



Research Article

An Analysis of the Problems faced during COVID-19 and their Impact on Students' Academic Learning

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Abstract

Coronavirus disease (COVID-19) is an infectious disease caused by the newly discovered coronavirus. The year 2020 will go down in history as the year of the new coronavirus (COVID-19). Hundreds of thousands of people died from the plague around the world, schools and companies closed their doors, masks became popular in public areas, and unemployment skyrocketed. The population of the research was all post-graduate students at the public sector universities of Faisalabad. The population consists of 326 post graduate students in the 2nd semester, out of which, 143 students were selected by using the online sampling calculator www.surveysystem.com with a 95% confidence level and 5% confidence interval. The questionnaire was used as a research instrument for data collection. The data were analyzed through a statistical package for social science (SPSS). The top 1st ranked problem faced by students relating to research during COVID-19 was less interaction with other research students with a 525 weightage score and the 2nd ranked problem was found to be lack of communication with a 522 weightage score. Cost of the internet was the 1st and the top technological impact on students' academic learning during the COVID-19 situation with a 547-weightage score. The 2nd ranked was a problem in LMS login, due to the burden on the website with a weightage score of 533. We all students and educational institutions need to work together to resolve the issues that are slowing us down in the development of academic life.

Keywords: Problems, COVID-19, Academic performance, Online education.

Introduction

Education technology has seen rapid expansion and adoption in 2019, and even before COVID-19, with global investments of \$18.66 billion in 2019 expected to reach \$350 billion by 2025. For both on-campus and distant students, learning management systems are already standard in higher education. In 2015, the yearly growth rate of online enrolment was over 30% per year, and in 2019, the number of students taking at least one online course had climbed to 34.7 percent of the overall learner population globally (Dewi, 2019). In December 2019, the Coronavirus Disease 2019 (COVID-19) was originally recognized as pneumonia of unknown origin in Wuhan, Hubei Province, China. The inductive agent of COVID-19 is later identified as a new coronavirus, severe acute respiratory syndrome coronavirus-2, by the International Committee on Virus Taxonomy (ICTV) (SARS-CoV-2). COVID-19 expanded rapidly not only in China but also over the world, prompting the World Health Organization (WHO) to declare it a pandemic on March 12, 2020. As of



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August 25, 2020, the total number of confirmed cases and deaths across 216 countries was 23,491,520 and 809,970, respectively (Zhu, 2020). At the time, China was preparing to celebrate its New Year, dubbed the "Spring Festival," when the infection spread quickly due to people moving from one place to another. When the festival arrives, individuals return to their hometowns, and the virus spreads over the world as a result of this shuffle/movement. As a result of this migration, the virus has spread around the globe, wreaking havoc on human health and the economy (Baker *et al.*, 2020).

The first COVID-19 import case was recorded in Pakistan on February 25, 2020, and there were 1,547 positive coronavirus infections as of March 29, 2020, with Punjab having the most instances (558), Sindh Province having 502 cases, and Baluchistan having 138 cases. 14 persons have died, and 28 have recovered and been discharged from the hospital, out of the total number of confirmed cases (Purwanto, 2019). Education is regarded as an economic development tool. During Covid-19, many scholars helped to answer the problem of education in developed and underdeveloped countries. Scholars have shown the impact of the Coronavirus on both industrialized and developing countries in some articles (Loayza and Pennings, 2020).

Corona causes more disaster in developing countries than in wealthy countries due to a lack of social distance (Meunier, 2020). Coronavirus has also affected developed countries such as Germany, Italy, and the United States. COVID-19 has a huge impact on scholars since per capita income in underdeveloped nations is below the poverty threshold (Bong *et al.*, 2020).

The COVID-19 pandemic has impacted students at all levels of school. Approximately 1.7 billion students from 192 nations have been temporarily executed by educational institutions around the world. Many universities throughout the world have either postponed or cancelled all academic and co-curricular events to reduce the number of meetings and thus the spread of the virus (Nicola, 2020). By converting classroom instruction to online instruction, undergraduate and graduate students at many schools and universities become ineffective. This method of instruction offers an alternative to avoiding eye contact between students or between students and teachers. Many students, however, may not have access to online education due to a lack of financial resources, equipment, or a digital or technological gap (Sahu, 2020). The epidemic of COVID-19 has had a significant impact on kids' academic performance. The COVID-19 pandemic has shifted classroom learning to the internet. In many sophisticated countries, online learning is successful, yet it is ineffective in Pakistan. Not only kids but also academic administrators and families faced numerous challenges. The purpose of this research is to identify or emphasise the issues that students encountered during COVID-19. The study's goal is to highlight the obstacles and roadblocks that higher education students in Pakistan experience when it comes to online learning (Basilaia and Kvavadze 2020).

