A Small-Scale Study on Students' Attitudes towards Online English Learning in the Context of COVID-19 in Cambodia

ភវិយាបថនិស្សិតកសាកលវទ្យាល័យចំពោះការរៀនភាសាអង់គ្លេស តាមអនឡាញក្នុងបរិបទកូវីដ-១៩ក្នុងប្រទេសកម្ពុជា

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ABSTRACT

This study was conducted on 255 Cambodian university students to find out the students' attitudes towards online English learning in the context of COVID-19 in Cambodia. The study employed quantitative research methodology with survey method using a 25 Likert-scale survey questionnaire. The questionnaire focused on five constructs of online English learning: effectiveness, autonomy, open-mindedness, interaction, and anxiety. This study had three objectives: (i) to study the students' attitudes towards online English learning, (ii) to compare the students' attitudes towards online English learning in relation to gender, location and type of university, and (iii) to study the relationship between the students' attitudes towards online English learning with respect to the five constructs. The results showed that the students' attitudes towards effectiveness, autonomy, open-mindedness, interaction of online English learning were high while their attitudes in term of anxiety of online English learning were at medium level. Moreover, the relationship between the students' attitudes with respect to the five constructs ranged from weak to moderate. Furthermore, the students' attitudes with regards to some constructs of online English learning were found to have significantly different in relation to gender, university location and types of universities.

សង្ខិត្តន័យ

ការសិក្សានេះបានធ្វើឡើងជាមួយនិស្សិតសកលវិទ្យាល័យនៅកម្ពុជាចំនួន២៥៥នាក់ ក្នុងគោលបំណងស្វែងយល់អំពីឥរិយាបថ របស់ពួកគេចំពោះការរៀនភាសាអង់គ្លេសតាមអនឡាញ ក្នុងបរិបទនៃការវិវឌ្ឍលដោយដ៏ជំងឺកូវីដ-១៩។ ការសិក្សានេះប្រើប្រាស់ វិធីសាស្រ្តស្រាវជ្រាវបរិមាណវិស័យជាមួយវិធីស្រាវជ្រាវបែបស្ទង់មតិ តាមរយៈកម្រងសំណួរដែលមានចំនួន ២៥សំណួរ។ កម្រង សំណួរស្ទង់មតិផ្តោតទៅលើបញ្ញត្តិទ្រឹស្ដីប្រាំអំពីការរៀនភាសាអង់គ្លេសតាមអនឡាញ ដែលរួមមាន ប្រសិទ្ធភាព ស្វ័យភាព ការបើកចិត្តទូលាយ អន្តរកម្ម និងការថប់បារម្ភ។ ការសិក្សានេះមានវត្ថុបំណងស្រាវជ្រាវចំនួនបីគឺៈ ទីមួយ សិក្សាអំពីឥរិយាបថ របស់និស្សិតចំពោះការរៀនភាសាអង់គ្លេសតាមអនឡាញ, ទីពីរ ប្រៀបធៀបឥរិយាបថរបស់និស្សិតអំពីការរៀនតាមអនឡាញ ដោយផ្អែកទៅលើកត្តាភេទ ទីតាំងនិងប្រភេទសកលវិទ្យាល័យដែលពួកគេកំពុងសិក្សា, និង ទីបី សិក្សាអំពីទំនាក់ទំនងរវាង បញ្ញត្តិទ្រឹស្ដីទាំងប្រាំនៃឥរិយាបថរបស់និស្សិតទៅលើការរៀនភាសាអង់គ្លេសតាមអនឡាញ។ លទ្ធផលស្រាវជ្រាវបានបង្ហាញថា ឥរិយាបថរបស់និស្សិតមានកម្រិតខ្ពស់ទៅលើប្រសិទ្ធភាព, ស្វ័យភាព, ការបើកចិត្តទូលាយ និងអន្តរកម្ម នៃការរៀនភាសា អង់គ្លេសតាមអនឡាញ។ ជាមួយគ្នានេះ ឥរិយាបថរបស់ពួកគេទៅលើការថប់បារម្ភដែលកើតមានពីការរៀនតាមអនឡាញមាន ត្រឹមកម្រិតមធ្យមប៉ុណ្ណោះ។ ឥរិយាបថរបស់និស្សិតទៅលើបញ្ញត្តិទ្រឹស្ដីនៃនៃការរៀនតាមអនឡាញ ក៏មានទំនាក់ទំនងខ្លាំងនឹង គ្នាក្នុងកម្រិតខ្សោយទៅខ្លាំងផងដែរ។ ការសិក្សាក៏បានបង្ហាញផងដែរថា ឥរិយាបថរបស់និស្សិតទៅលើបញ្ញត្តិទ្រឹស្ដីមួយចំនួននៃ ការរៀនភាសាអង់គ្លេសតាមអនឡាញ ក៏មានភាពខុសគ្នាអាស្រ័យទៅលើកត្តាភេទ ទីតាំងនិងប្រភេទសកលវិទ្យាល័យផងដែរ។

ពាក្យគន្លឹះ: ការរៀនភាសាអង់គ្លេសតាមអនឡាញ, ឥរិយាបថ, ប្រសិទ្ធភាព, ស្វ័យតភាព, ការបើកចិត្តទូលាយ, អន្តរកម្ម, ការថប់បារម្ភ

1. INTRODUCTION

When COVID-19 attacked the whole world including Cambodia, its negative impacts threatened Cambodia's education, in which most of the higher education institutions shifted from the traditional teaching and learning in the classroom to online teaching and learning. This online method became an alternative to further the educational process when the classrooms were closed because of the widespread COVID-19 pandemic (Chet et al., 2022).

For Cambodia, to respond the spread of this COVID-19, the Ministry of Education, Youth, and Sports (MOEYS) announced the closure of all the 124 public and private universities on 16 March 2020 and quickly shifted to online learning and distance learning after decades of only providing educational services in the traditional university classrooms by the MOEYS. Thus, when the educational institutions were ordered to close immediately, the shortages of infrastructure and learning resources appeared to be a challenge for most HEIs in Cambodia. In response to this challenge, the HEIs made a decision to use open forums such as Facebook Messenger, Telegram, Zoom, and Google Classroom to support the ongoing process of students' learning (Chet & Sok, 2020). Having followed the measures of social distancing and not allowing physical learning in universities, Agasisti & Soncin (2021) raised that only online learning and blending learning were the options to further the educational sector.

