The Perceptions of Foreign Students in China on Online Classes Amid the COVID-19 Pandemic

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Abstract

Covid-19, since its eruption, has affected the political, socio-economic and academic activities in the world. This paper examined the perceptions of foreign students enrolled to study within the Chinese universities on online learning during the COVID19 pandemic outbreak. The researchers adopted the quantitative and qualitative research method in collecting data on how the foreign students felt during this period. The questionnaire was designed and distributed using online questionnaire method and the result were analyzed using simple analytical and Pearson correlation co-efficient analysis. The results showed that most students preferred the traditional system of learning due to the challenges they faced during the online classes, especially students who are partaking in the online learning from their home countries. The study therefore recommends that institutions admitting foreign students in China should incorporate online class in their curriculum as this will help promote online learning and assist to prepare students for future events like the COVID19 pandemic.

Keywords: Covid-19, Foreign students in China, Online class

I.   Background of study

The 21st century began with a paradigm shift in attitudes towards online education. Online learning is no longer peripheral or supplementary, it is now an integral part of mainstream society (Bozkurt, 2015). 7.1 million Students were in 2013 reported to be enrolled in at least one online course in higher education, accounting to about 33.5% of higher education students taking at least one online course and thus improving the effectiveness of online courses. An endeavor that requires quality standards to guide, design, develop, and delivery of online courses (Allen & Seaman, 2014; Martin, Ndoye, & Wilkins, 2016). This paradigm shift in the understanding of the very nature of learning has affected the definition, design, and delivery of education and has resulted in new modes of educational delivery, new learning domains, challenged traditional notions of teaching and learning, introduced new learning processes and outcomes and new educational roles and entities (Bozkurt, 2015; Swan, 2019).

Like it was for many foreign students in the higher institutions of China, distance education started as an alternative for many individuals whose lifestyles, location, or time constraints prevented them from attending face-to-face educational programs (Zhang & Kenny, 2010). The awareness of the covid19 pandemic came at the end of the first semester and lingered through the second semester. The Chinese government in its effort to ensure that academic activities in the higher institutions did not stop as a result of the disease, introduced an online platform for studies for both Chinese natives and foreign students in the country (Zhong, 2020). This research is designed in order to deeply understand how the foreign students whose study duration is still on in china feel about the e-learning within the period of this corona virus and will not only be significantly important to university academic planners, teachers and curriculum leaders who would necessarily need to be informed on the situation of the students on the online class curricula, it is also a way of validating the experiences of these students.

a. Statement of the Problem

As the virus' disparate impact on rich and poor, city and country, becomes a reality that more of the rest of the world are fast beginning to confront, China plunges into online learning which has become a compulsory alternative to continue education during the pandemic. It is believed that online-based classes present the universities in China the flexibility necessary to contain the virus spread and maintain an uninterrupted academic semester with the foreign students, however, little is known, from the viewpoints of the students, about the effects of the Covid-19 pandemic on their academic lives and the various challenges encountered by the students going through online learning at their various locations and countries.

b. Purpose of study

This research, therefore, is aimed at exploring the perceptions of foreign students admitted into the Chinese Universities in China on the sudden need to switch over to online education because of the raging COVID19 pandemic crisis.

c. Research questions

This research seeks to answer the following questions.

1. What are the perceptions of foreign students in China on online classes amid the Covid-19 pandemic outbreak?
2. What can universities do to improve on the perceptions of online learning by foreign students?