The study comprised of following objectives:

- To study the demographic characteristics of respondents
- To find out the academic learning activities of students during COVID-19
- To identify the problems faced by students during COVID-19 regarding study
- To analyze the impact of COVID-19 on students' academic learning
- To suggest some recommendations regarding improving the students' learning

The study was quantitative and descriptive as it describes " To Analyze the Problems of COVID-19 on Students' Academic Learning at University Level in Faisalabad".

Methodology

The population of the research was all post-graduate students at the public sector universities of Faisalabad. From Faisalabad two largest public sector universities were selected purposively which were Government College University Faisalabad (GCUF) and

the University of Agriculture Faisalabad (UAF). There are a total of 8 faculties in GCUF and 7 faculties in UAF. Faculty of Art and Social Sciences were selected from GCUF, and faculty of social sciences were selected from UAF. Department of Education from GCUF and the Institute of Agricultural Extension, Education and Rural Development from UAF were selected for study purposes. From both universities, the population was all the 326 post-graduate students in the 2nd semester. Sample size refers to the number of participants or observations included in a study.

The population consists of 326 post graduate students in the 2nd semester, out of which, 143 students were selected by using the online sampling calculator www.surveysystem.com with a 95% confidence level and 5% confidence interval. A questionnaire for students was created by the researcher under the supervision of the supervisor for the aim of data collection. The questionnaire was used as a research instrument for data collection. A well-structured questionnaire was used to collect data from respondents. The data were analyzed through a statistical package for social science (SPSS). Descriptive statistics such as percentage, frequency, mean, standard deviation, weightage score and rank order were analyzed to conclude).

Results and Discussion

Table 1 represented that there was a vast majority of the respondent, out of which more than half (70.6) students (20-30 years), less than half (26.0) students (30-40 years) and only a few (2.7) students were (40-50 years). The period of human life, measured by years from birth usually marked by a certain stage or degree of mental or physical development and involves legal responsibility and capacity. There were a majority of respondents, out of which more than half (63.6) were from UAF and less than half (35.6) were from GCUF. More than half (61.5) were from M.Phil., less than half (29.5) were from MSc and only a few (8.2) were from PHD. a vast majority (75.5) were single and only (24.5) married. Marital status is also one of the major demographic attributes which influence students' education and their choice of school; parents think that either they should get admission to public or private institutions.

Table 1. Demographic attributes of the respondents.

Age	Frequency	Percentage
20-30	101	70.6
30-40	38	26.0
40-50	4	2.7
University Name		
UAF	91	63.6
GC University	52	35.6
Qualification	Frequency	Percentage
M.Phil	88	61.5
MSc	43	29.5
PHD	12	8.2
Marital Status	Frequency	Percentage
Single	108	75.5
Married	35	24.5
Nature of program	Frequency	Percentage
Regular	42	29.4
Weakened	88	61.5
Evening	8	5.5
Morning	5	3.4

Table 2. Weighted score, means, std. deviation and ranking of learning activities during COVID-19.

Learning activities	Mean	Std. deviation	Weighted Score	Ranking
Online presentation	3.78	1.16	541	1
E-learning blogs	3.75	1.29	537	2
Question and answer	3.73	1.15	533	3
Assignments	3.71	1.16	530	4
Brainstorming	3.67	1.23	525	5
Online demonstration	3.65	1.22	522	6
Video conferencing debates	3.53	1.31	505	7
Quizzes	3.52	1.26	504	8
E-library	3.45	1.22	494	9
Online assessment and quiz	3.42	1.23	489	10
Concept mapping	3.42	1.21	489	11
Online self-assessment	3.38	1.42	484	12

Learning activity as considered in the framework of the general activity approach is a special kind of human activity whose main objective is the acquisition of knowledge, skills, and competencies produced by society in the process of history utilizing special learning actions taken upon learning objects following their substance and structure. Learning activities refer to the teacher-guided instructional tasks or assignments for students. These are student activities. The terms teaching strategy and learning activity do not exclusively imply active or passive instruction (Zukerman, 2001).

