INTERNATIONAL JOURNAL OF ACADEMIC RESEARCH IN PROGRESSIVE EDUCATION & DEVELOPMENT

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ISSN: 2226-6348

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To Link this Article: http://dx.doi.org/10.6007/IJARPED/v10-i2/9675 DOI:10.6007/IJARPED/v10-i2/9675

Received: *18 February 2021,* ***Revised:*** *20 March 2021,* ***Accepted:*** *17 April 2021*

Published Online: 30 *April 2021*

In-Text Citation: (Quah & Wan Ibrahim, 2021)

To Cite this Article: Quah, W. B., & Wan Ibrahim, W. Z. (2021). Integrated Google Classroom in Implementing Food and Beverage Service (F&B) E-Learning: Readiness and Effectiveness. *International Journal of Academic Research in Progressive Education and Development*, *10*(2), 288–299.

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Vol. 10(2) 2021, Pg. 288 - 299

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Integrated Google Classroom in Implementing Food and Beverage Service (F&B) E-Learning: Readiness and Effectiveness

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Abstract
This descriptive study aims to identify the level of readiness of Food and Beverages Service (F&B) students on the implementation of e-learning using Google Classroom and the effectiveness of the implementation of e-learning using Google Classroom in F&B classes. In addition, this study also aims to identify differences in the level of readiness and effectiveness among F&B students of semester 1 & 2. A set of questionnaires was used to collect study data. The respondents of the study were a total of 42 students. The findings show that the level of readiness and effectiveness of the implementation of e-learning using Google Classroom is at a high level of M = 3.90 and M = 3.89. The findings of the t-test found that there is no significant difference in the level of readiness and effectiveness among F&B students in semester 1 & 2. In conclusion, students F&B in Sungai Petani Community College are ready for the implementation of e-learning. With the combination of both e-learning and face to face class, students will be more interested in F&B learning in the classroom plus materials/activities in the Google classroom. This supported by the current findings which shows that the effectiveness of the implementation of e-learning by using Google Classroom in F&B classrooms are at high level. The strategy that will be used to strengthen the implementation of the use of Google Classroom in F&B classes in the future is to use the method of live demonstration with students. Future research is suggest that, researchers can do analysis on the effectiveness of use live demonstration which integrated into the Google Classroom for F&B students.
Keywords: Google Classroom, Readiness, Effectiveness, Food & Beverage Service (F&B), E-learning.

Introduction

In early 2020, the whole world was shocked by an infectious disease namely a new human coronavirus outbreak-severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2). This new virus and disease are the most recently discovered coronavirus and the World Health

Organization (WHO) has declared the outbreak a pandemic until the outbreak began in Wuhan, China in December 2019 (Persekutuan Farmaseutikal Antarabangsa, 2020).

This pandemic experienced by the whole world has caused all sectors to be severely affected. One of the sectors that received a major impact from the COVID-19 pandemic was the education sector. Sungai Petani Community College (KKSP) under the administration of the Ministry of Higher Education (KPT) was ordered to close with effect from the Movement Control Order (PKP) under the direction of the National Security Council (MKN). With the closure, all education sectors have taken an approach to continuing teaching and learning (T&L), but T&L must be continued online using existing applications.

Among the video teleconferencing applications that are ready for use are such as Zoom, Jitzi, Google Meet and Webex applications. Users only need to download the application on a smart phone or desktop computer. Meanwhile, the applications that are often used for the purpose of assessment and uploading teaching materials are Google Classroom and Edmodo. For applications such as Kahoot, Quizziz Quizlet, Quizalize, Plickers and even Edpuzzle are suitable for online assessment. In conclusion, the teaching staffs can choose the type of application which is more suitable according to the structuring of T&L in accordance with the facilities provided by the institution.

Problem Statement

In today's era of education, technology plays an important role in launching T&L in the classroom. When the world was shocked by the COVID-19 pandemic, face-to-face T&L in the classroom continued to change to online T&L. Sungai Petani Community College is also affected by this situation, in fact Google Classroom is an online application chosen by KKSP lecturers in implementing the curriculum syllabus for the June 2020 semester. This is because KKSP e-learning unit has introduced Google Classroom to lecturers to implement the e-learning during this semester. Therefore, a study needs to be conducted to determine the extent of students' readiness to use the Google Classroom application during this pandemic and the effectiveness of its implementation in the classroom for the Food and Beverages Service (F&B) module.

