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Comparing Learning Paradigms: Ancient India vs. Digital Media

Drishita Chakraborty[1] & Umesh Kumar Saxena[2]

1. Research Scholar, Department of Mass Communication & Journalism, RKDF University, Ranchi, Jharkhand, 834004, Email: drishitachakraborty01@gmail.com
2. Assistant Professor, Department of Mass Communication & Journalism, RKDF University, Ranchi, Jharkhand, 834004.

Abstract:

The contrast between ancient Indian learning traditions and modern digital media-driven education unveils profound shifts in pedagogical methods over time. In ancient India, learning thrived within the Gurukul system, where personalized mentorship and oral transmission were paramount.Learning in ancient India was primarily based on oral transmission, with knowledge passed down through generations via verbal communication and memorization of sacred texts and teachings. Students immersed themselves in holistic education under the guidance of revered gurus, engaging in experiential learning and philosophical discourse. Fast forward to the digital age, and the landscape has transformed. Digital media provides unprecedented access to diverse educational resources, fostering personalized learning experiences tailored to individual needs. Multimedia integration enriches content delivery, catering to various learning styles and enhancing comprehension. Interactivity flourishes through online platforms, facilitating collaborative learning and real-time feedback mechanisms. Despite the evolution in methodologies, both paradigms share a fundamental commitment: empowering learners to acquire knowledge and skills essential for personal and intellectual growth. Through this comparison, we glean insights into the dynamic nature of education, spanning millennia and adapting to the ever-changing demands of society.

Keywords: *Learning Paradigms, Ancient India, Oral Transmission, Digital Media, Education Evolution.*

1. Introduction:

Education can be defined as the process of acquiring knowledge, skills, values, beliefs, and habits through various formal and informal means. It is a lifelong journey that begins from early childhood and continues throughout one's life. Education encompasses not only academic subjects taught in schools and universities but also practical experiences, social interactions, and personal reflections that contribute to individual development and growth. The learning process is the mechanism through which education occurs. It involves the acquisition, retention, and application of knowledge and skills. Learning can take place through various methods, including formal instruction, observation, experimentation, and experience. It is an active and dynamic process that engages the learner's cognitive, emotional, and behavioral faculties. Effective learning involves engagement, motivation, critical thinking, problem-solving, and reflection.

A conventional educational system adheres to established practices, aiming primarily to impart knowledge to succeeding generations. Within this system, learning typically occurs within the confines of classroom settings. In ancient times, students underwent education away from their parents' supervision, receiving instruction in subjects encompassing physical education, mental development, politics, economics, and more. They were prepared to adapt to various challenges and conditions they might encounter. As part of this process, disciples or learners left their homes to reside with their teachers in Gurukuls for the entirety of their educational journey. The curriculum, teaching methods, and learning environment were shielded from external interference, allowing for an independent educational experience. Ancient India embraced both formal and informal modes of education, with learning taking place in homes, temples, pathshalas, and Gurukuls. Traditional education emphasized the transmission of knowledge related to customs, rituals, traditions, and religion. [1]

In the 21st century, technology plays a pivotal role in learning, fundamentally altering educators' roles from traditional knowledge distributors to adaptable supporters and motivators. With the increased integration of technology in education, educators now encourage and empower students to actively participate and engage in the learning process. The global COVID-19 pandemic further emphasizes the importance of establishing robust and effective learning pathways, especially with the transition to remote teaching and learning. [2] The advent of digital media has transformed the educational landscape, offering unparalleled opportunities for learning and knowledge acquisition. With its accessibility, interactivity, and collaborative features, digital media has revolutionized the way people learn, making education more accessible, engaging, and effective than ever before. By harnessing technology, digital media revolutionizes conventional educational methods, providing learners with dynamic and interactive learning experiences tailored to their individual preferences and needs. This paper delves into a comparative analysis between the learning methodologies used in ancient India and modern digital learning methods, highlighting the advantages and disadvantages of each approach.

2. Education in Ancient India:

The ancient education system held deep significance, aiming not only to enhance human life but also to lead individuals towards enlightenment, as symbolized by the Sanskrit saying "*Tamaso Ma Jyotirgamaya*" meaning "From darkness, lead me to light." Education was viewed holistically, encompassing all aspects of human development. The ultimate goal was to the control of mental activities related to practical worldly matters. Students were encouraged to experience divine truths and adapt themselves and society accordingly. The teacher-student relationship was characterized by closeness and transparency, with the teacher serving as a role model approved by society. Ancient Indian education emphasized the training of the mind and the development of critical thinking skills as essential for knowledge acquisition. Students were tasked with educating themselves and fostering their own mental growth, guided by the principles of the ancient Indian theory of education.

