

Blended Learning Solution of the Century

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Academic Editor: Nguyen Ngoc Anh

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Abstract: The real condition of the world today is in a phenomenon that brings governments to make a policy in the world of education. The distance learning policy (PJJ) during the COVID-19 pandemic, for example, turned out to be a new problem for education. The implementation of education and learning has undergone drastic changes. Learning is no longer using conventional face-to-face meetings, but is starting to be integrated with online learning. This paper aims to describe learning during a pandemic. This paper also shows that good collaboration between teachers, students, and parents can overcome problems in adapting blended learning methods during a pandemic. The application of the blended learning method in learning requires teachers to be creative in providing a learning platform. The activeness of students in the learning process and parents accompanying students during online learning greatly help the progress and creativity of students during the pandemic.

Keywords: *Blended Learning, Education, COVID-19.*

A. INTRODUCTION

The real conditions of the world today, such as the occurrence of a pandemic, require us to find solutions that can enable citizens to obtain rights that are in line with regulations. Government regulations on the implementation of distance learning are not fully enforced in some areas. Areas that are included in the green zone are allowed to carry out face-to-face meetings even though the time is limited and continue to prioritize health protocols (BCC News, 2020). This is what requires principals and teachers in the green zone to demonstrate learning innovation. One of the innovations carried out by the school is to apply Blended Learning-based learning. Blended Learning refers to learning that combines or mixes face-to-face learning and internet-based learning (online) (Idris, 2018; Wardani et al., 2018).

Blended Learning is a type of learning that combines classical teaching (face to face) with online teaching. Blended Learning combines aspects of web/internet-based learning, video streaming, synchronous and asynchronous audio communication with traditional 'face-to-face' learning (Sjukur, 2013). The blended learning method is a method that uses two approaches at once. In a sense, this method uses an online system as well as face-to-face virtual via video conferencing. So, even though students and teachers are learning remotely, they can still interact with each other. Panambaian (2020) explained that the thing that is no less important in the blended learning program is to increase the interaction between teachers and students. This is due to the distance factor which does not allow the teacher and students to meet directly in the classroom. So, when learning occurs online, a teacher should liven up the atmosphere during the COVID-19 pandemic. It does not even rule out the possibility to communicate between students in the class with regard to discussing the tasks that have been determined by the teacher. Through Blended Learning, students are required to be more active. With involvement and participation in the learning process, Blended Learning can increase students' sense of responsibility. In addition, the interaction in the Blended Learning model creates a motive for students to compete in learning.

Since the beginning of 2000 blended learning has been one of the most popular pedagogical concepts. Historically, blended learning was predominantly found in corporation and higher education context but now it is increasingly found in K-12 education. In general, blended learning defines as a combination of physical classroom learning and virtual atmosphere. Blended learning came to serve as a connection between traditional learning and E-learning, hence having merits that outweigh the advantages of both conventional learning and E-learning if they are taken separately, as is not restricted to the boundaries of the classroom, however it keeps in touch with its students even after the end of the classroom lessons to accomplish nonstop viability even with the presence of enormous number of students (Rao, 2019).

Thus, blended learning is a combination between face-to-face and e-learning using electronic media in which the advantages that exist in traditional classes can be combined with those in e-learning classes. It is not intended to supersede, one of these individual approaches, rather to build from each to create a new, more effective learning experience for students. Due to its great prospects to maximize the advantages of both online learning and face to-face learning, blended learning has been growing as one of the most important educational advances of the 21st century. Moreover, since the global crisis of Coronavirus Disease – 2019 phenomenon, applying blended learning was not again an option but more as a necessity. Blended learning was considered as a viable answer to bridge the need of students to keep learning within the limits of face-to-face contact. Hence, it is crucial to look at the fact about how teacher implements blended learning in their class.

