



Gender Discrimination in Education in India: Evidence from Census

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Abstract – Gender discrimination in education remains a significant issue in India, with persistent disparities in enrollment, retention, and completion rates between male and female students. This study examines the extent of gender-based disparities in education using data from the Indian Census, providing an empirical analysis of the gender gap in literacy rate across the country. By analyzing trends over several decades, the study highlights the structural and socio-cultural factors that contribute to gender discrimination in education, such as economic constraints, patriarchal norms, and the undervaluation of girls' education. The research is based on secondary data mainly obtained from different round of Census, Women and Men reports and other relevant websites etc. To reach at the appropriate result, trend analysis has been done. To explore research objective Decadal Growth Rate analysis has been done. The findings reveal that despite progress in reducing the gender gap in education, significant barriers remain, particularly in rural areas and among marginalized populations. The study emphasizes the importance of policy interventions aimed at improving access to education for girls, such as scholarships, community engagement, and targeted programs for gender-sensitive schooling. In conclusion, the paper calls for continued efforts to dismantle gender-based biases in education, ensuring equal opportunities for all genders and contributing to a more inclusive and equitable educational landscape in India.

Keywords – Education, gender, discrimination, literacy, India.

I. INTRODUCTION

Gender refers to the characteristics of women, men, girls and boys that are socially constructed. This includes norms, behaviours and roles associated with being a woman, man, girl or boy, as well as relationships with each other (WHO, n.d.). As a social construct, gender varies from society to society and can change over time (WHO, n.d.). Gender discrimination is a well-known universal issue (Tripathi & Gupta, 2023). Gender discrimination means discrimination among people based on gender or sex which more often affects girls and women or female gender (Tripathi & Gupta, A Study of Gender Discrimination in Health in Uttar Pradesh, 2023).

Gender discrimination is situation in which someone is treated less well because of their sex, usually when a woman is treated less well than a man (Tripathi & Gupta, 2023). Gender discrimination persists in every sphere of life of a woman (Tripathi & Gupta, A Study of Gender Discrimination in Health in Uttar Pradesh, 2023). Gender discrimination is deep rooted in Indian society and prevailing in various form and education is one of them (Tripathi & Kurariya, 2025). Despite progress has been made in various sectors in Indian society, education of women has not been received significant attention (Voigt & Spies, 2020) which resulted in gender discrimination in education in India (Tripathi & Kurariya, 2025).

Female literacy rate has been increased by 629.46% (RegistrarGeneral, 1953; 2011; Tripathi & Kurariya, 2025) while per capita income has grown by 23847.92% during the years 1951 and 2011 (MoF, 2025). During the same time span gender gap in education has declined only by 11.15% (Tripathi & Kurariya, 2025; RegistrarGeneral,

1953; 2011). It reflects negligible improvement in gender gap in education in India. This data raise questions on Government initiatives in order to reducing gender gap in education and bring men and women at the same level. Gender disparity in education is a multifaceted issue affecting individuals, communities, and societies (Insight, 2024). The major causes of gender disparity in education in India are deeply rooted in socio-economic conditions, cultural beliefs, and traditional practices etc. prevailing in the society (CRY, 2024).

Objective of the Paper:

On the basis of above discussion and need of the study, the following objective has been constructed-

- To investigate gender discrimination in education in India.
- To capture trend in gender gap in education in India.
- To assess decadal growth rate of education in India.

II. DATA SOURCE AND METHODOLOGY

The present study is an exemplary work to assess educational status of people of India along with gender discrimination prevailing in it. The study explores trend in gender gap in education and find out the decadal growth rate of education in order to reach some appropriate result. For this purpose, the current study utilized secondary data. The required data have been obtained from various sources viz. different round of Census from year 1951 to 2011, different round of women and men report, economic survey statistical appendix 2024-25 and relevant websites etc.