2.1. Systems of Education:

In ancient times, two distinct systems of education emerged: the Vedic system and the Buddhist system. The Vedic system utilized Sanskrit as its medium of instruction, while the Buddhist system employed Pali. Education during this era primarily revolved around the study of Vedas, Brahmanas, Upanishads, and Dharmasutras. From the Rigveda onwards, ancient education aimed not only to develop students physically but also spiritually. It emphasized ethical principles such as humility, truthfulness, discipline, self-reliance, and reverence for all beings. Rigvedic education primarily targeted the priestly class, with provisions for secular and vocational training for the masses. The Vedic educational framework prioritized character building and personality development, often utilizing teachings from the Yajurveda and Atharvaveda to impart practical knowledge and shape Aryan culture. Instruction primarily occurred through listening,

contemplation, and meditation, with the later evolution of the question-answer system. Teachers held a revered position and served as primary guides for their students. Codes of conduct and discipline were integral components of education, which typically lasted twelve years and was delivered through Gurukuls (teacher's households), Parishads (academic institutions), and Sammelans (conferences).

2.2. The Three Practices:

Education was focused on three essential practices known as *Sravana*, *Manana*, and *Niddhyaasana*. *Sravana*, which translates to "listen and understand," emphasized the importance of actively comprehending teachings rather than mere hearing. It involved listening attentively to truths conveyed by the teacher orally, as knowledge was considered to be what the ear heard (*Sruti*), not what was seen in writing. *Manana*, the second process, involved the pupil reflecting on the lessons received orally, thereby fully assimilating the knowledge. It entailed discussing and reflecting on the truths learned during *Sravana*, often facilitated by the teacher posing questions and engaging in group discussions. *Niddhyaasana*, the third step, emphasized the complete comprehension and internalization of the truth taught. It focused on living the truth rather than simply explaining it verbally, signifying the realization of truth. In ancient times, *Manana*, or reflection, was particularly reserved for highly intelligent students. Each student underwent these three phases—*Sravana*, *Manana*, and*Niddhyaasana*—every day, highlighting their significance in the educational process despite their apparent simplicity.

2.3. The Gurukul:

During ancient times, the Gurukul system of education thrived, wherein students resided at their guru's abode and received comprehensive instruction that could be applied to real-life challenges. Students would leave their homes to live with their gurus until the completion of their education.. A profound bond existed between teacher and student, with each student being assigned a specific teacher. The emphasis was placed on nurturing the student-teacher relationship, with students personally meeting their teachers to receive instruction. The duration of the course typically spanned 10-12 years, with students relying on memory rather than books for learning. Education took place in forested areas, secluded from urban environments, to provide students with a tranquil and conducive study atmosphere. The Gurukul accommodated students from diverse socioeconomic backgrounds, all leading simple lifestyles.

The foremost aim of ancient education system was to develop the overall personality and character. The moral strengths were induced that helped the society to be together. During the early Vedic period, women's education was also given more emphasis.Following the Vedic era, the advent of sutra literature marked the transition to a more practical method of education, characterized by specialized branches of learning including Geometry, Algebra, Physiology, Astronomy, Astrology, and Vedas, as evidenced by the works of Panini, Katyayana, and Patanjali.

2.4. Disadvantages of Ancient Learning:

The primary drawback of the system lay in its rigid adherence to caste-based compartments for education and training, wherein the Vaishyas, engaged in commerce, agriculture, and trade, required a comprehensive understanding of arithmetic, geography, economics, agricultural science, and business methods, while the Shudras were limited to learning dancing, vocal and orchestral music, and dyeing techniques, with knowledge and skills passed down through generations, often excluding provision for higher education, particularly for the Shudras, and further exacerbated by restricted access for women to certain educational institutions, predominantly reserved for the affluent and influential. [3] [4]

