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The Blended Learning Approach in Higher Education: Enhancing Interactivity, Collaboration, and Active Participation

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Abstract

The blended learning model revolutionises how higher education institutions engage their learners. It combines the best of both worlds, online and in-person instruction, to create interactive, collaborative, and active learning experiences. This model offers the perfect balance of flexibility and support - allowing students to progress through their learning journey at their own pace while receiving tailored, individualized instruction from an expert instructor. Blended learning is transforming the landscape of higher education by facilitating increased engagement & interactivity among learners. Its potential to effectively transition from traditional to online learning is revolutionizing Higher Education. In the blended learning model, learners can simultaneously interact with others in person or work individually online. This model produces effective results by ensuring that students are active participants in their education and can engage with others with similar interests or goals. Blended learning is effective because it combines the best of both worlds—online and in-person instruction—to create interactive, collaborative, and active learning experiences that allow students.

Keywords: Blended Learning, web-based teaching-learning, ICT, Digitalisation in education, Hybrid learning in higher education

Introduction

E-learning & web-based learning programs are shaking up the traditional educational system. They are transforming it into virtual classrooms, giving students more convenient and flexible learning experiences. First, these programs were just online versions of courses taught in a classroom. The experience and results of such learning showed the problems with this single-instructor approach. Quizzes and rapid page-turning failed to offer learners the autonomy and choice, social contact, engagement, and contextual relevance they desired. It led to the development of numerous teaching and learning methods, with blended learning being particularly effective due to its wide range of available options. Higher education is quickly evolving, and the introduction of blended learning models makes it possible for students to engage in interactive, collaborative, and active learning. Blended learning allows students to benefit from traditional face-to-face instruction, online activities, and resources, providing a well-rounded and comprehensive learning experience.



With engaging activities, real-world problem-solving opportunities, and an emphasis on collaboration, blended learning models are changing how educators teach, and students learn. The blended learning model is a powerful tool for engaging learners in higher education, providing an interactive, collaborative, and active learning experience. It also encourages collaboration among students, allowing them to collaborate to develop and discuss ideas. Furthermore, the blended learning model offers a variety of learning opportunities, including lectures, discussions, projects, activities, and assessments. This instruction model helps students stay motivated and engaged in learning, resulting in improved performance and better outcomes.

Defining Blended Learning

Blended learning revolutionises our learning by merging conventional classroom education with modern digital media. It is a great way to get the best of both worlds and make learning more effective. It allows students to learn in an interactive environment that combines the advantages of both online and offline instruction. With blended learning, students get the best of both worlds: the flexibility and convenience of online learning and the personalised instruction and mentorship of a traditional classroom setting. As Garrison and Vaughan (2008) observed, Blended Learning is an excellent educational tool combining face-to-face and digital instruction. It gives students a chance to access immersive learning experiences that are creatively tailored to their needs.

Academics understand the benefits and challenges associated with both physical & virtual learning environments. Consequently, they have started to combine aspects of both, taking advantage of the benefits and reducing the drawbacks, resulting in what is known as 'Blended Learning.' Different variants of this mixed technique generate the optimum educational outcomes. (Driscoll, 2002; Boyle et al., 2003; Dziuban) Blended learning is an incredible concept that revolutionises how higher education is implemented. It offers a unique chance to combine the benefits and drawbacks of both on-ground and online education, thereby enhancing the teaching-learning experience. Lanham et al. (2005) combined face-to-face and online teaching, combining asynchronous and synchronous technologies. Chew (2008) argued that blended learning could have various interpretations depending on the desires and objectives of individuals or organisations, as various ways and models of blending are based on the creators' purpose and the circumstances. iNACOL, per Watson (2008), defines blended learning as a combination of digital



educational content and classroom instruction, allowing for personalized learning and giving students time to reflect on the knowledge they have gained. This approach provides students with various instructional methods to maximise their learning experience.

Blended Learning Improves Pedagogy

Blended learning is revolutionising the way we teach and learn in the classroom. Blended learning is a great way to maximize the benefits of both online and physical classrooms. By combining the two, educators can create a unique and engaging experience for their students while providing personalized instruction. Combining digital tools with traditional classroom instruction can dramatically improve pedagogy. It is a great way to maximise learning potential and take advantage of new technology while enabling participants to interact with each other. Blended Learning is a new method of instruction that combines traditional classroom work with technology to engage students. It uses both traditional and technological techniques to assist learners to know. (Cabero Almenara & Marin-Diaz, 2018)

