

Blended Learning: A Dynamic Instructional Approach

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ABSTRACT

Blended Learning is increasingly used to describe the way e-learning, combining with traditional classroom methods and independent study to create a new, hybrid teaching methodology. It is one of the mandatory methods of teaching in the classroom to provide students with new learning strategies and methods as well as ensuring the education system itself is in line with the current changes in education. It has wider opportunities for learners in collaborative learning, constructive learning and computer assisted learning (CAL). Blended learning needs rigorous efforts, right attitude, handsome budget and highly motivated teachers and students for its successful implementation. As it incorporates diverse modes so it is complex and organizing it is not simple as usual and the rapid flow of globalization and the development of ICT today demand a change in the attitude and mindset of teachers/lecturers. The present paper discusses the fundamentals of blended learning, its important features and the structure, role of teacher and student in blended learning environment. The paper also covers assessment strategies, strengths and challenges of adopting blended learning teaching learning process.

Keywords: Blended Learning (BL), Structure of BL, Role of Teacher and Student, Assessment strategies in BL and Challenges.

INTRODUCTION

Blended Learning has been considered an effective approach of delivering learning content as it is simple and flexible. The nation is rapidly changing, and these changes have a significant impact in the field of education. The offering of e-learning model together with face-to-face activities was reflected in greater efficiency, which made possible a new model for the specific needs of the teaching-learning process: hybrid learning or Blended Learning model (Graham, 2009). The COVID-19 pandemic further highlighted the importance of flexibility when emergency remote teaching forced both students and educators to adapt to fully online learning (Lockee & Clark-Stallkamp, 2022). Many higher education institutions have started to apply blended learning approach in their respective subjects as it has been considered an effective approach of delivering learning content as it is simple and flexible (Yasodha, 2022), because blended learning allows students to experience social presence and direct engagement while benefiting from the flexibility of multimedia resources, asynchronous learning activities, and self-paced study options (Graham & Halverson, 2023). However, the BL were perceived to encourages continuity in learning among teachers as well as learners and fosters better quality in student-teacher interactions.

Blended Learning:

Blended Learning is an approach that provides innovative educational solutions through an effective mix of traditional classroom teaching with mobile learning and online activities for teachers, trainers and students in higher education sectors. It is the technology enabled learning to extend beyond the classroom walls and facilitates better access to learning resources. Actually, Blended learning is not a new concept in the teaching learning process. 'Tele-classes' is one form of this type where students watch a lecture on closed-circuit television and the same can be said for self-paced learning. Blended learning is normally regarded as integrating face-to-face instruction with online learning, either personally or in team. In order to improve traditional learning with conventional learning, the concept of blending teaching has been linked to attempts to mix media and

technological resources in a virtual setting (Sharma, 2010). Blended learning designates the range of possibilities presented by combining Internet and digital media with established classroom forms that require the physical co-presence of teacher and students- Norm Friesen (2012). As well the NEP 2020 encourages the adaptation of blended learning models in light of the development of digital technologies and the growing significance of using advanced technology for teaching and learning. The NEP 2020 claims that the value of in-person, face-to face instruction is completely acknowledged. The deeper understanding will be possible through the following heads.

Important Features of Blended Learning:

- 1. Choice Based Learning Modes-** Learners in blended learning environment can find their suitable mode of teaching where they get opportunity for personal interaction with teacher and their peers or they can choose digital mode of teaching learning. This largely depends on the nature of content and objectives being targeted where designer or teachers and students themselves decide the mode of learning and teaching appropriate for topic being dealt with.
- 2. Transforming Teaching Learning Process** – Teachers have been blending or integrating different types of learning activities and resources in classroom, laboratory, practicum, studio contexts for a very long time. It has evolved to mean the integration of classroom learning with online or e-learning. So, teachers are becoming very dynamic, techno savvy and fully trained to work efficiently in both the formats- traditional classroom format and ICT supported format. They will be well equipped in using traditional methods and other modern technologies.
- 3. Changing Learners' Expectations-** The demand of students has been changed in every sphere of life including education. In this era students can using blogs to support and develop their learning. These blogs are often reflective and might be private, shared with a teacher or completely public. It allows learners to document their learning and can enable the instructor to gauge a students' depth of understanding about a task or unit content. They get ample of time to interact with peers pursuing same course. They can interact with them inside college campus and also in virtual space. Thus, their group become very large and has much diversity so the student's knowledge becomes wide and they also develop a feeling of understanding, love and harmony with students of other cultures and countries.
- 4. Developing Digital Competencies-** The present era is the time of ICT. Today the illiterate is not only the one who cannot read and write but a person who is not well versed with modern technologies is also illiterate because all professions demand expertise in ICT. So, blended learning help to make student's ICT experience rich, efficient and gain capability to exploit available technologies to the fullest of their benefit.
- 5. Expansion of Educational needs and Life skills-** Blended learning creates opportunities for improving core life skills those are needed to lead a happy peaceful and successful life. The major life skills are empathy, decision making capability, love, patience, communication, self-management, critical thinking which develops in groups activities. Students work together to create a single document formulating proposals and analytical reports to the larger group for discussion and/or critique in blended learning environment to practice these skills. Students get acquainted with few skills like love, empathy, patience in classroom through his teachers, classmates, and few like self-management, decision making, critical thinking, communication through the online experiences.
- 6. Wide Exposure and Flexible Learning Contents-** Students get more freedom if live internet streaming is used purely to deliver information live to students off campus, then the technology is be used at a substitution level. However, if students are debating, problem solving or exploring then it is being used at a much more transformative level i.e. modification. Due to variety of experience students get wide exposure and their content knowledge is enriched; they get to see various new dimensions of the content gain practical useful knowledge.
- 7. Synchronous and Asynchronous Learning Environments** - Synchronous learning happens live in real time where students and teachers meet together and asynchronous learning lets students' study on their own

schedule using pre-recorded lessons and discussion boards. Blended learning include the both the situation and it provides student opportunity to communicate and share their views and feeling with the students all over the world thus it makes teaching learning process multicultural and variety of experience bring with it the interdisciplinary and multidimensional.

8. **Blended learning Activity is Planned in Advance:** A blended learning activity is designed as a learning process which the student does. Typically, it involves the student in doing something more than just reading on-screen. The sequence of what the student will do in the blended learning activity is mapped out in advance. The resources and supports that students will need, and when they will need these are also mapped out in advance. Resources and supports include: task instructions, learning guide, online tools, and, web links, media files, etc.
9. **Paradigm Shift of Teacher-** Teacher in blended learning is playing different role, traditional role of a teacher in classroom, she acts as motivator, as a resource person, as an organiser, as a developer, when she develops content to be provided through ICT, as a guide on the side. Thus, teacher gets freedom from the monotonous traditional roles and she can try her hands in diverse areas that are good for her professional growth also.
10. **Holistic Progress of the Learner-** In blended learning the students get full opportunity for all round development of the personality. All the aspects of personality namely- cognitive, physical and emotional are developed through blended learning which is difficult to achieve in traditional mode or ICT approach if followed in isolation. As blended learning includes both conventional and modern classroom teaching which focusing on cognitive domain development, teacher's behaviour, playground experience and social group with classmates develop affective and physical domain at same time online experiences help in reflective level of learning so develop higher faculties of min and social networking sites and other social interactions though internet help in right type of value development.

Structure of Blended Learning (UGC Concept Note- 2021)

The technological advancement has brought significant change in teaching learning process at all levels in education including higher education in India. Blended learning is both simple and complex. At its simplest, blended learning is the thoughtful integration of classroom face-to-face learning experiences with online learning experiences. There is considerable intuitive appeal to the concept of integrating the strengths of synchronous (face-to-face) and asynchronous (text-based Internet) learning activities. At the same time, there is considerable complexity in its implementation with the challenge of virtually limitless design possibilities and applicability to so many contexts. The University Grants Commission (UGC) in the concept note of Blended Learning has recommended all the higher education institutions to follow up BL practices in their institutions.

