Innovations

Learning Modes Face Sudden Shifts During Worldwide Crisis (COVID-19): Impact on Students

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Abstract

Due to the recent events of the COVID-19 pandemic, most institutions have shifted their mode of teaching from the physical classroom to a fully online mode. Realizing the shift to online learning must not be permanent, it was again shifted to a hybrid mode and finally to the fully offline classroom mode when the pandemic started to fade away. This study has been conducted to analyze the students' experiences with respect to such rapid shifts in learning modes. Semi-structured interview method was used for data collection. The analysis revealed that such rapid shifts led to the development of various adjustment-related issues that impacted students with regard to their physical, cognitive, emotional, and socioeconomic domains. The present study concludes that such transition must demand psychosocial changes in this new environment of teaching-learning such as infrastructural development, providing continuous training to the employees to enable them to cope with the new crisis, organize psychological counseling for students and so on.

Keywords: *Teaching & Learning; Shift in learning mode; Hybrid learning; Continuing Professional Development; Counselling & Mental Health Issues; Psychosocial Factors*

1) Introduction

The COVID-19 pandemic caused dramatic changes and disruptions in various sectors worldwide. Education is one such sector, which has been drastically affected during this time. The government attempted to restrict the spread of the virus and had to go for lockdowns and as a result, like all other sectors, academic institutions such as schools, colleges and universities were temporarily closed, which possibly resulted in affecting more than 60% of the population of students worldwide as per the report of UNESCO (2020). In order to reduce the adverse impact of the pandemic, governments in various parts of the world had undertaken crisis management programs for the academic institutions. This included modification of

curriculum, development of technological aids and infrastructures, changes in the academic calendar and other important policies with respect to teaching-learning activities (Barrot et al., 2021). Such attempts actually prevented the cessation of teaching, learning and assessment as digital aids for online academic activities facilitated students to continue their studies (Rapanta et al., 2020). The disruption of traditional teaching models and the complete shifts of teaching-learning activities to online mode led to challenges in retaining students in some countries especially, the ones which could not provide technology which could reach out to remote villages. However, when technologies were accessible in rural and remote areas, Dhawan (2020) shows that this mode of teaching-learning was found to be relatively cheaper in terms of low costs in transportation, accommodation and significantly reduced the total cost of completing institution-based education. The author further stated that learning was more flexible as learners could schedule their plan as per their convenience to complete the online course and had the opportunity to enhance their potential through the combination of online learning and face-to-face learning, that is through blended learning mode and flipped classroom.

Shifts in teaching-learning activities were sudden and unexpected and as mentioned in a study by some experts, such shifts without sufficient training led to poor adaptability, poor time management, interruptions by social media, which create distractions, inadequate frequency of internet connection, which created technological obstacles and unassertive preparation, which resulted in poor teaching-learning experiences for the students (Lederman, 2020a; Lederman, 2020b). In addition to these findings, some studies indicated that teachers' preparedness was one of the key issues with respect to a lack of flexibility to change from traditional learning methods and a lack of willingness to know and adapt to the online learning environment (Armstrong-Mensah et al., 2020; Cavanaugh & DeWeese, 2020; Pokhrel & Chhetri, 2021; Scull et al., 2020). Other studies stated that such shifts in teaching-learning mode developed a new situation known as 'New Normal' that ensured education in a continuous mode as there was less chance of not attending classes, developed teacher-student interaction, enhanced students confidence as they could communicate in a new learning situation and also provided remarkable experiences and achievements even in the tough time (Lin & Nguyen, 2021; Zhaohui, 2020; Worth, 2020). In contrary, some researches indicated that online learning becomes effective when students are methodical, follow order, have autonomy and strong determination (Brown, 2019). But this mode of learning is not effective for those students who are passive, resistant to the new experience, have difficulties attending the task, have poor confidence and motivation, and also have poor interaction skills and self discipline (Winter et al., 2021). Therefore, online learning in various countries showed how technological advancements moderated the role of teachers and students in respect to teaching and learning (Starkey et al., 2021; Greenhow et al., 2020) and also became a major contributing factor to bringing in new pedagogies (Bates, 2019; Reid-Martinez & Grooms, 2018). Even during the period of sudden and unexpected shift in learning mode, the several aids provided by Google should be recognized with great appreciation, as these helped a lot in quick rescheduling of teaching-learning activities. These aids are (i) Gmail, (ii) Google Forms, (iii) Calendars, (iv) Google-Drive, (v) Google Meet app, (vi) Google Jam Board and Drawings, and (vii) Google Classroom (Basilaia et al., 2020).

