UTILIZATION OF THE GOOGLE CLASSROOM APPLICATION AS A SOLUTION TO LEARNING BLOOD IN THE PANDEMIC TIME COVID-19

Author:

Bayu Rianto¹

Lecturers Department of Information Systems, Faculty of Engineering and Computer Science, Universitas Islam Indragiri, Tembilahan, Riau, Indonesia¹

Email: rianto.bayu91@gmail.com

Ambiyar²

Lecturers Postgraduate Technology and Vocational Education, Faculty of Engineering, Universitas Negeri Padang, Padang 25133 Indonesia

Email: ambiyar@ft.unp.ac.id

Hidayati³

Lecturers Postgraduate Technology and Vocational Education, Faculty of Engineering, Universitas Negeri Padang, Padang 25133 Indonesia

Email: yayat.hidayati@yahoo.com

Dwi Sapta Aryantiningsih⁴

Lecturers STIKES Payung Negeri Pekanbaru, Riau, Indonesia

Email: dwisapta.aryantiningsih@payungnegeri.ac.id

Fitri Avu⁵

Lecturers AMIK Mahaputra Riau, Indonesia

Email: fitriayu@amikmahaputra.ac.id

Rahmiati⁶

Lecturers STMIK Amik Riau, Indonesia

Email: rahmiati@sar.ac.id

Susi Erlinda⁷

Lecturers STMIK Amik Riau, Indonesia Email: susierlinda@stmik-amik-riau.ac.id

Rika Melyanti^{8*}

Lecturers STMIK Hangtuah Pekanbaru, Riau, Indonesia

Email: camelya2105@gmail.com

*Corresponding author:

Rika Melyanti

Lecturers STMIK Hangtuah Pekanbaru, Riau, Indonesia

Email: camelya2105@gmail.com

Abstract

The era of information technology which is very rapidly developing today requires all layers to be able to take full advantage of this technology, including the world of education. The world of education today must be able to adjust to technological developments that are increasingly sophisticated because one of the goals of utilizing technology in the world of education is to facilitate the implementation of education

which includes giving assignments to students to interactions from lecturers to students to smooth the lecture process. Online or (online) especially at this time in the midst of the Covid-19 pandemic. This research focuses on how to use the google classroom application as a medium that can be used in the online learning process to be able to safely interact in the teaching and learning process amid today's pandemic. This research is qualitative in which the data collection method is carried out by distributing questionnaires among students and lecturers via google form which is intended to be able to quickly obtain data and support government messages, namely social distancing. With the use of the google classroom application, it is hoped that it can facilitate lecturers and students to interact related to providing information to facilitate the provision of independent assignments or even group assignments in the midst of today's Covid-19 pandemic.

Keyword: Google classroom, online learning, covid-19

Introduction

The Covid-19 pandemic that is currently hitting Indonesia and other countries in the world, starting from March 2020 until today, has had an impact on various layers and is no exception to the world of education so that inevitably the impact of this pandemic, the world of education requires to make a new breakthrough. namely utilizing information technology in every process undertaken (Rianto, 2019; Fahmi, 2018; Haviluddin; 2011). The use of information technology is carried out to support the teaching and learning process, which was initially carried out directly or offline (outside the network), currently using supporting applications in this process, which is intended to break the chain of the spread of covid-19 in Indonesia (Yunita & Rianto, 2018; Rianto, *et al.*, 2020; Hendini, 2016).

Coronaviruses are a large family of viruses that cause disease in humans and animals. In humans, it usually causes respiratory infections, from the common cold to serious illnesses such as Middle East Respiratory Syndrome (MERS) and Severe Acute Respiratory Syndrome (SARS). A new type of coronavirus that was discovered in humans since the outbreak occurred in Wuhan China, in December 2019, was then named Severe Acute Respiratory Syndrome Coronavirus 2 (SARS-COV2), and causes Coronavirus Disease-2019 (COVID-19) (Rianto & Yunita, 2020; Widiyanto, 2018; Apriyanto, et al., 2021). When we carry out the online learning process in the middle of the current pandemic, of course we need media as a means of implementing the teaching and learning process. Therefore, there are many platforms that can be used or utilized by schools or universities (Chan & Shin, 2006; Ahmad et al., 2021). Learning media applications that are already available can be used as a means of smoothing the teaching and learning process, such as: Zoom Cloud Meeting, Webex Meeting, Classroom, Edmodo, social media platforms and so on. Of course, each learning application has its own advantages and disadvantages according to our needs in using it as a means to expedite any learning process that will be carried out (Yunita & Rianto, 2018; Chan & Shin, 2006; Rianto, 2019).

