

PEDAGOGY OF LEARNING

International Refereed / Peer Reviewed Journal of Education

Volume 9, Issue 2, April 2023, E-ISSN: 2395-7344

Abstracted and indexed in: Google Scholar, Research Bib, International Scientific Indexing (ISI), Scientific Indexing Services (SIS), WorldCat, Cite Factor, Website: <http://pedagogyoflearning.com>

Recommended citation for this Article:

Panda, S.K. & Neha (2023). Perspectives and experiences of secondary school students about online learning: a critical analysis. *Pedagogy of Learning*, 9 (2), 01-11 Available at: <http://pedagogyoflearning.com>. DOI: 10.46704/pol.2023.v09i02.001

Perspectives and Experiences of Secondary School Students about Online Learning: A Critical Analysis

Sushant Kumar Panda

Assistant Professor, Department of Education, University of Jammu, Jammu, India. Email: drpanda77@gmail.com

Neha

Research Scholar, Department of Education, University of Jammu, Jammu, India.

Article DOI: 10.46704/pol.2023.v09i02.001

Corresponding Author: Sushant Kumar Panda, e-mail: drpanda77@gmail.com

Article Publication Date: 30 April 2023

ABSTRACT

With the emergence of a pandemic on this earth, the education system was suddenly switched from classroom learning to online learning. The educational institutions were not prepared for this unexpected transition but now it has become the new normal way of teaching and learning. The present study aimed to study the availability and usability of digital technologies, the perceptions of students about online learning, identify the difficulties faced by the students while attending online classes and find out the better remedies for improving the teaching-learning process with the blend of online learning. In this regard, the investigators used the survey method. In the present study, 150 secondary school students were included in the sample. For data collection, a self-prepared questionnaire was used by the investigators that contained three sections namely (1) availability and usability of digital technology, (2) perception of students towards online learning, and (3) difficulties faced by students during online learning. Furthermore, data were analysed and it was found that most of the students had technological support for learning online in which some of the students shared the devices of their parents, siblings, and relatives. The smartphone was the most used device by students for searching online content related to their studies. Moreover, most of the students agreed that the lecture delivered through online mode was easily understandable and their teachers always allowed them to ask questions whenever they had any queries. However, the study also indicates that the students had faced various difficulties while attending online classes due to poor internet connectivity, expensive packs, lack of ICT competency, no separate rooms for study, parental restrictions on phone usage, lack of physical interaction, etc. Therefore, the present study highlighted the remedial measures to enhance the teaching-learning process through online mode. The findings of the study will give insights to the stakeholders to find out the solutions to the existing problems, properly implement the educational technology at all levels, and take this online learning process to the next level in a better way.

Keywords: Online Learning, Experiences, Secondary School Students

Introduction

Education is a necessity for human beings to provide the solution to problems. We are living in a digital world that progressively relies upon digital appliances. We increasingly use them to support flexible patterns of formal or informal communication between the participants who are not in the same location. These digital technologies make the communication process faster, more widespread, and accessible for everyone. Information and communication technologies (ICT) have induced tremendous transformations in every sphere at the global level. Educational technology is a dynamic and systematic use of knowledge in the modern scientific world. It created a new realm of knowledge and changed the role of students and teachers that they had traditionally played. The use of ICT encourages students to look for information from different sources and makes it an effective tool for strengthening the quality of education. It is a powerful tool that enhances teaching-learning activities and prepares the younger generations to live, learn, and work innovatively in this digital age.

With the development of science and technology, the internet is an integral part of our lives. Education is now becoming more accessible and affordable by using these new technologies. Before the pandemic, the education sector mostly followed the traditional learning approach and the use of online learning was quite less but at the time of the worldwide lockdown, online learning became the only substitute to continue education at home and it was accepted and appreciated across the world also. Online learning refers to 21st-century education that uses the internet and multimedia technologies to improve the quality of education. It is a type of learning that enables learners to access high-quality content, eminent resource persons, and instructional materials by eliminating physical barriers and creating a digital learning environment at home. It is due to its multiple characteristics that provide flexibility, easy use, cost-effectiveness, and anywhere and anytime learning. Almahasees et al. (2021) also reported that online learning reduces the expenditure on education where the learners can easily continue their education while staying at home without paying any charge for traveling. It proved very much helpful for the students as well as the teachers where they had adopted the new innovative ways of teaching and learning.

Online learning opens the doors for millions of students via the internet and enables them to keep learning. It enhances the knowledge, skills, imagination, creativity, and productive capabilities among the learners. All the educational institutions started online classes/digital learning/webinars for the learners. Various educational platforms are used in digital learning such as Zoom, Google Meet, YouTube, Skype, Facebook, Instagram, WhatsApp, etc. The integration of these technologies in education was the most effective solution to cope with the pandemic crises.

Review of Related Literature

After reviewing the existing literature, it was found that online learning plays a very significant role for making teaching-learning more interesting, interactive, and innovative. It was found that e-learning has various benefits as well as a positive impact on the student's performance and a better understanding of the course. It is also revealed that students had accepted the new way of learning online and they had a positive perception of e-learning (Khan et al., 2020; Mahajan & Kalpana, 2018). Almahasees et al. (2021) found that students and faculty both agreed that online learning was very useful in teaching and learning as it provides flexibility, self-learning, and convenience to the learners. Famularsih (2020) revealed that students had a positive attitude toward online learning and experienced it as a very efficient and effective way of learning in a pandemic situation. However, the students also faced various obstacles like unavailability of resources, slow networks, multiple tasks, and hard to learn all the subjects online. A similar kind of study has been conducted by Bahasoan (2020) who found that online learning is effective as well as inefficient. In the time of crises, it was very effective to implement but due to the cost constraints and connectivity problems, it was found inefficient also.