B. LITERATURE REVIEW

1. Face-to-Face Learning

In traditional education in which face to face classroom used, some teachers are better in building up classroom atmosphere through humour, but the rest are better in applying skill using technology and transferring knowledge in a simple way. Meanwhile, some students are confidence to ask and discuss the topic with teacher or other friends, some of them prefer to be quiet, but productive in writing, and the rest just become a good listener. Face to face learning facilitates teachers to be able to adapt to unpredictable changes that occur in class. The positive relationship built between teacher and student during the learning process is more important than the student and technology (Kieschnick, 2016). Technology has the potential to enhance and transform teaching, however it can also be utilized improperly or in ways that actually interfere with learning.

In short, no matter how sophisticated the technology, it can never replace teachers' role. Technology plays a supporting role but teachers bring a change that technology cannot always do. Technology can never come close to the knowledge and life experience that a teacher brings. Technology cannot inspire and help students through their struggles, help them to feel confidence with themselves, stand up and fight back when they are getting down, but a teacher can be either a positive influence or inspiration to set and achieve goals for them. The trust and bond between teachers and students are able to create a perfect learning environment that can never be achieved if only through technology and students alone. Indeed, a teacher motivates, leads, guides, facilitates and mentors a student. Teacher is a role model who sets an example to students and drive them towards a brighter future.

2. E-Learning

According (Goswami et al., 2020) e-learning is a modern way of learning, which includes electronic media in the field of education. E-learning makes users able to access course material everywhere and every time as long as they have an internet connection. E-learning

implicates the use of electronic devices such as computer, smartphone, tablet and many more in some ways to provide learning purpose. It means e-learning can't be existed without technology. Indeed, it proves the integration between technology and education. Basically, E-learning is divided into two types; synchronous and asynchronous. The primary advantage of synchronous is to empower students in abstaining from feeling protected in speaking with others during learning process, however not flexible in terms of time. Students should set to the side their chance to attend the online session live and real-time.

On the contrary, asynchronous e-learning makes students able to follow the curriculum with their own desire without worrying about schedule. This type of e-learning is appropriate for students who like to arrange schedule of learning by themselves in which they may choose where and when they can continue their learning. In e-learning, students can use the forums to talk about any issue that they wish to pursue. Simply, e-learning is learning which utilizes electronic technologies to access educational curriculum outside traditional classroom and it refers to learning that delivered in an online. Even though do online but this type of delivery promises various benefit to the users for example building a collaborative and communicative environment in learning, raises a variety of perspectives on the topic being taught and ease access without limited space and time. However, technology is important but it depends on how it utilized properly by the users, firstly the instructional design should be prioritized over a technology itself.

3. Education in Emergency Times

The temporary shift of instructional face to face delivery to an alternate delivery mode was carried out due to crisis circumstances under Covid-19 pandemic that has made 1,5 billion children and youth in 188 countries around the world based on the UNESCO statistic have to stay home. It involves the utilization of completely remote teaching solutions that would somehow be delivered face-to-face, blended or hybrid learning and that will return to normal once the emergency has abated. The primary purpose of education in emergency times is not to re-create a robust educational environment but rather to provide temporary access to instruction and instructional supports in a way that rushes to set up and is reliably available amidst the covid-19 outbreak. Apparently educational planning in emergency time requires creative thinking and discipline. The school management including teachers have to be able to think outside standard boxes to generate various possible activities that help meet the students' need with some intractable drawbacks in between.

During emergency times, public and private schools of all education levels improvised remote classes and produces a bare minimum of digital content in attempt to ensure education continuity. Virtual or online platforms, instant messaging apps, and broadcast television by the government are used to maintain students to keep engaging in academic activities at home during the increased community quarantine implementation due to Covid-19. Public schools resorted to different actions and strategies to continue developing pedagogical activities in and outside class, despite of numerous drawbacks. This emergency time in teaching and learning is faced with the fact that student participation is low. Many students struggled with deficient infrastructure and had trouble effectively participating in learning activities particularly online. However, under these circumstances, blended teaching is widely regarded as a viable answer to the urgent condition of continuing academic activities within the limits of face-to-face contact.

4. Blended Learning

The rise of new technologies is increasingly rapid, being the background of the birth of the learning model of blended learning as a new innovation in reacting to the challenges of the

times. The implementation allows the use of online learning resources, especially those based on web, without leaving face to face learning. Blended learning is noted as a model to course design that meaningfully brings together the best of both face-to-face & online learning. Current studies have revealed that blended learning is very potential to help address students' diverse need and learning style, advance students' learning experience by developing their engagement, motivation, and capacity for reflection, and provide learners with direct experience with technology-supported skills essential for 21st century success style.

