as an essential component of the business sector, but also important for the future of educational systems. Additionally, video conferencing is also accepted as a new way of teaching, in which teachers are given new ways to present subject materials and communicate with pupils. Conversely, Candarli (2012) highlighted the advantages of using video conferencing, including boosting motivation, improving interaction, novelty, and communication skills.

The use of video conferencing in education cannot be separated by the use of the internet and ability of devices. The dependencies of Video conferencing towards the internet are also categorized video conference platforms as third generations of distance learning. Third generation of distance learning is instructional media ability in providing two way communications which enable interaction between pupils and instructors during teaching learning process (Gladovic et al., 2020). However, the success of video conference implementation in the teaching process depends on teacher attitude and willingness to use the platforms (Huang & Liaw, 2005; Teo, 2008; Yusuf & Balogun, 2011). According to Yusuf & Balogun (2011), attitude refers to positive or negative judgment about a concrete subject. Additionally, Jain (2014) emphasized that the attitude is dynamic feeling and beliefs that influence behavior. Determining the level of attitude can be conducted by analyzing the information of an action towards the concrete object and also by assessing the positive or negative of these results (Ajzen & Fishbein, 1986).

This recent study is focusing on

teachers' attitude toward the use of video conferencing platforms in conducting the teaching process during Covid-19 pandemic. According to Teo (2008), the main reason to assess teachers' attitude towards the use of technology for learning is to generate the standard and make a predictor for future use. Measuring teachers' attitude can be conducted by using a variety of indicators that give us experience toward the object, including self-efficacy, perceived liking, and perceived usefulness (Huang & Liaw. 2005). This suggested indicator will be adopted and integrated into a more general factor that affects attitude which is the object efficiency, effectiveness, motivation and variety of obstacles. Finally, the recent study suggested research questions, that is: (1) How's teacher attitude towards implementing video conferencing platforms for learning? (2) How teachers' attitudes towards challenges during implementing video conferencing?

## RESEARCH METHODS

The survey included 103 elementary schools teachers. Simple random sampling is used to select the respondent. The data collection is conducted by using interview and close-ended questionnaires. The questionnaire's content is based on elementary schools teachers' attitudes toward using video conferencing in the classroom during the COVID-19 epidemic, as measured by the following indicators: efficiency, effectiveness, motivation, and diversity of barriers. Respondents are given the survey through an online approach utilizing a Google form. The data analysis is divided into: (1) The elementary schools teachers' responses to a closed-ended questionnaire are assessed using statistical

descriptive analysis; and (2) Transcription and coding are used to interpret the interview results.

## RESEARCH RESULTS AND DISCUSSION

The 21<sup>st</sup> century classroom is identified as the learning environment involving the capability of technologies. However, in order to provide optimal learning for all students, the role of the educator as an orchestra is crucial in making the most of technology advancements. The incorporation of technology into modern education has also had a profound impact on how teachers present learning activities in the classroom, on their ability to advance professionally, on communication, and even on administration.

### *Usefulness*

Usefulness is the extent to which a teacher thinks employing a technology (video conferencing) would improve their ability to accomplish their job (Mahdum et al, 2019). Assessing the usefulness of video conferences implementation for learning, researcher attempt to investigate the capability of video conferences to create various learning activities and to improve teacher performances in presenting learning materials. The findings showed that teachers concurred that video conferencing can assist them in offering a variety of learning activities, including quizzes, watching instructional videos, simulations, and gamification. Ghavifekr & Athirah (2015) mentioned that technological use can help teachers to create engaging lesson plans that encourage students to actively participate in their learning.

Additionally, video conferencing enables educators to communicate their course materials via interactive dialogue. The key

factor to the deployment of video conferencing is the interactive communication between teachers and students. Strengthen the claim, Kang and Im

(2013) mentioned that new technologies have made interactions possible among learners and instructors even make the quality better.

**Table 1. Item for Identifying Video Conferencing Usefulness and Ease of Use**

Indicator	Item	Result (%)			
		Strongly Agree	Agree	Disagree	Strongly Disagree
<i>Usefulness</i>	VC creates various learning activities	15.5	72.8	10.7	1.0
	VC improves teacher performances	18.4	66.0	15.5	0
<i>Ease of use</i>	VC makes teaching more flexible	18.4	68.0	13.6	0
	VC provides convenience in assessing students learning progress	9.7	62.1	27.2	1.0
	VC provides convenience and possibility to access various learning material	29.1	65.0	5.8	0

### ***Ease of use***

Ease of use is referring to the degree to which a person believes that the use of a technology (video conferencing) will be free of effort (Mahdum et al, 2019). It should be emphasized that the use of technology (video conferencing) in education should be user-friendly. The users without basic knowledge can easily use the technology and avoid confusion when using the technology (Sun, 2003). The ease of use can be examined through the flexibility, simplicity, and easiness of the video conferencing implementation. The researcher is attempting to find out the flexibility and time-consuming of video conferencing implementation for teaching and learning activities. The majority of educators concur that having access to video conferencing enables them to conduct classes whenever and wherever they like. Several female teachers mentioned that they were able to multitask while teaching and performing household chores in online classes using video conferencing. The ease use of video conferencing can also be assessed by looking at its capacity to make a

variety of educational materials accessible. Uvarov and Varlamova (2019) assert that the current state of technology should enable teachers to have access to a variety of teaching and learning resources anytime and anywhere.