To meet out the above objectives and obtain desirable results, some appropriate statistical tools, techniques and software have been employed in the current study. To



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assess the trend in gender gap in education, the following trend line equation has been used-

y=a+bx

Where 'y' is dependent variable/ explained variable of which trend line to be analyzed, 'a' is y- intercept, and 'b' refers slope of trend line, and 'x' is the time period. To find out decadal growth rate the following formula is used (Seymour, 2004)-

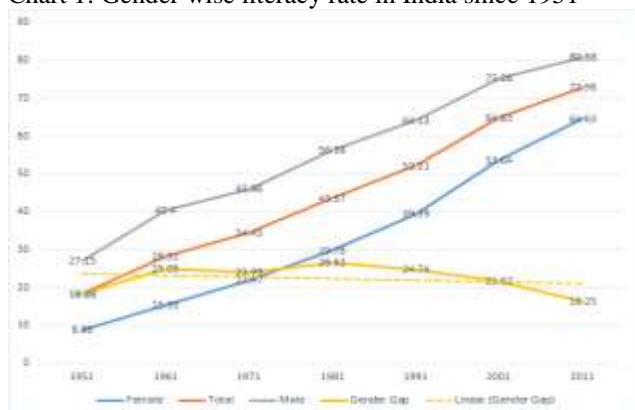
DGR = ((Pn - P0) / P0) x 100

DGR = Decadal Growth Rate in %, Pn = Population now, P0 = Population originally, and Pn and Po are 10 year apart (Seymour, 2004). Education is equally important for both - male and female (Tripathi & Gupta, 2023; Tripathi & Kurariya, 2025). Educational status can be assessed by various indicators like Gross Enrolment Ratio (GER), years of schooling, expenditure on education, educational attainment, but due to need and some limitations of the study only literacy rate has been used to find appropriate results (Tripathi & Gupta, 2023; Tripathi & Kurariya, 2025). Literacy rate is used as a prime indicator to assess gender discrimination in education as literacy rates represent the most telling indicator of a country's educational status (Chowdhury, 1995; Tripathi & Kurariya, 2025).

III. RESULT AND DISCUSSION

Education is a fundamental right that provides children with the foundation to build secure futures (CRY, 2024). However, gender inequality in education continues to be a significant barrier for many children (CRY, 2024). Gender disparity in education is characterized by the differences in educational opportunities, outcomes, and experiences between males and females (Insight, 2024). It encompasses disparities in enrollment, dropout, literacy rate, academic achievement, and access to tertiary education (Insight, 2024). The literacy rate of male and female in India has been given below-

Chart 1: Gender wise literacy rate in India since 1951



Source of Data: Women men in India 2016 Report

*Chart is prepared by the author himself

Notes: 1. Literacy rates for 1951, 1961 and 1971 relate to population aged 5 years and above whereas literacy rates

for 1981, 1991, 2001 and 2011 relate to the population aged 7 years and above.

- 2. The 1981 literacy rates exclude Assam where the 1981 Census could not be conducted.
3. The 1991 literacy rates exclude Jammu & Kashmir where the 1991 Census could not be conducted due to disturbed conditions.
4. The 2001 literacy rates exclude Mao Maram, Paomata and Purul Sub-divisions of Senapat district of Manipur.

From the above chart it is revealed that literacy rate of the nation is increased from 18.32% in year 1951 to almost 73% in 2011 (Negi, Sharma, & Chanjta, 2023; Tripathi & Kurariya, 2025). While the country has made significant progress in improving literacy over the years, it continues to be home to 313 million illiterate people; 59 percent of them are women (Chandra, 2019; Tripathi & Kurariya, 2025). The number of literate individuals in India has been consistently increasing since 1951, as has the overall literacy rate in the country (Tripathi & Kurariya, 2025). The female literacy rate, for example, has grown significantly, from 8.86% in 1951 to 64.63% in 2011.