3. Revolutionizing Education: The Impact of Digital Platforms

In the ever-evolving landscape of education, the integration of digital platforms has emerged as a transformative force, reshaping traditional learning paradigms and offering unprecedented opportunities for both educators and learners. Digital platforms in education encompass a diverse range of tools and technologies that leverage the power of the internet to facilitate enhanced communication, collaboration, and access to information. These platforms provide a dynamic and interactive learning environment, breaking down geographical barriers and fostering global connectivity. From online courses and virtual classrooms to interactive learning modules and collaborative projects, digital platforms offer a rich tapestry of resources to cater to diverse learning styles. As we navigate the 21st century, the seamless integration of digital tools in education not only enhances accessibility but also cultivates a more personalized and adaptive approach to learning, empowering individuals to acquire knowledge at their own pace and on their terms. The world of education has undergone a remarkable transformation over the years, propelled by the rapid advancements in technology. The evolution of digital learning has not only changed the way we acquire knowledge but has also democratized education, making it accessible to learners worldwide.

3.1. The Birth of E-Learning (1990s)

The 1990s witnessed the nascent stages of a profound transformation in education with the birth of e-learning, marking a pivotal moment in the history of digital learning. The rise of the internet during this era laid the foundation for a revolutionary shift in educational paradigms, liberating learning from traditional confines and transcending geographical limitations. The emergence of e-learning was characterized by the pioneering efforts to leverage digital technologies for educational purposes, offering a departure from conventional classroom settings. Early e-learning materials, though rudimentary by today's standards, represented a groundbreaking departure from the norm. These initial online courses and educational resources primarily comprised text-based content and basic graphics, yet they symbolized the inception of a more accessible and flexible educational landscape. The dawn of e-learning in the 1990s set in motion a trajectory that would redefine how knowledge is disseminated and acquired, heralding a new era where learning became increasingly adaptable, collaborative, and unrestricted by physical boundaries.

In the dynamic landscape of digital education, the 2000s marked a significant evolution with the integration of multimedia elements into the learning environment. In accordance with the cognitive theory of multimedia learning, visual art serves as an effective tool by aiding students in organizing received information systematically and stimulating their interest in learning. Technological advancements during this era paved the way for a more enriched and interactive educational experience. [5] The integration of videos, animations, and interactive simulations became prevalent, offering diverse and engaging content that resonated with various learning styles. This multimedia integration not only enhanced the overall quality of educational materials but also provided educators with powerful tools to captivate and inspire learners. The advent of Learning Management Systems (LMS) further catalyzed this transformation by providing a centralized hub for educationalactivities. LMS platforms gained widespread popularity, offering seamless course delivery, assessment tools, and efficient student management. This centralized approach streamlined the administration of digital courses, fostering a more organized and accessible learning environment. The 2000s, therefore, witnessed a pivotal shift towards a more dynamic and multimedia-rich educational landscape, leveraging technology to create a multifaceted learning experience for students worldwide. [6] [7]

3.2. The Role of Digital Tools in Education

Traditional classroom instruction often faces limitations in providing immediate learning environments, prompt evaluations, and high levels of engagement. Conversely, digital learning tools and technology excel

in addressing these shortcomings. The efficiencies offered by such technologies often surpass those of traditional learning methods. With the widespread popularity of smartphones and other wireless devices among the general populace, integrating technology into the classroom becomes a logical step for schools and educational institutions. The adaptability and non-intrusive nature of today's technology enhance the appeal of learning for the next generation, making it more accessible and engaging. By embracing digital tools, educators can create dynamic and interactive learning environments that cater to diverse learning styles, fostering a more effective and enjoyable educational experience for students.

3.3. Digital Learning in the Pre-Pandemic Era

Before the onset of the global pandemic, digital learning was already gaining momentum as an effective complement to traditional classroom instruction. While face-to-face teaching remained the predominant mode of education, digital learning technologies were increasingly integrated into educational settings to enhance learning experiences and address diverse learner needs.In the pre-pandemic era, digital learning encompassed a variety of tools and platforms, including online learning management systems (LMS), educational websites, interactive multimedia resources, and digital textbooks. These technologies offered flexibility and accessibility, allowing students to access educational materials anytime, anywhere, and at their own pace. Additionally, digital learning facilitated personalized learning experiences, with adaptive learning algorithms tailoring instruction to individual student needs and preferences.Educators leveraged digital learning technologies to create engaging and interactive learning environments. Virtual classrooms, webinars, and video conferencing tools enabled real-time collaboration and communication among students and teachers, regardless of geographical location. Online discussion forums and collaborative projects fostered peer-to-peer learning and knowledge sharing, promoting critical thinking and problem-solving skills.Furthermore, digital learning provided opportunities for self-directed learning and skill development. Online courses, tutorials, and educational apps offered learners the flexibility to explore topics of interest and acquire new knowledge and competencies outside of traditional classroom settings. Digital portfolios and e-portfolios allowed students to showcase their work and demonstrate their learning progress.