1. **Blended face-to-face class** also sometimes called the “**face-to-face driver model**,” the blended face-to-face class model is based in the classroom, although a significant amount of classroom time has been replaced by online activities. Seat time is required for this model, while online activities are used to supplement the in-person classes; readings, quizzes or other assessments are done online at home. This model allows students and faculty to share more high-value instructional time because class time is used for higher-order learning activities such as discussions and group projects.
2. **Blended online class** sometimes referred to as the “**online driver model**,” this class is the inverse of the blended face-to-face class. The class is mostly conducted online, but there are some required in-person activities such as lectures or labs.
3. **The flipped classroom** the flipped classroom reverses the traditional class structure of listening to a lecture in class and completing homework activities at home. Students in flipped classes watch a short lecture video online and come into the classroom to complete activities such as group work, projects or other exercises. The flipped classroom model can be seen as a sub-model of the blended face-to-face or blended online class.
4. **The rotation model** in this model, students in a course rotate between various modalities, one of which is online learning. There are various sub-models: station rotation, lab rotation and individual rotation. Some of

these sub-models are better suited to K–12 education; station rotation, for example, requires students to rotate between stations in the classroom at an instructor’s discretion. Others work well on a college campus; the lab rotation model, for example, requires students in a course to rotate among locations on campus (at least one of which is an online learning lab). In the individual rotation model, a student rotates through learning modalities on a customised schedule.

5. **The self-blend model** while many of the BL models on this list are at the course level, self-blending is a programme-level model and is familiar to many college students. Learners using this model are enrolled in a school but take online courses in addition to their traditional face-to-face courses. They are not directed by a faculty member and choose which courses they will take online and which they will take in person.
6. **The blended MOOC** is a form of flipped classroom using in-person class meetings to supplement a massive open online course. Students access MOOC materials - perhaps from another institution or instructor if the course is openly accessible - outside of class and then come to a class meeting for discussions or in-class activities. In 2012, San Jose State University piloted a blended MOOC using MIT’s Circuits and Electronics course, with students taking the MOOC out of class while face-to-face time was used for additional problem solving.
7. **Flexible-mode courses** Flexible-mode courses offer all instruction in multiple modes - in person and online and students choose how to take their course. An example of this is San Francisco State University’s hybrid flexible (HyFlex) model, which offers classroom-based and online options for all or most learning activities, allowing students the ability to choose how they will attend classes: online or in person.

Role of Teacher in Blended Learning:

Role of a teacher in BL environment is not like the ‘Sage on the stage’ but s/he becomes ‘creator’, ‘designer’ and ‘supporter’ of teaching-learning environment to enable learners to interact. Blended learning shifts the teacher’s role from knowledge provider to facilitator, coach and mentor. In blended learning scenarios, teachers can have an even more profound influence and effect on students’ learning. Creating more learner-centric and customized, with differentiation as a main feature.

1. **The Learning Architect:** As a Learning Designer, the teacher's responsibilities extend far beyond traditional lesson planning; they become the architects of a comprehensive and cohesive learning journey. This intricate process begins with the foundational step of defining clear learning objectives, moving past the simple acquisition of knowledge to focus on cultivating essential skills like critical thinking and collaboration, as well as fostering important attitudes such as curiosity and intellectual resilience. Once these holistic goals are established, the teacher must make a strategic decision in selecting the appropriate blended learning model. The choice of a Flipped Classroom, Station Rotation, or Flex model is not arbitrary but is carefully determined by the learning objectives, the specific nature of the subject matter, and the unique characteristics of the student cohort.
2. **The Content Developer:** This responsibility begins with the proactive sourcing of diverse, multi-modal materials, deliberately moving beyond the traditional textbook to include a rich tapestry of resources such as engaging videos from platforms like YouTube and TED-Ed, insightful podcasts, scholarly articles, real-world case studies, and even immersive virtual museum tour. The content developer must meticulously check each resource for its reliability, factual accuracy, and academic appropriateness for the specific learning level, while also ensuring full compliance with copyright regulations to maintain intellectual integrity. Ultimately, the most advanced aspect of this role is encouraging student curation, where the teacher transitions students from passive consumers to active participants by explicitly teaching them crucial information literacy skills. By empowering students to find, evaluate, and contribute resources themselves, the teacher transforms the classroom's resource library into a dynamic, co-created knowledge base, fostering a profound sense of ownership and equipping learners for a future of continuous, self-directed discovery. This role requires teachers to be lifelong learners, constantly updating their subject matter expertise and awareness of new resources in their field.