Table 2 indicates the ranking of the responses about the academic learning activities during COVID-19 according to their mean value, weightage score, standard deviation and rank order in which the higher ranking was given to the greatest mean value which is 3.78 shows the responses were between the sometimes and often category but tended towards the often category. The 2nd ranked E-learning blogs are given the mean value of 3.75 showing in between the sometimes and often category but tended towards the often category. The question-and-answer learning activity ranked 3rd with a mean value of 3.73 and highly tended towards the often category. Represented that the assignments found to be 4th ranked with a mean value of 3.71 tended towards the often category. The brainstorming learning activity ranked 5th with a mean value of 3.67 which fall between the sometimes and often category but tended towards the often category. The table represented that the online demonstration found to be 6th ranked with a mean value of 3.65 tended towards the often category. Similarly, 7th ranked with a mean value of 3.53 which falls between the sometimes and often category but tended towards the often category. The quizzes were found to be 8th ranked with a mean value 3.52 which is tended towards the often category. The weighted score graph shows the mean values of these qualities were found >3.5 which highly tended towards the often category and > 0.5 standard deviations. It recognized that these learning activities were mostly used during COVID-19.

Table 3. Weighted score, means, std. deviation and ranking of problems faced by students relating to research during COVID-19.

Problems	Mean	Std. deviation	Weighted Score	Ranking
Less interaction with other research students	3.67	1.14	525	1
Lack of communication	3.65	1.16	522	2
Difficulty to approach respondents for data collection	3.60	1.18	515	3
Closure of hostels	3.57	1.26	510	4
No access to library	3.49	1.33	499	5
Less interaction with supervisor	3.31	1.38	473	6

Research is a pursuit of trust with the help of study, observation, comparison and experiment, the search for knowledge through an objective and systematic methods of finding solutions to a problem (Kothari, 2006). During COVID-19, various and common challenges/ difficulties faced by students such as difficulty in deicing the topic for research, lack of good knowledge of the methodology, the inability of finding modern, specialized and related references, and lack of interest in research etc.

Table 3 indicates the ranking of the responses about the problems faced by students relating to research during COVID-19 according to their mean value, weightage score, standard deviation and rank order in which the higher ranking was given to the greatest mean value which is 3.67 that shows the responses were between the medium and high category but tended towards the high category which shows during COVID-19 less interaction with the supervisor was the major problem.

The 2nd ranked is given the mean value of 3.65 which is fall between the medium and high category but tended towards the high category which shows lack of communication was another problem which students faced during COVID-19. Difficulty to approach respondents for data collection was ranked 3rd with a mean value of 3.60 which tended towards the high category. The 4th ranked with a mean value of 3.57 which shows during COVID-19 closure of hostels was highly problem which students faced. The weighted score graph shows the mean values of these quantities were found >3.5 which shows tended toward the high category and >0.5 standard deviations. The table represented that 5th ranked the problem with a mean value of 3.49 that shows the trend between medium and high category but tended towards medium category which shows that no access to the library was a common problem which was faced during COVID-19. The 6th ranked the problem with mean value of 3.31 which shows sometimes students face problem with interacting with their supervisor The weighted score graph shows the mean values of all qualities was found <3.5 and all responses are falling between medium and high categories but tended towards the medium category and >0.5 standard deviations. An examination is a detailed investigation, the act of conducting a detailed investigation or a formal test of your knowledge or skills in a given area. Many universities have already suspended the examinations, whereas, with the online classes, the continuous assessment will go along. The transformation of face-to-face teaching to online mode has a serious impact on assessment and evaluation. Although, technology has been used earlier to support online teaching and learning the assessment aspect is often underdeveloped (Timmis *et al.* 2019).

Table 4. Weighted score, means, std. deviation and ranking of psychological impact on students' academic learning during COVID-19 situation.

Statements	Mean	Std. deviation	Weighted score	Ranking
Worried about parents earning	3.90	1.14	557	1
Depression	3.71	1.14	530	2
Mental stress and intellectual fatigue	3.70	1.04	529	3
Increase anxiety	3.66	1.05	524	4
Frustration and boredom	3.67	1.14	520	5
Poor ergonomics	3.61	1.09	517	6
Emotional disorder	3.52	1.13	504	7
Lack of social interaction	3.41	1.29	487	8

The psychological impact is defined as the effect caused by environmental or biological factors on individuals' social or psychological impact. Several psychiatric disorders may affect psychological and social aspects of an individual's life. This condition has led students to adapt to new conditions to take online classes and studying. Besides, students

have to interact with a new study station (computer, mouse, chair, table/ desk, electrical outlets) can cause students' body postures uncomfortable, if it is not designed from an ergonomic approach. These unpleasant postures can produce physical pain in the back, neck, legs, hands, fingers and wrist (Shirzaei et al., 2020).