In general, all learning media platforms must be connected to the internet first and can be used to transfer text, video, voice and as a means of communication and of course this will be very easy compared to the use of media that are still conventional in nature (Fitriani, Ilyas, & Rianto, 2019; Rianto, 2017). Education in the era of the industrial revolution 4.0 indeed requires students and lecturers to be proficient in using this information technology or commonly known as a cyber system (cyber system) which can make learning no longer limited by space and time (Rianto, Yunita, & Amin, 2021; Jalinus, *et al.*, 2017). It's just that the current problem is the lack of knowledge and skills possessed by students and the lecturers or teaching staff at the university are no exception. In this study, a sample was taken as an analysis of the use of learning media applications in the Islamic University of Indragiri, which has six faculties and fifteen study programs in it (Abrahams & Millar, 2008; Nurhayati & Apriyanto, 2021; Ramli & Apriyanto, 2020).

Basically, I have used several learning media applications as a support or means of carrying out the teaching and learning process such as zooming and social media platforms, it's just that there are still obstacles in every process carried out because this research sees that when using the google classroom application there is little comparison for the ease that is achieved when using this application (Needham, 2014; Arpah, Marlina, & Apriyanto, 2020).

In addition, online learning or online learning has not been used and the use of learning media applications is still lacking so that the use of technology cannot be maximally utilized (Rianto, 2019; Suhery, Putra, & Jasmalinda, 2020; Kurniawan, 2018).

The google classroom application is expected to provide assistance to the teaching and learning process carried out both for students and even for teaching staff or lecturers. Google Classroom is a free, web-based platform created to make learning activities easier for educators and students. Launching Google for Education, Classroom allows teachers to organize and assess the progress of their students while staying connected from anywhere. Because it is web-based, this platform is automatically integrated with other Google Suite for Education services such as Gmail, Google Docs, and Google Calendar. Students can receive and submit assignments directly in the Classroom, as well as teachers (Abrahams & Reiss, 2012; Koirala, 2019). This service can greatly reduce paper usage and simplify the learning process, especially if done remotely.

This research was conducted to determine how much the use of Google Classroom as an option to facilitate the teaching and learning process during the Covid-19 pandemic for students and lecturers in the Indragiri Islamic University environment. The teaching and learning process which is carried out online or online is to see aspects of cognitive theory where individual behavior can be directed through the individual's point of view and from the side of his experience because the behavior is also dynamic. In addition to seeing the positive aspects, another aspect that must be considered is the theory of communication because in carrying out the teaching and learning process, communication is carried out. Communication made by students to lecturers or even vice versa by lecturers to students (Rianto & Yunita, 2020; Sari, 2017).

The benefit of doing this research is to see how the effect is to see how the responses of students and lecturers to learning online or online today at the Islamic

University of Indragiri by utilizing the google classroom application. In addition, this study also hopes that how to use information technology in supporting the teaching and learning process in the midst of the Covid-19 pandemic so that it can continue to optimize every process that is carried out (Needham, 2014; Sani, 2014).

Method

In this research, the method used is qualitative. This qualitative research is defined as an approach or tracing to explore or understand a central information system. In this study the subjects in this case were lecturers and students in the Indonesian Islamic University which consisted of 6 faculties and 15 study programs where 30 people were taken in each faculty with data collection techniques by teaching questionnaires made using the Google application. existing forms so that data can be obtained more quickly and also support the government's message, namely social distencing.

The analysis carried out in this study used interactive analysis from Milles & Huberman (2014) where this analysis emphasizes several aspects of completion, namely: data reduction, data presentation and making conclusions.

