Tracing the Tapestry of Indian Education: From Gurukuls to Global Classrooms

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ABSTRACT

Education has long been recognized as a foundational investment in developing human capital. This article presents a historical analysis of higher education in India, tracing its paradigms from ancient traditions to contemporary models. By examining instructional methods, curricula, pedagogical philosophies, and learning objectives across distinct eras, Ancient Period, Medieval Period, Colonial Era, and the Modern Era, the paper highlights the dynamic interplay between societal development and educational evolution. It critically evaluates the continuities, disruptions, and transformations in indigenous systems such as the Gurukul, Madarsa, and Maqtab, emphasizing their relevance for present-day educational reform. The article aims to inform educators, policymakers, and learners by drawing comparative insights that bridge historical wisdom with modern aspirations.

Keywords: Gurukul, vocational education, Madarsa, Maqtab, indigenous pedagogy, educational paradigms, higher education history, Indian Knowledge Systems (IKS), curriculum evolution, instructional methods

INTRODUCTION

This article analyses instructional methods, curricula, presentation formats, and learning philosophies across ancient and medieval Indian education. It explores how these pedagogical foundations differ from contemporary structures and what present-day systems might gain by revisiting indigenous educational wisdom. By applying comparative criteria, the study distinguishes the benefits and limitations of learning models across eras, aiming to inform educators and learners about systemic variations and the urgent need for transformative reforms grounded in Indian epistemologies.

Ancient Period

In ancient India, higher education revolved around the transmission of spiritual insight, philosophical inquiry, and ethical discipline, an ethos markedly distinct from today's utilitarian emphasis on economic outcomes. Rigvedic instruction was primarily oral, with gurus imparting knowledge directly to disciples through rigorous memorization and dialogic engagement. Educational texts emphasized the mastery of six Vedangas, *Kalpa* (rituals), *Shiksha* (phonetics), *Chhandas* (metrics), *Nirukta* (etymology), *Jyotisha* (astronomy), and *Vyakarana*, the linguistic science of grammar and analysis (Scharfe, 2002).

The *Upanishadic* tradition offered philosophical depth through contemplative inquiry into metaphysics and human consciousness, highlighting the transition from ritual-centered instruction to introspective pedagogy (Radhakrishnan, 1929). Ancient universities such as Takshashila and Nalanda attracted global scholars, offering advanced instruction in logic, medicine, and Buddhist philosophy (Ghosh, 2001).

Kautilya's *Arthashastra* (circa 400–300 BCE) provided an extensive framework for education in politics, statecraft, religion, agriculture, and economics. His realist and strategic philosophy, often likened to Machiavellian thought, positioned him as one of India's earliest political theorists a tactician whose vision extended beyond royal instruction into civic governance and diplomacy.

The Gurukul system served as the cornerstone of residential and moral education. Rooted in nature and tradition, Gurukuls often operated beneath tree canopies in fair weather, transitioning to thatched shelters during monsoons. Former temple colleges boasted large lecture halls and student residences, while ashrams near rivers or lakes cultivated serene spaces for introspection and intellectual cultivation. These settings emphasized *vidyā*

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as both spiritual and rational pursuit, a tradition undermined by colonial disruption and the subsequent imposition of Western educational systems (Kumar, 2005).

Purpose of Education

The Vedas stand as the earliest monument of Aryan literacy, though colonial erasure led to the loss of key educational resources and frameworks (Scharfe, 2002). The term *education* originates from the Latin *educare* 'to lead out' reflecting the teacher's responsibility to nurture and develop a student's inherent potential. In Sanskrit, *Shiksha* denotes both instruction and learning, emphasizing reciprocal growth between teacher and pupil.

