

**EDUCATIONAL ATTAINMENTS IN CONTEMPORARY  
RAJASTHAN, WITH SPECIAL REFERENCE TO THE  
ISSUE OF GENDER DISPARITY**

*Thesis submitted to Jawaharlal Nehru University  
for the award of the degree of*

**DOCTOR OF PHILOSOPHY**

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**2019**



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## DECLARATION

I declare that the thesis entitled “Educational Attainments in Contemporary Rajasthan, with special reference to the Issue of Gender Disparity” submitted by me for the award of the degree of **Doctor of Philosophy** of Jawaharlal Nehru University is my own work. The thesis has not been submitted for any other degree of this university or any other university.

  
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## CERTIFICATE

We recommended that this thesis be placed before the examiners for evaluation.

  
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*Dedicated*  
*to*  
*My Parents*

## ACKNOWLEDGEMENT

I consider myself fortunate, having the opportunity to work under the supervision of Professor Praveen Jha. I am greatly indebted for the guidance and co-operation that he extended towards me. His critical insight and helpful comments have helped me throughout the period of my thesis. The complete freedom I enjoyed in implementing my ideas is acknowledged with gratitude. I take opportunity to thank Professor Vikas Rawal for scholarly discussion and making my points sharper on statistical analysis.

I am thankful to Dr. Amit Thorat, Dr. Elumalai Kannan, Mr. K. Verghese and Dr. Rakesh Arya for their timely support. All due credit also to the library staff of Jawaharlal Nehru University, New Delhi and office staff at Centre for Economic Studies & Planning at the School of Social Sciences.

I would like to record my regards for Bhagwan Singh Tadiyal and Sita Tadiyal. Their love and concerns have been source of strength for me.

Thanks are due to my colleague Ms. Alka Kacker for her support and favour; and Madhavi Moni who has always been a good friend and never let me down in times of need. I thank Manoj Kumar Singh for his constant support and hospitality during my visit at Kota. I am also thankful to Kailash Meena for being of immense help during my field survey at Kota. He is a one man army for my facilitating and extending his help during the household surveys being conducted in Kota district.

Special thanks are due for Khalid Khan and MD Zakaria Siddiqui for their efforts to impart important 'Statistical wisdom' onto me.

A special thanks to Vimla di and Yogesh Jija ji. They always kept me energetic during the period of stress. I thank Preksha Jain and Kumar Kanisk for making my stay pleasant at JNU.

I am grateful to my ever ready rapid action squad Krishna Pareek, Mahindra Mehta and Alok Singhal. I am also thankful to Baghirath ji, Satadru Sikdar, Manish Kumar, Chandan Kumar, Rajeev Kumar, Manoj Kumar, Animesh Naskar, Rakesh ji, Vinod Yadav, Naveen Narayan, S.K. Beero and Sunita .

A Sincere thanks to Mukesh Meena and Rajni Bala for their extraordinary support. Zaheer Ahmed, who always admires my intellect, is a part and parcel of my efforts.

My Maa and Bhai Rohit are an integral part of my existence. They were always besides me with their support.

No verbal or written recognition will be enough for Jyoti and Ajay, I feel, I could not have completed my thesis without them. Their debt is way too much.

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## ABBREVIATIONS

AIES	All India Education Survey
ASER	Annual Status of Education Report
CABE	Central Advisory Board of Education
CCT	Conditional Cash Transfer
CDI	Child Development Index
DISE	District Information on School Education
FGD	Focus Group Discussions
FLFP	Female Labour Force Participation
FYP	Five Year Plan
GAD	Gender and Development
GDP	Gross Domestic Product
GEI	Gender Equality Index
GER	Gross Enrollment Rate
GVI	Gender Vulnerability Index
HDI	Human Development Index
IHDS	India Human Development Survey
IIT	Indian Institute of Technology
MDGs	Millennium Development Goals
MDM	Mid-Day Meal Scheme
MHRD	Ministry of Human Resource Development
NCERT	National Council for Educational Research and Training
NFHS	National Family Health Survey
NGO	Non-government Organization
NIEPA	National Institution of Educational Planning and Administration
Non-POM	Non-proportional odd model
NPE	National Policy on Education
NSSO	National Sample Survey Office
OOSC	Out of school children
RTE	Right to Education
SC	Scheduled Caste
SDMCs	School Development and Management Committees
SRS	simple random sampling
SSA	Sarv Shiksha Abhiyan
ST	Scheduled Tribe
UNESCO	United Nations Educational, Scientific and Cultural Organisation
US	United States
WAD	Women and Development
WID	Women in Development

# **CHAPTER 1**

## **INTRODUCTION**

## 1.1: Background

Education is considered an important cornerstone for overall development i.e. social, economic and political development of a nation. Various attempts have been made in India and in other countries which were under colonial rule or external domination, to give top priority to literacy after they gained independence. While countries in South East Asia tried hard to mobilize the available human resources and scarce financial resources to achieve mass literacy, India seems to have lagged behind despite its rich heritage which was devoted to *Vidya* or acquisition of knowledge.

In Indian society, women face various types of discrimination and have limited access to opportunities. However, the discrimination which women face in their access to education is the worst of them all. There is no doubt that education is seen as an instrument to gain knowledge and empowerment through which women can break the wall of ignorance and raise their voice against exploitation. Therefore, education for women is important to enable them to fight against all regressive traditions that are anti-women. In the past two decades, many important steps have been taken by the Central government as well as by the various state governments to remove the gender gap that exists in the Indian education system.

UNESCO data (2000-2015) indicates that while more than half (56%) of the children across the world have achieved gender equality at primary level, this proportion is lower at upper primary and secondary levels. While this figure is not satisfactory for India's secondary education system; but the gender gap has been bridged at the primary and upper primary level by the Indian governments. The credit for this goes to the infrastructural reforms at school level through various policy reforms. The enrolment rate in secondary level in India has increased for both males and females; 71 percent and 66 percent for males and females respectively as per UNESCO 2011. This is significantly higher as compared to 1999 when it was of 51 percent for males and 36 percent for females. This growth however is not satisfactory when we compare India's position with countries which are economically comparable to it. One of the major policy changes in India has been the Right to Education Act of 2009. This act ensured that children attain

free and compulsory education and it made it a fundamental right under the Indian Constitution. The government's flagship programme, the Sarv Shiksha Abhiyan (SSA) also targeted to achieve universal elementary education. However, retention of the children in higher education and inclusive education system is a major policy challenge that India faces today.

NSSO 71<sup>st</sup> Round (2014-2015) data reveals that males achieve at least secondary education if circumstances are favourable for them. In case of a girl child, parents generally educate them up to primary level while in some states like Kerala, Maharashtra, Nagaland, Andaman, and Nicobar Islands etc., people prefer to educate their girl child up to secondary level. This study begins with a brief overview of the persisting inequality in education in India. Though the government has not been successful in achieving universal education, but the close look at the recent Census data of 2011 indicate that there is a significant rise in overall literacy rate as compared to Census 2001. The figures are phenomenal for female literacy rate. The literacy rate is 82.14 percent for male and 65.46 percent women in comparison to 75.26 percent male and 63.67 percent women in 2001 (Table 1.1).

**Table 1.1: Literary Percentage, 1901-2001**

<b>Census Year</b>	<b>Person</b>	<b>Male</b>	<b>Female</b>
<b>1901</b>	5.3	9.83	0.60
<b>1931</b>	8.9	15.59	2.93
<b>1951</b>	18.33	27.16	8.86
<b>1961</b>	28.3	40.4	15.35
<b>1971</b>	34.45	45.96	21.97
<b>1981</b>	43.57	56.38	29.76
<b>1991</b>	52.21	64.13	39.29
<b>2001</b>	64.83	75.26	63.67
<b>2011</b>	74.04	82.14	65.46

*Note: All figures are in %.*

*Source: Various rounds of Census of India,*

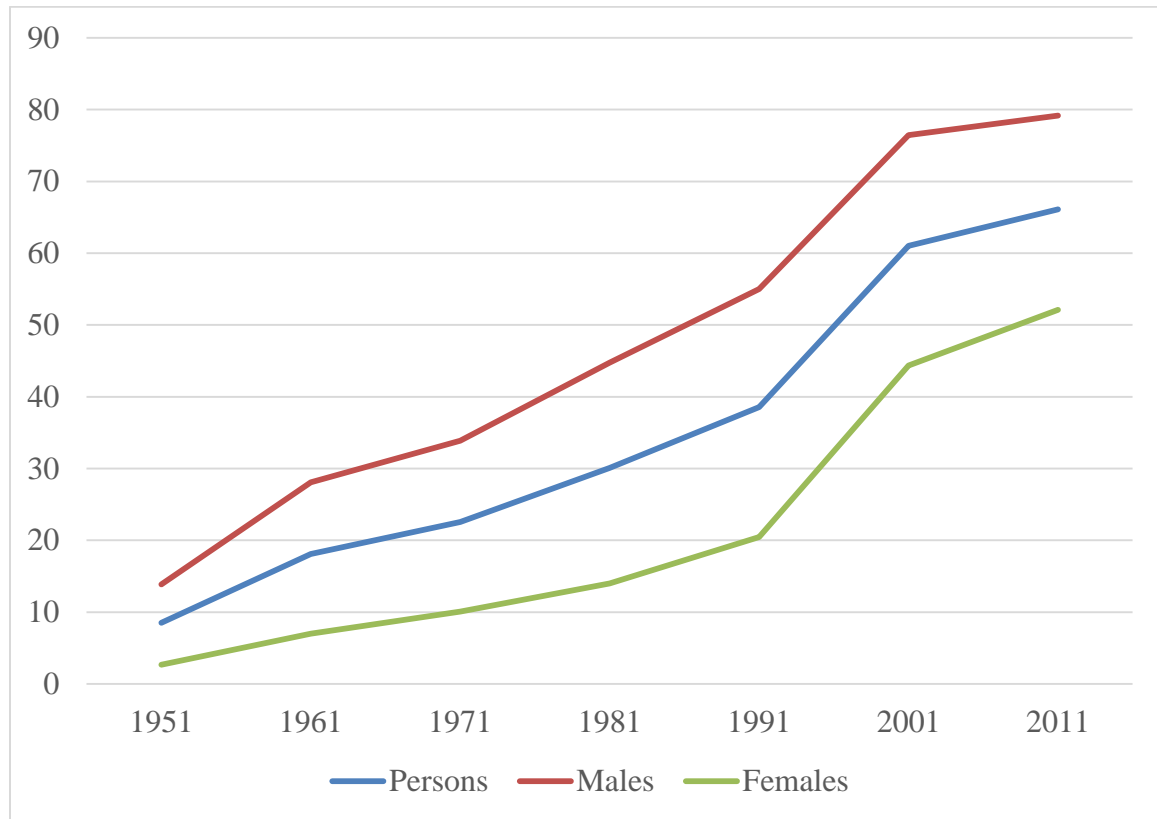
While there are various studies related to the Southern part of India and other regions like Punjab, Haryana, West Bengal, and Maharashtra, there is no in-depth study for Rajasthan that has looked into the question of inequality of education. Sujatha and Rani (2011) have examined the educational development in reference to the secondary education in four states of India namely, Andhra Pradesh, Kerala, Maharashtra and Uttar Pradesh using comparative analysis of educational and economic development. In the past five decades schools have become accessible in Rajasthan, especially primary schools which are available within the habitat. But still, the state has not been able to achieve the status of a literate state. In fact, Rajasthan is one of the least literate states. The data from the 1991 census indicated that only a little more than half of the children attended primary schools and the proportion for girls was especially low. There was a high dropout rate at the primary level. Though in the last two decades there has been considerable growth in literacy rate in general and women literacy rate in particular, the literacy rate in Rajasthan is still low as compared to other Indian states.

Before the 1990s, there were many villages and habitats that had no schools, especially the ones where poor and marginal communities like Dalits and Adivasis lived. Many communities were not able to receive even elementary schooling. But All India Education Survey 2009 data showed that there were total 85391 inhabitants in Rajasthan and 66 percent of these inhabitants had primary schools within them whereas only 39 percent inhabitants had upper primary schools. When we look at the availability of primary schools, almost 90 percent of the primary schools were available within one kilometer of inhabitants whereas 85 percent of the upper primary schools were available within one kilometer of the inhabitants.

Figure 1.1 presents the status of literacy in Rajasthan from 1951. After independence, the overall literacy in Rajasthan was 8.5 percent and women literacy rate was 2.7 percent, and there has been a systematic increase in literacy rate for both men and women. However, women literacy is far below the average literacy rate in Rajasthan. Data reveals that in the case of Rajasthan, the primary reason of drop out of males is participation in other economic activities and the secondary reason is that children are not interested in

studies. However, in the case of females, the main cause of dropping out is that the parents are not interested in their studies (NSSO Round 71st).

**Figure 1.1: Level of Literacy Rate in Rajasthan**



*Note: All figures are in %.*

*Source: Census of India, Series 9, Rajasthan Provisional Population*

## **1.2: Theoretical Approach**

Education is closely associated with the well-being of a nation and its economic growth and there are several theoretical grounds for this claim which have been outlined widely in the literature. Two popular mechanisms were emphasized in this literature through which education can affect economic growth. The first claim is that education can increase and enhance the human capital which further affects the labour force. The educated labour force improves the productivity which is clearly linked to higher growth rate and skilled labour also affects the quality and efficacy (Mankiw et al. 1992).

Therefore, many scholars had asserted that a significant proportion of economic growth and income should be devoted to or invested in the sector of education (Psacharopoulos 1984; Tilak 1989). There has been a close relationship between the human resource development and economic growth, but during the 1960s, it got wider importance through the approach of human investment revolution in economic thought (Bowman 1966).

To what extent and in which quantity education contributes to the economic growth, has been evaluated by Denison (1967). Denison suggested that not only increase in the quantity of labour and physical capital help the economic growth; rather the improvement in the quality of labour through education can increase the scale of economic growth. Even in recent literature on economic growth, the role of education is reaffirmed.

The second mechanism suggests that education helps in innovating capacity of the economy and generate knowledge for new technologies which increases the productivity and thus growth. Lucas (1988), Romer (1990) and Aghion and Howitt(1998) supported this mechanism. The model suggested by Lucas (1988) stated that human capital could be trained in new technologies which would be helpful in economic growth. Romer (1990) suggested new growth theories which differentiate between capital-based model and idea-based model of economic growth. The capital-based model suggests that growth is an accumulation of capital whereas idea-based growth model suggests that new technology, knowledge, and innovation can improve the growth rate.

For inculcating knowledge about the technologies, Romer (2001) emphasized the need for higher and technical education. He argued that primary school provides only elementary education and children learn basic things, but they donot learn the ability to contribute in the larger production. Therefore, for the meaningful participation of the human resource in production, there is a need to generate a skillful human capital who can contribute to the economic growth. Human capital theorists always supported the gender parity and argued that for overall development, both men and women should contribute in economic growth; hence, both groups should get equal opportunities to avail education and technical knowledge.

There are various approaches to gender parity in education and development. Gender parity can be seen as the process of the human social development which provides equal opportunities and rights to the person despite their biological position as a male or female in a level playing field where they can cooperate or compete to contribute in development at large. There are several approaches to understand the relationship between gender equality and development. The first of its kind of approach was 'Women in Development (WID)' which argues that women should be given better education and equal opportunity. However, WID was criticized for its rigidity as the supporters of this approach had underestimated the role of women in the household where they perform their household chores and in the informal economy. This approach only focused on women's participation in the formal economy and economic production. Despite criticism of this approach, it is difficult to ignore its relevance as it formed the basis for several other approaches like Gender and Development (GAD) and Women and Development (WAD).

The Women and Development approach moved a step further and brought out the association between women and their role in society. They not only associated women's role in economic activities but also emphasized gender equality on the social front. The approach suggested that women should play a role in both economic and domestic spheres. It stressed that gender inequalities must be bridged for the socio-economic development of any society, The WAD approach suggested that gender-gap needs to be bridged in patriarchal societies. It suggested that women-centric development projects should be introduced where only women take part in the production. Through this measure patriarchy and hegemony at the workplace could be downplayed where men dominate women. This aspect of development was hugely criticized by different theorists due to its proximity to Neo-Marxist approach. While this approach depicted women as a class, other social divides such as race and ethnicity were ignored and it did not address the inter-class disparity. Like WID, WAD also mainly focuses on women's participation in production and other sociological and political parts of development were ignored by both.



Then comes the third and most popular approach called the ‘Gender and Development (GAD) approach which challenged the WID approach. WID approach restricted the role of women in economic development whereas the GAD widened its scope and focused on gender role in the division of labour and gender relations in the society (Razavi and Miller 1995). The GAD theorists have stressed on the aspect that gender is a socially constructed environment in which the roles are divided on the bases of the sex of the person and this division has got its support from the society. This approach has progressed well and emphasized that gender division of the society is artificial and this structure is socially constructed to suppress women. The gendered division of labour and social relations defined in ‘maleness’ and ‘femaleness’ is also biased in men’s favour.

Oakley (1972) and Rubin (1975) in their writings put forward this approach and argued that in social structure and in gender hierarchy, women have been placed at the bottom and they are subordinated to men. Therefore, the theorist of GAD approach emphasized that in order to mitigate gender inequality, there is a need to reconstruct the social relations and gender role in which females perform the role of home-makers, wives and mothers and males play the role of bread-earners of the families. Women’s economic dependency on their fathers, husbands and sons make them subjected to men. Women’s work in households is unacknowledged whereas men contribute to the economy and production. Even in labour market, women are paid less as compared to men for the same work.

The present study uses the framework of GAD approach and argues that for the overall development of the nation in general and economic growth in particular, it is important to bring women in the mainstream social-economic activities where they should be educated enough to take on social and economic roles in the society. The present condition of the women in education system indicates that the pre-defined roles of women in the society actually obstruct their participation in education which later restrict them to take part in market economy and production, and thus leads to their absenteeism from the overall economic development.

In a society like India, there is a huge gender divide in socio-cultural and economic sphere where pre-defined gender roles exist; men and women work according to their defined roles. The peoples' mindsets are also pre-determined as per the gender role in social relations. In that kind of arrangement, women are deprived to get an education, especially higher education. The presumption for this denial is very much rooted in a social hierarchy and mindset of the people where women are subjected to men.

In India, education is an asset like any other household item which describes the socio-economic status of the household. High educational attainment provides various opportunities to improve or to hold on to social and economic status on the society. Investing in men's education by the family is considered as a good investment; it is assumed that men will pay back to the families through their income and good jobs they get on the basis of a good education. On the contrary, spending too much on women's education is not considered a good investment. Though this mindset has weakened over the years, it has not been completely eliminated from the society. Nonetheless, women's overall literacy rate is improving though their participation in higher education is still not satisfactory.

The human capital theory argues that men and women comprise the human resource of any nation. This theory believes that women have a significant share in the population; almost half of the population is comprised of women in any society. It reflects in Plato's work 'Republic' where he supported women education and insisted that both men and women should get the same physical and educational training. Using metaphor from day-to-day life he argued that as a bitch is equally capable to guard as a dog, why a nation should ignore its women. Through systematic physical and educational training women can also be included in nation-building agenda. By excluding women from the overall development model, a nation is losing half of its resources; no nation can achieve its developmental goal by avoiding its women.

The importance of a strong relationship between gender equality and development was realized and also reflected in the Universal Declaration of Human Right by the United Nation in 1948 where it stated that it is the fundamental human right of each citizen to

attain a quality education without any prejudices on the basis of gender, class, and ethnicity. A world conference was organized in March 1990 on education with an underlying agenda to provide education to all. A Declaration which came as an outcome of this conference restated that equal opportunity to a quality education needs to be provided to each individual without any discrimination. Even Indian government has introduced several policies to reform the education system and make it inclusive in nature and reaffirmed that education is the best means for securing social justice and equality.

It is quite evident that the gender disparity in education participation is closely associated with the gender discrimination tradition in the Indian society and its customs such as dowry, violence against women and girls and other prevailing crimes against women. Women are expected to do the household work and they have no power in the decision-making process within and outside their family. The present study would evaluate internal and external factors that impact gender disparity in educational attainment.

### **1.3: Literature Review**

There are several reasons for the gender divide in educational attainment which the present study tries to investigate. The study argues that socio-economic condition of the household is not solely responsible for the gender disparity; rather the external societal factors also influence the women educational attainment. To discuss these issues, a literature review is carried out to see which aspects of lower women educational attainment have been discussed in popular literature. The review of literature is divided into four broad themes – women education and development; social economic status and gender disparity in educational attainment; lack of infrastructure and the gender gap in education; and social structure and gender disparity in education.

#### ***1.3.1: Women Education and Development***

Schultz in his work supports the idea that by educating women there is a higher economic gain than educating men (Schultz 1993). Due to various reasons, many research studies also indicated that female education is more important than male education. Through education, women become aware about various social and health indicators like infant

mortality and child health. Sen (1999) using the notion of 'capability' assessed the importance of female education development and emphasized on gender equality through women education. Gender inequality in society leads to various ill-practices and gender disparity in various spheres of life can hinder the overall development goals. For instance, gender disparity in educational attainment can affect child mortality, under-nutrition, fertility, and educational mobility. Various studies have been carried out to measure the impact of gender inequality and its impact on the aforesaid factors such as Summers (1994); Murthi, Guio, and Dreze (1995); Klasen (2000); and World Bank 2001. These studies have shown a linkage between gender disparity in education and its impact on development. The policymakers cannot achieve their goals such as controlling infant mortality rate, poverty, and universal education until they bridge the gender gap in educational attainment.

Other than impacting these fronts, gender inequality is also a barrier in achieving economic growth; rather it reduces the economic growth in particular which is an overall barrier in economic development. Several studies such as Dreaze and Sen (1989); Pritchett and Summers (1996); Bruno et al. (1996); and UNDP (1996) have shown a positive association between human resource development indicators such as literacy and health and economic development. Therefore, gender equality in each sphere can improve the economic growth at large. Dollar and Gatti (1999) have found that gender disparity in education would lower the human capital which further leads to lower economic growth. Women education has a positive effect on the quality of education which in return supports economic development.

An educated mother can provide a better opportunity to her children without any gender discrimination; this will improve the educational attainments qualitatively as well as quantitatively. A study by Baliga et al. (1999) suggests that equal level of educational attainment among siblings strengthens their educational success. They support and inspire each other in attaining a better quality of education. The study also indicated that parents having similar education levels can motivate their children in their learning process and help them to get a quality education.

Through education, women will also acquire some skills and skilled female labour can contribute to the workforce and strengthen productivity; it will increase women's role in employment. Therefore, both men and women can contribute to achieving social and economic development.

### ***1.3.2: Social-Economic Status and Gender Disparity in Educational Attainment***

Several studies have indicated the relationship between social economic position and gender disparity in education. The recent Census data (2011) indicate that there is a sharp difference between educational attainment and locality. While two-thirds of the Indian population resides in rural India, their participation in secondary education is low. There could be various reasons for this low educational attainment in rural areas such low literacy among parents, economic backwardness etc. World Bank Report (2009) also provides distance as a reason for lower literacy in rural India. It indicates that as compared to urban localities, the schools are distantly located in rural area and students have to travel far for secondary education. Siddhu (2011) in his study found that the economic condition of the household and lack of infrastructures are responsible for lower girls' enrolment.

Geeta B. Nambissan (2001) in her study of Rural Rajasthan showed how economic status is associated with gender disparity in educational attainment. She took two villages, one in backward tribal area named Jhadol Tehsil of District Udaipur and second in Alwar Tehsil of Alwar district. She found that in the households which are economically well off, the enrolment in educational institutions are higher. For instance in Alwar the enrolment rate is higher than Jhadol. However, the pattern differs with the occupation type the households were engaged in. despite doing well economically, the enrolment rate was not high in large land owning families as compared to the other upper income occupation types. An increase in ownership of livestock appears to constrain enrolments, especially of girls. On the other hand, families engaged in other professional occupations or salaried employed, the enrolment rates are higher. The study also found that if the adult members of the household were literate, the probability of their children to be enrolled in schools were higher as compared to illiterate households. Enrolment rates

were the highest in households where mean years of schooling of adults is three years and above. Social group has a very small impact on women educational attainment. Backward castes are not a homogenous group in terms of economic and social status and respond differently to educational opportunities.

Upper castes have the highest enrolment rates while the poorest response to schooling is among Muslims. The dimension of gender is strikingly visible in the poorer response of girls to schooling across the tehsil, between villages, different economic categories, and social groups. Economic status of the households is also related to higher education, but even in these households, girls' educational attainment is not the same as men. Nambissan (2001) also stated that despite being of the same economic status, household having large land ownership have less educational attainment as compared to households having a professional occupation or those who are employed in salaried jobs. Chaudhari and Gupta (2009) also underlined parents' occupation as an important factor for explaining the educational attainment of a child. They argue that in the households where household economic income is less and the father is underemployed, children's educational attainment would be low. When these poor families migrate for work, the uprooting of the family disrupts the opportunity to get an education.

Inequality in educational opportunities is not only a gender problem in India. The presence of castes that have been historically deprived both socially and economically makes the situation quite complex. In one study, Sengupta and Guha (2002) found that caste is an important determinant of schooling. Girls from marginalized castes attain less education as compared to the girls from upper castes. In schools children from different castes do not receive similar treatment. Lower caste children are treated badly at school. The same pattern was observed by P. Sainath during his visit to Rajasthan where he observed that children from Balmiki castes were made to sit outside their classes and they were not provided a mat to sit on. The children had to arrange for their own mats (Sainath 1999). This differentiation is even more visible in higher education where students are discriminated on the basis of caste and religion (Bhattacharya and Pal 2016).

The gendered labour arrangements are also responsible for a different level of educational attainment among men and women. Girls have to perform household duties which are quite burdensome and time consuming; whereas boys do only minor work outside the house. In poor locations where basic facilities like water and fuel are missing, girls have to spend their time arranging for these things to run their household. Aggarwal (1987) also indicated that girls are expected to perform their household work. In the poor households, mother do labour work outside the house to contribute in family income and girls have to stay back at home to look after their younger siblings in their absence. The opportunity cost of educating girls is thus especially large in rural and low-income families (Sengupta and Guha 2002). They found that mothers' educational attainment has the strongest impact on girls' participation in school education. In the families where mother are educated the dropout rate among girls is lower or negligible. The factors such as household income and father's occupation had also a significant impact on girls' dropout from schools.

Parents have different approaches while investing in education. On the basis of their assessment, they decide up to what level their children, both boys and girls, should get an education. They expect higher return to education from boys than girls, and therefore, their investment becomes higher in boys' education than girls' (Alderman & King, 1998). Sathar and Lloyd (1994) provide a reason why returns to girls' education attainment are not higher than boys. They argue that in the labour market, there are limited job opportunities for girls than boys in Pakistan. Strauss & Thomas (1995) have emphasized that through women education especially higher education attainment, the existing gender discrimination in employment opportunities and jobs could be bridged.

In traditional set up of India, girls are not considered as an asset to the family because of the marriage institution. One reason for the parents, especially from the poor households, for not educating their girls is that the girls have to go to another family and they will not contribute to the household income in future (ibid); therefore, investment in girls' education will not be fruitful. Educating girls would not add any asset and financial gain to the family (Nayar et.al. 1997). Ahmad & Morduch (1993) have also provided reasons for parent preferring boys' education over girls in Bangladesh. They argue that educating

girls is costlier than boys because there are several security concerns while sending their girls to far away schools, especially for secondary level. Another interesting factor was addressed by Nirmali Goswami (2015) who studied rural Assam and found that parents have variable concerns about quality education for boys and girls. She argued that parents are more concerned about quality when it comes to boys' education as compared to girls' education. To put her point strongly, she considered the medium of instruction and type of schools as a measure. She found that parents are more likely to send their boys to private English medium schools and girls go to a government or Hindi medium school.

It is, however, significant that schooling girls for a few years is now being viewed positively in educationally backward communities. This has resulted partly from government, NGO and media campaigns. The increasing number of educated males in different communities has increased the demand for prospective brides with some minimum educational qualification. On the other hand, governments have also initiated several policies and schemes to attract parents to send their children to schools like free textbooks, uniforms and free cycles for girls to continue their higher education. These schemes act as pull factors to bring children into the education system. However, while reviewing the impact of centrally sponsored schemes, Jha et.al (2010) argued that the mechanism of implementation of the schemes in educationally backward states flawed and widely criticized by the constitutional bodies.

Other factors such as poverty, family size, backwardness of the district, dispersed population etc. are responsible for low literacy. Free education is not cost-free, on an average, parents would need a minimum of Rs. 35-40 to keep a girl child at school, and it is difficult for a rural villager to pay this kind of money for girls' education. The fund allocated to education in relation to the requirement is insufficient and whenever the budget is reduced, it's the share of education that gets slashed. This cost cutting in the households' budget had an impact on girls' educational attainment. In poor households where mothers had to work to earn income for the family had also a worse impact on the girls' education. The girls had to leave schools to do household activities; and in some cases they have to do baby-sitting for their dependent siblings.



The discussion above shows that women are most deprived of getting an education and this deprivation further widens with the layering of caste and religion. This led to the deep gender divide. However, the existing gender gap is reducing and it is evident from the data available for literacy. The literacy rate for women is increasing but it is still a matter of concern in Rajasthan. As compared to other states, the women literacy rate is lowest in Rajasthan. Hence, to break the social disparity and gender divide in educational attainment, a few important steps are required (Pappu and Goswami, 2015).

### ***1.3.3: Lack of Infrastructure and the Gender Gap in Education***

Although in most schools and colleges, the teacher-pupil ratio is reasonably good, the number of working teachers as against sanctioned posts of teachers is low in many cases. Infrastructure in schools and higher education institutions is also a major impediment to learning. . Sujatha and Rani (2011) have argued that only providing school buildings is not sufficient for the educational developmental rather managing infrastructure and providing quality education are pre-requisite conditions for educational progress. This is true of tribal areas and backward rural pockets of the country. Although under the SSA a lot of attention is given to provisioning of school infrastructure, such as building classrooms, girls' toilets, general toilets, drinking water, compound wall, kitchen for MDM, playground, library and reading room, computers (in some higher secondary schools and colleges) and health centres, but in reality there is not much improvement on this front due to impediments created by bureaucrats and gram panchayats. Construction contracts have become important matters for discussion in the SDMC meetings due to their lucrative nature and scope for corruption. Accessibility of more than one kilometer is becoming an obstacle in some villages. Although under the SSA, greater attention is given to the provision of at least the 9 basic facilities listed in the Abhiyan, much needs to be done in many rural and tribal parts as well as in small towns.

Teachers are not sufficiently skilled to impart proper knowledge to the students even though the government provides various teaching materials and timely training to the teachers. This is evident in the pass percentage of students in the examinations. After

schooling, the course to which a student gets admitted to also matters in providing assured employment later on in life.

Coordination and timely assistance (in the form of release of funds, material or completing administrative work) by the various related Line Departments are considered critical in ensuring success in education. These include the Departments of Women & Child Development, the SC ST Development Corporation, Minority Development Corporation, Social Welfare Department, the three tiers of Panchayats, etc. The hostels, particularly for girl students need to be safe to live in. Bridge schools or Transit Homes must be carefully monitored for their failure in providing quality stay and food to the inmates. Medical care, counseling, sports and games, and physical exercises are the other incentives to keep the inmates disciplined, active and healthy.

With greater or added emphasis on primary or elementary education, the higher education sector is increasingly becoming privatized and capitalist in which the welfare programmes of the government for the vulnerable groups fail to be respected and implemented. Skill development programmes such as tailoring, embroidery, painting, woolen knitting, carpentry, handicrafts etc. are significant as self-employment avenues.

Schools are poorly provided with basic infrastructure and teaching aids. The absence of proper buildings, classroom space, blackboards, drinking water, and teaching aids adversely affects the quality of the learning environment for children in school. The inadequacy of the required number of teachers in schools affects the teaching-learning context. On the one hand, the school remains non-functional most of the time when there is only one (or two teachers) in position. On the other, 'learning' cannot take place when pupils of more than one class sit together to receive the attention of the teacher. Teachers are also not equipped to teach a diverse group of pupils (and this should not be romanticized as 'multi-grade' teaching). In most cases, teachers are forced to restrict pedagogy to rote and textbook learning where the main objective becomes the disciplining the various groups of children. Lack of interest in studies, irregular attendance, and discontinuation of schooling are integrally related to the poor learning environment in the classroom.

There is thus the need for urgent attention to be given to the availability of basic infrastructure at schools. It is true that attendance of teachers is often irregular and their functioning in schools is less than optimal. A policy of both encouraging teachers to perform effectively in schools as well as increasing their accountability is required. There is a need for sensitizing administrators and policymakers to the trying conditions under which teachers work (without adequate amenities and inputs). The burden of 'extra-curricular' development and administrative work that is increasingly falling on teachers also needs to be addressed. Such work should be limited to the extent it directly helps increase enrolment and encourages parental involvement in schooling. Sensitivity to the personal problems of teachers especially in backward areas where living conditions are difficult is also necessary.

Vimla Ramchandran (2001) is very unhappy with the education profile of Rajasthan. She said that in Rajasthan state actors and policymakers are not ready to learn from the policy reforms from the other states of India. The administration is still dominated by the upper and dominant castes that have a patriarchal mindset. They hardly pay any attention to educating people from marginal castes and women. There is no debate or demand related to education in the public domain. She has mentioned about two projects introduced in Rajasthan to improve the reach of education – Shiksha Karmi and Lok Jumbish projects. She argued that people's participation was the main strength of these projects, but it is difficult to find people with the right attitude towards education to associate with these projects. The nature of the projects was to roll out the idea of universal education which included education for women, but finding women workers who can interact and attract women towards these projects was even more difficult.

Yadav and Srivastava (2006) have conducted a study in Delhi slums to understand the condition of education among slum dwellers. They found a few interesting reasons that are responsible for low literacy in slums areas. Most of the people living in these slums were migrants from other states who belong to deprived castes of those states and were extremely poor. For them earning their two meals was the biggest challenge. Therefore instead of sending their children to school, they preferred to make them work to earn some money. The proportion of children going to school increases proportionately with

the rise in the income of the family and mother's earnings have a much higher impact on children's education. Girls' education is higher in slums which have separate school facilities for girls. Slum-dwellers do not prefer co-education schools while the distance of primary school does not matter to them if the school is reputed and offers quality education.

Kremer et al. (2005) paid attention to the structural reason for lower literacy. They argued that education attainment is low in rural areas because there is a lack of schools, especially secondary level schools. The schools that are available are not in good condition. Classrooms have no basic facilities like blackboard and benches. Teachers' attendance is also a matter of concerns as there is high absenteeism among them. Their teaching skills are also not refined. They have studied this pattern among eight counties across the world and found that teachers' absenteeism is the second highest in India. Only half of the teachers were available in the classroom when surprise visits was made at schools. However, it does not mean that teachers run away from their teaching work. Instead, they are assigned other official paper work by the government.