Agung et al. (2020) reported that the shift in the education sector brings various challenges for students, especially those who belong to rural areas. The study indicates that the availability of the internet, accessibility of teaching and learning media, and compatibility of tools were the major factors that affected their learning. Baticulon et al. (2021) also found that students had confronted various

PEDAGOGY OF LEARNING (POL)

International Refereed/ Peer Reviewed Journal of Education

Vol. 9 (2), April 2023 (E-ISSN: 2395-7344, P-ISSN: 2320-9526), Impact Factor: 0.787(GIF)

Copyright © 2023 Author. Views expressed in the paper are of the author only.

Web: <http://pedagogyoflearning.com>

technological barriers while adopting online learning during the time of COVID-19. Similarly, Obeidat et al. (2020) revealed that students had faced e-learning challenges during the time of pandemic and that were mostly related to technical issues but at the same time the students accepted that e-learning positively contributed to their learning outcomes as well as learning experiences. Kulal and Nayak (2020) found that students were very comfortable in online classes and getting very much support from their teachers but the study also revealed that the lack of proper training for teachers as well as technical issues had affected the effectiveness of online learning.

Azhari and Kurniawati (2020) and Rohman et al. (2020) found that students had negative attitudes towards online learning due to the less availability of technological resources as it requires a good amount of internet to access. Nevertheless, they agreed that online learning was the only solution to deal with the COVID-19 pandemic situation. Harake (2022) also found that poor internet connection is one of the major reasons for the unpleasant experiences of students towards online learning. Harefa and Sihombing (2022) also revealed that online learning was less effective in remote areas due to network and infrastructure problems.

Rationale of the study

In the era of Industrial Revolution 4.0, online learning is a complementary tool that empowers self-learning where the learners can learn according to their pace and comfort. In order to improve the quality of education and students' learning, it is important to integrate these innovative technologies with pedagogy. The use of online learning is not a new concept but with the sudden shift of covid-19 pandemic, the education system was also totally dependent on online learning as it was the only way to cope with that situation. According to a survey conducted by the National Council of Educational Research and Training, (NCERT, 2020), it was reported that 27 percent of students have no digital devices to access digital learning. It was also found that the students, faculty/staff were not familiar with online learning. The students mostly studied in government schools and poor socio-economic backgrounds faced huge difficulty in accessing online learning during lockdown. Unfortunately, this was the most challenging situation for most of the schools that did not have the technological resources and basic infrastructure to provide digital learning or online education to the students. This digital divide is more prominent in developing nations which increases techno-stress among students and teachers. The main aim of the present paper is to study the experiences of students with online learning from students' perspectives, explore the difficulties that they faced while learning online, and suggest some remedial measures for improving the quality of education with the blend of online learning. The results of the study will be helpful for the stakeholders to find fruitful solutions to the existing problems, make education more innovative with the use of technology, and take this online learning process to the next level in a more effective way.

Objectives of the study

1. To study the availability and usability of digital technologies/gadgets among secondary school students.
2. To study the perceptions of secondary school students about online learning.
3. To identify the difficulties faced by secondary school students while attending online classes.
4. To find out the remedies for improving the teaching-learning process with the blend of online learning.

Research Questions

1. What types of digital technologies/gadgets are available and used by secondary school students?
2. What are the perceptions of secondary school students about online learning?
3. What are the difficulties faced by students while attending online classes?

PEDAGOGY OF LEARNING (POL)

International Refereed/ Peer Reviewed Journal of Education

Vol. 9 (2), April 2023 (E-ISSN: 2395-7344, P-ISSN: 2320-9526), Impact Factor: 0.787(GIF)

Copyright @ 2023 Author. Views expressed in the paper are of the author only.

Web: <http://pedagogyoflearning.com>

4. What are the better remedies for improving the teaching-learning process with the blend of online learning?

Methodology

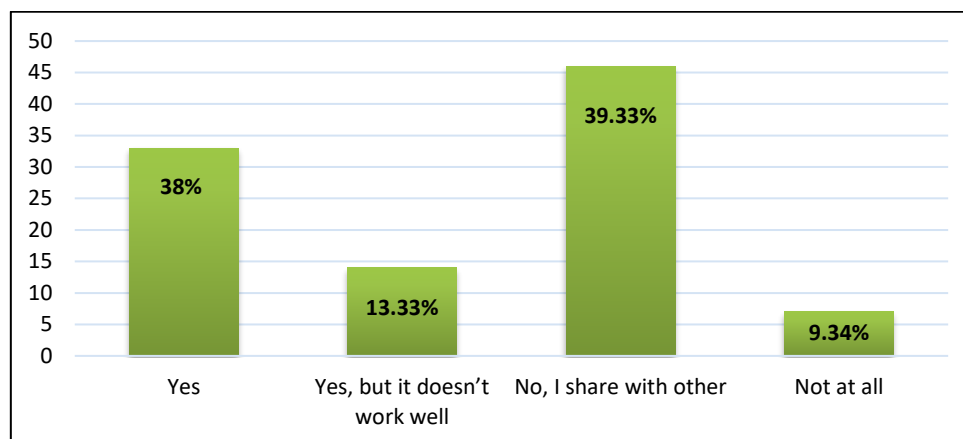
In the present study, the survey method was used to collect the data. The population was comprised of all the secondary schools (166) of the Samba district in which 15 schools were randomly selected. After that 10 students were selected randomly from each school. Thus, the data were collected from 150 secondary school students (class 10th) of the Samba district of Jammu and Kashmir.

