

Teaching For The Workforce: Industrial Schools And Educational Methods In Colonial India (1850s-1940s)

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Abstract

This research paper delves into the dynamics of technical and industrial education during colonial India, analyzing the influential role of imperial objectives as driving force behind its implementation. Central to this examination are the primary aims, including the expansion of British capital and the reinforcement of support for Britain's wartime endeavors, which serve as foundational aspects guiding the emphasis on industrial education within colonial educational framework. The paper meticulously scrutinizes the ways in which these imperial ambitions distinctly shaped the focus of curricula and institutional priorities, resulting in widespread proliferation of technical education initiatives. Moreover, the paper undertakes an in-depth exploration of the intricate socio-cultural landscape, unraveling the caste-based anxieties instigated by the introduction of industrial education in India. It carefully examines how the introduction of technical education disrupted existing societal hierarchies, triggering concerns and tensions within caste-based communities. This comprehensive analysis endeavors to offer a nuanced understanding of the intricate interplay between imperial motivations, socio-cultural anxieties, and the evolution of technical and industrial education within the framework of colonial India.

Keywords: Industrial Education, Caste and Education, Colonialism, Imperialism and Native workforce.

Introduction

The period spanning from 1850s to the 1940s in colonial India witnessed significant evolution in the educational landscape, driven by the evolving needs of the British colonial administration and the societal changes in a country under colonial rule. A pivotal aspect of this transformation was the

emergence and growth of industrial schools, this educational approach was deliberately tailored to align with the specific objectives and priorities set by the colonial rulers. These institutions adopted a unique pedagogical approach, intending to cultivate a workforce tailored to serve the distinct requirements of the colonial administration. The curricula and teaching methodologies adopted by these schools aimed to produce a skilled labor force that could effectively contribute to the goals of the British imperial agenda. This educational system was fundamentally different from traditional indigenous education that had prevailed in India for centuries. This exploration of colonial India's industrial schools delves into several aspects, including their objectives, methodologies, and overall impact. By examining the historical context and rationale behind these establishments, as well as their influence on India's broader educational landscape, we gain crucial insights into the intricate dynamics between the colonial rulers and the local populace. Moreover, this study delves into the pedagogical practices employed within these schools, shedding light on their role in shaping the intellectual and professional trajectories of the numerous individuals who passed through their doors. By understanding the role of industrial schools in colonial India, we not only unravel a crucial chapter in the history of Indian education but to gain insights into the ways in which education was instrumentalized to serve the interests of colonial powers. This examination allows us to critically analyze the legacy of colonial-era educational practices and their lasting impact on the Indian education system.

The paper focuses on an intriguing and thought-provoking aspect of colonial India's educational history. It delves into the apparent contradiction between the colonial administration's long-term objective of creating a disciplined, semi-skilled labour force and the unintended consequences of further reinforcing existing caste hierarchies and traditional views on manual labor through the establishment of "industrial schools." The paper explores of this asymmetry between discourse and policy in colonial education is a valuable perspective. The paper questions reflect the complexity of the situation, highlighting how everyday caste practices could assimilate the modernity of industrial schools and further entrench traditional notions of caste differences and manual labour. This demonstrates the agency of native populations in shaping the outcomes of colonial educational policies.

Focusing on the "absent institutions" of educational histories, especially industrial schools established by Christian missionaries and other private actors in regions like Maharashtra, Karnataka, and Tamil Nadu from the 1850s to the 1940s, provides a unique and localized perspective. This approach allows for a more nuanced examination of how these institutions, originally intended to produce a modern labor class, ended up perpetuating traditional social relations and caste hierarchies. The paper's approach to explore the underlying mechanisms and processes behind the observed outcomes in the context of colonial education in India is indeed compelling. By delving into the complexities of how educational policies and institutions interacted with the existing social structures and norms, the paper provides a more nuanced understanding of the historical dynamics at play. This depth of analysis not only enriches the field of educational history but also contributes to a broader comprehension of the multifaceted impacts of colonial rule in India. It sheds light on the unintended consequences of colonial educational policies and their intricate relationship with local social practices and hierarchies. By seeking to explain these processes, the paper opens new avenues for scholarship and encourages a more critical examination of colonial legacies in the context of education and social structures. The paper seeks to inspire further studies in this area and offers valuable insights into the complexities of colonialism's influence on education and society.

The existing literature on colonial education in India has notably overlooked the significance of industrial schools, highlighting a crucial gap in scholarly exploration. Previous studies have predominantly focused on themes such as English education, the Orientalist-Anglicist debate, and the influence of Western education on the local elite. While works by scholars like Syed Nurullah¹ and Krishna Kumar² have provided valuable insights into colonial education, they have often omitted the specific analysis of industrial schools. Additionally, the writings of Dharmpal³ Kazi Shadidullah⁴ and Joseph De Bona⁵ have explored the status of indigenous education,

¹ Syed Nurullah, *A History of Education in India*, (Bombay, 1951).

² Krishna Kumar, *Political Agenda of Education: A Study of Colonialist and Nationalist Ideas*, (New Delhi, 1991).

³ Dharmpal, *The Beautiful Tree: Indigenous Indian Education in the Eighteenth century*, (New Delhi, 1983).

⁴ Kazi Shahidullah, 'The Purpose and Impact of Government Policy on Pathshala Gurumohashoys in 19th century Bengal', *The transmission of knowledge in South Asia* (1996), pp. 119-134.

⁵ Joseph DiBona, *One Teacher, One School: The Adam's Report on Indigenous Education in 19th Century India*, (New Delhi, 1982).

revealing a two-tiered educational structure and the impact of colonialism on traditional educational systems. These existing studies have shed light on the dichotomy between indigenous and modern educational systems, highlighting the hierarchical nature introduced by colonial education. The discussions surrounding the practicality of indigenous education vis-à-vis the centralized modern system have revealed the intricacies of the educational landscape during colonial India. However, these analyses have missed an in-depth exploration of industrial schools, their objectives, and their impact within the colonial educational framework. This paper endeavors to address this gap by delving into the unexplored realm of industrial schools. By analyzing these institutions and their role within colonial education policies, this study aims to contribute to a more comprehensive understanding of the nuances, complexities, and implications of colonial educational strategies in India.