II.   Literature review

Overview of the COVID19 Pandemic

The unknown acute respiratory tract infection epidemic broke out first in Wuhan, China, since 12 December 2019, is possibly related to a seafood market and several studies suggested that bat may be the potential reservoir of SARS-CoV-2 (Giovanetti et al., 2020; Paraskevis et al., 2020). According to Guo et al., 2020; World Health Organization, 2020; Hui et al., 2020), the novel coronavirus associated with human to human transmission and severe human infection was named "severe acute respiratory syndrome coronavirus 2", or SARS-CoV-2, by the International Committee on Taxonomy of Viruses because it is related to the virus that caused the SARS outbreak in 2003 but to avoid confusion with SARS the WHO refers to it as the "covid-19" virus when communicating with the public (New Scientist, 2020). Common signs of infection include respiratory symptoms, fever, and cough, shortness of breath and breathing difficulties. In more severe cases, infection can cause pneumonia, severe acute respiratory syndrome, kidney failure and even death. This disease later spread to other parts of the world making the World Health Organization to declare it as a pandemic. As a result of the spread of the diseases many activities were brought to a halt which include social gathering, business activities, academic activities, etc. (WHO, 2020).

The coronavirus outbreak might be considered the biggest disruption to international student flows in history (Ziguras & Tran, 2020). Due to the spread of the novel coronavirus, Chinese universities have taken comprehensive measures to safeguard the health of international students still in China, such as restricting access to outsiders, distributing masks and regularly checking body temperatures (Xinhua (2020). Ziguras & Tran, (2020) pointed out that, more than 100,000 students stuck in China who had intended to study in Australia this year, and of course, international affairs are bound to sometimes interfere with the more than 5.3 million students studying outside their home country and all over the world. As the impact of the deadly coronavirus Sars-CoV-2 has reverberated across global higher education and China's substantial investment in internationalizing its top universities may be affected, online learning becomes a trend, the big winner from this – across all education levels, so proving quality now is at center stage (Lau & Ross, 2020).

Online Learning

Online learning or "e-learning" is the form of education that takes place over the Internet (Stern, 2018, p.1). It is a type of learning that takes place across distances and not in the traditional classrooms. Educational institutions have been important places for the polishing of the younger generations (Hinic, Grubor & Brulic, 2017), however, digital technology is being used to improve the accessibility and provision of education, particularly at the university level, offering new instruments and solutions for innovative pedagogy and distance learning (Sun & Chen, 2016). A strong growth in distance education through online coursework has been one of the most pronounced trends over the last decade in higher education (Xu & Shaggers, 2014; Tarone, 2015) and online learning is a growing educational option for adults who, due to space and time constraints, cannot attend face-to-face classes on a regular basis (Bates, 2014; Montiel, 2018).

According to Montiel (2018), online education has progressively evolved as technology itself has more to offer in terms of educational tools. Online learning has become popular in that it offers the possibility to attend remote universities without having to move to new cities or countries (Alvarado & Calderon, 2013). Montiel (2018)

noted that more and more colleges and universities are going beyond their physical frontiers to offer quality education to distant learners, and Swan (2019) stated that the altered learning environments created by web-based technologies, not only eliminated barriers of time, space and arguably learning styles, provided increased access to higher education, they also challenged traditional notions of teaching and learning, and indeed higher education itself (p. 55). Despite all the advances, however, there are several researches who are still skeptical about the quality and the outcomes of online education.

As the virus has turned online conveniences into daily necessities (Zhong, 2020), and the education sector of China reacting very fast to the shutdown announced in late January, university students has a lot in stock for them. By 2 February, about 22 online curriculum platforms opened 24,000 online courses for higher education institutions to choose from, including 1,291 'national excellence courses' and 401 virtual simulation experimental courses, covering 12 undergraduate programs and 18 tertiary vocational programs. Reportedly from Ding Kuiling, the university's executive vice president, Shanghai Jiao Tong University launched 1,449 online courses, both live and recorded, on platforms including the massive open online course (MOOC) system for Chinese universities so that students, of all levels, undergraduates and postgraduates, from all over the country can watch them for free. Peking University began by offering 563 undergraduate classes with 290 of them live streamed and 101 video classes provided online via the university's website, as well as 96 discussion classes via online group chats. Qiu Yong, president of Tsinghua University, Beijing, said some 4,254 courses have been planned for this semester, involving 2,681 faculty members and 25,091 students, with 3,923 courses being offered online. These students, some of whom live in China's rural hinterland, have been cut off from their regular lives, especially when it comes to education, but while the epidemic situation poses a challenge to all, it is an opportunity to comprehensively promote the digitalization and informatization of teaching (Leung & Sharma, 2020).