3. **The Catalyst as well as Cooperative Coordinator:** In the role of a facilitator, the teacher's primary objective is to build a vibrant and cohesive learning community that thrives in both digital and physical spaces. This begins in the online space, where the teacher must skilfully architect asynchronous interactions that are both meaningful and intellectually stimulating. Instead of posting simple comprehension checks, their task is to design deep, thought-provoking discussion questions for forums that encourage students to grapple with complex ideas, challenge assumptions, and connect concepts to real-world contexts. Here, the teacher designs authentic group work and collaborative projects that demand students apply their knowledge in practical, hands-on ways. Crucially, this role extends beyond simply assigning the task; it involves explicitly teaching and coaching effective teamwork skills. The teacher becomes a mentor in guiding students on how to manage equitable task delegation, practice active listening, navigate and resolve conflicts constructively, and provide peer feedback that is both helpful and supportive. Teacher designs challenging but motivating problems for learners. The problems motivate and encourage learners to learn from the resources, discuss with peers and teacher and try to achieve the learning outcomes.
4. **Manager of Effective Differentiation of Learning:** Teacher becomes a great support system throughout the BL environment. Learners are not thrown in any isolated environment, but BL yields more frequent and more personal teacher-student interactions, which may or may not be achieved in one-way lecturing. Teachers have the opportunity to deepen and strengthen student-teacher relationships. Blended Learning provides a treasure trove of learning data on each student. Teachers can monitor progress, identify difficulties, and intervene in a timely manner. Their role becomes akin to that of a personal coach, helping each student reach their full potential. Delivering specific, timely, and constructive comments on student work, which can be in text, audio, or short video formats. Guiding students in the skills of self-assessment, recognizing their strengths and weaknesses, and building their own learning plans.
5. **The Learning Reviewer:** Teachers do not need to be data scientists, but they do need a basic competency to read, understand, and use learning analytics to make better pedagogical decisions. If data shows many students answered a specific quiz question incorrectly, the teacher can decide to reteach that concept in the next face-to-face session. Teachers have the opportunity to deepen and strengthen student-teacher relationships. The trust that comes with close relationships can give teachers insights into students' personal struggles and needs insights which empower teachers to comfort and coach students through challenges that often serve as obstacles to learning. The ability to rapidly analyse, review and give feedback to learners on their tasks, gives the teacher the ability to tailor his/her teaching-learning strategies.

Role of Learner in the Blended:

In blended learning, students shift from passive listeners to active managers of their own education. They balance self-paced online study with face-to-face classroom teamwork, taking charge of their goals, building digital skills, and engaging directly with interactive course materials. The UGC concept note on Blended learning highlighted the learner's role in following heads.

1. **Self-directed Learner:** Students are more likely to be motivated by, concentrated on, and enthusiastic about the things they are learning when ICTS is introduced into classroom lessons. Provide student autonomy: The utilisation of online learning resources improves a student's capacity to establish sensible learning objectives and manage their own learning, developing a skill that will be applicable to all subject areas. The students become self-driven and responsible, tracking their individual achievements, which helps develop the ability to find the resources or get the help they need, self-advocating so they can reach their goals.
2. **Analytical Thinker:** The problem-solving experiences of BL environment change's role of a learner from a 'passive listener' to a problem-solver. Learner needs to understand the changed role and accept the challenges of new learning problems designed by the teacher. Students learn to be analytical and accountable, keeping track of their individual accomplishments, which helps them learn how to obtain the resources or help they need and how to advocate for themselves to help them attain their objectives. Using technology to look up facts and information, along with having access to resources like the internet for research, is a huge lifesaver.

3. Decision Maker: BL enables the instructor to quickly assess, go over, and provide feedback on student work, allowing him to customise his tutorials and critiques for every pupil while increasing efficiency. It encourages students to progress at their own rate of learning and students can learn at an individual pace in their convenience, which enhance students learning. BL environment, with its pool of resources, effective learning problems, and appropriate scaffolding of the teacher demands learner's role as an efficient decision-maker. It also promotes solving every small step of the problem, learner gradually develop ability of taking appropriate decisions and this changed role of the learners helps them to be ready for the external real-world.