Research Objectives

i. To identify the level of readiness of Food and Beverages Service (F&B) students towards the implementation of e-learning by using Google Classroom
ii. To identify the effectiveness of e-learning implementation using Google Classroom in Food and Beverages Service (F&B) classrooms.
iii. To identify whether there are differences in the level of readiness and effectiveness among Food and Beverages Service (F&B) students in semester 1 & 2.

Literature Review

Google Classroom

Facing the challenges of the new millennium in the world of education is the use of appropriate technology in carrying out T&L that has been planned according to the curriculum syllabus. During home learning, there are several methods in carrying out the learning process. There are many online application options offered to educators to carry out the T&L process.

Among the applications are Kahoot, Edmodo, Quizziz, Quizlet, Zoom, WhatsApp and many more. One of the most popular learning platforms right now is Google Classroom. According to Gunawan and Sunarman (2018), Google Classroom (or in Malay language, namely bilik darjah Google) is a learning platform that can be reserved for any scope of education that aims to help find a way out of the difficulties experienced in creating a paperless assignment. This software has been introduced as part of Google Apps for Education (GAFE) since August 12, 2014. Through this application facilitates teachers and students to carry out the learning process in more depth. This is because both teachers and students are able to collect assignments, distribute assignments, and grade assignments without being tied to lesson time limits.

According to Okmawati (2020), the Google Classroom platform can be one of the solutions to complete the teaching-learning process while the school is still not open. Google Classrooms prepares students to be independent, engaged and motivated as most young students tend to use technology in their daily lives. It is also successful in the teaching-learning process of the digital age as in the 4.0 industry revolution which must be possessed by teachers of expertise, the ability to adapt to new technologies and global challenges. Google Classroom is a free collaboration tool for teachers and students. Next, teachers can create classes online, invite students to class then create and distribute assignments. Students and teachers in the Google Classroom can discuss assignments and teachers can track the progress of student assignments. In addition, Google Classroom is also used to facilitate interaction between principals or teachers with students or students in cyberspace.

E-learning

In the era of information and communication technology, e-learning has become a popular term and has various interpretations and perceptions. However, in general, e-learning can be defined as a learning process that uses electronic systems or components to diversify the use of technology to improve the accessibility and effectiveness of learning. Basically, this learning involves the use of computers, electronic devices and teaching materials through online. According to Mat Yusof and Hasan (2019), e-learning is a term that is quite popular in the era of information and communication technology and it has various interpretations and perceptions. Generally, learning refers to a program of learning, training or education channeled through electronic components or systems. Usually e-learning involves the use of computers or electronic hardware. E-learning is a way to diversify the use of technology to improve accessibility and learning effectiveness. This may include CD-ROM packages channeled through “online” and other aspects of learning involving electronics and systems.

Cheara and Nor (2020) stated that e-Learning has become part of the learning medium in Higher Education Institutions (IPT) today. It is able to speed up the teaching and learning process more effectively. The adoption of e-learning is not only to convert traditional modules, program and classroom costs into top online versions, but also the use of e-learning technology can contribute to a flexible teaching and learning environment. This e-learning directly enables a sophisticated learning process to be implemented regardless of the distance and number of members browsing. Through e-learning, students can practice continuous learning while being able to convey knowledge more effectively because it contains interesting text, animation, graphics, audio and video. In addition, facilities for online discussions and professional assistance

for content are also provided as a more structured and integrated approach to education, training and information.

Students' Readiness for e-learning

Education with the concept of e-learning has started as early as the 90s. E-learning is an alternative education globally. When the Covid-19 pandemic began in early 2020, e-learning became the primary choice of all educators in conducting T&L. Several studies that have been conducted by researchers such as Aljaser (2019); Onyema et al (2020) found that e-learning methods can be associated with improved academic performance among students. The success of online learning also depends on the readiness of the students themselves. The success of a student in following various learning styles, he must show self -qualities such as high determination and continuous effort to achieve success. Failure to demonstrate this quality, then students will face problems to progress because it has very high challenges (Amiruddin et al., 2020).