Within the existing literature on colonial education in India, two prevailing assumptions have shaped scholarly discourse. The first assumption suggests that the primary focus of the colonial government and Christian missionaries was to create an English-educated Indian elite class, largely overlooking the efforts made towards addressing the educational needs of lower-caste and impoverished communities. Consequently, the stories and experiences related to “industrial schools” and the perspectives of those who attended these institutions remain marginalized within the dominant narrative of elite educational establishments. The second assumption posits that the advent of colonial education shifted the educational focus towards an elitist paradigm, prioritizing theoretical learning and the needs of the colonial rulers over practical, community-oriented education essential for most of the population. While some writings by scholars like Robert Frykenberg⁶ and Suresh Gosh⁷ mention the existence of “industrial schools”, these institutions are rarely subjected to comprehensive analysis within scholarly discussions. This research aims to challenge and expand upon these assumptions by providing a more comprehensive and nuanced understanding of colonial education policies. Particularly, the study seeks to delve deeper into the consequences of these policies for marginalized and underprivileged communities. By

⁶ Robert E. Frykenberg, ‘The Myth of English as a “Colonialist” Imposition upon India: A Reappraisal with Special Reference to South India’, *Journal of the Royal Asiatic Society of Great Britain and Ireland*, 2, (1988), pp. 305-315.

⁷ Suresh C. Ghosh, *Education Policy in India since Warren Hastings*, (Calcutta, 1989).

exploring the narratives of industrial schools and amplifying the voices and experiences of those who were part of these institutions, this research aims to fill the gap in the literature and offer a more inclusive perspective on the complexities and implications of colonial education on diverse segments of society.

In recent years, scholarly investigations into colonial childhood and craftsmanship have increasingly integrated the histories of industrial schools into their research. An influential work in this area is Sarada Balagopalan's essay, which adopts a Foucauldian framework to analyze culture as a product shaped by power dynamics. Balagopala's study scrutinizes the contemporary cultural narratives surrounding "Manush" (learned men) and "Khatni" (manual labor) among underprivileged child laborers in Calcutta, investigating how these narratives were influenced by the discourse of colonial education.⁸ This critical examination sheds light on the complex relationship between colonial educational policies, prevalent cultural narratives, and the lived experiences of marginalized communities. Balagopalan illustrates how the Manush-Khatni dichotomy, originating from the pre-colonial social order, was further solidified during the colonial era through the establishment of industrial schools. These institutions were designed to produce a modern "worker", aligning with the interests of colonial capitalists seeking to benefit from the restructuring of caste hierarchies. The industrial schools offered limited formal education to the impoverished, followed by vocational and industrial training. However, Balagopalan's analysis stops short of delving into the specific mechanisms by which caste hierarchies and existing social structures were further entrenched. The essay offers a rich understanding of the broader context and consequences of colonial education on cultural narratives and marginalized communities but leaves room for further exploration into the precise processes through which caste hierarchies persisted within the framework of industrial schooling.⁹ In contrast to Sarada Balagopalan's work, Parinitha Shetty's research focuses on the industrial schools established by Basel Missionaries, proposing that these missionary institutions brought forth the Protestant concept of work as a reflection of a divine existence, a departure from traditional Indian notions of labor. These

⁸ Sarada Balagopalan, *Inhabiting 'Childhood': Children, Labour, and Schooling in Postcolonial India*, (London, 2014).

⁹ Balagopalan, *Inhabiting 'Childhood'*, pp. 87-88.

schools adopted a criterion for admission based on one's "capacity", admitting individuals who were considered unsuitable for conventional education to industrial schools.¹⁰ Shetty argues that these schools offered equal opportunities to students regardless of their background, which challenged, albeit partially, the deeply entrenched caste-based hierarchies prevalent in society. Her examination also delves into the gender dynamics within these institutions, highlighting how they perpetuated gender-specific divisions of labor. Women were often assigned domestic tasks like sewing, knitting, nursing, and childcare within the school's framework. Like Balagopalan's observations, Shetty notes that students encountered challenges in conforming to the disciplinary standards of the missionary-run institutions, which sometimes led the missionaries to misinterpret their struggles as laziness. This divergence in interpretations of students' behavior underscores the complex interactions between the educational norms of the institutions and the cultural backgrounds of the students, resulting in friction and misunderstandings.

In a recent essay authored by Karen A.A. Vallagarda, the focus is on artisanal schools founded by German missionary Carl Ochs and the Danish Missionary Society in Pattambakkam, Tamil Nadu. Vallagarda highlights a significant aspect where these schools, established to educate the underprivileged, were intricately linked to the conversion of lower-caste individuals to Christianity and the alteration of their indigenous practices.¹¹ The missionaries held a vision of a dignified future for boys centered around economic self-sufficiency, while for girls, respectability was defined by proficiency in household tasks. This perspective imposed the values of the upper caste and middle class onto lower-caste girls, disregarding their existing norms, particularly their involvement in manual labor outside the home. Vallagarda argues that this imposition of upper-caste and middle-class values through missionary schooling reinforced the prevailing colonial distinction based on racial differences between the colonizers and the colonized. It is suggested that Indian children were perceived as effeminate, small, and exhibiting a childhood that was viewed as lacking in the ability to engage in play. This perception created a stark contrast between British children and Indian

¹⁰ Parinitha Shetty, 'Re-Formed Women and Narratives of the Self', *ARIEL*, 37:1, (2006).

¹¹ Karen A. A. Vallagarda, 'Adam's Escape: Children and the Discordant Nature of Colonial Conversions', *Childhood*, vol. 18, (2011), pp. 298-215.

children, positioning the latter as “the Other” in relation to the former. This perception, Vallagarda asserts, served to validate and legitimize the colonial rule.¹²

The recent scholarly works examining the histories of overlooked educational institutions have made significant strides by delving into archival materials and private papers. However, despite this progress, there remains further ground to cover in this area of study. These writings reflect and echo the concept of “colonial difference” as elucidated by Partha Chatterjee, which underscores the differentiation between the colonizer and the colonized, with race serving as the primary distinguishing factor.¹³ Vallagarda's essay, for instance, posits the argument that European colonizers and colonial officials perceived Indian children as distinct “others” in contrast to Western children. This viewpoint aligns closely with Satadru Sen's depiction of native children as “little perverse adults”, a characterization that positioned them as perpetual juveniles according to the British perspective. Moreover, Ann Laura Stoler's scholarship adds weight to this notion by suggesting that the colonized were portrayed as “racialized others” who were equated with children due to the belief that their mental development would never reach full maturity. This portrayal of the colonized as childlike figures served a particular purpose, as it effectively justified the imperialist logic of colonialism. It contributed to the narrative that the colonized populations were inherently inferior and in need of guidance and control by the colonial powers. The scholarly analyses uncover complex methods through which perceptions of childhood and maturity were strategically manipulated to uphold and legitimize the ideologies of colonial dominance. These manipulations were integral to reinforcing the power dynamics and justifying colonial rule. The manipulation of childhood and maturity perceptions was a strategic tool for reinforcing colonial dominance, asserting cultural superiority, and justifying the imposition of colonial rule over indigenous societies.¹⁴

Brion Simon and E.P. Thompson's influential work challenges the overly simplistic framework of colonizer versus

¹² Vallagarda, ‘Adam's escape’, (2011), pp. 307-310.