It provides free, open online tools and resources that anyone can access and use. It also uses a lot of different ways to teach, such as teaching by team, discussion, demonstration, project, and case study. These learning activities keep students interested and give them more drive. Combining the advantages of in-person and online education, Blended Learning provides an approach to accommodate the varied needs of learners. (Bersin & associates, 2003) Blended learning is not just about using technology because it is there; it is also about finding better ways to help students reach their learning goals, give them the best learning and teaching experiences possible, as well as helping teachers do their jobs (Bonk and Graham, 2006). The blended learning approach is a highly effective combination of online learning and face-to-face teaching, offering an exciting way to maximize the strengths of both approaches. It provides an unparalleled opportunity to create engaging, interactive learning experiences that foster greater student engagement and higher levels of learning. Putting together face-to-face and fully online parts makes the most of both settings in ways that are impossible in other formats. (Dziuban & Hartman, 2004) The above points of view and discussions support new ways to teach and learn science, showing how important it is to combine different technological tools with face-to-face learning for Blended Learning Approach. Blended learning is an educational model that combines traditional and online learning and is characterised by the open pedagogy model defined by Wiley (2013). This model facilitates teaching and learning by using open educational

resources available to all and subject to the 5Rs approach (i.e., reuse, revise, remix, redistribute, and retain). This model enables learners to access and interact with freely available resources and adaptable to their individual learning needs. Teachers who employ open pedagogy techniques have been garnering much attention lately. By utilizing freely accessible resources, they can help their students learn more effectively while encouraging them to share their work and materials under public licenses, such as Creative Commons (CC). This approach allows for greater collaboration and creativity among students, educators, and the wider community. Open pedagogy is more than just a collection of resources; it also necessitates a shift in how work is performed. Infrastructure, policies, and strategies must be implemented for successful deployment and to guarantee long-term viability. Capacity building, peer work, and staff training should foster professional aptitude and encourage open pedagogy, necessitating a change in outlook, sentiments, and beliefs and an all-inclusive and straightforward culture.



Figure 1. Eight essential Characteristics of Open Pedagogy

Hegarty's open pedagogy is revolutionising the education space. It creates a more interactive and personalised learning experience, as well as encourages collaboration & networking. Ultimately, it gives them more power & control over their learning the students.

Blended Learning Approach enhances Accessibility and Flexibility

Blended Learning is quickly becoming the go-to approach for organisations looking to improve the accessibility and flexibility of their educational programs. By combining traditional and online learning, blended learning provides learners a more personalised, engaging experience. This approach also makes it easier for instructors to deliver content in various formats, allowing learners to access materials whenever and wherever they need them. Blended learning has already improved outcomes in countless classrooms worldwide – and its potential is only beginning to be tapped. Entwistle, McCune & Hounsell (2002) found that a high-quality learning experience is connected to how course material is presented, the teaching atmosphere, and the students' overall perception. It is well-illustrated in Figure 2.



Figure 2 Applicable Factors to develop Teaching and Learning Flexibility

The pedagogical expertise of university professors shapes the curriculum and learning environment. In 2002, Lizzio, Wilson and Simons researched how students' opinions of the learning atmosphere, study habits and academic performance were associated. Their findings highlighted the implications for educators seeking to understand how course design impacts students. Chickering and Gamson's (1987) Seven Principles for Good Practice in Undergraduate Education are enormously pertinent to postgraduate classes and can significantly aid in attaining favourable results. The principles are an invaluable resource for creating successful



postgraduate educational experiences. These principles are essential for any successful classroom. Encouraging student-faculty contact, creating a cooperative environment & inspiring active learning are just some of them. Also, fostering high expectations; offering prompt feedback; and acknowledging different talents & learning techniques can help students immensely in their journey to success! Reflection on these principles and their implications for the overall learning atmosphere is essential to maximize student engagement, foster a positive and supportive environment, and promote effective learning outcomes.

The implementation of blended learning in a Master of Science course called “Rural Sustainability” at Cardiff University. She noted the pros and cons of using virtual learning environments (VLEs, also known as LMSs) and highlighted the key points to consider when introducing these environments into a lecture module. The benefits of VLEs highlighted by Banks included enhanced learning, increased participation, greater enjoyment of learning, the ability for groups to work together more effectively, and a user-friendly interface across all courses. On the negative side, Banks acknowledged the presence of technophobia, the increased time demands for instructors, and students' scepticism. A comprehensive framework has been developed by Wall and Ahmed (2008) to assist universities in implementing a blended-learning approach to provide continuing professional development in the construction sector. As a result of this structure, continuing education providers can choose the best mix of media for a blended-learning intervention, taking into account learner and instructor traits, educational objectives and strategies, the learning climate, and the accessibility of resources.

Integrating Interactive & Collaborative Elements to Enhance the Blended Learning Experience

Students can learn more engaging by integrating interactive and collaborative elements into the blended learning experience. It encourages them to participate more actively in their learning process. It also helps them develop stronger connections with their peers, teachers, and mentors. Interactive elements such as games, simulations, virtual field trips, and group projects help students understand concepts better, while collaborative elements such as discussion forums and online chat rooms foster student communication. This research examined students' views on the practical aspects of interactive learning in a blended learning environment, using Reeves and Reeves' (1997) model as a guide. The inquiry aimed to answer the following: How do students view the blended learning experience in terms of interactive learning

effectiveness after the study? Data was collected through questionnaires and interviews with participants and was analyzed qualitatively to identify the main themes related to students' perceptions. The results also indicate that technology, well-designed activities, and appropriate instructor guidance may enhance effective interactive learning.

