

Impact of Covid-19 on Students: Literature Review Paper

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ABSTRACT: Almost the people of every state in India are threatened due to the speedy spread of dangerous disease namely corona virus which is life challenging. Starting from the spring of 2020, the outbreak of the COVID-19 caused universities to close the campuses and forced them to initiate online teaching. For coronavirus disease 2019 (COVID-19) pandemic, 107 countries had implemented national school closures by March 18, 2020. Covid-19 is an acute respiratory disease caused by Coronavirus Sars-Cov-2. Declared recently as pandemic disease, Covid-19 has affected educational systems worldwide. Many countries around the world have closed educational institutions to reduce the spread of this pandemic. Lockdown has impacted & caused severe issues such as breakdown in regular classes, lectures, postponement of exams etc. Due to all these situation it might cause shortage of time in the upcoming academic year. This paper examines the impact of COVID on students & highlights the major problem faced by students during lock down.

Keywords: Coronavirus, Covid-19, Educational Institutions, Lockdown, Online learning, Students

I. INTRODUCTION

Pandemics are large-scale outbreaks of infectious disease that can greatly increase morbidity and mortality over a wide geographic area and cause significant economic, social, and political disruption. Evidence suggests that the likelihood of pandemics has increased over the past century because of increased global travel and integration, urbanization, changes in land use, and greater exploitation of the natural environment.^[1] Pandemics have had great influence in shaping human society and politics throughout history. From the Justinian Plague of sixth century to the Spanish flu of last century, pandemics have triggered the collapse of empires, weakened pre-eminent powers and institutions, created social upheaval and brought down wars.^[2]

Covid-19, the new age pandemic, has created the havoc on today's world due to its communicable characteristics, and without proper treatment or vaccine it has just got worse. On March 11, 2020, the World Health Organization (WHO) declared COVID-19 a pandemic.^[3]

Coronavirus disease (COVID-19) is an infectious disease caused by a newly discovered coronavirus^[4]. The source of a disease outbreak that began in China in 2019 was found out to be a new virus which is being called as Severe Acute Respiratory Syndrome Coronavirus 2 (SARS-COV-2)^[3]. The COVID-19 virus spreads primarily through droplets of saliva or discharge from the nose when an

infected person coughs or sneezes, so it's important that you also practice respiratory etiquette (for example, by coughing into a flexed elbow)^[4]. The COVID-19 crisis has jolted the global economy with a pervasive impact on almost all sectors. It has triggered the announcement of a lockdown by several nations in an attempt to arrest the transmission risk of the disease^[5].

As of July 4, 2020, there are about 11,193,565 cases across the globe, with around 529,127 deaths. In India, there are about 649,889 cases with around 18,669 deaths^[6]. But, as historians remind us, this is neither our first nor our most deadly war with an infectious disease. A century ago, the flu epidemic of 1918 swept the globe, killing as many as 100 million people—5% of the world's population—before social distancing helped curb its spread.^[7] This flu is commonly known as Spanish flu. The 1918 flu was first observed in Europe, the United States and parts of Asia before swiftly spreading around the world. At the time, there were no effective drugs or vaccines to treat this killer flu strain. Citizens were ordered to wear masks, schools, theaters and businesses were shuttered and bodies piled up in makeshift morgues before the virus ended its deadly global march^[8]. Similar conditions can be seen across countries during Covid-19 pandemic. From schools to theatres, swimming pools to gyms, all are closed and wearing mask is also a common practice now.

Not only Spanish flu, but some recent pandemics have also caused deaths of people across different countries, just like

Covid-19, and one such pandemic is Ebola. Ebola virus disease (EVD), formerly known as Ebola hemorrhagic fever, is a rare but severe, often fatal illness in humans. It is thought that fruit bats of the Pteropodidae family are natural Ebola virus hosts. Ebola is introduced into the human population through close contact with the blood, secretions, organs or other bodily fluids of infected animals.^[9] But because it predominantly spread through bodily fluids like sweat and blood during the last stages of the disease, it wasn't as contagious as COVID-19. Prompt case finding, contact tracing and quarantine are being applied to Covid-19 as they were for Ebola. Good hygiene practices, such as hand washing, also remain applicable. The 2014–2016 outbreak in West Africa was the largest Ebola outbreak since the virus was first discovered in 1976. The outbreak started in Guinea and then moved across land borders to Sierra Leone and Liberia. The first patient was identified in December 2013 in Guinea and the first outbreak occurred on March 2014. The average EVD case fatality rate is around 50%. Case fatality rates have varied from 25% to 90% in past outbreaks.