In analyzing students' experiences during the COVID pandemic, several recent studies may be highlighted. Atwa et al. (2021) conducted a study that compared face-to face and blended learning mode among medical students and results showed that compared to the online mode of learning, faculties and students preferred face to face and blended modes of learning and regarded face-to-face learning as indispensable and blended learning as an acceptable mode for medical education in the post COVID situation. In a similar line favoring the blended mode of learning, two recently conducted Chinese studies may be highlighted. Jiang et al. (2021) conducted a study on learners listening performance in English as a foreign language in online and offline blended learning mode and results also showed that blended learning mode was helpful in increasing the students' listening performance. Another study was conducted by Li (2021) and the results showed that it too

considered blended learning as students indicated that both online and offline mode of classroom learning are preferred in post pandemic situations. Li further stated that teaching in hybrid situation shifted the teaching-learning process from a teacher-centric mode to an interaction based student-centric mode.

Analyzing the findings of these recent studies, the general understanding that has been developed is that during the post-pandemic era, students prefer hybrid or blended modes of learning, whereas online modes of learning are only preferred when offline classes are not possible to conduct, particularly during the pandemic period, when conducting online classes is the best and only alternative to ensure that learning should not be stopped. While there has been significant research on how students perceive online and blended modes of instruction there is no available research on the impact of the whole shift from one mode to another on students' learning experiences.

2) Research Objective

The present study has been conducted to analyze the variation in experience of students with respect to the shift from offline to online to hybrid and back to offline mode and its impact on their physical, cognitive, emotional and socio-economic domains which has impacted their learning experiences.

3) Participants

Seven undergraduate female students were interviewed for the current study. They were all within the age range of 20 and 22 years. Six of them were pursuing bachelor's degrees in psychology and one in business administration at University of Calcutta. Four were from Kolkata, and the other three were from the districts of Birbhum, Murshidabad, and Asansol.

The purposive sampling method has been used for data collection.

4) Instruments

Interview technique

Data was collected through semi-structured interviews. Respondents were asked to provide an account of their experiences with regard to hybrid mode of learning, pros and cons of adaptation to constant changes in the mode of learning, and its impact on the participants. The interview mostly ended with an inquiry about suggested changes in the learning system if any, that the participants wished would be implemented. Participants, while responding to the questions, kept bringing up topics like transport, cost, time management, etc., with regard to their experiences in differential modes of learning.

5) Procedure

The interviews were conducted for a maximum duration of 45 minutes. The participants were neither interrupted nor restrained within a time limit and were given the freedom to talk in a free-flowing manner as per norms of unstructured in-depth interview technique. Clarifications were sought when required.

Following Glaser's approach to grounded theory, new themes and topics that came up during certain interviews were written down as memos and further incorporated in subsequent interviews. For instance, one of the participants mentioned the overbearing cost of buying physical copies of text books. So,

subsequent participants were asked about that topic in later interviews. However, the previous participants were not probed on the topic.

Six interviews were conducted through phone calls, which were recorded after getting permission from the participants. The final interview was conducted at the participant's house.

6) **Analysis**

The recorded interviews were transcribed and read thoroughly two or more times to understand the participants' points of view. After this process, coding was started.

Open or continuous coding included word to word transcription of the answers given by the participants for each respective question asked.

Categorical or axial coding included line-by-line coding, where codes were constructed in the form of direct quotes from the participants. These initial codes remained true to the character of the data. Direct quotes were used in order to refrain from imposing other meanings than the participants' viewpoints.

After checking and comparing repetitive data, thematic coding was started. Similar codes were studied and grouped together across various interviews to form broad categories from which the study proceeded.

Summary of recurring experiences

During the analysis of the data, it was found that certain experiences were accounted for by almost all the respondents. These experiences included changes in four broad domains namely, the physical domain, cognitive domain, emotional and socio-economic domain. In the physical domain the changes experienced included extreme tiredness and exhaustion from long hours of travelling to and fro from the educational institutions. Sudden changes in sleep schedule and in daily routine were also accounted for during transition to online, hybrid and offline modes. Changes were experienced in cognitive domains included confusion due to sudden routine change, poor adjustment to daily hectic routine which was constantly changing, difficulty in memorizing lessons, changes in attention span and in quality of interactions with teachers and peers. The emotional domains were impacted by fear of being scrutinized and analyzed by teachers, peers and parents. Students also experienced higher levels of anxiety especially, in the physical mode. The shift to offline examinations also, led to higher levels of stress among students. Fluctuation in levels of motivation was also experienced by the students as were the levels of support that they were offered. In the socio-economic domain increased transport costs, costs of purchasing physical copies of books and better social relationships were experienced by the respondents.