As evident, COVID-19 crisis made various stakeholders in Cambodian education face unlimited and unexpected tension and increasingly show their mental health and emotion. In addition, COVID-19 added more pressure on the implementation of Educational Strategic Plan 2019-2023 to increase the enrolment in higher education institutions among the population whose age ranged from 18 to 22. Hence, to help divide the best methods in the efforts of restoration and response to the spread of COVID-19 pandemic in order to help promote quality of distance learning during the emergency, Ministry of Education, Youth, and Sports (MOEYS) and Education Sector Working Group (ESWG) made a decision to use a comprehensive and coordinated assessment in education. Obviously, in July 2020, MOEYS set up a Cambodia Education Response Plan

to COVID-19 Pandemic to ensure effective implementation of the Educational Strategic Plan 2019-2023 and aimed to respond to educational crisis responsibly, effectively, and efficiently: (1) staff and students could go on distance teaching and learning safely, (2) students and educational staff could go back to educational institutions safely, (3) staff and students could teach and learn in the coordinated learning environment, and (4) the national and sub-national system of MOEYS could be resilient (MOEYS, 2020).

Besides responding to COVID-19, MOEYS (2020) also made a response to Cambodia Vision 2030 and Sustainable Development Goal 2030 by setting up "Cambodia's Educational Roadmap 2030" which set the vision for Cambodia's educational system 2030 to become a system with strong and competitive capacity for knowledge-based society in the region (MOEYS, 2019) as well as set the 2030 vision: schools became institutions which ensure high quality education for all, teachers have capabilities, gain motivation and receive sufficient support to facilitate students to obtain high quality education, classrooms become modern ones which can provide students best opportunities for learning, and students get good health, have motivation and commitment and be Cambodia's future ones (MOEYS, 2022).

Certainly, COVID-19 has caused the surge of online learning; however, the term "online learning" has occurred for so many years. Online learning, electronic learning, distance learning, or distance education is getting knowledge and skills through the information and instruction coordinated by all technology utilization and various distance learning forms (King et al., 2001).

According to Bušelić (2017), distance learning is defined as an educational sector which emphasized on pedagogical methods accompanied by technology which aimed to provide education to students who could not attend the direct classrooms. Moreover, emergency remote teaching (ERT) is an online teaching which is mandatory, temporary, and unplanned to keep educational sustainability. Hence, the shift to such a way has caused strong impacts on students and teacher's lives in the educational context, including language education (Hodges et al., 2020).

Like other subjects, language learning also needed online teaching and learning, and it became prominent during the spread of COVID-19. However, there have not been so many published studies before the existence of COVID-19, particularly the studies which are directly related to the students' attitudes towards online language learning or language learning during this pandemic. Even though the online platform has helped to go on the process of teaching and learning, effectiveness and impacts of this platform have become to be the key points in the research agenda of the HEIs around the world between 2020 and 2022 (Chet et al., 2022).

Regarding language learning, for many decades there have been a lot of studies which link the development of the second language with motivation and attitude (Al-Tamimi & Shuib, 2009; Boo et al., 2015; Chalak & Kassaian, 2010). In addition, there have been numerous studies which show that the high level of motivation and positive attitudes was related to the improvement of language learning (Kormos & Csizér, 2008; Masgoret & Gardner, 2003). However, some studies also showed the relationship between anxiety and language achievement at a low level as well (Teimouri et al., 2019).

Related to attitude studies, attitudes had a lot of related variables and had strong differences, including pedagogy, teaching materials, environment, lesson contents, and other factors. In addition, both definitions and operationalization of the attitude-related key constructs were also strongly different in various studies (Pusey & Nanni, 2022). Moreover, some researchers took different stances on attitudes of learners such as Dörnyei & Taguchi (2010) claimed that attitudes were hard to change, while Gardner & Tremblay (1994) stated that attitudes were easily changeable.

1.1. Overview about Students' Attitudes

Learning English as a second language involves several factors, including psychological attributes (attitude, aptitude, intelligence, anxiety, and motivation) (Hashemifardnia et al., 2021; Haidara, 2016). Among those, attitude is a psychological factor which affects L2 learning, and a positive attitude towards L2 learning is facilitative while a negative one towards L2 learning is a hindrance. Moreover, L2 learners' attitude is defined as a collection of feeling

considering language use and its status in the community (Knouse et al. (2021).

Regarding the attitude, Mckenzie (2010) raised that a particular problem with the definitions of attitude as it might be overlapped with various concepts such as 'belief', 'opinion', 'value', 'habit', 'trait', 'motive', and 'ideology' in social psychology. In general, attitude research can be conducted based on two psychological approaches: the behaviorist and the mentalist view, both of which regard that individuals' attitudes are not born with but are learned.

Based on Garrett (2007), attitude can be as a psychological construct and a mental construct. As a psychological construct, attitudes can be cognitive (beliefs and stereotypes), affective (evaluations), and behavioural. As a mental construct, respondents' attitudes are not really certain to be represented by research data, so three research approaches are vital such as societal treatment approach, direct approach, and indirect approach.

Concerning language attitude assessment, Chengchen Li & Li Wei (2022) also raised that there is a variety of methods, and among those, Likert scales, due to their convenience and accessibility to participants, are popularly used in language attitude research.

Moreover, student language learning attitude might be explained in a four-step formation: cognitive process (students' perception and development of a concept of language and the language class); affective process (students' development of such feelings as excitement, happiness, confidence, adequacy, boredom, frustration, anger, and inadequacy); evaluation of these feelings; and translations into certain behaviors of those evaluations (Smith 1971, as cited in Chengchen Li & Li Wei (2022).

According to Jiang et al. (2022), when it comes to L2 learning, l2 learners' levels of proficiency can be indirectly affected by the attitude. In their study on Iranian EFL learners' motivation, anxiety, and attitudes during the COVID-19 pandemic, the results revealed that online learning had positive impacts on the participants' motivation, anxiety, and attitudes. Moreover, their motivation rose, their anxiety declined, and their positive attitudes were formed towards L2 learning because of the online learning.

Regarding the definition of anxiety Amin et al. (2022) defined that feeling anxious occurred when one faced such life events as participating in an interview, taking an exam, or suffering from a disease. Moreover, this study, focusing on knowledge, anxiety, and preventive behaviour against Omicron among junior high school students in Egypt, found out that more than half of the students had poor knowledge and low preventive behaviour towards Omicron and showed a high level of Omicron-related anxiety.

