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RESEARCH ARTICLE

TRENDS AND ISSUES OF BLENDED LEARNING WITH REFERENCE TO COVID 19 PERIOD

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Abstract

The trend of E -Learning has drastically increased in the recent times, especially with the onset of the Covid 19 Pandemic. Infact, the pandemic has popularised blended and technology aided learning as household terms. It also promoted an ideology that not only legitimises but also celebrates the use of technology in teaching students. When schools and colleges were shut down and teachers and students had to be confined to the four walls of their homes, technology provided an instant and convenient solution of teaching students irrespective of their physical locations. It is undeniable that technology did ensure continuity in student learning as much as was possible. Blended learning is one of the major tools to implement E-Learning. This paper will give an overview of the concept, features and benefits of Blended Learning. It will also describe the various Blended Learning Models, ICT initiatives and tools that had been be useful for teachers to keep the teaching learning process running especially during the Covid 19 period. This paper will look into the issues and challenges faced both by teacher and students in using blended learning during the Covid 19 period along with suggestions.

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Introduction:-

The progression of the Digital advancement and use of Information Technology is a remarkable change that is being experienced in the field of Education. Mobile Learning and e- Learning already support and accelerate the teaching and learning process with the use of modern technologies. Blended Learning or Hybrid Learning is a result of advanced technology-based learning system. Blended learning can be defined as an amalgamation of multiple approaches to pedagogy/ teaching; self- paced, collaboration, tutor supported learning or traditional classroom teaching. It refers to the use of resources which combine e- learning with other educational resources. Basically, Blended learning is a mixture of teaching or facilitation methods, learning styles, resource formats, a range of technologies and a range of expertise. According to Graham. Ch et al (2009) "Blended learning is strategic combination of online and in -person instruction." John Watson stated "Blended learning combining best elements of online and face- to -face education, is likely to emerge as the predominant teaching model of the future." "Blended learning is the thoughtful integration of classroom face-to- face learning experiences with online learning experiences" claimed Garrison and Kanuka (2004). "Blended learning combines online instruction components with those found in traditional face-to- face instructional environments" argued Dr. Ranjana Bhatia. From all of the above definition it can be concluded that Blended learning is the combination of face- to -face traditional learning with technology and Distance learning.

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The important features of Blended Learning environment are:-

1. Improved students' engagement in learning
2. Boosted students and teachers' interaction
3. Time management and flexibility
4. Enhanced students learning outcome
5. More flexible teaching- learning environment
6. More amendable for self and continuous learning
7. Better opportunities for experiential learning
8. Enhanced institutional reputation

Blended - Learning Concepts:-

Blended learning concerns different methods along with different theories of learning and applies these theories by using traditional and advanced technology. It affects different levels:

- a. **Theoretical level** (combining different theories of learning like Constructivism, Cognitivism, Behaviourism)
- b. **Methodical level** (combining self-directed with instructor- led learning, individual with cooperative learning, receptive with explorative learning, etc.)
- c. **Level of media** (combining face -to- face with online learning using different media, like books, video, CBT, etc.)

Literature of Blended learning:-

Chen and Jones (2007) conducted a study on blended learning Vs. traditional classroom teaching setting. The result of this study reveals that students in Blended learning class indicate that collaborative group work was more effective and satisfying the need of the learner when compared to the conventional setting. In the same time students in the traditional classroom setting was also improved and satisfied with the ability of quality interaction during face -to -face meeting. The result of the study suggests that both delivery method has improved the performance of the students but blended learning environment students indicated stronger analytical skills as a result of the course when compared to traditional method.

Harris P. Connolly (2008) studied on Blended learning and its successful implementation and proves that blended learning has the potential to overcome several of the disadvantages of both traditional methods and e- learning it is important to recognize its limitations.

Kwak, Menezes & Sherwood (2013) conducted a study which compared blended learning with traditional face- to -face learning and indicated that learners perform equally well in blended learning and their performance is unaffected by the delivery method.

Dr. R. Jayanthi (2019) conducted a study on Blended learning -its importance and concept and found that Blended learning environments to be an important part of the future of both higher education and cooperate training. It provides students with time flexibility and improved learning outcome. The blended learning offers the open way for many students who get through the physical and cultural barriers in the education.

Muxtorjonovna M.A. (2020) studied the significance of Blended learning in Education System and found that blended learning is an effective way of teaching that is flexible and easy to access. Also, it can increase students' motivation and their achievement of the course.