7) **Discussions**

The major findings of the study are the different adjustment issues that the students experienced during the sudden and abrupt shifts in learning mode from online to hybrid and again from hybrid to offline mode. Analyzing the interview findings, the several important issues that have been raised by the students may be categorized under several subthemes. One of the subthemes was motivation, and regarding this, students reported that during the initial phase of learning in online mode, students were intrinsically motivated to experience a new mode of learning, but with the shifts to hybrid and to the offline mode, their motivation decreased as they started to feel the pressure with respect to their study and examination. The possible

reason may be that in 'new normal', shifts from interaction-based-student-centric online academic activities to traditional, and teacher-centric offline academic activities affected students' motivation. These study findings are corroborated by the findings of some recent studies conducted by Lin and Nguyen (2021), Zhaohui (2020), and Worth (2020) that online learning reduces the chance of not attending classes, enhances teacher-student interaction, and builds up students confidence as they find scope to communicate in a new learning situation in a more student centric learning environment. Though, no recent or earlier studies had been conducted regarding the students' experience in repeated shift in learning mode.

In respect to the syllabus modification, students felt happy with the shortened syllabus as they were perceived to complete the syllabus within a short period of time during the online mode of learning. But with the implementation of the full syllabus, they preferred offline classes as this would provide holistic learning. Also, in practical based subjects, hands-on training can only be provided in physical classes. In support of these findings, an Indian study in the same vein may be highlighted, as conducted by Atwa et al. (2022) on comparing face-to face and blended learning among medical students. Study findings indicated that as a practical solution in medical education both the faculties and students regarded face-to-face learning as indispensable and blended learning as an acceptable mode.

Regarding support from the teachers, students received more support in terms of asking for help and also doubt clearing during the offline and blended modes of learning. However, according to them, teachers, being the main mentors of the students, it would be beneficial to have teachers who motivate students frequently instead of pointing out flaws and mistakes in front of the class. They should emphasize the students' strengths more and be considerate enough to understand the mental health issues they face.

Some participants mentioned weekly online counseling sessions being held at their college, which somewhat helped them out. Students also requested group counseling services, one-on-one sessions or even just to vent in front of them without getting judged. Every shift in learning modes came with different forms of difficulties and issues. Students reported that coping with each was very hectic and tiring, which took a toll on their mental health. As work never seems to get finished in the college or school itself, students need to continue their studies from home due to the extensive nature of the syllabus and the short time. This sometimes hampered their personal lives. Some got exhausted, and some developed anxiety issues. One of the participants said they tried to gain help from outside, but counseling sessions seemed to be very expensive to carry on. Hence, the students reported that educational institutions which are providing free counseling services, is really very helpful. This study finding had been corroborated by a recent study which also supported counseling as well as virtual counseling sessions to be helpful for the children as well as their parents (Reupert et al., 2021).

In respect to the subtheme on learning style, students could adopt the more favorable learning style only during online classes because during the physical classes they hardly find time to prepare notes, revise, and complete the given assignments. They also mentioned the need for educational visits, more one-on-one sessions, which should be effective as most of our educational curriculum is totally offline. On the same note they mentioned, though offline learning makes them more conscious, mindful and helps them to show better presence of mind, it requires more time to study productively. So the six-month semester is not well structured. These findings are confirmed by one of the recent studies conducted by Li (2022) whose results showed that online learning developed students' digital learning skills and also got them connected even during tough times. In support, another study by Lin and Nguyen (2021) may again be highlighted as favoring online learning in enhancing students' confidence in attending classes in a new learning environment through the developed teacher-student relationship.