III.   Methodology

The concept of the research design adopted for this study is centered mixed method namely Quantitative and qualitative research analysis through primary data source, using questionnaire method. The questionnaire was designed using the wenjuanxing (wjx) software and distributed through Whatsapp and Wechat. A total of 111 responses where received from the foreign students in China and the analysis of the data are based upon this number of data collected. Due to the sudden change in the system of education, learning has been moved from close and physical method to the electronic or online learning. This came as a shock to some International students who are not well-advised in the operational use of computers for teaching and learning and some, who has never witnessed the e-classes in their life. Therefore, the researchers designed questions for the foreign students who are enrolled and currently studying in different universities in China, to examine the views of the students upon being informed that the second semester classes will be done electronically.

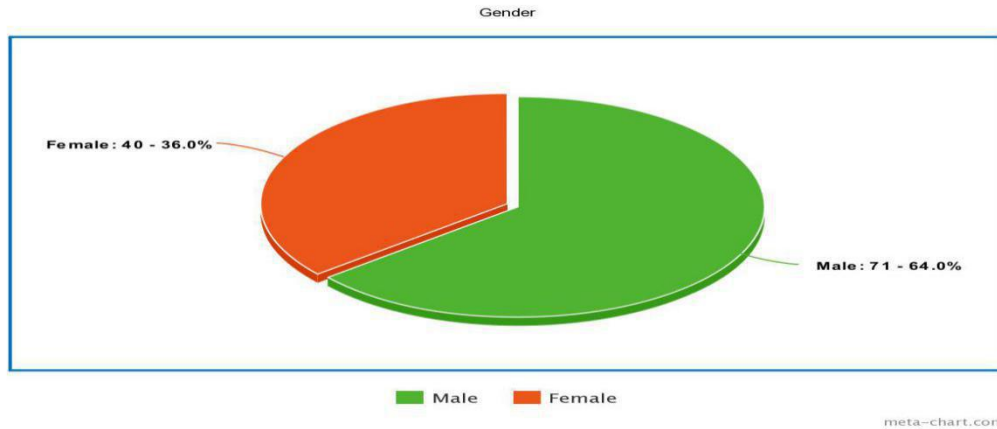**Data Analysis and Presentation of results**

Figure 1: gender responses from the respondents

The simple random method was adopted for this research and the participating students for this study were from different countries of the world like USA, Turkey, India, Pakistan, Togo, Italy, France, Sudan, Vietnam, Laos, Madagascar, Nigeria, etc, and institutions in China. The sample size of participants who responded to the survey were 111, 71 males and 40 females, with the ratio in percentage by gender being 64% to 36% respectively.
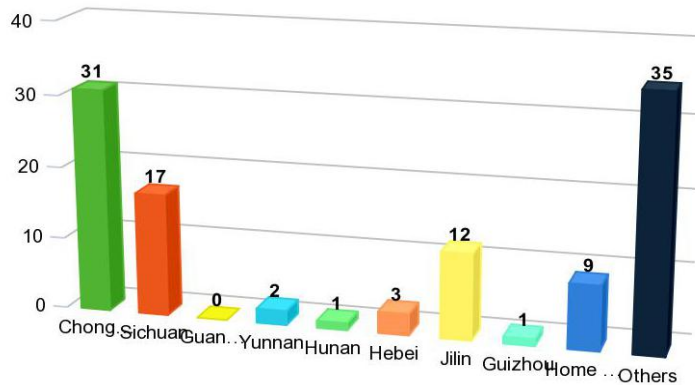
In which Province are you now?