After reviewing the comprehensive literature, the questionnaire was prepared by the investigators. The questionnaire was divided into three sections namely (1) availability and usability of digital technology (items no. 1-6), (2) perception of students towards online learning (items no. 7-10), and (3) difficulties faced by students during online learning (item no. 10-14). The questionnaire was comprised of close-ended and open-ended items that were pilot-tested among secondary school students. For the preparation of the questionnaire, face validity and content validity were established by the investigators.

Results and Discussion

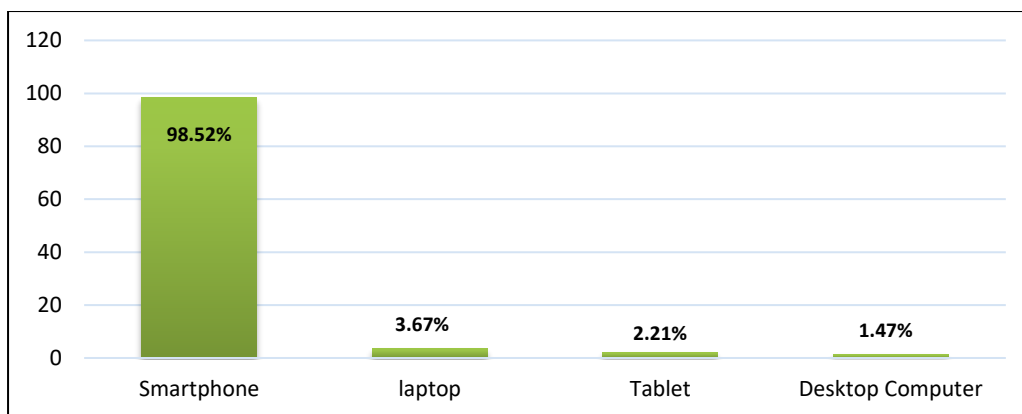
From the results of the distributed questionnaire, the findings of the study are described section-wise. The questionnaire is divided into three sections i.e. (1) availability and usability of digital technology (figure no. 1-6), (2) perception of students towards online learning (figure no. 7-10), and (3) difficulties faced by students during online learning (figure no. 11-13). Thus, the data were analyzed by using percentages as shown in the below figures:

Section I: Availability and Usability of digital technology



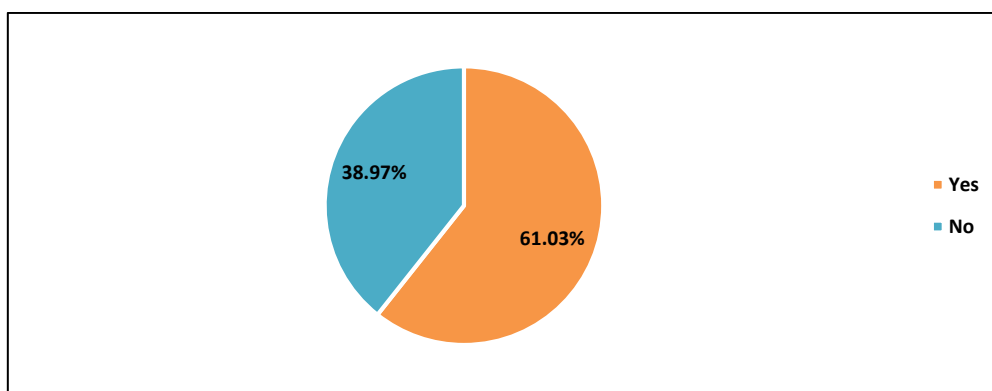
(Figure 1: Technological support for online learning. N=150)

From the above figure no. 1, it was found that out of 150, 57 (38%) students have sufficient technological support for online learning, 20 (13.33%) have technological support but it does not work well, 59 (39.33%) respondents do not have their own devices but they share the devices of their parents, siblings, friends, and relatives for the continuation of their studies, while 14 (9.34%) respondents do not have any kind of technological support for online learning. It means that out of 150, the majority of the students i.e., 136 (90.66%) had technological support for online learning.