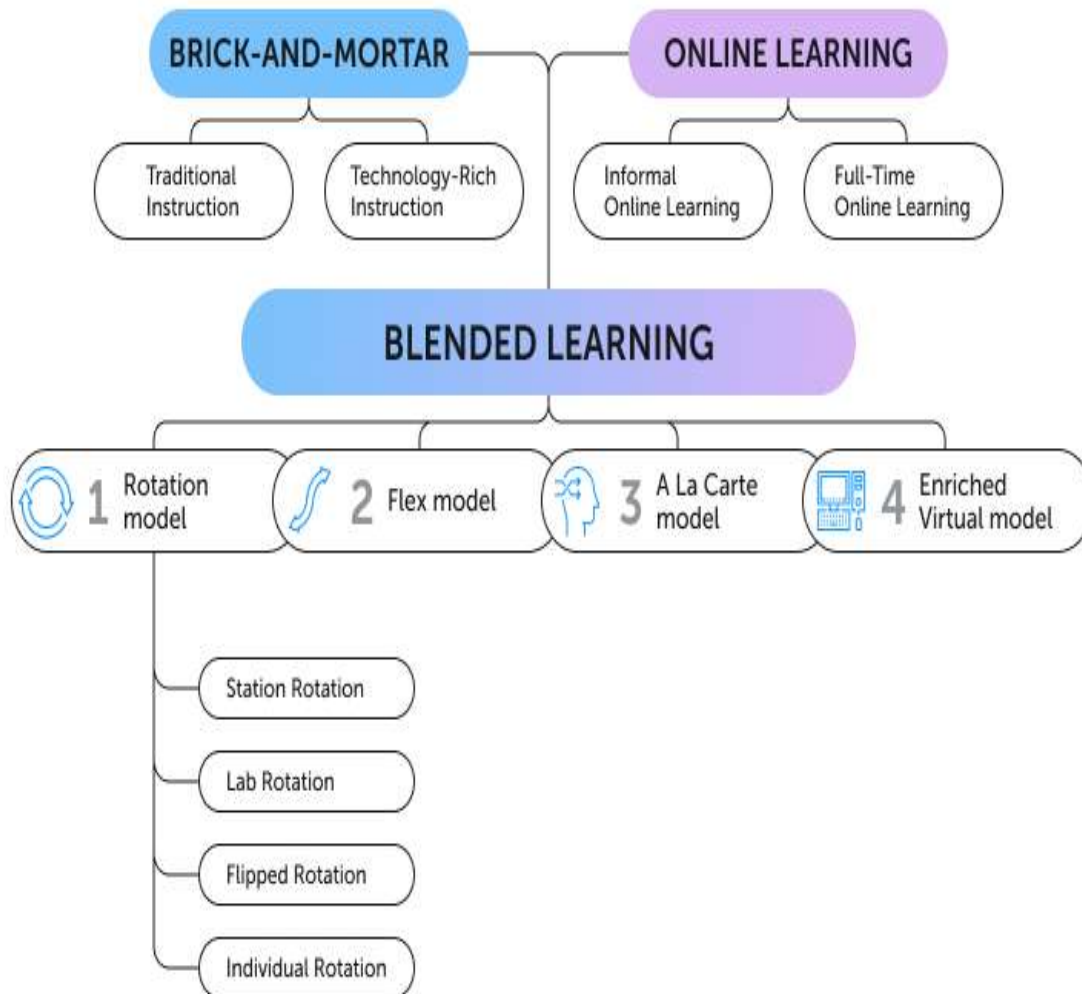
Some of the benefit of Blended learning:

1. Increased flexibility: technology – enable learning allows the learner to learn any time anywhere without the barriers of time and location
2. Increased interaction: It provides a platform for greater interactivity between students and as well as between teachers and students
3. Enhanced learning: Help students to achieve higher and meaningful level of learning
4. Opportunities for collaborating from a distance: as a learning practice individual students can work together virtually
5. Learning to be virtualcitizens: to be a lifelong learner digital learning skills are becoming essential and blended courses help learners master the skills using a variety of technologies.
6. Blended learning provides learning resources and experience repeatable, reliable and reproducible.

Blended learning models:-

Blended learning models are methods for encouraging hybrid learning. School and teachers create experiences and opportunities that combine face – to face learning with distance learning.