¹³ Partha Chatterjee, *The Nation, and Its Fragments: Colonial and Postcolonial Histories*, (Princeton, 1993).

¹⁴ A. L. Stoler, *Race and the Education of Desire: Foucault's History of Sexuality and the Colonial Order of Things* (Durham, NC, 1995) cited in Alison Blunt, ‘Imperial geographies of Home: British Domesticity in India, 1886-1925,’ *Transactions of the Institute of British Geographers*, 24:4 (1999): p. 431; Satadru Sen, *Colonial Childhoods the Juvenile Periphery of India 1850-1945*, (London, 2006) pp. 26-28.

colonized, encouraging a deeper examination of historical dynamics surrounding “industrial schools” in India.¹⁵ This critical approach urges us to reevaluate conventional understandings of colonial discourse, focusing instead on the multifaceted roles played by native individuals within these educational institutions. Utilizing Archival materials¹⁶, ego documents¹⁷ and contemporary literature, Simon's analysis emphasizes the impact of the Education Acts of 1870 and 1902, which led to the creation of divergent school systems catering to distinct social classes. These legislative provisions resulted in a system that segregated children based on their social backgrounds, limiting, or completely denying access to schools attended by the upper and middle classes for children from working-class families. Public schools, due to high fees and specific curricula, became financially and structurally inaccessible to the lower social strata. Simon's research reveals how the educational divide was shaped by the ideologies of the upper and middle classes, embedding notions of social hierarchy and class distinctions within the educational framework. This societal lens contributed to the establishment of industrial schools, aiming to confine working-class children to their designated social positions. The intention was to prevent them from aspiring to or accessing educational opportunities available to the more privileged classes. This strategy reinforced prevailing social and class divisions of that period. Moreover, Simon's exploration exposes the derogatory labels assigned to working-class children, portraying them as “barbarians” or “criminals” in need of civilization through restricted education. These discriminatory attitudes further perpetuated the social stratification ingrained in the

¹⁵ See Brion Simon, *Studies in the History of Education*, (London, 1960); E.P. Thompson, *The Making of the English Working Class*, (Harmondsworth, 1968).

¹⁶ Archival documents encompass a broad spectrum of materials that hold historical significance and are preserved in archives, libraries, or repositories for research and reference purposes. These documents constitute a diverse range of primary sources offering valuable insights into various aspects of history, culture, society, and individuals. The archival documents serve as primary sources for researchers, historians, scholars, and the public, offering a direct and unfiltered view of historical events, social conditions, cultural practices, and individual perspectives from the past.

¹⁷ Ego documents, such as personal writings, diaries, letters, and other autobiographical materials, serve as invaluable primary sources offering insights into personal experiences, perspectives, aspirations, and sentiments of individuals or groups within historical contexts. During the late 19th century, the laboring class, organized through unions or other collective movements, increasingly voiced demands for access to secular education. These sentiments and demands are often reflected in ego documents of that era. These documents present firsthand accounts and personal narratives that shed light on the motivations, struggles, and desires of individuals from the laboring class seeking educational opportunities. Analyzing these primary sources provides historians and researchers with invaluable insights into the voices and agency of individuals within the laboring class striving for educational opportunities and social reform during the late 19th century.

educational system.¹⁸ Simon's research critically examines how the educational policies of the time not only mirrored but also reinforced existing social hierarchies and class-based distinctions, impacting the opportunities available to children based on their social backgrounds.¹⁹ The ideas of Scottish Enlightenment thinkers played a role in shaping the educational policies and ideologies that perpetuated class-based divisions in colonial India, contributing to the formation of an educational system tailored to specific social classes, including the establishment of industrial schools. During the 18th century, these intellectuals contributed significantly to discussions on society, morality, and human nature, shaping ideologies that influenced educational policies. In the context of colonial India and the establishment of industrial schools, the ideas propagated by these Enlightenment thinkers likely contributed to the formation of policies and attitudes that reinforced class-based educational divisions. The influence of Scottish Enlightenment thinkers, including Adam Smith²⁰,

¹⁸ During the late 19th century, the development of a "public" school system marked a pivotal stage in the establishment of a distinct societal hierarchy, as observed by historian G. Kitson Clark. This educational system was tailored to serve the interests and reinforce the social hierarchies of the upper and middle classes. The Education Act of 1870 represented a significant legislative milestone aimed at providing universal education. However, as highlighted by H.G. Wells in his autobiography, this act primarily focused on educating the lower classes according to their perceived societal status. This educational division led to the creation of two separate tracks catering to different social classes. For the less privileged, industrial schools emerged, offering education specifically designed for the poor, who were often stigmatized and viewed as a potential threat to society. These schools were aimed at vocational training and practical skills, steering students toward crafts, drawing, gardening, and other forms of manual labor. Meanwhile, the upper and middle classes showed enthusiasm for alternative methods of discipline and control within their educational institutions. This stark division within the educational system reflected and reinforced the broader societal and class distinctions prevalent during that era. The educational pathways designed for distinct social strata perpetuated and solidified prevailing social hierarchies, thereby contributing significantly to the establishment and reinforcement of a class-based educational framework. This structure, deliberately tailored to accommodate different societal classes, became a mechanism that upheld and sustained social stratification within the educational system. The design and implementation of these educational pathways were intentional, aiming to serve the diverse needs and interests of various social classes. However, instead of fostering inclusivity and equal opportunities, these pathways often replicated and accentuated existing socio-economic disparities. The system did little to promote social mobility or challenge the rigid boundaries between social classes. Instead, it served to reinforce the status quo, perpetuating disparities and maintaining social divisions through the channels of education.

¹⁹ Brion Simon, *Studies in the History of Education*, (London, 1960), pp. 187-200, 211-215.

²⁰ Adam Smith, (1723-1790), was a prominent Scottish social philosopher and political economist. He is chiefly renowned as a pivotal figure in the rise of classical liberalism. Smith holds an eminent position in the annals of economic thought. He is predominantly recognized for a singular opus "An Inquiry into the Nature and Causes of the Wealth of Nations" (1776). This comprehensive treatise stands as the foundational cornerstone of political economy. However, it's essential to recognize that Smith's contributions extend beyond economics; they epitomize a holistic perspective on political and social evolution. When examining his magnum opus in conjunction with his earlier lectures on moral philosophy and government, as well as references in "The Theory of Moral Sentiments" (1759) to a prospective work on "the general principles of law and government, and of the different revolutions they have undergone in the different ages and periods of society", it becomes apparent that "The Wealth of Nations"

David Hume²¹, and Thomas Reid²², on social and educational theories had a profound impact on the conceptualization of education, especially concerning the lower social classes. Their notions of social order, hierarchy, and the role of education in maintaining societal structures may have influenced the design and implementation of an educational system that perpetuated these divisions. For instance, Adam Smith's economic theories on the division of labour and the market economy emphasized the importance of specialized skills, possibly impacting the emphasis on vocational training for specific social classes within educational frameworks. David Hume's philosophical works on human nature and social relations might have influenced the understanding of social hierarchy and its reflection in educational access and curriculum. Thomas Reid's contributions to moral philosophy and epistemology might have influenced prevailing attitudes toward the moral and intellectual capacities of different social strata, potentially shaping educational policies that differentiated based on social class.