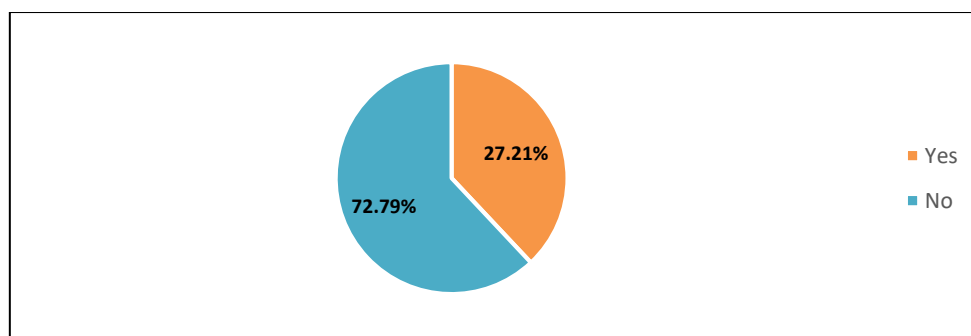
(Figure 2: Usage of Digital devices to participate in online learning. N=136)

Figure no. 1 shows that 136 students had technological support for online learning, and in the above figure no. 2, the respondents answered multiple options as per the availability of the devices and it is observed that out of 136, most of the students i.e.134 (98.52%) used smartphone for completing their education through online mode, in addition, to a smartphone, five students (3.67%) used laptop, three students (2.21%) used tablet and two students (1.47%) used desktop computer for their studies. As studied by Obeidat et al. (2020) smartphones are the most used devices to access the educational content by the students.



(Figure 3: Affordability to buy the required technical gadgets. N=136)

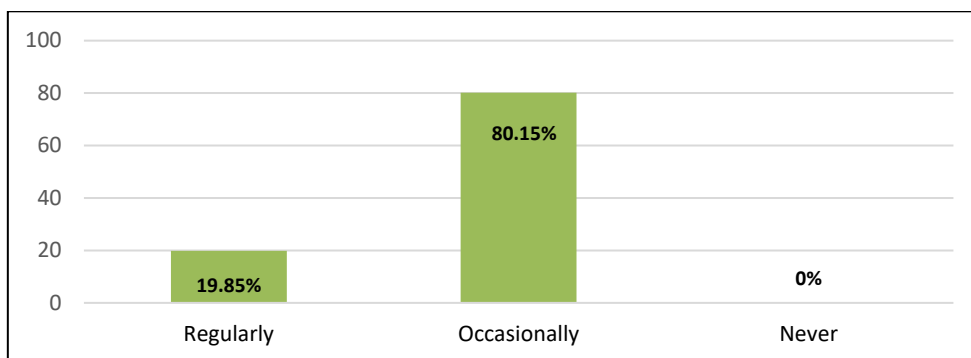
From the above figure no. 3, it was found that out of 136, 83 (61.03%) students can afford the expenditure of required technical gadgets and data for online learning whereas 53 (38.97%) students cannot afford the expenditure of required technical gadgets and data for online learning.



(Figure 4: Internet facility at home. N=136)

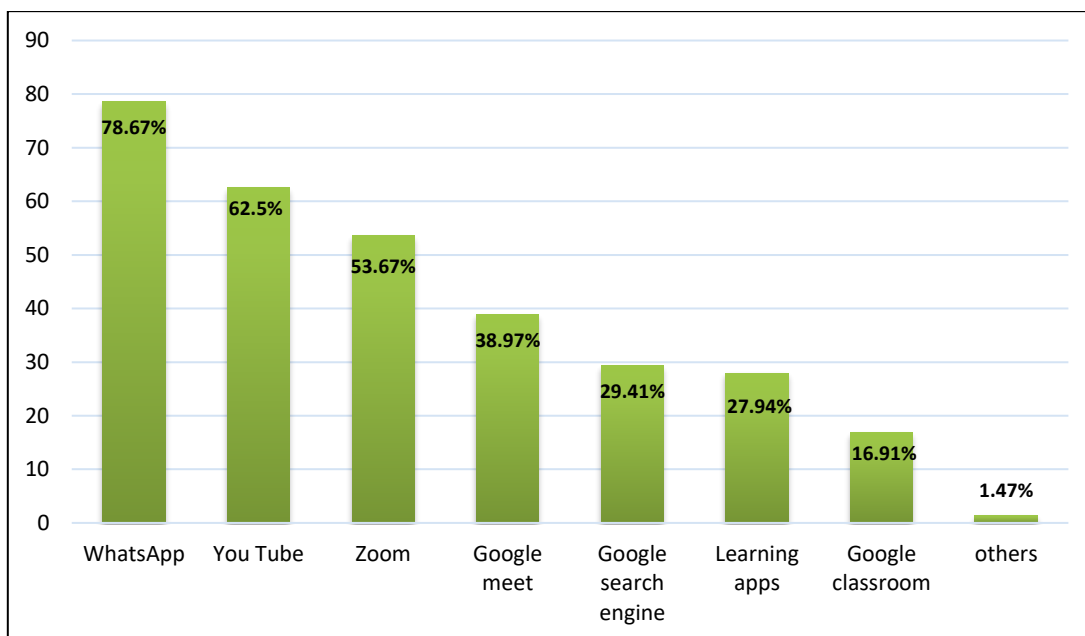
It can be noted that out of 136, 99 (72.79%) students have an internet facility at home in which they have a Wi-Fi connection, personal data packs, and broadband connection whereas 37 (27.21%)

students do not have any kind of internet facility and the reasons are the signal problem, expensive packs and some of the students claim that even they do not have digital learning devices and they do not know how to use it.