This indicates a continuous upward trend in the literacy rate among women in India over the years. Similarly, the male literacy rate has also seen significant growth, rising from 27.15% in 1951 to approximately 80.9% in 2011. This reflects an increasing share of literate males in the total population of the country. Both male and female literacy rates have shown continuous improvement since 1951, contributing to the overall growth in literacy across India. However, the chart also reveals a persistent gender disparity in literacy rates in India, particularly in the earlier decades (Tripathi & Gupta, 2023; Singh, Singh, & Komaraiah, 2023; Tripathi & Kurariya, 2025). The gender gap in literacy was not consistently narrowing between 1951 and 1981, exhibiting irregular patterns.

In the 1950s, the decadal gender gap in literacy was 18.29%, which expanded to 25.05% in 1961. This gap slightly decreased to 23.99% in 1971, but then increased again to 26.62% in 1981. After 1981, however, the gender gap in literacy began to decrease steadily. By 1991, the gap was reduced to 24.74%, followed by further reductions to 21.62% in 2001 and 16.25% in 2011. This ongoing decrease in the gender gap in literacy is a positive indicator of progress toward gender parity in education in India

The trend line equation for gender gap in literacy rate is-
y = 24.11 - 0.436x

Where 'y' is gender gap in education, 24.11 is y- intercept, and -0.436 refers slope of trend line. The above equation and chart reveals that gender gap in literacy has negative trend with the magnitude of -0.436. It confers that gender gap in literacy rate is declining with the pace of 0.436% per decade over the study period of 1951 to 2011 (Tripathi & Kurariya, 2025). It reflects negligible improvement in the field of gender discrimination in education in general and gender discrimination in literacy rate particular. Now, it is



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time to discuss upon Decadal Growth Rate (DGR). Simplified Decadal Growth Rate is used when we have data that is ten years apart. In this study Simplified Decadal Growth Rate/ Decadal Growth Rate has been used. The following table shows DGR for literacy rate of male, female and gender gap in literacy rate.

Table 1: Decadal Growth Rate in literacy rate for male female and gender gap

Year/ DGR	DGR for Female Literacy rate	DGR for total literacy rate	DGR for Male literacy rate	DGR for Gender Gap in literacy rate
1961	73.2505 6	54.5305 7	48.8029 5	36.96009
1971	43.1270 4	21.6884 5	13.7623 8	-4.23154
1981	35.4574 4	26.4731 5	22.6718 9	10.9629
1991	32.3588 7	19.8301 6	13.7460 1	-7.06236
2001	36.1766 9	24.1716 1	17.3553 7	-12.6112
2011	20.4884 4	12.5713 4	7.46744 6	-24.8381

Source: Self-created table by author

The above table reflects decadal growth rate for female literacy rate was 73.25% which means female literacy rate has increased by 73.25% during years 1951 and 1961. DGR for female was too high but after 1961, it has decreased continuously to 20.49% in year 2011. DGR for female literacy rate was significantly high in 1961 and lowest in 2011. The table explores that DGRs for overall literacy rate of the country were irregular and was highest at 54.53% in 1961 and lowest at 12.27% in 2011. It is clear from the table that DGR for female literacy rate is higher in every decades than that of total literacy rate of the country. DGR for male literacy rate was 48.80% in 1961 and grown with irregular progression and reached to 7.47% in year 2011. The table depicts that DGR for female literacy rate is higher than that of total and male literacy rate in India at every decades from the year 1961 to 2011.

Though, the table reflects higher pace for female literacy rate, female literacy rate is lower than that of national level literacy rate and male literacy rate in India. It resulted in gender gap in literacy rate in the country. The table convey the message that DGR for gender gap in literacy rate was 36.96% in year 1961 but shows irregular progression and reached to -24.84% in the year 2011. Initially, DGR for gender gap was highest in year 1961 and reduced to -4.23% in year 1971. The irregular progression of gender gap in literacy rate is not good symptom for female education in general and literacy rate particular. To improve women education condition and to reach towards gender parity in literacy rate, DGR for gender gap in literacy should be reduced with high magnitude and negative sign.