As the global community mobilized in response to Ebola, it is clear that there is a need to better acknowledge that the spread of infectious diseases is related to the circumstances in which human society is organized. This has long been the case; human interactions with animal hosts have led to infectious disease outbreaks dating at least as far back as the Justinian Plague (541–542 AD). Thought to have killed perhaps half the population of Europe, the Plague of Justinian was an outbreak of the bubonic plague that afflicted the Byzantine Empire and Mediterranean port cities, killing up to 25 million people in its year long reign of terror. Generally regarded as the first recorded incident of the Bubonic Plague, the Plague of Justinian left its mark on the world, killing up to a quarter of the population of the Eastern Mediterranean and devastating the city of Constantinople, where at its height it was killing an estimated 5,000 people per day and eventually resulting in the deaths of 40% of the city's population^[10]. The plague episode contributed to a weakening of the Byzantine Empire in political and economic ways, akin to covid-19 pandemic induced lockdown lead to the shutdown of many businesses, which eventually affect the economic conditions of countries. All the pandemics that has occurred in the history, has affected the society and those affects has to be carried on by the citizen for the years to come.

The potential effects of COVID-19 on society, can even be compared to the Black Death pandemic. Black Death is the name given to the *Yersinia Pestis* plague that first ravaged Europe from 1347 to 1351. This was the bubonic plague which was to wipe out a third of the population of Europe, or more than 20 million people, in less than a decade.^[11] This Plague ravaged Europe, Africa, and Asia.^[10] The bacterium *Yersinia pestis* causes a number of

plagues, and is usually spread by fleas on animals like rats which can pass on the bacteria.^[12] Then as now, the infection was believed to be originated in China or nearby. The virus moved variously via the Silk Road and other land-trade routes, until sea trade brought it to the docks of Europe. Then, as now, the first major epicenter in Europe was Italy. Then, as now, the recombinant transmission was animal to human: rats were the proximate cause then, as is the bat and/ or snake or, perhaps, the pangolin today. Travel routes were the pre-eminent vectors then, as now. Fear, apprehension and hope were the dominant emotions then, as now.^[11] Medically there are huge differences: the infection in the case of the bubonic plague was caused by a bacterium, while it is a virus, the SARS-CoV-2, that precipitates the sometimes deadly symptoms of respiratory failure of COVID-19. The economic impact of the plague pandemic was devastating, with starvation rampant and riots breaking out among the poor over sheer survival needs, which is also the case in covid-19. In the country like India, migrants are the one who suffered the most in the lockdown period.

Some past flu have also resulted in the pandemic like situation, such as Asian flu and Hong Kong fu. Asian flu is the pandemic of influenza A (H2N2) in 1957-58. First identified in China in late February 1957, the Asian flu spread to the United States by June 1957 where it caused about 70,000 deaths, also known as Asian influenza. In its two-year spree, Asian Flu traveled from the Chinese province of Guizhou to Singapore, Hong Kong, and the United States. Estimates for the death toll of the Asian Flu vary depending on the source, but the World Health Organization places the final tally at approximately 2 million deaths, 69,800 of those in the US alone.^[10] If we compare the age group of people, which is mainly older than 65 years, who have died due to covid-19 and Asian flu are akin to each other.^[13] One decade later, the next of the severe pandemics emerged, the 1968 - 1970 Hong Kong flu. A unique feature of this virus was its accelerated spread due to extensive air travel, which had not been seen in previous pandemics.^[14] The Hong Kong flu is estimated to have caused between 500,000 to 2 million deaths worldwide.^[15] Influenza A subtype H3N2 is the virus which initiated the emergence of 1968 pandemic.^[16]

The way we respond to pandemic will have a direct impact on the economy. The strict public health measures which eventually disrupt economic activity which will make a much bigger blow to the economy, and the impact of covid-19 on economy is particularly brutal. The covid-19 has disturbed the normal life of the citizens along with the devastating effect on human life, which means the effect on economy will be for long period of time. Apart from the devastating loss of life, the sheer disruption to normal life means that pandemics have long been predicted to damage the economy.^[13] The impact of pandemic depends on the damage it caused to human life and how the disease is

being transmitted. Economic turns in the time of Asian flu and Hong Kong pandemics are short lived and have recovered fairly quickly. At the time of Asian flu, some schools were closed and public gatherings prohibited but these measures were carried out simultaneously across the world as has broadly been done to stop the spread of the new coronavirus. During the Hong Kong flu meanwhile, schools didn't close and factories remained open.^[13] This shows that as the severity of the disease differ so does the measure to prevent the disease.