(Figure 5: Usage of online applications, N=136)

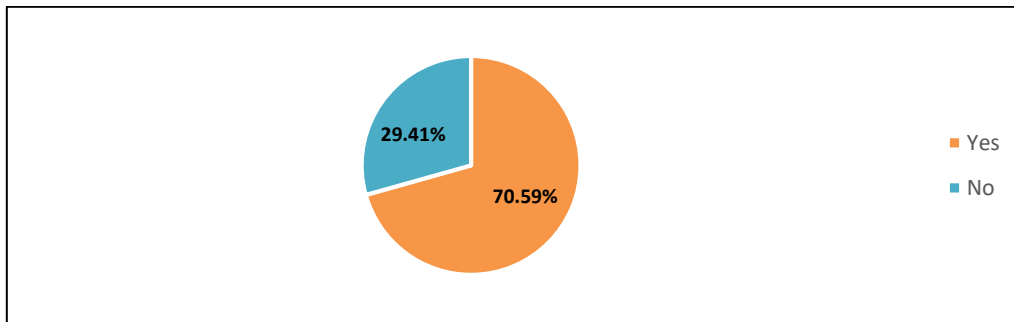
It is also observed that out of 136, 27 (19.85%) students regularly used online applications (internet browsers and YouTube) to freely access the content related to their studies, 109 (80.15%) students occasionally used online applications as per the need of their work whereas no student had never used the online applications for their study.



(Figure 6: Digital platforms used by students for online learning. N=136)

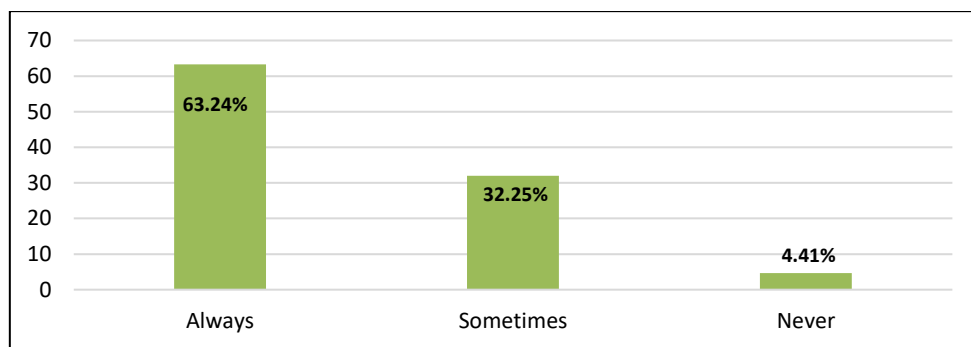
Based on the above figure no. 6, the respondents had answered multiple options as they used the various digital platforms for their online learning and it is revealed that most of the students i.e. 107 (78.67%) used WhatsApp, 85 (62.5%) students used YouTube, 73 (53.67%) students used Zoom, 53 (38.97%) students used Google Meet, 40 (29.41%) students used Google search engine, 38 (27.94%) students used different learning apps, 23 (16.91%) students used Google classroom while two (1.47%) students used other digital platforms also such as Microsoft teams for learning online. It means that majority of the students had used WhatsApp for their online learning and this may be due to the reason that WhatsApp is considered the most compatible as well as user-friendly platform that even worked well in poor signal. A study conducted by Famularsih (2020) and revealed that WhatsApp was the favourite online application during the pandemic as it requires a bit of internet quota.

Section II: Perceptions of students towards online learning



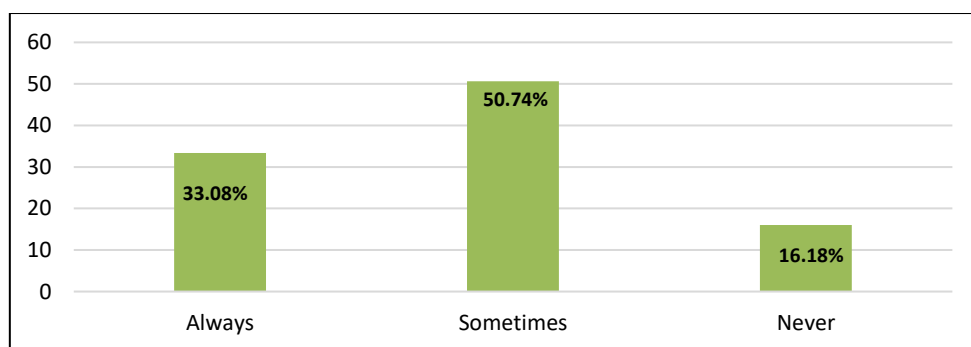
(Figure 7: Lecture delivered via online mode is easy to understand as compared to classroom learning. N=136)

The above figure no. 7 indicated that of 136, 96 (70.59%) students agreed that the lecture delivered through online mode is easy to understand as compared to classroom learning whereas 40 (29.41%) students claim that lecture delivered through online mode is not easy to understand because in classroom-learning, the student and teacher can actively interact with each other. Similarly, Yusanlita (2020) also found that online classes are easier than regular classroom classes.