IV. CAUSES OF GENDER DISCRIMINATION IN EDUCATION

Gender discrimination is a persistent issue in India and is deep rooted in Indian Societies. India has made strides in reducing gender discrimination in education, but notable disparities still exist (UNICEF, n.d.; CRY, 2024). As girls advance to higher education levels, they are increasingly less likely to continue their studies, with enrollment rates seeing a sharp decline at the secondary school level (UNICEF, n.d.; CRY, 2024). In India, gender inequality in education is shaped by a variety of interconnected factors, which together create a cycle of challenges that disproportionately affect girls, limiting their opportunities to pursue and complete their education (CRY, 2024). Though, government has taken many initiatives like Right to Education, Beti Bachao Beti Padhao schemes etc., some basic factors behind gender discrimination are mentioned below-

Cultural and Social Barriers:

Cultural norms and traditional beliefs like- patriarchal society (Kumar S. & Priyanka, 2018), Beti Praraya Dhan, son preference in society etc. (Kumar S. & Priyanka, 2018) play a significant role in perpetuating gender bias in education (CRY, 2024). In numerous communities of India, girls are expected to prioritize household duties or marry at a young age (as child marriage is still prevailing in Indian societies) (Rasmussen, et al., 2021), which often leads to the devaluation of formal education (CRY, 2024). These societal expectations limit girls' educational opportunities (CRY, 2024). Addressing these cultural perceptions and encouraging families to support education for all children, regardless of gender, can enhance educational access for both boys and girls (CRY, 2024).

Economic Barriers:

Gender discrimination in education is a multifaceted issue that is exacerbated by economic constraints in India (Mir & Swaroopa, 2024; Tripathi & Kurariya, 2025). While gender inequality is a societal challenge, economic barriers further intensify the disparities between male and female educational opportunities (Namiiro, Uzoamaka, & Ann, 2024). In many instances, families in India prioritize boys' education over girls' due to the perceived economic value of educating males over females (Namiiro, Uzoamaka, & Ann, 2024; Rasmussen, et al., 2021). Some key economic barriers contributing to gender-based discrimination in education in India are perceived economic return on male, poverty and limited financial resources, child marriage and economic burden on female, and lack of financial supports for girls' education (CRY, 2024) etc.

Infrastructure Challenges in Schools:

Infrastructure challenges in schools viz. inadequate sanitation and lack of separate toilets for girls, safety and security concerns, lack of access to schools in remote areas, poor quality of educational infrastructure, and lack of gender-sensitive infrastructure (Singh S. , 2022) etc. are



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significant factor contributing to gender discrimination in education in India. Inadequate school facilities disproportionately affect girls' access to education, hindering their academic participation and performance (CRY, 2024). The lack of appropriate infrastructure often results in increased dropout rates among girls, as they face unique barriers in terms of safety, privacy, and comfort, which are not as pronounced for boys (White, Ruther, & Kahn, 2015).

V. CONCLUSION

Gender discrimination has become one of the most concerning issue for Indian societies, particularly for women. It creates hindrance for women education and contributes in gender discrimination in education which ultimately negatively affect women in India. The study found that gender gap in education initially increased and then started to decrease but it has decreased only 11.15% in 60 years. Though, analysis of DGR shows higher pace of increase in women literacy rate compared to male literacy rate but it only not be enough for bring gender parity in literacy rate in India. To alleviate gender disparity in literacy rate in India, the following measures should be impeccable-

- To mitigate gender inequality in education, infrastructural challenges should be removed in phased manner.
- Though gender discrimination is deep rooted in Indian Societies, Government should run awareness programmes and train local people to overcome and change the attitudes of society towards women education.
- Government should make some more monetary arrangement to mitigate financial hindrance in women education in India.
- Government should create job opportunity for female so that they can make arrangements for their daughters which will ultimately convert in higher literacy rate of women in India.

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