#### ***1.3.4: Social Structure and Gender Disparity in Education***

Socio-economic status is not the only factor responsible for low literacy among girls. Various community-level factors also affect the literacy output among girls. A study carried by Chaudhuri and Roy (2009) indicates that parents in Rajasthan do not invest many resources in girls' education. Even for boys, the return of education output is quite minimal. Education is not really required to get jobs in the state or for migration. People notice that without much education, boys who migrate earn well in neighbouring states. This adversely affects the psychology of parents who decide not to invest much in education.

The financial output of girls' education is even lower than boys because in traditional societies women are not supposed to go out and do a job. The families do not allow girls to work for their livelihood. They are expected to perform their household duties or work in the fields which are not paid. Even in paid jobs, women do not get a salary comparable to men for the same kind of job (Glick and Sahn, 2000). Though some studies put

emphasis on women education and argue that educating a girl is more important than a boy as the social output of girl's education is higher. The supporters of this argument assert that a society reaps both financial and non-financial benefits through educating women. The latter benefits include good household management, proper care of children and awareness about the social-political milieu. Schultz, 1993 argued that with the same level of education both men and women provide the same economic benefits to the society and the nation.

In an illiterate neighbourhood, people do not have much exposure to the benefits of women education. They only consider monetary benefits and not the non-monetary benefits of education. Most of the time due to the safety and security of their daughters, they do not send their girls for schooling. Therefore, social barriers need to be broken for improving girls' participation in education.

Usha Nayar (1997) worked a lot upon women education and she said in her report submitted to NCERT that social factor and economic background are responsible for the lower literacy among girls. Social factor such as Purdah Pratha, lack of awareness among parents regarding the danger of early marriage, the importance of kanyadaan are the basic reasons for the low literacy in Rajasthan. The social norms set in a society also affect the possibility of women's educational attainment. For example, in a society where women are more prone to face violence, they are less likely to attain education. Concern about their security restricts the parents to send their daughters to schools (Chaudhuri and Roy, 2009).

In a traditional society, women and men are treated differently. They have their own individual roles to play. It is not considered appropriate if women interact with men outside the families and they have a problem with schools where both girls and boys study together. Parents avoid sending their girls to co-education schools and thus women literacy rate drops due to the lack of only girls' schools. Deshpande et al., 2006 in their study have found a close relationship between only girls' schools and high level of education among girls. They found that in the location where separate schools for girls are available, women educational attainment is higher.

Pal (2004) has pointed towards some attitudinal factors which affect the girls' educational attainment like parents' own attitude regarding educating their girls. If they feel that education for girls is important, they would support girls' education. The level of education among parents positively affects the level of education attainment among girls. The fact is that the mothers' higher educational attainment added greater support for women education and higher educational attainment. Glick and Saha (2000) asserted that an educated mother can bargain for their daughter's education, not in term of quantity rather quality education. In India social structure, many social factors affect the probability of girls' education. The patriarchal social norms have underestimated the capability of women in every sphere of social and economic lives. This prejudice against women and their pre-defined narrow role overarched their presence from the society. These social factors should be brought into the arena of discussion.

The participation by the community or society is critical in making any government programme a successful one (Tharakan 2000; Srivasthava 2005; Ramachandran 2003). Adult literacy programmes are striving to make the adult population in rural, tribal and other backward regions actively involved in development activities. The women in the self-help groups are one of the groups for adult literacy in many places. But the women in grassroots leadership roles (in the gram panchayat) are not involved in these activities. There are no integrated activities by all the actors – like the members of the SDMC, of the Gram panchayat, women in the SHGs and other local organizations (Kantha and Narayan 2003).

#### **1.4: The Relevance and Scope of the Study**

Many studies have put forward the situation of gender disparity in educational attainment which has dragged attention of government and other non-government organization. With the several policy reforms and effort made by the governments the problem still exist in many Indian states, and this condition is the worst in case of Rajasthan. The state had the highest gender disparity if we take Census 2011 figures into consideration. Not many women are taking part in the education system or not completing their education. The government of India has targeted for the universal education in the country but this

absenteeism of women from the education system is the main obstacle in achieving the aim. The societal structure of Rajasthan is framed in a way that boys' education is largely preferred over women education due to several reasons. There is no doubt that Rajasthan government had taken various policy measures to deal with the problem of gender disparity and girls' participation in elementary education has significantly increased and they are at par with the boys upto upper primary level, but once it comes to attain secondary education their participant falls drastically. The higher enrollment in elementary education could be explain through the various structural changes made by the government like education related schemes and providing schools close to the habitants which save money and time to approach schools. The proximity also explain the high participant of the girls in education as parents feel that their daughters are relatively safe in the neighbourhood schools as compared to the schools located far off.

Although the girls enrolment in schools has gone up as compared to past two decades, but a close observation of the available figures also indicate that they are more likely to drop out from the schools without completing their studies. They girls constitute the higher proportion of the out of school children and this dropout is quite visible at secondary level. Therefore, this study systematically tries to underline the reasons for gender disparity in higher educational attainment in Rajasthan.

The study used the interdisciplinary approach to understand the gender disparity in attaining higher schooling. There is a notable intra-district gap in gender disparity in Rajasthan. Some districts in Rajasthan are performing better than other districts in terms of female literacy rate. For instance, the female literacy rate is higher in the Kota district whereas despite the same policies, Jalore has the least literacy rate in Rajasthan. However, a significant increase has been noticed in educationally backward district of Jalore even though this districts still has to meet the caliber of the better performing districts like Kota. The rapid surge in girls' schooling can be associated with the policy reform and introduction of alternative schools.

This study has analyzed the inter-district differences for completing secondary schools; and also provides factors responsible for the gender disparity across these two district using survey method.

### **1.5: Objectives of the Study**

The objectives of the present study are as following:

- To empirically test the factors responsible for the gender divide in secondary educational attainment in Rajasthan.
- To study the impact of socio-economic and other factors for promotion of girls' education.
- To test some indicator of quality of education attained by students in schools in Rajasthan.

### **1.6: Research Questions**

The key questions the study tries to answer are:

1. To what extent has the government of Rajasthan succeeded in improving the accessibility and quality of education?
2. Do the socio-economic status of a household hinder the prospect of girls' access to get secondary education?
3. Which are the factors that obstruct access to girls' education.

### **1.7: Methodology of Study**

The analysis is mainly based on primary data. A structured questionnaire has been designed to capture information from participants on indicators such as their education, family, socio-economic background, employment, and on some specific issues pertaining to the problems faced by women. Interview schedule and interview guide has also be used to get some in depth qualitative data. The source of the secondary data will be



various publications of Census of India together special publications of Rajasthan State District Profile, Report of NCERT with special reference to All India School Education Survey, NSSO 71<sup>st</sup> Round Data, and other publications of the state and the central government. In nutshell, the study has used mix-method to understand the possible factors that act as a barrier to the girls' education. The study methodology has included survey research in Rajasthan. The target sample size of the survey is 600. The field survey method of data collection has been combined with other methods such a Focus Group Discussions (FGD) and long interviews.

### ***1.7.1: Survey Research Methodology***

The Survey Research undergoes a series of steps that shall include:

#### ***1.7.1a. Sampling Process***

The Sample for household has been drawn using the multistage systematic random sampling technique. The total targeted sample of 600 respondents is distributed in equal proportion in the selected districts i.e. Kota and Jalore.

#### ***Sampling Stages:***

1. The first stage in the sample selection was the sampling of districts. For the study, Kota and Jalore have been selected. The rationality behind choosing these two districts lies in the literacy figures provided by the Census of India, 2011. Kota is the district with the highest literacy rate whereas Jalore is at the end of spectrum with the lowest literacy rate among all districts.
2. The second stage was the selection of Blocks within the selected districts. Using the same rationality mentioned at first stage, I chose two tehsils from each selected districts one with the highest literacy rate and another with the lowest literacy rate (For Blocks see the figure below).
3. The third stage was the selection of the villages. Four villages from each block are selected using simple random sampling (SRS). For instance, (If there are 100 villages

and we want to select only 4 villages, we divide  $100/4=25$ . We got the interval (constant) i.e. 25. We choose any village below the number 25. Assume, we selected village no. 1 so next sampled village would be:

First Village: 1

Second village:  $1+25=26$

Third village:  $26+25=51$

Forth village:  $51+25=76$

4. The fourth stage was the selection of households using simple random sampling.

### ***1.7.1b: Preparation of Questionnaire***

The Questionnaire has included all key areas and objectives that are aimed to be accomplished through this study. A standard Hindi Questionnaire was used for the Study. For making more sense some technical words were used in the regional dialects. Consultations from various research students, NGOs, Civil Society etc. was made to incorporate recommendations into the Questionnaire. The major idea and questions were adapted from the NSSO Round 71<sup>st</sup> conducted in 2014.

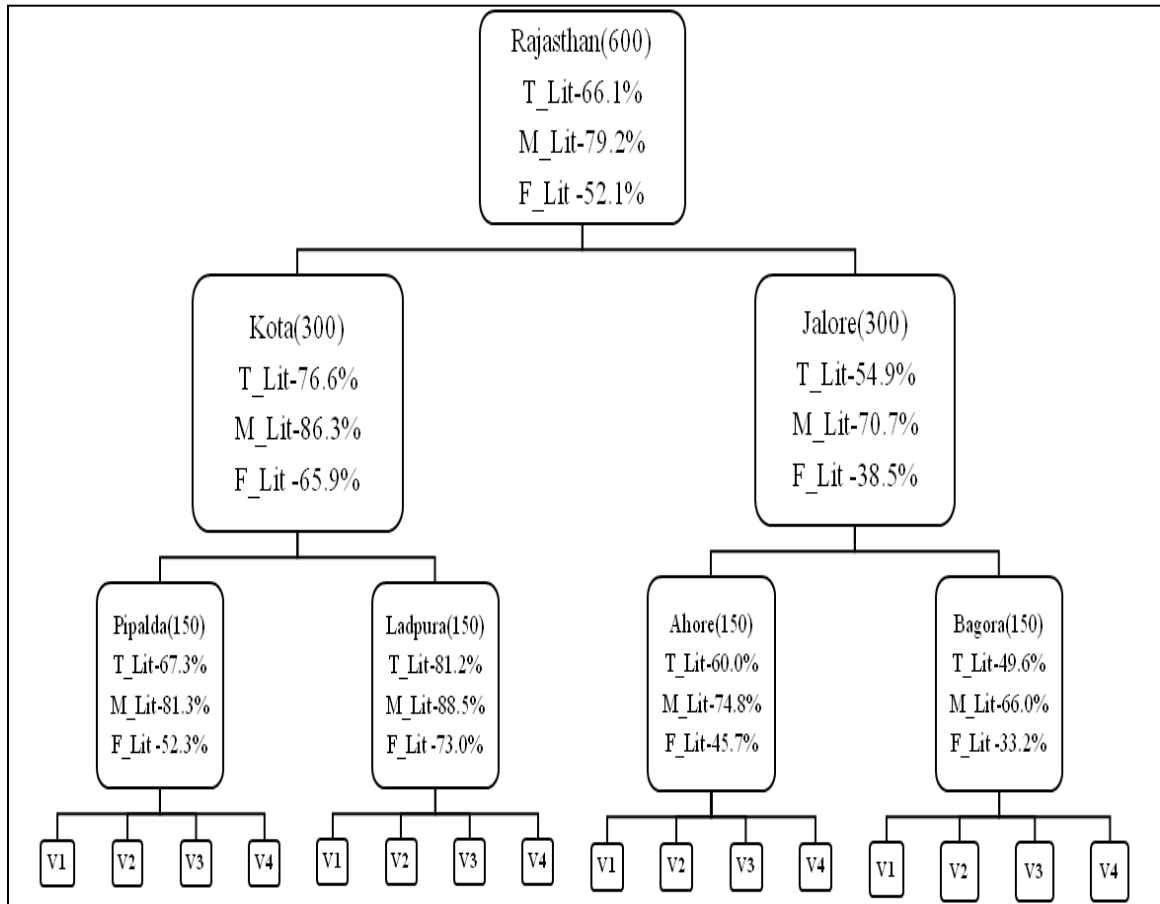
### ***1.7.2: Focus Group Discussions***

The Survey research was followed by a Focus Group Discussion. Various engagement programs with NGOs, Civil Society groups and education counselors were also been undertaken as part of the Focus Group Discussion. The Focus Group Discussion revolved around the following ideas:

- Conceptualization of discussion based on the survey findings.
- Intellectual inputs on key areas concerning education.
- Point by Point rebuttal from various groups involved
- Discussion on inputs from experiences of various case studies done by the involved participants

- Summarization of various inputs that evolved from the discussion.

**Figure 1.2: Sampling Frame**



**01: Villages in Bagora**

- V1 – MaiyakiDhani
- V2 – Vatera
- V3 – Bhalni
- V4 – Rah

**02: Villages in Ahore**

- V5 – Barwar
- V6 – Choonda
- V7 – Kawrada
- V8 - Jora

**03: Villages in Pipalda**

- V9 – Sumernagar
- V10 – Jatwara
- V11 – Fatehpur (Rampuria)
- V12 – Chywada

**04: Villages in Ladpura**

- V13 – Gangaycha
- V14 – Rajpura
- V15 – Seemalheri
- V16 –Inderapura

## **1.8: Chapterization**

The study tries to answer the question raised above through five main chapters with Introduction and conclusion. Chapter 1 is the introductory chapter which provides the motivation of this study after reviewing the existing literatures and outlines the gap in the literature. It also provides details about the methodology present study uses and theoretical approach to understanding the gender disparity in educational attainment.

Chapter 2 seeks to trace the evolution of education policies in India and tries to assess its impact. This chapter envisages the status of education starting from ancient India till the current education system and pays special emphasis on women educational status through contemporary policies for improving education. It argues that the political willingness of the policy makers has a strong relation with the improved educational attainment of women in India. Many half-hearted educational policies and schemes have existed in India that failed to achieve universal education system. But one cannot totally ignore the effort made by the government for making timely interventions through polices to improve Indian education system.

Chapter 3 brings out the status of educational attainment in Indian states and compares Rajasthan's overall achievement of education sector with other Indian states. This chapter concludes that as compared to other Indian states, the performance of Rajasthan is not satisfactory in education sector. Many states, which were earlier similar in status to Rajasthan, have improved their educational achievement while Rajasthan is yet to match their caliber in education.

Chapter 4 primarily focuses on the access to education system in Rajasthan and tries to assess the penetration of policies related to education in the state. It also tries to assess the quality of education children are getting in schools.

Chapter 5 tries to provide socio-economic reasons existing in Rajasthan which explains the gender disparity in attaining higher education. It takes socio-economic factors such as caste groups, religion, economic class, family size and educational mobility in household to define gender dividing in completing secondary education.

However, socioeconomic status solely does not impact parents' attitude towards girl's education. There are some other factors too which impact people's perception towards girl's education. Hence, chapter 6 tries to evaluate the factors in detail such as type of neighbourhood, attitude towards girls in society, awareness about policies specific to girls, exposure to media and girls' security inside and outside the families. All these factors make an impact on parents' aspiration to educate their girls.

To conclude the study, the last chapter sums the argument of the thesis. It states the significant findings, implications and limitations while researching the topic.

## **CHAPTER 2**

# **POLICIES AND PROVISIONING FOR EDUCATION IN INDIA: A BRIEF OVERVIEW**

## 2.1: Background

Education is a means for social change and Moore (1963) had described it as a 'level of social change'. The word education which is a translation of a Latin word '*educare*' means 'to nourish' or 'to bring up'. Therefore, the essential task of education is to bring out the quality of the person and nourish it further for the greater benefit for the person in general and the society in particular. The aim of education is to bring out the social change in the society and use it for bringing out the social and economic development (Schultz 1961). Schultz observed that rich countries' despite huge economic devastation in after the second World War were quick to recover massive amount of new physical capital, whereas the poor countries were unable to even utilise the small amount of the capital. He emphasized on the role of human capital for proper utilization of physical capital and pointed out that physical capital cannot improve without improving human capital. Jha and Rani (2016) have also mentioned that there is a close relationship between human capital and economic growth. Therefore, for developing human capital spend more on educational sector. Once, the state achieves the targeted goal of educational development, it shifts its focus towards other sub-sectors of economic development. These two aspects are interdependent in the economic growth theory. Breton (2013) had shown this relationship through econometric and found that the US and Japan have high levels of both human as well as physical capitals and are economically developed.

Education is an important indicator of human capital; therefore it is believe that investment in human capital would increase the economic growth rate. Psacharopoulos and Patrinos (2004,) using econometric provided the strong evident to prove this relation. They argue that educated and skilled worker get higher salary and contribute in higher productivity. However, dilemma faces by other economists is that whether these two go hand in hand or one follows the other? Like other getting more economic strength nation invest more in education or vice versa.

Nonetheless, a few counties have highly literate population and Easterlin in his study had argued that the political will and ideology were the main reason for mass schooling as

these ideologies prioritised education for nation-building. For instance, the Jews were the first group of peoples who popularized the mass education. Though the mass education was based on religious teaching and learning, but this religious compulsion in creating educated community made that group as the first community which had all educated people (Botticini and Eckstein,2005). After getting education they migrated to different parts of the world get economic gains. This idea of mass schooling travelled to other parts of world and could be seen in the 16<sup>th</sup> century when Protestant Reformation started. There also the objective of mass education was to spread religious teachings among people and people were trained to read and understand Bible (Bowen 1981). To attract people to their religions free education was introduced for the poor (Houston, 1988).

Later in 19<sup>th</sup> century, a new ideology had appeared in Europe which was to start nation-building process. This could be achieved through educated people; therefore, the idea of mass schooling was started (Ramirez and Boli 1987). However, the idea of mass schooling was forbidden for the Catholics (Johnson, 1976) which affected the provision of mass education for the poor who were Catholic. On the other hand, the support for mass education increased among European Protestant and Benavot and Riddle (1988) had underlined the difference taking inference from education levels of Portugal and Spain. There is hardly any other example of mass schooling out of Europe during 19<sup>th</sup> century. It was in 20<sup>th</sup> century when the idea of mass education travelled outside the Europe (Ramirez and Boli 1987).

The idea of development which used to evolve around economic growth has now been described as a wider concept of ‘social transformation’. This shift was needed as it was realized that only economic growth cannot be a determinant of development rather social transformation and social change are also the pre-requisites of holistic development; and education emerged as a crucial carrier of social change. An educated society enables to bridge the social divided on the basis of caste, ethnicity, gender and class; and helps in establishing an equilibrium social structure where an individual can move up in social and economic hierarchy without any barrier.



Education is an important determinant of human development. Sen and Dreze (2013) have stressed upon the importance of education and said that education enables a person from different social strata to grab an equal opportunity to secure a higher position in society and employment. It also empowers individual to fight against the social exploitation and discrimination. Therefore, on various national and international forums, the need of universal education was discussed. It also got a significant place in United Nation's Millennium Development Goals (MDGs) which aims to provide an individual, a living standard with self-dignity which would be free from poverty and hunger; and education was described as a means to achieve this. The objective of this plan was to enable people to acquire a quality life to live without any discrimination on the basis of men-women, poor-rich and upper or lower caste.

Even in India, several welfare programmes were rolled out to enable children to access at least basic schooling without any discrimination. By this time, it was realized that for the overall development, the participation of each individual is required and this goal can be easily achieved through education. Education enhances people's capacity to adapt to the natural and social environment and become an instrument for social development. Philosopher like Durkheim tried to establish a strong link between educational system and social system and concluded that education is a means to achieve the end. Aikara (2004) argued that education prepares the person to face all the aspects of life.

The progressive thinking of planners, policy makers and social scientist provided a new measure to understand overall development using multiple social and economic indicators. In the 1980s, the 'Human Development Index (HDI)' was the product of the intellectual thought-process. The HDI provided three broader indicators of development to measure economic growth. Education has become important indicator for measuring development along with health and basic standard of living. All these three indicators were important criteria for measuring overall development. Low performance in one of these indicators would affect the overall performance. Even in these indicators, there were several sub-variables which compositely made that particular indicator. For instance, for education, only literacy rate was not sufficient, the other factor such as Gross Enrollment Rate (GER) was also included to measure the condition of education

(UNESCO 2004). Education is also an important variable for creating other socio-economic indices to measure development like Gender Equality Index (GII), Gender Vulnerability Index (GVI) and Child Development Index (CDI).

Looking at the importance of education, citizen education was prioritized in post 1980s. It was assumed that schools should be made the nursery of citizens where they can be 'made'. Schools were looked as a miniature of larger society where all social values and other skills can be taught. Eradication of social discrimination should start from schools by treating people from each caste and community equally while providing education. To provide education to all, the government had aimed to provide easy access to the students. For meeting this objective, the schools were opened in every village/location so that children from each strata of society (children from lower castes, lower income groups and girls too) can easily approach the school without long travelling distance. Nonetheless, the effort made by the government was effective as there was a significant increase in enrollment and retention in schools at least at the primary level. After meeting the objective of providing easy access to schools, the government also aimed to improve the quality of education.

A quality education is also helpful for availing a decent employment. A survey on employment was conducted by NSSO as a 61<sup>st</sup> Round of its survey. The findings of the survey indicated that not many people have a degree, a diploma or any certified course through which they can get a decent job in service sector. Even the youth segment had no technical training or skill to get such jobs. Therefore, the 8<sup>th</sup> Five Year Plan targeted to provide technical training to enhance the skills of both men and women and even for the marginal section of the society so that they can opt for skilled jobs. Skill Commissions was set up for this purpose and these skill commissions were instructed to inculcate skills, knowledge and technical training to individuals so that they can compete to get a decent employment. To provide this kind of skill through educational system, a few technical institutions and universities were established during that phase such as polytechnic colleges, management institutes, Indian Institute of Technology (IITs) and other institutions to provide vocational education.

The BJP led NDA government (elected in 2014 in Lok Sabha Election) has also made efforts to increase human resources with caliber to generate employment and avail employment opportunities. Several schemes such as Skill India, Mudra and Stand up India were introduced to train Indian youth to get a decent employment. The government is aware that there is close association between education and economic growth of any country (Psacharopoulos 1984). Durkheim (1897) also emphasised the fact that the education is necessary to understand the social values and economic aspects like division of labour, which makes each individual a part of the economic process of producing goods and services in the economy. Therefore, it would not be wrong in making the claim that the existing social and economic environments of any society are linked to the kind of education system it has and how this system progresses over the course of time (Basu 2013).

Education has become an important subject of governance and governments across the globe are committed to provide universal education to its citizen. Not only in the contemporary times, even historically, has education been a part of the political system. With the change in the political system, education system also changes. For instance, the education system in ancient India was mainly based on religion and spirituality and the main emphasis of the education system was to teach social value and self-realization. However, with the change in social and political environment, the education system also underwent transformation (Bayly 1999).

However, the Modern school system where English education was introduced came in 1830. This system was brought by Lord Macaulay who favoured a system of education which supposed to provide education to all. But the societal structure at that time was not based on egalitarian principles rather some sections of society were excluded, especially in the patriarchal social structure women were excluded from overall system of education. There were various ill- practices in the society which hinderd the way of women and marginal sections of the society to get the benefits of education. Therefore, for eradicating the ill-practices, several social reformers started educating the marginal sections and supported the idea of universal education. Social reformers like Jyotiba Phule and his wife Savitri bai Phule started advocating for the women education. A first

women school was established by Savitri bai Phule in August 1848. Later on in 1873, the couple formed a Samaj (society) called *Satyashodhak Samaj* which educated the marginal sections and women about their right to avail education.

After getting independence, India dreamt of the universal education for all citizens. All successive governments since then have been trying their best to provide education to all.

Universal education was introduced as a directive principle to the states in Indian Constitution in Article 45, which was later made a right and a new Article was added in the section of fundamental rights. However, this idea of 'education as a means to social change' was hailed in mid-sixties in India. Therefore, Education Commission was constructed under the chairmanship of D.S. Kothari. This commission is popularly known as 'Kothari Commission'. This commission considered education as the tool which could shape the country's destiny through its classrooms. It provided the widest opportunities to a person to develop their potential. Since then the idea that human capital can be enhanced through improving skills, knowledge and interest has evolved and it is now believed that it is imperative for the development of human resources. This was made an objective in the Eleventh Five Year Plan (2006) which emphasized the need for an inclusive approach and building people's capacity through education.

Education is an essential characteristic of an individual, family and a nation as it plays an important role in economic, political and social growth of any society. The education has always been an important base for the development of any nation and a human capital was always considered necessary. The role of education was also described in the work of Greek literatures. Many educationalist and philosophers had suggested that for nation building education was important and state should take the responsibility of providing education. In short they supported the state sponsored education system. But the education system they suggested was not exclusive. They had suggested education only for certain sections. For instance, a popular philosopher, Plato in his popular book Republic had devoted a whole section on education and also classified the population to whom and till what level state should get education. As per his classification only Ruler and Warrior class should had right get education. The labourers or the craft-men were not

entitled to get education. Following Plato's footsteps, his disciple Aristotle had also advocated for the state sponsored education system, where all citizens were entitled to get education. But Aristotle's idea of citizenship was also not inclusive. Female, foreigners and slaves were not part of his idea of citizenship; therefore, these people were not entitled to get education.

In the Indian social milieu, education was considered important to gain Moksha, but only a few from the society had the right to pursue the education. The lower caste and people engaged in low profile occupation were excluded from the education system. Education was provided as per the occupation people were engaged in, for instance, Brahmins were taught about the religion and religious literatures, whereas the Kshatriyas were taught about the art of war. The people from Vaishya castes learned about the specifications about the business and commerce. The Shudras were excluded from the education. In ancient India, the education institutions were called *Gurukula*; and students had to stay in these institutions with their Gurus and other students. Only first people from three castes groups were entitled to get admission in *Gurukula*, the Shudra could not access these institutions.

The marginal groups were deprived from getting education. The objective of this kind of education system was not to promote vertical mobility, but to educate individuals to their predetermined status in society. In a nutshell, caste and educational attainment was associated with each other. But the positive side of the ancient education system was that women were also entitled to get education. Nonetheless, in ancient India, we can draw the inference that women education was also part of the society. There were women scholars like Gargi and Maitreyi (Das 2013). In Vedic literature, there was a mention of chhatri (lady students) and Upadhyayi (Lady Teachers). The condition of women had started deteriorated in the medieval phase. During British rule, many reformers worked to improve status of women through educating them; emphasis was to empower women and it was believed that without providing education to women who constituted half of the India's population, the movement of freedom struggle would not succeed. Therefore, it is important to trace development of education in India over various period of time and delineate the status of women in the society and level of education attained.

## **2.2: Development of Education in Pre-Independent India**

Development of education policy in pre-independent India can be traced in two spans of times – before British rule and during British rule.

### ***2.2.1: Status of Education before the British Rule***

British government in India achieved enormous structural development in India and education is one of those important structural changes. However, before focusing on educational development during British rule, it is important to peep into the past educational policies (status) which started in ancient India. There are several instances or sources which indicate towards existence of an education system in ancient India. However, the education system was not inclusive and was mainly meant for the people in higher position in the social hierarchy. The people in power used to guide the course of education. The modern education policy during British rule tried to reform the prevailing education system in India and introduced several initiatives that were inclusive in nature to some extent.

However, the Indian society in ancient era was based on religion and religious practices and education was caught in the clutches of religious directions. The education was based on the writings of *Vedas* and *Upanishads* which were the religious texts and assumed to have originated by the divine. These religious texts were based on philosophical and epistemological grounds. However, these religious texts were not free from partiality and biases as these texts did not allow access to education by people belonging to lower castes. The educational institutions where students were studying called *Gurukulas*. Students had to spend few years of their lives in these institutions and stay there with their gurus. Students used to receive education and knowledge on the basis of their castes following the *Varnashrams* tradition. There was inter-Varna mobilization. Education was mainly determined by the occupation of the family. Even in that era, the education system was linked to the economy. Virtual knowledge and social values were closely related to the kind of education imparted to the students in these gurukulas and the aim was to enhance their capacity to achieve a good life. While there is no document available which indicates what the literacy status and educational policies was in that period, the ancient

texts such the *Rigveda*, the *Upanishads* and the *Shruties* and various Epics give some hints about the kind of educational structure and educational policies that existed during the ancient era (Scharfe 2002). A systematic procedure to formulate education policy was introduced only with the arrival of Aryans in India. They took significant steps in formulating clearly defined educational policies in India. (Keay 1972).

Post-ancient period, there were various kingdoms which stressed upon the education system and developed various educational policies. They showed interest in higher education and donated money and provided land to establish educational institutions. The kings provided patronage to many scholars and helped these scholars to established universities like Taxila and Nalanda (Scharfe 2002). During this time, the Buddhist education also came into existence. The ultimate objective of the Buddhist education was to find out the ultimate truth. Many monasteries were established with the aim to disseminate Buddhist education. There was no space for caste or any inequality in Buddhist education as any person could join these monasteries and education. This inclusive ideology created a continuous struggle between Brahmanism and Buddhism.

In the Brahminical tradition of education, there was a hierarchical system in which only 'dwija' could get education. On the contrary, in Buddhism, education was not based on any caste based discrimination. Buddhist education was not based on Vedic tradition of education. Teachers were basically monks and there was no caste criterion to become a teacher unlike the ancient education system of gurukula where only a Brahman could become a teacher. In a nutshell, the Buddhist education system challenged the established norms prevailing in the education system as it was based on the idea of equality where people from all castes could access education. Like gurukula, the monks used to live in *viharas*. There were several viharas across India which later spread out of India as well. These viharas were centers for higher education and there is historical evidence that suggests that many foreign visitors came to India for their research on education and stayed in these viharas to learn about the actual teachings of Buddhism. The education was free of cost in these viharas including lodging and boarding.

Then came the Mughal period in India which promoted the Islamic ideology and they favoured an education system based on Islam. The Mughal rulers did not take any significant step to reform the education system. Though they had started education institution ‘Madrasa’; but that was meant for Muslims. The education in these Madrasas was imparted by Moulvis in Arabic language. There were two levels of education provided to Muslims – one at primary level in Maktaba (institution primarily based in mosque) and the other was higher education in Madrasa. Earlier these two institutions were meant only for Muslims; but later it also included Hindus. In a nutshell, it can be said that in pre-British India, the education was mainly associated with religion (Yechuri 1986). There was no effective effort made by the rulers to provide uniform education system where people from different castes could obtain education.

### ***2.2.2: Education during the British Period***

The British rule in India is always associated with economic decay and social tussle between various communities. With the arrival of British rule in India, the Indian economy was taken over by the East India Company. Many historians claim that before arrival of the British, the Indian economy was doing much better. During Mughals rule, there were several economic policies like uniform revenue and trade policy. Agriculture was the dominant source of occupation and it was conventional in nature. People from various socio-economic strata were engaged in agriculture in different capacities. Caste was the carrier of social system and also defined the economic hierarchy. People belonging to the lower caste groups were also placed at the bottom in the occupational hierarchy. Access to education was not available to people from lower caste and class. According to Dreze and Saran (1993), travelers who visited India before the British rule have described India (along with China) as a country which contributed 60 to 70 percent to world GDP. The market was based on barter system.

Various communities exchanged goods and services amongst each other. But the entry of British rule destroyed the prevailing economic system in Indian. They started exploiting the Indian economy and Indian traders in the initial years of their rule. The main objective of the rule was to plunder India and destroy the Indian economy. Therefore,



there was no focus on any societal development in the early decades of British rule. The society was divided further with the agrarian settlements and laws (system) institutionalized by the British government. The traditional *zamindari* and *jajmami* system that existed at the time were further encouraged by the British rule. The people from the lower caste and marginalized communities had to serve their upper caste zamindars. Beteille (1978) observed that this system was both discriminatory and repressive.

The existing caste system and caste based discrimination and exploitation was further encouraged by the Britishers. The distribution of government services was unequal and people from the lower and deprived castes did not get the services like health and education that were provided by the government. These people usually worked as labourers in zamindari system and there was no wage parity. The payment rates were not fixed and it was totally dependent on the upper caste zamindars. There was no literacy among the labourers as they were mainly from the lower castes and poor. The education was not universal rather it was confined to a small section of the Indian society. People placed at the lower strata of social and economic hierarchy had no opportunity to avail education. Therefore, the need was felt to introduce an inclusive education system without any prejudices and biases. The important task of introducing this kind of education system was done by the missionaries in the British rule. Though the primary objective of spreading education among Indians was to spread Christianity and principles of their religion, no one can deny their role in the field of education. They were the ones who made British and Indian government realize that it was their duty to educate people and make people aware of the world around and its culture (Keavy 1972).

With this background, the British government started its reformist work and it was clearly stated in British's Charter of 1698 that the schools should be opened with liberal grant or charity. As per the Charter, English Ministers of religion would be appointed to impart education and make people aware about the Christian religion. Ministers of religion were assigned the duty to spread the Gospel among masses through education. However, the British government believed in religious neutrality and understood its importance in the political system especially in the Indian context; and escaped from following the

instruction given in the Charter of 1698. In the 18<sup>th</sup> Century many charity schools were opened but not many people could avail the education services. Madras St. Mary's School was opened in 1715 by Danish Missionaries, and later two other charity schools were opened there in 1717. Two other charity schools were open in Bombay and Calcutta in 1718 and 1738 respectively. And, again in Madras, two separate schools were established for girls and boys in 1787 (Singh 2005).

To formalize the education system, Sir Warren Hastings opened two education institutions in the 18<sup>th</sup> century. The first was the Calcutta Madrasa in 1757 which was established for higher education of Muslims to obtain knowledge of Persian and Arabic studies. Another was the Banaras Sanskrit College which was established in 1791. The objective of this college was to promote classical education and literature in Sanskrit. The main objective of establishing these educational institutions for classical language and history was to generate a group of experts or assistants who could provide their services to the English Judges and explain the philosophies used in the classic texts. The judges used to take inferences from these experts in the cases involving Hindus and Muslims (Basu 1982).

But the real development in education system started in 1813 when Charter Act was announced. Christian missionaries called for mass literacy and started their activities in India. They started imparting education to common people. They were formally allowed to educate people and preach them after passing of the act in 1813. Through that Act, 1 Lakh rupees needed to be set apart for educating Indians by the British government (Basu 1979). It was for the first time in Indian political system that a formal policy on education was introduced which gave directives for imparting education. But the government was not sure whether to allow the missionaries to impart religious teaching in India as people could resist religious preaching due to their own cultural and religious ties.

There were many unclear clauses in the Charter Act of 1813 as it was not defined properly. One of the unclear points was related to the kind of education and the language in which it is to be imparted to Indians. There were two views on this aspect: whether to teach in English or in the local languages. One school of thought known as

Anglicists, advocated that education in India should be imparted in English language and people in India should also be taught the principles of Christianity. On the other side were the Classicists who believed that Indians should be taught as per their own culture and tradition and they supported the promotion of Indian languages such as Arabic, Sanskrit and Persian. However, both schools of thought ignored the social diversities based on culture and languages. None of the sides felt the need for mother-tongue based education. Indian reformers like Raja Ram Mohan Ray were supporter of English education as he believed that English education would make Indians more outward looking and progressive.