Figure 2: The number presentation of responses on provinces where foreign students study in China.
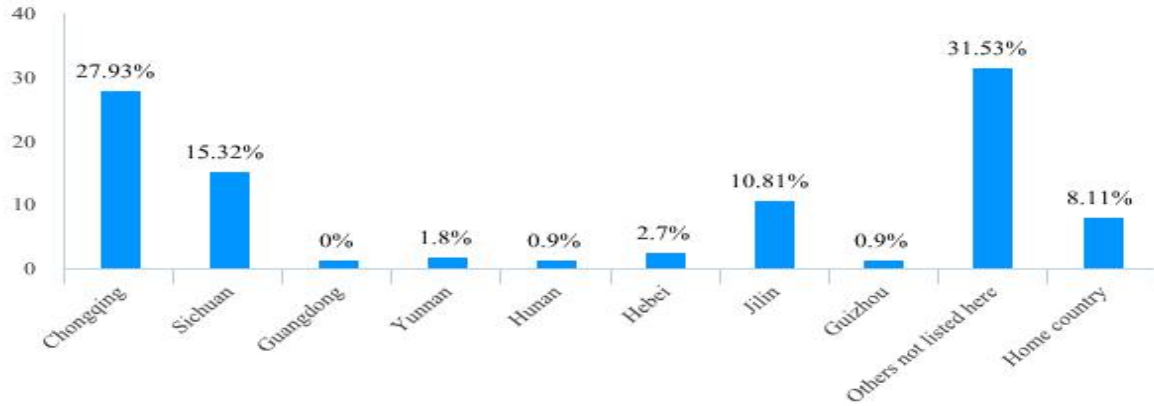
Figure 3: The percentage presentation of responses on provinces where foreign students study in China.

From the above bar chart (Figure 3), students who participated to express their experiences towards the unprecedented shift in academic learning format in the Chinese Universities with the highest response by percentage being 31.53% from "others" referring to un-enlisted provinces on the survey, Chongqing Municipality 27.93%, Sichuan Province 15.32%, and Jilin Province 10.81%. The students reporting from "Home country", 8.11%, are students who had travelled home at the end of the semester for the winter vacation during or before the pandemic crisis became global. Other enlisted provinces include Hebei, 2.7%, Yunnan, 1.8%, Guizhou, 0.9%, and Hunan, 0.9%. (**Note**: in figure 2 the figures are the total responses from the international students on each province)

- *These foreign students stated out their concerns and disadvantages about this online study, for instance students who are already in China said that this new pattern of studying reduces their concentration and zeal to study hard since they have to stay in their rooms and listen to their teachers. Secondly, it makes them to lose interest in studying, since they cannot ask questions to their teachers direct for clarification as they used with for closed learning.*