However, there are common threads and preparation before teacher considering the use of Blended Learning (Kjaergaard, 2017). The common threads of Blended Learning are: (1) Combination of teaching strategies, (2) Combination of delivery media, (3) Combination of online and face-to-face instruction, and (4) Combination of student activities online and in class

While, the preparation to use Blended Learning is drawn under the following fifth preparation, (1) How to facilitate & manage online interaction, (2) How to assess students' online work, (3) How to integrate online and face-to-face teaching, (4) How to use the technology and (5) Get started early. Redesign requires more time than is often anticipated.

It is simply to announce that blended learning uses the online technology to not just a supplement but transform and improve the learning process for both in-class and e-class.

5. The Advantages of Blended Learning

Various research findings on blended learning area around the world have shown that blended learning is one of the most popular learning models used in K-12. Sharma (2017) found some advantages of blended learning for students such as developing independent learners, a source of instant feedback, time saving and increase students' motivation. Students can learn independently through varieties resources that suitable with their learning style. Besides, students are able to save their time to copy the learning material and do the task by using computer and webs, at the same time online discussion can be used to frequently give feedback. One of the causes that motivates students to learn influenced by the model and varieties activity in learning. Here, students are motivated by the conventional method and using computer-based learning.

Another study has been conducted by Harriman (2004) in (Malonzo, Vallejo, & Vargas, 2021) also found any advantages of blended learning for students, teacher, and also institution. Here are some advantages for students: (1) do not only learn more during online sessions added to traditional learning, but it can increase student interaction and satisfaction (2) Students are equipped with many choices in addition classroom learning, improving what is learned, and opportunity to access more learning levels go on, and (3) Not only learning one-way sequentially, blended learning students have the opportunity to learn material desired, as well as setting the schedule and time flexible eye learning.

For teacher, blended learning helps in designing the material in which the presentations can be delivered more quickly to students who are learn to use e-learning. Blended Learning offers some advantages to student, for instance, they can, in part, control the time, pace, and place of their learning. Whereas, for institution blended learning assumed to give an advantage since it is include in more economical costs for both institutions and students.

After four months implementing blended learning (Buran & Evseeva, 2015) overviewed the benefits and drawbacks of blended learning in a language classroom. The advantages involved, (1) Students' online research skills have been developed and their critical thinking has improved, (2) Blended learning is independent learning, so students have more opportunities for studying anywhere and anytime, (3) Students have improved their reading skills, caused by a large amount of information given online, (4) They have enhanced writing skills, while posted their comments as well as completed writing tasks and tests, (5) Students'

interest and motivation to learn the English language have increased for the reason the course was tailored to suit the learners' needs., and (6) Watching the video has developed listening skills.

The recent discovery on blended learning from (Hensley, 2020) had founded out the advantages of it as follows, (1) Increase student engagement and motivation, (2) Development of 21st century skills and competencies, (3) Improve learning outcomes for student at all academic levels, (5) Ongoing opportunities for connecting, collaborating, and learning and (6) Changes in pedagogical practice.

Further, (Sorbie, 2015) pointed out blended learning advantages into five categories below, (1) Student-centred environment and individualization, (2) Organization and usefulness. (Paperless), (3) Communication and collaboration, (4) Formative e-assessment and self-regulation, and (5) Provide real-world relevance

Meanwhile, (Saeed, 2020) defined that the advantages of Blended learning lay on personalized learning, effective classroom strategy and instructional resources that enhanced for students in the classroom. Through blended learning the teachers' role shifts from teacher-centred to student-centred allowing teachers to facilitate the learning process (Ignatova et al., 2015). In short, blended learning has many advantages to all academics and institution started from limitation space and time to teach and learn, various learning resources, easy access to improving and increasing students' performance, create collaborative teaching and learning, until offering more economic education. Since blended learning could be a bridge to integrate learning traditionally and e-learning, it becomes one of alternative teaching and learning method in 21st century.