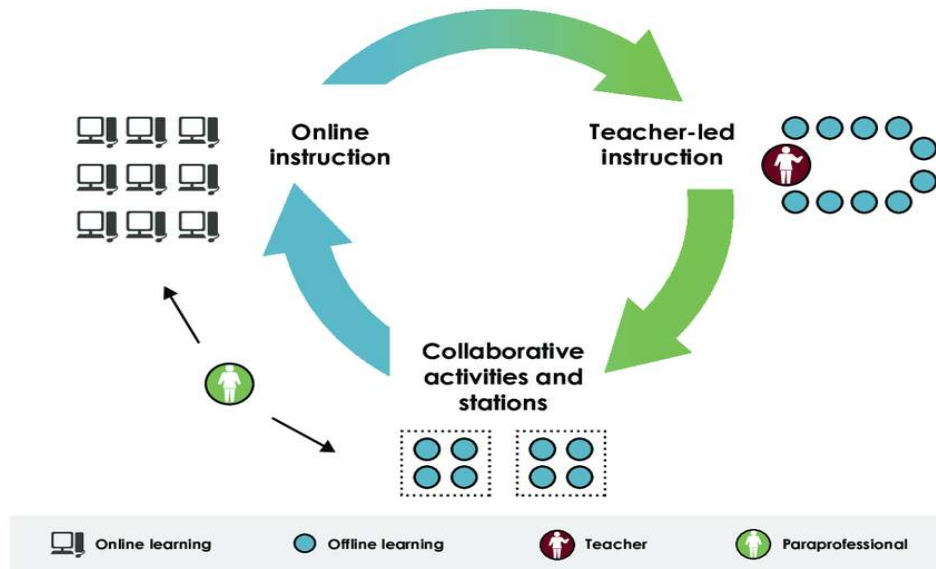
Blended learning began primarily as an approach designed to augment traditional instruction models for students who attended classes in a physical school building every day. However, these methods have also been leveraged to support a combination of in-person education and at- home learning. Majority of blended learning programs resemble one of the four models: Rotation, Flex, A La Carte and Enriched Virtual. The Rotation model includes four sub- models: Station Rotation, Lab Rotation, Flipped Classroom and Individual Rotation.

**1. Rotation Model:**

a course /subject in which students rotate on a fixed schedule or at the teacher's discretion between learning modalities, at least one of which is online learning. Some other modalities might include activities such as small group instruction, group projects, individual tutoring and paper and pencil assignments. The students learn mostly on the brick- and- mortar campus, except for any homework assignments.

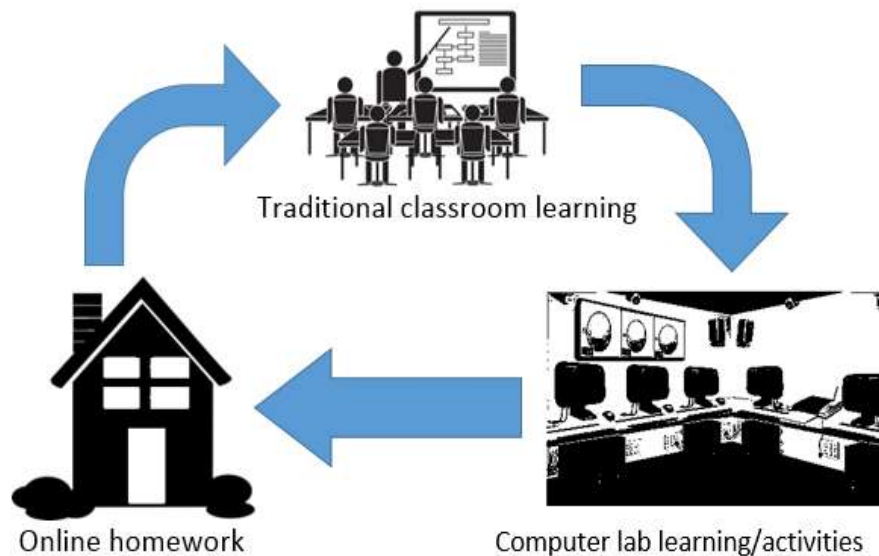
Station Rotation model:

a course/ subject in which students experience the Rotation model within a contained classroom. The Station Rotation models differ from the Individual Rotation model because students rotate through all of the stations, not only those on their custom schedules.