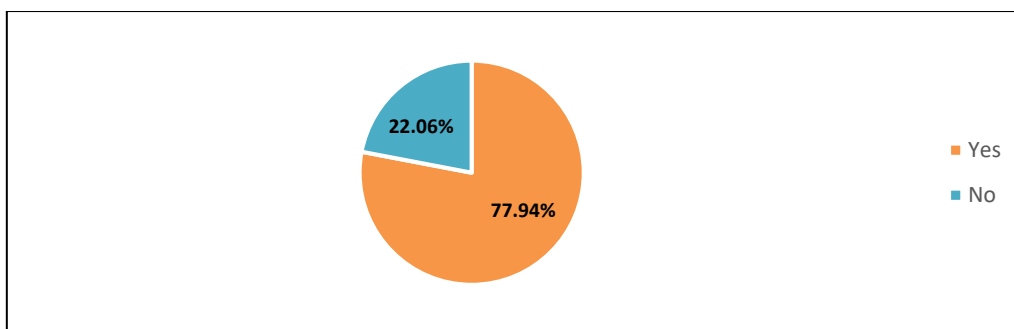
(Figure 8: Teachers instruct to switch on the video while online classes. N=136)

It also shows that out of 136, 86 (63.24%) of students agreed that their teachers always instruct them to switch on their video while in online classes, 44 (32.35%) agreed that sometimes their teachers instruct them to switch on their video whereas 6 (4.41%) students claim that their teachers do not instruct them to switch on their video while teaching online.



(Figure 9: Felling hesitation to unmute and ask questions during online learning. N=136)

It was also found that out of 136, 45 (33.08%) students agreed that they always feel hesitation to unmute and ask questions during online learning, 69 (50.74%) agreed that sometimes they feel hesitation to unmute and ask questions whereas 22 (16.18%) claims that they do not feel any kind of hesitation to unmute and ask questions during online learning.

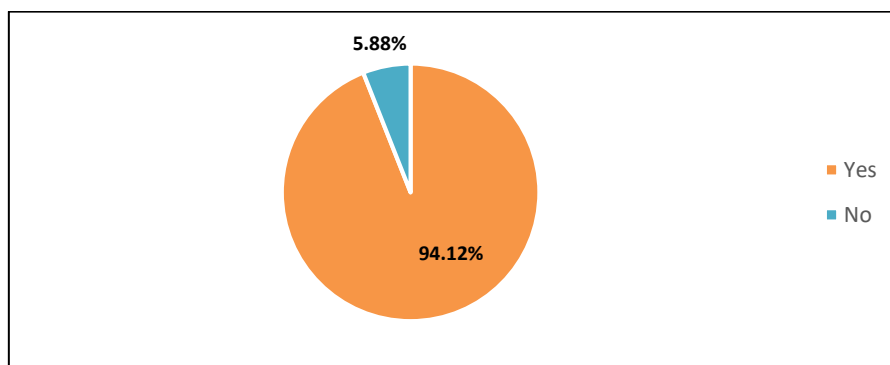


(Figure 10: Teachers give the opportunity to freely ask questions during online classes. N=136)

From the above figure no. 10, out of 136, 106 (77.94%) students agreed that their teachers allow them to freely ask questions during online classes whereas 30 (22.06%) students claim that their teachers do not allow them to freely ask questions during online classes due to the shortage of time, messages remain unattended in the chat box, skipped due to poor connectivity, missed out due to multiple messages in the chat box, less visual coverage of the whole questions and miscommunication due to the connectivity problem.

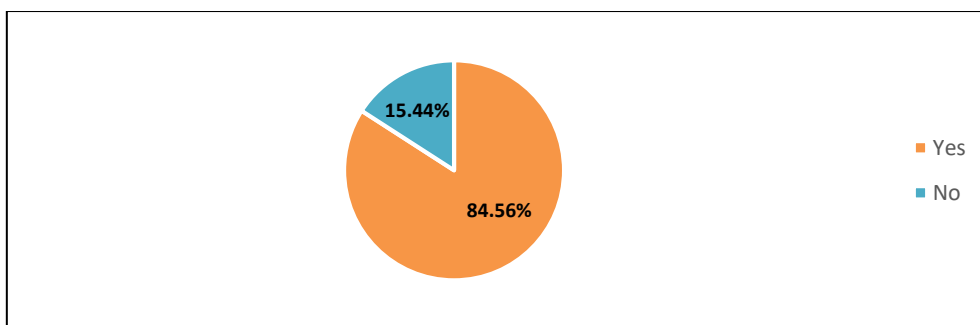
Section III: Difficulties Faced by Students During Online Learning

The study also found that the students had faced various difficulties while learning online. The connectivity problem was one of the major problems that disturbed online learning. All the students responded that the poor internet connectivity had disturbed their online learning and due to this reason, they felt inattentive, angry, frustrated, and stressed during online classes. Similarly, Nishitha and Pandey (2021) also found that network connectivity was the main problem that was being faced by most of the students.