Philosophers across time have echoed this sentiment. Aristotle defined education as the cultivation of virtue through habituation, famously describing it as "a sound mind in a sound body" (Aristotle, 2015). His view of education as a harmonized and progressive unfolding of innate capabilities resonates with Johann Heinrich Pestalozzi's vision: that holistic education leads to moral development and societal regeneration. Likewise, Swami Vivekananda stressed character-building and nation-building as central goals of true education, proposing that spiritual and intellectual growth must go hand in hand (Vivekananda, 1897).

Characteristics of Ancient Education

Education often spanned a decade or more, nurturing bodily and psychological growth through mnemonic techniques and dialogic learning. The curriculum covered a vast array of disciplines—from the four Vedas and six Vedangas to the Darshanas, Puranas, Upanishads, and *Tarka Shastra*. Instruction was typically oral, supplemented by structured debates and annual evaluations. Gurukuls were frequently located in the teacher's village, where students lived and studied following their formal initiation rites. Higher education institutions like *Parishads* emphasized dialectical reasoning and scholastic inquiry as the core of intellectual training (Mukherjee, 1960).

Advanced Educational Institutions

Takshashila, also known as Taxila, flourished as a center of higher learning renowned for religious and Buddhist instruction. Prominent scholars included Panini, the celebrated grammarian who composed the *Ashtadhyayi*, a foundational text in Sanskrit grammar (Panini, trans. Basu). Chanakya, also known as Kautilya, contributed substantially in the domains of economics and political science, making Takshashila a hub for statecraft and diplomacy (Altekar, 2009). Students from regions such as Kosala, Kashi, and Magadha travelled long distances to study there testimony to its academic prestige (Sharma & Kumar, 2008).

Nalanda, referred to as *Nala* during Xuan Zang's visit, was equally illustrious. Students from China, Tibet, South-East Asia, and Nepal studied subjects ranging from fine arts and Vedas to medicine, mathematics, and astronomy (Watters, 1904). Xuan Zang himself enrolled in *Yogashastra* at Nalanda, while scholars like Nagarjuna and Aryadeva taught Buddhist philosophy, reflecting the institution's cosmopolitan appeal.

The Vallabhi monastery was renowned for its extensive library and specialization in the Hinayana sect of Buddhism. Subjects such as $n\bar{\imath}ti$, vartta, dharma, and chikitsashastra featured prominently. According to Hiuen-Tsang, teachers like Asanga, Ashvaghosa, Vasumitra, and Bhadraruchi brought intellectual brilliance to these institutions (Altekar, 2009).

In South India, educational traditions evolved distinctly, often rooted in religious practice. Craft-based vocational education thrived within caste and guild structures. The Brahmanical mathas, Jain patshalas, and Buddhist viharas served as advanced centers during the Pallava and Chola periods, with curricula revolving around the Vedas and Vedangas (Altekar, 2009).

Medieval Period

While Southern centers continued to flourish, Northern institutions such as Banaras, Prayag, Haridwar, Ujjain, and Mithila sustained traditional learning through pathshalas and tols. Under the Mughals, education gained

fresh momentum: Mithila became prominent for logic, and madrasas emerged in key urban locales like Ajmer, Delhi, Badaun, Jalandhar, and Uchh (Kaur, 1990).

These madrasas, supported by rulers and nobles, balanced secular learning with religious and moral instruction, fostering ethical and intellectual development (Arar et al., 2023). Babur, fluent in multiple languages, established madrasas at Jaunpur; Humayun added institutions in Delhi and Agra, while Akbar sought to synthesize Hindu and Muslim curricula, removing theology from syllabi and promoting inclusive education (Bakshi & Sharma, 1999).

By the early 16th century, the madrasa curriculum spanned seven disciplines: language, literature, logic, jurisprudence, legal principles, Qur'anic commentary, and mysticism (Tunc Sen, 2021). The arrival of Islamic educational philosophy dramatically reshaped India's pedagogical landscape, emphasizing both knowledge dissemination and faith-based values.