In a study by Ushida (2005), focusing on students' change of attitude motivation based on the duration of online courses of French and Spanish, students were found out to have high anxiety at the start of the online language course; however, they still kept positive towards online learning and had motivation for the whole course. In addition, a source of the students' anxiety was due to not being familiar with online forums, and teachers had the roles to maintain students' positive attitude and motivation.

Regarding the utilization of technology in Cambodian higher education during COVID-19, Sol (2021) raised critical challenges such as the lack of digital infrastructure and learning resources, accessibility issues, and limited digital literacy, as well as the experience of faculty members and students. In addition, he brought up some priorities for Cambodian higher education to address those challenges by improving infrastructure and learning resources, digitalizing the delivery approach, providing regular development and training for faculty members, and promoting diverse collaboration and partnerships.

Furthermore, some students dropped out and even rejected using computers as language learning tools in the blended learning program because they still preferred reading and writing on paper (Stracke, 2007).

However, in Saudia Arabia, Ta'amneh (2021), who studied about the attitudes and challenges towards virtual classes in learning English language courses, found out students' positive attitudes towards the use of online learning as they thought it was the best strategy during COVID-19 pandemic, and it could help them in their academic achievement.

In Indonesia, based on a study on how EFL learners maintain motivational factors and positive attitudes during COVID-19 by Adara & Puspahaty (2021), they found out that to keep learners' motivation and positive attitude towards language learning need both intrinsic and extrinsic motivation. Furthermore, teachers are much needed to maintain personal communication with students during COVID-19.

In another study in Indonesia by Risten & Pustika, 2021, the results showed that students had a positive attitude of using Moodle as a learning platform and revealed a positive attitude towards the importance of learning English in vocational high school.

Similar to the above study, Indriani & Widiastuti (2021) found that students demonstrated a positive attitude towards online English learning through the LMS Moodle in spite of learning through it for the first time.

Besides, in a study on Google Classroom by Moonma (2021) to determine 111 second-year Thai EFL students in 7 majors in Thailand, the result showed that students had a positive attitude towards using it and perceived it to be useful as they could submit their assignments and received class announcements well.

Regarding the flipped classroom, based on the study of Webb et al. (2014) on attitudes of students and teachers in English as a foreign language program in China towards teaching and learning in flipped classroom, he found out that this flipped classroom initially did not meet students' expectation, but they were beginning to accept this method at the end of 15-week course duration.

Furthermore, according to the study of two groups of students in Macau and in the U.S. found out that blended classroom could lead to grammatical accuracy and trust more than traditional learning, and this method enhanced student engagement. Thus, this method seemed to take ages to achieve students' acceptance (Webb & Doman, 2016).

Even though numerous learning and teaching methods have been established to go on the educational process in the context of COVID-19, students show both acceptable and unacceptable attitudes towards those methods, and a lot of studies have explored learners' faith and purposes as well as

motivation in online language learning (Lamb & Arisandy, 2020).

1.2. Advantages and Challenges of Online Learning

As a matter of fact, online learning has both advantages and disadvantages for students as well as other stakeholders. For the advantages, online learning provided a lot of benefits including unprecedented opportunities for students who faced difficulty in rural areas or low socio-economic status as they could have time for extracurricular activities, self-paced learning, student-student interaction, and preparedness for digital systems (Cheam, 2021).

Similar to the above study, Altameemy & Alreface (2021) found out that online learning was not only able to help promote self-study, but it also set up a good base for improving learning skills as students were self-motivated for learning and doing various tasks and made self-evaluation on their study. Besides, the students claimed that online learning created a spirit of awareness because they had trust related to tasks, work submission, and submission schedule. Moreover, online learning gave students a program in which they could determine their capacity to be self-reliant and to fulfil learning tasks with high confidence. Furthermore, online learning provided support to slow-learning students by providing them sufficient time to take self-paced learning steps and by going back to watch the recorded lessons after their teachers finished teaching.

Furthermore, based on the study of university students' attitude towards digital technology by Novikova et al. (2022) showed four key advantages of digital utilization in education: (1) obtaining learning materials, (2) saving time, (3) feeling convenient and comfortable in learning, and (4) speed and extent of receiving information.

In addition, based on Castillo-Cuesta et al. (2022), students' collaborative skills and open-mindedness were developed by using virtual work-spaces. Moreover, by using this way, teachers were also able to create a positive e-learning environment in which students could exchange different perspectives on various topics as well as express their mutual respect for those views.

Even though a lot of studies recording the benefits of online learning and accessibility of online teaching, students have also faced challenges in online learning such as proliferation of understanding load required by online teaching (Hollister et al., 2022; Mayer, 2017; Sweller, 2020); insufficient knowledge or inconvenience in digital utilization, shortage of social interaction and feeling of isolation faced by students during online learning (Yuan & Kim, 2014); inability in the ways of asking questions such as lack of privacy although there was a tool for allowing such a thing such as chat function in Zoom app. In addition, other challenges include decreasing opportunity for sharing own comments, shortage of teaching methods and other activities, shortage of obtaining sufficient technology (Winke & Goertler, 2008); problems for learning places and technical issues which made the most hard-working students feel confused.

Furthermore, based on the results of Chet et al. (2022), among 1,002 students who were pursuing their majors and participated in the survey, 81.4% did not request for carrying on the online learning after COVID-19, 62% claimed that online teaching negatively affected their studies, and online learning severely reduced their learning capacities.

Besides, the prolongment of COVID-19 strongly impacted higher education institutions (HEIs) such as the possibility of shutdown of some HEIs, impact on quality of teaching and learning, worsening skill gaps and educational inequality, and emotional health (Heng & Sol, 2021).

Obviously, these above-mentioned challenges reduced emotion, attitude and behaviour faced by students during COVID-19 pandemic, all of which helped provide information about operationalization of attitudes developed in the study in addition to differences and attitudes of individuals which were commonly shown to play roles in motivating students such as persistence and interest (Hidi & Harackiewicz, 2000; Hunsu et al., 2017; Major et al., 2006); and particularly motivation in learning a second language such as difference, tolerance, willingness in communication, and anxiety (Dewaele & Ip, 2013; Dörnyei & Ryan, 2015).