To prevent the transmission of coronavirus, WHO has provided various measures to follow such as frequent hand washing with an alcohol-based hand rub or soap and water, avoiding touching eyes, nose, and mouth, and practicing respiratory hygiene.^[13] Restrictive measures like social distancing, lockdown, case detection, isolation, contact tracing, and quarantine of exposed had revealed the most efficient actions to control the disease spreading.^[17] Social distancing (minimum one meter) is recommended both at individual and community levels.^[18] At the community level, the most important measures for reducing infection spread rely on case detection, isolation, and contact tracing of positive cases, followed by quarantine for those exposed. Other strategies include the closure of places of mass gathering, like schools, libraries, places of worship, malls, and cinemas, and the suspension of all social events, as sports, celebrations, and meetings.^[17]

If we compare the effects of pandemics that have occurred in the past, then we will see no such strict lockdown was imposed where total shut down of social and economic activity has been applied. The International Monetary Fund (IMF) predicts that the global economy will shrink by 3% this year.^[13] The near- total shut down of social and economic activity has affected the people of all age group but due to the closure of schools and universities, the most affected section is the students . With the lockdown suspending classes at all schools, colleges and universities, the annual academic calendar has been hit hard, especially as the March-April period signifies the crucial tail end of

an academic session and this is also the time for roll outs for the new session.^[19]

The extent of impact of the lockdown on schools, community and children is proportionally very high. India has 1.4 million schools, 2.01 million children enrolled in government schools from Standard 1-8 and an additional 3.8 million children enrolled in Standard 9-10, according to the Udise report on school education in India, 2016-2017. Approximately 29% of India's population are children, and 19.29 % is in the age group of 6-14 years. This group is legally entitled to education under the Right to Education (RTE) Act, 2009^[20].

The COVID-19 pandemic may have a serious impact on the careers of this years' university graduates. They are experiencing major interruptions in teaching and assessment in the final part of their studies. They may likely graduate late due to the postponement of the final examination. Further, the graduates are going to face the severe challenges of the global recession caused by the COVID-19 crisis.^[21]

The government has come up with e-learning program^[22] Although online education cannot replace classroom education due to the personalized nature of attention and face to face interactions, it can be an effective supplement to the brick-and-mortar model of education.^[23]

The consequences of university closure potentially extending to the end of the academic year arises questions concerning grading and valuation of progress that rapidly became a significant policy challenge. An additional problem is how to determine if students in their final school year can study adequately or be assessed fairly in terms of accessing higher education programs.^[24]

The shift to online learning looks set to continue at least until the advent of a successful vaccine for COVID-19.^[25] The COVID-19 pandemic may be just the 'tipping point' for reform of the Indian education system.^[23]

In this review, we will highlight the potential impact of the lockdown on students and on their Education.

II. OBJECTIVE OF THE STUDY

1. To assess the impact of covid-19 induced lockdown of educational institutions on students.
2. To consider the various possible solutions or alternatives that can enhance the remote learning experience of students.

III. RESEARCH METHODOLOGY

This study is aiming to analyze the impact of COVID-19 on students and on their education, when the government has taken early decisions to breakdown the spread of virus among the community. The study is descriptive in nature where the data has been collected from the various official websites, newspapers, E-news articles and Research paper. Some of the Research Paper's contributions in this study are:

<u>NAME OF THE JOURNAL</u>	<u>AUTHOR</u>	<u>NAME OF RESEARCH PAPER</u>	<u>CONCLUSION</u>
Purakala (UGC Care Journal) ISSN: 0971-2143 Vol-31- Issue-21-May-2020	Akash Gupta Mala Goplani May, 2020	IMPACT OF COVID-19 ON EDUCATIONAL INSTITUTIONS IN INDIA	<ul style="list-style-type: none"> a. This paper mainly address the aftermath of closure of Educational Institute on Students, and explain with the help of evidences what all steps have been taken by the government for the safety for students. b. It emphasizes the importance of digital learning with help of DIKSHA, E-Pataskala, National Repository of Open Educational Resources (NROER) and for Higher Education- SWAYAM, SWAYAM PRABHA.
Cureus Journal of Medical Science DOI: 10.7759/cureus.7541	Pradeep Sahu April04,2020	Closure of Universities Due to Coronavirus Disease 2019 (COVID-19): Impact on Education and Mental Health of Students and Academic Staff	<ul style="list-style-type: none"> a. This paper conveys that in the emerging and ever-changing COVID-19 context, proper counseling services should be available to support the mental health of all. b. Students and staff should receive regular information through emails and university intranets. c. Authorities should take the responsibility of international students. d. Faculty members should embrace technology and pay careful attention to student experiences to make the learning rich and effective.
AEGAEUM JOURNAL ISSN NO: 0776-3808	Dangi Ravi Rai , Dewett Parul & Joshi Pallav July, 2020	Stress Level and Coping Strategies Among Youth During Coronavirus Disease Lockdown in INDIA	<ul style="list-style-type: none"> a. This paper reflects the psychological effect of Covid-19 on youth as the lockdown has increased the anxiety level among people of all age, including youth. They are worried about financial stability and future job prospects, due to the loss in studies. b. These all things lead to cause disturbance in their mental state and, change in their behavior. c. The conclusion of the study is that students are having the stress level at severe level and by the increasing days stress level is also increasing.
Pedagogical Research 2020, 5(4), em0063 e-ISSN: 2468-4929	Cathy Mae Toquero April 11,2020	Challenges and Opportunities for Higher Education amid the COVID19 Pandemic: The Philippine Context	<ul style="list-style-type: none"> a. This paper talks about the higher education worldwide being affected due to the COVID-19 pandemic. b. Educational institutions are presented with surmounting challenges in its system of planning, implementation, and assessment. c. The global pandemic opened up opportunities to the country to upgrade its educational mode of delivery and transfer its attention to emerging technologies. d. Higher education institution thereby needs to seize the opportunity .
Pedagogical Research 2020, 5(4), em0060 e-ISSN: 2468-4929	Giorgi Basilaia , David Kvavadze	Transition to Online Education in Schools during a SARS-CoV-2 Coronavirus (COVID-19) Pandemic in Georgia	<ul style="list-style-type: none"> a) This paper specifically address the Georgia case where in author takes the data of first week of online teaching and draws conclusion on that it will be successful. b) Author further discusses that skills gained in these times will be useful in the coming future as the world is becoming digital now.
Minerva Pediatrica	Ritwik Ghosh et al.	Impact of COVID-19 on children: special focus on the psychosocial aspect	<ul style="list-style-type: none"> a) This paper throws light on the psychological aspect of children due to covid-19. b) Author elucidates that Children of single parent and frontline workers suffer unique problems. c) Author also throws light on the topic of domestic violence, child abuse, adulterated online contents are on the rise d) Author also talk about the disturbance in children usual routine which will eventually lead to mental health issues.

<p>AQUADEMIA 2020, 4(1), ep20016 ISSN 2542-4874 (Online)</p>	<p>Aziz Naciri et al</p>	<p>Mobile Learning in Higher Education: Unavoidable Alternative during COVID-19</p>	<p>a) This paper evaluates the effectiveness and usefulness of Mobile Phones in these unprecedented times. b) Author in this paper discusses that mobile learning helps students to develop technological skills, conversational skills, find answers to their questions, develop a sense of collaboration, allow knowledge sharing, and hence leverage their learning outcomes.</p>
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IV. CHALLENGES FACED BY STUDENTS DURING COVID-19

Here are the challenges students across the world is facing due to the outbreak of covid-19:

1. Assessment and Evaluation

Several universities have already suspended the semester-end final examinations, whereas continuous assessment will go on along with the online classes. The transition from face-to-face teaching to online delivery has a serious impact on assessments and evaluation. Although technology has been used earlier to support teaching and learning, the assessment aspect is often under-developed [29]. Applying assessments online on those courses designed for face-to-face learning is a challenging task. Students, as well as faculty, are uncertain about the procedure for administrating outstanding assignments, projects, and other continuous assessments [30-31]. Faculty members have to change the assessment types to fit online mode. It is difficult to monitor how they are taking it online and to ensure that students are not cheating during online tests. [32] Again lab tests, practical's, and performance tests are not possible to conduct online. In addition, students who do not have an Internet facility will suffer a clear disadvantage while participating in the evaluation process, which would adversely affect their grade point averages (GPAs) [33]. Examinations cannot be conducted online. It is not only just the question of imparting continuous and uninterrupted learning during the outbreak of COVID 19 pandemic but also the most important challenge for the instructor is to focus on the overall elements of a well-developed course. [26]

2. Employment

The bigger concern, on everybody's mind is the effect of the disease on the employment rate. Students those have completed their graduation may have fear in their minds of withdrawal of job offers from the corporate sector due to the current situation. The Centre for Monitoring Indian Economy's estimates unemployment shortage from 8.4% in mid-March to 23% in early April. In the urban unemployment rate is 30.9%. [27] They are likely to graduate at the beginning of a major global recession. Evidence suggests that poor market conditions at labor market entry cause workers to accept lower paid jobs, and that this has permanent effects for the careers of some.