According to Baharuddin and Badusah (2015), knowledge and skills aspects are important aspects in ensuring the effectiveness of the implementation of innovation in learning. The approach to implementing T&L through online platforms such as Google Classroom is a state -of -the -art and user -friendly method for lecturers and students. Aspects of knowledge need to be enhanced by lecturers through continuous learning and continuous application strengthens skills.

Module Food and Beverages Service (F&B)

Food and Beverage Service is a module taught to semester 1 and 2 students who take the Hotel Operation Certificate Program at Sungai Petani Community College. Food and Beverage Service can be broadly defined as the process of preparation, delivery and provision of food and beverages to customers who visit the premises to take advantage of food services. Among the main topics taught in the F&B module are American Service, French Service, Russian Service, Hot and Cold Beverage and Banquet Service. All the main topics taught to students are practical concept. For the topic of American Service, for example, students need to master several skills such as laying tablecloth, napkin folding, wiping techniques, table setting and service sequences. All skills for the American Service topic need to be demonstrated first to students by the module lecturer before students do practical in class. Next, to strengthen the T&L process, students need to do regular practical training to master a skill taught. For the F&B module, 6 hours of class are allocated per week.

The Use of Google Classroom in Food and Beverages Service (F&B) classrooms

Figure 1 is a screenshot of the use of Google Classroom for the F&B class. For each sub-topic in the F&B, the lecturer will upload relevant notes to make it easier for students to understand the topic. Lecturers can also upload the video to ensure that students watch and understand the topic before entering the practical class. By using Google Classroom, lecturers can also upload assignments here and students are also asked to submit assignments here as well.

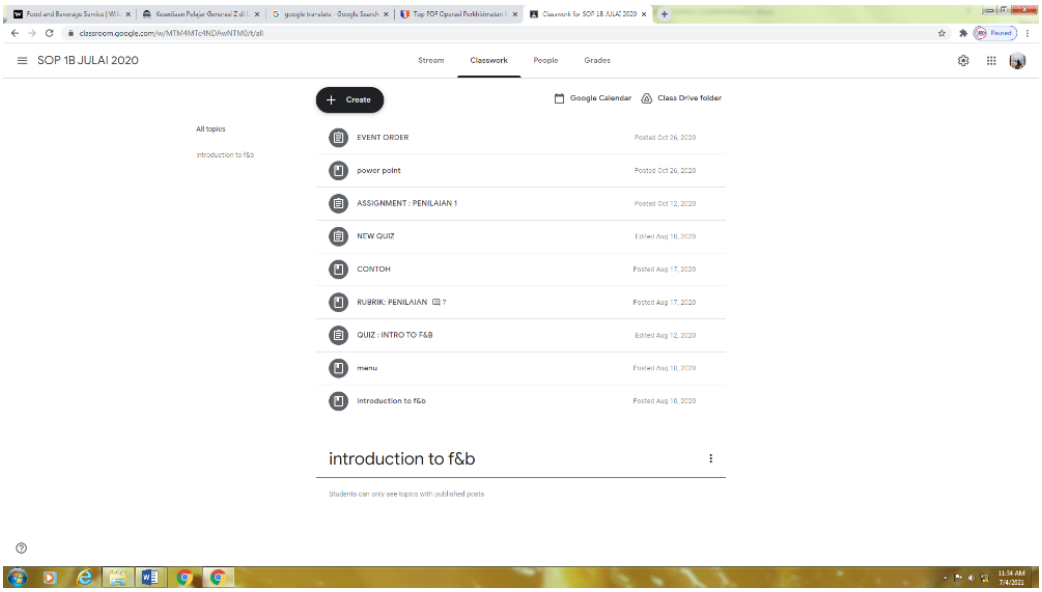

Fig. 1 Google Classroom Screen Display for F&B Subjects

Figure 2 is a screen display in Google Classroom after students submit assignments and answer quizzes. Lecturers can review assignments, informing students directly through this platform. In addition, lecturers can also check the quiz answers answered by students through this platform. With the use of Google Classroom, students can save printing costs and time for assignment submission and lecturers can save storage space for printing assignments.