The paper's exploration of the colonial education system in India and its entwined relationship with ideas of class and race prompts a crucial reevaluation of historical perspectives. It's pivotal to grasp the intricate dynamics during the colonial era and challenge prevailing historical models, thus enhancing our understanding of this complex chapter in history. Regarding colonial education and the establishment of industrial schools, it's evident that class dynamics were instrumental. While

represents not just an economic treatise but also a fragmentary revelation of a more extensive framework encompassing historical evolution. See www.britannica.com.

²¹ David Hume (1711-1776) is revered as one of the most influential philosophers to have written in the English language. Apart from his substantial philosophical contributions, he was highly regarded in his time as both a historian and an essayist. His exceptional literary skills extended across various genres, showcasing his mastery as a wordsmith. Among his noteworthy philosophical works are "A Treatise of Human Nature" (1739–1740), the "Enquiries concerning Human Understanding" (1748), and "concerning the Principles of Morals" (1751). Additionally, his posthumously published book "Dialogues concerning Natural Religion" (1779) continues to hold significant sway, profoundly impacting the realms of philosophy and intellectual discussions. See stanford.library.sydney.edu.au.

²² Thomas Reid, (1710-1796), remains a prominent Scottish philosopher renowned for various philosophical insights. He is most celebrated for his philosophical methodology and his theory of perception, which reverberates profoundly within the domain of epistemology. Reid's contributions extend notably to his development and defense of an agent-causal theory of free will, as well as his astute and influential criticisms of philosophical doctrines posited by prominent figures like Locke, Berkeley, and particularly Hume. His discerning critiques notably address Locke's perspective on personal identity and Hume's stance on causation. Additionally, Reid's influence extends across diverse philosophical domains, as his contributions encompass areas such as ethics, aesthetics, and the philosophy of mind. His lasting impact endures in contemporary philosophical theories, particularly in realms concerning perception, free will, philosophy of religion, and the expansive field of epistemology.

acknowledging the impact of race and colonial difference, we must not isolate them from broader socio-economic and political influences. Colonial officials and missionaries sought to create a labor force through these schools, reflecting a more class-focused goal than solely racial objectives. It's vital to recognize the intricate interplay between race perceptions and class-based considerations, such as the need for labor to serve colonial economic interests. Questioning conventional historical frameworks is essential. By reexamining history with fresh inquiries and innovative methodologies, historians can uncover the intricate relationships among class, race, colonialism, and education during this period. This approach is fundamental to construct a more comprehensive and accurate narrative, shedding light on the nuanced complexities of colonial education's societal impact.

The paper's exploration of the guiding principles behind colonial India's industrial schools and their parallels with Western educational institutions sheds light on a crucial aspect of colonial education. Opting for a "transnational histories" approach, instead of a "comparative approach", can significantly enrich our understanding of these educational dynamics. A transnational methodology offers a deeper investigation into pivotal questions concerning colonial education policies and private initiatives aimed at educating marginalized children. It provides insights not only for historical research but also helps in understanding the historical foundations shaping contemporary educational policies. This approach aims to bridge the historical gap between past and present, emphasizing the enduring influence of colonial-era educational practices on modern systems. Comparative history, while focusing on differences and similarities between regions or nations, may overlook the complexities of idea migration across diverse contexts. In contrast, a transnational historical approach emphasizes the circulation and exchange of ideas, practices, and people across borders and regions, providing a more comprehensive understanding of historical developments. In the context of colonial education and the establishment of industrial schools in India, a transnational approach could reveal the influences and exchanges that shaped these institutions. By tracing the movement of ideas, educational practices, and policies between colonial powers like Britain and their colonies such as India, historians can gain profound insights into the global networks that influenced colonial education systems. Such an approach sheds light on how educational ideas adapted, transformed, or encountered

resistance in various colonial settings.²³ Approaching “transnational histories” as a flexible perspective rather than a fixed concept enriches the exploration of educational history. It enables a broader analysis beyond the confines of colonial difference, allowing a comprehensive understanding of how ideas, individuals, and their influences shaped developments within colonies. This inclusive approach encompasses diverse aspects such as behavioral discipline, perceptions of time, and labor practices.

The interplay between caste and class hierarchies in shaping the curriculum, vocational training, and socialization within these schools raises a profound historical conundrum. Understanding how these institutions simultaneously aimed to cultivate a modern working class while perpetuating caste-based divisions and traditional labor roles poses a multifaceted challenge. It emphasizes the imperative not only to scrutinize the stated objectives but also to unravel the covert dynamics and far-reaching implications of these educational initiatives. Balagopalan's insights offer a valuable starting point in highlighting this paradox, yet further investigation is warranted to delve deeper into the intricate mechanisms operating within these schools and their broader societal ramifications.²⁴ The paper focuses on industrial schools in the Bombay Presidency, Tamil Nadu, and Karnataka, established by Christian missionaries and backed by the colonial government. It seeks to understand why these schools primarily enrolled children from lower castes, while upper and middle castes dominated English and mainstream schools. The paper aims to uncover how these industrial schools inadvertently perpetuated caste hierarchies. It will delve into the mechanisms through which caste distinctions overshadowed the modernizing objectives of these institutions. Additionally, the paper will explore instances where students resisted tasks conflicting with their caste-based norms and practices.²⁵ These industrial schools, in conjunction with the colonial state, navigated compromises to

²³ For a debate on theory of comparative education, see, Gail P. Kelly, ‘Debates and Trends in Comparative Education’ in Robert F. Arnove, Philip G. Altbach, and Gail Paradise Kelly (ed.), *Emergent Issues in Education: Comparative Perspectives*, (Sunny Press, 1992), pp. 13-22; Gail Paradise Kelly and Philip G. Altbach, ‘Comparative Education: Perspectives and Challenges’, *Comparative Education Review*, 30:1, (1986), pp. 89-107.

²⁴ Challenging the classification of the ‘poor’ proves essential in untangling this puzzle. The economic categorization of ‘poor’ inadequately explains the complexities of Indian social structures, where ‘caste’ emerges as the pivotal factor determining access to public spaces, behavior, social orientation, and more.