Assessment Strategies in Blended Learning:

Teachers need to act as classroom organizers because they have extensive experience in education and the ability to use IT to create and manage learning resources in the absence of teachers. Thus, a blended learning is created by combining online learning knowledge with offline knowledge, where teachers assign independently organized past tasks in their time and progress with the help of appropriate technological tools for learning until they reach their goals. Teachers were able to confirm their knowledge through various forms of evaluation: experiments, games, online education, reading, research groups, feedback will be successfully conducted in groups, students must immediately assess whether these models are effective or not. Interaction in the classroom is a big difference from the problems introduced in the educational environment because they show enthusiasm, an attitude to learning and participation, and therefore implement it more efficiently.

1. **Continuous Comprehensive Assessment:** National Education Policy-2020 is learner centred education systems. Only summative evaluation will not sufficient to the need of testing all levels of learning outcomes. Modular curriculum demands assessment at regular intervals during and after achievement of learning outcomes specified for every module leading to appropriate evaluation. Cognitive skills such as logical thinking, application of knowledge and skills, analysis and synthesis of concepts and rules demand evaluation strategies other than summative paper pencil test. Out-of-box thinking about summative as well as formative evaluation is expected from the teacher implementing BL mode.
2. **Open Book Examination:** In real functioning beyond formal education, life is all about open book examination. Hence, in Higher Education institutions teacher must prepare their students for world of work by making them acquainted with open book examinations. It will also facilitate better understanding and application of the knowledge with a better potential for its positive impact.
3. **Group Examinations for most Papers:** The application of group examinations system for theory papers can improve the average performance of a class as students would be encouraged to share their knowledge with each other and also help them improve their general understanding.
4. **Speaking Examinations:** Teacher can make examination faster and easier and also can be helpful to students with different abilities. It evaluates your fluency, pronunciation, grammar, and vocabulary through structured sections like personal interviews, short individual talks, and deeper discussions in reciprocal method.
5. **Flexible on-demand Examination:** with the advent of new methods which are technology based and also blending of teaching-learning and examinations in new form, it would be a good approach to offer examination on demand so as to offer more flexibility and student centricity. An on-demand exam is a test teacher can take whenever teachers are ready instead of waiting for a fixed school calendar date and the key features include flexible booking, subject-by-choice testing, and availability through open learning systems and flexible modes.
6. **e-Portfolio and Creative Products:** e-Portfolio is a comprehensive tool which becomes a mirror to a learner for the world. Innovative Pedagogies and relevant ICT tools enable learners to come out with creative products as an individual or group learning activities. These products are learning experiences in the beginning, but learners should always be given corrective feedback about their outputs. Creative assignments such as digital stories, Cartoon strips, drama scripts, e-Newsletter, e-Magazine, recorded interviews of stakeholders, case studies, etc. can be used for formative assessment.

7. Online Quizzes and Use of AI tools: Through paper-pencil tests, over-use of question-answers may be discouraged for formative evaluation, a few ICT tools for quizzes and games can be used eventually for formative evaluation. Artificial Intelligence tools can be used for many more assessment strategies including understanding attention levels, pace of learning, level of learning etc.

Advantage of Blended Learning:

As per the UGC concept note on blended learning the benefits may be like-

Optimal use of Classroom: A blended learning strategy's digital resources can increase student engagement. Group work, for instance, benefits from the use of a forum for discussion because everyone may contribute equally, and teachers can see which team members contributed and to what extent. This helps them determine if students completed all of the required work for the assignment more precisely. Attention span does not allow them to concentrate on the content of one-way lecturing beyond 20-30 minutes. If such elaboration is passed on to learners via digital media, learners can read, view and comprehend at their own pace.

Flexibility and Time Optimization: A blended learning environment gives students access to a variety of learning material, boosting their competence and self-assurance. Blended learning improves students' chances of completing courses by decreasing dropout rates, raising exam scores, and boosting student motivation as compared to online and face-to-face courses. Blended learning offers students an active and flexible environment for utilising materials, as well as additional time for teachers to meet with students in small groups or even individually (Oh & Park, 2009).

Variety in experiences and equity: In blended learning, all students have an equal chance to succeed in a partially online setting that can offer fewer distractions and more personalization for each student's needs. Face-to-face training can be beneficial for everyone, but online learning can be more advantageous for some people than others (Fatima & Manika, 2023). Learner Engagement increases by introducing variety of learning experiences. Classroom time sometimes does not prove adequate for all such activities and experiences. If some of the activities are planned for Online mode, learners can be benefitted by such exposure as per their convenience of time (UGC-2021).