6. The Drawbacks of Blended Learning

Graham et al. (2003) grouped the blended learning drawbacks into three major categories as follows:

a. The culture and blended learning environments

One major challenge to be considered in the implementation of blended learning is the adaptation from the traditional culture. Some teachers are against new technological methods as a replacement for face-to-face classroom. Some of them may have difficulty in adopting the new learning strategy. Likewise, students are comfortable with traditional teaching methods that do not require them to actively participate. By contrast blended learning is unlike a traditional approach requires a high level of student discipline and responsiveness. Student centred itself is a tough problem to deal with Another drawback due to the culture and blended learning environment is some students do not take online instruction seriously as they do in face-to-face classroom. Certainly, taking online instruction seriously also requires students to have an adequate level of self-discipline.

b. Finding the right design

The need of various designs addressed by the flexibility of blended learning and is both strength and a drawback. Blended learning requires an intentional approach to instructional design, not just delivery. If there were established design frameworks that could be used as guidelines, it would greatly simplify the task of implementing blended learning. In addition, producing effective and interactive digital contents is another critical issue that challenges teachers. However, with such a wide variety of delivery mediums of implementing blended learning, choosing the best combination of technology is a daunting task for many teachers. In addition, the teacher who aims to implement blended learning may not have enough knowledge about how to ensure their effectiveness and there is a lack of a specific instructional design framework to be used

for all curricula. Inadequate skill also occurs as another problem due to the desire to implement this method.

c. Demand on time.

The time required by teachers who implement blended courses will increase because they must develop digital content and moderate online learning. In this case, transforming traditional course in teaching into blended learning will require more teachers time because of the necessity of redesigning the course. Moreover, teachers and students typically incur an increase in the time they spend on learning new techniques and skills, and on interacting with each other in blended learning environments. This means the duty to both teachers and students multiply many times. Teachers will have to adjust their schedules to accommodate more frequent interaction with students who generally expect more frequent feedback in online classroom than in face-to-face classroom interaction. Several studies have shown that many students feel that they have missed the opportunity to communicate with the teacher compared to face-to-face learning. By this situation the time to understand the core material is much more because students tend to be slower to understand online literature than when they get direct explanations from the teacher.

Rasheed, Kamsin, & Abdullah (2020) identified drawbacks in the online component of blended learning among students, teachers and educational institutions perspectives into three categories. They are students' challenges involve self-regulation and use of technology for studying, teachers are reluctant to include technology into face-to-face teaching, and educational institutions challenge lies in provision of suitable technology. Those perspectives showed that the appropriate and skill in using and integrating the technology was dominantly a blended learning drawback for all academics and institution.

Buran & Evseeva (2015) found out that there are still some drawbacks to four months blended learning implementation especially for online. They are, (1) Students should be more disciplined to succeed in online courses, (2) Low retention rates in online courses, (3) Problems with eyesight, (4) The unwillingness of some students to learn English online, as online courses increase students' mental and physical workload, (5) Lack of acceptance of online education by potential employers.

Sorbie (2015) has clearly exposed drawbacks of blended learning as follows, (1) Disengagement, in which students reported distractions, included social media and playing games, (2) Device and infrastructure concerns, in which the participants commented about devices being broken or maintaining a charge throughout the day and problems with intermittent Wi-Fi access, (3) The lack of time for collaboration. Teachers reported positive attitudes regarding erudition if they were provided opportunities to share because through shared experiences, teachers were able to grow and learn. Therefore, there should be a chance for teacher to have a time for collaboration.

Through the research findings on blended learning recently, the drawbacks of blended learning were pointed out into three categories: 1) Additional time, for instance to plan, to learn technology, and to make assessment (Hensley, 2020); 2) Internet connectivity; and 3) Lack of instructional technology professional development (Saeed, 2020).

Based on the research findings above, it is clear that the drawbacks has been existed along the high numbers of advantages offered by blended learning. The drawbacks vary started from the student, teacher, institution or school management, technology and other supporting systems including the support and autonomy in decision making.