²⁵ Parinitha Shetty, ‘Missionary Pedagogy and Christianization of the Heathens: The Education Institutions Introduced by the Basel Mission in Mangalore’, *The Indian Economic & Social History Review*, 45:4, (2008), pp. 509-551.

accommodate entrenched traditional Indian practices, inadvertently solidifying caste norms within a modern institutional framework. Nonetheless, it's crucial to recognize that the colonial era, in various contexts, also facilitated a degree of mobility within the caste hierarchy.²⁶ Did these technical institutions succeed in attracting students from upper castes to learn craft skills typically associated with lower castes? These schools aimed primarily at preparing a modern workforce for various industries like shoemaking, carpentry, and ironwork. Was there resistance from students of lower castes due to this modernization, which potentially alienated them from their traditional roles as journeymen? This perspective may shed light on the increasing dropout rates from these institutions and resistance to the enforced strict disciplinary measures. Adopting this approach allows for the amplification of the voices of the native population often sidelined when viewed solely through the colonizer and colonized lens. The paper will scrutinize the caste demographics among learners in these schools to analyze the relationship between caste and occupations. The caste-based hierarchy within schools was reinforced by various factors, including fees, curriculum, school timings, and pedagogy. For the lower castes, affording even minimal fees for regular government or elite institutions in cash and at specific times was unfeasible. Thus, industrial schools often stood as their sole option, occasionally providing stipends. The paper explores the experiences of traditional manual labor and caste-based occupations within modern institutions. While certain industrial schools aimed to encourage diversity in craftsmanship, they frequently encountered challenges concerning caste-based divisions. Often, students from a specific caste were predominantly engaged in work traditionally associated with their caste; for instance, a student from the Badai (carpenter) caste typically focused on carpentry tasks. Another noteworthy aspect of these schools was their role in easing the burden of childcare for families. By providing schooling for the children of workers, these institutions allowed parents to dedicate themselves fully to labor work.²⁷ Applying Paul Willis's seminal work, 'Learning to Labor,' to the context of 'industrial schools' offers a framework to grant agency to the workers, albeit with the need for validation and adaptation of his theory of resistance within colonial school

²⁶ Overseas migration, Brij Lal, *Chao Jahaji: On a Journey through Indenture in Fiji*, (Suva: Fiji Museum, 2000).

²⁷ Tirthankar Roy, 'Economic History and Modern India: Redefining the Link', *Journal of Economic Perspectives*, 16:3, (2002), pp. 109-130.

settings. These institutions, on one hand, provided a platform for potential resistance among students, yet simultaneously acted as a platform for reinforcing traditional social hierarchies. The schooling experience, beyond mere academic content, was pivotal in this dynamic, aligning the structures of education and work experiences to complement each other, thereby contributing to the reproduction of established social relations.²⁸ Amid their inability to produce a modern workforce, these schools frequently resorted to a prevalent colonial discourse portraying Indian children as weak, effeminate, and indolent.²⁹

Existing historiography has predominantly highlighted the dependency of these schools on governmental financial and ideological support. Yet, there remains a gap in understanding the underlying reasons for the state's interest in these institutions. The paper seeks to uncover significant shifts in colonial education policy. Notably, by the 1890s, a discernible change in the colonial government's approach became evident, marked by a heightened emphasis on the establishment of industrial schools. This shift persisted during Lord Curzon's era and beyond, witnessing a surge in the creation of such institutions across regions like Calcutta, the Bombay Presidency, and other territories.³⁰ Rather than reducing the colonial state's backing of industrial schools solely to a means of justifying and legitimizing its rule or extending imperial dominance through education, the research aims to delve deeper into the state's rationale behind supporting these institutions. It seeks to unravel how the colonial administration perceived the practical utility and day-to-day operational significance of these schools within its governance framework.³¹

Given the current discourse on education and child labor, evident in recent literature and discussions across academic and non-academic circles globally, there exists an urgent call for historians to engage deeply with the histories of educational institutions catering to underprivileged children. These institutions and the experiences of marginalized groups within them warrant closer examination in contemporary

²⁸ Samuel Bowles, Herbert Gintis, and Peter Meyer, 'The Long Shadow of Work: Education, the Family, and the Reproduction of the Social Division of Labour,' *Critical Sociology*, 25, (1999), pp. 284-305.

²⁹ Parinitha Shetty, 'Missionary Pedagogy and Christianization of the Heathens, (2008), pp. 509-551.

³⁰ Abigail Strayer S. McGowan, *Developing Traditions: Crafts and Cultural Change in Modern India, 1851–1922*, (Pennsylvania, 2003).

³¹ Martin Carnoy, *Education as Cultural Imperialism*, (Pennsylvania, 1974).

academic discourse, aligning with broader conversations surrounding education equity and the rights of impoverished children.³² The burgeoning interest in understanding India's current educational landscape within the context of globalization serves as the backdrop for my research. Over the last two decades, the educational sector in India has experienced a notable increase in both private and public initiatives aimed at broadening educational access. This period has witnessed the emergence of a distinct school hierarchy, wherein government schools predominantly cater to economically disadvantaged populations, while private and public schools are more readily accessible to the upper and middle classes.³³ Non-governmental organizations (NGOs) have launched vocational educational programs and established small schools targeting underprivileged children, supported actively by both state entities and citizens, aimed at providing educational opportunities and mitigating the challenges faced by these children. In Calcutta, as underscored by Balagopalan, these schools, often operating within confined spaces, are not perceived as legitimate educational institutions by children whose parents are employed in footwear factories (Chappal Karkhanas). Instead, these children view their prospects as more secure within these karkhanas. Balagopalan argues that these schools, by prioritizing mental work, further entrench the stark division between 'manush' (the learned) and 'Khatni' (those engaged in manual labor), which has historical roots. The role of colonialism and modernity in reinforcing this binary opposition necessitates an in-depth historical investigation.

Colonial Interventions in Industrial Education

The indigenous educational system in India was a multifaceted structure that accommodated a wide array of individuals, including agrarian workers, skilled artisans, burgeoning industrialists, and professionals. This system operated on the principle of apprenticeship, where people received education and training within their respective caste communities. It was a framework deeply rooted in tradition, allowing individuals to inherit and develop vocational skills through practical learning

³² Myron Weiner, *The Child, and the State in India*, (Delhi, 1991).