- *For students in their home countries, they raised issues like technical failure with the software designed for online classes, lack of stable Wi-Fi, broad-bands are expensive to buy, and time difference affecting their learning ability with this new method of learning in this period of COVID-19 outbreak. Furthermore, students who are in engineering and medical disciplines voiced out their disapproval of this adjustment because of some of their courses that needed laboratory practical works, that some practical courses can't be taught online that it needs the presence of the teachers in the laboratory to guide them through than teaching them electronically.*
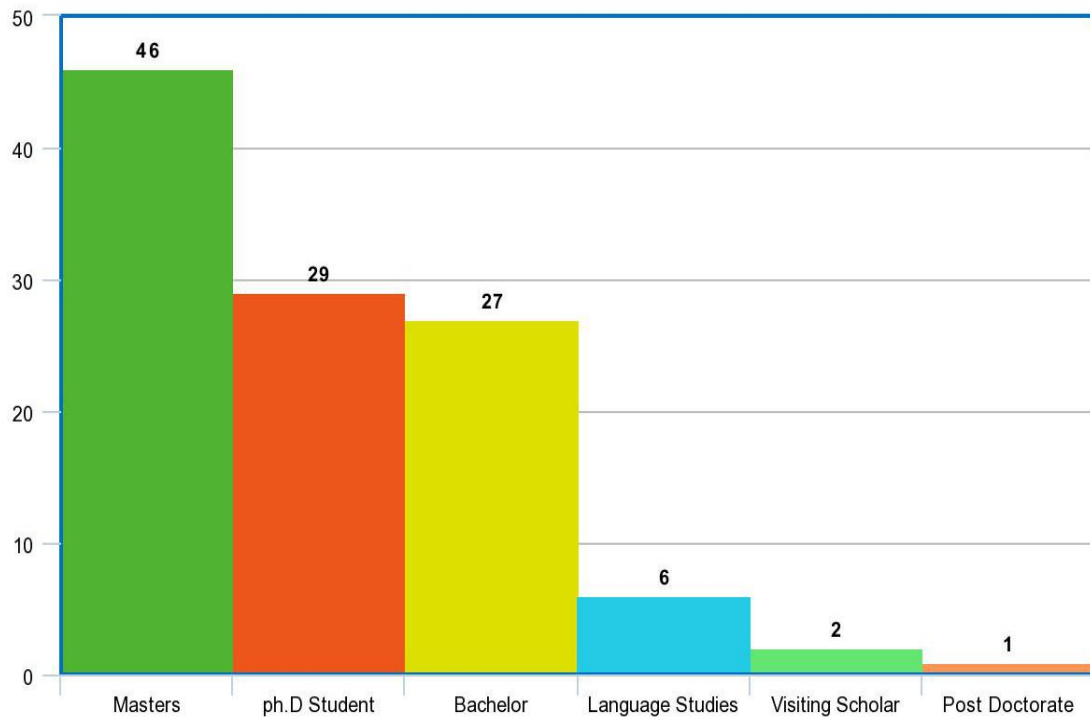
Figure 4: Academic status of the respondents

This survey covers students from different academic categories – post-doctorate, doctorate, visiting scholars, masters, bachelors and language studies - to enable the researchers understand the effects of this new dimension of teaching and learning on students in all levels of education.

Table 1: Partial regression analysis of the tested variables.

Control variables			How do you feel on the first time of online class?	Is this your first time of participating in an online class?	How would you rate the performance of your first time online class?
None	How do you feel on the first time of online class?	Correlation	1.000	-0.23	-003
		significance(2 tailed)df	0	.812	.973
				109	109
	Is this your first time of Participating in an online class?	Correlation	-0.23	1.000	0.26
		significance (2 tailed)df	.812		.790

			109	0	109
	How would you rate the performance of your first time online class?	Correlation	-0.03	0.26	1.000
		significance (2 tailed)df	.973	.790	
			109	109	0
How would you rate the overall performance of the first online class?	How do you feel on the first time of online class?	Correlation	1.000	-0.23	
		significance (2 tailed)df		.823	
			0	108	
	Is this your first time of Participating in an online class?	Correlation	-0.23	1.000	
		significance (2 tailed)df	.813		
			108		

Source: Researchers' survey

The correlation between how the questions of "how the students feel on their first time of the online teaching" and "is this their first time of participating in an online class?", while controlling with how the students rate their overall performance of their first online class is r = - .023. However, the zero-order correlation between "how do you feel on your first time of the online class" and "is this your first time of participating in an online class", r = - .023. This shows there is a strong negative correlation between how the students feel on their first time of online classes and participation in the online class.

Table 2: Summary of descriptive statistics of the tested variables from regression analysis

	Mean	Std. Deviation	N
How do you feel on your first time of the online class?	2.14	.732	111
I this your first time of participating in an online class?	1.32	.470	111
How do you rate your overall performance of first online class?	2.62	1.229	111

Source: Researchers' survey

The researchers adopted partial correlation to test the relationship between the first time students participated in online classes (is this your time of participating in an online class?), and how students felt about their
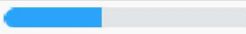
first time on the e-classes (how do you feel on your first time of the online class?), while controlling how the students rate their overall performances in their first time of online class (how do you rate your overall performance of your first online class?), N= 111. The partial correlation result shows that there is a strong, negative, partial correlation between "is this your first time of participating in an online class" (M (mean) = 1.32, SD (standard deviation) = .470) and "how do you feel on your first time of the online class" (m = 2.14, SD = .732), while controlling for "how do you rate your overall performance of your first online class" (M = 2.62, SD = 1.229, r = -.023).