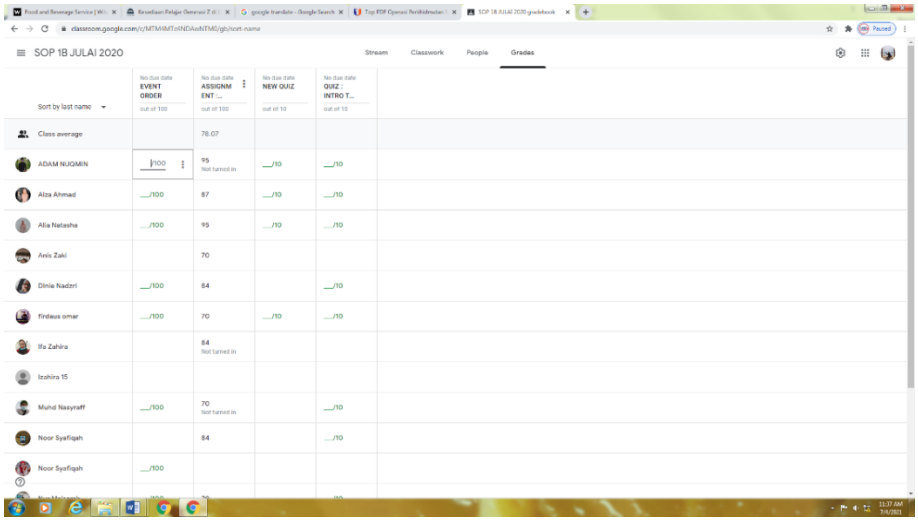

Fig. 2 Students Submit Assignments and Answer Quizzes in the Google Classroom

Methodology

This study is quantitative in nature using a questionnaire instrument adapted and modified from Amiruddin et al. (2020). The study population involved 42 Food and Beverage Service students in semester 1 and 2 at Sungai Petani Community College. The questionnaire is divided into 3 parts, namely part A (Demographics: Gender, age and semester of study) part B

(Level of readiness of F&B students on the implementation of e-learning using Google Classroom) and part C (Effectiveness of e-learning implementation using Google Classroom) such as which is shown in table 1. While the level scale is interpreted based on the mean score value as in table 2.

Table 1. Instruments

Section	Descriptions
Section A	Demographic background of the respondents.
Section B	Readiness of F&B students towards the implementation of e-learning using Google Classroom
Section C	Effectiveness of e-learning implementation using Google Classroom The answer choices are on a Likert scale from 1-5, namely: (1) Strongly Disagree, (2) Disagree, (3) Not Sure, (4) Agree, (5) Strongly Agree.

Table 2. Level Scale Based On Mean Score Value

Score mean	Level
1.00-2.33	Low
2.34-3.67	Moderate
3.68-5.00	High

The focus of this study is to draw conclusions on the level of readiness of F&B students in the use of e-learning Google Classroom through the mean score value obtained from each item and the overall mean score. Distribute questionnaires to respondents using Google Form and analyze data using descriptive and inferential analysis.

Findings

The findings of the study were obtained through IBM SPSS analysis of descriptive statistics on the respondent data collected from 42 respondents. The details of the study are as shown in tables 3, 4 and 5. Table 3 shows the findings of part A which is related to the demographics of the respondents consisting of gender, age and semester.

A total of 42 students were respondents to this questionnaire, consisting of 11 males (26.2%) and 31 females (73.8%). The students are comprised of 26 students (61.9%) in semester 1 and 16 students (38.1%) in semester 2 who took the Food and Beverage Service module at Sungai Petani Community College.

As a result of the analysis of demographic data, it was found that female students were more respondents than male students. This is due to the registration of students every year at KKSP, the majority of whom are female students for the Hospitality Operations Program. Data on the distribution of the nation showed a total of 34 students are Malays (81%) and a total of 8 students of Indian (19%) for both semesters. Respondents for this questionnaire were aged between 18 - 23 years.