3.4. Digital Learning: A Lifeline amidst the COVID-19 Pandemic

The COVID-19 pandemic emphasized the vital importance of digital learning as traditional educational systems encountered unparalleled obstacles. Amid widespread lockdowns and social distancing mandates, educational institutions globally were compelled to swiftly adjust to ensure uninterrupted learning.[8] [9] Digital learning proved indispensable for various reasons. While developed nations were better prepared to address the crisis, developing countries exerted significant efforts to fulfill this necessity. Digital technologies emerged as a lifeline for education during this pivotal period. [10] The pandemic forced a significant digital advancement in primary education for children. Globally, the percentage of Internet users surged from 16% in 2005 to 66% in 2022. By 2022, approximately 50% of the world's lower secondary schools were utilizing the Internet for educational purposes.

Digital learning platforms ensured uninterrupted education despite physical constraints, offering access to course materials, virtual classrooms, and assignment submissions. This flexibility was crucial during the pandemic when traditional classrooms were inaccessible, accommodating students' diverse schedules and locations. Amid health concerns, digital learning allowed students to remain safe at home while actively engaging in their education, mitigating the risk of virus transmission within educational settings. These platforms provided a range of resources tailored to various learning styles, including multimedia elements and collaborative tools, enhancing personalized learning experiences. Furthermore, digital learning transcended geographical boundaries, fostering global connectivity and exposing students to diverse perspectives and experiences. The pandemic emphasized the importance of robust digital infrastructure and

readiness for unforeseen challenges, with institutions embracing digital learning better equipped to navigate disruptions. Educators also enhanced their digital literacy and teaching skills, adapting to online instruction and professional development.

3.5. Challenges

Educational technology faces numerous challenges, particularly in its implementation and usage. Concerns arise over issues such as excessive screen time, the effectiveness of instructors' use of technology, and fairness. Digital education can contribute to social isolation for students who prefer group learning and tactile information assimilation. Many students, especially those from low-income families lacking digital devices and internet access at home, encounter difficulties with online schooling. Moreover, prolonged technology use can lead to physical discomfort, particularly for young students under 15. Inconsistent quality of digital learning materials and disparities based on socio-economic status, disabilities, or language further exacerbate educational inequalities. Excessive screen time and reliance on digital devices may also result in fatigue, eye strain, and mental health issues, highlighting the need for balanced strategies in digital learning environments. Additionally, assessing student progress and providing timely feedback can be challenging, especially with large class sizes or limited opportunities for one-on-one interaction. Maintaining student engagement and motivation poses another challenge, as digital learning environments may struggle to replicate the sense of connection found in traditional classrooms. Furthermore, disparities in access to reliable internet connections and digital devices can impede participation in digital learning, particularly in rural or underserved areas. [11] [12]

3.6. Future Scope

In the future, a multitude of education technology companies, spanning from small startups to large enterprises, are emerging and offering a diverse array of digital solutions to academic institutions. This trend is poised to enhance the quality of digital infrastructure nationwide, making innovative educational technology more accessible to a broader audience. The envisioned outcome includes the elimination of linguistic barriers and improved online availability of learning resources in regional languages, thereby making the learning process more appealing and inclusive. Rural students stand to benefit significantly from this shift, as they gain access to online courses to enhance their skills. Additionally, students in educationally disadvantaged areas are being introduced to the latest learning tools, facilitated by interactive digital media. The integration of digital platforms is expected to address the shortage of teachers in the country in the near future. While higher education classes have long enjoyed the flexibility of online courses, this flexibility is increasingly being extended to elementary schools as well. Looking ahead, digital platforms are likely to play an integral role in supporting children's learning journeys, creating more connected classrooms and providing students with greater access to knowledge. With digital learning, students can gain exposure to subjects before entering a physical classroom, enriching their educational experiences.