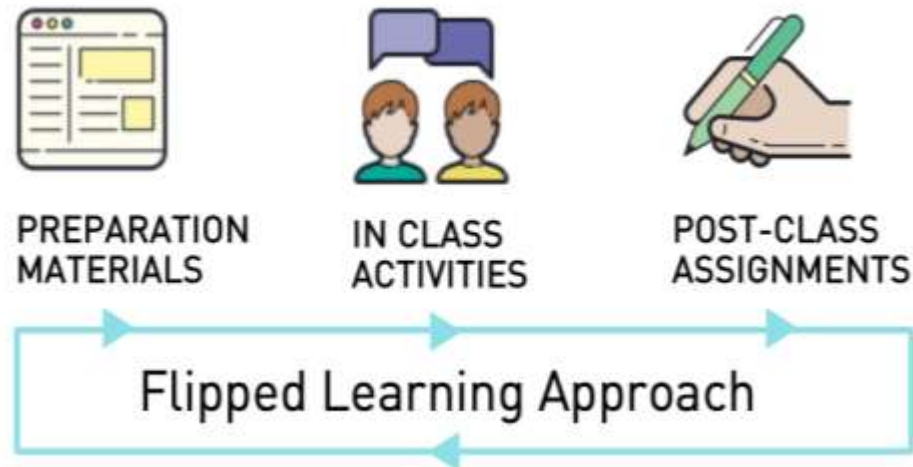
**Lab Rotation:**

a course or subject in which students rotate to a computer lab for the online- learning station.

Blended Learning Model: Lab Rotation

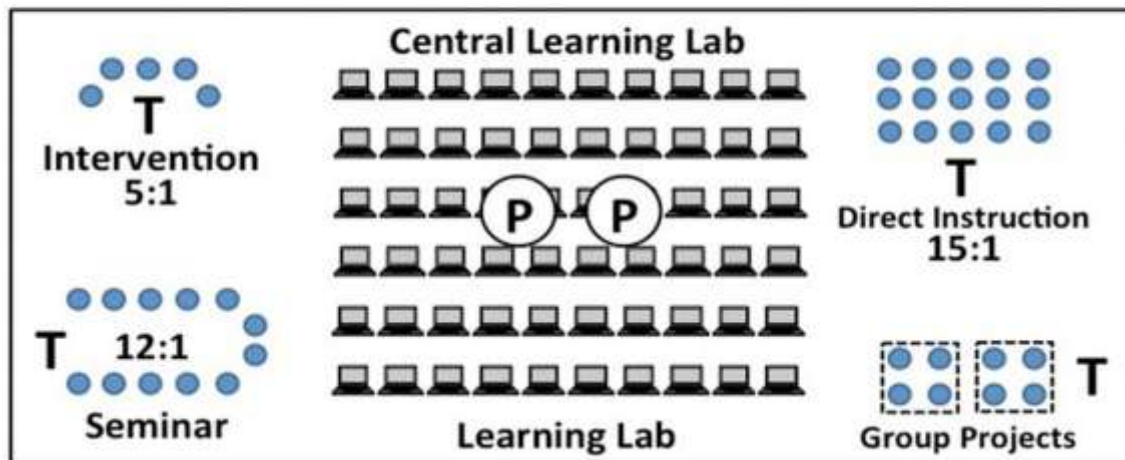
**Flipped Classroom:**

a course or subject in which students participate in online learning off- site in place of traditional homework and then attended the brick-and – mortar school for face – to – face, teacher- guided practice. The primary delivery of content and instruction is online, which differentiates a Flipped Classroom from the students who are merely doing homework practice online at night.