The Committee of Public Instruction was instituted in 1823 by the government for shaping a new education policy and providing direction to implement the same. The first president of the Committee of Public Instruction was Lord Macaulay who supported the Anglicist school of thought and supported the education of upper classes using English as a medium of instruction (Gosh 2007). Macaulay claimed that for promoting science and technical knowledge of sciences, it is important to use English as a medium of instruction. He was ignorant about Indian literature and texts and thus advocated that knowledge could not be transmitted through Indian languages as these languages were not equipped with the sources. He believed that English education would make Indian mind efficient enough to understand social, economic and political environment and hence strongly supported the implementation of English education. They wanted to create a group of people who might be Indian in looks but in their thinking and opinion they would be English. In short Ghosh (2007) rightly observed that through this policy they wanted to filter the class from the mass.

The committee was guided by vested interests of the government, as the government wanted to appease the upper class by teaching them the literature they were keen to learn; and secondly, they wanted to earn the trust of these classes by promoting education by using the limited funds of the British government. After several debates and discussions by both schools of thoughts, modern education system was announced. Lord Macaulay supported the English Medium education system in India. In 1835, a resolution was passed to establish schools and colleges to promote European culture, literature and

science by Lord William Bentinck. The resolution stated that all the government schools and colleges would use English as medium of instruction.

The East India Company conventionally renewed its charter within 20 years and as a trend in 1833 charter was renewed. The amount for promoting education in India was increased from Rs. 1 Lakh as mentioned in Charter 1813 to Rs. 10 Lakhs in Charter 1833. In the Charter of 1833, it was also realized that by the next charter of the company there should be a new education policy which provides a well-established education system in India. Therefore, under the chairmanship of Charles Wood a committee was made to give suggestion to improve Indian education system. The draft prepared by the committee is called 'Woods Education Despatch'. This despatch was a landmark in the development of the Indian educational structure as it suggested various significant reforms in the existing education system. Looking at the importance of this committee, it is also known as the 'Magna Carta of English Education in India'.

The despatch's suggestions were comprehensive and far-sighted. It articulated that through education people should get knowledge of science, philosophy, arts and literature. It also recommended Indian languages should be used for teaching and if need be, English language could be used as both languages were important to get education. The main suggestion of Wood Despatch was to establish universities in India and following this recommendation the first university was established in Calcutta in 1857 followed by Bombay and Madras.

Other important and significant step taken by the British government was the appointment of the Sargent Commission. The commission was set up in 1944 and headed by John Sargent. The commission was given the responsibility to analyze the current education situation in India and prepare a report to recommend ways to improve the future of Indian education system. In a nutshell, it was the British government who established the cornerstone of modern education in India before independence and opened several schools and colleges and also promoted higher education by establishing universities all across major cities in India. It generated a class of people who was

educated and some of these people from the educated class worked towards reforming the Indian society and education system.

### **2.3: Education Policies in Independent India**

After getting independence, the condition of Indians was not good. People were suffering from poverty, mass hunger, famines and other miseries. The Indian economy was totally destroyed and various cottage and small-scale industries were defunct. The British government had looted the Indian economy and plundered its wealth and transferred its resources to Britain. Moreover was no major change and transformation in the social structure of Indian society.

In the ancient times, the education was imparted to students in gurukula where only upper caste students could get educated. Education was not available to the masses and more specifically to the people from lower caste groups. Following the same tradition, the British government also made limited access available to education. Though it started various schools, colleges and universities, but the access to these educational institutions was not easy for all. It was only meant for the people positioned at the top of the economic and social strata. People from upper income groups, upper castes and other dominant family could approach to the educational institutions to get higher education. The education system was used to create a group of people who could serve the British administration. People from the upper caste and upper class families took the advantage of the education system to secure good jobs in the British administration (Srinivas 1962).

One of the critiques of the education system introduced by the British government is that the education system during British rule further divided the India society. The society which was sharply divided on the basis of caste was further divided on the basis of class. A class of 'elites' emerged due to education who had high standard of living that was influenced by western culture. They were drawing good salaries and enjoyed social prestige in the community; on the contrary the poor were still grappling to get food and other basic services. Access to education, especially English education had become a means to achieve a good quality life, but on the other hand, it had segregated the caste and created several sub-groups within castes.

After the independence of India, the Indian government set up several commissions on education to review and evaluate the status of education. Many of these commissions presented critical reports and recommendations to upgrade and improve the education system. Using those reports and recommendations, new and effective education policies were made. However, one can observe a clear divide between the recommendations made by the commissions and the implementation of those recommendations in reality. There could be several reasons for this gap such as political, economic and social reasons; and sometimes the lack of administrative will to execute those policies on ground.

India has seen an increase in educational institutions at various levels and the entry of private educational institutions. This posed a critical challenge for the educational planner and policy makers. These educational institutions have totally neglected the social and economic disparity and cultural differences existing in education system in India. The policy makers and education experts and planners suggested various resolutions to bridge the social and economic divide through the introduction of various education schemes and also initiated the support services for people belonging to the marginal sections of the society and social and economic hierarchies to make education universal and accessible to all. But the state has not been able to control the monopoly of the private institutions because the quality of the education provided at the government schools is not satisfactory and government has not made sufficient efforts to improve it further. There is a lack of a universal mechanism which could be used to measure and control the quality of education at each level. Therefore, it is high time for the policy makers to devise such a mechanism to deal with the issue of the quality of education.

During the British rule, no other significant commission was set after the Sargent Commission. The suggestions and recommendation made by Sargent Commission were not conducive to the situation India faced after independence. Therefore, the need was felt to establish commissions that could sense the contemporary situation in a newly emerged country like India which had yet to start its nation-building process. The Central Advisory Board of Education (CABE) suggested setting up commissions to deal with the challenges prevailing in education system. Two commissions were suggested to be set up – one was entitled to deal with the university education and other was to deal with the

secondary education. It was necessary because the education system after independence would be totally different. During the freedom struggle movement, it was assured to the people that post-independence India would be based on egalitarian society and there would be no discrimination in the distribution of services on the base of socio-economic position. Therefore, the constitution makers kept their promise and introduced a provision of free education for as a Directive Principle of State Policy; and targeted that India by 1960 would achieve the universal elementary education. The government has also made possible effort to improve the higher education so that people can get access to it easily.

The new vision to improve the education system in India started from the day India got independence. New challenges and problems were faced by Indians and the new government as the Indian society was highly fragmented on the basis of caste, class, religion and regional identities. Education became the subject for the both the state and central government. The government had realized by that time that for the sustainable development of Indian society and economy, it was imperative to reconstruct its education system. Only an educated society would benefit the country's development. The Indian constitution also provided the safeguard to the marginal sections of the society and used 'positive discrimination'. In order to provide equal educational opportunities, the government reserved seats in educational institutions to include sections of the society which were traditionally being marginalised and were kept out of the development agenda. The government was aware that in order to eradicate poverty and other socio-economic challenges, education was a crucial instrument. In order to become self-sufficient in the economy, the country must develop its social and human capital.

In order to create human resources who could contribute to the society in achieving the set goals of the government, education should be provided to all and the government took the charge to improve education system. The next sub-sections talks about the policy development which India government carried forwards to improve the education system in India.

### ***2.3.1: University Education Commission (1948-49)***

In post-independent India the first commission on education was appointed in 1948 and it was called University Education Commission. A great educational reformist, Dr. S. Radhakrishnan was appointed as the chairman of the commission and therefore, the commission is also known as 'Radhakrishnan Commission'. The main objective of the commission was to improve the higher education in India via improving the school education as well. It emphasized that for higher education, the university system needed to be introduced widely so that people could get easy access to the institutions of higher learning known as universities. Students should get training in various fields needed to for nation-building. Universities should train people who can be utilized in administration and industries. It suggested to extend the span of higher education from 12 years of learning at intermediate. The commission had realized that the condition of higher education system in India is very poor and it should be improved on priority basis.

Along with the university education system, the commission also suggested to improve the school education system where students could get quality and skillful knowledge so that those who could not avail the facilities of higher education should get a livelihood based on their school education. The objective of these suggestion made by the commission was to provide the educational facilities to both, ones who wanted to pursue higher education and also for those who were not able to pursue their higher education and started working after completing schooling.

The commission aimed at establishing universities at various places so that people can get easy access to the education; and also targeted to provide easy access to these universities. People from various sections of the society such as from different castes, classes, religions, gender and regions could avail the benefits of university education.

The commission had started aiming at the establishment of the universities at various places so that people can get easy access to the education; and also targeted to provide easy access to these universities. People from various sections of the society such as from various caste, class, religion, gender and region could avail the benefits of university education.



### ***2.3.2: Secondary Education Commission (1952-53)***

The Indian constitution makers gave importance to the universalization of elementary education and introduced article 46 in Indian constitution as the Directive Principles of State Policy and ensured that states should provide the universal elementary education to the children between 6-14 years, but no special reference was given to the secondary education. Therefore, a separate education commission was suggested on secondary education. Under the chairmanship of Dr. Lakmanaswami Mudalair 'secondary education commission' was appointed in 1952 to improve the secondary education system in India.

The commission focused on providing an inclusive education system in which the emphasis was to provide constitutional and democratic values and it was realized that these values could be provided only after eradicating the existing social and economic discrimination based on caste and economic class of the individual. Schools were seen as microcosm of the larger society and it was suggested that the practice of social justice and equality should start from the schools.

The commission submitted its report in 1953 and several important recommendations were made by the commission to improve the secondary education system in India such as three-language formula,; opening of technical and vocational schools to develop and inculcate skills,; revision of the examination system and also improvement in the teaching methods. While these recommendations were very significant they failed to provide any specific step to improve girls' educational attainment in secondary education.

### ***2.3.3: Indian Education Commission (1964-66)***

After Mudalair Commission, a new education commission was appointed in 1964 with Dr. D.S. Kothari as its Chairman. This commission is popularly known as Kothari Commission. Kothari commission stands at very significant position in reconstructing and reforming Indian education system. Unlike previous two commissions, the Kothari commission was the most elaborative in nature as it mainly focused on the overall reformation of the education system. It was seen as the blueprint of the reconstructed or renewed education system.

The commission targeted to inculcate democratic values and enhance social and national integrity. It saw education as an instrument for national development and it reflected this in its report titled 'Education and National Development'. It comprehensively saw education as a carrier of national development. The commission underlined the factors which could be brought in the education system to reform it. It believed that Indian education standards needed to be improved so that it could be comparable to the international standard of education system. Therefore, it was high time that the education system be reformed. The commission also proposed the idea of 'equalization of education opportunities' which meant that individuals should have an equal right to access education opportunities.

The report suggested the standardization of education across all Indian states and union territories; and suggested a uniform pattern of 10+2+3. The commission used the 'human power approach and suggested that education should be used for generating human power to serve the needs of industries and other sectors which would help transform the social and economic structures of India. In its recommendations, the uniform education was an important step. It recommended provision of 10 years of common education in all Indian states and suggested that different course to be introduced only at +2 level.

The main emphasis of the commission was on sciences and mathematics and it suggested that through scientific knowledge national development could be easily achieved. It also suggested a few schemes for quantitative reform in education by improving literacy rate such as free-text books at elementary level, mid-day meals special education system for handicapped and equal access to education opportunities for dalit, adivasis and women. Adult education was also suggested. In order to achieve mass literacy, the report recommended, implementation of teachers' training, institutional planning and progressive teaching learning exercises to achieve qualitative improvement in the education system.

#### ***2.3.4: National Policy on Education (1968)***

The first ever national policy on education in independent India was introduced in 1968. This policy was mainly based on the recommendations made by the Kothari Commission.

The policy suggested measures to reconstruct the education system and visualized education as a tool for providing a quality life and improved standard of living. It also gave importance to science and technology as it was required to generate a group of skilled people for the industrial development.

The policy suggested executing the Article 46 of Indian Constitutions which directs states to ensure education for all children between 6-14 years. One of the important reforms which the policy suggested was the three-language formula and it encouraged regional language to be used in secondary education, unlike the suggestion made by the Kothari commission which promoted English as a medium of instruction along with Hindi as the national language. Through this policy the budgetary expenditure on education was also increased by the Indian Government. It provided scholarship schemes to bring people from backward castes and class into the education system. On the whole, the policy was a systematic effort to improve the education structure of India.

### ***2.3.5: National Policy on Education (1986)***

The Government of India reviewed the existing education system and launched a new policy called the 'National Policy on Education' in 1986. The objective of the policy was to sort out the challenges faced by the Indian education system at that time. It also emphasized the need to introduce new education system in India which would be contemporary and scientific in nature. It was assumed that the new and improved education system would help policy makers in dealing with the challenges faced by the country.

The NEP 1986 asserted that the objective set up by NEP 1968 was not met. For instance, schools were set up within 1 kilometer and standardized education system was adopted by the states as recommended and targeted by the NEP 1968. However, still there were certain challenges regarding quality and access to the education. To overcome from these challenges monetary and administrative support is needed.

The purpose of the NEP 1986 was to improve the standard of education and make it more accessible. The new policy also emphasised that only government funds are not sufficient

for the financial support needed to improve education and therefore private grant is also needed. Central government took charge of the education subject and states were to partner with the Central government with local curriculum design that suited the states.

The policy suggested a uniform structure of education system based on the formula of 10+2+3 in which first 10 years of schoolings were broken into three stages – initial five years for primary schooling; next three years for upper primary and last two years for high school. This was a universal system of education in India which was to be followed by each state without any exception.

Another important measure taken by NEP 1986 was the opening of Navodaya Vidyalayas for providing quality education to the poor and children from the lower castes. Preference for women education was also recommended in this system of schooling. It also focused on removing the challenges that women faced especially in remote areas and also suggested setting up of residential schools for them.

It also emphasized on access, enrolment and retention of the students till the elementary level and also recommended to enhance the quality of education. The efforts were also made to introduce non-formal education for those who could not complete their education. For quality education, the focus on teachers' training and education was emphasized. The District Institute of Education and Training (DIET) were also established to give training to the teachers before joining the service and during the services to enhance their teaching skills; and it was made mandatory to attend capacity building programmes to enhance their teaching learning skills.

The policy also initiated improvements in the infrastructure available in the schools. One of the important actions was 'Operation Blackboard' which ensured that teaching aids are made available in the schools. The emphasis was also given to the use of technology in the teaching learning process

### ***2.3.6: National Policy on Education (1992)***

Under the chairmanship of Acharya Rammurthy, the government appointed a committee in 1989 to evaluate the progress of the NEP 1986. The report of this committee was submitted in 1990 and the title of the report was 'Towards an Enlightened and Humane Society'. The report recommended that since there were several disparities on the basis of caste, class, region and gender in the society, therefore the private schools should also follow the common school system. The report also suggested that special programs should be introduced for children coming from SCs, STs and backward caste households. Gender gap in literacy was also a concern therefore, women centric programmes were also given due attention in the report.

In order to improve the quality of primary education and also to provide basic infrastructure at primary level, funds were allocated to the state governments for education. It suggested that the basic education should be given in the mother tongue. The recommendations of the Rammurthy committee had become the base for revising plan of action which was stated in NEP 1992. However, the government of India had appointed another committee headed by Janardhan Reddy in 1992 which recommended extensive reformist idea to improve the education system and became the base point from where idea of NEP 1992 was drawn.

### ***2.3.7: Sarva Shiksha Abhiyan (SSA)***

*Sarva Shiksha Abhiyan* which targeted to provide education to all was a flagship programme launched by the Indian government. The thrust of this programme was on the universalization of education, especially the elementary education. The programme was seen as the precursor to the Right to Education Act introduced by the Government of India. The programme was initiated by the support of giant international funding agencies like UNICEF and the World Bank. In 1993, District Primary Education Programme (DPEP) was started and government took support from the DPEP and started the *Sarva Shiksha Abhiyan* in collaboration with the state governments. It targeted to enroll people from different social-economic backgrounds. The emphasis was also given to women education.

The community was brought to the center stage and it was asserted that the community participation is important to achieve the goal of universal education system. Local bodies, self-help groups, youth organizations and members of civil society organizations were also partners with the government and were consulted by the government in the implementation of the programme. SSA had set up School Development and Management Committees (SDMCs) for each school in the village. Many schools were opened for the inhabitants and the school infrastructure was improved. In order to improve the quality of education, teachers were given trainings and timely evaluation was done.

### ***2.3.8: Right to Education Act (2009)***

Right to Education Act which ensures the right to children between the age groups of 6-14 years to avail free and compulsory education came with effect from 1<sup>st</sup> April 2010. This act provided education as a fundamental right to the children. One of the important efforts made by the act was the reservation of 25 percent seats in private schools for the children coming from the economically deprived sections of the society. The work of the implementation of this act was divided among Centre, states and local governments. Other than these commissions and central policies, the state governments have also launched state specific schemes which will be detailed in chapter 4.

## **CHAPTER 3**

# **A SNAPSHOT OF SCHOOL EDUCATION IN CONTEMPORARY INDIA**

### 3.1: Background

Education is considered as an important mechanism which helps human beings to develop their rational. However, the education system in India, all across the world has faced challenges from various scholars and observers and they have criticized it on the ground that Indian education system is not partial or inclusive in nature. Many sections of the society such as women, marginal ethnic and caste groups have been excluded from the education system. Though with various social reform movements and efforts made by the government, these groups were brought into the system, but the gap has not mitigated yet. As per the 2011 census, 34.54 percent of the women are non-literate, though there has been increase in the literacy rate by 11.79 percentage point when compared to census 2001.

Nevertheless, it was observed that gender divide in education has narrowed down; but when it comes to women participation in economic activities or in job market, their low rate of participation is a matter of concern. When we compare this figure with India's neighbouring countries like China and Nepal, it seems to be adversely low. In China Female Labour Force Participation (FLFP) was 63.9 percent and in Nepal it was 79.9 percent in 2013 (Bhandarkar and Roy, 2018).

As discussed in the previous chapter that women were not included in the purview of the formal education, when the formal education system in India was introduced by Lord Macaulay in 1835. Though almost after two decades through the 'Wood's Dispatch' in 1854 an education development programme was passed which took the responsibility of educating women and talked about women's education and employment. Other than these efforts made by the British Government, a few social reformists like Rammohan Roy, Jyotiba Phule and Pandita Rama Bai also initiated ~~the~~ separate schools for girls. These reformists had firm belief that women have equal rights for accessing the education.

This chapter aims to look at the educational status of women in India. The pertinent question is why some states perform better despite same national policies and strong state policies.



Rajasthan is amongst the worst performing states as far as the educational parameters are concerned. The status of women education is even worse than the poorer states of India. To see the overall of educational attainment of various sections of Indian society, this chapter uses data collected by government agencies such as Ministry of Human Resource Development (MHRD), National Sample Survey Office (NSSO), National Council for Educational Research and Training (NCERT) and National Institution of Educational Planning and Administration (NIEPA). Before proceeding to the data description the next section of the chapter talks about the various sources of the data on education status in India.

### **3.2: What are the different Sources of Data?**

When we look at the different sources of data on education, we observe that there are two levels of data available – a. school level data and the household level data. The data at the school level are mainly collected the Ministry of Human Resource Development (MHRD) and the National Institution for Education Planning and Administration (NIEPA). They collect information on various themes such as grade wise enrolment, state level financial allocation on education, infrastructure available in schools, availability of the teachers at schools etc.

Other than this, MHRD also gathers information and put it together as an All India Education Survey (AIES). Through this survey, data are collected on habitant level on the different type of schools on various parameters – quality, availability and accessibility. Similarly, NIEPA annually compiles the information on district education system through DISE for various types of schools. It is considered as an official database for school level information. NIEPA has recently initiated the exercise of compiling unified data for students from class one to twelfth. As MHRD, NIEPA also collect information on infrastructure, enrolment and availability of teachers in schools. On the other hand, the household data is compiled by various government and non-government organization (Table 3.1).

**Table 3.1: Types of Educational Household Survey**

	Household survey name	Features
Government organization	Census of India	<ul style="list-style-type: none"> <li>• Collect information in every 10 years</li> <li>• Collect information for school participation</li> </ul>
	National Sample Survey (NSS)	<ul style="list-style-type: none"> <li>• Focused survey on education in every 5-10 years</li> <li>• Estimates various indicators of educational attainment through rigorous sampling method</li> </ul>
	National Family Health Survey (NHFS)	<ul style="list-style-type: none"> <li>• Estimates of attendance rates</li> <li>• Estimates of national and state level dropout rate</li> </ul>
Private Organization	India Human Development Survey (IHDS)	•Collect data on enrolment and expenditure on education
	Annual Status of Education Report (ASER)	<ul style="list-style-type: none"> <li>• Measure quality of education</li> <li>• Data is collected from rural areas only</li> </ul>
	SRI-IMRB Survey on Out of School Children (hired by MHRD)	• Collect information on out of school children aged between 6-13 years

*Source: Information from various sources*

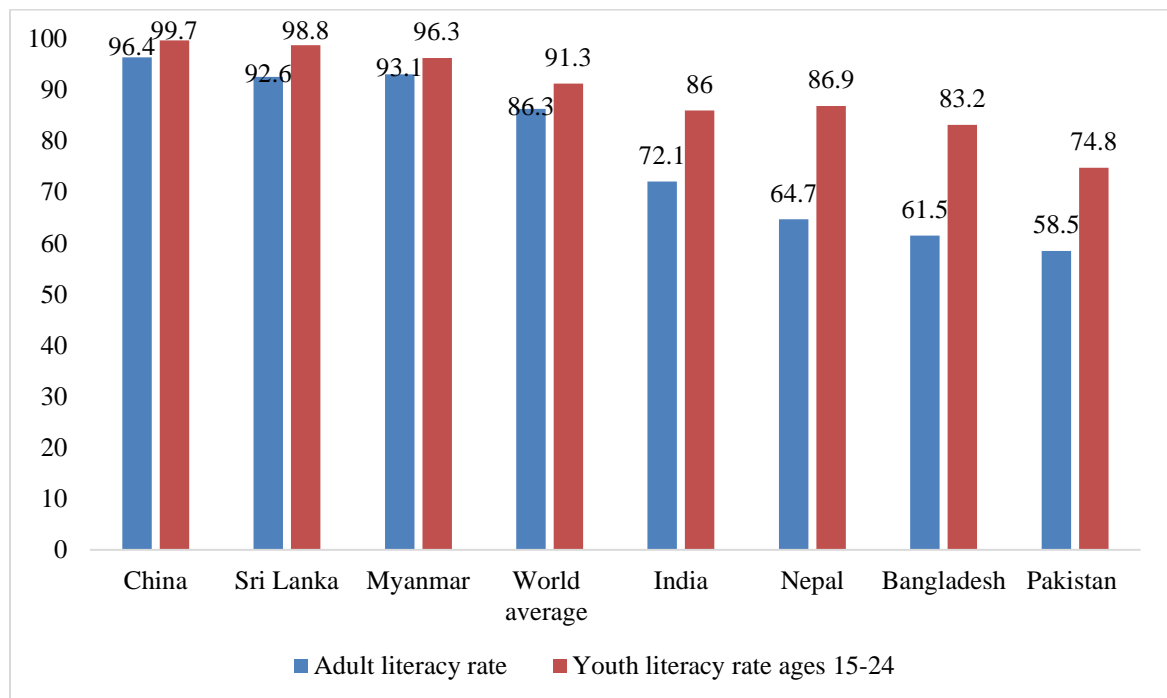
The government has also engaged the local government in arranging information on children who left the schools and could not complete their education. The Panchyats in rural areas conducted the household surveys to collect information on out of school children (OOSC). These surveys can be seen as Child Tracking Surveys which are being conducted under the *Sarva Shiksha Abhiyan* annually. For this chapter, the data is mainly used from Census of India and NSSO 71<sup>st</sup> Round. However, to measure quality of education, data with ASER is used and later the conclusion is compared with the current study. Data from DISE and AIES are also used in next chapter to see the accessibility,

availability and quality of education. For comparison, data from other sources are also referred in between the chapters.

### 3.3: Status of Education - National and State Level

India has seen increase in overall literacy rate. Systematic growth in its performance is evident. The government of India and various state governments have also put effort to improve the status of education in the county and their respective states. However, when we look at its overall literacy status in worldwide context, its achievement in literacy is poorer than its neighbouring countries, Sri Lanka and Myanmar in terms of overall literacy as well as its youth's (15-24 years) literacy rate (Figure 3.1). India is below world average literacy rate. Its performance is slightly better than Bangladesh and much better than Pakistan in both terms.

**Figure 3.1: UNESCO list of Countries by Literacy Rate (2015)**



*Note: All figures are in %.*

*Source: United Nations Educational, Scientific and Cultural Organisation (UNESCO) data 2015.*

In states like Arunachal Pradesh, Bihar, Jharkhand, Jammu and Kashmir, Karnataka, Madhya Pradesh, Uttar Pradesh, Rajasthan and Odisha, literacy rate is below all India literacy rates as per 2011 census (Figure 3.2). We can see the state level variation in literacy rate. Tripura has improved its literacy rate and achieved the literacy rate at 94.65 percent, whereas Bihar stands at the bottom across all Indian states with the literacy rate at 63.82 percent. Bihar, Rajasthan, West Bengal, Uttar Pradesh, Madhya Pradesh and Andhra Pradesh are the six states which accounts 70 percent of all non-literates in India.

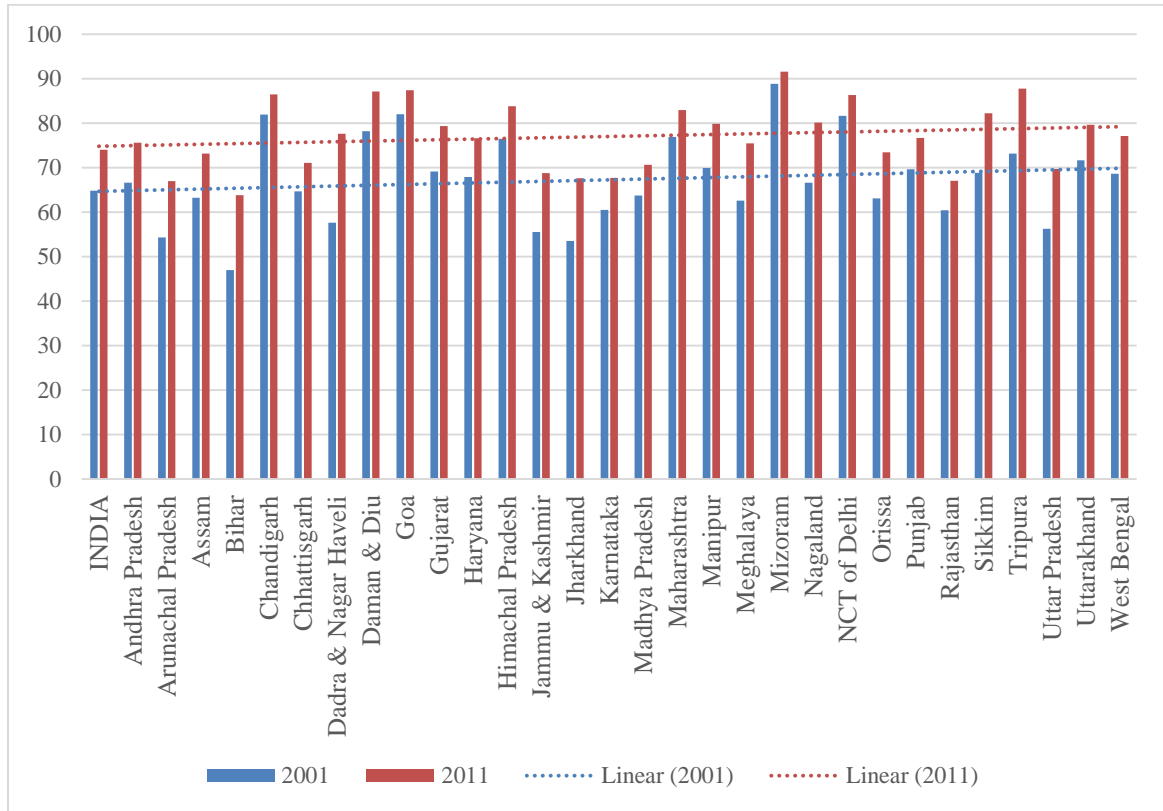
Many states of India have initiated various programmes to increase the literacy rates which have been quite successful. For instance, Bihar has successfully improved its literacy rate in 2011 Census. In 1991, literacy rate in Bihar was 39 percent which raised to 47 percent in 2001 and due to the efficiency of government policy its literacy rate was 63.8 percent in 2011 census. The Bihar government has introduced various programmes to boost its literacy rate. Bihar is one of the poor states of India. This extensive poverty coupled with social divide on the basis of caste and class have extravagated the poor educational attainment among children.

Due to lack of employment opportunity in Bihar high level of migration have also dented the educational opportunities of the children. The state could not invest fairly in the development of education. Lack of funding and lack of facilities at schools were also a great challenge to improve literacy in state. Bihar government took a strict action and warned the teachers that the government would cut their salary if they failed to conduct classes on regular basis. Even to improve students' attendance in school the government announced to pay Rs. 1 per day to students if they attend school (*Bihar Times* 2009). Other than these actions, the Bihar government has also initiated several policies to deal with dropouts, teachers absenteeism etc.

As per 2011 census, the state with the highest literacy was Kerala where 93.91 percent population is literate. The state performs far better than other Indian states in various indicators of education development like availability of primary schools in habitant. In rural areas, to improve accessibility transportation cost is highly subsidized. Third most literate state of India is Mizoram. Its social and cultural structure has motivated for

education for each section of the society and government of Mizoram has also put hard efforts to improve the education condition in the state. Similarly, efforts made by the Himachal Pradesh government have made the state, one of the most literate states.

**Figure 3.2: Literacy Rate in Indian States - 2001 and 2011**

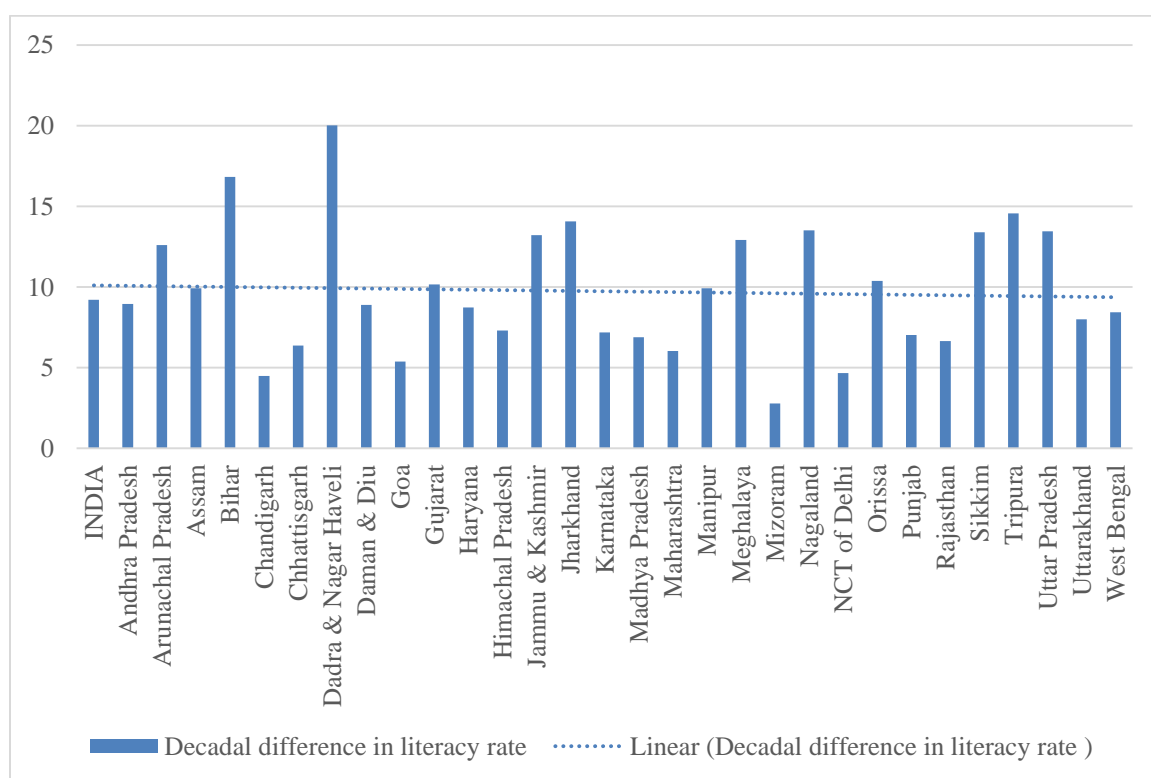


Note: All figures are in %.  
 Source: Census of India 2001 and 2011.

At present, Tripura is the state with the highest literacy rate (*Times of India* 2013, September 8). As per 2011 census, Tripura was at 4<sup>th</sup> place with literacy rate at 87.75 percent after Kerala, Lakshadweep and Mizoram. It has improved its position from being 12<sup>th</sup> position in literacy rate in 2001 census to the 4<sup>th</sup> place in 2011 census. There are various agents who contributed to the Tripura’s success story like local government, NGOs and local agents who kept the close eyes on the Literacy Mission announced by the chief minister Manik Sarkar.

On the other hand, Rajasthan stands amongst the states having lowest literacy rate; and if we look at the decadal growth in literacy rate from 2001 – 2011, there is not much difference as compared to other states (Figure 3.3). It has only risen by seven percentage points from 60.4 percent in 2001 to 67.1 percent in 2011. However, we cannot ignore the efforts made by various regimes in Rajasthan through which state had improved its literacy status. The state government has taken aggressive actions to achieve this improve growth in literacy rate. For instance, schemes like Shiksha Karmi and Lok Jumbish programme added a lot in this rapid growth.

**Figure 3.3: Decadal difference in Literacy Rate from 2001 to 2011**



*Note: All figures are in %.*

*Source: Census of India 2001 and 2011.*

The education of women is important for social and economic growth of any nation. Many studies have shown the positive correlation between women education and high growth in social and economic development. Through women education, their participation in labour force would also increase and it would further strengthen the economy. In social front also through women education, health outcome would also

enhance. Issues like rising population, gender violence could also be checked through women education. Women education is also effective for inter-generational mobility as it was observed in many studies that there is greater impact of mother on intergenerational mobility. But still there is an under-investment in women education. There are various socio-economic reasons for under-investment in women which have been discussed in detail in chapter 5 and chapter 6. There is positive trend in women literacy rate as gender gap in literacy rate is narrowing down (Table 3.2).

**Table 3.2: Literacy Rate and Gender Gap in Education, 1951 - 2011**

<b>Census Year</b>	<b>Person</b>	<b>Men</b>	<b>Women</b>	<b>Men-Women literacy gap</b>
1951	18.33	27.16	8.86	18.3
1961	28.3	40.4	15.35	25.05
1971	34.45	45.96	21.97	23.98
1981	43.57	56.38	29.76	26.62
1991	52.21	64.13	39.29	24.84
2001	64.83	75.26	53.67	21.59
2011	74.04	82.14	65.46	16.68

*Note: All figures are in %.*

*Source: Census of India 2001 and 2011.*

Available data on enrolment also indicate towards a positive rise in the educational attainment as compared to first three decades after independence. The enrolment in each level – primary, upper primary and secondary level has increased for both boys and girls mainly after year 2000, however not much significantly for women. In the year 2000-2001, 640 Lakhs boys got enrolled in primary level whereas the share of girls’ enrolment was 498 lakhs, but the gap between girls’ and boys’ enrolment has started narrowing down with the inception of RTE Act 2009. This increase can be observed in upper primary and secondary level (Table 3.3).