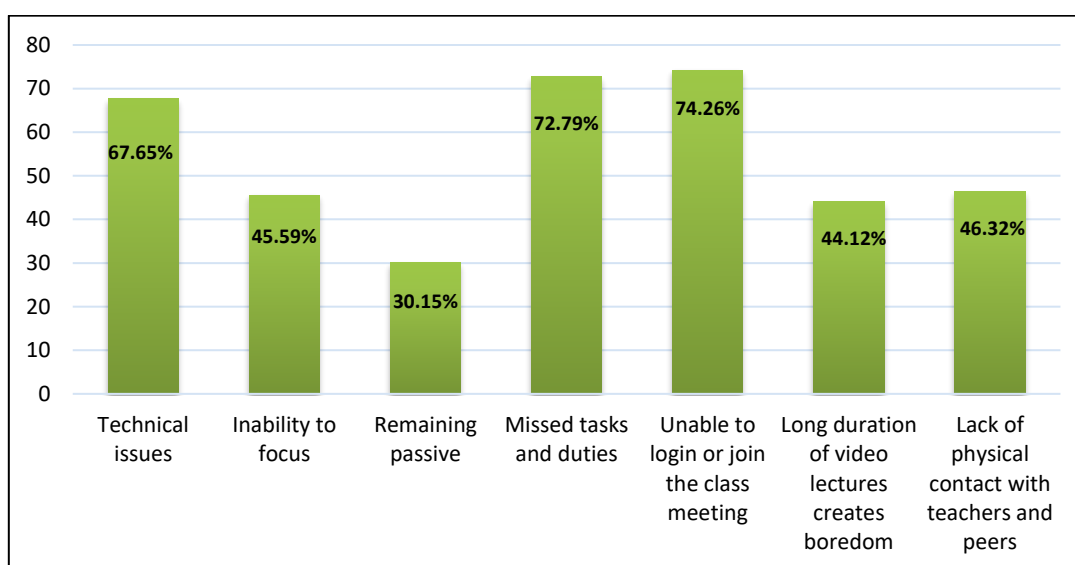
(Figure 11: Various difficulties faced by students in adapting to online learning during covid-19 pandemic. N=136)

It was also found that out of 136, 128 (94.12%) students agreed that they faced various difficulties in adapting to online learning during covid-19 pandemic i.e. lack of ICT competency, motivation, guidance, time management, parental restrictions on phone usage, difficulty to retain information and pay attention during online classes whereas eight (5.88%) students claim that they do not face any kind of difficulty in adapting online learning during covid-19 pandemic due to the reason that they are already used online platform for the academic purpose even before the pandemic.



(Figure 12: Home environment is not appropriate for online learning. N=136)

The above figure no. 13 revealed that out of 136, 115 (84.56%) students agreed that the home environment is not appropriate for learning and the reasons are the unexpected appearance of family members, the external distraction of friends and relatives, interrupted voice, pet intrusion, poor internet connectivity whereas 21 (15.44%) students claim that home environment is appropriate for learning online.



(Figure 13: Difficulties faced by the students while attending online classes. N=136)

Based on the above figure, the respondents answered various options as they faced various difficulties while attending online classes and it is observed that out of 136, 92 (67.65%) students had faced the problem of technical issues, 62 (45.59%) students were unable to focus while learning, 41 (30.15%) students remained passive during the online classes, 99 (72.79%) students have missed their tasks and duties as per the schedule of classes, 101 (74.26%) students were unable to login or join the class meeting, 60 (44.12%) students opinioned that long duration of video lectures creates boredom while online classes and 63 (46.32%) students responded that there is a lack of physical contact with teachers and peers. Famularsih (2020) also revealed that there was a lack of communication and interaction between the learner and teachers while learning online.

Remedies for Improving/Enhancing the Teaching-Learning Process

There are some remedies for enhancing the teaching-learning process with the help of online learning and these are given below:

1. Free internet facilities and better connectivity should be provided to the students as it is the main concern, and the government should provide possible solutions for the same.
2. To update the knowledge, pedagogical and technical training should be provided to the teachers.

3. Accessibility is an important factor for the success of online learning so the internet facilities should be accessible for the students as well as teachers at affordable prices, especially in rural areas.
4. Online classes should be made compulsory so that students take them seriously and attentively attend the classes as well.
5. In order to avoid misunderstanding, the teachers must use emoticons for a better understanding of the messages while interacting with the students.
6. It is also very important to check the sufficient technological support for learning online such as smartphones, computers, internet connection, etc. National Education Policy (NEP) 2020 also emphasized that once internet-connected digital resources are available in all schools and homes, education will be more interesting with the collaboration of online apps and online resources.
7. Bichronous online learning, flipped learning, and gamification should be introduced.
8. A hybrid mode of education should be adopted.
9. Orientation sessions and interactive sessions should be organized by the institutions so that students can interact with eminent personalities around the world.
10. Smartboards should be installed and digital pedagogical skills should be used to make the teaching-learning process more interactive, interesting, and innovative as also recommended by NEP 2020.

Conclusion

Based on the result of the study, the present study examines the experiences of students with online learning. As online learning is a self-paced learning that provides flexibility and comfort as per the time and space of the learner. The study revealed that majority of the students have technological support for online learning in which some of the students used the digital devices of their parents, siblings, and friends. Furthermore, the smartphone was the most used device by the students and some of the respondents agreed that they had used online applications like YouTube, internet browsers, etc to freely access the related content of their study but most of the students do not have an internet facility at their home, this is due to the reason of expensive costs and signal problems in their area. It is also found that due to poverty, they cannot afford the expenditure of digital devices. Moreover, the study also revealed that the students had faced various difficulties while learning online such as lack of ICT competency, lack of guidance, time management, lack of motivation, parental restrictions on phone usage, difficulty in retaining information, poor internet connectivity and all these problems disturbed their studies. The biggest challenge faced by most of the students was poor internet connectivity (Hermida, 2020 &Suri, 2021). However, most of the studies also indicate that online learning has many positive aspects that make the teaching-learning process more interesting and innovative. The present study also obtained some remedial suggestions from the respondents for improving the teaching-learning process with the blend of online learning. The results of the study, as well as the remedial measures, will be helpful for policymakers and educational institutions to enhance the teaching-learning process with the proper implementation of online learning in the education sector.