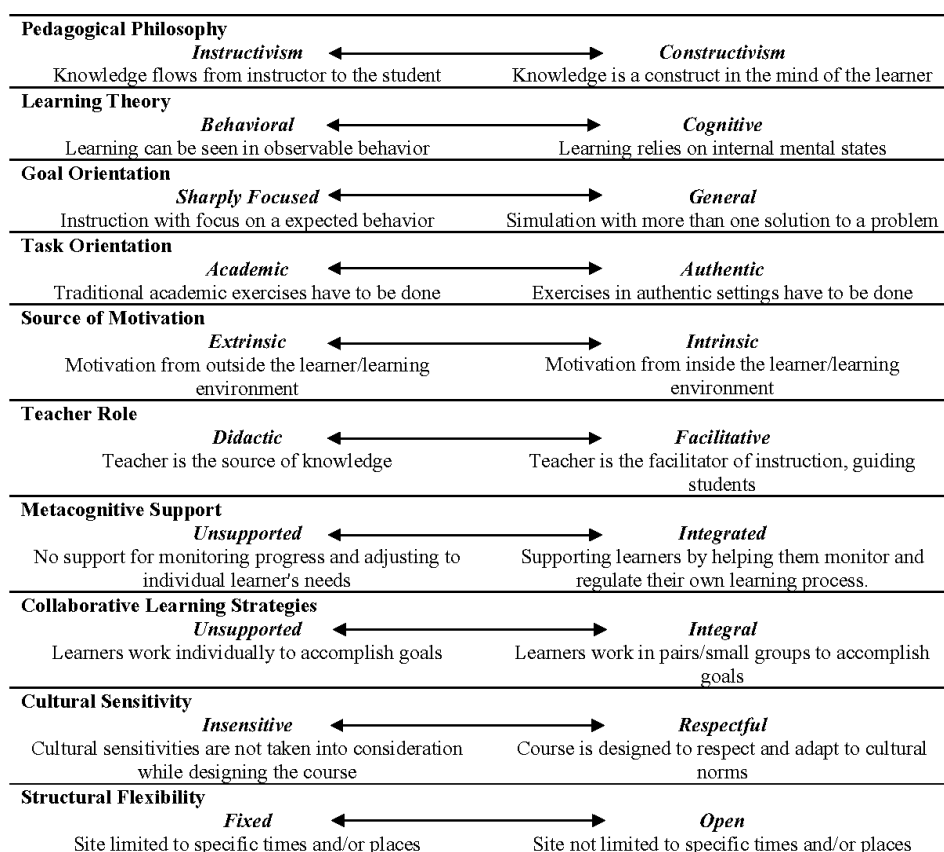


Figure 3 Exploring Interactivity in WWW-based Education

Collaboration is a Crucial component of Blended Learning

Blended learning is an effective method of education because it allows students to learn naturally. Not only does it allow them to learn at their own pace, but it also gives them access to both online and offline resources. This makes it an ideal educational method for numerous types of students. At its core, collaboration is one of the essential components of blended learning; it encourages students to take ownership of their learning, collaborate with peers, and engage in meaningful conversations around the topics they are studying. By utilising collaboration as a critical element in blended learning, educators can



create engaging and meaningful experiences for all students. Numerous theories have been established within psychology and education regarding collaborative learning and the attraction of the educational possibilities of students working together. According to Dillenbourg et al. (1996) and Roschelle and Teasley (1995), collaborative learning requires “mutual engagement of participants in a coordinated effort to solve the problem together.”

Woolfolk (2001) emphasizes the significance of social interaction for learning. According to Johnson and Johnson's (1994) theory of cooperative learning, this interaction needs to be arranged in order for it to be productive. Van der Linden and Haenen (1999) discovered that the cognitive outcomes of diverse topics and assignments are at least comparable to those of individual or competitive learning.

Conclusion

Several higher education institutions have used blended learning, understanding its importance and advantages in today's competitive landscape. Blended learning not only lightens the workload of faculty but also allows access to information with minimal cost. Through interactive and collaborative teaching, faculty development activities, and other scholarly tasks, blended learning aim to actively involve learners in their knowledge-seeking journey and offer them the best learning experience. The blended learning model in higher education has effectively engaged learners in interactive, collaborative, and active learning. This model combines traditional in-person classroom instruction with online learning activities, allowing students access various learning resources, tools, and opportunities. Overall, the blended learning model offers many benefits for higher education, and its continued adoption is likely to shape the future of education for years to come.



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