Results and Discussion

In this study, to see how the level of use and utilization of the google classroom application was carried out on six faculties and fifteen study programs in the Islamic University of Indragiri. Where the six faculties and fifteen study programs are divided into two criteria for respondents, namely from the lecturers and also from the students, it can be seen in the following table:

Table 1. Faculty Name and Number of Respondents

No	Faculty Name	Number of Respondents
1	Faculty of Engineering and Computer Science	30
2	Faculty of Agriculture	30
3	Faculty of Islamic Studies	30
4	Faculty of Teacher Training and Education	30
5	Faculty of Law	30
6	Faculty of Economics and Business	30
	Total	180

Table 1 shows the names of the faculties that were sampled and also the number of respondents in each faculty (Abrahams & Millar, 2008). The teaching and learning process which was initially carried out directly in the environment of the Islamic University of Indragiri, lecturers and students can interact directly in the classroom or laboratory, but after the Covid-19 pandemic which is still spreading to this day, whether you want it or not or like it or not, universities must take advantage of information technology as a solution so that the teaching and learning process can continue and one of the applications used to facilitate this process is the google classroom (Rianto, Yunita, & Amin, 2021; Jalinus, Arwizet, Nabawi, & Ambiyar, 2017).

Of the 180 respondents taken as a sample who are currently undergoing an online learning period (in the network) in the Islamic University of Indragiri with 6 faculties and 15 study programs, on average, from lecturers and even students are very new to using the google classroom application. Usually the media used to facilitate the interaction of lecturers and students is social media platforms such as WhatsApp which is created by a lecture group (Yunita & Rianto, 2018; Rianto, Lidya, & Nurcahyo, 2016). Table 2 is an explanation regarding the distribution of the number of respondents taken in this study, where each faculty within the Islamic University of Indragiri is divided back into their respective study programs by taking respondents from the elements of lecturers and students as well (Apriyanto *et al.*, 2021).

Table 2. Number of Lecturers and Students per Study Program

No	Study program	Lecture	Student
1	Information Systems	5	5
2	Civil Engineering	5	5
3	Industrial Engineering	5	5
4	Agrotechnology	5	4
5	Agribusiness	3	3
6	Aquaculture	3	3
7	Food Technology	4	5
8	Sharia Economics	5	5
9	MPI	5	5
10	IAT	5	5
11	Penjaskesrek	7	8
12	PBI	7	8
13	Legal studies	15	15
14	Management	7	8
15	Accounting	7	8
	Total	88	92
	Amount	180	

It is undeniable that today there are many learning media applications that can be used or utilized as a means of connecting to interact in every teaching and learning process such as zoom, webex and so on. Google classroom is a separate phenomenon among lecturers and students especially in the Islamic University of Indragiri, the use of this application jumped when the Covid-19 outbreak arrived in the city of Tembilahan Riau, which required learning that was originally conventional to be computerized or what we usually call the initial LURING (Outdoor) and currently becomes DARING (Online).

Table 3. Lecturers and Students who have used Google Classroom

No	Lecture	Student	Precent	
1	Already Using	Already Using	85%	85%
_ 2	Not Using	Not Using	15%	15%

Table 3 is the data collected to determine the level of usefulness of Google Classroom among lecturers and students, where from the table it can be illustrated that the majority of lecturers and students have used or utilized this Google Classroom application. Only a few have yet to take advantage of the google classroom application because some lecturers only take advantage of the social media platform as a means of interacting with the teaching and learning process. The level of usability or utilization of the google classroom application is getting higher after the Covid-19 pandemic that hit Indonesia today, there are lots of learning media applications that can be used but one of the friendliest and easiest to use is the google classroom which can be used well by lecturers as teaching staff as well as for the students themselves (Widiyanto, 2018; Hardiansyah, Laday, & Suhaeli, 2019).

Of course the use of learning media applications such as google classroom cannot be separated from shortcomings like other applications that can facilitate teaching and learning activities amid the current Covid-19 pandemic. The use of this application is expected to make it easier and continue to support the government's message in terms of wanting to break the chain of the spread of covid-19 besides that it will still make it effective and efficient in every teaching and learning process that is carried out (Sonata, 2019).