**Table 3.3: Level-wise Enrolment of Students (in Lakhs)**

	Primary			Upper Primary			Secondary		
	Male	Female	Total	Male	Female	Total	Male	Female	Total
1950-51	138	54	192	26	5	31	NA	NA	NA
1960-61	236	114	350	51	16	67	NA	NA	NA
1970-71	357	213	570	94	39	133	NA	NA	NA
1980-81	453	285	738	139	68	207	NA	NA	NA
2000-01	640	498	1138	253	175	428	116	74	190
2010-11	701	646	1347	327	292	619	175	143	318
2015-16*	669	622	1291	347	329	676	205	186	391

*Note: from 1950-51 to 1980-81, figures for Class XI-XII include Class IX-X. NA: Not Available*

*Source: NIEPA, New Delhi*

However, different states have different trajectory of women education. Bihar has the lowest literacy rate but it is Rajasthan where women literacy rate is the lowest. The gender gap in literacy rate is also highest in Rajasthan with 27.85 percentage points. This indicates that probability of girls attaining education is much less in Rajasthan than any other state of India. After Rajasthan, it is Jharkhand where gender gap is higher at 22.24 percent. As per the 2011 census the state falls in the categories of *BIMARU*<sup>1</sup> states (state having lower economic development) like Bihar (including Jharkhand), Madhya Pradesh (including Chhattisgarh), Uttar Pradesh, Rajasthan and Odisha have the lower literacy rate much lower than national average (Table 3.4).

<sup>1</sup>It was coined by Ashish Bose in the mid-1980s



**Table 3.4: Gender wise Literacy Rate – 2001 and 2011**

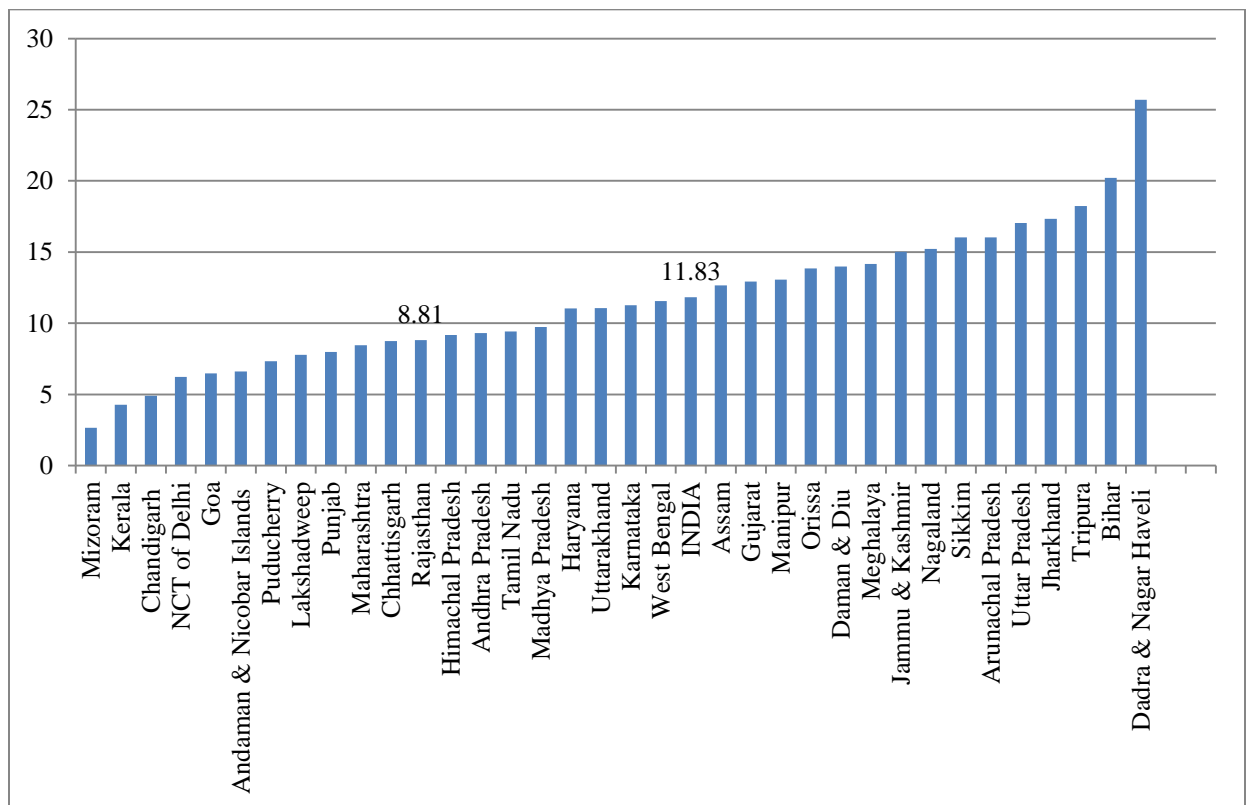
	2001			2011		
	Male	Female	Gender Gap	Male	Female	Gender Gap
<b>INDIA</b>	<b>75.26</b>	<b>53.67</b>	<b>21.59</b>	<b>82.1</b>	<b>65.5</b>	<b>16.6</b>
Andaman & Nicobar Islands	86.33	75.24	11.09	90.11	81.84	8.27
Andhra Pradesh	70.32	50.43	19.89	75.56	59.74	15.82
Arunachal Pradesh	63.83	43.53	20.3	73.69	59.57	14.12
Assam	71.28	54.61	16.67	78.81	67.27	11.54
Bihar	59.68	33.12	26.56	73.39	53.33	20.06
Chandigarh	86.14	76.47	9.67	90.54	81.38	9.16
Chhattisgarh	77.38	51.85	25.53	81.45	60.59	20.86
Dadra & Nagar Haveli	71.18	40.23	30.95	86.46	65.93	20.53
Daman & Diu	86.76	65.61	21.15	91.48	79.59	11.89
Goa	88.42	75.37	13.05	92.81	81.84	10.97
Gujarat	79.66	57.8	21.86	87.23	70.73	16.5
Haryana	78.49	55.73	22.76	85.38	66.77	18.61
Himachal Pradesh	85.35	67.42	17.93	90.83	76.6	14.23
Jammu & Kashmir	66.6	43	23.6	78.26	58.01	20.25
Jharkhand	67.3	38.87	28.43	78.45	56.21	22.24
Karnataka	76.1	56.87	19.23	82.85	68.13	14.72
Kerala	94.24	87.72	6.52	96.02	91.98	4.04
Lakshadweep	92.53	80.47	12.06	96.11	88.25	7.86
Madhya Pradesh	76.06	50.29	25.77	80.53	60.02	20.51
Maharashtra	85.97	67.03	18.94	89.82	75.48	14.34
Manipur	79.54	60.1	19.44	86.49	73.17	13.32
Meghalaya	65.43	59.61	5.82	77.17	73.78	3.39
Mizoram	90.72	86.75	3.97	93.72	89.4	4.32
Nagaland	71.16	61.46	9.7	83.29	76.69	6.6
NCT of Delhi	87.33	74.71	12.62	91.03	80.93	10.1
Orissa	75.35	50.51	24.84	82.4	64.36	18.04
Puducherry	88.62	73.9	14.72	92.12	81.22	10.9
Punjab	75.23	63.36	11.87	81.48	71.34	10.14
Rajasthan	75.7	43.85	31.85	80.51	52.66	27.85
Sikkim	76.04	60.4	15.64	87.29	76.43	10.86
Tamil Nadu	82.42	64.43	17.99	86.81	73.86	12.95
Tripura	81.02	64.91	16.11	92.18	83.15	9.03
Uttar Pradesh	68.82	42.22	26.6	79.24	59.26	19.98
Uttarakhand	83.28	59.63	23.65	88.33	70.7	17.63
West Bengal	77.02	59.61	17.41	82.67	71.16	11.51

*Note: All figures are in %.*

*Source: Census of India 2001 and 2011.*

However, when we look at the decadal growth in women education from 2001 to 2011, one can observe that Bihar, Tripura, Jharkhand and Uttar Pradesh have performed really well over a decade, whereas Rajasthan's growth in women education was only 8.81 percent (Figure 3.4). There are several barriers to women education in India. Indian society is based on class –caste and gender and carries this division as their cultural and traditional values. Preference for a son, customs like marriage and dowry and women's economic dependence on their father, husband and sons put them in vulnerable situation. In Indian family structure, women are not independent decision makers on various issues like whether to work or not, birth of a child and education of their children. This patriarchal structure of the family hinders the overall development of the women (Subrahmanian, 2005). Economic status of the family is also associated with women's education.

**Figure 3.4: Decadal Increase in Women Education from 2001 - 2011**



*Note: All figures are in %.*

*Source: Census of India 2001 and 2011.*

Other issue aligned with lower educational attainment is the dropout or out of school children. The governments have taken the cognizance to deal with the issue of dropouts and encourage students to continue their studies; however due to various socio-economic reasons students leave their studies in between. The next section tries to analyses the state-wise dropout pattern in details.

### **3.4: Dropout: Out of School Children**

There are different definitions of ‘drop out’ in different states of India. For example, in Karnataka if a child does not attend school for continuous seven days, s/he is considered as a dropped out, on the contrary in Gujarat the window is for 60 days if child remains absent for 60 days, s/he is considered as dropped out. Therefore, MHRD took a notice and defined a common definition for all states after passage of Right to education Act. As per its definition if children remain absent for 45 days or more, they are considered to be dropped out. But this was not universally accepted by all states of India, Karnataka and Gujarat follow their previous definitions.

However, for measuring dropout for this chapter, we have used data from the National Sample Survey Organization (NSSO) round 71. In this sample survey a straight question is asked whether the child has completed his/her schooling. NSSO data indicate that 31.73 percent of the sampled respondents said that they have discontinued their studies. This trend is highest in Tripura where 56.63 percent of the respondents said that they have discontinued the studies. In states like Uttarakhand, Nagaland, Haryana, Himachal Pradesh, Uttar Pradesh, Punjab and Bihar the dropout is lower than national average, whereas in states like Andhra Pradesh, West Bengal, Odisha, Meghalaya, Arunachal Pradesh and Tripura, the dropout is higher than other states. In Rajasthan the dropout is close to the national average.

The NSSO data do not correspond with NIEPA data on this measure. Table 3.6 indicates that all India annual dropout rate was 4.13 percent at primary level, 4.03 percent at upper primary level and 17.06 percent at secondary level as per NIEPA data, on the contrary NSSO data indicate that dropout at primary level is 7.44 percent, 12.95 percent at upper

primary level. This figure indicates that almost 12.95 percent of the children discontinue their studies after upper primary (Figure 3.5).

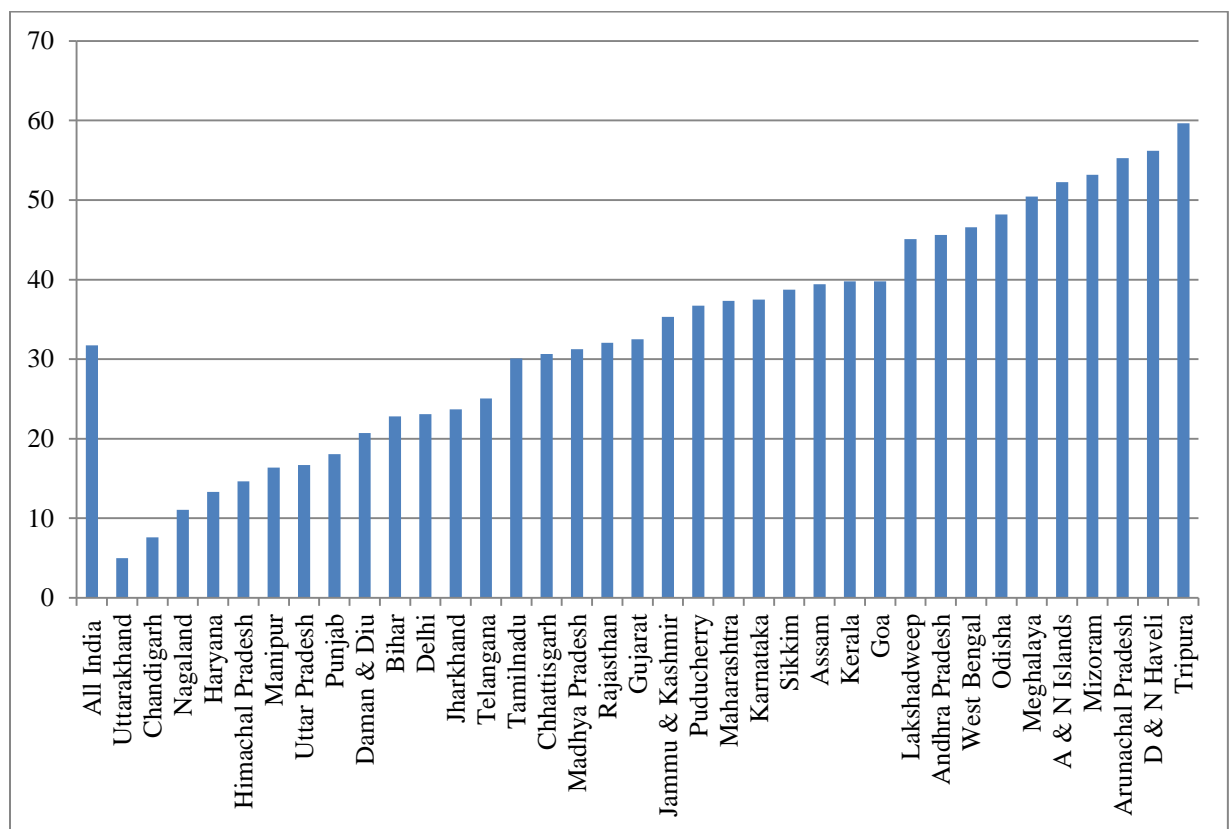
**Table 3.5: Average Annual Drop-Out Rate in School Education: 2014-15**

Level	All			SC			ST		
	Boys	Girls	Total	Boys	Girls	Total	Boys	Girls	Total
Primary	4.36	3.88	4.13	4.71	4.20	4.46	7.02	6.84	6.93
Upper Primary	3.49	4.60	4.03	5.00	6.03	5.51	8.48	8.71	8.59
Secondary	17.21	16.88	17.06	19.64	19.05	19.36	24.94	24.40	24.68

*Note: All figures are in %.*

*Source: NIEPA, New Delhi*

**Figure 3.5: State-wise Dropout**



*Note: All figures are in %.*

*Source: NSSO 71<sup>st</sup> Round*

**Table 3.6: State-wise Dropout at Various Levels**

	<b>Primary</b>	<b>Upper Primary</b>	<b>Secondary</b>
Jammu & Kashmir	4.86	15.26	11.42
Himachal Pradesh	5.45	11.32	14.73
Punjab	6.47	14.57	10.49
Chandigarh	5.7	14.42	11.41
Uttarakhand	7.63	13.05	10.85
Haryana	7.3	13.29	10.93
Delhi	7.71	14.1	9.72
Rajasthan	9.2	14.75	7.59
Uttar Pradesh	9.64	14.11	7.77
Bihar	10.34	11.61	9.54
Sikkim	9.65	15.58	6.31
Arunachal Pradesh	5.99	16.57	8.99
Nagaland	4.15	13.49	13.88
Manipur	1.33	15.26	14.96
Mizoram	2.26	13.88	15.38
Tripura	6.65	12.17	12.69
Meghalaya	10.15	11.45	9.9
Assam	6.28	13.64	11.61
West Bengal	8.49	13.78	9.24
Jharkhand	8.67	11.18	11.64
Odisha	6.25	10.41	14.83
Chhattisgarh	10.16	14.66	6.71
Madhya Pradesh	8.57	14.27	8.7
Gujarat	6.68	13.74	11.1
Daman & Diu	4.86	11.62	15.02
D & N Haveli	10.46	11.11	9.93
Maharashtra	5.7	11.84	13.96
Andhra Pradesh	9.53	10.68	11.27
Karnataka	6.1	10.9	14.5
Goa	3.07	8.71	19.68
Lakshadweep	5.71	6.13	19.61
Kerala	1.49	7.47	22.49
Tamilnadu	4.67	12.34	14.49
Puducherry	6.19	10.28	15.02
A & N Islands	8.08	12.76	10.67
Telangana	5.13	9.37	16.98
<b>All India</b>	<b>7.44</b>	<b>12.95</b>	<b>11.12</b>

*Note: All figures are in %.*

*Source: NSSO 71<sup>st</sup> Round*

A study conducted by NIEPA suggests that annual dropout rate is higher for boys; this is also true for those belonging to schedule castes and schedule tribes at upper primary and secondary level the pattern reverses where we discern higher dropout rate among girls than boys. When we look at the caste communities of the children we investigate that dropout is higher among children belonging to schedule tribes (Table 3.7).

**Table 3.7: Average Annual Drop-Out Rate in School Education**

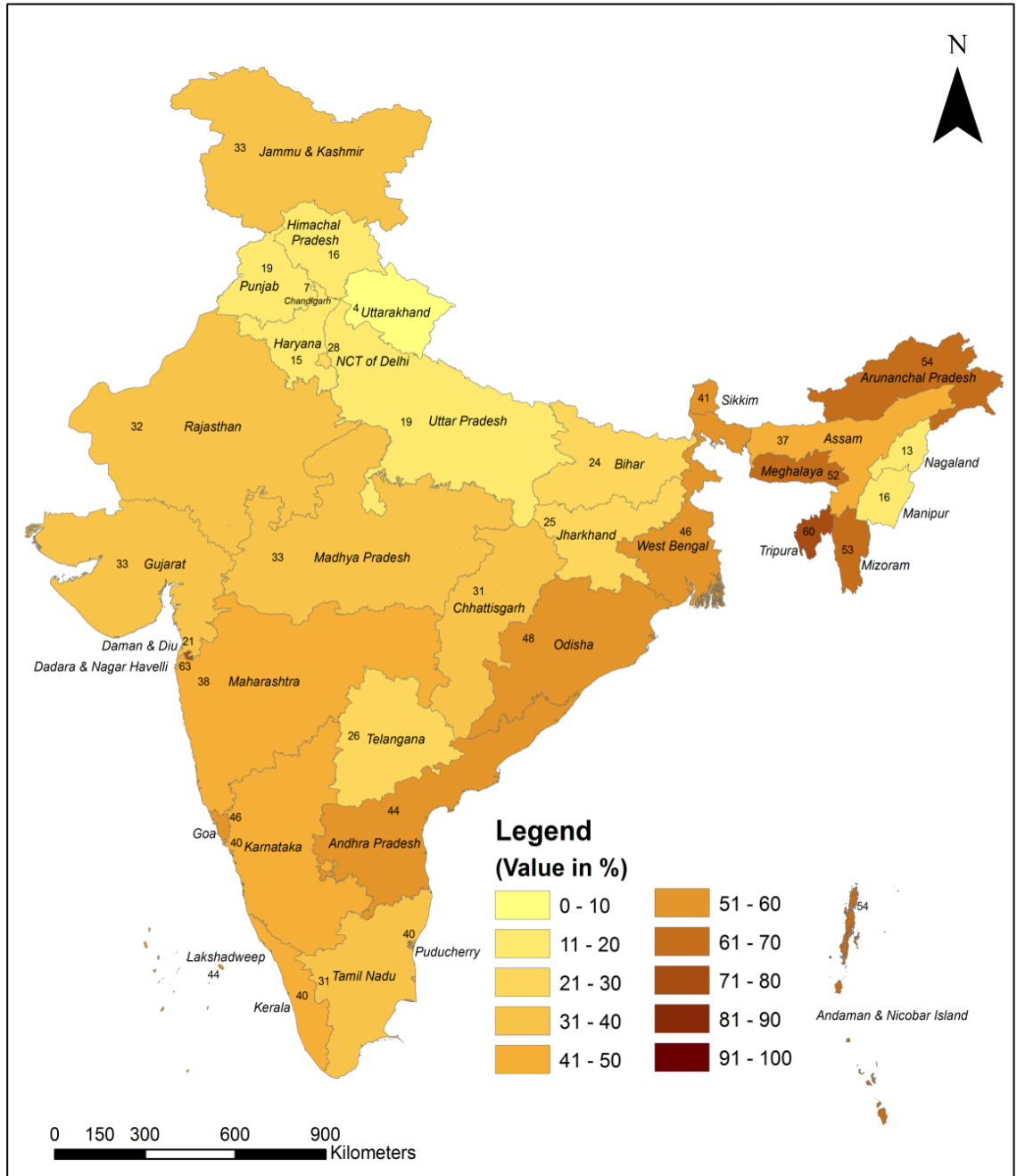
	Primary			Upper Primary			Secondary		
	Boys	Girls	Total	Boys	Girls	Total	Boys	Girls	Total
2011-12	5.89	5.34	5.62	2.13	3.2	2.65	NA	NA	NA
2012-13	4.68	4.66	4.67	2.3	4.01	3.13	14.5	14.5	14.54
2013-14	4.53	4.14	4.34	3.09	4.49	3.77	17.93	17.79	17.86
2014-15	4.36	3.88	4.13	3.49	4.6	4.03	17.2	16.9	17.06

*Note: All figures are in %.*

*Source: NIEPA, New Delhi*

Map 1 and Map 2 decipher the state-wise dropout rates within the groups of boys and girls. The highest dropout rates for both boys and girls can be found in North Eastern states such as Tripura, Arunachal Pradesh, Mizoram and Meghalaya. The lower dropout rate can be found in states like Uttarakhand, Nagaland and Haryana. To investigate the reasons for the dropout rates can be found in as higher drop rates in North-East India. To locate the possible reasons to investigate the dropout rates in Meghalaya Assembly, a state minister Deborah, C. Marak provides the reasons for the higher dropout rate in the state such as poor economic opportunities, poor infrastructure at government schools, unavailability of teachers and staff and distance of schools from the neighbourhood (Lyngdoh 2017). A study by Goswami (2017) indicate the fact that in Jharkhand state migration are sessional. Childrens migrated different states and districts with their parents for seven to eight month of the year .so they are not able to continue their studies.

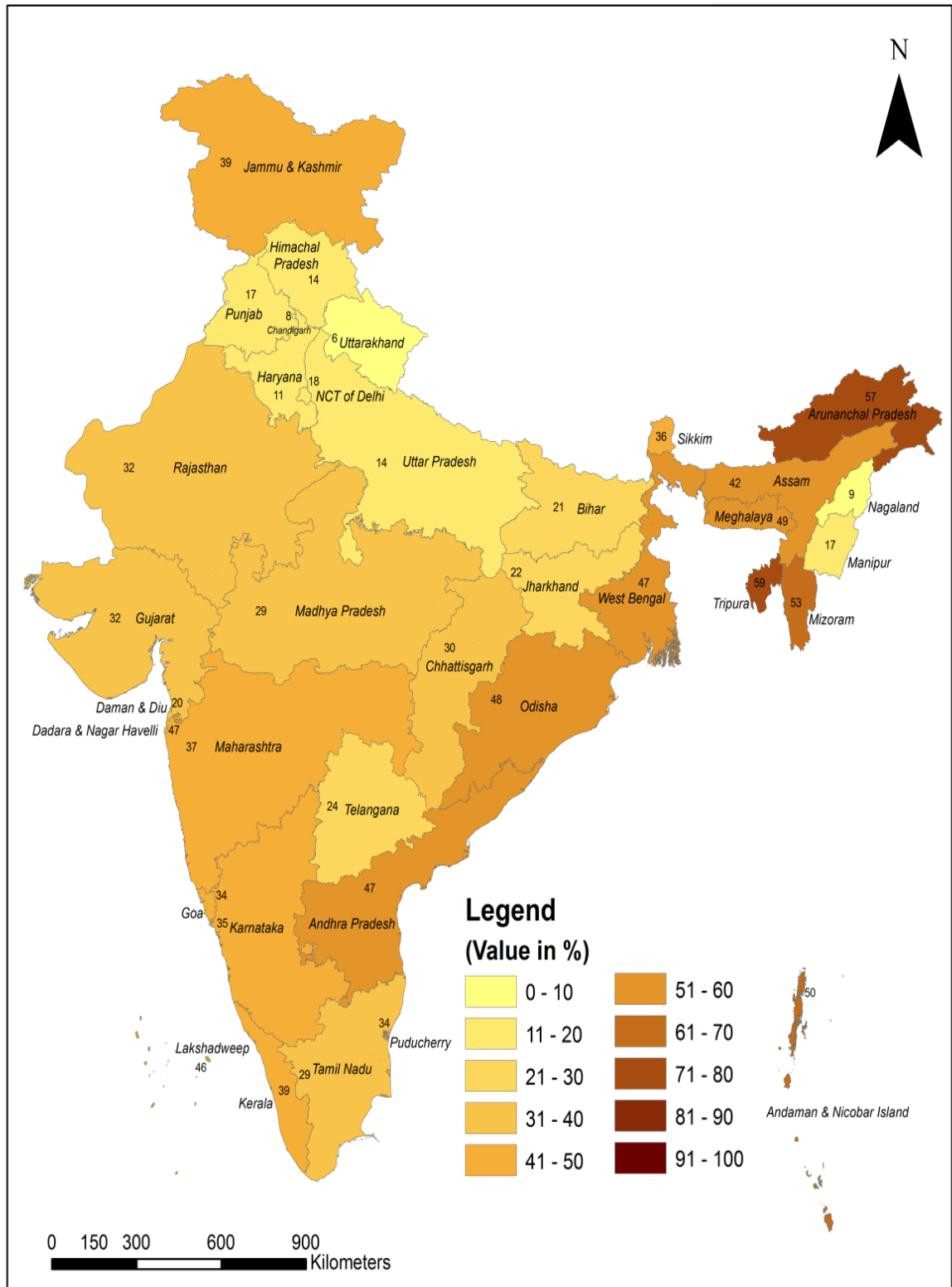
**Map 3.1: Dropout among Male Across States**



Note: All figures are in %.

Source: National Institute of Educational Planning & Administration, New Delhi

**Map 3.2: Dropout among Female across States**



*Note: All figures are in %.*

*Source: National Institute of Educational Planning & Administration, New Delhi*



There could be multiple reasons for dropping out from the schools. In one of the study carried out by NSSO, the people belonging to different age groups were asked about the reasons for dropping out or discontinuation of their studies. A majority of them reasoned out that they were not motivated to carry out the studies. One of the five students declined from his/her studies because they were not motivated to continue with the studies, at the same time 18 percent of students divulge that there was a financial constraint. Other reasons for dropping out were students' were deployed in domestic and economic activities (Table 3.8).

**Table 3.8: Reasons for Discontinuing/Dropping Out**

	Percent
Child not interested in studies	20.48
Financial constraints	18.47
Engaged in domestic activities	15.95
Engaged in economic activities	15.7
Completed desired level/class	6.19
Marriage	5.57
Unable to cope up with studies/ failed	4.18
School is far off	1.78
Preparation for competitive exam	1.56
Others	10.11

*Note: All figures are in %.*

*Source: NSSO 71<sup>st</sup> Round*

There are diverse reasons for boys and girls for dropping about. For instance, the predominant reason for boys to dropout is their deployment in economic activities. They are to provide for their families and assist them in earning the livelihood. In comparison to boys, the girls have to carry out the domestic responsibilities. Especially in the case of rural settlements, the older family members get engaged in labour work in fields and the young girls of the families replace the mother for the domestic chores. Apart from the abovementioned reasons, the girls are married at young age that could be the vital reasons for their discontinuation of the studies. As per the statistical analysis close to 14 percent of

the girls have acknowledged their married status marred the possibility of continuing their education. Accessibility or distance is another important determinant for high dropouts; 0.5 percent of boys and 3.4 percent of girls stated distance as the reason for dropout (Table 3.9).

**Table 3.9: Reasons for Discontinuing/Dropping Out by Gender**

	Male	Female
Child not interested in studies	23.8	15.6
Financial Constraints	23.7	15.2
Engage in Domestic Activities	4.8	29.7
Engage in Economic Activities	31	4.9
School is far off	0.5	3.4
Unable to cop-up with studies	5.4	4.6
Completed desired level/ Class	5.7	6.5
Marriage	--	13.9
Other reasons*	5.1,	6.2

*Note: All figures are in %.*

*Source: NSSO 71<sup>st</sup> Round*

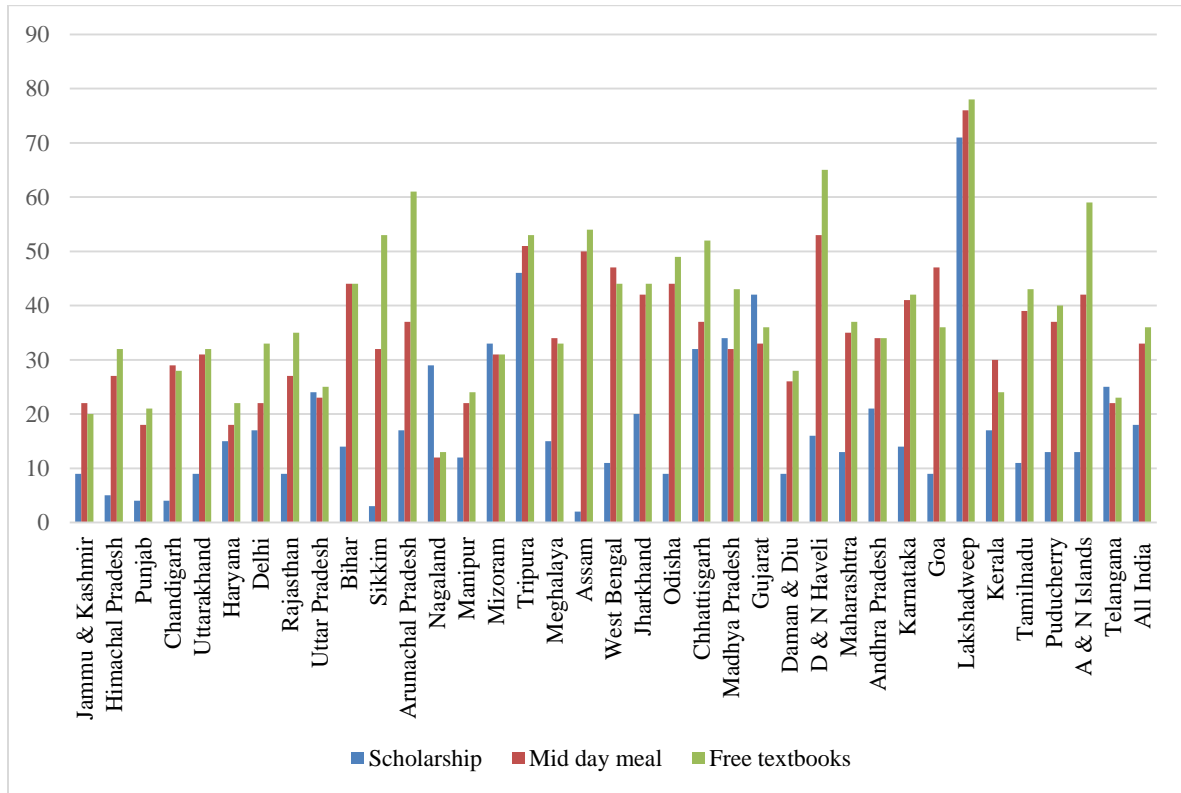
Drop out cases are not always the consequence of poverty compulsions; Existing literature proves another reason to be inability to grasp and inefficiency in learning. Drop out is also a consequence of social compulsions such as casteism, abandonment, humiliation, sexual violence faced by girls in school by either their teacher or fellow students, poverty traditional household chores, child labour, less emphasis on education, and early marriage. Thus, the societal pressures are one of the important reasons for arresting the attendance of the poor and girl students in schools and colleges.

The transition rate is also reported to be low for students from rural areas and hailing from SC, ST and other backward classes and girls (Deshpande 2006; Ghosh 2013). For the latter, attaining maturity is a major cause of dropping out and not progressing to the higher class, especially if the village or town has no higher secondary or even secondary school.

For ensuring retention, the government has introduced several schemes to provide incentives to students like mid-day meals, dry rations (rice or wheat), free textbooks, uniforms, scholarship etc. Several studies have showed the positive relationship between the benefits of the schemes and retentions of poor students. The beneficiaries of these schemes vary from state to state. In some states people are the beneficiaries of such schemes and in other, benefits are non-existent. Using data from the NSSO – we compare states to account for implementation of the abovementioned schemes. Data indicate that overall, 18 percent of the students are getting the benefits of the scholarship schemes, 33 percent are availing the benefit of mid-day meal and 36 percent are getting free textbooks in schools.

The states which efficiently provide the benefits such as scholarships are Lakshadweep (71%), followed by Tripura (46%), Gujarat (42%), Madhya Pradesh (34%), Mizoram (33%) and Chhattisgarh (32%). Mid-day meal is efficiently implemented in states like Lakshadweep (76%), followed by Tripura (51%), Assam (50%), West Bengal (47%), Goa (47%), Bihar (44%), Odisha (44%) and Jharkhand (42%); Better performing states perform better in every aspect like distribution of free textbooks. On comparison of efficient delivery of the schemes with other states, performance of Rajasthan accounts to be below average. 9 percent of students got scholarships, 27 percent had the opportunity of a mid-day meal at school and 35 percent got text-books (Figure 3.6).