The two divisions in table 1, the zero-order correlation on the upper part of the table and the bottom part where there is a control variable have similar correlation coefficient values (r values) which is -.023.To that effect, the researchers concluded that there is no influence of control variable on (how the students rate their overall performances on their first time of online class) on the strength of the relationship between the two variables ("is this your first time of participating in an online class" and "how do you feel on your first time of the online class").
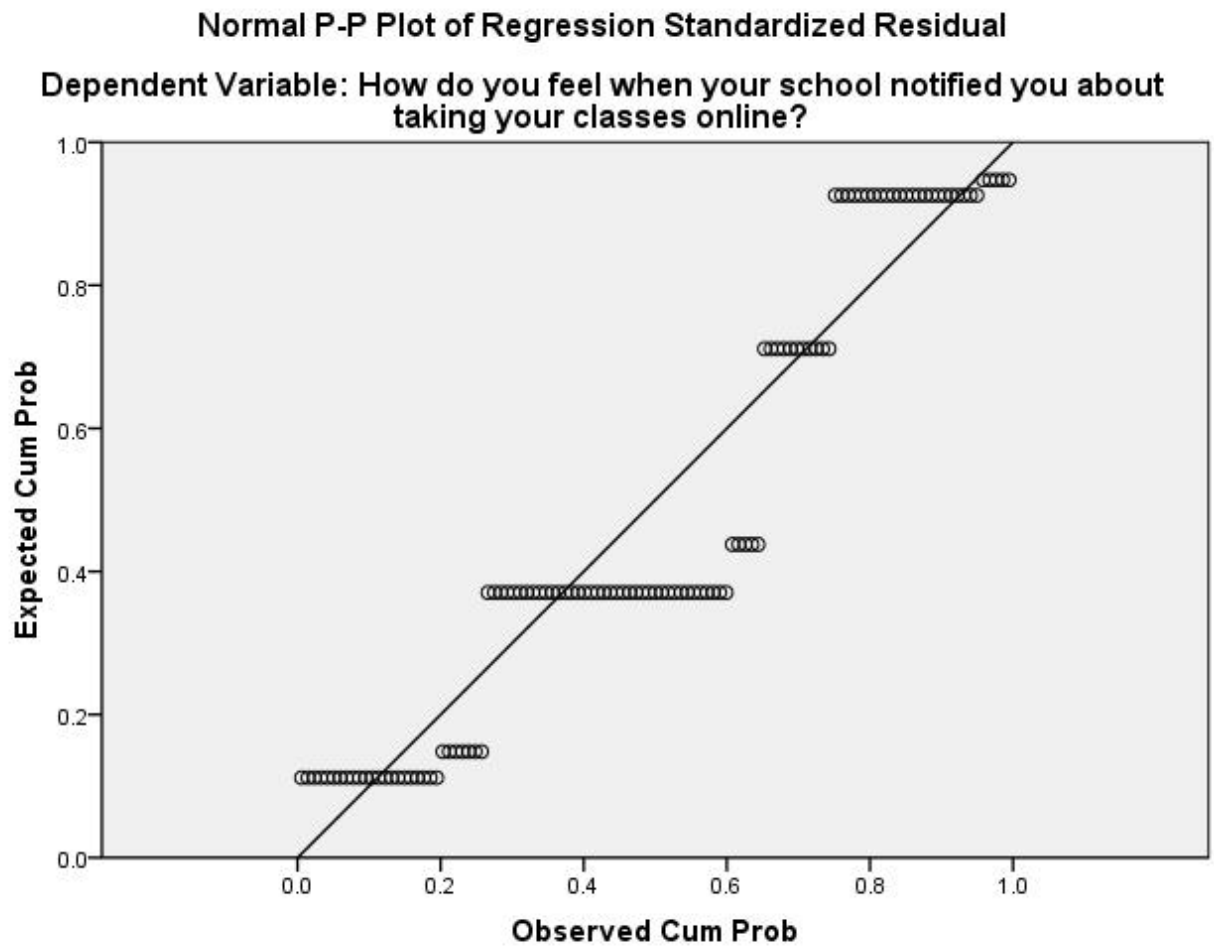
How do you feel when your school notified you about taking your classes online?