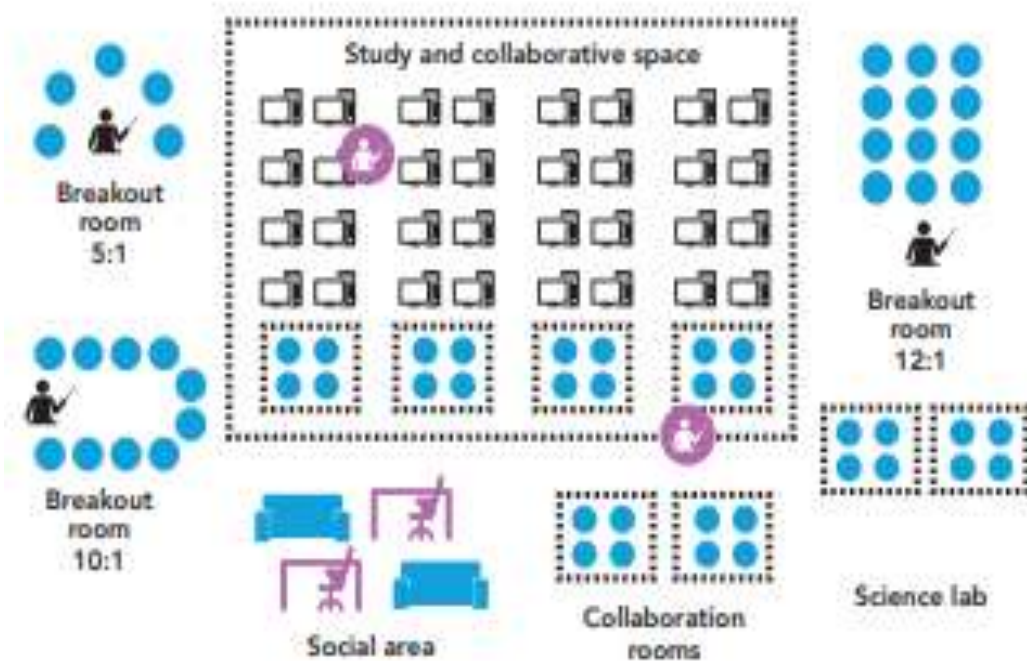
**Individual Rotation:**

a course/subject in which each student has an individualized playlist and does necessarily rotate to each available station/modality. An algorithm or teachers set individual students schedules.

INDIVIDUAL ROTATION

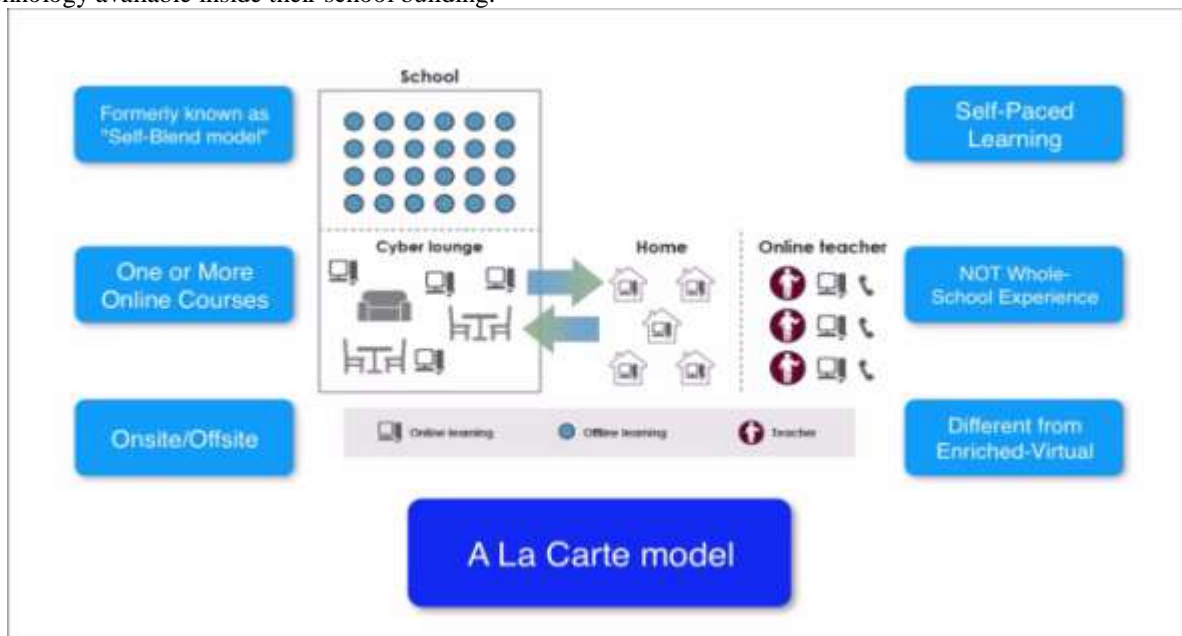
**Flex Model:**

This is self-paced, student-driven model. According to the book *Learning to the Digital Age*, flex models were originally devised to assist returning students who had not completed their high school education. While educators construct learning opportunities for their students and support their progress as needed, individual learners proceed through modules on their own. This level of independence may be better suited to older students. In-person components of the model can be used for intervention opportunities, breakout rooms, lab exercise and collaboration.



