

# Digital Learning: Key To Overcoming Higher Education Barriers During Covid-19

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#### **ABSTRACT**

During COVID-19 Digital learning acts a crucial role among the students and it provides Learning opportunities to the students without any hindrance. Initially people struggled to use the technology, later on all accompanied with the digital Learning process and utilised their time effectively by improving their skills with the help of online Learning. This online Learning has some benefits as well as it has some Problems too. The main aim of the study is to examine the mediating role of Digital Learning in overcoming the barriers in Education. This study uses primary data (Questionnaire) for collecting responses from the respondents. The methodology used for the study is Systematic random sampling method. Total of 120 responses are collected from the students in Erode and Coimbatore district. The variables used here are Learning Disruption, Loss of interest, prolong study, Limited Learning Facilities and Digital Learning. The findings revealed that only one independent variable (learning Disruption) has an significant relationship with the Digital Learning.

**Keywords:** Digital Learning, Covid-19, Learning Outcome, Pandemic, Learning Disruption

### **INTRODUCTION**

Globallythere is an outbreak of the Coronovirus and it has increased the gaps in all the sectors especially the education sector. Though, the Coronavirus pandemic is novel, but it already has noxious effects on humans. COVID-19 Pandemic has created great educational disruptions and global health concerns that indicates very difficult to manage by global health systems. At this time all over the nation and the world seems overwhelmed by the speed of the spread and the effects of Coronovirus. The coronavirus pandemic has no boundries and the effect is fast and large. Within a few months of the outbreak of this virus made people to stay home and changed the entire people life within a minute. So, all the people started work from home, students continue their learning through Online. It has limited the freedom of people to move, trade or associate. It was more worrisome to know that reports from various continents, including, America, Africa, Asia, and Europe indicated a daily increase in the number of new cases, and mortality due to COVID-19. As at April, 2020, the number of global COVID-19 cases has surpassed one million cases and more than 220 thousand deaths. The number of Coronavirus deaths was soaring with no immediate solutions in

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sight. The outbreak of COVID-19 affected all aspects of human activities globally ranging from education, research, sports, entertainment, transportation, worship, social gathering/interactions, economy, businesses and so on. ThisCOVID-19 has resulted in schools shut all over the world. Globally, over 1.2 billion children are out of the classroom. As a result, education has changed dramatically, with the distinct rise of Digital Learning, whereby teaching is undertaken remotely and on digital platforms. Even before COVID-19 Digital Learning acts a mediating role between students and teachers to some extent. And last 20 decade there is high growth and the adoption in education technology with global edtech investments reachingUS\$18.66 billion in 2019and the overall market for online education projected to reach\$350 Billion by 2025.

#### LITERATURE REVIEW

Radha R et al. (2020) Tells that e-learning is quite popular across the world especially during this pandemic and its going to be a trend in the future. This study has done at the initial stage of the pandemic so the further study must be carried out at the end of this year to get the better results. And the study concluded that E-learning is best suited for everyone because of its accessibility and availability. Joshi et al. (2020) identifies the huge gap that exists between the open-source versus institutional supported technologies and its implication in online teaching and assessments and the aim of the study is to know about the barriers in online learning. Zia, Adil (2020) reveals that the concept of e-learning does not allow students for combine studies so they have to be attentive and self-motivated during classes to cope up with the studies. Alawamleh et al. (2020) tells that during web based learning the opportunities should be built between instructors and students. Most of the students still preferring classroom classes than online platforms due to lack of network, lack of communication and lack of motivation. Mustafa et al (2020) establishes that the Coronavirus pandemic has adverse effects on education and also there are barriers that hinders the online learning i.e. lack of laboratories, job losses in the education sector, students debts, network issues, lack of training, lack of funding for education, and loss of learning interests among learners. It has also reduced the educational opportunities among the people. Bisht et al (2020) found that female students were highly adopted to this online learning than the male students and the students felt very less amount of pressure while taking their online examinations. Shehzadiet al (2020) showed that ICT, e-service quality and e-information quality showed a positive impact among the students and satisfaction among the students created a good brand image of universities. Singh et al (2020), R.S., Rejitha (2020) found that the students are curious to search and upgrade their knowledge through Digital learning and they should also aware about the availability of digital technologies to avoid the hindrance while usage. Chopra et al. (2019), Elfaki et al. (2019), Lin et al. (2017) insists that digitals learning helps the students in many ways by providing innovation, by improving the classroom management and it also reduces the work of teachers.

## **METHODOLOGY**

This study uses primary data (Questionnaire) for collecting responses from the respondents. The methodology used for the study is Systematic random sampling method. Total of 120 responses are collected from the students. The variables used here are Learning Disruption, Loss of interest, prolong study, Limited Learning Facilities and Digital Learning.