³³ Geetha B. Nambissan, and Stephen J. Ball, 'Advocacy Networks, Choice and Private Schooling of the Poor in India', *Global Networks* 10:3, (2010), pp 324-343. For the growth of public and private sector education in post-colonial India, see Jandhyala B. G. Tilak, 'Public and Private Sectors in Education in India' in Robert F. Arnove, Philip G. Altbach, Gail Paradise Kelly (ed.), *Emergent Issues in Education*, (Sunny Press, 1992) pp. 173-186.

experiences within their specific caste groups.³⁴ At the core of this system was an informal method of knowledge transmission, where skills and expertise were passed down through generations. Within this framework, aspiring individuals apprenticed under seasoned masters within their specialized fields. These mentors, custodians of generational wisdom, took on the role of instructors, sharing practical insights, techniques, and specialized knowledge relevant to their craft or profession. This educational method stressed experiential learning and practical skill enhancement. Payment for the guidance provided was usually made in goods or services, rather than through monetary compensation.³⁵

The indigenous educational environment not only cultivated technical skills but also instilled a profound sense of communal identity and cultural belonging among learners. Beyond mastering technicalities, apprentices absorbed the values, customs, and ethos inherent to their caste and profession. The transmission of knowledge was intricately intertwined with societal structures and cultural traditions, fostering social unity, and ensuring the continuity of expertise across generations. While effective in preserving and disseminating specialized knowledge within specific vocations, this traditional educational model functioned within the confines of caste-based divisions. This structure could potentially hinder social mobility and access to education for individuals situated outside established caste hierarchies. A comprehensive understanding of the dynamics within this indigenous system is crucial to comprehend the historical roots of vocational education in India and its impact on societal structures and economic frameworks. The traditional Indian educational ethos emphasized an approach aimed at averting unemployment, thus creating a system that substantially reduced the likelihood of discontentment and disillusionment within the population. This system was meticulously designed to curtail the possibility of unemployment, fostering a sense of fulfillment and contentment among individuals. However, as the connection between employment and education grew stronger, education gradually became synonymous—rightly or wrongly—with academic pursuits. Consequently, society

³⁴ Dharamapal, *The Beautiful Tree: Indigenous Indian Education in the Eighteenth Century*, (Biblia Impex, 1983), p. 34.

³⁵ Amit K Suman, and Saurabh Kumar Shanu, 'Gleaning Wisdom from Ancestral Heritage: Indigenous Knowledge Traditions and the National Education Policy', *International Journal of Early Childhood Special Education (INT-JECSE)*, 13:2, (2021), pp. 2522-32.

started to overlook the inherent dignity and economic importance associated with manual labor and technical education, largely characterized by hands-on skills.³⁶ The subsequent outcome was the devaluation of occupations that depended on technical skills and practical expertise, which posed a threat to the core fabric of societal welfare. This disproportionate focus on literary education has gradually diminished the societal acknowledgment of the crucial roles fulfilled by vocations reliant on technical proficiency. This shift significantly impacted the nation's overall welfare and societal stability.

In 1886, Lord A.P. Mac Donnell, serving as the Home Secretary of India, penned a memorandum that remarkably acknowledged the limitations of the prevailing educational system fixated solely on literary education. This seminal document signaled a fundamental shift in perspective, acknowledging the deficiencies of an educational framework solely concentrated on literary pursuits. It highlighted the imperative need to redefine the educational paradigm, advocating for a more inclusive approach that recognized technical education as an indispensable element for cultivating a skilled workforce. The establishment of the Sibpur Engineering College in 1880 represented a significant stride towards technical education. However, this progress was accompanied by uncertainties regarding the precise definition and purpose of technical education. During this era, a widespread lack of clarity prevailed regarding the fundamental principles and objectives underlying technical education. Institutions diverging from the traditional literary curriculum, especially those dedicated to industrial pursuits, were often perceived as peripheral entities lacking a coherent plan or a unified purpose.³⁷ In 1890, Mr. Collin, an official in the Indian

³⁶The prevalent trend shifted towards an overwhelming preference for education centered around literary endeavors. Consequently, several professions crucial for societal welfare and national prosperity experienced a significant decline, and in some cases, faced the risk of collapse. The societal outlook began to prioritize literary education, unintentionally diminishing the inherent value attributed to hands-on technical skills and manual labor. This shift initiated a widespread transition towards literary education, leading to a troubling disruption in occupations vital for societal well-being. As a result, professions reliant on technical expertise and manual labor encountered a precarious decline. See, J. C. Ghosh, *Technical Education*, (Calcutta, 1943), pp. 1-2.

³⁷ The founding intent of Sibpur Engineering College aimed at offering training in both Civil and Mechanical Engineering disciplines. However, in its operational execution, the institution fell short in providing adequate provisions for comprehensive higher-level education in Mechanical Engineering, particularly at the standard expected for degree courses. This discrepancy sheds light on a critical aspect of the colonial government's approach to industrial and technical education in India. Their primary focus appeared to be on producing a skilled workforce rather than establishing a robust platform for significant scientific progress within the nation. The lack of adequate infrastructure and curriculum for advanced training in Mechanical Engineering exemplifies the colonial

Civil Services (ICS), conducted a comprehensive industrial survey in Bengal. His report emphasized the necessity of tailor-made technical education systems in different regions, tailored to meet their specific needs. It highlighted the impracticality of replicating European educational models without necessary modifications to suit the unique conditions prevailing in India. The survey emphasized the importance of localized technical education initiatives, signaling a shift in strategy. However, the main proposals outlined in his report included the establishment of a mining school and the training of mechanical engineers in state railway workshops. These proposals closely aligned with the imperialistic objectives of the Colonial Government, indicating a partial alignment with local needs but primarily serving the overarching interests of the colonial administration.³⁸

Before the Shimla Educational Conference of 1901, there was no clear distinction between Industrial and Technical education. However, it was during this conference that a discernible differentiation between “Technical” and “Industrial” education surfaced. The demarcation established that “Industrial Education” primarily centered on practical guidance and the development of skills acquired through hands-on experience in specific handicrafts. This categorization positioned “Industrial Education” as a subset of technical education and was often termed as “Trade Education” or “Workshop Instruction”, a concept notably prevalent in countries such as the United States.³⁹ The target audience for this distinction primarily encompassed the artisan class, individuals considered either incapable of comprehending the underlying scientific principles or constrained by societal status and obligations that restricted their capacity to devote time and resources to theoretical studies. This separation within the sphere of education marked a notable departure, differentiating the application-oriented “Industrial Education” from the broader domain of technical education, specifically attributing it to the artisan class and their unique educational needs. Sir Edward Buck, a former Revenue Secretary to the government of India, conducted an

administration's limited dedication to fostering indigenous scientific advancement and innovation within India's educational system. See Suvobrata Sarkar, ‘Academic Engineering and India's Colonial Encounter: Bengal Engineering College, Sibpur, a Historical Perspective’, in *History of Science, Technology, Environment, and Medicine in India*, (Routledge, 2021) pp. 121-138.

³⁸ J. C. Ghosh, *Technical Education*, (Calcutta, 1943) pp. 3-4.