Conclusion

The use of learning media applications in the midst of the current Covid-19 epidemic is expected to break the chain of its distribution in the current world of education. Today's online learning can be done by utilizing learning media applications, one of which is Google Classroom, where this application can be a solution in carrying out the teaching and learning process online. This application can be used in terms of interactions between lecturers and students or vice versa, where the use of this application can be used for assigning assignments to assessments.

Refferences

- Abrahams, I., & Millar, R. (2008). Does practical work really work? A study of the effectiveness of practical work as a teaching and learning method in school science. *Int. J. Sci. Educ.*, *30*(14), 1945–1969. doi: 10.1080/09500690701749305.
- Abrahams, I., & Reiss, M. J. (2012). Practical work: Its effectiveness in primary and secondary schools in England. *J. Res. Sci. Teach.*, 49(8), 1035–1055. doi: 10.1002/tea.21036.
- Ahmad *et al.*, (2021). Student Responses During Online Learning in the Covid-19 Pandemic Period Student Responses During Online Learning in the Covid 19 Pandemic Period. *J. Phys. Conf. Ser.*, *1764*(1), 012125. doi: 10.1088/1742-6596/1764/1/012125.
- Apriyanto, M., Partini, Mardesci, H., Syahrantau, G., & Yulianti. (2021). The Role of Farmers Readiness in the Sustainable Palm Oil Industry The Role of Farmers

- Readiness in t he Sustainable Palm Oil Industry. *J. Phys. Conf. Ser.*, 1764(1), 012211. doi: 10.1088/1742-6596/1764/1/012211.
- Arpah, M., Marlina., & Apriyanto, M. (2020). Effect Of Grant Palm Oil Ash To The Growth And Production Of Two Corn Varieties (Zea Mays L) In Peatland. *Int. J. Sci. Technol. Res*, 9(4), 990–993.
- Chan, J. K. Y., & Shin, N. (2006). Students' Perspective of Practical Work in Learning Sciences Via Distance Education. *Asian Assoc. Open Univ. J.*, 2(1), 1–10. doi: 10.1108/aaouj-02-01-2006-b001.
- Fahmi, H. (2018). Aplikasi Pembelajaran Unified Modeling Language Berbasis Computer Assisted Instruction. *Query*, *5341*, 21–29.
- Fitriani., Ilyas., & Rianto, B. (2019). Sistem Pendukung Keputusan Pemberian Bantuan Hibah Kepada Kelompok Nelayan Oleh Dinas Kelautan Dan Perikanan. *J. Perangkat Lunak*, *1*(1), 1–10. doi: 10.32520/jupel.v1i1.778.
- Hardiansyah, A., Laday, R. K., & Suhaeli, M. (2019). The Design of Population Data Application Using Unified Modeling Language. *J. Online Inform.*, *3*(2), 74. doi: 10.15575/join.v3i2.227.
- Haviluddin. (2011). Memahami Penggunaan UML (Unified Modelling Language). *Memahami Pengguna. UML (Unified Model. Lang.)*, 6(1), 1–15. [Online]. Available: https://informatikamulawarman.files.wordpress.com/2011/10/01-jurnal-informatika-mulawarman-feb-2011.pdf.
- Hendini, A. () Pemodelan uml sistem informasi monitoring penjualan dan stok barang (Studi Kasus: Distro Zhezha Pontianak). *J. Khatulistiwa Inform.*, *4*(2), 107–116. doi: 10.2135/cropsci1983.0011183x002300020002x.
- Jalinus, N., Arwizet, Nabawi, R. A., & Ambiyar. (2017). Improve Learning Outcomes of Students Through Implementation of The Collaborative Project-Based Learning Model in Thermodynamics. *Proceeding 1st Int. Conf. Educ. Innov.*, 559–564.
- Koirala, K. P. (2019). Effectiveness of Practical Work on Students' Achievement in Science at Secondary Level in Gorkha District Nepal. *J. Adv. Educ. Res.*, *4*(4), 139–147. doi: 10.22606/jaer.2019.44001.
- Kurniawan, T. A. (2018). Pemodelan Use Case (UML): Evaluasi Terhadap beberapa Kesalahan dalam Praktik. *J. Teknol. Inf. dan Ilmu Komput.*, *5*(1), 77. doi: 10.25126/jtiik.201851610.
- Needham, R. (2014). The contribution of practical work to the science curriculum. *Sch. Sci. Rev.*, 95(352), 63–69.
- Nurhayati,., & Apriyanto, M. (2021). Sensory evaluation of chocolate bar products materials of dry cocoa seeds in various fermentation treatment. *Czech J. Food Sci.*, 2021.
- Ramli, M., & Apriyanto, M. (2020). Manajemen keuangan untuk meningkatkan perekonomian keluarga di masa pandemi COVID-19," *Sellodang Mayang*, vol. *6*(3), 145–152.
- Rianto, B., Lidya, L., & Nurcahyo, G. (2016). Pemodelan Arsitektur Enterprise Menggunakan TOGAF ADM Studi Kasus Dinas Kesehatan Kabupaten Indragiri Hilir. *J. Komput. Terap.*, 2(1), 55–68.