Educational Organization

Two primary institutional types emerged: maktabs for elementary instruction and madrasas for advanced learning. Madrasas received more funding and status. They operated under diverse patronage—royal foundations, mosque-affiliated schools, Sufi hospices, tomb-linked institutes, and independent scholarly efforts (Arar et al., 2023; Kaur, 1990).

Notable institutions included Muizzi, Nasiri, and Firuzi madrasas in Delhi; Mohammed Gawani's madrasa in Bidar; and Abul Fazl's in Fatehpur Sikri. The *Sirat-i-Firuz Shahi* lists 14 disciplines taught in madrasas, indicating curricular breadth. The Muslim period saw the rise of technical and vocational education, a crucial post-Gupta development in centralized governance and statecraft (Waller et al., 2021).

Instructional discipline was paramount. Students faced penalties for violating institutional rules. Class sizes were modest, allowing for close student-teacher interactions. In certain contexts, senior instructors collaborated with juniors to enhance pedagogical effectiveness reinforcing cooperative learning and instructional refinement (Altekar, 2009).

Islamic System of Education

Throughout the medieval period, the Islamic educational system gradually replaced the established Vedic and Buddhist systems as Islamic governance became increasingly prominent. This shift began with the establishment of the Delhi Sultanate, ushering in a structured and textually anchored Islamic educational philosophy (Arar et al., 2023). Islam defines education as the process of imparting, obtaining, or understanding knowledge, an idea foundational to the Baghdadi Abbasid tradition which strongly influenced Indian pedagogical structures.

Educational currents from Samarqand, Bukhara, and Iran converged with Indian scholarship. Amir Khusrau, a polymath of the Indian subcontinent, not only mastered writing and poetry but innovated a language suited to the subcontinental milieu. This synthesis was later documented by scholars like Minhaj-us-Siraj, Ziauddin Barani, and Afif (Altekar, 2009).

The Islamic curriculum was bifurcated into *manqulat* (traditional sciences), such as theology, jurisprudence, and history and *maqulat* (rational sciences), which included logic, mathematics, medicine, astronomy, and philosophy. The period of Iltutmish (1211–1236 to 1489–1517) marked greater curricular emphasis on rational sciences, transforming educational methods by integrating logic and philosophical inquiry (Kaur, 1990).

Educational System under the Mughals

Mughal rulers held education in high regard. Institutions such as pathshalas, maktabs, madrasas, and vidyapeeths disseminated knowledge to the populace. Akbar notably donated funds for educational infrastructure and established a college near the Jama Masjid (Bakshi & Sharma, 1999). The curriculum expanded to include Persian translations of Sanskrit texts and disciplines like accounting, public administration,

and geometry. Humayun institutionalized astronomy, geography, and mathematics in Delhi's madrasas, fostering scientific exchange and reducing cultural prejudices (Chakrabarti, n.d.).

However, a major drawback of the system was the lack of educational access for women. While royal and affluent families educated women at home, institutional barriers remained. The Mughal period also saw the linguistic fusion of Persian and Hindi, giving rise to Urdu, a language emblematic of Indo-Turkic cultural exchange (Altekar, 2009).

Vocational Education

Vocational and technical education flourished during the Muslim era. Instruction aligned with individual skills and interests, spanning trades such as carpentry, silk weaving, dyeing, pottery, metalwork, jewelry-making, and handicrafts (Waller et al., 2021). This diversification marked a significant shift from the rigid Brahmanical frameworks of earlier epochs.

The Muslim educational system dominated medieval India with its blend of religious instruction, intellectual cultivation, and sociopolitical utility. Key features included ruler patronage, absence of state regulation, religious emphasis, vocational relevance, and disciplined pedagogy. Teacher-student interactions remained personal and rigorous. Though women were respected, systemic exclusion from formal education persisted.

In Delhi, under Allauddin Khilji, institutions such as the Madarsa-i-Nasiria were established. Humayun promoted geography, astronomy, grammar, and classical languages like Arabic and Persian (Chakrabarti, 412). These centres contributed richly to medieval intellectual life.