In fact, the above-mentioned issues were not only faced by students but also by teachers who were working in the context of distance teaching, which in turn impacted on students' experience and attitude. If concentrating on those challenges, some of the severe barriers which teachers needed to coordinate included lack of feedback to students (Lee & Pyo, 2003), common decrease of student participation (Hew & Cheung, 2014; Yoon et al., 2020), insufficient time in preparation for the change to distance teaching which was vital for teachers to obtain teaching technology successfully (Gerard et al., 2011), and increasing cognitive load for online teaching in terms of multitasking and strong focus on techniques required to provide to distance classrooms (Mayer, 2017; Sweller, 2020).

Regarding this technical issue, in the study of Coman et al. (2020) found that the disadvantages of online learning outweighed advantages in the context of COVID-19, and the technical issue was the key one followed by shortage of teachers' technical skills and teaching styles in adjusting to online learning environment as well as shortage of student interaction with teacher or poor interaction with teachers. Moreover, because of facing such techniques and internet-related issues, they also might cause bias in teachers' evaluation by using those forms and materials and might contribute to a doubtful attitude towards e-learning (Hafner et al., 2022).

In a study on Turkish teachers' attitudes towards online instruction by Civelek et at. (2021), EFL teachers did not feel capable enough of effective online instruction delivery because they did not have sufficient knowledge and skills.

Nonetheless, while both students and teachers have met the same numerous challenges, students seem to face more problems. As evident, Hartshorn & Mcmurry (2020) showed that the impacts of COVID-19 caused more stress for both students and teachers in all contexts; however, shifting to online teaching, students faced more challenges than their teachers.

Regarding the regions, based on the study of Chea et al. (2022), while developed countries obtained successful lessons in online learning and teaching in the forms of blended learning which combined between online teaching and physical classroom to help students locating in unfavourable areas, teachers in such developing countries as in Cambodia were not readily prepared when the schools were instantly closed and the education was shifted from the

traditional classrooms. In the same study, even though most teachers could have access to computers, they still preferred using smart phones for their online teaching.

Related to technology, online teaching and learning still caused other challenges even though technology enabled Cambodian university students to carry on their study through online learning during the pandemic due to shortage of experience which was partly from lecturers and partly from students in universities. As evident, according to the Network Readiness Index by Dutta & Lanvin (2019), Cambodia ranked 107 out of the surveyed 121 countries, obtaining 32.29 out of 100 scores, which showed that Cambodian lecturers and university students would face a lot of challenges in the process of online learning during the pandemic.

Regarding the university students' perception of online learning effectiveness, Em, Phann, & Khan (2022) found out that the target students had moderate perception of online learning effectiveness and showed insignificant difference in their perception in relation to gender and years of study.

Based on the investigation of all the above studies which focused on the topics of attitude towards online language learning during COVID-19 crisis with the purpose to show what can be expected in response to students' attitude towards the pandemic situation, the results showed both positively and negatively of online learning among students in all corners. The common feature of all the texts showed that every crisis could increase anxiety, decrease level of motivation, stress, reduce self-efficacy and willingness of communication, and generally have a negative attitude towards learning. Moreover, while individual differences may strongly impact language learning, the co-existence of other crises may also affect language learning as well.

1.3. Research Problem

All in all, concerning Cambodian education since the COVID-19 outbreak, a lot of local researchers have conducted their studies to find out the impacts of COVID-19, readiness for online learning and teaching, as well as perceptions of online learning platforms and technology during COVID-19 in Cambodia (Chet & Sok, 2020; Cheam, 2021; Sol,

2021; Chet et al., 2022; Chea et al., 2022; Em et al., 2022). Nevertheless, there has been little research which directly focuses on online English learning attitudes during the pandemic, in particular on relationship between students' attitude and gender, correlation between attitudes and university location (Phnom Penh and provincial universities) and university type (public and private universities).

Thus, to fill these knowledge gaps, the present study aimed to investigate the students' attitudes towards online English learning in the context of COVID-19.

1.4. Research Objectives

The present study had the following objectives:

- To study the students' attitudes towards online English learning during COVID-19.
- To compare the students' attitudes towards online English learning in relation to variables gender, location and type of universities.
- To study the relationship among the students' attitudes toward online English learning with respect to the five constructs.

2. METHODOLOGY

For this study, quantitative research methodology such as descriptive and correlation methods was used (Creswell & Creswell, 2018), and the gathered data were analysed by SPSS version 23.

2.1. Research Sample

The present study was conducted with 255 junior undergraduate students from various universities in Cambodia. 153 (60%) of the participants studied in Phnom Penh, while 102 (40%) studied in the provinces. Female students comprised 160 (62.7%) of the research sample and male students accounted for 95 (37.3%). The sample was formed using voluntary sampling technique where the students who filled out the readily-prepared online survey questionnaire were regarded as the research sample.

2.2. Research Instrument

The instrument for this study was an online survey questionnaire about the students' attitudes towards online English learning in the context of COVID-19. The questionnaire was divided into two key parts:

Part I: General Information

This part consists of eight items about the respondents' background information such as gender, age, university location (Phnom Penh and provinces), university type (public and private institutions), learning schedule, year of study, and major of study.

Part II: Students' Attitudes towards Online English Learning

This part consists of 25 Likert-scale items explaining five different constructs of students' attitudes towards Online English learning during Covid-19. The items were adapted from Pusey & Nanni (2022) presented in the following table. The rationales for adapting from this source were based on the consultation with colleagues as well its suitability to the context of online learning during COVID-19 in Cambodia.

Table 1
Attitudes and their operationalization

Construct	Operationalization
Effectiveness of Instruction (Items 9-13)	The degree which students believe the instruction they obtain is effective.
Open-mindedness (Items 14-18)	The degree which students welcome or are open-minded about online learning.
Autonomy in Study (Items 19-23)	The degree which students feel they are capable of learning autonomously in an online classroom or online environment.
Interaction (Items 24-28)	The degree which students believe that online learning allows or enhances interaction.
Anxiety (Items 29-33)	The degree which students feel nervous, anxious, or uncomfortable about online learning.

Before administering the main study, the researcher conducted a pilot survey among 15 students to see how well the instrument was developed and check the language used in the questionnaire. The final version of the survey questionnaire had a considerably high reliability with Cronbach's alpha value of 0.954[1].

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[1] The reliability scale between 0.7 and 0.9 was considered high and good according to Kline (1999).