3. Mental health

The COVID-19 crisis highlights that school fulfils not only an educational mission of knowledge acquisition, but it also satisfies the socialization needs of young people. About 24.9% of students have experienced anxiety because of this COVID-19 outbreak. [37] Students' mental health is greatly affected when faced with a public health emergency, and they need attention, assistance, and support from the community, family, and tertiary institutions. This stress may lead to unfavorable effects on the learning and psychological health of students. International students staying far from home are not only worried about their health, safety, and education but they also have a huge number of concerns for the wellbeing of their families

4. Shifting from Face-to-Face to Online Classes

According to Moore, Dickson-Deane, & Galyen (2011) Online learning is learning that uses internet networks with accessibility, connectivity, flexibility, and the ability to bring up various types of learning interactions [36]. The pandemic has transformed the century's old, chalk-talk teaching model to one driven by technology. Online teaching is not a new mode of delivery for any university. Many faculty members get training to use online learning platforms either as the only delivery mode or as an add-on to face-to-face teaching [38]. The lockdown crisis has forced us to adopt online learning mode without any preparations. The educators and students are strangled with the basics like internet connectivity and unpredicted power cuts. Also, the educators are under tremendous stress in solving structural issues like teaching methods and deliverables. The new learning system has also resulted in increased working hours for the educators, inviting more pressure. Many students also try to skip classes, as the teacher are not able to ensure 100% attendance. Many parents don't have a spare computer or a laptop at home, as they themselves are busy working from home. This forces the students to struggle with attending the classes over smartphones.

5. Great digital divide

Low-income private and government school may not be able to adopt online teaching methods. And as a result, there will be completely shut down due to no access to e-learning solutions. [27] Rural area students do not have the

required infrastructure nor are financially strong to avail the resources required for digital education. Building of the digital education infrastructure by the Government of India presently appears to be difficult due to lack of budget. Further, even if the digital infrastructure is built, training has to be given to the teachers to use the digital system to provide authentic and proper, uninterrupted and seamless education to the students. Remote learning increasingly relies on the reliable power supply and ubiquitous Internet connectivity which might be a far-fetched thing for Tier 2 and Tier 3 cities in India.^[26]

6. Vernacular content

There are bigger problems to solve. Adapting to online education is easier for English medium students and teachers due to the ready availability of tools or content. The situation is opposite in vernacular languages that dominate the Indian school education scene. Only a few ed-tech firms provide vernacular content.

7. Exacerbate food insecurity

The worst consequences of this temporary shutdown are experienced by the most vulnerable children who already rely on school for educational, nutritional, and health needs due to their socioeconomic disadvantages or disabilities and because of such condition economic and social stress will tend to increase.^[27] For many students living in poverty, schools are not only a place for learning but also for eating healthily. Research shows that school lunch is associated with improvements in academic performance, whereas food insecurity (including irregular or unhealthy diets) is associated with low educational attainment and substantial risks to the physical health and mental wellbeing of children. The number of children facing food insecurity is substantial.

8. International Higher Education

A large number of Indian students—second only to China—enroll in universities abroad, especially in countries worst affected by the pandemic, the US, UK, Australia and China. More than one million Indians were pursuing higher education programs overseas as of July 2019, according to India's foreign ministry. The reason of the students for selecting foreign institution is that they want to have an exposure of campuses, culture and social life and also some of the students want to settle there after the completion of their education. So, spending several lakhs just to attend the online class is unfair. The universities are not willing to reduce the tuition fees. If the situation persists, in the long run, a decline in the demand for international higher education is expected.