Table 3: Responses on student's feelings towards online classes

Options	Responses	Percentage
Feel sad	49	44.14%
Feel ok	44	39.64%
Indifference	18	16.22%
Total	111	

Source: Researchers' survey

Table 3 shows the responses to the question of how they felt on notification of the compulsory online classes by the international students. 44.14% registered their displeasure on the new development, 39.64% of them were flexible and thinks e-learning is okay and convenient, while 16.22% were indifferent.

Normal P-P Plot of Regression Standardized Residual

Dependent Variable: How do you feel when your school notified you about taking your classes online?

Figure 5: Normal P- Plot of Regression Standardized Residual of the tested Variables

Table 4: Responses of International Students on whether they prefer online classes to physical classroom teaching.
Will you prefer online class to physical classroom?

Options	Responses	Percentage	
Yes	17		15.32%
No	94		84.68%
Total	111		

The regression graph shows a strong positive statistical relationship between the dependent variable and independent variable which shows how the students felt when they received the information about online classes and whether they preferred online classes to the offline, face-to-face teachings. The above graph proves that a significant percentage of the foreign students in China (84.68%) do not prefer having their studies electronically as when compared to having one on one classes with their teachers in the classrooms which was the responses of 15.32% of the foreign students.

IV.   Conclusion

This paper researched on how the international students in China perceived the sudden, abrupt need to study compulsorily online as informed by the universities as one of the measures to curb and control the pandemic.

. From the result of this research, foreign students in China expressed different opinions regarding the new system of learning with most of the respondents being of the view that traditional method of learning increases the level of communication between the teachers and the students, something barely achievable online. This viewpoint was discovered to be because it is most students' first experience of e-classes while those some others has not had online classes on a sustained base. It was also noted that some students who traveled to their homes countries encountered some technical challenges in the efforts to participate on the online classes which may negatively influence their overall performances for the academic session.

V.   Recommendations

This study therefore recommends that higher institution admitting foreign students in China should incorporate online learning skills into the students at least at one level of the students' entire study duration (suggestibly at the beginning). These training will help improve the perceptions of foreign students on e-learning and better prepare the students for unforeseen, future events that could disrupt traditional system of learning. For future researches, this study suggests a step further in investigating the effects of COVID19 pandemic on the academic performances of foreign students in China.

References

Alvarado, M., & Calderon, I. (2013). Statistical Diagnosis and Trends in Distance Higher Education

in Colombia. Bogotá, *In Distance and Virtual Higher Education in Colombia: New realities,* 31-47.

Bates, T. (2014). 2020 Vision: Outlook for Online Learning in 2014 and Way Beyond.

Retrieved from https://www.tonybates.ca/2014/01/12/2020-vision-outlook-for-online-learning-in-2014-and-way-beyond/. 2020/02/26

Bozkurt, A., Akgün Özbek, E., Yılmazel, S., Erdoğdu, E., Ucar, H., Guler, E., Sezgin, S.,

Karadeniz, A., Sen-Ersoy, N., Göksel, N., Dinçer, G., Ari, S., & Aydin, C. (2015). Trends in Distance Education Research: A Content Analysis of Journals 2009-2013.   *International Review of Research in Open and Distance Learning, 16*, 330 – 363.

Giovanetti, M., Benvenuto, D., Angeletti, S., & Ciccozzi, M. (2020). The First Two Cases of 2019-

nCoV in Italy: Where They Come From? *J Med Virol,* 1–4.