Table 3. Gender, Age and Semester of Study

Demographics	Item	n	Percentage (%)
Gender	Male	11	26.2
	Female	31	73.8
Race	Malay	34	81
	Indian	8	19
Age	18	2	4.8
	19	18	42.9
	20	17	40.5
	21	4	9.5
	23	1	2.4
Semester	Semester 1	26	61.9
	Semester 2	16	38.1

Research question 1: What is the level of readiness of F&B students towards the implementation of e-learning using Google Classroom?

The mean score value for the first item, B1 is at a moderate level of 3.55, which explains that respondents do not like to learn F&B on the Google Classroom platform alone. The mean score of B1 is at a moderate level because the Food and Beverage Service module is a module with a 90% practical concept.

While the mean score values for B2, B3, B4 and B5 are at a high level, namely B2 (M = 3.90), B3 (M = 4.12), B4 (M = 4.12) and B5 (M = 4.07). These four items indicate that respondents are at a high level when it comes to improving skills, uploading assignments and being comfortable asking questions to lecturers through the chat room in Google Classroom.

Based on the findings of part B, it is found that the level of readiness of students when involving e-learning using Google Classroom for F&B module is high as shown by the overall mean score value, which is 3.90. Thus, it can be concluded that F&B students are ready to accept the implementation of e-learning by using Google Classroom for F&B modules.

Table 4. F&B students' Readiness towards the Implementation of E-Learning Using Google Classroom

No	Item	Mean	SD	Level
B1	Love learning F&B in the Google Classroom.	3.55	.968	Moderate
B2	Interested in improving skills through Google Classroom	3.90	1.165	High
B3	**Conveniently uploading F&B assignments in Google Classroom**	**4.12**	**.861**	**High**
B4	Feel free to ask questions to F&B lecturers through the chat room in Google Classroom.	3.86	1.117	High
B5	No problem in typing F&B assignments provided in Google Classroom.	4.07	.677	High
	Total Mean	**3.90**	**.751**	High

Research question 2: What is the level of effectiveness of the implementation of e-learning using Google Classroom in F&B classrooms?

The results show that the mean score value for C3 is at a moderate level of 3.64. In addition, the mean score values for items C1, C2, C4, and C5 were at a high level. C1 (M = 4.12), C2 (M = 4.00), C4 (M = 3.71) and C5 (M = 3.98). Meanwhile, the overall mean score value of 3.89 is at a high level. The findings obtained, clearly show that students are very enthusiastic and ready to explore the latest approach to teaching and learning, which is a combination of face-to-face learning and online learning.

Table 5. Effectiveness of the Implementation of E-Learning Using Google Classroom in F&B Classrooms

No	Item	Min	Sisihan Piawai	Tahap
C1	**I am more interested in F&B learning in the classroom plus materials/activities in the Google classroom.**	**4.12**	**.861**	**High**
C2	I easily download F&B learning materials in Google Classroom for use in the classroom.	4.00	.883	High
C3	The Google Classroom application helped increase my interest in F&B.	3.64	.932	Moderate
C4	Assignments, reinforcement exercises and F&B exam are easier to perform in the Google Classroom.	3.71	.864	High
C5	I believe combined learning in the classroom and Google Classroom is more interesting and efficient.	3.98	.950	High
	Toral Mean	**3.89**	**.726**	High

Research question 3: Are there differences in the level of readiness and effectiveness among F&B students in semester 1 & 2?

Based on table 6, it is found that there is no significant difference in the level of readiness of F&B students in semester 1 & 2 on the implementation of e-learning by using Google Classroom (t = 0.591; p> 0.05). The level of readiness of F&B students for semester 1 (mean = 3.78) was similar to the level of readiness of F&B students for semester 2 (mean = 4.08).