References

- Agung, A. S. S. N., Surtikanti, M. W., & Quinones, OP, C. A. (2020). Students' perception of online learning during covid-19 pandemic: A case study on the English students of STKIP PamaneTalino. *SOSHUM Jurnal Sosial dan Humaniora [Journal of Social Sciences and Humanities]*, 10(2), 2088-2262. <https://ojs.pnb.ac.id/index.php/SOSHUM/>
- Almahasees, Z., Mohsen, K., & Amin, O. (2021). Faculty's and students' perceptions of online learning during COVID-19. *Frontiers in Education*, 6(1). <https://www.frontiersin.org/journals/education>
- Azhari, T., &Kurniawati. (2020). Students' perception on online learning during the covid-19 pandemic. *Advances in Social Science, Education and Humanities Research*, 495(1). <https://www.atlantispress.com/proceedings/icospolhum-20/125951807>

PEDAGOGY OF LEARNING (POL)

International Refereed/ Peer Reviewed Journal of Education

Vol. 9 (2), April 2023 (E-ISSN: 2395-7344, P-ISSN: 2320-9526), Impact Factor: 0.787(GIF)

Copyright @ 2023 Author. Views expressed in the paper are of the author only.

Web: <http://pedagogyoflearning.com>

- Bahasoan, A., Ayuandiani, W., Mukhram, M., & Rahmat, A. (2020). Effectiveness of online learning in pandemic COVID-19. *International Journal of Science, Technology & Management*. <https://doi.org/10.46729/ijstm.v1i2.30>
- Baticulon, R. E., Jenkin Sy, J., Alberto, N. R. I., Baron, M. B. C., Mabulay, R. E. C., Rizada, L. G. T., Tiu, C. J. S., Clarion, C. A., & Reyes, J. C. B. (2021). Barriers to online learning in the time of COVID-19: A national survey of medical students in the Philippines. *Medical Science Educator*, 31, 615–626. <https://doi.org/10.1007/s40670-021-01231-z>
- Famularsih, S. (2020). Students' experiences in using online learning applications due to covid-19 in English classroom. *Studies in Learning and Teaching*, 2(1), <https://doi.org/10.46627/silet>
- Harake, F. E. (2022). *Secondary level students' perception towards online learning* [Master's dissertation, Lebanese International University LIU, Mauritania]. ResearchGate. https://www.researchgate.net/publication/359893167_Secondary_Level_Students'_Perception_Towards_Online_Learning
- Harefa, S., & Sihombing, G. L. A. (2022). Students' perception of online learning amidst the Covid-19 pandemic: A study of junior, senior high school and college students in a remote area. *F1000Research*, 10(867). <https://doi.org/10.12688/f1000research.52152.2>
- Hermida, P. A. (2020). College students' use and acceptance of emergency online learning due to COVID-19. *International Journal of Educational Research Open*, 1. <https://doi.org/10.1016/j.ijedro.2020.100011>
- Khan, M. A., Vivek., Nabi, M. K., Khojah, M., Tahir, M. (2020). Students' perception towards e-learning during covid-19 pandemic in India: An empirical study. *Sustainability* 2021, 13(57). <https://dx.doi.org/10.3390/su13010057>
- Kulal, A., & Nayak, A. (2020). A study on perception of teachers and students toward online classes in Dakshina Kannada and Udupi District. *Asian Association of Open Universities Journal (AAOUJ)*, 15(3). <https://www.emerald.com/insight/2414-6994.htm>
- Mahajan, M. V., & Kalpana. R. (2018). A study of students' perception about e-learning. *Indian Journal of Clinical Anatomy and Physiology*, 5(4), 501-507. <https://10.18231/2394-2126.2018.0116>
- Ministry of Human Resource Development, Government of India. (2020). National education policy. https://www.education.gov.in/sites/upload_files/mhrd/files/NEP_Final_English_0.pdf
- Nishitha, P., & Pandey, D. (2021). A study on student perception towards online education during covid-19 crisis. *Augmented Human Research*, 6(16). <https://doi.org/10.1007/s41133-021-00055-1>
- Obeidat, A., Obeidat, R., & Al-Shalabi, M. (2020). The effectiveness of adopting e-learning during covid-19 at Hashemite University. *International Journal of Advanced Computer Science and Applications (IJACSA)*, 11(12), 96-104. <http://www.ijacsa.thesai.org/>
- Rohman, M., Marji, Sudjimat, D.A., Sugandi, R.M., & Nurhadi, D. (2020). Online learning in higher education during COVID-19 pandemic: Students' perceptions. *Journal of Talent Development and Excellence*, 12(2s).
- Suri, C. S. (2021). Challenges to online education: a review. *Journal of Contemporary Issues in Business and Government*, 27(1), 1323-6903. <https://cibg.org.au/>
- Yusnilita, N. (2020). The impact of online learning: student's views. *ETERNAL (English Teaching Journal)*, 11(1). <http://journal.upgris.ac.id/index.php/eternal/index>