³⁹ Shivani Kapoor, ‘The Search for ‘Tanner’s Blood’: Caste and Technical Education in Colonial Uttar Pradesh’, *Review of Development and Change*, 23:2, (2019) pp. 118-138.

extensive inquiry in 1901 that compared technical education in India with Western countries. His inquiry generated several conclusions, including the necessity for specialized trade schools tailored to specific industries within their respective localities, the direction of education exclusively to individuals inclined toward careers in those trades, the segregation of conventional literary education from trade and industrial schools, and the emphasis on apprenticeship within workshops as the primary method for training artisans. These conclusions notably advocated for nurturing a skilled artisan class through workshop-based training, sidelining traditional academic institutions. Noteworthy figures such as Sir Alfred Croft and Sir Alexander Peddler, proponents of technical education, supported enhancing artisans' proficiency by imparting advanced manual skills and familiarity with machine tools, aiming to boost their cognitive abilities. Correspondingly, Sir Willoughby Carey, addressing the Associated Chambers of Commerce in December 1923, emphasized the paramount importance of trained labor or improved artisans from the perspective of European employers.⁴⁰ The industrial education proposed by Sir E. Buck and Sir A. Pedler emphasized specialization aligned with specific caste divisions. Their stance implied that it was often impractical to instruct a potter in the skills of a carpenter, and conversely, to teach a carpenter the craft of a potter due to the divergent nature of these professions. This perspective underscored the belief in the need for vocational education tailored to distinct caste-based occupations, recognizing the specialization inherent within each caste's traditional skills and occupations.⁴¹ Moreover, a substantial correlation existed between industrial and technical education and the war efforts of Britain, particularly in areas where the European capitals were actively engaged. This integration of mechanical practices entailed a combination of foundational education with practical workshop training. It was chiefly facilitated by Ordnance factories, government establishments, and railway workshops that were dedicated to industrial education.⁴² These educational provisions were designed to equip laborers with

⁴⁰ J. C. Ghosh, *Technical Education*, (Calcutta, 1943) p. 12. The colonial administration in India made a significant intervention by endeavoring to transition traditional crafts into modern technological industries. This initiative was strategically designed to stimulate industrial growth within the colony. It involved consistent investments and emphasis on technical and vocational education to facilitate the realization of this transformation. See Shivani Kapoor, 'The Search for 'Tanner's Blood'', (2019) pp. 118-138.

⁴¹ J. C. Ghosh, *Technical Education*, (Calcutta, 1943) p. 14.

⁴² The Ordnance Department factories at Ishapore were pioneers in implementing and closely adhering to such an idea in their technical education programs. J. C. Ghosh, *Technical Education*, (Calcutta, 1943) p. 12.

knowledge that would enable them to comprehend the fundamental “scientific principles” that formed the basis of their respective crafts.⁴³ The integration of primary education with practical workshop experience within these specialized institutions created a synergy that allowed workers to understand the essential theoretical foundations behind their mechanical endeavors. This holistic approach empowered laborers in various industrial sectors by providing them with an understanding of the scientific intricacies embedded in their trades. It facilitated their engagement with mechanical work at a more informed and knowledgeable level, ultimately contributing to the expansion of European capital⁴⁴ and support the war efforts of Britain.⁴⁵

The discourse on famine reveals the utilization of vocational skills as a tool for rehabilitating primarily marginalized victims, many of whom belonged to disadvantaged classes. This approach to rehabilitation not only perpetuated the prevailing caste-based hierarchy but also emphasized gender-specific assignments within manual labor roles. At the outset of this situation, missionaries emerged as early responders, identifying craft training as a viable livelihood

⁴³ The emergence of the industrial expert trained in modern chemistry in the United Provinces reshaped the perception of workers' experiential traditional knowledge as unscientific. This shift redefined the expertise and methods employed, particularly in industries like tanning. Shivani Kapoor, ‘The Search for ‘Tanner’s Blood’, (2019) pp. 118-138.

⁴⁴ Significant European capital was injected into the jute industry of colonial India, which profoundly accelerated its growth. This financial influx paved the way for the establishment of contemporary jute mills equipped with cutting-edge machinery and advanced technologies. By strategically harnessing India's abundant jute resources, British investors positioned the nation as a global leader in jute production. The infusion of this European capital resulted in a notable transformation within the industry, fostering heightened productivity, the adoption of mechanized processes, and expanded capabilities for exports. This economic integration, fueled by foreign investment, wielded a profound impact on India's economy, workforce composition, and trade dynamics. Ultimately, the jute industry stood as a testament to colonial economic exploitation and played a pivotal role in the industrial development of the era. See, Tara Sethia, ‘The Rise of the Jute Manufacturing Industry in Colonial India: A Global Perspective’, *Journal of World History*, 7:1 (1996), pp. 71–99.

⁴⁵ During the early 1940s, as demands escalated within the technical divisions of defense services and ordnance and munition factories, the Government of India initiated widespread measures. To address these requirements, the establishment of National Service Labour Commissions was pivotal. Each province had its commission, responsible for selecting suitable candidates for technical training as skilled artisans or technicians in various engineering trades. The goal was to train 15,000 individuals by March 1942, facilitated through over 170 training centers nationwide. The desired technicians encompassed a diverse range, including general engineering fitters, metal turners, machinists, electricians, blacksmiths, tin and copper smiths, welders, draughtsman, molders, and carpenters. Wartime exigencies led to a high demand for various goods from India, including essential items like jute products, woolen articles, shipbuilding materials, camouflage nets, trench shelters, motor vehicles, and spare parts. This heightened demand exerted significant pressure on India, considering its crucial role in fulfilling requisitions within the broader scope of the Empire's needs during the war. See J. C. Ghosh, *Technical Education* (Calcutta, 1943) pp. xxxvi-xxxvii, xl-xli.

option for displaced women and orphans who had previously engaged in agricultural activities.⁴⁶ During the late 19th century, recurring famines under colonial rule created an opportunity to reimagine the labor force, mainly comprised of lower-caste and landless laborers. The colonial administration's response involved a renewed focus on art schools and technical education, formalizing these teachings with certifications, thereby reinforcing the distinction between mental and manual labor. Insights gleaned from famines highlighted the relationship between resources and population, leading to debates against widespread compulsory and free education. Moreover, it intensified concerns regarding caste-based issues, particularly discussing the allocation of government resources. The discourse debated the prioritization of technical education over liberal education, often seen as reserved for the perceived 'gifted few' or the upper-caste population. This period exposed deep-seated anxieties related to caste dynamics and the allocation of resources within the realm of education in colonial India.⁴⁷

Conclusion

The indigenous educational system in colonial India nurtured a profound sense of community and cultural identity among learners. Rooted in apprenticeship and community-based knowledge transfer, this system intricately integrated education within societal structures, bolstering communal ties. However, the introduction of industrial education disrupted this cohesive framework. The shift towards technical education

⁴⁶ The famine's onset brought an influx of women and children in need of support, initially relying on external aid. However, the focus soon shifted toward fostering self-sustainability. In response, various industries emerged, offering potential avenues for self-support. These industries encompassed diverse activities such as rug weaving, silk embroideries, lacework, handkerchief making, crocheting, sewing, saree weaving, cotton spinning, durrie and tape weaving, shoe embroidery, chair and basket making, rope production, gardening, and field work. Traditionally male-dominated, these occupations transitioned to being predominantly undertaken by women, marking a significant shift in gender roles amidst the crisis. See Maria Mies, *The Lace Makers of Narsapur*, (London, 1982); M. Abott, 'Progress of Women's Work', In *Report of the Fourth Decennial Indian Missionary Conference* held in Madras, (London and Madras, 1902) pp. 258–63.