Table 6. Level of Readiness of F&B Students for The Implementation of E-Learning Using Google Classroom By Semester

Semester	Number	Mean	Standard Deviation	t-value	Significance Level
Semester 1	26	3.78	.819	.591	.208
Semester 2	16	4.08	.602		

Based on table 7, it is found that there is no significant difference in the level of effectiveness of e-learning implementation using google classroom in f&b classes semester 1 & 2 (t = 0.894; p> 0.05). The level of effectiveness of e-learning implementation using google classroom in f&b class semester 1 (mean = 3.95) is similar to the effectiveness of e-learning implementation using google classroom in f&b class semester 2 (mean = 3.78).

Table 7. Level of Effectiveness of F&B Students for The Implementation of E-Learning Using Google Classroom by Semester

Semester	Number	Mean	Standard Deviation	t-value	Significance Level
Semester 1	26	3.95	.776	.894	.478
Semester 2	16	3.78	.646		

Discussion

The results of the study found that 4 items were at a high frequency level that exceeded the mean score of 3.55. This shows that the majority of students are ready for e-learning at KKSP with an overall mean of 3.90. The highest mean was item 3 - I was comfortable uploading F&B assignments in Google Classroom. This is because this platform is easy to use for uploading assignments for students. Students no longer need to print assignments to submit. While only 1 item was found to be below the mean of 3.56 and categorized at a moderate level that is item 1 (M = 3.55). This item is - I love learning F&B in Google Classroom. One of the possible reasons is that students do not like to learn F&B through Google Classroom because this module involves 90% practical. Students prefer if F&B classes are taught face-to-face while assignments, quizzes and notes can be uploaded using the Google Classroom platform.

The results of the next study show the effectiveness of the implementation of e-learning by using Google Classroom in F&B classrooms. The results found that 4 items were at a high frequency level that exceeded the mean score of 3.64. This indicates the overall mean for

effectiveness is 3.89. The highest mean is item 1 - I am more interested in F&B learning in the classroom plus materials/activities in the Google classroom. This is because F&B classes require a lot of practical/practical training, as far as just watching videos, students may have trouble learning F&B skills. While only 1 item was found to be below the mean of 3.64 and categorized at a moderate level that is item 3 (M = 3.64). This item is - the Google Classroom app helped increase my interest in F&B. This is because the lecturer is using the Google Classroom application for the first time and there are many more things that the lecturer needs to learn to provide teaching and learning material in the Google Classroom platform more interestingly.

The results of the third study showed that there was no significant difference in the level of readiness of F&B students in semester 1 & 2 on the implementation of e-learning by using Google Classroom. This is because students from both semesters are the first to use the Google Classroom platform in the F&B module. The level of readiness of F&B students from both semesters was the same towards the implementation of e-learning using Google Classroom. Meanwhile, for the effectiveness of the implementation of e-learning by using Google Classroom in F&B classes by semester. The results also show that there is no significant difference in the level of effectiveness of e-learning implementation using Google Classroom in F&B classes semester 1 & 2. This means that combined learning in the classroom and Google Classroom is more interesting and efficient and students are more interested in F&B learning in classes are added with materials/activities in the Google classroom.

Conclusion

Through the results of the study conducted on respondents who took the F&B module, it can be concluded that students F&B in Sungai Petani Community College are ready for the implementation of e-learning. With the combination of both e-learning and face to face class, students will be more interested in F&B learning in the classroom plus materials/activities in the Google classroom. This supported by the current findings which shows that the effectiveness of the implementation of e-learning by using Google Classroom in F&B classrooms are at high level.

The strategy that will be used to strengthen the implementation of the use of Google Classroom in F&B classes in the future is to use the method of live demonstration with students. This live demonstration will be conducted using Google Meet link which integrated into the Google Classroom for facilitate of teaching and learning methods. By using this method, the lecturer can 'zoom' on the subject or procedures that lecturers wants to give more emphasis and understanding to the students. In this live demonstration, students and lecturers can interact directly if there is anything that the students do not understand. In addition, students can do self-reflection after the demonstration session. To test students' understanding of the subject demonstrated, the lecturer will run a quiz that is uploaded in the Google Classroom. Future research is suggest that, researchers can do analysis on the effectiveness of use live demonstration which integrated into the Google Classroom for F&B students.

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