Colonial Period

The colonial era introduced structural disruptions to Indian education. With the Mughal decline, traditional institutions withered. In 1781, Warren Hastings, responding to Muslim scholars, founded the Calcutta Madrasa to foster Arabic and Persian studies (Kaur, 1990). In 1800, Lord Wellesley established Fort William College for East India Company civil servant training in vernacular languages and customs.

Raja Ram Mohan Roy opposed the expansion of oriental colleges and advocated for modern education, culminating in the founding of Hindu College (Presidency College) in 1817—India's first English-medium institution with an emphasis on Western humanities and sciences (Altekar, 2009).

In 1886, the Dayanand Anglo-Vedic College emerged in Lahore to promote English education among upperclass Muslims. The 1917 Sadler Commission, chaired by Dr. M.E. Sadler, restructured Indian education with its twelve-year school model and recommended autonomous teaching universities. This led to the creation of institutions in Mysore (1916), Banaras (1916), Patna (1917), Osmania (1918), Aligarh (1920), Lucknow (1921), and Dacca (1921).

The Serampore College, founded in 1818 at Shrirampur by three Baptist missionaries, marked a significant development in India's higher education landscape. These missionaries were also the first to cast movable type in an Indian script, revolutionizing vernacular print culture and educational access (Hunter, 1875). This institution later became a symbol of Christian educational contribution and the missionary impetus behind institutional reform.

Parallelly, Warren Hastings, in his 1784 correspondence to the Court of Directors, referenced the remnants of scholarly institutions across Northern India and the Deccan. Responding to appeals from Muslim scholars, he facilitated the founding of the Calcutta Madrasa in 1781, which focused on classical Islamic subjects like Arabic and Persian (Das Gupta, 1900).

By 1800, Lord Wellesley established Fort William College, intended to train East India Company civil servants in Indian languages and customs—ushering in vernacular scholarship alongside administrative education (Chauhan, 2004). Protestant and Catholic institutions collaborated in this mission. Notably, Catholic initiatives contributed significantly to higher education in regions like Madurai Diocese, exemplified by local colleges and teacher training centers (Vilveena, n.d.).

Opposition to Orientalist education also emerged. Raja Ram Mohan Roy, a proponent of modern reform, protested against the government's plans to bolster the Calcutta Madrasa and Banaras Sanskrit College, calling instead for modern instruction in English. His advocacy led to the establishment of Hindu College (later Presidency College) in 1817, pioneering modern education and the translation of European scientific literature into Indian languages (Ministry of Education, 2014).

The Dayanand Anglo-Vedic College, founded in 1886 in Lahore, aimed to extend English education to upperclass Muslims. This movement later expanded to other regions, advancing modernist pedagogies and integrating Western academic models.

In 1917, the Sadler Commission, chaired by Dr. M.E. Sadler, was appointed to evaluate the education system from primary school to university level. The commission recommended a twelve-year school program, shortened university degree durations, and stressed the need for autonomous, residential institutions rather than affiliation-based models. It further advocated expanding vocational and professional colleges, resulting in the establishment of universities in Mysore (1916), Banaras (1916), Patna (1917), Osmania (1918), Aligarh (1920), Lucknow (1921), and Dacca (1921)—ushering in a new era of Indian higher education (Chauhan, 2004).

Table 1: Progress of Education between 1901-02 To 1936-37

Type of Institution -	No. of Institutions			No. of Scholars		
	1901-02	1921-22	1936-37	1901-02	1921-22	1936-37
1. Universities	5	10	15	N.A.	N.A.	9,697
2. Arts colleges	145	165	271	17,651	45,418	86,273
3.Professional Colleges	46	64	75	5,358	13,662	20,645

Source: Naik & Nurullah (1971), Student's History of Education in India, pp. 213, 284

Between 1901 and 1936, India witnessed substantial growth in institutional capacity and student enrollment. Universities increased from 5 to 15, with scholars reaching 9,697 by 1936. Arts colleges saw a steady rise in both institutions and scholars—from 145 colleges and 17,651 scholars in 1901 to 271 institutions and over 86,000 students by 1936. Professional colleges followed a similar trend, reflecting strong public and governmental interest in higher education.