Table 2
The characteristics of the adopted items

	Reliability	Normality Check (Shapiro-Wilk)	
		Sig.	Conclusion
Effectiveness	.840	0.112	Normal
Open-mindedness	.901	0.001	Not Normal
Autonomy	.894	0.002	Not Normal
Interaction	.906	0.006	Not Normal
Anxiety	.894	0.002	Not Normal

2.3. Data Collection

Because COVID-19 was still going on, in particular a new variant Omicron was emerging during the study, the data collection was carried out in an online format. Moreover, as the study focused not only on Phnom Penh students but also provincial students, the online survey was more convenient. The data collection took place around 60 days, and the questionnaire URL link in the Google Form was sent to the students via Telegram groups as well as through contact with relevant known teachers. In addition, to prevent from missing responses in any questions, all of them were turned on "required" so that the students did not skip any of them.

2.4. Data Analysis

The survey data were coded and entered into the SPSS program for analysis. Descriptive summaries and statistical tabulations were used to present the general information of the participants. Non-parametric tests: student's independent t-test and Mann-Whitney were used to compare students' attitudes in relation to gender, location, and type of universities in objective two, and Spearman's correlation was used to compare the five constructs of students' attitudes towards online English learning in objective three.

The interpretation of the descriptive information of each construct for the students' attitudes towards online English learning followed the following table.

Table 3

Interpretation criteria for students' attitudes

Score Rank	Conclusion	Interpretation
1 - 2.25	Low	Very negative attitudes
2.25 - 3.5	Medium	Relatively negative attitudes
3.5 - 4.75	High	Considerably positive attitudes
4.75 - 6.0	Very High	Very positive attitudes

The interpretation of the relationship between each construct of the students' attitudes towards online English learning was based on the following table.

Table 4

Interpretation criteria of Spearman coefficients.

Spearman ρ	Correlation
≥ 0.70	Very strong relationship
0.40 – 0.69	Strong relationship
0.30 – 0.39	Moderate relationship
0.20 – 0.29	Weak relationship
0.01 – 0.19	No or negligible relationship

(In Leclezio et al., 2015 adapted from Dancey & Reidy, 2004)

3. RESEARCH FINDINGS

3.1. Participants' Information

There were 255 students participated in the study with the majority of them (62.7%) were female where male students covered 37.3% of the remaining sample. 81.2% of the participants aged between 18 and 24, those aged between 25 and 30 accounted for 12.2%, students who were under 18 years old made up of 8%, while those older than 30 occupied 5.9% of the research sample. In addition, students from private universities covered the biggest proportion (72.2%) while 27.8% of them were from public universities. Moreover, 60% of the participating students attended the universities in Phnom Penh while 40% of them studied in the provinces.

Regarding their learning sessions, most of them (63.9%) studied on weekdays, and 36.1% of the participants studied at the weekend. Among them, 45.9% were pursuing Year 3, while sophomores and senior students were 27.1% respectively. In relation to their majors, English literature students ranked the highest proportion (46.7%), followed by management (12.9%), accounting (10.6%), banking and finance

(7.5%), international relation (3.9%), information and technology (3.9%), and others (12.6%).

However, there were 96 students equalling to 37.6% revealed their intention to carry on online learning but in a hybrid manner. Besides, 22% wanted to further their online class.

Table 5

Students' perception regarding the continuation of online learning after COVID-19 ends.

	Frequency	Percent
Want to go on	56	22
Do not want to go on	103	40.4
Want to go on in hybrid	96	37.6
Total	255	100.0

3.2. Students' Attitudes towards Online English Learning

Objective 1: Students' Attitudes towards Online English learning

Table 6

*Mean and standard deviation values of the five constructs.*

Construct	Mean	SD	Interpretation
Effectiveness	3.58	0.99	High
Open-mindedness	3.85	1.12	High
Autonomy	3.74	1.10	High
Interaction	3.60	1.12	High
Anxiety	3.38	1.12	Medium

The interpretation of the finding in this section followed the criteria shown in Table 3 in section 2.4 above. The variant means and standard deviation (SD) indicated different attitudes towards online English learning. In general, most students thought that online learning had high effect on their English e-learning. Also, students perceived that online learning promote their open-mindedness (*Mean = 3.85, SD = 1.12*) than other items, for instance, autonomy, interaction, and effectiveness of instruction (see Table 6). While the students' perceptions about the four-mentioned constructs were high, only the students' perception on the anxiety imposed by online English learning showed a medium level (*Mean =3.38, SD=1.12*). The findings implied that the students had high positive attitudes towards their online English learning during COVID-19 pandemic.

Moreover, in order to show more clearly and deeply about students' attitudes, the five constructs of students' attitudes towards online English learning were set from low to very high (See Figure 1).

Figure 1

Four levels of the five constructs of students' attitude towards online English learning
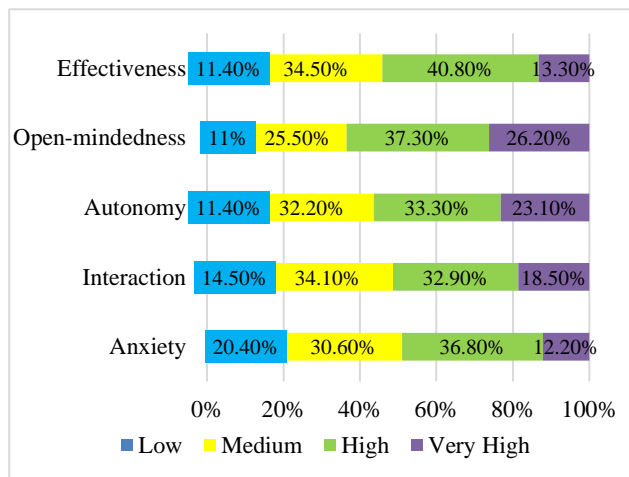
Based on data in Figure 1, the effectiveness of instruction in online English learning revealed that most students had a confident attitude that the instruction they obtained in online classroom with a high level (40.8%) plus even a very high one (13.3%) whereas the medium and low levels were 34.5% and 11.4% respectively.

For open-mindedness in online English learning, the result showed that students had the attitude of welcoming or being open-minded about online learning with a very high level of 26.2% along with a high level of 37.3%, while the medium and low levels were 25.5% and 11% respectively.

Regarding the autonomy construct which wanted to find out whether students felt that they had abilities to study autonomously in online class or online environment, it was shown that students had the attitude of giving high value on autonomy with a very high and high levels of 23.1% and 33.3% respectively, followed by 32.2% of medium level and 11.4% of low level.

For the interaction construct which studied students' confidence on whether online learning may allow or enhance interaction, the result showed that most students seemed to have semi-autonomy as the medium level was 34.1% and the high level was

32.9%, followed by the very high level (18.4%) and the low level (14.5%).