Table 4 indicates the ranking of the responses about the psychological impact on students' academic learning during COVID-19 according to their mean value, weightage score, standard deviation and rank order in which the higher ranking was given to the greatest mean value which is 3.90 that shows the responses were between the neutral and agree on category but tended towards the high category which shows during COVID-19 worried about parents earning was the major psychological impact during the covid-19 situation. The 2nd ranked is given the mean value of 3.71 which is fall between the neutral and agree on categories but tended toward an agree on category which shows students' level of depression faced during COVID-19. Mental stress and intellectual fatigue ranked 3rd with a mean value of 3.70 which is highly tended towards the high category.

The 4th ranked found to be increased anxiety with a mean value of 3.66 which is fall between the neutral and agree on category but tended towards the high category. The table represented that frustration and boredom were found to be ranked 5th with a 3.67 mean value which tended towards the high category. The 6th psychological impact was found to be poor ergonomics with a mean value of 3.61 and emotional disorder was found to be the 7th ranked psychological impact with a 3.52 mean value which tended towards the high category. The weighted score graph shows the mean values of all qualities were found >3.5 and all responses are falling between medium and high categories but tended towards the high category and >0.5 standard deviations. The 8th ranked found to be lack social interaction with a mean value of 3.41 which is fall between medium and high categories but tended towards the medium category. The weighted score graph shows the mean values of this quantity were found <3.5 and responses are falling between the medium and high categories but tended towards the medium category and >0.5 standard deviations.

Conclusion and Recommendations

This study reported that Pakistan Government has declared that it will give the best effort in dealing with corona or COVID-19 viruses. The government is an actual present to protect its society a secure the safety of every citizen. The government's efforts deserve the support of all Pakistani. Because with unity, and teamwork, Pakistan believes it can solve the problem of deployment of COVID-19. In the field of education, the government and Higher education commutation impose some of the policies facing Coronavirus. This is all done to minimize the spread of the corona virus and overcome the loss of education. Because Education is considered the backbone of any economy. For developing countries, Education is a great weapon to improve their economy. Nowadays Pakistan fights COVID-19. Pakistan is considered in the list of developing countries with low resources. That's the main reason Pakistan face many problems and education is the biggest issue which destroys the economy of Pakistan now these days. After conducting the survey and interacting with several people we can say that a vast majority of people are facing the problems that is relating to research, examination, teaching, internet issue and lack the knowledge to use and resolve the problems etc. We all students and educational institutions need to work together to resolve the issues that are slowing us down in the development of academic life.

References

Baker, S. R., Bloom, N., Davis, S. J., Kost, K. J., Sammon, M. C., & Viratyosin, T. (2020). The unprecedented stock market impact of COVID-19. National Bureau of Economic Research.

- Bong, C.L., Brasher, C., Chikumba, E., McDougall, R., Mellin-Olsen, J., & Enright, A. (2020). The COVID-19 pandemic: Effects on low-and middle-income countries. *Anesthesia and Analgesia*.131: 86-92.
- Basilaia, G. and D. Kvavadze. 2020. Transition to online education in schools during a SARS_CoV-2 coronavirus (COVID-19) pandemic in Georgia. *Pedagogical Research*, 5: 1-9.
- Dewi, W. A. F. (2020). Dampak Covid-19 terhadap implementasi pembelajaran daring di Sekolah Dasar. *Edukatif: Jurnal Ilmu Pendidikan*, 2: 55-61.
- Komani, A. and Chisomo, G. 2019. "Expanding access to higher education in public universities through open and distance learning (ODL) in Malawi: quality issues," *Int. J. Eng. Sci. and Manag.* 1: 88–96.
- Nicola, M. 2020. The socio-economic implications of the coronavirus pandemic (COVID-19) : A review. *Int. J. Surg.* 78: 185-193.
- Rizvi, S.Rienties, B.Rogaten, J.Kizilcec, R. 2020. Investigating variation in learning processes in a Future_Learn MOOC. *Journal of computing in higher education*. 32: 45-50.
- Sahu, P. 2020. Closure of universities due to Coronavirus Disease 2019 (COVID-19) : Impact on education and mental health of students and academic staff. *Cureus*. 12:7541-7541.
- Timmis, S. P. Broadfoot , R. and Sutherl, A. 2019. Rethinking assessment in a digital age: opportunities, challenges and risks. *Br. Educ. Res J.* 42:454-476.
- Zhu, N. 2020. A novel coronavirus from patients with pneumonia in China, N. *Engl. J. Med.* 382: 727-733
- Zukerman, G. A. (2001). How school students become subjects of cooperative learning activity. In M. Hadegaard (Ed.), *Learning in classrooms: A cultural-historical approach* (pp. 229–243). Aarhus: Aarhus University Press.