9. Passive Learning by Students

E-learning is likely to witness a high dropout rate due to the lack of atmosphere for studying. Students might tend to get distracted by gaming consoles, social media at home

and might not feel a sense of community while taking online classes. Successful delivery of education is also in question because learning at the level of higher education and learning at the kindergarten/school level can be different. Digital education cannot be applied the same at every level of the education.^[26] The sudden shift to online learning without any planning -- especially in countries like India where the backbone for online learning was not ready and the curriculum was not designed for such a format -- has created the risk of most of our students becoming passive learners and they seem to be losing interest due to low levels of attention span.^[41]

It is the right time for faculty, students, and administrators to learn from this critical situation and to overcome these challenges. Online learning could be a greater opportunity as a result of this crisis. Students are young and energetic, and they are capable of learning through the online platform. Faculty can motivate the younger minds and draw them into active participation. University authorities should encourage students and faculty to stay connected through the online or any social media platform and move forward together during this extremely difficult time.^[43]

V. POSSIBLE ALTERNATIVES OR SOLUTIONS FOR INTERRUPTED EDUCATION DURING COVID-19

1. Changes in curriculum:

What curriculum should teachers use for remote learning during the COVID-19 crisis? The educational institutions need to implement their curriculums in such a way which makes students aware about the pandemic diseases like corona-virus, swine flu, and so on which will be helpful for the students who are the future of our country, and also they would know how to tackle with such disastrous situations. While there is a discretion given to the teachers of what to be included and how to conduct those classes but one cannot completely change the curricula. So teachers have to keep in mind the varied objectives, such as the national curricula has to be taught for the assessment/examination students are preparing for, also it is important on the end of teachers to conduct some activities or assignment so that student's interest can be maintained, and some initiatives should be taken with regard to the psychological health maintenance.

2. Free Educational Platforms should be used:

A complete revolution in the way we learn today has been brought about by Technology. Each student gets in contact with a world-class education, which is not easy to impart by the traditional white chalk and blackboard method of teaching. This new learning is more interesting, personalized and enjoyable. A massive open online course (MOOC) is an online course aimed at unlimited participation and open access via the web. India is

considered to be the biggest market for MOOCs in the world after the USA. Since the population of India is huge, massive open online course (MOOC) is said to open gateways for a lot of Indians in terms of bringing an educational revolution. Online distant learning programs give a great opportunity to avail high-quality learning with the help of internet connectivity.^[22]

3. Use asynchronous learning

Teachers should work with what they know. Giving full attention to reassuring students is more important than trying to learn new pedagogy or technology on the fly. The most important adjustment, for those used to teaching in classrooms in real time, is to take advantage of asynchronous learning. For most aspects of learning and teaching, the participants do not have to communicate simultaneously. Asynchronous working gives teachers flexibility in preparing learning materials and enables students to juggle the demands of home and study. Asynchronous learning works best in digital formats. Teachers do not need to deliver material at a fixed time: it can be posted online for on-demand access and students can engage with it using wikis, blogs, and e-mail to suit their schedules. Teachers can check on student participation periodically and make online appointments for students with particular needs or questions. Creating an asynchronous digital classroom gives teachers and students more room to breathe.^[39]

4. Eliminate digital divide

The elimination of digital divide can be done with the help of reforms in the ED Tech that is the integration of technology in the present Indian Educational system. The problem of power supply in the rural and semi-urban places should be improved and with the help of power supply, digital skills of teachers and students, internet connectivity it is necessary to explore digital learning, high and low technology solutions. Some measures which have been or which can be taken includes:

- Bharat net is connecting all the villages with high-speed broadband network. Part of the project connecting remote areas in North-East India is already complete. Ensuring digital connectivity, therefore, may be easier.^[40]
- The 2011 project to distribute cheap 'Akash' tablets to promote e-learning in villages was unsuccessful due to quality and procurement issues. The scheme can be revived in rural areas by the state governments. States like Tamil Nadu have started distributing tabs to students for studies.^[40]

5. Explicit Instructions should be given:

Explicit instructions should be given to the students as well as teachers about examinations and assessments to

avoid stress and anxiety. Students are concerned amid widespread fears that the outbreak will adversely affect their exam performance. Clear directions should be given to them regarding the procedures for administrating mid-term exams, assignments, and projects ^[34] Faculty members, with the respective heads, should frame a flexible assessment guideline to keep in mind that students are not at a disadvantage.^[35]

6. Flexibility should be given to sick:

If any student is not able to attend a course online due to illness or any disturbance, universities should remain as flexible as possible to ensure that he or she will not get any negative impacts in terms of grading.