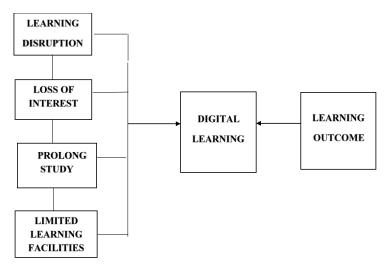


Figure - 1: Conceptual Framework

Table -1: Regression analysis on Independent, Mediating and Dependent variables

| Constructs                           | Unstandardized Coefficients |                     | Standardized<br>Coefficients | t      | Sig. |
|--------------------------------------|-----------------------------|---------------------|------------------------------|--------|------|
|                                      | В                           | Std. Error          | Beta                         |        |      |
|                                      | Direct                      | effect (Barriers or | Learning Outcome)            |        |      |
| (Constant)                           | 6.539                       | .405                |                              | 16.163 | .000 |
| LD                                   | 372                         | .125                | 271                          | -2.979 | .004 |
| LOI                                  | .005                        | .146                | .004                         | .035   | .972 |
| PS                                   | 243                         | .143                | 202                          | -1.990 | .042 |
| LLF                                  | 326                         | .144                | 266                          | -2.270 | .025 |
| Mediation effect of Digital Learning |                             |                     |                              |        |      |
| (Constant)                           | 6.085                       | .461                |                              | 13.209 | .000 |
| LD                                   | 369                         | .123                | 269                          | -2.992 | .003 |
| LOI                                  | 043                         | .146                | 034                          | 295    | .768 |
| PS                                   | 260                         | .141                | 216                          | -1.840 | .068 |
| LLF                                  | 333                         | .142                | 272                          | -2.347 | .021 |
| DL                                   | .496                        | .099                | .450                         | 2.976  | .008 |
| Dependent Variable: Learning Outcome |                             |                     |                              |        |      |
| Mediating Variable: Digital Learning |                             |                     |                              |        |      |
| R value: 0.758                       |                             |                     |                              |        |      |
| R <sup>2</sup> value: 0.574          |                             |                     |                              |        |      |

The Table No.2 reveals the relationship between independent variables and dependent variable. From the table it is identified that among the four independent variables included in the model three variables namely Learning disruption, Prolong study, and Limited learning facilities have significantly influencing the dependent variable Digital. The three variables posted a negative influence over the dependent variable. Loss of interest is a variable not showing any significant influence over the dependent variable. Since the study mainly deals with testing of mediating variable the Digital Learning included as mediating variable which has significant influence over the dependent variable.

After the inclusion of mediating variable there is a significant change in the independent variable especially Prolong Study become insignificant which confirms the mediating effect of Digital Learning on the relationship between the independent variable and dependent variable.

## PERCEPTION OF LEARNERS OF DIGITAL LEARNING DURING LOCKDOWN:

Perception will differ from person to person according to the accessibility, usage, availability of technology etc., Some are feeling happy to attend online sessions due to utilization of time. Initially, they struggled to join online classes later they are acquainted with it. People feeling lonely in classes due to the absence of their peer groups. Observed poor audio and video quality in some locality due to poor network. Students are not satisfied with their laboratory classes conducted through online. Online recordings of classes/ meetings will be helpful for the students to revise the concepts again and again to clarify their doubts for better understanding. Students want to improve their technical skills due to Digital Learning programme and requesting for provision of online Examination during Lockdown Period. Digital Learning is felt to be less systematic, less effective and less organised than the conventional system of education. So, face to face sessions are needed in some areas of subject after the end of the Lockdown. It is very helpful for women and physically challenged learners who can learn at home without any difficulties. Some feel disappointed for not having required technical knowledge to join Online learning and unable to afford technical gadgets with high-speed internet for online Learning.

The main goal of the study is to analyse the mediating role of Digital Learning, this is a trend where everything is online including semester examinations for the college going students. Though Digital learning has lot of advantages it has some barriers like Prolong study, Loss of Interest and Limited learning facilities etc..., After undergoing research it is found that Prolong study, limited learning facilities and Loss of interest has no significant impact because of Digital Learning but Learning gets disrupted because of poor network and noisy environment. Traditional Learning plays a greater role in the past years this digital Learning is a new trend among the students as well as teachers. So, it takes little time to fit ourselves to the fullest. Digital learning depends on the hands of the teachers they try to interact as much as possible like traditional classrooms and divert them from the barriers which the students are facing During Online classes.

# **CONCLUSION:**

This study reveals that there is a relationship between Digitalization and Learning Outcome. The present study conducted under an environment of fear in the society due to pandemic. Immediate shifting from regular to Digital mode was an unavoidable move. The present study reveals that students felt less difficulty and low pressure in online classes as compared to regular classes. Further, the study shows that the majority of the students have been studying on regular basis and feeling comfort with online mode. Internet connectivity and lack of interaction with friends and noisy environment are reported as some challenges and concerns for online education. Thus, it can be concluded that the online mode of learning is quite acceptable amongst students with some concerns.

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