Additionally, elementary schools teachers agreed that the video conferencing also help them to provide convenience in monitoring and assessing students learning progress. The majority of teachers claimed that integrating video conferencing with other digital platforms during the implementation of online evaluations will boost efficiency. Pedersen (2012) states that online assessments are efficiency savings for the institution and flexibility for teachers and students. Moreover, Marina (2016) states in order to encourage better evaluation, every school and educational institution must utilize ICT for assessment. However, the teachers should be concerned about the validity of assessment to avoid assessment bias.

### ***Motivation***

Motivation is psychological process which affected by internal and external factors

that influence and encourage someone to increase success, achieve performance or direct behavior and attitudes that enhances to achieve goals (Kreitner & Kinicki, 2007; Mahdum et al, 2019). This study is focusing in examining elementary schools teachers' internal motivation which is refers to engagement in behavior that is inherently satisfying or enjoyable (Legault, 2016). To examine elementary schools teacher internal motivation, the teacher were asked about the video conferencing platform role in affecting to teachers performances. The majority of elementary schools teachers claimed that using video conferencing enhances their capacity to use new technological platforms. Moreover, experiencing teaching through video conferencing can provide them new ways of teaching.

The motivation is also examined by looking at teacher preferences towards the video conferencing platform. The specification of the video conferencing platform determines user choices. According to the elementary schools teacher response shows that zoom meeting app as the most favorable video conferencing platform used by teachers. Teachers claimed that the zoom meeting app is the most user-friendly which is simple and easy to use, consists of a variety of features, high definition video quality, etc. However, several teachers mentioned that Zoom meeting app is the most common used video conferencing app program for teaching and learning processes. In brief, motivation is a result of the interaction between users and the situation or the environment (Oropesa-Vento et al, 2015).

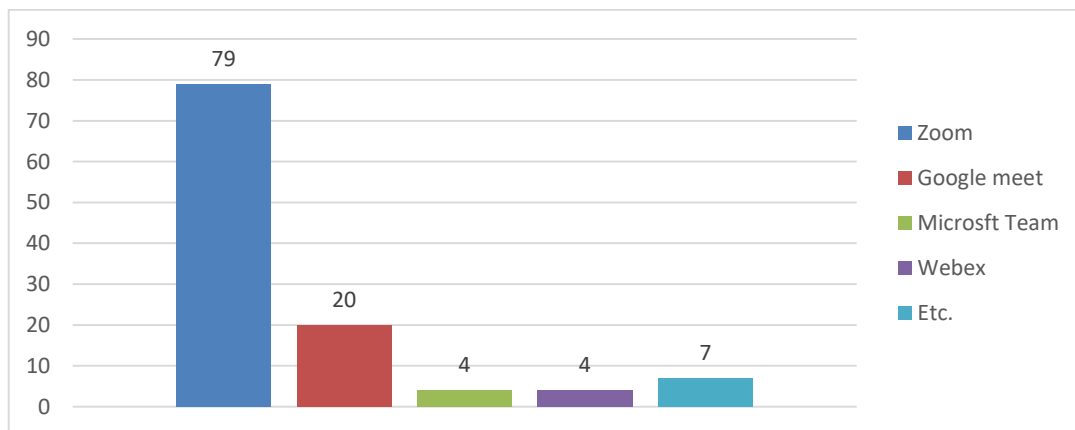


Figure 1. Type of video conferencing application used by elementary schools teachers

### Obstacles

Identifying elementary schools teachers' attitude towards video conferencing is also conducted by seeking the obstacle that teachers encountered during video conferencing implementation. Technical issues are becoming the major issues encountered by teachers, including technological access and availability, and technological knowledge. Majority teachers

encountered this issue are teachers who live in rural areas which have difficulties in accessing technology and internet access. At the same time, the understanding toward technological is the most encountered problem by senior teachers. The senior teachers claimed that it was difficult to operate the video conferences platform because of lack of user instruction, and inadequate training program in operating video conferences. It should be noted that the

obstacles encountered by teachers can affect their performance during the teaching process. Strengthening the claim, Ping et al (2003) states that proper technical support is crucial for teachers in boosting the quality delivering of subject material.

Overcoming technical issues, majority teachers suggested seeking alternative technology to provide learning material through integrating video conferencing platforms with other applications such *WhatsApp* application. The most common ways to solve these technical issues are asking the technician or technology expert.

## CONCLUSION

The study revealed that Indonesian elementary school teachers have a good attitude toward video conferencing platform implementation during Covid-19 pandemic. This statement was proved by the majority teacher statement that said video conferencing platforms facilitate teachers in providing various learning activities, flexibility in teaching process, easiness to access learning materials, and ease in assessing and monitoring students' learning progress. Furthermore, the result also reveals the majority of the teachers faced technical issues and availability as obstacles in implementing a video conferencing platform. The majority of teachers were able to resolve these technological difficulties by exploring other teaching strategies and seeking professional advice.

In conclusion, the bright side of covid-19 pandemic is allowing teaches to improve their technological skill through online learning. Indonesian elementary schools teachers should have this competence as a minimum prerequisite.

According to Indonesian MOE Regulation about standard qualification and competencies for teachers (No.16 of 2007), which state "The adoption of information and communication technology is vital for teachers in learning activities".

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