- Rianto, B. (2017). Sistem pengambilan keputusan pemilihan sepeda motor menggunakan metode analytical hierarchy process (AHP). *J. Tek. Ind. UNISI*, *1*(1), 29–34.
- Rianto, A. B. (2019). Sistem cerdas mendeteksi kualitas gula merah menggunakan metode nearest mean classifier (NMC). *Selodang Mayang*, *5*(3), 149–156.
- Rianto, B. (2019). Wesite penyedian informasi rumah kos kab.inhil. *JUTI-UNISI* (*Jurnal Tenik Industri UNISI*), 3(1), 35–42.
- Rianto, B., Irfan, D., Syah, N., & Anwar, S. (2020). Development Of Interactive Multimedia Interactive Information Technology Learning Applications. *Solid State Technol.*, 63(5), 4172–4177.
- Rianto, B., & Yunita, F. (2020). Perkebunan Kelapa (Studi Kasus: Parit 7 Sungai Raya Kecamatan Batang Tuaka Kabupaten Indragiri Hilir). *J. Intra Tech*, 4(1), 1–6.
- Rianto, R. B., Yunita, F., & Amin, M. (2021). Information systems of official trips at general election commission office (KPU)) indragiri hilir regency. *J. Teknol. Inf. dan Pendidik.*, *14*(369), 1–9.
- Sari, I. P. (2017). Implementasi Pembelajaran Berbasis E-Learning Menggunakan Claroline. *Res. Dev. J. Educ.*, 4(1), 75–87. doi: 10.30998/rdje.v4i1.2070.
- Sani, S. S. (2014). Teachers' Purposes and Practices in Implementing Practical Work at The Lower Secondary School Level. in *Procedia Social and Behavioral Sciences*, 116, 1016 1020.
- Sonata, F. (2019). Pemanfaatan UML (Unified Modeling Language) Dalam Perancangan Sistem Informasi E-Commerce Jenis Customer-To-Customer. *J. Komunika J. Komunikasi, Media dan Inform.*, 8(1), 22. doi: 10.31504/komunika.v8i1.1832.
- Suhery, S., Putra, T. J., & Jasmalinda, J. (2020). Sosialisasi Penggunaan Aplikasi Zoom Meeting Dan Google Classroom Pada Guru Di Sdn 17 Mata Air Padang Selatan. *J. Inov. Penelit.*, *1*(3), 129–132. doi: 10.47492/jip.v1i3.90.
- Widiyanto, W. W. (2018). Analisa Metodologi Pengembangan Sistem Dengan Perbandingan Model Perangkat Lunak Sistem Informasi Kepegawaian Menggunakan Waterfall Development Model, Model Prototype, Dan Model Rapid Application Development (Rad). *J. Inf. Politek. Indonusa Surakarta ISSN*, 4(1), 34–40. [Online]. Available: http://www.informa.poltekindonusa.ac.id/index.php/informa/article/view/34.
- Yunita, F., &. Rianto, B. (2018). Aplikasi Susun Gambar Pada TK Pertiwi Tembilahan. *J. Technopreneursh. Inf. Syst.*, *I*(1), 39–43. doi: 10.36085/jtis.v1i2.29.