Table 2: Universities In India - 1857-1947

S.No.	Name of the University	Date of Foundation	Number of Students
1	Calcutta	1857	45,008
2	Bombay	1857	43,090
3	Madras	1857	28,888
4	Allahabad	1887	3,502
5	Banaras	1916	5,083
6	Mysore	1916	9,350
7	Patna	1917	5,471
8	Osmania	1918	4,862
9	Aligarh	1920	4,009
10	Lucknow	1921	3,893
11	Delhi	1922	4,311
12	Nagpur	1923	5,734
13	Andhra	1926	9,445
14	Agra	1927	9,936
15	Annamalai	1929	1,981
16	Travancore	1937	5,715
17	Utkal	1943	3,662
18	Sagor	1946	1,828
19	Rajputana	1947	N.A.

Source: Naik & Nurullah (1971), Student's History of Education in India, pp. 213, 284.

In Post-Independence Education in India

After gaining independence in 1947, India's education policy was recalibrated to serve the dual purpose of nation-building and democratic consolidation. The Radhakrishnan Commission (1948–49) marked the first effort to reform university education in alignment with the scientific, social, and economic aspirations of a sovereign India. It stressed a triadic vision for higher education: general education, liberal education, and vocational training (Ministry of Education, 2014).

To institutionalize these reforms, the University Grants Commission (UGC) was founded in 1953 and formalized under the UGC Act of 1956, with Dr. C.D. Deshmukh as its inaugural chairman. The UGC became the statutory custodian of quality, coordination, and funding in higher education (Chauhan, 2004).

In 1964, the Kothari Commission provided India's first comprehensive education policy blueprint. It proposed the three-language formula, urged for 6% of GDP investment, introduced national admission systems, and recommended independent institutional rating mechanisms. The commission's strategic balance government-led primary education and private-led higher education—would influence educational thinking for decades (Das Gupta, 1900).

By the early 21st century, India's education system was increasingly shaped by global forces. The rise of transnational mobility, digital learning, and competitive knowledge economies highlighted structural gaps and skill mismatches. International benchmarks in multidisciplinarity, credit portability, and inclusivity prompted introspection. This confluence of domestic challenges and global imperatives triggered the formulation of the National Education Policy (NEP) 2020.

NEP 2020 represents a landmark shift, reimagining education as both a public good and a global competency tool. It introduces a flexible 5+3+3+4 school structure, promotes experiential and multilingual learning, and replaces rigid affiliation models with integrated multidisciplinary universities. At the tertiary level, the policy advocates multiple entry–exit pathways, a centralized Academic Bank of Credits, and dynamic course structures geared toward global employability.

Importantly, NEP 2020 restores the prominence of Indian Knowledge Systems (IKS), encouraging education that is both culturally rooted and internationally adaptive. It recommends establishing international campuses, regulating foreign direct investment (FDI) in sectors like science, technology, and management, and promoting student exchange programs, research collaboration, and global internships.

In essence, NEP 2020 bridges India's educational legacy, from Gurukuls steeped in indigenous wisdom to global classrooms powered by digital and international partnerships. It positions India not only as a beneficiary of global academic trends but also as a contributor to the evolving tapestry of knowledge systems worldwide.

Conclusion

In ancient times, education primarily focused on social, political, moral, and civic values, emphasizing the development of character and responsible citizenship. Christian missionaries played a significant and heartfelt role in promoting education across India. The well-known debate between Orientalists and Anglicists greatly influenced British educational policies. Wood's Despatch recommended the establishment of universities in each presidency Calcutta, Bombay, and Madras, as part of a broader strategy to govern India through a class of educated Indians prepared for civil service roles.