**Figure 3.6: Beneficiaries of the Various Schemes**



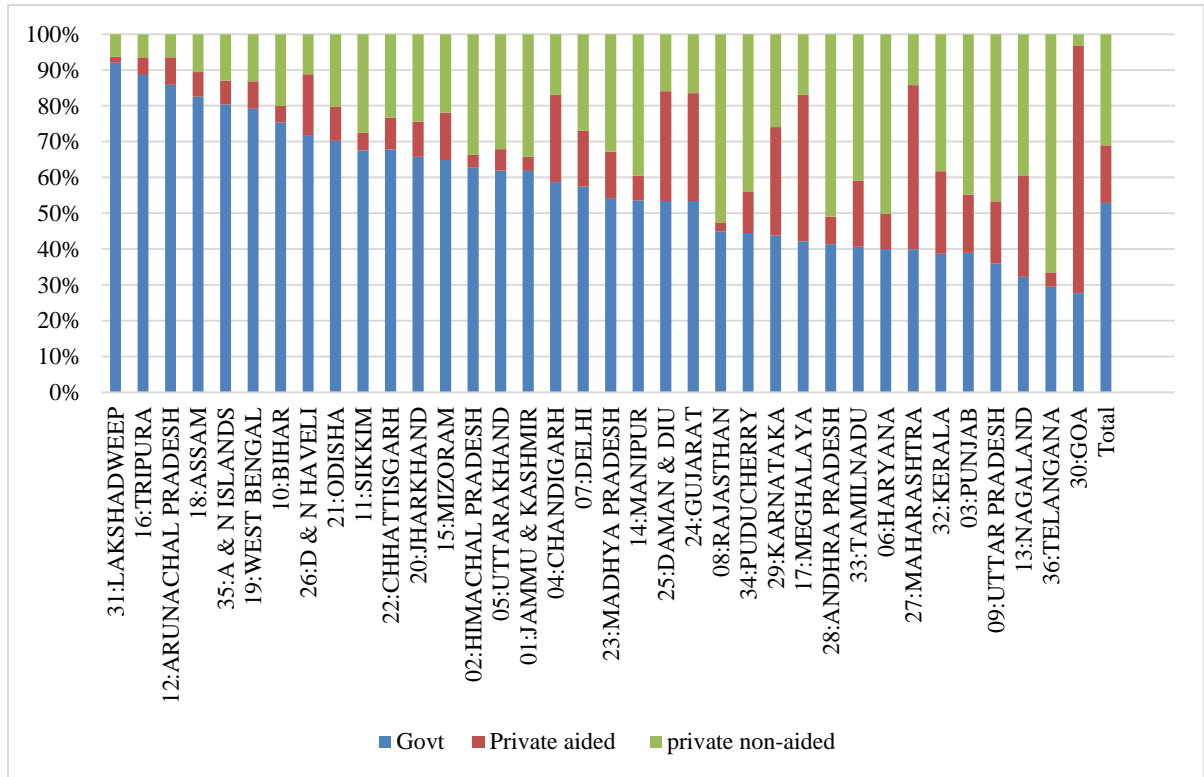
Note: All figures are in %.  
Source: NSSO 71<sup>st</sup> Round

### 3.5: Type of Educational Institutions – Government and Private Schools

Getting education is a fundamental right of a child. Therefore, it becomes state’s responsibility to provide education to every child and ensure easy access to schools, where children can get quality education at affordable price. In India, getting a good education is considered as an asset. Households belonging to an upper economic class prefer private schools with better quality; on the contrary, the poor either do not send their children to school or send them to a government school. We use NSSO data to study the pattern of institution preference by parents. It was observed that a little more than half (53%) of the sampled respondents preferred government schools, 33 percent preferred private non-aided schools and 16 percent preferred private aided schools. This pattern, however, is not uniform across states for e.g.in Goa, seven of ten students approach to private aided schools; similarly, proportionally higher number of people approach private

aided schools as compared to government schools. On the contrary, in Telangana (66%), Rajasthan (52%), Andhra Pradesh (51%) and Haryana (50%) private non-aided schools are preferred over other kind of educational institutions (Figure 3.7).

**Figure 3.7: Type of Education Institutional People Approach for Schooling**

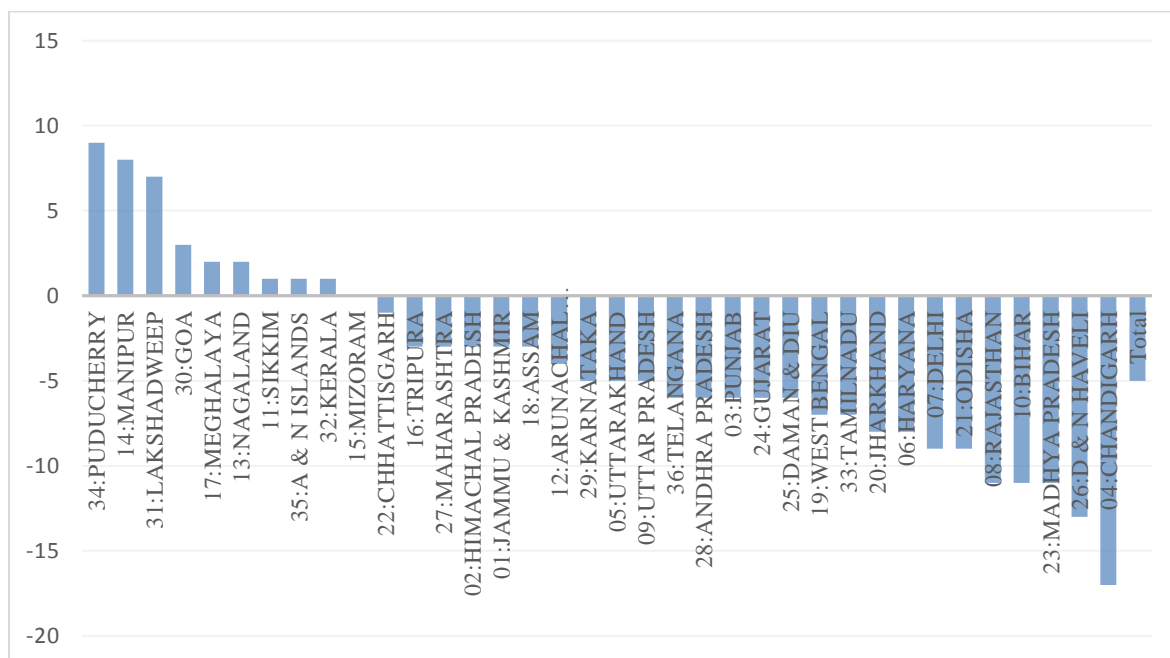


Note: All figures are in %.  
Source: NSSO 71<sup>st</sup> Round

There is a sharp gender divide in sending children to a particular kind of educational institutions. In traditional Indian society, boys are put at a higher pedestal. Data indicate that girls are more likely to be sent to a government schools; on the other hand, boys are sent to private schools to access better quality education. It is believed that private schools ensure quality education, of course by charging high fees. Since Investing in girls’ education does not yield high returns, parents avoid spending on girls’ education. In Madhya Pradesh, Bihar and Rajasthan, this gender divide is quite evident.

Occupation status of the household also influences the decision between government and private institution. Households belonging to lower occupational groups such as casual labour, agricultural labour are more likely to send their children to government schools; whereas self-employed households in non-agriculture sector, regular wage workers prefer private schools for their children (see Table A1.2 in Appendix 1).

**Figure 3.8: Gender Gap in Enrolment in Government School**

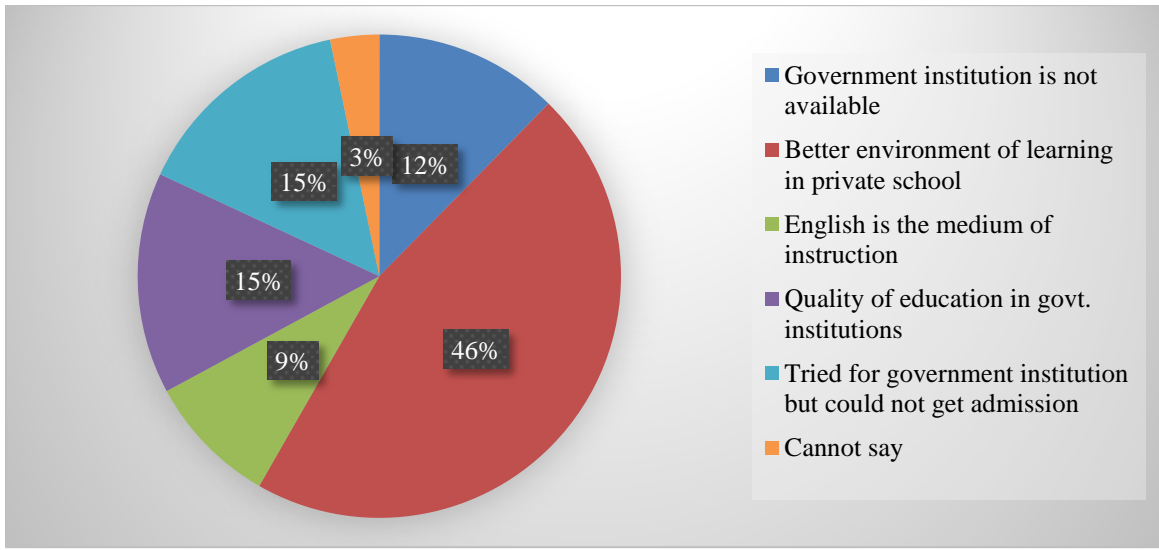


*Note: All figures are in %.*

*Source: NSSO 71<sup>st</sup> Round*

There are various reasons for preferring private schools and the biggest reason for this is the better environment of learning and poor quality of education at government schools. However, 15 percent of those who approached a private school also stated that they opted for a private school because they tried to get admission in government school but could not get it, whereas some cited the reason to be unavailability of government school in their locality. Evidently, the preference for private schools continues to rise in every state (Figure 3.9).

**Figure 3.9: Reasons for Approaching Private School**



*Note: All figures are in %.*  
*Source: NSSO 71<sup>st</sup> Round*

### **3.6: Availability and Spatial Location of School**

During last decade, the state governments have made significant initiatives in constructing schools. There is a significant improvement in the accessibility and availability of schools. The locations where schools did not exist new schools have been constructed, especially in the locations where Dalit and Adivasis reside. Historically, these groups were denied access to an educational institution but with these new initiatives taken by the government these groups can now access and avail the benefits. Distance was also cited as a reason for students dropping out in between. Due to security concerns, parents avoid sending their girl child to far off schools. States have managed to improve by introducing policies such as free cycles to girl students. Despite states initiatives, safety concerns gain priority and contribute to high dropout rates. The NSSO data from 71<sup>st</sup> Round on distance of schools indicated that in many states schools are not geographically proximate. In some of the hilly states like North eastern states, Himachal Pradesh and Uttarakhand primary, upper primary and secondary schools are at a distance (See Tables 3.10, 3.11 & 3.12).

**Table 3.10: State-wise Distance of Primary School**

	<b>d&lt;1km</b>	<b>1km≤d&lt;2km</b>	<b>2km≤d&lt;5km</b>	<b>d≥5km</b>
Jammu & Kashmir	94	4	1	0
Himachal Pradesh	74	23	3	1
Punjab	94	6	0	0
Chandigarh	97	3	0	0
Uttarakhand	86	10	5	0
Haryana	94	5	2	0
Delhi	99	1	0	0
Rajasthan	93	6	1	0
Uttar Pradesh	95	4	0	0
Bihar	96	3	0	0
Sikkim	93	3	4	0
Arunachal Pradesh	85	10	3	1
Nagaland	97	3	0	0
Manipur	92	7	1	0
Mizoram	95	4	0	1
Tripura	85	15	1	0
Meghalaya	93	6	1	0
Assam	85	13	1	0
West Bengal	92	7	1	0
Jharkhand	95	4	1	0
Odisha	94	5	0	0
Chhattisgarh	96	4	0	0
Madhya Pradesh	97	3	0	0
Gujarat	94	6	0	0
Daman & Diu	80	20	0	0
D & N Haveli	66	21	13	0
Maharashtra	93	6	1	0
Andhra Pradesh	97	3	0	0
Karnataka	97	2	1	0
Goa	85	5	6	5
Lakshadweep	90	10	0	0
Kerala	68	26	5	0
Tamil Nadu	94	4	1	0
Puducherry	99	1	0	0
A & N Islands	48	32	13	6
Telangana	93	6	1	0
All India	93	6	1	0

*Note: All figures are in %.*

*Source: NSSO 71<sup>st</sup> Round*



**Table 3.11: State-wise Distance of Upper Primary School**

	<b>d&lt;1km</b>	<b>1km≤d&lt;2km</b>	<b>2km≤d&lt;5km</b>	<b>d≥5km</b>
Jammu & Kashmir	85	8	5	2
Himachal Pradesh	46	32	20	3
Punjab	80	17	4	0
Chandigarh	90	6	4	0
Uttarakhand	59	25	14	1
Haryana	85	7	7	1
Delhi	94	5	1	0
Rajasthan	83	11	5	1
Uttar Pradesh	81	13	6	0
Bihar	75	18	6	1
Sikkim	78	11	10	1
Arunachal Pradesh	62	19	6	13
Nagaland	89	7	1	3
Manipur	77	16	6	2
Mizoram	94	5	0	1
Tripura	72	23	5	0
Meghalaya	72	16	12	0
Assam	52	30	16	2
West Bengal	51	33	15	2
Jharkhand	61	22	14	2
Odisha	75	17	7	2
Chhattisgarh	74	13	10	3
Madhya Pradesh	80	13	7	1
Gujarat	81	12	6	1
Daman & Diu	76	24	0	0
D & N Haveli	38	45	17	0
Maharashtra	74	13	10	3
Andhra Pradesh	77	11	8	4
Karnataka	84	11	4	1
Goa	53	17	25	5
Lakshadweep	67	29	3	0
Kerala	47	31	21	1
Tamilnadu	74	15	9	3
Puducherry	82	12	6	0
A & N Islands	35	33	22	9
Telangana	80	9	8	3
All India	74	16	8	2

*Note: All figures are in %.*

*Source: NSSO 71<sup>st</sup> Round*

**Table 3.12: State-wise Distance of Secondary School**

	<b>d&lt;1km</b>	<b>1km≤d&lt;2km</b>	<b>2km≤d&lt;5km</b>	<b>d≥5km</b>
Jammu & Kashmir	56	21	13	10
Himachal Pradesh	32	30	27	10
Punjab	60	24	16	0
Chandigarh	78	13	9	0
Uttarakhand	39	31	21	9
Haryana	74	12	10	4
Delhi	91	6	3	0
Rajasthan	65	16	13	5
Uttar Pradesh	50	24	20	7
Bihar	38	29	24	9
Sikkim	55	25	15	5
Arunachal Pradesh	28	22	17	34
Nagaland	46	30	11	13
Manipur	56	15	16	13
Mizoram	69	16	5	10
Tripura	54	27	17	2
Meghalaya	40	18	27	16
Assam	24	35	32	9
West Bengal	42	33	21	4
Jharkhand	32	25	29	13
Odisha	35	28	27	10
Chhattisgarh	56	16	23	6
Madhya Pradesh	53	14	19	14
Gujarat	55	17	18	10
Daman & Diu	63	27	10	0
D & N Haveli	21	44	17	19
Maharashtra	56	19	16	9
Andhra Pradesh	67	13	12	8
Karnataka	60	19	15	6
Goa	35	21	35	9
Lakshadweep	60	18	16	7
Kerala	31	31	34	4
Tamilnadu	55	21	16	8
Puducherry	57	27	10	6
A & N Islands	30	21	32	16
Telangana	72	11	12	6
All India	51	22	19	8

*Note: All figures are in %.*

*Source: NSSO 71<sup>st</sup> Round*

## **CHAPTER 4**

# **FIELD FINDINGS ON ACCESSIBILITY AND QUALITY OF SCHOOL EDUCATION**

## **4.1: Background**

India has seen a remarkable growth in the education system; nevertheless there exists several issues which compel one to investigate the success story. School system in India is divided into four categories - primary (I-V), upper primary (VI-VII), Secondary (IX-X) and Higher Secondary (IX-XII) and with the 86<sup>th</sup> amendment in the Indian Constitution, the access to the basic education was made easy and affordable. Before this amendment, the Government of India launched its one of the important programmes, *Sarva Shiksha Abhiyan* (SSA), the objective of which was to provide five years of primary schooling for all children by 2007; and after the 86<sup>th</sup> Amendment (Right to Education Act), the Government of India moved a step further and extended the years of education to eight years. Article 21A of the Indian constitution provides children a fundamental right to get free education up to upper primary level. Nonetheless, this policy change has made a tremendous progress in expanding education system; but this provision is not sufficient in itself. Despite of the growth and progress, there are many issues left unaddressed. Amongst these issues, the accessibility is the main concern especially in rural India. The marginalized and women are the most vulnerable groups. In rural schools, the dropout rates are worrisome. Not many children go beyond 8<sup>th</sup> class and these figures are even lower in Rajasthan which performs abysmally poor on the scale of literacy. As per a study conducted by NCERT to assess the dropout rates at elementary level in 21 States, Rajasthan has highest dropout rates with 14.2 percent at primary level followed by Jharkhand (11.3%) and Andhra Pradesh (10.2%). Rest of the states have single digit dropout rate. Even at upper primary level, Rajasthan stands first with 11.1 percent school dropout rate which is much higher than all India average of a 5.2. this chapter primarily focuses on the access to an education system in the state of Rajasthan.

## **4.2: Proximity to School**

In order to achieve the objective of universal elementary education, the aim of the Government of India, was to ensure availability of schooling facilities within a few kilometers. So that children can access the schools without spending time traveling. There is a close relationship between distance and educational attainment. A study

conducted by a Germany based research organization that long distance to the schools has poor impact on children's educational attainment as due to long travel time there is a poor impact on their health too. A study conducted by UNESCO also indicted that distance of the schools led to the short attendance in schools and also it becomes the reason for dropout. Transport facilities can resolve the issue, however with several limitations. For instance, the cost of traveling would add to the financial burden on the family. In another scenario, it is also possible that parents prefer to spend the money on boys rather than girls. It is assumed that distance of the school would add extra monetary burden to the family's budget because sending the daughters to the distanced locations to attend schools is not safe. The girls are more prone to get exposed to violence against them (Sutton 1998; Lloyd et.al 2005). Another study reveals that for Afghanistan geographic proximity plays an important role in improving primary school enrollment and balancing the gender gap (Burde and Linden 2009). If primary education is easily accessible it leads to increase in enrolments at the secondary level too.

The MHRD's 8<sup>th</sup> All India Education Survey (AIES), the most recent available data, which was collected in 2009, shows the distance of the schools from the inhabitant. As Table 4.1 depicts that in Rajasthan there were total 85391 inhabitants and 66 percent of these inhabitants had primary schools within a reasonable distance whereas only 39 percent inhabitants had upper primary schools at a close distance. When we look at the availability of primary school, almost 90 percent of primary schools are available within one kilometer of inhabitants, whereas 85 percent of the upper primary schools are available within one kilometer of the inhabitants. Figures for the sampled districts of present study— Kota (district with highest literacy rate) and Jalore (district with least literacy rate) are discussed in the following. In Jalore almost all primary schools were available within few kms whereas in Kota 92 percent of inhabitants had availability of primary schools. The survey conducted by the author of this study conforms to the existing patterns. Table 4.2 below clearly indicates that primary and upper primary schools are closely located in Jalore district than Kota. Even secondary and higher secondary schools are geographically close in Jalore than Kota. In Jalore 46 percent of the sampled villages have secondary schools within one kilometer whereas in Kota only

26 percent of the sampled villages have secondary schools within one kilometer. Similar trend is observed in the distance of higher secondary schools in respective districts.

**Table 4.1: Availability of Schooling Facilities at Primary Stage in Rural Habitations in Rajasthan**

	Primary			Upper Primary		
	All (%)	Kota (%)	Jalore (%)	All (%)	Kota (%)	Jalore (%)
School within inhabitant	56605 (66.3)	816 (92.4)	745 (99.9)	32903 (38.5)	489 (55.4)	695 (93.2)
Within 1 Km	19573 (22.9)	39 (4.4)	1 (0.1)	40027 (46.9)	287 (32.5)	5 (0.7)
Beyond 1 KM	9213 (10.8)	28 (3.2)	0 (0.0)	12466 (14.6)	107 (12.1)	46 (6.2)
Total number of Inhabitants	85391 (100.0)	883 (100.0)	746 (100.0)	85391 (100.0)	883 (100.0)	746 (100.0)

*Note: All figures are in %.*

*Source: 8<sup>th</sup> All India Education Survey NCERT 2009*

**Table 4.2: Distance of Schools from Inhabitant as per Survey Data**

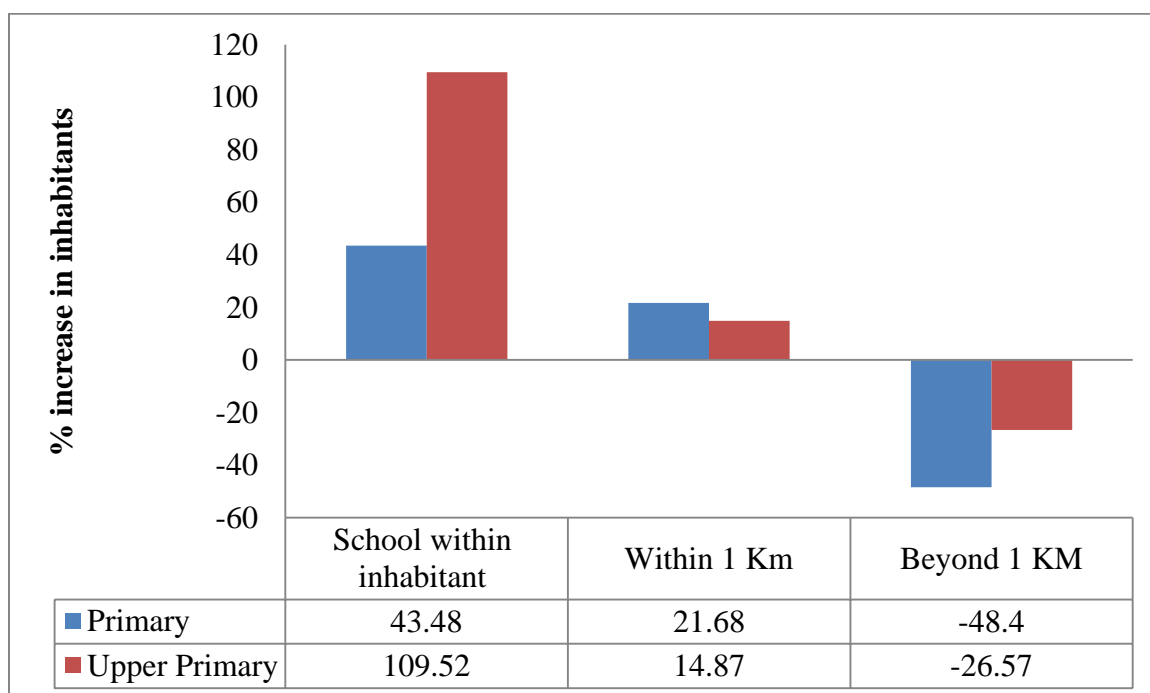
	Kota				Jalore			
	Primary school	Middle school	High school	Sr. Sec school	Primary school	Middle school	High school	Sr. Sec school
Below 1KM	90	77	16	0	92	88	46	28
Between 1 – 2 KM	10	10	10	0	7	8	4	6
Between 2 – 3 KM	0	13	26	13	0	2	34	13
Between 3 - 5 KM		0	10	10		1	2	8
Above 5 KM	0	0	38	77	0	1	13	43

*Note: All figures are in %. In Jalore around 2% of the respondents do not know the distance of Sr. Secondary schools.*

*Source: Data collected by Author.*

The increased penetration of schools within few kms is confirmed through the available data. As compared to 2002, in 2009 we see an increase of 43.5 percentage points in primary schools whereas for upper primary schools the increase was remarkable to the extent of 109.5 percentage points. These findings clearly show that education till upper primary level is now more approachable than past as more schools are geographically accessible (Figure 4.1).

**Figure 4.1: Percentage Increase in Number of Habitations having Primary/Upper Primary Stage Schooling Facility from 7th AISES (2002)**



*Note: All figures are in %. Total No. of Inhabitants 85391*

*Source: 8<sup>th</sup> All India Education Survey NCERT 2009*

This gap led to entry of private sector into higher schooling system. In rural Rajasthan, the private schools are penetrating. They are trying to fill the gap to provide education where government institutions are lagging behind. Nonetheless, the private non-aided schools are more in urban area, but in rural areas also these private non-aided schools are increasingly penetrating to provide education after upper primary level. In rural areas, local bodies are active in providing primary schools and manage them.

DISE data 2015-16 shows an interesting trend. In Jalore, at the primary and upper primary level, private schools are larger in number as compared to Kota whereas in Kota, Private schools with secondary education are greater in number (Table 4.3).

**Table 4.3: Type of Management of Schools in Rajasthan**

	Governemnt School				Private School			
	Jalore	%	Kota	%	Jalore	%	Kota	%
Primary Only	1068	53.3	430	36.8	128	15.46	104	9.31
Primary with Upper Primary	582	29.0	446	38.2	502	60.63	482	43.15
Primary with upper Primary Sec/H.Sec	266	13.3	187	16.0	74	8.94	274	24.53
Upper Primary Only	6	0.3	0	0.0	0	0.00	2	0.18
Upper Primary with Sec./H.Sec	8	0.4	18	1.5	9	1.09	7	0.63
Primary with upper Primary Sec	73	3.6	82	7.0	110	13.29	243	21.75
Upper Primary with Sec.	1	0.0	4	0.3	5	0.60	5	0.45
<b>Total</b>	<b>2004</b>	<b>100</b>	<b>1167</b>	<b>100</b>	<b>828</b>	<b>100</b>	<b>1117</b>	<b>100</b>

*Note: All figures are in %.*

*Source: DISE 2015-16*

### **4.3: Reasons for opting Educational Institution: Government vs. Private**

Generally, the access and quality are the primary concern of an educationalist. The education policies and reform in existing scenario emphasises the role that government plays to improve education system. However, issues like poor infrastructure and scarcity of teachers in government schools, lead parents to opt for private schools despite being costly. A study conducted by Rajasthan government in few districts of Rajasthan reveals that many schools do not even have basic infrastructure. For instance, 50 percent of schools do not even have a boundary wall and separate toilets for girls, 60 percent do not have electricity. It also shows that 18 percent of teachers' posts are vacant. . The flagship programme of the government to enhance quality and access to education has failed due



to reasons such as funds. Under *Sarva Siksha Abhiyan* (SSA, thereafter) scheme, funds are not utilized properly and schools are in a horrible condition (Planning Commission of India 2010).

It is important to note here that lack of girl's toilet was the one of the reasons parents are not willing to send their girl child to school, especially after primary level. During one of the interviews (conducted by the author), a woman said that girls get their menstruation cycle start at the age of 10 or 11 and in schools there are no toilets for girls and no lady teacher to guide them. This led to embarrassment amongst girls.<sup>1</sup> During the fieldwork, it was noticed that in most of the schools, girls' toilets were constructed but there was no maintenance and cleanliness. Even, the present NDA government has noticed the linkage between the girls' dropout and lack of girls' toilets and hence, targeted to construct toilets for girls under *Swacchh Bharat Mission*.

**Table 4.4: Available Facilities at School**

	Playground		Girls' toilet		Drinking water		Electricity	
	Jalore	Kota	Jalore	Kota	Jalore	Kota	Jalore	Kota
Primary Only	34.1	40	99.8	100	96.2	99.2	13.7	33.7
Primary with Upper Primary	58.2	55.9	99.5	99.8	99.4	99.4	70.7	75.4
Primary with upper Primary Sec/H.Sec	68.2	68.1	99.7	100	100	99.3	96.8	97
Upper Primary Only	66.7	100	100	100	100	100	100	100
Upper Primary with Sec./H.Sec	76.5	72	100	100	100	100	100	100
Primary with upper Primary Sec	68.9	63.9	100	100	100	100	92.3	96
Upper Primary with Sec.	66.7	44.4	100	100	100	100	100	100
<b>Total</b>	<b>50</b>	<b>55.3</b>	<b>99.9</b>	<b>100</b>	<b>98.4</b>	<b>99.5</b>	<b>51.3</b>	<b>71.5</b>

*Note: All figures are in %.*

*Source: DISE 2015-2016.*

<sup>1</sup> Interview conducted by Author during fieldwork.

The recent data collected by DISE 2015-16 tells the success story of the government (Table 4.4). The data indicates that almost in all level of schools, the girls' toilets are available. But a year before, an ASER Report indicated that 45 percent of the Indian schools do not have access to a toilet or there are toilets in unusable condition which implies students, must urinate or defecate in the open inside or outside the school (ASER 2014). Physical infrastructure is not enough rather its proper functioning is an absolute necessity. The government should focus on proper functioning and execution of the scheme for effective implementation. The poor infrastructure was not only limited to toilets but also to basic necessity like playgrounds.

In the present study we found the similar trend. Most of the schools had drinking water facility and toilet facility but when it comes to a separate toilet for girls, it is non-existent at some schools. In providing such facilities Kota performs better than Jalore. On the one hand, Kota had drinking water and toilet in almost all surveyed villages; however in two villages of Jalore district, there was zero provision of drinking water and toilet for girls in schools (Table 4.5).

The Rajasthan government decided to close down more than 17,000 schools because of low attendance by students and poor facilities at public schools (Sharma and Dhankar 2014). This reason gave space for the private sector to step in the education system. Private schools are growing at a phenomenal rate at the cost of deteriorating public education system.

**Table 4.5: Available Facilities at Schools in Jalore and Kota**

	Drinking Water	Facility of Toilets	Separate Toilet For Girls
All	90	95	84
Kota	98	97	88
Jalore	81	93	80

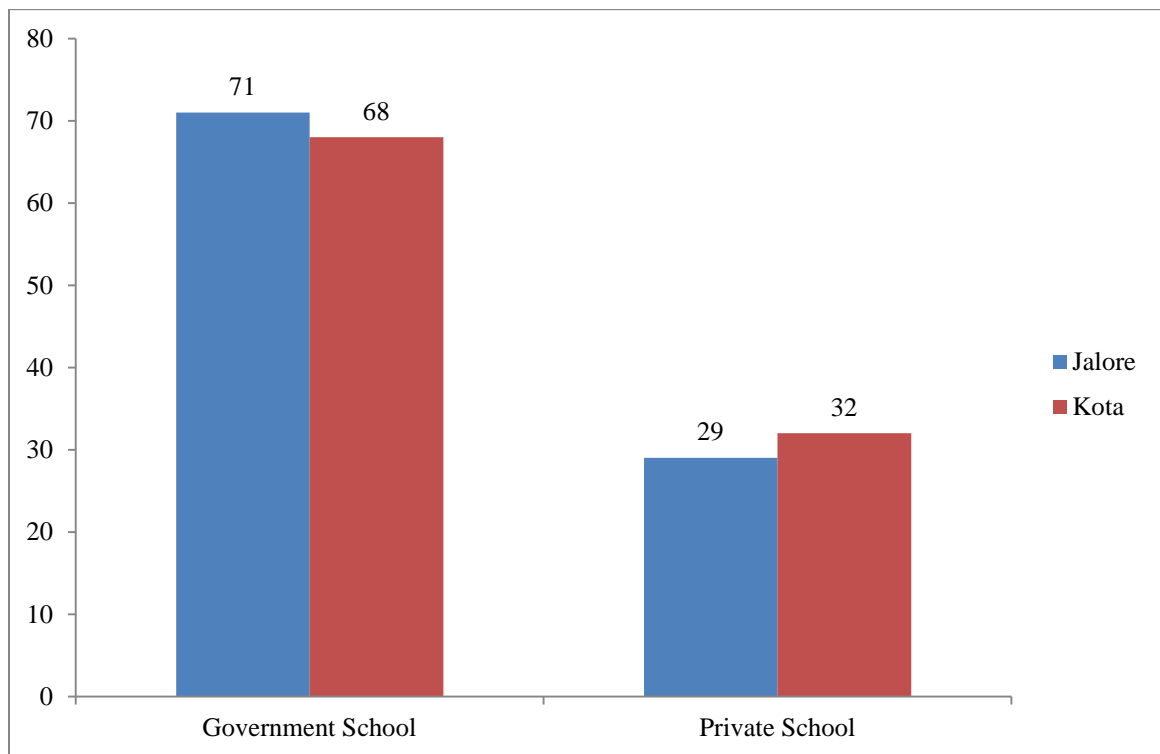
*Note: All figures are in %.*

*Source: Data collected by Author*

The present study shows that approximately 30 percent of the parents send their children to private schools and spend more on their education. Proportionally, in Kota district,

parents are more likely to send their wards to private schools than Jalore district. Nonetheless, 7 out of 10 parents send their children to government schools. To differentiate why parents chose private schools over government schools, reasons were asked for approaching both kinds of schools (Figure 4.2).

**Figure 4.2: Type of Schools Parents Approach**



*Note: All figures are in %.*

*Source: Data collected by Author*

A report prepared by *Pratham* showed that there is rising rate of enrolment in private schools. As per the report every two out of five children got enroll in private schools in Rajasthan. In 2006 there were 25.2 percent of the children between the age group of 6-14 years got enroll in private schools in Rajasthan and number increased to 40 percent in 2013 when the study was conducted. Private schools are catering good proportion of children in Rajasthan and matching the strength of government schools in terms of enrolment (Khan 2014). The increasing numbers of private schools is an alarming situation; as they are mushrooming every year. The main reason for this increase is the bad reputation and poor quality of education provided at the in government schools

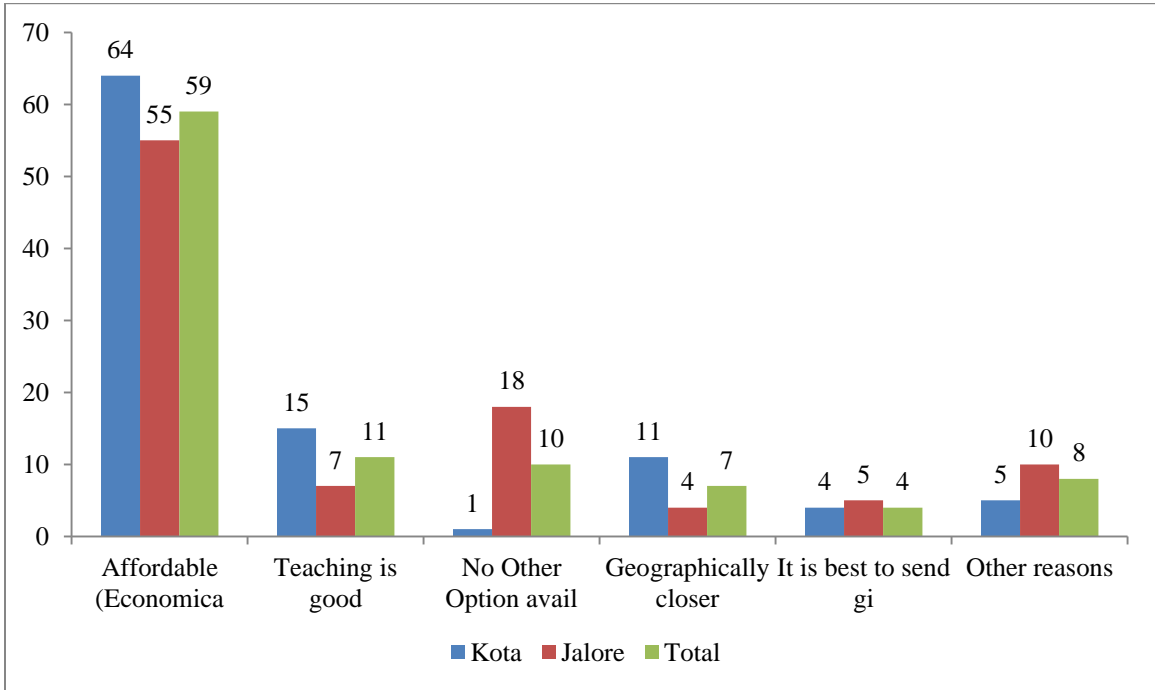
(ibid). It could also be an effect of rising incomes of the households that raises the demand for private schooling. It was observed that, although teachers in government schools are well-qualified and receive good salaries as compared to private schools, absenteeism is rampant (Desai et al., 2009; Kingdon, 2007; Muralidharan and Kremer, 2008). The reason for the above is well noted by Dreze and Saran in their study (1993). They state that teachers at government schools have permanent appointments and thus lack incentive to work as their salaries are independent of their performance.