7. E-Learning Platforms

Teachers utilizing blended learning create an environment where learning is enhanced through the application of technological tools that students are accustomed to using outside of the classroom. This is where teachers use their professional expertise and experiences of what works combined with the appropriate technologies to strategically plan instruction to address the needs of all learners (Kieschnick, 2016). In teaching and learning environment the application of technological tools are called online platform. The selection of the right digital tool and / or combination of tools to enhance the specific instructional strategy is essential to be effective and efficient in meeting the desired outcomes.

Strategic planning enables teachers to understand why strategies and tools work or fail in achieving the learning goal at class. As the learning goals change, strategies and tools are adjusted to best meet the learning needs of all students (Kieschnick, 2016). Technology is a powerful tool for teachers, but those whose pedagogical practices align with student learning goals, rather than the technology itself, are seeing improvements in student learning outcomes (Kieschnick, 2016). The most important part of learning process, teachers are using technology to create scalable learning environments to support students in taking more control of their learning (Alijani et al., 2014).

Various kinds of online platform spread out in the midst of pandemic. One of the most popular is Google Classroom. It is a foyer of blended learning applications that use for free. Within Google Classroom teachers can create their own classes and share the class code or invite students. Google Classroom is intended to help students find or overcome learning difficulties, share lessons, and create assignments without having to attend a face-to-face classroom. The primary purpose of Google Classroom is to streamline the process of file sharing between teachers and students. Google Classroom has copious facilities which are beneficial for its users. A few of them are user friendly, cost free, cell phone friendly, and time saving. Based on Janzen "Google Classroom's design purposefully simplifies the instructional interface and options will use for delivering and tracking assignments; communication with the entire course or individuals is also simplified through announcements, email, and push notifications". In addition, Google Classroom integrates other Google apps, like, Docs, Slides, Drive and Spreadsheets in one click. Nevertheless, the whole process of administering assignments, grading, formative assessment, and feedback is simplified and streamlined.

Another famous e-learning platform use amidst the pandemic is WhatsApp. In spite of any weaknesses about the feature, this kind of platform still exist and inundated users because this is the simplest one. Historically, WhatsApp was founded on February 24th, 2009. WhatsApp is a messaging app for smartphones with basic similar to BlackBerry Messenger which was being popular last few years passed. WhatsApp allows teacher and students to exchange messages without the cost of SMS, because WhatsApp Messenger uses the same internet data plan for email, web browsing, and more. Many advantages offered by WhatsApp. For instance, chatting online, share files, sound, video, exchange photos and more. The best feature offers by WhatsApp is WhatsApp Web. By this, teachers and students can easily use the Apps in a computer. Moreover, even when the teachers or students' smartphone left home, they can continue chatting by using WhatsApp Web in the computer as long as the smartphone data is on and WhatsApp Web on Computer does not log out yet. In addition, by activating this feature teacher and student can works multiple activities in one computer without hesitating to miss the chat room while typing.

Apart from those online platforms above, there are many other types of platforms that can also be used as online media in implementing blended learning, for example, Moddle, Edmodo, Schoology, telegram, and Messenger. In addition to the online platform which facilitates material for students, along with chat rooms, blended learning can also be combined

with video conferencing, for example through zoom, google meet, skype and many more. In short, online platform is dominantly popular amidst Coronavirus outbreak to support the teaching and learning process from home.

Related to the implementation one of the study done by Risma Fitria Uki. Her study employed qualitative research design with phenomenology approach to explore and more clearly describe the perspective of school community members about blended learning. 23 school community members from four vocational high schools that implemented blended learning in East Kolaka have been interviewed for about 30 minutes to one hour in a place which was comfortable to each participant. Other instruments of this study were observation (face-to-face class), documents and audio-visual aids. The document was the teacher journals and / or reports meanwhile the audio - visual consist of audio recorded during interview, pictures in classroom meeting and learning activities screenshotted from the online apps used. The data was analysed by using coding process (Creswell, 2014). Her study finds that In Indonesia, most of vocational high schools were first implemented blended learning as an alternative choice to maintain teaching and learning activities due to the outbreak of Coronavirus disease 2019. Further, this kind of blended learning is potential to continuously used as a learning model for vocational high school since it offers to help both teacher and students to be focused on practice during face-to-face class. Moreover, it successfully to keep the bond between teacher and student who are joining the internship Industrial program (*Praktek Kerja Industri*) using online. Regarding those backgrounds, then, the question was drawn below: “*How is blended learning implemented by teacher in their teaching activities?*”

The implementation of blended learning at vocational high school is related to the common definition of blended learning which combines online and offline class as shown in the following table.