Learner Autonomy and Active Learning: BL learning increases relevance, individualization, and personalization by providing quick feedback in their learning process. It allows to remove the boundaries of conventional training, blended learning training eliminates time and geographic restrictions, and the student chooses when and where to complete their coursework. It encourages self-motivation in learners by making them more accountable for their education. Blended learning has the capacity to alter students' learning experiences and outcomes (Davis & Fill, 2007).

Replicability and Solid Resources: In BL learning environment teachers can identify reliable and authentic resources for their students instead of students getting lost in the pool of unauthentic resources. Lack of quality resources and lack of connects between experts and students are the major issues of the day. The experts knowledge is conveyed to students spread across the country, more and more higher education students as well as teachers will be benefited. (UGC-2021).

Challenges in Blended Learning

Even blended learning has the significant contribution to enhance learning; there are drawbacks as well adopting blended learning may be difficult.

Inadequate Expertise and Pedagogical Skills: A cornerstone of this new skill set is Digital Pedagogy, which is not merely about knowing how to use software, but rather a deep, conceptual understanding of how to meaningfully integrate technology into the teaching and learning process to enhance pedagogical outcome. Inefficiency among the teachers in designing, creating and critical thinking, which involves the ability to approach curriculum planning with a designer's mindset to achieve learning scenarios and activities that are both logical and highly engaging may be affected.

Scant Digital Literacy and Soft Skills: Educators must develop digital literacy, a crucial skill that enables them to read basic learning analytics reports, interpret the data, and draw useful insights to make evidence-based instructional decisions. All these technical capabilities together are the essential soft skills; in a learner-centered model, high level communication, active listening, empathy, critical thinking, collaboration, and adaptability become vital for effectively coaching students and facilitating a supportive learning community, which are found insufficient.

The complexity of Instruction: Ocak (2011) also views that preparing the instruction in blended courses can be the main issue of the laziness to teach in this mode of delivery. Teaching blended courses is complicated as it requires expertise to make a good balance between face-to face section and online section. It has been found that giving effective feedback takes more time and costs more money.

Inadequate Infrastructural and ICT Support: Blended learning programme is significantly impacted by computer and internet connectivity. Designing and building a single high-quality blended learning course requires a substantially greater upfront investment of time and effort compared to preparing traditional lectures. The infrastructure should have enough servers, storage, and bandwidth, and it should have little downtime. Inadequate equipment and unstable internet connectivity for both teachers and students can undermine the very foundation of a blended learning model. This issue is often compounded by a lack of systematic training, where many professional development programs for teachers have not kept pace with change, frequently focusing on superficial tool usage rather than fostering the deeper, more critical mindset of digital pedagogical thinking (Dinh,2025).

CONCLUSION

Blended Learning is essential concepts in the teaching/learning process. Currently, the educational system is trying to adopt new technologies and exploring new paths to reach the goal of quality educational opportunities for all. Blended Learning is increasingly used to describe the way e-learning, combining with traditional classroom methods and independent study to create a new, hybrid teaching methodology. This shift is not an option; it is an urgent requirement of our time. Blended Learning is an approach that provides innovative educational solutions through an effective mix of traditional classroom teaching with mobile learning and online activities for teachers, trainers and students. Blended Learning to be truly effective and to create a generation of autonomous, creative learners ready for the future, the most critical task for educational leaders and policymakers is to invest in people. The role of the teacher in the digital age has become more complex, more demanding, but also more meaningful and impactful. They are designers, curators, facilitators, coaches, and analysts—all in one. There is a need for in-depth, long-term training and professional development programs, the creation of a supportive work environment that encourages innovation, and the recognition of the tireless efforts of our teaching workforce. Because, in the end, no matter how advanced technology becomes, the heart of education will always be the teacher—the one who architects the future, one student at a time.