Last but not least, for the anxiety construct which focused on whether students felt nervous, anxious, or uncomfortable about online learning or not, most students were found out to have a high level of anxiety up to 36.8% and a very high one in 12.2%, while the medium and low levels were 30.6% and 20.4% respectively.

Objective 2: Comparison of the Students' Attitudes with Respect to Different Subgroups

Based on the results of independent t-test in Table 7, students' attitudes on effectiveness of instruction towards online English learning during COVID-19 was found to be no significantly different in gender, university location, and university type variables.

Table 7

Comparison of the attitudes in relation to gender, university location and university type.

	Gender	University Location	University Type
	Sig.	*Sig.*	*Sig.*
Effectiveness	*.106*	*.842*	*.252*
Open-mindedness	*0.041*	*0.426*	*0.049*
Autonomy	*0.010*	*0.358*	*0.077*
Interaction	*0.38*	*0.735*	*0.47*
Anxiety	*0.867*	*0.166*	*0.939*

The same as the effectiveness of instruction, Mann-Whitney tests showed that the students' attitudes on interaction and anxiety towards online English learning were also found to be statistical insignificant in relation to variables of gender, university location and type.

However, the Mann-Whitney results revealed that the students' attitudes on open-mindedness was shown to be significantly different in gender, and male students had a more positive view (*Median = 4.00*) compared to the female (*Median = 3.80*). In addition, the students' attitude on open-mindedness was also expressed to be significantly different in relation to university type, and the private university students perceived more positively (*Median = 4.00*) than public university students (*Median = 3.60*).

Moreover, regarding the students' attitudes on autonomy towards online English learning was found to be significantly different only in relation to gender. It was evidenced that male viewed more positively (*Median = 4.00*) compared to their female peers (*Median = 3.40*). However, the differences of students' attitudes towards autonomy of instruction were not found among variables of university location and type.

Objective 3: Relationships among Constructs of the Students' Attitudes

Table 8
Spearman Correlations among students' attitudes

	1	2	3	4	5
1. Effectiveness of Instruction	1.0 .	.753** .001	.779** .001	.770** .001	.312** .001
2. Autonomy		1.0 .	.775** .001	.823** .001	.277** .001
3. Interaction			1.0 .	.833** .001	.338** .001
4. Open-mindedness				1.0 .	.273** .001
5. Anxiety					1.0 .

**. Correlation is significant at the 0.01 level (2-tailed).

As shown in Table 8 above, the results related to correlation among the five constructs of the students' attitudes towards online English learning during COVID-19 showed a positive trend from a low to a high level.

Based on the interpretation criteria of Spearman correlation coefficients as shown in Table 4 in Section 2.4, the students' attitudes related to "effectiveness of online instruction" had a very strong positive relationship ($\rho = 0.753$) with their attitudes relevant to "autonomy of students in online English learning". Based on this correlation, it could be concluded that when the teachers' effectiveness of online instruction was higher, the students seemed to understand that online learning created higher autonomy in their learning during COVID-19 pandemic.

In addition, the effectiveness of online instruction also had a very strong relationship with students' interaction in online English learning ($\rho = 0.779$), in which we could draw a conclusion that higher effectiveness of instruction might lead students to have a higher trend of interaction in online learning during the pandemic. Furthermore, the effectiveness of online instruction was still strongly correlated with the open-mindedness in online learning ($\rho = 0.770$), which could be concluded that students would welcome online learning when there was high effectiveness in online teaching.

Much different from above, the students' views on the effectiveness of online instruction had a moderate relationship with anxiety imposed by online learning ($\rho = 0.312$). Regarding students' autonomy in online English learning, it was also strongly correlated with the students' interaction in online English learning ($\rho = 0.775$), which could mean when students had autonomy in online English learning, it could lead them to be more active to participate in every activity in online learning. In addition, it even had much stronger relationship with students' open-mindedness ($\rho = 0.823$), which could show that students' autonomy seemed to enable them to increasingly accept online learning. Nevertheless, it had a weak relationship with students' anxiety in online learning ($\rho = 0.277$), which could reveal that because of high students' autonomy it might reduce students' anxiety in online learning, too.

Looking at students' interaction in online English learning, it had a very strong relationship with students' open-mindedness in online English learning ($\rho = 0.833$), which could be concluded that when students had more interaction in the online class, they also seemed to welcome the online learning. Similar to the effectiveness of online instruction, it also had a moderate relationship with students' anxiety in online English learning ($\rho = 0.338$). This could mean that when students conducted more interaction in online learning, it might decrease their anxiety in online learning.

Related to students' open-mindedness in online English learning, it had a weak relationship with their anxiety ($\rho = 0.273$), which might reveal that when

they welcomed online learning, they also seemed not to be anxious about online learning.

To sum up, the above findings showed the correlation between various constructs of students in online English learning generally had a moderate and weak relationship with students' anxiety, so we could draw a conclusion that most students had a positive attitude towards online English learning during COVID-19 crisis.

4. DISCUSSION

4.1. Objective 1

Related to objective 1 that studied about students' attitudes towards Online English learning focusing on the five constructs, four of them ranked from very high to high level, of which open-mindedness was the highest one, followed by autonomy, interaction, and effectiveness of instruction (Refer to Table 6).

Based on this finding, it could be discussed that most students had a positive attitude towards online learning during COVID-19 pandemic because they had convenience in online learning, which was congruent to the study of Cinkara & Bagceci (2013); Joseph & Nath (2013); Jiang et al. (2022), and Shahzad et al. (2020), all of which found out that English learners had a positive attitude towards online learning during COVID-19 expansion. Among those studies, Shahzad et al. (2020) stated that online learning brought the positive change of students' attitude because they had determination and commitment to their study as well as welcome to online learning during COVID-19 situation. They also showed their comfort during online learning, could contact their teachers easily and ask questions in voices or messages; moreover, their teachers could either reply to them directly while studying in online class or when they were free.

In addition, the research finding was also consistent with the research of Novikova et al. (2022) which showed a positive attitude in digital utilization in education such as getting learning materials, saving time, having convenience and comfort while studying, as well as obtaining fast and large information. In addition, based on the study of Hazaymeh (2021) revealed that most students up to 86.66% effectively obtained their language

proficiency through online distance learning, and they had a positive attitude towards online learning which could empower them and got high scores in creativity and innovation, communication and collaboration, research and information proficiency, critical thinking, problem-solving, decision, and digital citizenship.