Table 1. Blended Learning Implementation at Vocational High School

Teaching and Learning Activities				Media	Cognitive Realm
In-class		E-class			
Teacher	Student	Teacher	Student		
-Giving motivation -Quiz/brainstorming -Explaining and discussing the materials given in online -Practice based on theory given in online -Check the attendance list -Check and assess the assignments. -Giving feedback -Attitude assessments	-Listening to teacher’s explanation -Asking/responding -Learn in practice -Fill the attendance list -Submit assignment	- Post various kind of materials; Text, poem, drama, video tutorials - Check the attendance list. - Quiz - Giving example (role model) using voice notes or video performance - Giving feedback - Asking and responding about	- Taking notes - Taking a quiz - Fill the attendance list - Online discussion related to the materials - Sending assignment through video, voice notes and the screenshot of note book. - Role play using voice notes or video performance	Less rich Media: WA, Telegram and Messenger. Media rich: GC, (Google site, Google form, Google Meet), Mic 365, Moddle, Skype, and Zoom	C1-C6

		materials or assignment. - Video conference	- Attending class conference using Google meet, Skype or zoom)		
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Note: C1: knowledge, C2 comprehension, C3 application, C4 Analysis, C5 synthesis, and C6 evaluation

Commonly, teacher used face to face to explain the materials and assess the assignments that have been given in online. Classroom activities became less student-centred in which students were more passive in comparison to online class. They mostly listened to teacher’s explanation and rarely asked a single question related to the material. Likewise, teacher rarely utilized technology in face-to-face class as they did in online. What should be changed is teacher should begin to utilized technology more often in face-to-face class for experiencing more in learning using technology and building student-centred in classroom activities.

Ignatova et al. (2015) revealed that technology allowed teachers to put the responsibility of learning on their students. The use of technology fostered a student-centred environment that encouraged independency. It seemed like adding the technology enables student to be actively involved opposed to just sitting there listening to teacher. Making them responsible in terms of what they were learning, how they were learning it, being active and creative, and just putting some more responsibility on them as opposed to putting the responsibility all on teacher. On the other hand, teachers improved their self-quality independently through the use of technology.

Blended learning that offered an integration of technology in education is a necessary since the modern education system recognizes the need for students to be more socially adaptable as well as develop technological skills as they live in an increasingly digital world that requires them to be culturally and socially competent. Blended learning imparts indispensable and higher order thinking skills that can help vocational students adjust better to their real work in interconnected and volatile world. It’s clear that blended learning is in line with the constructivism theory, the recent curriculum and the demand of 21st century that requires both students and teachers to be more technologically proficient and adapt with the changing of times.

Online class was used to enhance students digital literacy by giving numerous information resources from all over the world. In online, some teachers prefer to make their own digital content that appropriate with the level, learning style and the needs of students. But, not few who took a consideration to use ready-made materials due to the lack of motivation and the lack of expertise in technology. Online classes could be continued even after the class session has ended due to the flexibility of online class. It allows teacher to monitor students more times in comparison to offline.

Instructional design was the essence in blended learning implementation. Teacher should be able to produce effective and interactive digital content that easy understand for students. Teachers are better focused on giving more opportunities for students to learn in practice. Because vocational schools have a unique characteristic that it is focused on skill (life skill). Learning in vocational school is almost like hands-on learning. Like whenever students are learning how to assemble a motorcycle or competence in drawing with AutoCAD and SketchUp if just seeing but they are not actually doing it, they are not going to really learn how. Therefore, teacher must well prepared the right instructional design for both offline and online class in order to balance the portion of the needs of mastering theory and learn in practice for vocational schools student.