Discussing the subtheme, teachers' efficiency, the findings revealed by most of the students are that some teachers are not tech savvy, which leads them to get a bit slow during online classes. As per report of some students that many teachers also complained about not getting comfortable in teaching without board work, leading them to work with more motivation during the offline classes as they could connect with their students in a better way. These findings are confirmed by some of the recent study findings by Pokhrel and Chhetri (2021) and by Armstrong-Mensah et al. (2020), in which they showed that even in the pandemic situation, teachers continuously believed in traditional teaching methods even at the time of delivering lectures in a distance learning environment. On a similar note, another study by Cavanaugh and DeWeese (2020) and by Scull et al. (2020) showed that teachers faced challenges in providing time to get familiarized with the online teaching environment and its new approaches. Such findings suggest that the teachers' preparedness is developing to be a continuous issue in most situations (Howard et al., 2020), leading to the urgent necessity for the teachers to adapt to the new and challenging teaching-learning environment.

Thus, in the discussion about the study findings in respect to the various study domains, it is observed that students have variation in experiences in respect to the shifts from online to hybrid and again from hybrid to offline modes of learning, which have influenced their physical, cognitive ,emotional, and socioeconomic domains in respect to extreme tiredness and exhaustion due to time consuming transport, poor adjustment in daily routine for attendance due to tiredness for shifting from hybrid to offline, monotony and confusion for the shift in routine, and difficulties in memorization due to rapid changes from one mode to another. Such overall difficulties affected their flow of learning. In respect to positive experiences, complete shift to offline mode resulted in an increase in their coping repertoires. Interestingly, with the change from online to hybrid mode, for some students, the level of interactions has increased, whereas others have developed a fear of getting analyzed. In respect to a social economic perspective, the shift from online to hybrid and again to offline mode resulted in increased transport costs and the cost of paying for physical books, which became an issue. Discussing these domain specific present study findings in the light of some recent studies that are in the same line regarding the general understandings resulted in the present research that, like in the pre-pandemic situation, online teaching-learning in the pandemic situation created benefits as well as obstacles leading to the variation in students experiences (Li, 2022; Bashir et al., 2021). In this regard, another interesting recent study may also be highlighted, as conducted by Lemay et al. (2021), and the findings indicated that progress in learning should not only be measured by technological and infrastructural challenges but also by social and affective challenges that result from isolation and social distancing.

Finally, in conclusion, it can be stated that many challenges and difficulties were faced by the students during the repeated transition from online to hybrid mode and again from hybrid to offline mode of learning. Though, during the difficult time, the only major challenge with which both the teachers and students were concerned was maintaining students' motivation and getting them engaged in the continuous teaching-learning process.

8) Limitations

This study was conducted based on interviews with some students from selected colleges in the region of Kolkata. All the students were undergraduates. Though a relatively small sample study, it offers useful information about the challenges students faced while making the sudden transitions from one mode to another during the COVID-19 pandemic. Also, the participating students self-reported their views during the interview, which can sometimes be subject to bias. In this study, the grounded theory method has been used, which produces large amounts of data from a small sample size, which sometimes proves difficult to manage. However, on the other hand, it produced a rather diverse set of data.

A sample with a broader representation of students from other academic institutions like higher secondary schools and universities might strengthen the findings of this study.

It is also imperative to note that, all respondents had access to personal devices for attending their online classes. It would do researchers well to compare and contrast the experiences of students who have issues of accessing online modes of teaching-learning with those who can do so at ease. This study has not been able to delve on this and is limited to an account of experiences of students who had the privilege of ease of access to online modes of learning.

9) Implications

The implication of the study lies in the way that it favors practicing online learning and also develops some policies in this regard. The policies primarily need to include, but are not limited to, the professional development of the teachers and students, other staff members to impart training in terms of performing various academic and administrative activities in distance or online learning mode. Thus in respect to the theoretical and practical subjects' teachers, staff, and students should learn to maintain continuity in education in emergencies such as lockdown as they do in offline mode of education. Teachers should also be trained in designing innovative or creative pedagogies and encourage various organizations and authorities to promote online learning. For maintaining sound mental health in students and also getting them capable to effectively cope with the various adjustments related issues, psychological counseling sessions in colleges needs to be continued on regular basis. Teachers should be motivated to use their reflective intelligence in approaching their students with all positivity to ensure that learning takes place in this new environment which is broadly known as 'New Normal'. Therefore, technological advancements should be at the forefront by providing infrastructural developments, accessibility to unlimited information based resources such as e-books, journals, articles, and other important resources, and adaptability in terms of their proper use. Therefore, for sustainable developments in this regard, teachers and other stakeholders should approach the situation with strong determination to overcome obstacles and also to maintain resilience.

10) Declaration of Conflicting Interests

The authors of this article declare that there were no conflicts of interest regarding the authorship and publication.

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