Tooley and Dixon (2003) argue that this growth in private sector is mainly due to 'low-fee' private school where fees are much less than the elite private schools. Low fees is primarily due to less salaries to teachers. So, for parents who can afford, cost of schooling is not an issue. These schools have actually overshadowed the public schools in small towns and big cities.

To some extent, the most popular and recent legislation on education by Indian Government, the RTE also has an impact on the increasing enrollment in private schools. The act made it mandatory for every private school to reserve 25 percent seats for children belonging to economically weaker sections of the society. The burden of the seats would be borne by the government.

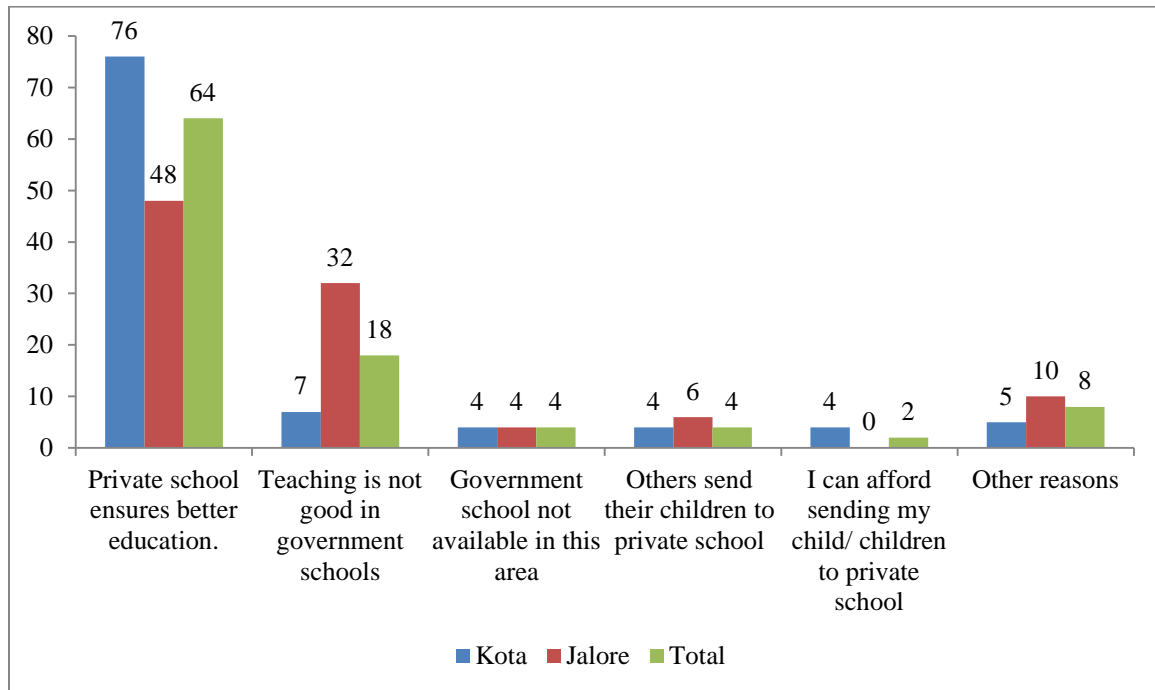
Affordability is the most pertinent reason for preferring government schools. 6 out of 10 households prefer government schools as they are economically cheaper, whereas parents prioritizing quality send their children to private schools. Sixty four percent of the surveyed households have prioritized quality over cost (Figure 4.4). Kingdon's study (2007) also indicates that total enrollment in private schools, in both rural and urban India has increased, and child studying in private school performs better academically (Muralidharan and Kremer, 2008).

**Figure 4.3: Reason for Approaching Government Schools**



*Note: All figures are in %.*  
*Source: Data collected by Author*

**Figure 4.4: Reason for Approaching Private Schools**

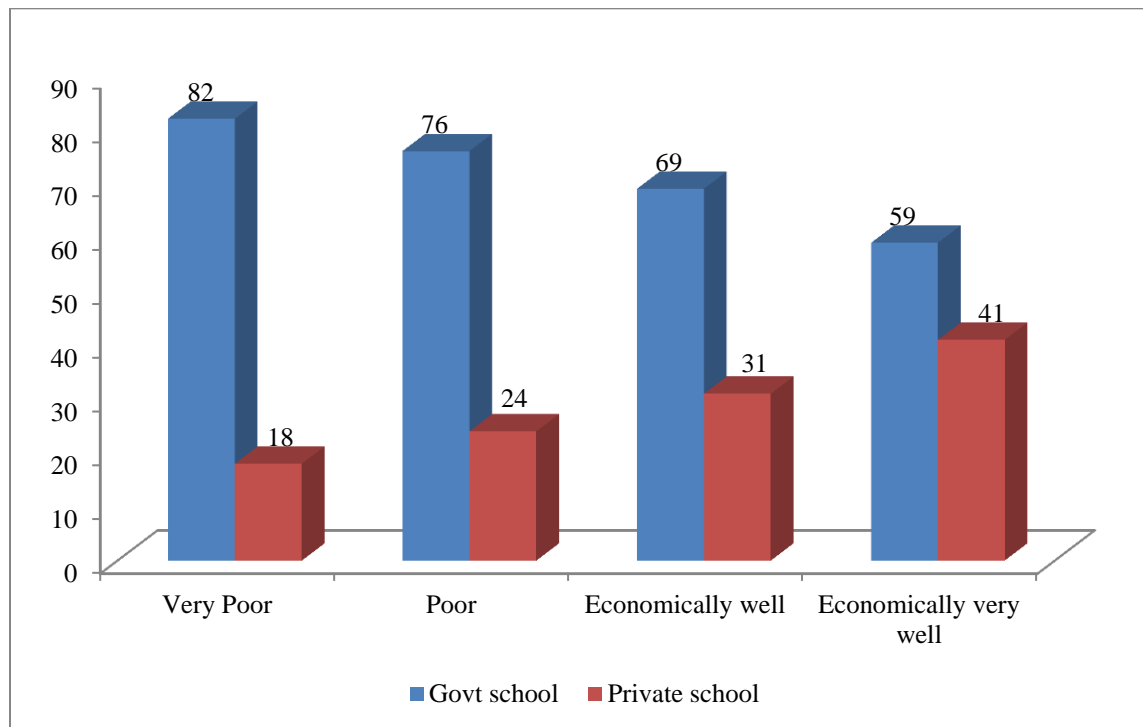


*Note: All figures are in %.*  
*Source: Data collected by Author*

Our finding reveals economic vulnerability as one of the prime concerns for the choice between government and private. Figure 4.5 shows a clear relationship between economic condition and preference for a particular kind of educational institute. . As the household moves up the income ladder, the likeliness to send their children to private schools increases.

Along with class, caste of the household is also an important determinant for the choice. . For the marginalized communities, such as scheduled castes and scheduled tribes, affordability was the prime reason for sending their children to a government school whereas for OBCs and upper castes, there are other factors that affect the preference between government and private schools.

**Figure 4.5: Preference for Schools by Economic Class<sup>2</sup>**



*Note: All figures are in %.*

*Source: Data collected by Author*

<sup>2</sup> Economic class is calculated after clubbing household income and type of house family is residing.

Interestingly, in upper caste, the probability of sending their girl child to a government school was higher. Almost 20 percent of the upper caste household asserted the reason for preferring private school as better education. However, amongst schedule tribe households, the dominant reason for sending their children to private schools was the unavailability of a government school in their locality (Table 4.7).

**Table 4.6: Caste wise Reasons for opting Government Schools**

Reason for opting government schools	SC	ST	OBC	Others
Affordable	73	65	55	54
Teaching is good	8	11	13	9
No Other Option available	8	10	11	9
Geographically closer	5	11	8	3
It is best to send girls to government school	3	0	4	20
Other reasons	3	3	10	6

*Note: All figures are in %.*

*Source: Data collected by Author*

One can extract few interesting finding from above table. First, gender biasness; four percent of the household believe that it is best to send a girl child to a government school. During the study, this gender biasness was observed at many places. The question was raised and discussed many a time during focus group discussions. Many interesting narrations were stated by the parents belonging to different caste/communities. For e.g. a woman belonging to a Muslim family, who was also a Sarpanch of that village stated that:

*“Education for girls is not necessary, thus we need not spend money on girls; whereas spending on boy’s education is an investment for our future endorsement. Government schools are closely located, so if needed girls can attend schools and simultaneously perform their household chores.”*

**Table 4.7: Caste wise Reasons for opting Private Schools**

<b>Reason for opting private schools</b>	<b>SC</b>	<b>ST</b>	<b>OBC</b>	<b>Others</b>
Private school ensure better education	74	78	58	68
Teaching is not good at government	17	5	20	19
Others send their children to private school	2	5	5	3
Government school not available in this area	0	10	4	3
I can afford sending my children to private school	0	0	4	0
Absenteeism of Teachers and staff in government schools	5	0	1	3
Other Reasons	2	2	8	3

*Note: All figures are in %.*

*Source: Data collected by Author*

The observation made from the above statement, regarding differential treatment provides better explanation for the table below, that presents the gender wise enrollment at each level of schools and locality is not making much different. The ratios shown in tables are self-explanatory. Girl child enrollment in schools are comparatively less than boys enrollment rate but the figures captures one's attention when it comes to the enrollment in higher education. As the level of education increase, the gap between boys and girls enrollment ratio also increases. This means that girls are less likely to enroll themselves in higher level of schooling. A study done in two states, West Bengal and Rajasthan (Samson, De and Noronh 2008) focused on the lower enrollment rate of the girl child. The study reveals that for higher education, schools are not located within or near the village, so one need to go out of the village for getting higher education, and parents do not feel secure to send their girls out of village. This leads to the high dropout among girls. The next section will broadly deal with the dropouts and some in-built structural reasons for dropout rate in Rajasthan.

#### **4.4: Reasons for Dropouts**

Government has introduced various policies and initiated various programmes for deepening the education system and to increase the enrollment of students, especially for girl students. Not only nationally, internationally also the aim for universal education has



been advocated. The millennium development goals by the UN advocate that all children, irrespective of their gender should complete primary education by the year 2015. However, despite adopting these impressive policies, the state has not fully succeeded in enhancing the education level in the state especially amongst girls. One can see it as a “capability failure” of the state to achieve its targeted goals. A finding from the study carried by Directorate of Economics and Statistics (DES), Rajasthan (2011) suggested that girls enrolment had dropped down in a year. It was 857 girls per 1000 boys in 2009-10 and dropped to 538 in 2010-2011. Not only the girls’ enrollment saw a dip, the overall enrolment rate also saw a dip of 2.8 percent within a year. This study also targeted to review the facilities available at the schools and found that out of 401 sampled schools, 25 government and 29 private schools lack girls’ toilets (Sharma and Ramchandean 2012).

As discussed above, several reasons for dropout are the following– a). Family-related reasons like socio-economic status, marginalized groups, uneducated parents etc. b). Reasons related to schools like poor infrastructure, lack of teachers; and (iii) personal reasons like child’s interest in studies, marriage etc.(Rumberger 2001). To be precise, one can argue that there are several of immediate and outward factors, which influence the educational attainment. But these reasons do not reveal the underlying causes of why students quit school, particularly those factors that at some point may have contributed to students’ attitudes, behaviors, and performance at school immediately preceding their decision to leave school (ibid). Dropout is an issue which is not beneficial for the nation as a whole. Rumberger (2001) indicated about the poor employability amongst the dropouts where the study claims that dropouts are more likely to get less paid jobs as compared to highly educated. He also tried to establish a relationship between lower earnings and unemployment and reduction in national income. Emphasizing on women education, Kingdon (1998) indicated that a female dropout can cause several challenges to the nation like rising population, decline in fertility, infant and child mortality etc. Therefore, by educating women, such issues can be tackled efficiently. A study was conducted in 10 states to see the pattern of schooling across communities and found that for these communities education is not a priority for their daughters rather they prefer early marriage for girls (Jha and Jhingran 2002).

The present study also tried to find out the dropout pattern among the sampled districts – Kota and Jalore. Table 4.8 shows that the dropout is the bigger issue in Jalore than Kota. Whereas the number of schools providing higher education has increased drastically in Jalore but the issue of girls’ dropout is a matter of concern. In Kota, there were only 18 percent household where girls had dropped out. Almost double the number in Jalore. There was not a major difference between the dropout rate of boys and girls in both districts. But when it comes to caste, a sharp contrast can be observed in the rate. Amongst the sampled households, the students from Muslim household dropped out in large numbers in comparison to students from other castes. Dropout rates are higher among boys in Muslim households. Every fourth out of tenth boy from Muslim household left school, whereas every three out of ten drop out in the case of Muslim girls.

**Table 4.8: Gender wise Dropout in Kota and Jalore**

	<b>Boys</b>	<b>Girls</b>
Kota	14	18
Jalore	30	34

*Note: All figures are in %.*

*Source: Data collected by Author*

**Table 4.9: Dropout among Girls and Boys by Caste/Communities**

	<b>Boys</b>	<b>Girls</b>
Upper caste	27	29
OBCs	17	26
SC	26	31
ST	23	15
Muslim	42	31

*Note: All figures are in %.*

*Source: Data collected by Author*

Dropout rates of girls are higher than boys in case of upper castes, OBCs and schedule caste households with stark differences between girls and boys within OBCs and SCs households, with 9 and 5 percentage points respectively. Interestingly, the households

belonging to schedule tribe communities dropout rate is higher among boys. . The probability of boys from the Schedule Tribe and Muslim households leaving school is higher than that of girls (Table 4.9).

In society like Rajasthan the higher education for girls is not easy. They are not allowed to carry forward their education beyond middle school, as the schools after this level are situated afar from the village. Amongst many issues cited by the parents, those who do not want to send their girls out of village to get higher schooling , primary was the time needed to travel to and fro from school and thereby compromising on household work. Girls themselves are not motivated to go for higher education due to lack of interest. .During a discussion with some young girls , an interesting conversation emerged where they revealed that they do not want to study, as in their families women are not allowed to work (Naukari/job) outside. They are supposed to do only household work or work in their fields within the villages. Therefore, going to schools would not add to anything that is primary to them. Generally, this trend is seen when parents have no or less level of education. Thus, parents are less motivated to educate their children. They are least bothered whether their children are attending schools or not. They are incapable of understanding the holistic purpose of education like overall development of the child.

During a discussion with a women's group, a woman said that in our society there is no tradition of educating girls. They should learn the household work. Nonetheless, other reasons like unavailability of girl schools and female teachers were also stated as the reason for dropout. The lack of interest in female education in a society discourages those who want their girl child to study more. Thus, they are unable to send their girl to school as they do not find any other girl's company.

On the other hand if we look at the reason for boys' dropout, the prominent reason that emerged was the economic reason. Parents expect their male child to contribute to family income; that is why boys drop out from their studies and engage themselves in earning livelihood. As we can extract from Table 4.10 that three out of ten household stated that their boys left school as they migrated to cities for earning livelihood. During a discussion with a group of people in Jalore district, most of the households asserted that

at least one member of their family have migrated to Gujarat or Maharashtra for earning. After getting education till 8<sup>th</sup> standard, they get some education “*Akshargayn*” and get handsome salaries in the cities. Prominent reason that came out from local interaction was that affluent caste or community of that particular village have prosperous business in big cities .these businessman want reliable helping hands in their business, so they prefer their own village/caste boys whose family background are known. They also provoke them to join the salaried job. Young boys choose to join as the earning opportunities in agriculture and non-agricultural sector is quite dismal. Another reason cited was big family sizes; hence the necessity to earn money and contribute in marriage of their sisters/younger siblings. .They are mainly artisans or sales boys at some shops. They do not spend much of their salary as they share accommodation provided by owner. They save their salaries and use this money to build big/pakka houses in their village which inspires other young boys to migrate for work and discontinue their studies.

Occupational engagement of the parents affects their opinion on educating their child. The studies have been undertaken in Rajasthan and West Bengal that concluded parents as an agency is very important. In deciding whether to enroll the children in the schools and what should be the level of their education and in how many ways the parents can support the children in their educational endeavors. The study also mentioned that type of occupational engagement in certain societies, direct the one for mobilizing their wards. Parents in Bengal were more likely to be engaged in non-farm occupations. This provides greater chance to educate their children to move up in occupation scale and earn handsomely. Bengal is an industrialized and an urbanized state. . In contrast, Rajasthan is not an industrialized state and people are mainly engaged in agriculture. Agriculture is mostly rain-fed and therefore people depend on rearing of livestock. As a result, most of the households are associated in such activities. Generally, females and children look after their cattle. It was observed that children go to school to mark attendance and after few hours they bunk schools for grazing their cattle.

This instance actually shows that for them higher education is not a priority. They are satisfied with the low level of education as the society is structured in a way where there are no significant returns to education. There is not enough motivation to study.

Rumberger (2001) mentioned that in addition to individual families and schools, factors like communities and peer groups can also influence the dropouts. Making his argument stronger, the author cited some empirical studies that highlight the differences in neighborhood characteristics, which help explain the different pattern of dropout rates (Crane 1991;Laventhal and Brooks-Gunn 2000; Clark et. 2009). The high dropout rates are observed in the neighbourhoods which are on the verge of poor standard of living (Crane 1991); whereas for Clark et.al (2009), there is no evidence to state that relationship. However, Clark made the point that the probability of boys’ dropout is higher, if one resided in a poor neighbourhood.

**Table 4.10: Reasons for Dropout among Boys and Girls**

<b>Reason for dropout: Boys</b>	<b>Percent</b>	<b>Reason for dropout: Girl</b>	<b>Percent</b>
To work for wage/salary	33	To attend other domestic chores	24
Migration	28	Child not interested in studies	14
Financial constraints	10	Marriage	11
Child not interested in studies	7	Financial constraints	9
To attend other domestic chores	5	college and schools are far	8
Inadequate number of teachers	4	Unable to cope up or failure in studies	7
school is far off	2	Non-availability of lady teacher/girls school	6
for helping in household enterprises	2	No company of other girl	5
unable to cope up or failure in studies	2	No tradition of girls education in community	5
unfriendly atmosphere at school	2	completed desired level/class	5
Marriage	2	unfriendly atmosphere at school	3
Others	3	Others	3

*Note: All figures are in %.*

*Source: Data collected by Author.*

Ramchandran and Saihjee (2002) have found that access to education, attendance, completion of schooling and learning achievements are associated with family position in

socio-economic hierarchy such as caste, occupation, income and parents' educational attainment. Sengupta and Guha (2002) in their study on girl educational attainment in West Bengal found strong correlation between household status (such as parental education, income and father's occupation) and school participation rate. They concluded that religion and caste are the important factors which affect the school participation of the girls. Vaid (2004) in her study also signify the role of these factors; however, found minimal and weak impact of caste on school participation..Education mobility theory explains how parents' mobility on education scale lead to the possibility that they will educate their child ignoring gender biases. This is an important factor which has been explained through various studies by scholars and showed the trend that educated parents try to provide the best to their children. This trend was captured in the current study i.e. if parents move upward on the educational scale; they are more likely to educate their children irrespective of gender biasness. Nonetheless, we noticed this educational mobility among parents at a very low level, thus, not prompting them to educate their children. A study carried out by a NGO *Pratham* deduced two main reasons for the high dropout rates. The first cited reason was the poor sex ratio which distorts the gender composition of the classrooms where the numbers of girls are much lower than boys; and second reason is the poor facilities at schools like in many schools there is no arrangement for separated toilets for girls which are in working condition.

This led to a pertinent question why the problem of dropout and lower attendance has not been not tackled despite the government of India has launched specific schemes and introduced policies to increase girls' enrolment in schools. The RTE act which ensures that education should be provided to all could not achieve its target of universal education. Before starting the discussion on the success and failure of these policies, one should be aware about the schemes which launched by the Central as well as the state government, to increase literacy rate and to curb out the issue of dropout. Government has initiated many schemes from time to time.

## 4.5: Some Existing Educational Schemes in State

For the purpose of the present study, we have taken five such schemes launched in Rajasthan – providing free books to students, Mid-day meal, scholarship to marginalized communities, free cycle/scooty for girls and Mukhyamantri Dhanlaxmi Yojna for tackling the issue of sex ratio. A detailed discussion on these schemes has been carried out in following sub-sections.

**Table 4.11: Caste wise Beneficiaries of Schemes**

	SC	ST	OBC	Others	Total
Free Books	96	95	93	89	94
Mid-Day Meal	96	94	91	92	93
Scholarship	75	78	69	60	71
Free Cycle/Scooty for girls	30	28	24	25	25
Mukhyamantri Dhanlaxmi Yojna	70	38	49	63	52

*Note: All figures are in %. In the benefitted column figures are only for them you have heard about the scheme.*

*Source: Data collected by Author.*

### 4.5.1: Mid-Day Meal Scheme

The mid-day meal programme was launched on 15<sup>th</sup> August 1995 nationally. The scheme pre-existed in many states but with the Supreme Court order it was implemented in all the states. Amongst those, Rajasthan was the first state which followed the order of the Apex court and launched it. However, initially, the scheme faced many challenges, and many distressing stories were reported in media such as due to poor quality of food children get exposed to stomach ache and at many place teachers and students were engaged in preparing and distributing meals which was hindering their teaching learning process. (Khera 2002). There are mixed results as far as the effect of the scheme is concerned. There are some studies that highlighted the corruption in-built in the scheme, whereas some studies proved the positive relationship between the implementation of mid-day meal scheme and increased enrollment and retention up to upper primary level (Paul and

Modal 2012). The programme is quite successful in Rajasthan and in both districts; people are aware and are getting benefitted by it (Table 4.12).

**Table 4.12: Mid-day Meal Scheme**

<b>Mid-Day Meal</b>	<b>Heard</b>	<b>Benefited</b>
All	96	93
Kota	95	93
Jalore	98	92

*Note: All figures are in %. In the benefitted column figures are only for them you have heard about the scheme.*

*Source: Data collected by Author.*

The scheme aimed three main objectives: increased enrolment, attendance and retention; improved child nutrition; and social equity (Dreze and Goyal 2003). *The first* objective of this scheme was to increase enrolment and attendance by serving a hot, cooked nutritious meal at school. A study conducted in Odisha found that the scheme actually helped in improving enrolment and attendance. The study also found that since the cooked meal had started to serve the children than raw material and dry food, the enrolment of girls' at schools has increased (Si and Sharma 2008). During the field work in Rajasthan many instances came out where parents reported that due to the scheme they send their children to school as they get cooked meal in the schools. A similar study was undertaken by Drèze and Goyal in three states - Chhattisgarh, Karnataka, and Rajasthan to assess the outcome of Mid-day meal scheme and found that enrolment in Class I had increased significantly between July 2001 and July 2012 by 14.5 percent; and this increase was impressive for girls' enrolment which rose by 19 percent (Dreze and Goyal 2003). The increase of girls' attendance through the Mid-day meal scheme was also discussed in the study by Afridi. The study found that due to the Mid-day meal scheme the girls' attendance in class 1 has increased by 10 percentage points (Afridi 2010).

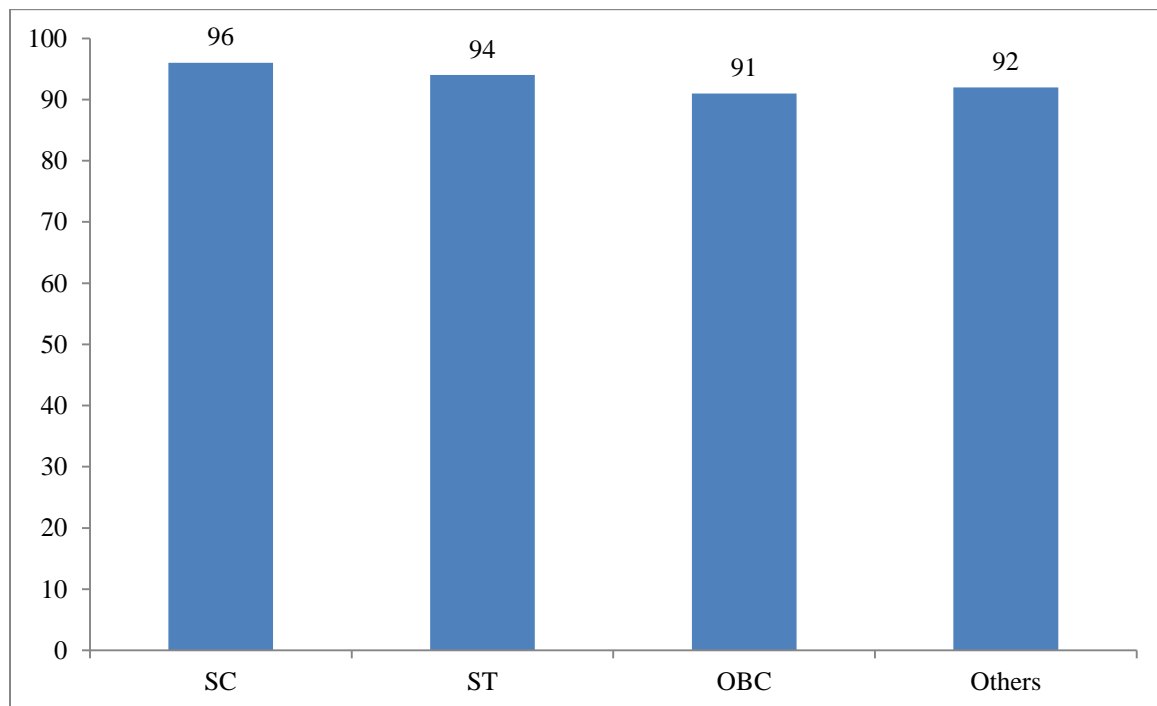
The second objective of this scheme was to improve the nutrition among children. For the quality of education child should be physically and mentally developed to grasp things. Mid day meal scheme has great possibility to increase the nutrition among children but it dependent on the kind and quality of meals students are getting in the schools. Different



states have different menus and pattern of meal distribution (Khera 2006). In our sample, it was found that children were getting food according to a pre-decided menu of the state. There were some discrepancies where few students reported that they get little meal and do not ask for extra meal if they are not fully fed. During an interview with a group they revealed that teachers are corrupt and they steal the ration. But despite of all discrepancies, the scheme shows positive result, as poor parents send their children to schools so that their children could have at least one meal properly.

Apart from increasing attendance and nutrition, the objective of Mid-day meal scheme is also to abolish caste and class based discrimination among school children; and promotes social equality. To some extent, this has been abolished; nevertheless, the goal is farfetched. During the survey, it was found in some households that caste and class discrimination persists in schools. Interaction with an upper caste household, in a ST dominated village, it was noticed that they give tiffin or homemade food to their children and asked their children to avoid the Mid-day meal cooked by a lower caste person. In a form of direct discrimination, the students belong to lower castes are not allowed to sit with upper caste students during the lunch hour. Their utensils are kept separate and they have to drink water from separate sources. Nonetheless, in a caste inflicted society like Rajasthan, the scheme doesn't carry the weight to break the caste based discrimination. The school located in single caste hamlets, the issue of caste is not relevant. But the villages where multiple castes exist, these kinds of incidents are common. The present study captures few cases of such act of discrimination with students belonging to lower castes, but overall finding shows cutting across all the caste groups, household got the benefit of this scheme. However, schedule caste and schedule tribe households were proportionally higher in numbers, who asserted that their households availed the benefit of the scheme (Figure 4.6).

**Figure 4.6: Beneficiaries of Mid-day Meal Scheme by Caste Groups**



*Note: All figures are in %. In the benefitted column figures are only for them you have heard about the scheme.*

*Source: Data collected by Author.*

In a nutshell, it can be said that there is a need of direct intervention of the state and the authorities to fight against these irregularities in the scheme, so that the objectives of the mid-day meal can be achieved.

#### ***4.5.2: Distribution of free Books***

The immense poverty among people hinders them to send their children to school. . . Buying books and stationery is an added burden. . . Therefore, to relieve the poor from this burden, government decided to distribute free books to students under *Sarv Siksha Abhiyan* (SSA). The scheme is delivering well in Rajasthan, as most of the households are aware and taking benefits from it (Table 4.13).

**Table 4.13: Distribution of free Books**

Free Books	Heard	Benefited
All	96	94
Kota	96	93
Jalore	98	94

*Note: All figures are in %. In the benefitted column figures are only for them you have heard about the scheme.*

*Source: Data collected by Author.*

#### **4.5.3: Mukhyamantri Dhanlaxmi Yojna**

Huge gender gap in literacy is a result of uneven sex ratio in the state. Sex Ratio in Rajasthan is 928 for each 1000 male which is below national average of 940, as per 2011 census. Nonetheless, there has been an improvement to the extent of 6 points as compared to 2001 census. To tackle this, a scheme called “Dhanlakshmi” was introduced in March 2008 by Chief Minister Ashok Gehlot. It was based on the idea of money being transferring to the girls account through Conditional Cash Transfer (CCT). It included the insurance coverage for the girl child. The family of the girl child get amount in the account under some conditions like regular and complete vaccinations, enrolment and retention in school and marriage after 18 years of age. The main purpose of the dhanlakshmi scheme was to provide monetary incentive to the parents to discourage female foeticide and encourage education in them. The scheme targets to change the patriarchal notions of a family. This scheme forces the families to see a girl child as an asset rather than a liability.

The survey finding shows that the awareness of this scheme is dissimilar in our sampled districts. In Kota district, every ninth person has heard about this scheme whereas in Jalore district, only four out of ten persons reported that they have heard about this scheme (Table 4.14). We can equate this awareness level with the literacy rate of the respective districts. The district with higher literacy rate has higher level of awareness than the other.

**Table 4.14: Mukhyamantri Dhanlaxmi Yojna**

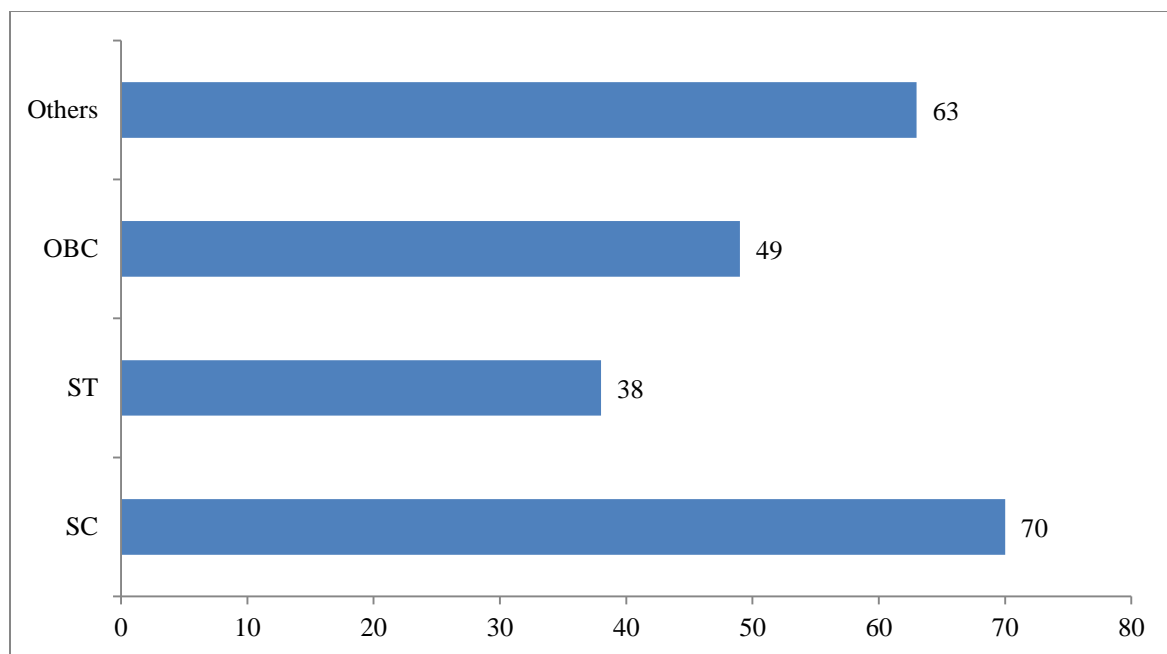
<i>Mukhyamantri Dhanlaxmi Yojna (for girl child)</i>	<i>Heard</i>	<i>Benefited</i>
All	67	52
Kota	91	69
Jalore	44	32

*Note: All figures are in %. In the benefitted column figures are only for them you have heard about the scheme.*

*Source: Data collected by Author.*

Same can be said about the other two schemes for marginalized section of the society and more specifically for girls – Free cycle and scholarship scheme.

**Figure 4.7: Beneficiaries of Dhanlakshmi Scheme by Caste Groups**



*Note: All figures are in %. In the benefitted column figures are only for them you have heard about the scheme.*

*Source: Data collected by Author.*

#### 4.5.4: Free Bicycle/Scooty Scheme

To promote higher education among girls, a scheme was launched in 2007 by Ashok Gehlot, then the Chief Minister of Rajasthan, which distributed free bicycles to girls. Girls promoted to 10<sup>th</sup> were eligible for the scheme after depositing Rs. 300 at schools as nominal fee (Government of Rajasthan). The scheme was valid for girls in rural areas with the distance between their school and home within 2 to 5 KM. Government also announced Devnarayan Scheme of Distribution of Scooty to encourage girls to opt for higher education. Only those with at least 50% marks in their higher secondary examination were eligible for the aforementioned scheme. As an incentive, if girls from OBC secure 55 percent marks in second and third year of graduation, she was eligible for Rs. 10,000 and Rs. 20,000 as scholarship in the respective years of graduation.

Ironically, people are unaware about the scheme. As mentioned earlier, level of education is correlated with the level of awareness. Table below clearly shows that level of awareness is much higher in Kota district than Jalore and only one third of them have benefitted from this scheme. The reason could be the eligibility condition attached to the scheme. The survey finds that in selected villages, there were few households where girls had completed their upper primary education. Perhaps government has taken the initiative to promote girls education. However, finding of the present study indicates that if the basic education does not undergo a reform, any scheme to enhance higher education will be futile. Therefore, it is an absolute necessity to launch schemes and programmes that enhance literacy at the elementary level. The bottom – up approach can be a possible solution for this issue.

**Table 4.15: Free Cycle/Scooty for Girls**

Free Cycle/Scooty for girls	Heard	Benefited
All	69	25
Kota	91	36
Jalore	47	14

*Note: All figures are in %. In the benefitted column figures are only for them you have heard about the scheme.*

*Source: Data collected by Author.*

#### 4.5.5: Scholarship

The educational backwardness of the marginalized communities is generally attributed to poverty. Many studies have been conducted to show how poverty and level of education is directly proportional amongst the backward castes and marginalized sections of the society. Due to poverty, parents of these poor children do not send their children rather prefer sending them for wage labour. Therefore, combating this issue and improving the level of education, the government of India introduced many scholarship programmes for the students from marginal sections. Following the instructions of central government, almost all state governments provided many scholarship schemes for the marginalized groups. The government of Rajasthan has such scholarship scheme since 1984. As per the rule, a student belonging to Scheduled caste / Scheduled Tribe, enrolled in class 6 to class 8 are entitled to get the scholarship. In 2004, the scheme was extended to students belonging to other backward castes (Government of Rajasthan), in addition to other scholarship schemes for girls. Finding of the survey shows that households residing in Kota districts are more aware about these scholarship schemes and are getting benefits from this, whereas the districts with lesser literacy rates are comparatively less aware and are availing fewer benefits.