Least but not last, the successful of blended learning implementation could only be maximized by the role of parents as the only teacher collaboration partners to monitor the progress and support student learning activities at home. The active participation of parents became much more important contribution to future education. Online class at home would work better when parents took an active role in their child's education.

C. RESULTS AND DISCUSSION

A number of research results show that the Blended Learning model has a positive influence on learning, starting from the teaching and learning process (Banggur et al., 2018; Fandianta et al., 2013), learning motivation, and student learning outcomes (Isti'annah, 2013). 2017; Khoiroh et al., 2017). In addition, this learning model is very suitable when used as a learning model in the 21st century and future era (Hasbullah, 2014; Wardani et al., 2018). Blended learning-based learning, in addition to improving learning outcomes, is also useful for improving communication relationships in three learning models, namely the traditional classroom-based learning environment, the blended one and the fully online one. The results of research in the field show that Blended Learning produces a stronger feeling of communicating between students than traditional or fully online (Idris, 2018). The face-to-face learning process in the classroom has lost its appeal in this 21st era. This happens because some students think that with increasingly widespread technological developments, the learning process in the 21st era can be done online (e-learning). To accommodate technological developments (e-learning) without having to leave face-to-face learning (face-to-face) there must be a strategy for organizing teaching, teaching delivery, and the right quality of teaching, namely Blended Learning (Wardani et al., 2018). Or it can be interpreted as a learning model that combines traditional and modern learning which aims to synthesize face-to-face and online learning in an integrated combination to create an effective, efficient and interesting learning experience. Learning Blended Learning does not mean replacing the face-to-face learning model in the classroom, but strengthening the learning model through the development of educational technology. From several research results, it is concluded that the purpose of blended learning is to provide significant learning outcomes rather than using conventional learning models. This is because students learn more actively based on the experience and thinking power they have so as to form the ability of students to explore their knowledge.

Education is basically a process of humanization for humans, through the delivery of various knowledge in the form of teaching in stages, where the educational teaching process is the responsibility of parents and the community in their environment. Education is all efforts, influence, protection, and assistance given to a child, or more precisely to help children in their ability to full fill their own life responsibilities. In the sense that students are able to be independent in fulfilling their life tasks, have high skills, experience and skills and are able to solve the problems they face and develop their potential. Therefore, education plays an important role in life. In essence, education is an effort to inherit values that will help and guide life as well as improve the fate and civilization of mankind. Thus, it is reasonable to say that the progress and decline of a nation or country is determined by how education is provided or perceived by the people of that nation. In this era of globalization, we need to train competent young people with broad understanding, good skills, of course, those who like to learn and read and can pour all their knowledge into everyday life. With regard to the above, the essence of learning is an activity that encourages people to use various learning resources to gain knowledge, skills, and positive values. Learning behaviour is a habit of feeling learning which is a driving force for students to acquire the knowledge they expect. Thus, the stages of learning from this knowledge are permanently owned so that it can be carried out properly along with the development of thought construction.

During the current Covid-19 pandemic, the use of communication technology, educational technology, and learning media is very important in the context of the teaching and learning process. The trend of learning is now changing traditional learning towards future learning known as the Knowledge Age, where one can learn anywhere and anytime. All learning resources are designed to encourage initiatives and the learning process to be more effective, efficient and interesting, so that students feel at home in education as learning managers. This requires innovation in processing learning models. One of them is by applying the Blended Learning model. Blended Learning is a learning model that follows the times. This learning model is implemented by combining face-to-face or face-to-face learning with computer-based learning. That is, the learning process is carried out using a technological approach by combining face-to-face learning resources both with teachers and those contained in computer media, cell phones or mobile phones, satellite television channels, video conferencing, and electronic media

D. CONCLUSION

Teacher utilized blended learning at their class to balance the portion of the needs of mastering theory and learn in practice for vocational schools student. Online class mostly used to give materials and assignment to students in the form of digital content. On the contrary, face-to-face class was greatly utilized for explaining, discussing and practicing the materials given in online. Blended learning can be used not only at the university or institute level, but in all educational units, such as elementary schools, high schools and can even be used at meetings in conditions that require it.

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