7. Continuation of School Provided Meals:

The continuation of school provided meals is essential in preventing widespread food insecurity. The Ministry of Human Resource Development (HRD) had asked states and union territories to ensure the continued supply of mid-day meals to students despite the closure of schools around the country to check the spread of coronavirus. The suggestions offered were delivering packaged meals or the equivalent amount of food grains to students at home, or depositing money in the bank accounts of their parents. The governments in different states quickly stepped up, with Assam, West Bengal, Karnataka and Andhra Pradesh — as well as the union territory of Jammu and Kashmir — announcing that they will ensure the delivery of mid-day meals to students.^[42]

8. Training programme for teachers

The training program should be organized as quickly as possible for the faculty members to tackle the online learning platform. ^[38] This force experimentation will guide universities around the world to upgrade their technical infrastructure and make online a core aspect of teaching and learning.

VI. LITERATURE REVIEW

Studies in the literature review demonstrate the need for readiness of countries in the cases of the pandemic in the direction of education

1. IMPACT OF COVID-19 ON EDUCATIONAL INSTITUTIONS

Akash Gupta and Mala Goplani (May 2020) has stated varied steps taken by different institutions, such as UGC, MHRD, CBSE, GOI etc, in our country to prevent the spread of Covid-19,. They further elucidate the need of social distancing. They admired the early step of school closure order to contain the disease, and advices teachers as well as students to actively participate in the online classes and students should practice the same in spare times. Teachers should motivate the students so that they don't lose their interest.

Andria Praghlapati (May 6,2020) is of the view that learning must be carried out with scenarios that are able to minimize physical contact between students and other students, or between students and lecturers and thus, found online learning the best way to minimize physical contact. Author also pointed that students are facing anxiety disorders and thus, early help are required for them. Author also stated different stress coping strategies that will be helpful for the students.

Simon Burgess and Hans Henrik Sievertsen (01 April 2020) made an effort to point out how schools are important not only in terms of education but the way they help the children to cultivate social skills and social awareness and thus increases child's ability. The Author pointed out that help from families depends on their existing knowledge and thus create the gap of learning between different students. Author suggest that school should postpone the exams rather than being cancelled and policies should be framed to support the entry of new graduates in the market to avoid unemployment.

Talha Khan Burki (June 2020) raises question about whether institutions can justify a fee structure predicated on a model of face-to-face contact as university is just more than a tuition and thus it will be difficult for universities to sustain on same level of fee. Author further emphasize that online learning is no substitute for laboratory work by giving the example of medical school.

2. Closure of Universities Due to Coronavirus Disease 2019 (COVID-19): Impact on Education and Mental Health of Students

Pradeep Sahu(April 2020) have explained the various challenges faced by different universities due to the Covid 19 outbreak and thus, motivate the faculty, students, and administrators to learn from this critical situation and to overcome these challenges. He emphasized on mental health support by updating the health guidelines and providing online guidance and lectures to offer strategies for managing stress when coping with the pandemic. He also highlighted that authorities should take the responsibility of ensuring food and accommodation for international students and faculty members should embrace technology and pay careful attention to student experiences to make the learning rich and effective.

Dangi Ravi Rai, Dewett Parul and Joshi Pallav (2020) has collected the data of people of different age group and find out the stress relation with their age. Also, pointed out that students are facing stress due to loss in studies and further elucidates the different practices participants adopt to cope with the stress level.

Joyce Lee (June 2020) examined certain participants to know their mental health condition stability during lockdown and find out that it has triggered or made their condition worse, especially children. Author suggested that

school routine is one of the medium that help them to be stable and thus, author points out that creative ways, such as online speech and social skills training, can help to some extent. Author is also worried that child abuse may increase as happened in previous pandemics. Author urges to support children and adolescents facing bereavement and issues related to parental unemployment or loss of household income.

3. Challenges and Opportunities for Higher Education amid the COVID19 Pandemic

Cathy Mae Toquero (April 11, 2020) has emphasized, with reference to Philippines situation, on the need to strengthen the educational planning. Also the paper recommends various higher education institutions to seize the opportunity to strengthen its evidence-based practices, provide accessible mental health-related services, and make the curriculum responsive to the needs of the changing times.

Wei Bao (March 20,2020) has presented a comprehensive six instructional strategies, with reference to Perking University, to improve students' learning concentration and engagement in order to achieve a smooth transition to online learning which includes preparedness plans for unexpected problem, dividing the content into smaller parts, focusing on the voice factor, working with teaching assistants and gain online supports from them, strengthening students' active learning ability outside of class and at last combining online learning and offline self-learning effectively.