Among all the constructs of students' attitude, only anxiety construct was shown in the lowest level (Table 6); therefore, we could discuss that students did not feel anxious in their online English learning, which was congruent to the research of Resnik & Dewaele (2021) which found out that students felt happy rather than being anxious both in English physical classroom and in distance teaching contexts; however, their enjoyment in English learning was a bit lower in English distance teaching than in physical classroom.

4.2. Objective 2

Regarding Objective 2, it was revealed that student open-mindedness had significant relationship with gender, and in particular male students had more positive views towards online learning. This result shows that male and female students are different in terms of new technological tools and advancements, and male students usually seem to spend more time on internet and have more interest in the use of technological devices (Dhamija, 2014). Moreover, they have more new strategies and welcome online learning more than female ones. Alghamdi et al. (2020) raised that males have better learning strategies and technical skills than females in the online learning contexts. Due to these, male students may have better attitude than female students towards online learning.

Moreover, another result in Objective 2 which reveals that student open-mindedness also had significance with the type of university, in which the students from private universities seemed to view it more positively than those from the public university. Based on this, it could be inferred that the students in the private universities who had more affordability and access to internet as well as various facilities during online learning, in particular when their universities were mostly located in the towns, enabled them to have more positive attitude towards their online learning than their counterparts in the public universities.

The last finding in Objective 2 which found out the significant relationship between students' autonomy and gender, it could be inferred that male and female students had a little bit difference in their autonomy towards online English learning; in particular, male generally felt more curious in accessing and finding out how to use technology during online learning. However, this finding was strongly contrary to the finding of Firat (2016) which showed no significant difference between students' autonomy and gender.

4.3. Objective 3

Regarding objective 3 which studied the correlation between the five constructs of students' attitude towards English online teaching and based on the Spearman correlation's result, the effectiveness of online instruction was strongly correlated with autonomy of online English learning. Generally, when students were independent in their learning, it also relied on the effectiveness of instruction. Certainly, these two factors were strongly interdependent in learning, and this finding had a strong correlation with the finding of Tsai (2021) research that found strong distinction between the student groups who followed the instruction particularly related to students' autonomy strategies, behaviour, and confidence. Moreover, based on the analysis of the course management system list in the same study, it also revealed strong correlation between online learning activities and students' autonomy as well.

In addition, the effectiveness of online instruction had strong relationship with students' interaction in online English learning, which was strongly congruent to the study of Kyei-Blankson et al. (2019) that showed the teacher-student interaction and the student-lesson content interaction was more significant than the student-student interaction; moreover, teachers' presence played a strong role in students' learning after the presence of knowledge and society. Moreover, this finding was consistent with the study of Sher (2009) that showed that student-teacher interaction was one of many key factors in promoting students' satisfaction in online courses. In this study, it also revealed that a teacher or an institution should set up a learning environment which motivates student-teacher and student-student interaction. Moreover, if wanting to create a

satisfactory learning environment, a teacher has to encourage students to actively participate in discussion during the course, provide feedback on students' work, and tell them about their academic progress as well as regard them as different individuals. Furthermore, the online learning environment should be the one that motivates students to share their learning experience, builds community spirit among all students, and supports teamwork as well.

Besides, the finding which found that the effectiveness of online instruction had very strong relationship with students' open-mindedness was consistent with the result of Shaaruddin & Mohamad (2017) that showed the effectiveness of active learning strategy including enhancing ideology of open-mindedness among other strategies such as establishing positive learning environment, allowing direct interaction between teachers and students, enhancing communication skill, letting students participate individually in learning activities, and encouraging the contribution.

However, the finding which showed moderate relationship between the effectiveness of instruction and students' anxiety in online learning was similar to the finding of Ajmal & Ahmad (2019) that found because of the distance students could not discuss or share various issues with their teachers daily, which caused them to feel anxious in online learning method among other causes of anxiety such as shortage of interaction with classmates, shortage of knowledge and understanding about the exam format, exam schedule, and exam location.

Related to the students' autonomy that showed very strong relationship with interaction and open-mindedness in Online English learning was strongly congruent to the study of Bray et al. (2008) whose finding revealed that students who had high satisfaction in online learning were the ones that could overcome challenges in distance learning and feel easy to use computer and to communicate with teachers. Related to this autonomy-interaction correlation, the development of student autonomy required students to understand the level of autonomy required for online learning, and they needed to be aware of their own strategy, strength and weakness in

addition to the understanding of their dependency on others (Eneau & Develotte, 2012).

Nevertheless, the students' autonomy in online learning had a poor relationship with students' anxiety, and this finding was similar to the research of Bai et al. (2020) that found learning anxiety and learning effectiveness indirectly impacted the behaviour of autonomous learning through learning motivation.

Regarding the strong relationship between interaction and open-mindedness in online English learning was congruent to the result of Nelson Laird (2005), whose finding revealed that the amount of interaction that students had with multiple friends was important in the analysis of open-mindedness; moreover, this finding gave a recommendation that enhancing interaction between a student with a lot of classmates could enable that one to be more open-minded and independent in the quality of every interaction.

Moreover, the moderate relationship between interaction and anxiety was consistent with the study of Azizi et al. (2022), whose qualitative result disclosed that the interaction quality in online course was poor because it could lead to students' anxiety and dissatisfaction in online class, and because they might not begin group work and project in the class, did not have enough time to share and discuss views with others and to get feedback from their friends or teachers. In this study, it also expressed a moderate negative correlation between university students' satisfaction and anxiety in online class, which meant the more satisfied they were in online class, the less anxious they were.

5. CONCLUSION

5.1. Conclusion

In overall, the results revealed that four out of the five constructs of the students' attitudes towards online English learning had high levels, except a medium level for the anxiety construct. In addition, those five constructs were strongly correlated but had moderate and weak correlation with anxiety construct. Furthermore, regarding gender, open-mindedness and autonomy constructs were found to be significantly different, in which male viewed more positively compared to female. Besides, concerning the

university type, only open-mindedness construct was significantly different, in which students from private universities perceived more positive views than students from public universities.

5.2. Implications

Even though the research findings revealed that students had more positive attitude towards their online English learning during COVID-19, most of them seemed not to welcome back to online learning as when they were asked whether they wanted to study online or not (refer to Table 5), 40.4% showed that they did not want to study online at all, while 37.6% revealed their intention to carry on online learning but in a hybrid manner. This could be caused by a few implications.