A La Carte Model:

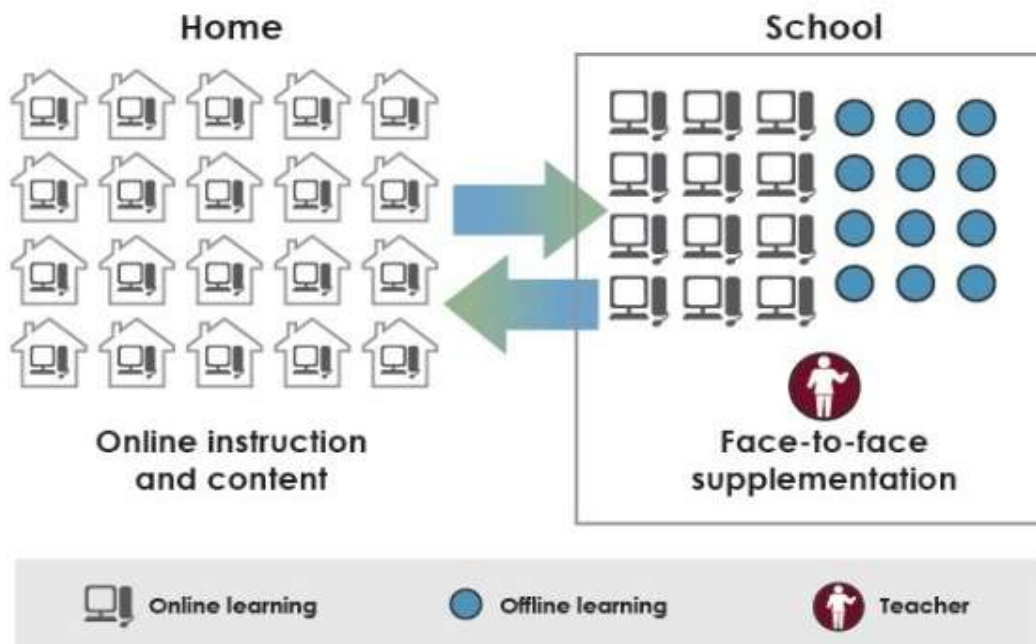
The a la carte model also involves a certain amount of student self-direction, this time at the level of individual course selection. Classes offered by the school are completed as they normally would be, while learner can choose from a menu of a la carte options for supplemental topics. These individual classes are often conducted online with a remote teacher of record. The student may complete this portion of their education from home or using the technology available inside their school building.



Enriched Model:

A course or subject in which students have required face-to-face sessions with the teacher of record and then free to complete their remaining course work remote from the face-to-face teacher. Online learning is the backbone of student learning when the students are located remotely. The same person generally serves as both the online and

face – to face teacher. Many Enriched Virtual programs began as full – time online schools and then developed blended programmes to provide students with brick- and – mortar school experiences.



ICT Initiatives and Tools

In the wake of the Covid 19 Pandemic, India's Education Sector witnessed a rise in solutions to support the continued leaning of students during the Covid 19 lockdown. This includes traditional tools to technology-based platforms such as You Tube, television, WhatsApp, radio and blended solutions. In order to support continuous learning during the lock down, the Ministry of Education shared many free digital e-learning platforms. Some significant ICT initiatives that were useful during the Covid 19 period are as follows:

Open Educational Resources (OER):

OER are teaching, learning and research materials in any medium – digital or otherwise that reside in the public domain or have been released under an open license that permits no cost access, use, adaptation and restriction by others with no or limited restriction.

Massive Open Online Course (MOOC):

MOOCs are distance learning courses run online by many universities worldwide which aims at large scale interactive participation and open access via web. Usually, they are open to anyone who registers. One single course may admit thousands of students. MOOC aims to provide real time education online with the help of various features like videos, study materials, quizzes, online exams, interactive sessions. MOOC also aims at making learning more efficient by removing time constraints and location constraints.

Swayam:

SWAYAM is a programme initiated by Government of India and designed to achieve the three cardinal principles of Education policy viz., access, equity and quality. The objective of this effort is to take the best teaching learning resources to all, including the most disadvantaged. SWAYAM seeks to bridge the digital divide for students who have until now remained untouched by the digital revolution and have not been able to join the mainstream of knowledge economy.

Learning Management System (LMS):

is a software application or web-based technology used to plan, implement and assess a specific learning process. LMSs give educators tools to create a course website and provide access and control so that only enrolled students can view it. LMS provides an instructor with a way to create and deliver content, monitor student participation and

assess student performance. A learning management system may also provide students with the ability to use interactive features such as threaded discussions, video conferencing and discussion forums.