Giorgi Basilaia and David Kvavadze(April 9,2020) has discussed, with reference of Georgia, about the system and the skills that were gained by the teachers, students and school administration can be used in the postpandemic period, in case of missing lessons or other similar special cases like the current one and further highlight the problem of grading.

4. COVID-19 Pandemic: Impact and strategies for education sector in India

Richa Choudhary (April 16, 2020) has focused on a well-rounded and effective educational practice is what is needed for the capacity-building of young minds. It will develop skills that will drive their employability, productivity, health, and well-being in the decades to come, and ensure the overall progress of India.

Annamaria Colao et al.(May 25,2020) highlights that school fulfils not only an educational mission of knowledge acquisition, but it also satisfies the socialization needs of young people as well as nutritional and health needs of children who belongs to socioeconomic disadvantaged section. Author further emphasized on the promotion of health education among schools. Author

believes that schools should include cooperative learning and participatory learning.

5. How will COVID-19 change our schools in the long run?

Douglas N. Harris(April 24,2020) has compared the current situation with the Hurricane Katrina in New Orleans and how it has transformed the education sector in New Orleans. The Author reveals how online platform is proved to be a boon and establishes the changing role of teachers, students, parents and school as a whole and also infer from the Katrina that the changes will be for long period.

Sir John Daniel (April 20,2020) has elaborated how different students will have different needs which require different approach to deal with. Authors also provided a brief review regarding asynchronous learning and how it is proved beneficial and also pointed out the success of open schools and open universities.

6. Mobile Learning in Higher Education: Unavoidable Alternative during COVID-19

Aziz Naciri, Mohamed Amine Baba, Abderrahmane Achbani, and Ahmed Kharbach(April30,2020) is of the view that mobile devices are ubiquitous and helps students to develop technological skills, conversational skills, find answers to their questions, develop a sense of collaboration, allow knowledge sharing, and hence leverage their learning outcomes. Thus, states that the transition went successful.

VII. CONCLUSION

A problem of COVID-19 started from Wuhan city of China affected around 200 countries in the world including India. Because of COVID-19 there was lockdown imposed in almost each affected country to prevent their residents as the situation needs social distancing to stop the spread of the virus among residents. In India, the various Institutional bodies and Governments have taken timely decisions to prevent their stakeholders from the spread of pandemic disease COVID-19 and thus, schools and universities has been shut down in a limited span of time to enforce social distancing. We all know that educational institutions are exposed to the mass gatherings and thus, the risk of spread of virus is high. Unless the infection wiped out completely, it will be unsafe to resume the educational institutions. Due to this, educational institutions are facing challenges in a system of planning, implementation, and assessment but if we see the other side of it, this global pandemic has opened opportunities for countries to upgrade its educational mode of delivery and transfer its attention to emerging technologies.

Therefore, Schools and Universities have to apply new methods to overcome this challenge. One such method is Online learning which is proving to be a boon to the

education institutions. Education institutions thereby need to seize the opportunities to strengthen its evidence based practices, also have to make curriculum responsive to the changing needs of changing times that is, in accordance with the online learning which will be understandable to all students. Students and staff should receive regular information through emails and university intranets. As everything is commencing through online portal so teachers should be given training as some people are luddite, for this students and staff should receive regular training and mentorship The health and safety of students and staff should also be taken care of. Various online platform should be used in order to gain skill based knowledge (such as NPTEL, SWAYAM, coursera, MOOCS etc). Qualitative assessment should be given priority rather than quantitative one. Government should intervene in order to eliminate the digital divide as all children whether rich or poor has the right to get education. Mental health should be considered as priority of students. Universities must consider the needy students and try to provide them financial support. Universities, governments, banks, and student loan companies should support graduates in various ways, including direct case support and temporary suspension of students' loan payment.

In view of the extraordinarily large scale of online education, it is necessary to make contingency plans in advance for addressing possible problems such as the traffic overload issue of the online education platform. In online teaching there is no physical presence of the teacher so teachers should make their session interactive by asking questions in between to create more interest of the students. Furthermore, since this online teaching "migration" is implemented quickly during the outbreak of COVID-19, students' anxiety needs to be relieved in various ways to ensure that they can actively and effectively engage in online learning.

This pandemic will surely change the traditional chalk-board education into that of technology based and will teach each and every one a lesson of embracing new things with respect to the conditions. Online Education is the new form of education in India and hence, will take some time to be accepted. We can call it an epochal event. It will going to leave a huge impression on the education sector in India.

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