First, it might be related to pedagogical implication in which some teachers were still not familiar with the utilization of technological tools and teaching techniques to conduct their online teaching delivery more effectively and satisfactorily.

Moreover, it could be in terms of curriculum implication that most educational institutions in Cambodia did not fully prepare their curricula which could effectively respond to educational online platforms which started abruptly because of the COVID-19 pandemic. As a result, both private and public institutions should focus more on providing more pedagogical training to teachers on using online platforms and developing appropriately separate curriculum for online teaching delivery in the future.

5.3 Limitation and Further Study

This study also has some limitations. First is limitation of method and design as this study was conducted online in Google form and sent via telegram to target university students in Phnom Penh and a few provinces, where the researcher has gone to work; thus, the number of samples was still narrow as it did not cover universities in the whole country. Second is limitation of data techniques because this study focused only on students' attitude which did not include the attitude on teachers' side. Moreover, there was difficulty in determining which attitude derived from online learning and which one originated from the general crisis situation which the study

respondents were facing, especially for the sources of students' anxiety in online learning.

For the future study, the researcher may conduct in a number of directions. First, for later research, the researcher will collect student samples which cover more universities than this in the whole country. Second, the researcher will modify the questionnaire to include the teachers' views on language education during the crisis, which will enable this research to raise comprehensive understanding in English language learning and teaching during the crisis. For the last direction, the researcher will conduct attitude-related study in each construct more comprehensively in order to determine much clearly about the source of each attitude.

ACKNOWLEDGEMENT

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APPENDIX

SURVEY QUESTIONNAIRE

"A Small-Scale Study on Students' Attitudes toward Online English Learning in the Context of COVID-19 in Cambodia"

I am doing research on "A Small-Scale Study on Students' Attitudes toward Online English Learning in the Context of COVID-19 in Cambodia;" therefore, I would like to invite you all to spend around 10 minutes to fill out this survey. The purpose of this research is to find out the attitudes of students related to online English learning during the COVID-19 pandemic focusing on 5 aspects: effectiveness of instruction, autonomy in study, open-mindedness, interaction, and anxiety. Thus, your participation can help create necessary data and useful knowledge related to the above research, which is the most current issue that has not been comprehensively studied in Cambodia yet.

Your participation in this study will not involve any risk because the information which is provided to me is kept confidential and used by me for the purpose of organizing, analyzing, and writing the research report only.

I would like to deeply thank you for your participation in this survey.

Part 1: General Information

Q1- Gender: ☐ Male ☐ Female
Q2- Age: ☐ Below 18 ☐ 18-24 ☐ 25-30 ☐ Over 30
Q3- Location of University: ☐ Phnom Penh ☐ Province
Q4- Type of University: ☐ Public/State ☐ Private
Q5- Study Session: ☐ Morning ☐ Afternoon ☐ Evening ☐ Weekend
Q6- Year of Study: ☐ Year 1 ☐ Year 2 ☐ Year 3 ☐ Year 4
Q7- Major: ☐ English Literature ☐ Finance and Banking ☐ Accounting ☐ Management
  ☐ IR ☐ IT ☐ Others
Q8- Willingness to stud online after the end of Covid-19 pandemic
  ☐ Yes ☐ No ☐ Yes, but in hybrid manner.

Part II: Students' Attitudes towards Online English learning

In this part, please rate to what extent you agree or disagree with the following:

1 = Strongly Disagree 2 = Moderately Disagree 3 = Slightly Disagree
4 = Slightly Agree 5 = Moderately Agree 6 = Strongly Agree

Item	Perception Statements	1	2	3	4	5	6
Effectiveness of Instruction							
Q9	My teacher used various tasks to engage students in my online English classes.	☐	☐	☐	☐	☐	☐
Q10	My English teachers could provide effective feedback during online learning.	☐	☐	☐	☐	☐	☐
Q11	Online classes helped me learn English better than physical classes.	☐	☐	☐	☐	☐	☐
Q12	It was easy to understand the teachers' explanation in an online class.	☐	☐	☐	☐	☐	☐

| Q13 | My teacher could manage the online class and the students just like he does in physical classes. | ☐ | ☐ | ☐ | ☐ | ☐ | ☐ |

Autonomy in Study

Q14	Online learning let me work at my own pace.	☐	☐	☐	☐	☐	☐
Q15	I could learn independently in an online class.	☐	☐	☐	☐	☐	☐
Q16	I felt comfortable in online learning outside a normal physical class.	☐	☐	☐	☐	☐	☐
Q17	I knew I would succeed in an online class.	☐	☐	☐	☐	☐	☐
Q18	I felt at ease to catch up with teachers teaching online.	☐	☐	☐	☐	☐	☐

Open-mindedness

Q19	I felt excited about online learning.	☐	☐	☐	☐	☐	☐
Q20	Doing an online class was a good learning opportunity.	☐	☐	☐	☐	☐	☐
Q21	I wanted to learn how to use technology for online learning.	☐	☐	☐	☐	☐	☐
Q22	I welcomed all challenges of learning in an online environment.	☐	☐	☐	☐	☐	☐
Q23	I obtained creativity from online learning.	☐	☐	☐	☐	☐	☐

Interaction

Q24	I could actively participate in every activity in my online English class.	☐	☐	☐	☐	☐	☐
Q25	I had a lot of opportunities to practice my English in online classes.	☐	☐	☐	☐	☐	☐
Q26	I had a lot of opportunities to hear my classmates discussing learning during my online English classes.	☐	☐	☐	☐	☐	☐
Q27	I had a lot of opportunities to talk to my teachers about lessons in my online English class.	☐	☐	☐	☐	☐	☐
Q28	I could work out or discuss the problems with my partners or my friends like we do in physical classes.	☐	☐	☐	☐	☐	☐

Anxiety

Q29	I felt nervous and over-reacted to online learning.	☐	☐	☐	☐	☐	☐
Q30	I felt worried that learning online requires digital knowledge and skills to learn the lesson contents effectively.	☐	☐	☐	☐	☐	☐
Q31	I felt worried that I might fail the exam by learning online.	☐	☐	☐	☐	☐	☐
Q32	I felt nervous and panicked when taking the test/exam online during my online classes.	☐	☐	☐	☐	☐	☐
Q33	I felt worried that I might not interact or respond well to my teacher or friends when learning online.	☐	☐	☐	☐	☐	☐

Thanks for spending your valuable time to complete this questionnaire!