4. Discussion

Education in ancient India was primarily imparted through the Gurukul system, where students lived with their teachers in a residential setup. This system emphasized personalized mentorship and close student-teacher relationships. Learning relied heavily on oral transmission, with students memorizing texts and teachings passed down by their teachers. Written texts were less common, and education was centered on recitation, memorization, and discussion. E-learning utilizes digital platforms such as websites, apps, and online courses to deliver educational content. Students can access learning materials anytime, anywhere, using computers or mobile devices. E-learning often incorporates multimedia elements such as videos, animations, and interactive quizzes to enhance engagement and understanding. This multimedia approach

caters to diverse learning styles and preferences. E-learning offers flexibility in terms of pacing and scheduling, allowing students to learn at their own pace. They can revisit concepts, pause, rewind, or fast-forward through lessons as needed, promoting personalized learning experiences.

Digital learning offers several advantages in addressing caste system and gender-biased education systems. Firstly, it enhances accessibility by providing learning opportunities to individuals irrespective of their caste or gender, breaking down barriers to education. Secondly, the flexibility of digital learning allows individuals from marginalized backgrounds to balance their familial or societal obligations with their studies, as they can access educational content at their convenience. Thirdly, digital platforms promote inclusivity by providing a platform for diverse voices and perspectives, fostering greater awareness and understanding among learners. Additionally, personalized learning technologies tailor educational content to individual learning styles and preferences, helping to address gaps in education caused by discrimination. Finally, digital learning empowers individuals from marginalized communities by providing them with access to educational resources and opportunities for skill development, thereby challenging discriminatory practices and enhancing socio-economic prospects. Overall, digital learning has the potential to mitigate the effects of caste system and gender bias in education, promoting accessibility, inclusivity, and empowerment for all learners.

Despite these differences, there are also some similarities between ancient Indian learning and digital learning. Both ancient Indian learning and e-learning offer personalized learning experiences that cater to the unique needs and preferences of each student. They both emphasize the acquisition and mastery of knowledge, whether through memorization of sacred texts in ancient India or participation in interactive online courses in e-learning. Additionally, both systems have shown adaptability to changing circumstances: ancient Indian education evolved over time to suit the needs of society, while digital learning has emerged in response to the demands of the digital age. In summary, while ancient Indian learning and learning through digital media differ in their methods and delivery mechanisms, they share common goals of promoting knowledge acquisition, personalized learning experiences, and adaptability to meet the needs of learners.

References:

1. M.M. Ghonge, R. Bag, and A. Singh, Indian Education: Ancient, Medieval and Modern, Education at the Intersection of Globalization and Technology. IntechOpen, Apr. 07, 2021. doi: 10.5772/intechopen.93420.
2. E.M. Onyema, E.C. Deborah, Potentials of Mobile Technologies in Enhancing the Effectiveness of Inquiry-based learning. International Journal of Education, 2019;2(1):1. doi: 10.5121/IJE.2019.1421.
3. S.P. Chaube, History and Problems of Indian Education, Agra: VinodPustakMandir.
4. Indian Educational System: An Overview of the Ancient Indian Education http://content.inflibnet.ac.in
5. T.S. Eng, The impact of ICT on learning: A review of research. International Education Journal. 2005;6(5):635–650.
6. J. Keengwe, M. Bhargava, Mobile learning and integration of mobile technologies in education, Education and Information Technologies, 19 (4) (2014), pp. 737-746
7. P.L. Rogers, Barriers to adopting emerging technologies in education, Journal of educational computing research, 22 (4) (2000), pp. 455-472

8. S. J. Daniel, Education and the COVID-19 pandemic. Prospects. 2020;49(1):91–96. doi: 10.1007/s11125-020-09464-3.

9. J. König, D.J. Jäger-Biela, N. Glutsch, Adapting to online teaching during COVID-19 school closure: Teacher education and teacher competence effects among early career teachers in Germany. European Journal of Teacher Education. 2020;43(4):608–622. doi: 10.1080/02619768.2020.1809650.

10. S. Burlacu, Characteristics of knowledge-based economy and new technologies in education Revista »Administratiesi Management Public« (RAMP) (16) (2011), pp. 114-119

11. J. Voogt, O. Erstad, C. Dede, P. Mishra, Challenges to learning and schooling in the digital networked world of the 21st century, Journal of Computer Assisted Learning, https://doi.org/10.1111/jcal.12029.

12. R. Singh, Learner and learning in digital era: Some issues and challenges, International Education & Research Journal [IERJ] 2.10 (2016): 92-94.

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