**Table 4.16: Scholarship Scheme**

<b>Scholarship</b>	<b>Heard</b>	<b>Benefited</b>
All	86	71
Kota	96	77
Jalore	76	65

*Note: All figures are in %. In the benefitted column figures are only for them you have heard about the scheme.*

*Source: Data collected by Author.*

## **4.6: Quality of Education**

Percentile increase of education and educational institution is not a sufficient condition for a strong and a developed nation. In fact, knowledge-based and quality education can push the country and its citizens towards development. Even, the Education Commission of the India has stated “the destiny of India is now being shaped in her classrooms (Education Commission 1966). With these words, the education commission had described the role of education in social and economic development of India.

The Indian policy-makers were aware about the fact that the world is going to be a knowledge based society and a nation with the literates could sustain in the ever changing world economy. Keeping this objective in mind, for creating a literate society, the penetration of education among the masses was the aim. After attaining independence, various Five Years Plans focused on making education accessible. As a result, in India the number of educational institution and rate of literacy increased. Many studies have revealed that in the previous decade and half, the numbers of educational institutions have increased.

The Government of India as well as the state governments have taken various initiatives to increase the attendance and to reduce the dropout in schools more specifically among girls and achieved a significant success to enhance the level of education. However, through these indicators we can only measure the access to education. Nonetheless, this progress cannot drift the attention from the issue of quality of education which the schools are providing at various levels. Though there is no set definition of the term quality of education suggested by educationists but there are certain yardsticks through which quality of education could be measured, especially through the teaching learning process adopted in the schools.

In India, the schools are not functioning in a way as they are supposed to function. Insufficient numbers of teachers, teacher absenteeism, irregular timings and students bunking classes are a regular feature of any government school. Some of the internal factors also impact the quality of education such as available educational environment at home and level of education of parents.

For improving the quality of education, the National Policy on Education (NPE), 1986 focused on the urgency to address the quality concerns in schools education on a priority basis. They further emphasized that the quality cannot improve by making substantial policies for reform. They reiterated that for reforming education, reforms are required in teacher training, improvements in the facilities and infrastructure in schools, teachers' motivation and a change in the pedagogy (ibid).

Most recently, in 12<sup>th</sup> Five Year Plan, the Quality of education is linked to the quality of physical space, textual materials, classroom processes, academic support to the teachers, assessment procedures and community involvement, which targets improving school inputs like educational quality, building a strong systemic focus on teacher capacity, improving school leadership/management, strengthening academic support system, better community and parents' participation, measuring and improving learning outcomes in a continuous manner.

In the past also several attempts were made to improve the quality of education. One of them was the 'Operation Blackboard' to provide basic facilities at schools. The scheme was launched by the central government led by Prime Minister Rajiv Gandhi in 1987 after introducing New Policy on education of 1986. This targeted to provide the basic facilities to the schools at primary level across the states of India. It also targeted to provide three teachers and three rooms to primary schools, wherever enrolment warrants them. At least 50 per cent of women teachers were to be appointed which would impact girls' enrolment and retention positively (National Education Policy 1986).

That was the time when schools had no buildings and proper class rooms. Lack of teachers was also a matter of concern; many schools had only one teacher. Teacher pupil ratio was also poor. Due to poverty, parents could not afford textbooks and other necessary stationery for their kids. The scenario remains the same. There are various reports and studies which reveal the malfunctioning of government schools and administration, poor pupil-teachers ratio and poor quality of knowledge attainment among students.



A survey was conducted by NCERT to inquire the issue of “Quality of Education” in all Indian states and found that poor pupil-teacher ratio is a common problem in all states. There are few primary schools which had only one teacher (NCERT 2009). On this criterion, the situation of Rajasthan is worse. In Rajasthan, few schools do not have even a single teacher at the primary level. Three quarter of the primary schools have either one or two teachers. Classes are over-crowded because of lack of sufficient number of teachers; different levels of classes are combined and taught, adversely impacting the quality of learning.

Quality of teaching is also ascertained by evaluating the test scores. In government schools, students cannot even solve a basic mathematical puzzle and cannot even read or write basic Hindi. Student’s performance in reading and arithmetic was very low. The teachers are unaccountable to parents and village community in general. The learning attainment varies in schools belonging to different management agencies and locality i.e. rural and urban, and between private and government schools. The abysmal learning outcome makes it very hard for rural students to find admission in good universities or to be eligible for decent jobs.

In many schools there are no female teachers. Among various reasons, one reason for girl dropout rate is the absence of female teachers. A plausible explanation for this is difficulty for women to commute to a distant place for work. The issue of frequent transfers of teachers is normal in villages. The same study of NCERT shows that approximately 60 percent of primary schools do not have a single female teacher. The present study also confirms the same trend i.e. fewer female teachers leading to fewer enrollments of girl students and higher dropout rate. .

These are the some issues which this section tries to evaluate, both through primary and secondary resources. Referring to the quality of education, the section attempts to examine two important issues – first, the parameters to measure school quality through reading ability and school effectiveness, to provide quality education through established processes.

#### ***4.6.1: Parameters to Measure School Quality Through Reading Ability***

Despite the continuous efforts by the Government through enacting laws to ensure better education, the country has not achieved its set target to improve teaching-learning outcome (ASER 2014). The ASER report shows that the quality of learning, measured by reading, writing, and arithmetic skills, has declined. The class 5 children could not read class 2 level texts and the condition had further worsened since 2005 with decline of 15 percentage points. In the present study, with the same objective, the reading cards were used to assess the reading and arithmetic ability of the students. Data indicate that students of class 1 could not pass the reading and arithmetic ability for Hindi, English and Mathematics. Approximately five out of ten could not read Hindi and English alphabets and read initial numeric numbers. The performance of class 5 and upper primary classes were not significant as well. Only three out of 10 could read a paragraph of two-three lines in Hindi and proportion of those who could read one English sentence was only 15 percent. The number was little higher for students belong to upper primary classes. Four out of ten students from upper primary classes could read Hindi paragraph. Those who could read simple English sentence and solve mathematical puzzles were 19 percent and 25 percent respectively. It is important to note that those who were able to read, were may be from private schools. Jha and Parvathi (2008) have tried to assess the reports of organizations who evaluate the quality of education children avail from the schools and found that the quality of education the children are getting at schools is not good. Their assessment was very close to what was observed by my study in filed.

Image 4.1: Card used for Reading Hindi

**संभव**  
कथा II रसर का पाठ

**असर के बुनियादी पढ़ने की जाँच सामग्री: हिन्दी**

**कथा I रसर का पाठ**

सावन का महीना था। आसमान में बहुत काले-काले बादल छाए थे। ठंडी-ठंडी हवा चल रही थी। मुझे झूला झूलने का मन किया। बड़े भैया एक मोटी सी रस्सी लेकर बाहर आए। भैया ने रस्सी को पेड़ से लटकाकर झूला बनाया। सब ने मिलकर खूब झूला झूला। बाकी बच्चे भी आकर मजे से झूलने लगे। झूलते-झूलते रात हो गई।

**असर**

ल प स  
क ग  
ड ब म  
ट झ

**सामान्य आसान शब्द**

लाल दूध  
पैर  
तेल किला  
मोर  
जूता मौका

नोट: यह पाठ भारत में सारी कथा I और II की पाठ्य पुस्तकों का विश्लेषण करके तैयार किया गया है।  
पढ़ने की इच्छा रखने वाली सभी बच्चों को सही पाठ्य सामग्री में सहायता है।  
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अक्षर/शब्द के लिए: बच्चे से कोई 5 पढ़ने को कहें, कम से कम 4 सही होने चाहिए।

Image 4.2: Card used for Reading English

**A big tree stood in a garden. It was alone and lonely. One day a bird came and sat on it. The bird held a seed in its beak. It dropped the seed near the tree. A small plant grew there. Soon there was another tree. The big tree was happy.**

**Rani likes her school. Her class is in a big room. Rani has a bag and a book. She also has a pen.**

e d w  
s c  
g h z  
i q

hand star  
bus  
cat book  
day few  
old  
sing bold

Image 4.3: Card used for Mathematical ability

अंक पहचान 1-9	संख्या पहचान 10-99	घटाव	भाग
5 7	74 23	63 51 - 44 - 35	7) 898
8 4	91 86	92 71 - 48 - 35	4) 659
2 9	24 79	45 34 - 27 - 19	8) 946
3 1	37 61	43 46 - 29 - 17	6) 757
	58 14		

**Table 4.17: Quality of Learning in Sampled Districts in Rajasthan**

	Unable to read Hindi	Unable to read English	Unable to solve mathematical puzzle
1st class	46	49	49
2nd class	22	29	27
3rd class	10	17	12
4th class	10	13	10
5th class	3	4	3
Upto Upper Primary	1	7	2

*Note: All figures are in %.*

*Source: Data collected by Author.*

The ASER report indicates positively towards the increased enrolment, which is 97 percent as compared to 93 percent in 2005. But the alarming fact revealed by the study was the increasing penetration of private schools in the villages. In 2005, all-India rural private school enrolment was 17 percent but it increased to 29 percent in 2013 as per the report. In states like Manipur and Kerala, approximately 70 percent of the students were enrolled in private schools. Joshua (2014) argued the reason for parents to opt for private schools over government schools is not merely the poor quality of education children are getting at government schools; rather it is associated with the changing pattern of urbanization and need for upward mobilization. The income levels of the families are increasing and through this increase they can afford good quality of education provided at private schools. If household cannot afford private schools, they prefer private tuitions to supplement the learning. In the present study, 36 percent of the sampled students go to private schools. In contrast, the study found reverse trend from the ASER study i.e. those who go to private schools, are more likely to take private tuitions. Since, no one is available to teach at home and as private schools are comparatively strict, tuition becomes inevitable. Also, private school teachers are local residents, so they are available at relatively cheaper rates. Overall, 11 percent of the respondents said that they take private tuitions and within the sample of students at private schools, 20 percent of them take private tuitions.

**Table 4.18: School type Preference for Private Tuitions**

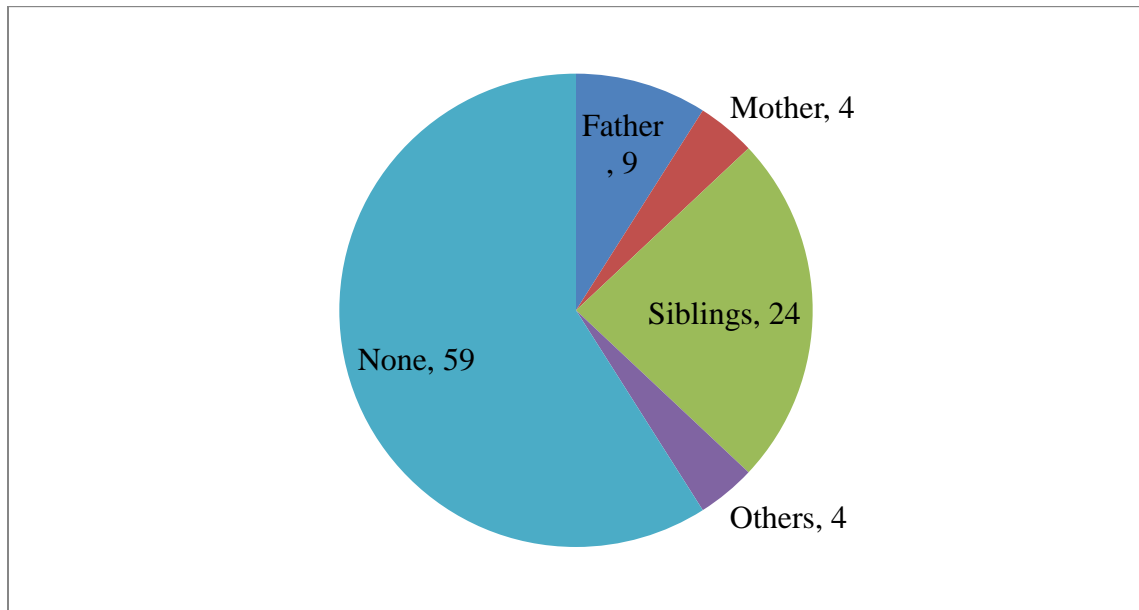
	<b>Take Private Tuition</b>	<b>Don't take Private tuition</b>
Government School	5	95
Private School	20	80

*Note: All figures are in %.*

*Source: Data collected by Author.*

The trend of private tuitions is more in Kota district in comparison to Jalore. In Kota, 15 percent of the students of government schools asserted that they take private tuitions whereas only 6 percent in Jalore said that they take private tuitions. The reason for preferring private tuitions as revealed by parents is their inability to teach their students. 59 percent of the respondents said that they do their homework without any help from their family members. Only 13 percent of them said they seek help from their parents. Therefore, they prefer private tuitions (Figure 4.5). Illiteracy and low level of education among parents is the prime reason for low quality of education. .

**Figure 4.8: Who Helps in Studies at Home?**



*Note: All figures are in %.*

*Source: Data collected by Author.*

**Table 4.19: Class wise Reading ability of Student of Government and Private School**

	Unable to read		1 <sup>st</sup> stage		2 <sup>nd</sup> stage		3 <sup>rd</sup> stage		4 <sup>th</sup> stage	
	Govt.	Private	Govt.	Private	Govt.	Private	Govt.	Private	Govt.	Private
1st class	61	28	22	22	4	17	4	17	9	17
2nd class	39	5	35	41	9	27	0	0	17	27
3rd class	15	4	33	4	24	29	12	29	15	33
4th class	13	5	18	10	28	24	18	24	23	38
5th class	5	0	13	3	26	26	31	35	26	35
6th class	0	0	17	0	12	15	26	35	45	50
7th class	3	0	9	8	12	8	29	54	47	29
8th class	0	0	16	3	12	0	32	50	40	47
9th class	5	0	9	17	9	0	23	17	55	67
10th class	0	0	4	7	0	7	8	20	88	67

*Note: All figures are in %.*

*Source: Data collected by Author.*

Type of schools impacts the quality of learning. As we can see in the table below that students going to private schools are more fluent in reading Hindi and English than their counterparts at government schools. A student of first or second standard of private schools can easily read the both Hindi and English sentences, which a fifth standard student of government school is unable to . Again location makes a difference. Students from high literacy rate districts like Kota are more fluent in reading and have arithmetic skills than Jalore district.

**Table 4.20: Reading ability in Kota and Jalore by type of School**

	Kota						Jalore					
	Government School			Private School			Government School			Private School		
	Hindi	Eng.	Math	Hindi	Eng.	Math	Hindi	Eng.	Math	Hindi	Eng.	Math
1st Stage	20	29	25	10	18	15	13	20	17	9	25	18
2nd Stage	16	29	35	10	26	22	13	31	30	24	35	27
3rd Stage	25	12	16	33	22	29	20	10	16	29	16	27
4th Stage	30	14	19	44	31	32	44	19	25	32	19	23
Unable to read	10	15	5	2	2	2	10	19	12	5	5	5

*Note: All figures are in %.*

*Source: Data collected by Author.*

## **CHAPTER 5**

### **KEY RESULTS FROM FIELD SURVEY ON SOME INDICATORS OF GENDER DISPARITY**



## 5.1: Background

It has been observed that women across Indian states are facing larger gender disparity, and in a traditional society like Rajasthan, gender disparity is bagged with several factors. The society is not homogeneous; it is divided on the basis of caste, class and religious belief and gender discrimination further layered with women's socio-economic position. To see the effect of these socio-economic factors on the educational attainment of girls, this chapter uses data which have been collected by the author on various socio-economic indicators of the households in Rajasthan. The government has made tireless efforts to bridge the existing gender gap in school education, but unfortunately these efforts could not yield expected success out of the targeted policies designed by the government. Therefore, it becomes pertinent to investigate the structural reasons for this unsuccessful story. The social and economic position of the households could be one factor responsible which hinders women education. To put this point with evidence, this chapter takes various social, economic and infrastructural variables into consideration while addressing the issue of unequal level of educational attainment among boys and girls. However, we cannot ignore the fact that in existing social structure of India, boys' education is always preferred over girls' education as investing in boys' education has positive return in households' income and social prestige.

There is a positive rise in women education in Rajasthan which can be linked to the educational schemes and policies launched by the government, but when it comes to the female literacy rate, there is a notable intra-state gap in female literacy. Some districts in Rajasthan are performing better than other districts in terms of female literacy rate. For instance, the female literacy rate is higher in Kota district whereas Jalore has the least literacy rate in Rajasthan. A significant increase has been noticed in educationally backward district i.e. Jalore but this district has yet to meet the caliber of better performing districts like Kota. To understand the inter-district variations in completing secondary school by girls and boys in Rajasthan, this chapter examines the factors responsible for this disparity.

## **5.2: Research Questions**

The chapter progresses keeping few questions in mind with some tentative answers:

1. Is there any social class difference in completing secondary school by girls?
2. Does the distance of schools affect the probability of girls to complete their secondary school?
3. Is there any association between occupation status of the household and girls' probability of completing secondary school?
4. Does family size affect the probability of girls to complete their secondary school?
5. Is there any association between dependent siblings (sibling below 7 years) in the household and girls' probability of completing secondary school?
6. What is the likelihood of girls passing secondary school if they have family members who have completed their secondary school?

## **5.3: Method**

### ***5.3.1: Survey Data***

The present study is based on the unit level information of household survey conducted by the author. The information was collected for 3175 individuals from 618 households from two districts of Rajasthan Kota and Jalore. This survey provides both qualitative and quantitative aspects of educational services received by households. Qualitative aspects include enrolment, current attendance, drop out/discontinuation, reason for dropout/discontinuation, literacy, and education level completed etc. Quantitative aspects include expenditure by households in tuition fees, transport costs, school uniform etc.

The survey provides a wide range of information regarding household characteristics such as – location of the household (urban or rural), religion, caste/communities identities, and casual monthly household education expenditure, income of family. Simultaneously, the data also provides some demographic characteristics of individuals such as - sex, age, marital status and level of education attainment etc. The survey also gives information about the nature of educational attainment whether the institution from where education is attained is a government or a private institution.

## 5.4: Variables

### 5.4.1: Dependent Variable: Probability of Completing Secondary School

The dependent variable for each cohort is whether an individual is secondary pass or not between the age group of 14 year to 25 years. The reason for taking this cut off age (age $\geq$ 14) is that a child by the time would complete secondary school in Rajasthan if s/he would have not repeated the class. I constructed a dependent variable (Sedu10) to capture this effect. Therefore, in the present study, the sample is restricted to individuals fall in the age group of 14 – 25 years old. The study also aspires to tap the impact of the Right to Education (RTE) Act which ensures free education for children aged between 6-14 years old. The assumption this study take into consideration is that after the RTE, there will not be much difference between girls and boys in attaining education upto upper primary level, but once it comes to the higher education girls are more likely to be quitting their education. Therefore, for simultaneous comparison study also takes another dependent variable edu\_8<sup>th</sup> which comprises the individual passed 8<sup>th</sup> class between the age group 12 – 20 years old.

Table 5.1 gives us the preliminary finding that in Kota as compare to Jalore status of education is somehow better. There is a nine percentage point difference between Jalore and Kota in availing education upto both upper primary as well as secondary school. The tables also reflect upon another story that there is a huge gap in the transition from upper primary to secondary school. Careful observation of the finding indicates that in both the districts close to half of the students could not reach the secondary schools after completing their upper primary schooling.

**Table 5.1: Frequency for Dependent Variable**

District	Probability of completing secondary school (10 <sup>th</sup> )		Probability of completing upper primary school (8 <sup>th</sup> )	
	Not completed secondary school	Completed secondary school	Not completed upper primary school	Completed upper primary school
Kota	63	37	33	67
Jalore	72	28	42	58
Total	68	32	38	62

*Note: All figures are in %.*

*Source: Data Collected by Author.*

#### ***5.4.2: Social Group***

Educational attainment varies by social group. The social group is divided into four categories 1. Scheduled Caste(SC); 2. Scheduled Tribes (ST); 3.Other Backward Class (OBC); and 4.Others (general category). First two categories are social minorities in India. Therefore, for the nuanced analysis three categories are used SC, ST and OBCs and Others are merged together.

#### ***5.4.3: Distance of Secondary School from Household***

Distance of secondary school from household is used as an indirect measure of the cost of attending school and security in case of girls. Distance of secondary school from the household also determines the probability of success in secondary class. Distance to nearest secondary school is classified in two categories. It is assumed that in many cases parents do not encourage their children to travel to far off places to continue their studies and especially girl children due to two important concerns – monetary constraints and safety concerns. In both the situations, families prefer education for their boys instead of girls.

#### ***5.4.4: Occupational Status of Households***

We have considered occupational status of households as another independent variable which can also explain the economic condition of the household. Occupational categories are defined as:

1. Self- employed in Agriculture
2. Self Employed in non-Agriculture
3. Casual labour in Agriculture
4. Casual labour in non-agriculture

#### ***5.4.5: Household Size***

Family size has a significant association with educational attainment. A study by Kugler and Sharma (2015) shows that household having many family members has a negative impact on educational attainment. Keeping this assumption in mind; the family size is also used as an explanatory variable to measure the probability of completing secondary school.

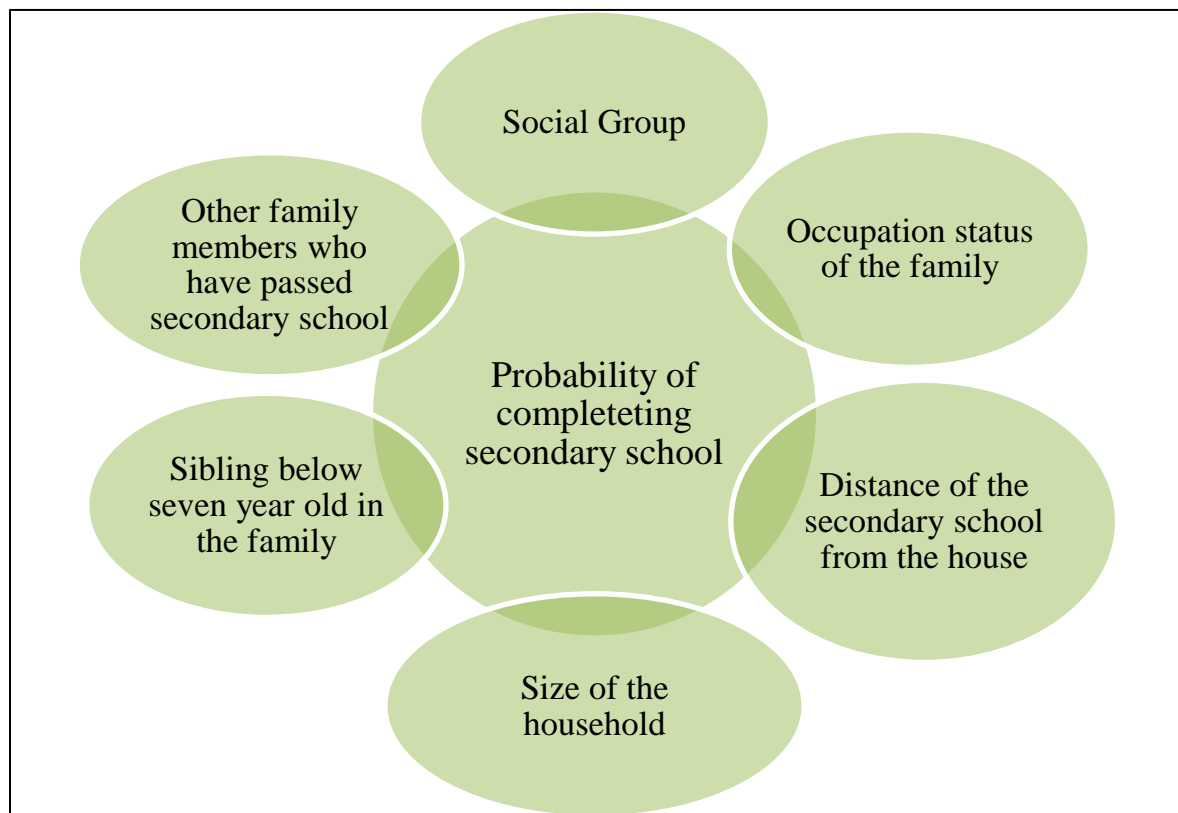
#### ***5.4.6: Sibling below 7 Years old or Dependent Siblings***

Other than household size, the number of dependent sibling also impacts the girls' educational attainment. It is believed that if a family has children below 7 years and mothers spend their time in household chores and in the agricultural activities (mainly in the sampled villages where women also invest their time in the agricultural activities), the older girls in the households have to leave their studies for the babysitting. Therefore, an explanatory variable *ch\_below7* is constructed using the age variable.

#### ***5.4.7: Family Members above 25 Years old Passed Secondary School***

Several studies on educational mobility have suggested that if the parents or other family member are educated, the likelihood of educational attainment of the family also increases. Keeping this assumption in mind a variable *ratio\_edu10\_ab25* is also created to see whether household having members who have completed their secondary school has any impact on the girls' probability to complete their secondary education.

**Figure 5.1: Factors influencing the Probability of Completing Secondary School**



## 5.5: Results

### 5.5.1: Descriptive Statistics

Table 5.2a describes the independent variables (nominal) which are used for the analysis. The sample is only taken for those who have completed their secondary school.

**Table 5.2a: Frequency of Nominal Independent Variables**

<b>Probability of completing secondary school</b>	Kota	Jalore
<i>Social groups</i>		
SC	28	30
ST	54	16
Others	36	29
<i>Distance of secondary school</i>		
Upto 2km	36	36
than 2KM	38	20
<i>Occupation status of the household</i>		
Self- employed in Agriculture	44	30
Self Employed in non-Agriculture	44	33
Casual labour in Agriculture	22	17
Casual labour in Agriculture	36	19

*Note: All figures are in %.*

*Source: Data Collected by Author.*

**Table 5.2b: Average Summary of Numeric/Scale Independent Variables**

<b>Probability of completing secondary school</b>	Kota	Jalore
Average Household size	5.7698	6.2121
Average of sibling below seven year	0.1727	0.1591
Average of family members above 25 years completing secondary school	0.1859	0.0997

*Source: Data Collected by Author.*

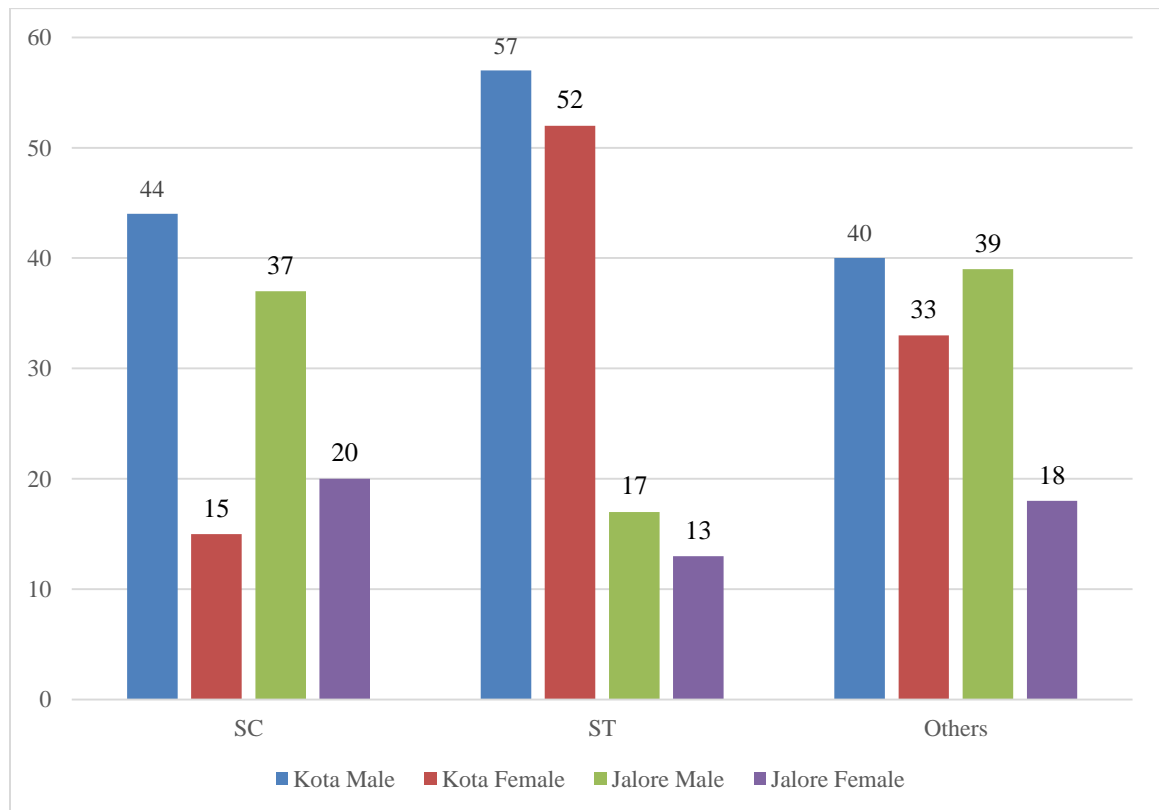
### ***5.5.2: Relationship between Social Group and Probability of Completing Secondary School***

Social class of a person belongs to influence one's educational attainment. As observed that overall probability of passing secondary class is significantly higher in Kota as compared to Jalore. However, in Kota the probability of passing secondary school is higher among individuals belonging to scheduled tribe (ST) and gender disparity in availing higher education is least among this caste group. Fifty seven percent male and 52 percent of female from scheduled tribes in Kota have completed their secondary school; whereas scheduled tribes residing in Jalore districts have least opportunity to compete their secondary school. Only 17 percent of male and 13 percent of female of scheduled tribes residing in Jalore asserted that they have completed their secondary school. Individual from schedule caste and other caste communities are doing well in attaining secondary education in Jalore. Females belonging to scheduled caste have the highest disadvantage in availing secondary education. In Kota where overall educational attainment is higher but among girls of scheduled caste, the probability of passing secondary school is less compared to girls from other caste communities. A research study tried to provide a reason for low educational attainment among children belonging lower castes and stated that the children belonging to lower/backward castes and marginal communities face discrimination in schools by fellow students and teachers (PROBE 1999). On the other hand, Kenya Lloyd et al (1998) gave reason for lower participation of women in schools and argue that women face double discrimination one at home and second in schools which blocks their way to educational attainment, especially higher education. The data collected for the study also indicated that girls' probability of completing secondary education is lower among girls belonging to dalit households from both Kota and Jalore districts.

Economic wellbeing of dalit households helped them to improve their education attainment, but still the psychological distance from the upper castes make the condition venerable for matching their higher educational attainment. Survey data collected by the author also suggest that boys from each caste community have more or less similar kind of educational attainment but the lower caste girls education attainment is less than the

girls from the higher castes. The reason why boys of marginal castes and communities have similar level of educational attainment as the boys of higher castes have, is the reservation policies in jobs which ensured reserved position of people belonging to the marginal sections of the society. This motivates them to minimum educational qualification to avail the benefits of reservation policy in jobs. On the other hand, not many women from those household get motivated to avail the jobs as there is no particular reservation for women in jobs. Therefore, they preferred men from their communities to avail those benefits.

**Figure 5.2: Relationship between Social Group and Probability of Completing Secondary School**



*Note: All figures are in %.*  
*Source: Data Collected by Author.*

In Kota area, cultural diversity and conditional demand for higher education helped the district to improve its literacy rate over the decades. Even gender disparity is



comparatively not as wide as in Jalore. Among tribal community, the Kota girls' probability of completing secondary education is much higher than the tribal boys from Jalore district. Females face a great deal of gender bias in higher schooling, even if they have to be educated to a level that ensures their marriage-which is a few notches below the educational level of their prospective husbands, but this is not the case with Kota male. If men want educated wives, they also prefer to educate daughter. Lloyd et al. (2001) has described trend in Egypt and concluded that the reflection of the social norms is a one of the dominant factor to drop out for higher classes.

### ***5.5.3: Relationship between House type based on Occupation and Probability of Completing Secondary School***

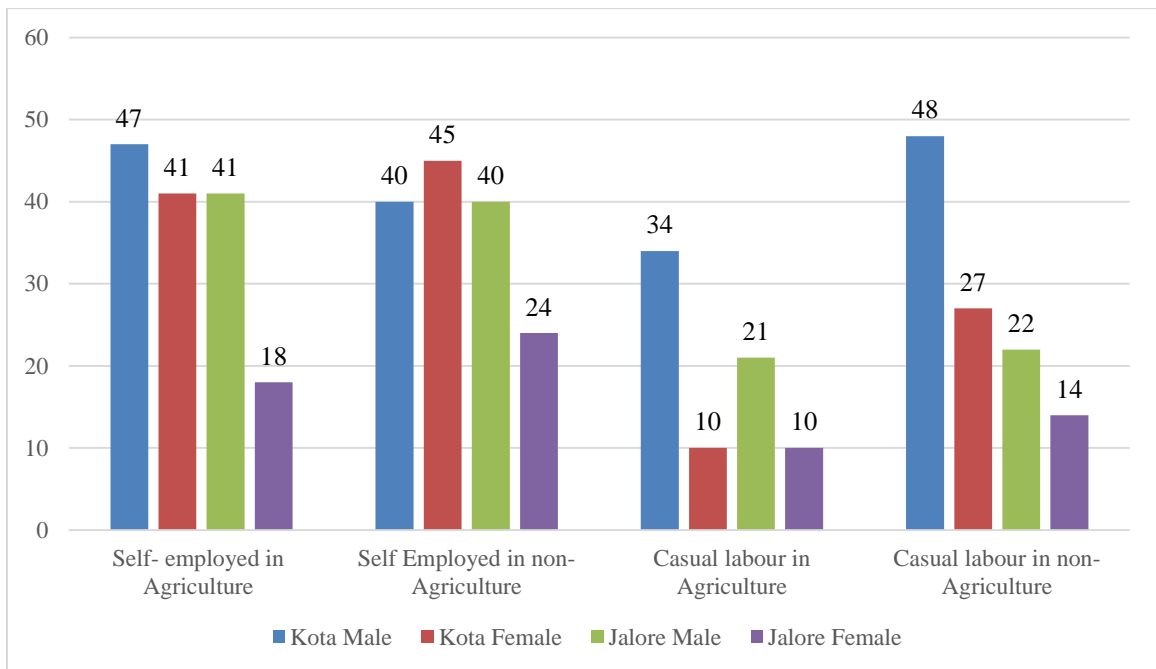
Casual labours in agriculture as well as in non-agriculture sectors have a clear disadvantage in completing secondary schooling. While self-employed in non-agriculture as well other self-employed in agriculture are more likely to finish secondary schooling. They are more advantaged than self-employed in agriculture which is the base category. Average probability of passing in secondary class is only 21 percent for males in Jalore households engaged in causal labour in agriculture; only 10 percent of female from the same kind of household in Jalore could complete their secondary school. Condition of female in Kota from the same kind of household is not at all different as only 10 percent of the female living in a household which engaged in causal labours in agriculture could complete their secondary school, on the contrary the probability of passing secondary school of male members of those kinds of families is a little more than three times higher in Kota, 34 percent of the male had completed their secondary school.