Following numerous revolts, freedom movements, and the efforts of social activists and reformers, it became evident that education was essential for self-determination. Indians realized that progress could not be achieved without education by any means necessary. The initial emphasis on agriculture gradually shifted towards industrialization. After 2000, the government began to recognize that equitable access to education could transform governance, combat poverty, and ensure equal rights across caste, class, and religious lines. Post-Independence, India saw the emergence of several new universities, complemented by philanthropic initiatives that led to the establishment of institutions across diverse regions of the country. Education became not just a right but the engine for democratic resilience, poverty eradication, and socio-cultural integration.

REFERENCES

Altekar, A. S. (2009). Education in ancient India. Isha Books.

Arar, K., Sawalhi, R., & DeCuir, A. (2023). Islamic-based educational leadership, administration and management: Challenging expectations through global critical insights. Taylor & Francis. https://doi.org/10.4324/9781003174297

Aristotle. (2015). The Aristotle collection [50 books]. Catholic Way Publishing.

Bakshi, S. R., & Sharma, S. K. (1999). Jahangir: The great Moghul. Amar Chitra Katha.

Chakrabarti, R. (n.d.). Studies in Mughal institutional history, p. 412.

Chauhan, C. P. S. (2004). Modern Indian education: Policies, progress and problems. Kanishka Publishers.

Chauhan, C. P. S. (2004). Modern Indian education: Policies, progress and problems. Kanishka Publishers.

Das Gupta, P. C. (1900). Science and modern India: An institutional history (1784-1947). Pearson Education.

Das Gupta, P. C. (1900). Science and modern India: An institutional history (1784-1947). Pearson Education.

Ghosh, S. C. (2001). History of education in India. Rawat Publications.

Hunter, W. W. (1875). A statistical account of Bengal (Vol. 5). Trubner & Company.

Indian Ministry of Education. (2014). Progress of education in India (Vol. 1). University of California.

Indian Ministry of Education. (2014). Progress of education in India (Vol. 1). University of California.

Indian Ministry of Education. (2020). *National Education Policy* 2020. Government of India. https://www.education.gov.in/sites/upload_files/mhrd/files/NEP_Final_English_0.pdf

Kaur, K. (1990). Madras education in India: A study of its past and present.

Kautilya. (n.d.). Arthashastra (translated editions used for political and educational analysis).

Kumar, K. (2005). Political agenda of education: A study of colonialist and nationalist ideas. Sage Publications.

Mukherjee, R. K. (1960). Ancient Indian education. Motilal Banarsidass.

Naik, J. P., & Nurullah, S. A. (1971). Student's history of education in India (1800–1965). Macmillan.

Panini. (n.d.). The Ashtadhyayi (S. C. Basu, Trans.).

Pestalozzi, J. H. (n.d.). Referenced in European and American educational reform literature.

Radhakrishnan, S. (1929). Indian philosophy (Vol. I). Oxford University Press.

Scharfe, H. (2002). *Education in ancient India*. Brill Academic Publishers. https://doi.org/10.1163/9789047401434

Sharma, C. K., & Kumar, R. (2008). Library and information science (Vol. 3). Atlantic Publishers.

Tunc Sen, A. (2021). The sultan's syllabus revisited: Sixteenth-century Ottoman madrasa libraries and the question of canonization. *Studia Islamica*, 116(2), 198–235. https://doi.org/10.1163/19585705-12341487

Vilveena, A. J. (n.d.). *Contribution of Catholics to the cause of higher education in Madurai Diocese*. Archers & Elevators Publishing House.

Vivekananda, S. (1897). Collected works of Swami Vivekananda. Advaita Ashrama.

Waller, L., Kurebwa, M., Waller, S., & Mpofu, V. (2021). *Education at the intersection of globalization and technology*. IntechOpen. https://doi.org/10.5772/intechopen.100101

Watters, T. (1904). On Yuan Chwang's travels in India, 629-645 AD. Royal Asiatic Society