Diksha:

Digital Infrastructure for Knowledge Sharing is an open-source national platform for learners and teachers to enable educational autonomy. Learners can access more than 80,000 e-books in multiple languages. The content supports homework and exam preparation with the help of 'question banks.' Teachers can undergo training on the platform, access tools to help them with their lesson plans and content explanation, as well as assessment of their students. The content can also be viewed through QR code on textbooks. (India Case Study: UNICEF and UNESCO)

Swayam Prabha:

Has 32 D2H TV channels transmitting educational contents on 24/7 basis. These channels are available for viewing across the country using Door darshan. The channel schedules and other details are available in the portal. The channel cover both school education (Grade 9-12), out of school children, higher education (under graduate and post graduate)

e-Pathshala:

in this portal the NCERT has deployed 1886 audios, 2000 videos, 696 e-books and 504 flip books for Grade 1 to 12. In different languages.

Challenges faced by Teachers and Students in using Blended Learning.

With the Covid 19 Pandemic going on, the UGC recommended blended learning in its concept note on "Blended Mode of Teaching and Learning", under which 40 percent of a course will be taught online and the rest 60 percent through traditional, offline methods in all higher education institutions. Online, blended and technology aided education have always been around for some time but the pandemic popularised them into household terms. Online mode definitely has its positives as it is cost effective, saves time and has the potential of providing access to large number of students. Despite of the positives, there are some challenges associated with online education. Lack of resources to own gadgets, supply of electricity, no internet to unstable internet connections is some of the widely acknowledged issues with online education.

Other problems relating to the technology related platforms like Zoom, Google Meet etc. also exist. The option of muting the audio and video that comes in handy in the event poor bandwidth is provided by online platforms, but some students tend to use it consciously to disconnect themselves. Teachers also face challenges and are coerced into muting their video, which makes the entire learning platform faceless and an anonymous experience. They also have no way of knowing if their students are physically and mentally engaged in the class.

Another challenge of online education that was seen during the Covid 19 pandemic is that of hands-on experience. While in some of the academic disciplines like humanities and social sciences, online mode is more or less applicable but it may not be appropriate to practical disciplines such as sports, engineering, medical studies which requires more practical and physical experiences.

Assessment is vital to any type of learning whether in a traditional classroom or online platform. However online learning during the pandemic makes assessment more complicated. With online assessment, teachers have limited control over students work so it is difficult for teachers to regulate cheating and ensure that students complete the assessment task by themselves.

Teachers in a traditional classroom can pause, identify the discomfort and hesitation of students however it may not be possible to do this in online platform where students may deliberately not tell about their problem because they find it difficult to relate to the medium.

The sudden shift to online education has created an unexpected workload for teachers because they have to transform the course/subject contents, learning resources, materials and assessment to online mode.

Also, the diverse and unequal socio – economic backgrounds that the students come from make it difficult for students to find dedicated physical spaces to access such teaching platforms. As a result, it may cause immense psychological discomfort, hamper their participation in class, and takes away the spirit of camaraderie and peer

support which is a common scene of a traditional classroom. All this causes more stress, frustration and isolation for students who have lost the opportunity for peer interactions. This sudden shift to online education has also increased concerns regarding cyber security, cyber bullying, online violence, exploitation and other psychological issues caused by difficulties and uncertainties associated with online learning during Covid 19 period.

Conclusion:-

It is true that the integration of information technology in education has been accelerated by the pandemic. This crisis opened the gates for opportunity in the education sector for the incorporation of digital methods. Covid 19 has proven that integrated learning is convenient and flexible for both learners and teachers, which makes it safe to assume that online education will eventually become integral component of the education system. With schools all over the world, redesigning their teaching learning methods due to the pandemic, blended learning can be seen as a fundamental part of future education.

Suggestions:-

1. Blended mode must ensure that students have the basic minimum resources to procure gadgets and related infrastructure.
2. Knowledge of the students' group to whom online education is going to be catered to is important.
3. Understanding of the strengths, limitation and background of the students is necessary.
4. The competence and expertise of teachers should be looked into and whenever necessary they should be provided with the requisite support and training.
5. Student teacher ratio should be less so that individual attention can be paid even in online mode.
6. Evaluation and Feedback should be given even in online mode.

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