REFERENCES

1. Alexander, S., & McKenzie, J. (1998). An Evaluation of Information Technology Projects for University Learning. Canberra, Australia: Committee for University Teaching and Staff Development and the Department of Employment, Education, Training and Youth Affairs. <http://jite.org/documents/Vol5/v5p235-249Heinze156.pdf>
2. Blended Learning: A Disruptive Innovation. Knewton.
3. Bonk C.J., & Graham, C.R. (2006). The handbook of blended learning environments: Global perspectives, local designs.
4. Coach resources (2012-10-11). "in the real world : Coach resources". Khan Academy. Retrieved 2013-10-24.
5. Dangwal, Kiran. L. (2004) Computers in Teaching and Learning: Shre Vinod Pustak Manir, Agra
6. Dangwal, Kiran. L. (2013) Computers Shiksha: Vedant Publication: Lucknow
7. Davis, H.C. & Fill, K. (2007). —Embedding blended learning in a university's teaching culture: Experiences and reflections. British Journal of Educational Technology, 38 (5).

8. Dinh, T. T. (2025). The Role of The Teacher in The Blended Learning Era: From Knowledge Transmitter to Learning Experience Architect, *International Journal of Social Science and Human*. DOI: 10.47191/ijsshr/v8-i10-13, Impact factor- 8.007 Page No: 7664 -7668
9. Duzer, J.V. (2002) Instructional Design Tips for Online Learning Available at [en.wikipedia.org/wiki/Blended learning](http://en.wikipedia.org/wiki/Blended_learning).
10. Dziuban, C., Hartman, J., & Moskal, P. (2004, March 30), —Blended learning, *ECAR Research Bulletin*. Available online at <http://www.educause.edu/ecar/>
11. Fatima, Nazneen & Chibb, Monika. (2023). Blended Learning-Advantages and Challenges. *International Journal of All Research Education & Scientific Methods*. 10. 1371-1375.
12. Friesen, Norm (2012), "Report: Defining Blended Learning"
13. Graham, C. R., & Halverson, L. R. (2023). Blended learning research and practice. In O. Zawacki-Richter & I. Jung (Eds.), *Handbook of open, distance and digital education* (pp. 1159-1178). Springer Nature Singapore. https://doi.org/10.1007/978-981-19-2080-6_68
14. Graham, C.R. (2009). Blended Learning Models, 2nd ed., In *Encyclopaedia of Information Science and Technology*, IGI Global, 2009, pp. 375-382.
15. Hijazi, S., Crowley, M., Smith, M.L., and Schaffer, C. (2006, —Maximizing learning by teaching blended courses, *Proceedings of the 2006 ASCUE Conference*, Myrtle Beach, South Carolina. Retrieved February 9, 2010 from <http://fits.depauw.edu/~ascue/Proceedings/2006/Papers/p67.pdf>.
16. Jafarov, Sarkhan & Aliyev, Yusif. (2024). Assessment Methods in Blended Learning Environments. *Journal of Management World*. 2024. 505-515. 10.53935/jomw.v2024i4.443.
17. Lalima, Dangwal K .L.(2017). Blended Learning: An Innovative Approach. *Universal Journal of Educational Research* 5(1): 129-136, 2017 DOI: 10.13189/ujer.2017.050116
18. Lockee, B. B., & Clark-Stallkamp, R. (2022). Pressure on the system: increasing flexible learning through distance education. *Distance* <https://doi.org/10.1080/01587919.2022.2064829>
19. Ocak, M. A. (2011). Why are faculty members not teaching blended courses? Insights from faculty members. *Computers & Education*, 56(3), 689–699.
20. Oh, E., & Park, S. (2009). —How are universities involved in blended instruction? *Educational Technology & Society*, 12 (3).
21. Pete Sharma, (2010) Blended learning, *ELT Journal*, Volume 64, Issue 4, October 2010, Pages 456–458, <https://doi.org/10.1093/elt/ccq043>
22. Rooney, J. E. (2003). Blending learning opportunities to enhance educational programming and meetings. (5), 26 32.
23. Singh, H. (2003). Building Effective Blended Learning Programs. Retrieved July 20,2015 from [asianvu.com/digital library/e-learning](http://asianvu.com/digital_library/e-learning).
24. UGC (2021). Concept notes on Blended Learning.
25. What Is Blended Learning? <https://www.mindflash.com/elearning/what-is-blended-learning>
26. Yashodha, G. (2022) BLENDED LEARNING IN HIGHER EDUCATION, *International Journal of Advanced Research in Commerce, Management & Social Science (IJARCMSS)* ISSN: 2581-7930, Impact Factor: 6.809, Volume 05, No. 03(II), July - September, 2022, pp 51-58.