⁴⁷ The famine period brought forth a dual concern deeply rooted in Malthusian theories of overpopulation and resource scarcity; a focal point extensively examined by famine study experts. In parallel, another intricate facet emerged concerns among the upper castes regarding the government's disproportionate emphasis on technical education for the impoverished. This viewpoint regarded such investments as diverting funds from liberal education, earmarked for a population considered eugenically superior in mental capabilities, separate from the perceived less capable lower castes. This duality highlighted both Malthusian concerns and caste-based tensions, showcasing the intricate societal attitudes surrounding education funding and population dynamics amid the famine period. See S. Anandhi, and Aarti Kawlra, 'Caste, Craft and Education in India and Sri Lanka: An Introduction', *Review of Development & Change*, XXIII:2, (July-December 2018), pp. 5-18.

dismantled traditional structures, causing a rupture in the communal bond, and eroding cultural identity. The dichotomy between liberal and technical education heightened caste-based tensions, intensifying societal discord. The emergence of industrial education was not a philanthropic initiative but aligned with imperialist agendas. Case studies, such as the jute industries, railways, and ordnance factories, illustrate this, with their establishment primarily serving to safeguard British capital and advance imperial objectives, leveraging technical education to perpetuate colonial dominance and economic exploitation. This transformation, while fostering technological progress, led to significant socio-cultural fractures. The erosion of indigenous educational practices fragmented communal ties, resulting in a diluted sense of identity among learners. Moreover, caste-based tensions exacerbated by the divide between educational streams underscored the societal divisions accentuated by colonial interventions. The primary aim of industrial education, entangled with safeguarding British interests, overshadowed its professed educational merit, aligning it more with imperialist motives rather than genuine educational advancement. This comprehensive analysis sheds light on the multifaceted repercussions of industrial education, highlighting its divisive societal impacts and its inherent link to colonial exploitation.

References

1. Anandhi, S. and Aarti Kawlra. 'Caste, Craft and Education in India and Sri Lanka: An Introduction.' *Review of Development & Change*. Vol. XXIII No.2, (July-December 2018), pp. 5-18.
2. Balagopalan, Sarada. *Inhabiting 'Childhood': Children, Labour and Schooling in Postcolonial India*. London: Palgrave Macmillan, 2014.
3. Bowles, Samuel. Herbert Gintis and Peter Meyer. 'The Long Shadow of Work: Education, the Family, and the Reproduction of the Social Division of Labour' *Critical Sociology*. vol. 25, (1999), pp. 284-305.
4. Carnoy, Martin. *Education as Cultural Imperialism*. Pennsylvania: D. McKay Company, 1974.
5. Chatterjee, Partha. *The Nation and Its Fragments: Colonial and Postcolonial Histories*. Princeton: Princeton University Press, 1993.
6. Dharampal. *The Beautiful Tree: Indigenous Indian Education in the Eighteenth Century*. Biblia Impex, 1983.
7. Ghosh, JC. *Technical Education*. Calcutta: SR Sen Publishers, 1943.
8. Kapoor, Shivani. 'The Search for 'Tanner's Blood': Caste and Technical Education in Colonial Uttar Pradesh.' *Review of Development and Change*. 23(2), (2019), pp. 118-138.

9. Kelly, Gail Paradise. and Philip G. Altbach. 'Comparative Education: Perspectives and Challenges.' *Comparative Education Review*. Vol. 30, 1, (1986), pp. 89-107.
10. Lal, Brij. Chao Jahaji: on a Journey through Indenture in Fiji. Suva: Fiji Museum, 2000.
11. McGowan, Abigail Strayer S. *Developing traditions: Crafts and cultural change in modern India, 1851–1922*. University of Pennsylvania, 2003.
12. Mies, Maria. *The Lace Makers of Narsapur*. Londo: Zed Books, 1982.
13. Nambissan, Geetha B. and Stephen J. Ball. 'Advocacy networks, choice and private schooling of the poor in India.' *Global Networks*. 10, 3, (2010), pp 324-343.
14. Roy, Tirthankar. 'Economic History and Modern India: Redefining the Link.' *Journal of Economic Perspectives*. 16 (3), (2002), pp. 109-130.
15. Sarkar, Suvobrata. 'Academic engineering and India's colonial encounter: Bengal Engineering College, Sibpur, a historical perspective 1.' in *History of Science, Technology, Environment, and Medicine in India*. Routledge India, 2021.
16. Sen, Satadru. *Colonial Childhoods the Juvenile periphery of India 1850-1945*. London: Anthem press, 2006.
17. Sethia, Tara. 'The Rise of the Jute Manufacturing Industry in Colonial India: A Global Perspective.' *Journal of World History*. 7, no. 1 (1996), pp. 71–99.
18. Shetty, Parinitha. 'Missionary Pedagogy and Christianisation of the Heathens: The education institutions introduced by the Basel Mission in Mangalore.' *The Indian Economic & Social History Review*. 45(4), (2008), pp. 509-551.
19. Simon, Brion. *Studies in the History of Education*. London: Lawrence and Wishart, 1960.
20. Stoler, A. L. *Race and the Education of Desire: Foucault's History of Sexuality and the Colonial Order of Things*. Durham, NC: Duke University press, 1995.
21. Suman, Amit K. and Saurabh Kumar Shanu. 'Gleaning Wisdom from Ancestral Heritage: Indigenous Knowledge Traditions and the National Education Policy.' *International Journal of Early Childhood Special Education (INT-JECSE)*. Vol 13, Issue 02, (2021), pp. 2522-2532.
22. Thompson, E.P. *The Making of the English Working Class*. Harmondsworth: Penguin, 1968.
23. Vallagarda, Karen A A. 'Adam's escape: Children and the discordant nature of colonial conversions.' *Childhood*. Vol. 18, (2011), pp. 298-215.
24. Weiner, Myron. *The Child and the State in India*, Delhi: OUP, 1991.