Guo, Yan-Rong & Cao, Qing-Dong & Hong, Zhong-Si & Tan, Yuan-Yang & Chen, Shou-Deng

& Jin, Hong-Jun & Tan, Kai-Sen & Wang, De-Yun & Yan, Yan. (2020). The Origin, Transmission and Clinical Therapies on Coronavirus Disease 2019 (COVID-19) Outbreak – an Update on the Status. *Military Medical Research,* 1-5.

Hui, D. S., Azhar, I. E., Madani, T. A., Ntoumi, F., Kock, R., Dar, O., Ippolito, G., Mchugh, T.

D., Memish, Z. A., Drosten, C., & Zumla, A. (2020). The Continuing 2019-nCoV Epidemic Threat of Novel Coronaviruses to Global Health — The latest 2019 Novel Coronavirus Outbreak in Wuhan, China. *International Journal of Infectious Diseases, 91,* 264-266.

Lau, J. & Ross, J. (2020). Universities Brace for Lasting Impact of Coronavirus

Outbreak. Retrieved from https://www.timeshighereducation.com/news/universities-brace-lasting-impact-coronavirus-outbreak. 2020/02/17

Leung, M. & Sharma, Y. (2020). Online Classes Try to Fill Education Gap During

Epidemic. Retrieved from https://www.universityworldnews.com/post.php?story=2020022108360325, 2020/02/21.

Martin, F. & Ndoye, A. & Wilkins, P. (2016). Using Learning Analytics to Enhance Student

Learning in Online Courses Based on Quality Matters Standards. *Journal of Educational Technology Systems. 45,* 165-187.

Montiel, L. M. C. (2018). *A Comparative Study of Online English Language Learning and Face-*

To-Face English Language Learning (Doctoral dissertation). Virginia Commonwealth University, Richmond, Virginia.

New Scientist (2020). Covid-19: The Disease Caused by a Kind of Coronavirus Which

First Originated in Wuhan, China in late 2019. Retrieved from https://www.newscientist.com/term/covid-19/, 2020/03/26.

Paraskevis, D., Kostaki, E. G., Magiorkinis, G., Panayiotakopoulos, G., Sourvinos, G., &

Tsiodras, S. (2020). Full-Genome Evolutionary Analysis of the Novel Corona Virus (2019-nCoV) Rejects the Hypothesis of Emergence as a Result of a Recent Recombination Event. *Infect Genet Evol., 79.*

Stern, J. (2018). Introduction to Online Teaching and Learning. Retrieved from

https://nanopdf.com/download/joshua-stern-phd-west-los-angeles-college_pdf. 2018/03/26

Sun, A., & Chen, X. (2016). Online Education and its Effective Practice: A Research Review.

Journal of Information Technology Education: Research, 15, 157-190.

Swan, K. (2019). Research on Online Learning. *Online learning, 11,* 55-59.

World Health Organization (2020). Novel Coronavirus (2019-nCoV) Situation

Report- 5, 25 January 2020. Geneva, Switzerland

Xinhua (2020) Across China: Foreign Students' Campus Life amid Epidemic.

Retrieved from http://www.xinhuanet.com/english/2020-02/17/c_138791590.htm. 2020/03/26.

Xu, D. & Jaggars, S. S. (2014). Performance Gaps Between Online and Face-to Face Courses:

Differences Across Types of Students and Academic Subject Areas. *The Journal of Higher Education, 85*(5), 632-659.

Zhang, Z. C. & Kenny, R. F. (2010). Learning in an Online Distance Education Course:

Experiences of Three International Students. *International Review of Research in Open and Distance Learning, 11* (1), 17-36.

Zhong, R. (2020). The Coronavirus Exposes Education's Digital Divide. Retrieved

from https://www.nytimes.com/2020/03/17/technology/china-schools-coronavirus.html. 2020/03/17

Ziguras, C. & Tran, L. (2020). The Coronavirus Outbreak is the Biggest Crisis Ever to

Hit International Education. Retrieved from http://theconversation.com/the-coronavirus-outbreak-is-the-biggest-crisis-ever-to-hit-international-education-131138. 2020/02/06.