However, male from each type of occupational households are comparatively doing well in attaining secondary education in Kota; whereas households self-engaged in any kind of occupational activities say it agriculture or non-agriculture, the probability of males of Jalore district in competing secondary school is not very different from Kota. One interesting finding which needs to be mentioned here is that the Kota girls from self-employed in non-agricultural household have the highest probability in passing secondary

school, even it is five percentage points higher than male in both districts in the same occupational group.

Casual labor faces more financial constrained as compared with other occupational group. So, they neglect the education of children. Although the government is providing free education but still there are hidden cost associated with education, such as uniform, travel cost etc. (Tilak 1996). Poor household are unable or unwilling to send their children to school due to various reasons such as, for taking help in domestic activity(for female), and occupational activity like cattle feeding, agriculture activity(for male). Girls stay home to take care of their younger siblings when mothers go out for economic activity. The finding of the present study is similar to the findings of Jensen and Nielsen (1997) that in Zambia poor household are not able to afford the higher schooling of their children. Children whose fathers are labourers had the lowest rate of success in secondary school and children with father in non-manual occupation had the highest rate of success in secondary schooling.

**Figure 5.3: Relationship between Occupation type and Probability of Completing Secondary School**



*Note: All figures are in %.*

*Source: Data Collected by Author.*

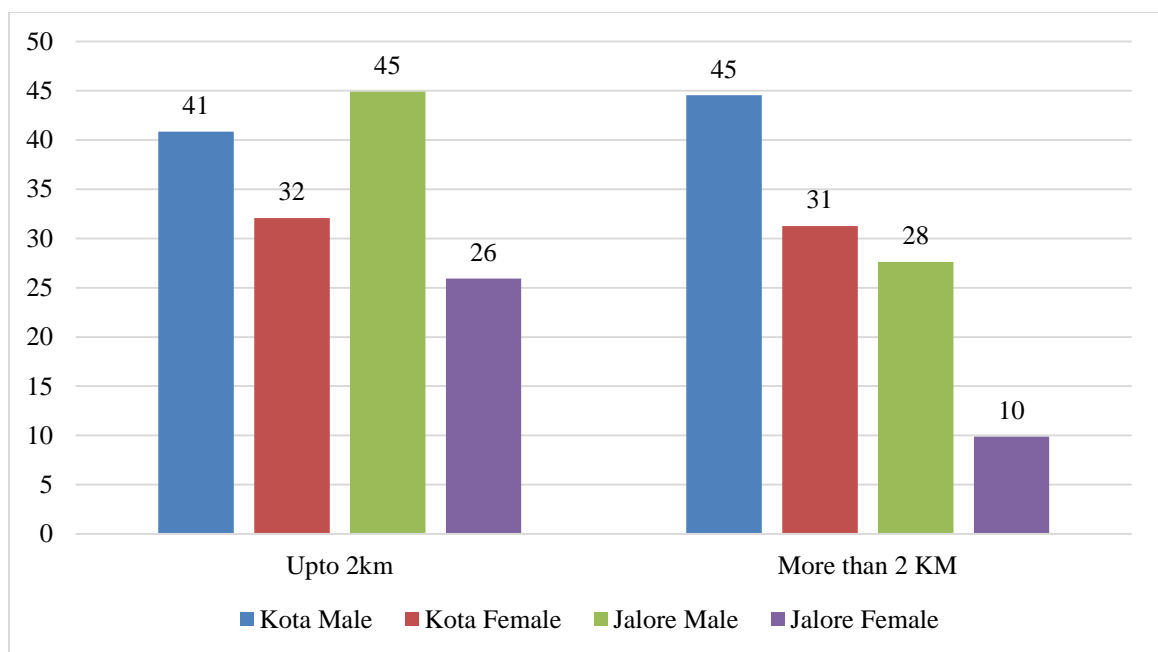
Agrarian distress is the main cause of ruining the education of children. Many girls are compelled to work as wage labourer. Ramchandran (2009) reported that number of children working in cottonseed farms and sunflower harvesting is increasing in India. Providing secondary education requires a significant expenditure in Jalore, in this case an economically weak household may prefer to educate sons who are more likely to support them in earning. If parents have a strong preference for son, they will continue child bearing until desired number of male offspring is born. This type of fertility behaviour increases their household expenditure which results cut in expenditure for girl child.

#### ***5.5.4: Relationship between distance of nearest Secondary School from Household and Probability of Completing Secondary School***

The distance of schools is considered as important variable for explaining the different levels of educational attainment among men and women. It could be used to explain two factors – one as the cost of schooling and second the safety for girls. The probability of attending school would decline if the schools would not be available nearby the locality. When the distance of the secondary school increases the probability of completing secondary school for both girls and boys decreases. On the other hand, we household need not to spend much on the transportation for schooling, the chance of completing secondary school increases. Families in Jalore are more skeptical in sending their children, especially daughters to schools which were far located and take much time for commuting. But once the distance of schools reduces, the chance of completing secondary schools for both boys and girls increases in both Jalore and Kota districts. However, the difference between men from both the district matches having schools at same distance; but there is a difference successfully completing secondary schooling in Kota female and Jalore female. The probability of women in completing secondary education in Jalore is adversely low. Kingdon and Theopold (2008) tried to provide a explanation for this variation in educational attainment of girls and boys. According to them that parents especially from the poor households that investment in girls' education has not significant return whereas they spending at boys' education has greater return, therefore, they wisely investment in boys' education and their boys to the schools which are far off from their place of residents.

However, Kingdon and Theopold (2008) have ignored the security perspective. Parents have other consideration in their mind while sending their children to schools especially their daughters. They cannot avoid the safety and security of their daughter, there are higher chances of risks in sending their daughters to the schools located far from their habitants. The incidences such as sexual harassments, eve-teasing and other violence against women are prevalent in Indian society, therefore not many parents prefer sending girls to the schools which are not closely located. In rural areas, secondary schools are not well connected.

**Figure 5.4: Relationship between Societal factors and Households' Attitude Towards Education**



*Note: All figures are in %.*

*Source: Data Collected by Author.*

A study conducted by Choudhary and Roy (2009) indicate that well connected road increases the probability of completing higher education. They have studies the status of higher education in Bihar and Uttar Pradesh. They found that in rural areas of Uttar Pradesh and Bihar, if areas have electricity connections and all-weather roads, there are higher chances that educational attainment would be high. Unusable roads and lack of public transportation were also indicted as reasons for lower literacy by Tansel (1997), as

these act as barrier to access to the schools which were distanced located. He said that longer distances which affect both boys' and girls' educational attainment which our study is also indicated; but it has more negative impact on girls' educational attainment. Children in Kota are not as affected as Jalore children by distance of the secondary schools. The distance has not any effect on successfully completing secondary education by boys and girls.

#### ***5.5.5: Relationship between Household size and Probability of Completing Secondary School***

The household size and educational attainment is closely associated. Several studies have estimated the impact of family size and educational attainment [Ejrnaes and Portner (2004) and Black et al (2005)]. Black et al (2005) found a negative correlation between household size and educational attainment of child. There are other studies too which hypothesized that a child coming from a large sibling cohort has a negative impact on educational attainment. In other words, big household size strains families' financial resources which affects children's education. (Anastasi 1956; Heer 1985; Blake 1986; Steelman and Powell 1991). If in family there are many people to feed and many children to pay tuition fee, each child receives fewer monetary and nonmonetary resources towards their intellectual development.

The data also suggest that family size has impact on probability of passing secondary education, especially in Jalore. In Kota Family size has no relationship with educational attainment, but in Jalore this impact is quite evident. As family size in the household increases the possibility of completing secondary school decreases. It has greatest impact on girls' education. For instance, in Jalore if a family has four or less than four member, 43 percent of the male from those households could complete their secondary education but in medium and large households, 33 percent and 32 percent of the male, respectively could complete their secondary education. On the contrary, it was observed that only 13 percent of the girls living in large households could complete their secondary education.

**Table 5.3: Probability of Completing Secondary School by Household Size**

	Kota Male	Kota Female	Jalore Male	Jalore Female
Small family having upto 4 member	46	46	43	28
Medium family between 5-7 members	40	40	33	19
Big family 8-10 members	42	42	32	13

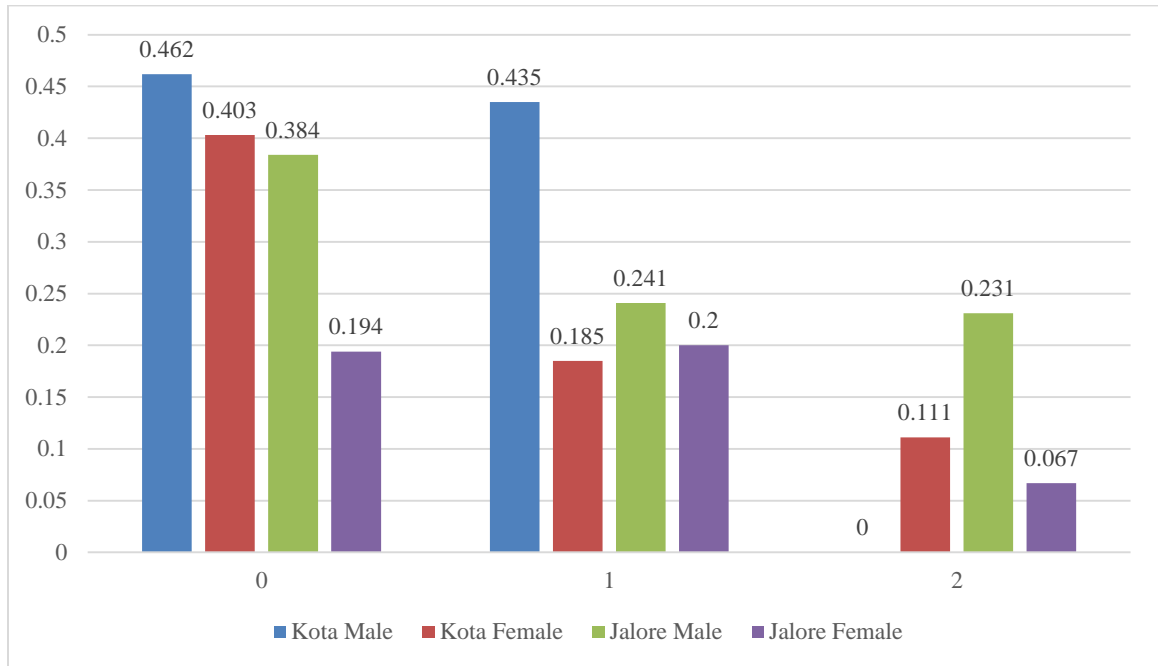
*Note: All figures are in %.*

*Source: Data Collected by Author.*

### ***5.5.6: Relationship between Sibling below 7 Years Old and Probability of Completing Secondary School***

A study shows a relationship between sibling size and level of educational attainment and concludes that there is a negative relation between two variables (Blake 1986). And, it is observed that once, the sibling is a minor (below 7 years or younger) the likelihood of a child to complete their education also drops, mainly for girls. The present study also indicates towards the same trend. As we can see in the figure 3.5, if an individual do not have any depend sibling, the likelihood of passing secondary education is higher but as the number of dependent sibling increases, the likelihood of passing secondary school decreases. The case is worst for a girl both in Kota and Jalore districts. It could be because in these household, mother get engaged in some kind of occupation/economical activities and elder girls have to take the responsibility of household chores and babysitting for their younger siblings.

**Figure 5.5: Relationship between Sibling below 7 Years old and Probability of Completing Secondary School**



*Note: All figures are in %.*  
*Source: Data Collected by Author.*

**5.5.7: Relationship between Family Members above 25 Years old, Completed their Secondary School and Probability of Completing Secondary School**

Vertical (or inter-generational) mobility has a strong association with higher educational attainment (Pushkar and Sharma 2009). Better-educated parents’ higher levels of parental involvement influences the intergenerational transmission of child’s education (Hardy and Gershenson 2015). Table 5.4 also seconds the assumption that upwards educational mobility in the household ensures the higher education for the next generation. The probability of passing secondary school doubles if households have other members having completed the secondary school. In Kota only 37 percent male have completed secondary school without having any member completed secondary school but number rises to 58 percent if families have secondary school pass members. The same increase it observed among Kota women. There proportion increases from 27 percent to 45 percent in educated households. In Jalore also women’s probability of passing secondary school

increases from 16 percent (in households not having members passed their secondary school) to 33 percent if any member have already completed their secondary school.

**Table 5.4: Relationship between Educational Mobility and Probability of Completing Secondary School**

	Kota Male	Kota Female	Jalore Male	Jalore Female
Members above 25 years and not passed secondary school	37	27	32	16
Members above 25 years and passed secondary school	58	45	63	33

*Note: All figures are in %.*

*Source: Data Collected by Author.*

## 5.6: Regression: Logit Model

Logistic regression is well known technique to analysis the relation between a qualitative or categorical variable and one or more predictor variables. It is a special case of a generalized linear model which estimates the models when the outcome is a nominal variable. The probability of outcome is modeled as:

$$P(Y_i = 1|x_i) = F(x_i'\beta)$$

Where  $(\beta_1, \beta_2, \dots, \beta_k)'$  is the  $k \times 1$  unknown parameter vector. If  $F(x_i'\beta) = x_i'\beta$  then it has a linear probability model, and the model parameter can be estimated with ordinary least square (OLS). But it suffers from two major shortcoming (a) it is not sure that predicted probability will lie between 0 and 1. (b) the slope  $(\beta_k)$  or marginal effect will be constant irrespective of the value of  $x_k$ .

The logit model arises when F is the logistic distribution function:

$$F(x_i'\beta) = \frac{e^{x_i'\beta}}{1+e^{x_i'\beta}} = \frac{\exp(x_i'\beta)}{1+\exp(x_i'\beta)}$$



For the easiest case of one predictor and one dichotomous variable, the logit model estimates the logit of Y from X. The logit is the natural logarithm (ln) of odds of Y. The simple logistic model can be written such as:

$$\ln\left(\frac{\pi}{1-\pi}\right) = \log(odds) = \text{logit} = \alpha + \beta x \quad (1)$$

$$\text{Hence, } \pi = \text{probability (Y=outcome of interest } | X = x) = \frac{e^{\alpha+\beta x}}{1+e^{\alpha+\beta x}} \quad (2)$$

Where  $\pi$  is the probability of the outcome of interest, under variable Y,  $\alpha$  is intercept and  $\beta$  is the slope parameter. The important thing is here that Y is always categorical whereas X can be categorical or continuous, although a categorical variable may yield two or more possible categories (Polytomous variables etc).

If the predictors are multiple in numbers then logistic regression will be as follows:

$$\ln\left(\frac{\pi}{1-\pi}\right) = \alpha + \beta_1 x_1 + \beta_2 x_2 + \dots + \beta_k x_k \quad (3)$$

Therefore

$$\pi = \text{Probability(Y=outcome of interest} | X_1 = x_1, X_2 = x_2, \dots, X_k = x_k)$$

$$= \frac{e^{\alpha+\beta_1 x_1+\beta_2 x_2+\dots+\beta_k x_k}}{1+e^{\alpha+\beta_1 x_1+\beta_2 x_2+\dots+\beta_k x_k}} \quad (4)$$

Where  $\pi$  is the probability of occurrence of an event,  $\alpha$  is the Y intercepts,  $\beta$ s are slope parameters, and X is the set of parameters.  $\alpha$  and  $\beta$ s are estimated by the method of maximum likelihood.

Let D be the set of observation for which  $Y_i = 1$ . we estimate the logit model parameters by maximising the following log likelihood function with respect to  $\beta$ :

$$\ln L = \sum_{i \in D} \ln \left[ \frac{e^{x_i' \beta}}{1+e^{x_i' \beta}} \right] + \sum_{i \notin D} \ln \left[ \frac{1}{1+e^{x_i' \beta}} \right]$$

For categorical variables  $\beta$ s are odds ratio while for continuous variables it is delta-p. For multiple predictors the null hypothesis states that all  $\beta$ s are equal to zero. So the rejection

of null state that at least one beta is not equal to zero in the population. Logistic regression assumes that the binomial distribution explains the distribution of the errors=  $(Y - \hat{Y})$  basically the binomial distribution is also the assumed distribution for the conditional mean of the binary outcomes with the probability described by single predictor equation and multiple predictor equation.<sup>1</sup>

In this chapter the latent variable ‘secondary pass’ of our model is in a nominal form having two categories where  $Y=1$  represent the value of completing secondary education and  $Y=0$  means secondary education is not completed by the person. Therefore, other regression model will not be working correctly in this situation because the dependent variable used in this chapter is binominal and the mean of the distribution of completing secondary school or not completing the secondary school has to be modeled in the presence of the explanatory variables such as social and economic position of the household, number of family members in the household, ratio of passing secondary school by members above 25 years old in the household, dependent sibling below 7 years, type of occupation household engaged in and distance of secondary school from the habitant. The feature of this function is not systemically linear because the prediction comes in forms of probability which ranged between 0 and 1. Therefore, a log odd (logit) model is used which is nonlinear transformation of dependent variable. This can be later expressed as a linear function of the independent variables in the following equation (Agresti,1996):

$$\ln\left(\frac{\pi}{1-\pi}\right) = \alpha + \beta_{sg} \text{socialgroup} + \beta_{occu\_cat} \text{Occupation} + \beta_{dist\_10th} \text{secondaryschooldistancefromhousehold} + \beta_{hhsz} \text{householdsize} + \beta_{ch\_below7} \text{childrenbelow 7} + \beta_{ratio\_edu10\_25} \text{above 25 yearsand 10thpass} \quad (5)$$

Where  $\pi$  is an event which represents the probability of successfully completing the secondary school by an individual aged between 14 to 25 years.

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<sup>1</sup> Logistic regression rejects that all variables (Xs) are follow the multivariate normal distribution with equal covariance matrix across all level of Y.

The probability provided by modelling suggested above have the advantaged mentioned below:

1. The model perform well even the response outcome (passing probability) are non-normal.
2. The estimated logits can move any way between  $-\infty$  to  $+\infty$ .
3. The model has a linear form and the estimates of the parameter can be directly associated with the logit of completing secondary education.
4. The corresponding probability of completing secondary education can be availed by transforming back the estimated logit equation (5)

### ***5.6.1: Marginal Effect***

In logit regression model, marginal effect is the slope of the probability curve relating  $X_k$  to  $\pi(Y=1|x)$ , holding all other explanatory variables constant. The equation of marginal effect can be written in the following manner:

$$\frac{\partial \pi(Y = 1|x_i)}{\partial x_k} = \left\{ \frac{e^{x_i' \beta}}{(1 + e^{x_i' \beta})^2} \right\} \beta_k$$

This gives the information about the summary of the changes which takes place within each category of the variable. The marginal effect provides different kinds of estimation based on the nature of the variables. It estimated instantaneous rate of change for scale/numeric independent variable; on the other hand, for nominal independent variable, it estimated the predicted probability  $\{\pi(Y=1|x)\}$  is change as  $X_k$  (binary independent variable) changes from 0 to 1, controlling rest of the variables constant.

In order to facilitate interpretation of our estimation we use average marginal effect for probability or simply predicted average probability. In our estimation, we are using continuous variable (household size, number of children below seven years and ratio of family members above 25 year and they passed secondary education) and categorical

variables (social group, occupation of household, distance of secondary school from household) as independent variable.

### ***5.6.2: Discussion on Logit Regression***

The logit regression model used in this chapter gives interesting finding after analyzing each explanatory variable in presence of other variables. Four different models were run for the analysis – Kota male, Kota female, Jalore male and Jalore female. The finding of the regression model unpacks the trends about each independent variable used in the model. Different variables have different impact on different models. For instance for Kota male the only one variables has significant impact –educational mobility in the household. The factor which affects the probability of completing secondary school among Kota male is the educated member of the family. This has the highest odd value which indicates that if there is any family member who is above 25 year and completing their secondary school, the likelihood of male to complete secondary school would increase significantly in Kota; whereas for Jalore males, other than educational mobility, variables such as household size, distance of the secondary school and household's occupation have significant effect the probability of successful completion of their secondary school. The regression result for Jalore male suggests that if there is a big families the probability of boys of competing secondary schools decreases. Jalore male whose household work as casual labourers in agriculture are least likely to complete their secondary education. Distance of the secondary schools has emerged as one of the reasons for Jalore males for not completing secondary schools.

**Table 5.5: Logit Regression – Probability of Passing Secondary School**

	Kota Male		Kota Female		Jalore Male		Jalore Female	
	Odds Ratio	z	Odds Ratio	z	Odds Ratio	z	Odds Ratio	z
Sedu10								
Schedule caste	1.351	0.7	0.595	-1.03	0.755	-0.7	1.068	0.11
Schedule tribe	1.686	1.15	2.283*	1.73	0.506	-1.25	2.349	0.97
2.dist_10th	1.109	0.27	0.605	-1.14	0.442	-2.67**	0.222	-3.18**
occu_cat								
Self-employed in non-agriculture	0.502	-0.67	1.143	0.17	0.585	-1.53	1.11	0.23
Casual labour in agriculture	0.645	-1.07	0.183***	-3.16	0.349	-2.38**	0.473	-0.91
Casual labour in non-agriculture	1.374	0.59	0.468	-1.36	0.303	-1.89*	0.2	-1.52
hhsz	1.012	0.13	0.896	-1.3	0.851	-2.25**	0.874	-1.19
ch_below7	0.532*	-1.68	0.418***	-2.71	0.711	-1.05	0.509	-1.69*
ratio_edu10_ab25	4.483**	2.13	1.942	0.94	20.346	2.87**	42.948	3.12**
Constant	0.574	-0.82	2.459	1.21	3.396	2.31**	0.914	-0.11
Number of obs	177		197		261		209	
LR chi2(9)	14.43		40.72		36.82		25.17	
Log likelihood	-113.971		102.3349		-152.16		-86.508	
Pseudo R2	0.0596		0.166		0.1079		0.127	

*Note: \*\*\*, \*\* and \* are assigned for significant level for 1%, 5% and 10% respectively.*

*Source: Data Collected by Author.*

On the other hand, for the female from both the districts Kota and Jalore, the reasons for not completing secondary schools are different. For instance, if a female in Kota belongs to ST caste group the likelihood of them for completing secondary education is very higher than female from other caste groups. Second factor which has negative impact on

Kota female educational attainment is the occupational engagement of their household. If they belong to the household which mainly derived their income from casual labour from agriculture they are less likely to complete their secondary school as compared to household engaged on other kinds of occupation. Third factor which influence the Kota females' probability of completing secondary education is the dependent children. It was observed if household has any children below 7 years, the girls from those household have lesser change for completing secondary education. The possible reason could be that they have to take care of their siblings in absence of their mothers, if they work for the household income. In contrary, the factors influencing successful completion of secondary education are different for Jalore women. For them the distance of the secondary school has the negative impact. Their chance of completing secondary schools decreases if the secondary schools are distanced from their location. But the factor which has the positive impact on their educational attainment is the educationally mobilized other elder family member. If any other member of their family has completed the secondary schools, the likelihood of Jalore female of completing their secondary education would be higher.

## **CHAPTER 6**

# **SITUATION ASSESSMENT OF GENDER DISCRIMINATION IN SCHOOL EDUCATION**

## **6.1: Background**

This chapter focuses on the factors which motivate parents to educate their girl child/children. The previous chapter has explained the relationship between the socioeconomic status of the household and level of educational attainment and concluded that households having higher socioeconomic status are more likely to prefer more education for their girls as compared to households having lower SES. But socioeconomic status solely does not impact their attitude towards girl's education rather there are some other factors too which impact people's perception towards girl education. Hence, this chapter tries to reveal those factors in detail such as neighbourhood, attitude towards girls in society, awareness about policies specific to girls, exposure to media and girls' security inside and outside the families. These factors widely affect parents' aspirations to educate their daughters.

The households are nested in neighbourhoods and probably get influenced by neighbourhoods' characteristics through interactions with other families or individuals in their neighbourhoods (Greenman, Bodovski, & Reed, 2011). If attitude towards girls' education is not positive in the neighbourhood, the likelihood of household not to educate girls would be exacerbated. In an orthodox society like Rajasthan which is closely knitted in social values and bound in society's norms would more likely to be influenced by the neighbourhood. Other than neighbourhood factor, policy initiatives also help to motivate parents to educate girls. These policy changes perhaps help in converting neighbourhood-level attitude towards inequalities in educational opportunities between boys and girls. Nonetheless, the Rajasthan government has introduced some women-specific policies to improve their status in schooling and society, but the level of awareness about these policies is a matter of concern. The hunch is that despite the fanfare of these policies people are not much aware of these policies, but once they get exposure to these policies the likelihood of sending their girls to school would also increase.



## **6.2: Research Questions**

Building on these hunches, this chapter poses the following research questions:

1. Is there any neighbourhood effect for supporting education for girls?
2. Do women-specific policies (for education and job) launched by the state government encourage people to support higher education for women?
3. Does media exposure affect support for women's higher education?
4. Does the perception about women security affect the attitude towards higher education for women?

## **6.3: Method**

### ***6.3.1: Survey Data***

To empirically find out answers and relationship between the suggested reasons and attitude towards girls' education, a household survey data is used. The data was collected by the author during her fieldwork in two districts of Rajasthan namely Kota (Highest female literacy rate) and Jalore (lowest in female literacy rate). Total 618 households were interviewed for the study (a detail about sampling and interviews is given in the introductory chapter). Many questions were asked to the respondents whether they are aware of the policy launched by the state government to promote women in educational institutions, jobs, and politics, kind of neighbourhood in which family is residing, to what extent their girls are secure in and outside their home and their level of media exposure.

## **6.4: Variables**

### ***6.4.1 Attitude towards Education***

The core objective of the study was to examine the reasons which obstruct women to attain education. The study included three variables Q17, Q27 and Q28(see in the appendix)which observed people's attitudes towards supporting education for girls which

were used to create a dependent variable ‘attitude towards supporting education for girls’. Q17 asks ‘Do you think education is necessary for the girl? The choices were ‘yes’ (scored as 1), ‘no’ (scored as 2) and ‘can’t say (scored 8). Q27 states ‘Now I will read two statements, please tell me which statement you agree with most? Girls should prioritize household chores over the job (scored as 1), even, a girl should do a job (scored as 2) and can’t say (scored as 8); and, Q28 asks ‘If girls are given equal education as boys, they can also contribute to family income? Do you agree or disagree with it?’ and the option is ‘agree’ (scored as 1), ‘agree to some extent’ (scored as 2), ‘disagree’ (scored as 3) and can’t say (scored as 8). Responses to these statements indicate people’s levels of agreement with the importance of girls’ education. To create a dependent variable, these three questions were recorded in same direction and values for supporting women education were given higher scores (1) and all other values were coded as 0. A reliability test was done to see whether these variables are gelling together for creating an index (see in the appendix). The scores were satisfactory; therefore, these three variables were used to create a dependent variable ‘attitude towards supporting education for girls’ having three categories 1 ‘low support for girls’ education’ 2 ‘moderate support for girls’ education’ and 3 ‘high support for girls’ education’.

**Table 6.1: Frequency for Dependent Variable**

District	Support for women education		
	Low	Moderate	High
Kota	11	49	40
Jalore	22	20	58
Total	16	35	49

*Note: All figures are in %.*

*Source: Data collected by Author.*

#### **6.4.2: Perception of the Neighbourhood's Level of Education**

Q9 of the survey asks about the people’s perception towards their neighbourhood whether they think their neighbourhood is educated or not. Options for these questions are ‘educated’ (scored as 1) and ‘not educated’ (scored as 0). Reason for taking this question

as an independent variable lies in an assumption if one resides in a neighbourhood which is surrounded by educated people, the possibility of supporting girls' education would be high in that locality.

#### ***6.4.3: Perception towards the Mentality of the Neighbourhood: Conservative or Open-Minded***

This is a pertinent variable to explain the dependent variables. Q10 in the survey tries to capture about the household's perception towards the mentality of their neighbourhood. It asks 'how is the mentality of people in your neighbourhood? Would you say that they are open-minded/progressive in their thinking (scored as 1) or Traditional/Conservative in thinking (scored as 0)? The hunch is that if the people residing in a neighbourhood which is more progressive in their thinking on social issues, they will support the higher education, in contrast to the neighbourhood where people are holding traditional or conservative thinking.

#### ***6.4.4: Societal factor: Groom Hunt is difficult for a highly Educated Girl***

It is believed that if a girl is more educated, it becomes more difficult to find a suitable match for her. Therefore, people do not prefer to provide higher education to girls. To know people's perception of this issue a question Q11 was asked which states 'Most people think that if a girl is more educated, it will become more difficult to find a match for her. Are you Agree or Disagree with it? Those who believe that groom hunting is difficult are coded as 0 whereas those who don't think that groom hunting is difficult are coded as 1. The likelihood to support higher education for girls is higher if the respondent disagrees with the statement.

#### ***6.4.5: Awareness about Government Policies***

To promote higher education for girls and motivate parents to educate their daughter, the government initiates policies and the same is done by the Rajasthan government. The government of Rajasthan has launched various schemes for girl students so that they can get a higher education. But only policy formulation is not sufficient rather people's awareness about the schemes is more crucial. In the survey household's awareness of

such policies were asked. Q7E asks about the people's awareness about the cycle/scooty schemes which were launched by the Rajasthan government to promote higher education; binary options are given to the respondents – 'heard' (scored as 1) and 'not heard' (scored as 2). Similarly, Q7F asks about people's awareness about 'Mukhyamantri Dhanlakshmi' scheme which is also initiated for motivating parents to educate their daughters. Q13 and Q15 also ask about people's awareness of reservation in local government and government jobs respectively.

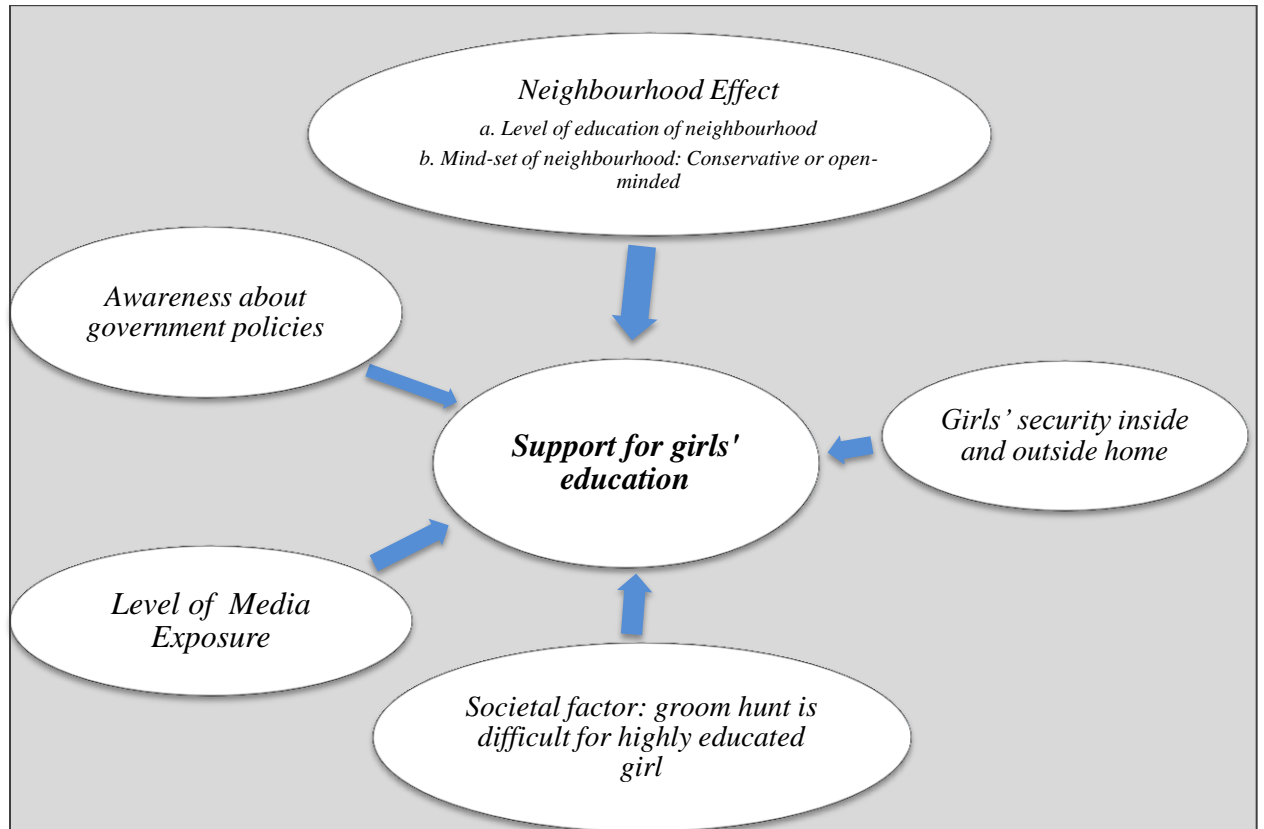
#### ***6.4.6: Index of Media Exposure***

Questions on media consumption like reading newspaper, listening radio and watching TV were also asked the respondents. And using these three indicators an index 'Level of media exposure' was created ranging from 'no media exposure' (scored as 0), 'low media exposure' (scored as 1) and 'high media exposure' (scored as 2). The assumption was that if people are more exposed to media, they will more supportive of women education.

#### ***6.4.7: Index of Girls' Security Inside and Outside the Home***

Girls' safety and security is the priority of parents. If social surrounding is not safe and secure for women parents would not prefer sending their daughters to school. Therefore, it is pertinent to measure the level of safety and security of girls inside and outside the home. A battery of questions from Q29a to Q29d was asked and coded in binary categories 'safe' (scored as 1) and 'unsafe' (scored as 2). All four questions were clubbed together to measure the safety of women and an index 'girls' security' was created using submitting scores. The responses were grouped into two categories 'secured' (scored as 1) and 'unsecured' (scored as 0).

**Figure 6.1: Research Design for the Study**



## **6.5: Results**

### **6.5.1: Descriptive Statistics**

Table 6.2 presents frequencies for the independent variables which affect one's attitude towards higher education for girls in both districts –Kota and Jalore and help us to understand the reason why there is a difference of opinion among people from both the districts. The first glance at the data reflects that in Kota people in the neighbourhood are quite educated than people in Jalore; 86 percent of the respondents from Kota asserted that their neighbourhood is educated whereas 79 percent of the respondents from Jalore said that their neighbourhood is educated. Similarly, proportionally higher numbers of the respondents, two out of three, from Kota claimed that people in their neighbourhood are open-minded and are progressive in their thinking; on the contrary, 54 percent of the respondents from Jalore said that people of their neighbourhood are open-minded. There

is not much different in both districts about the perception that finding a groom for a highly educated girl is difficult. When it comes to the safety and security of the girls, girls in Kota are comparatively safer than Jalore.

**Table 6.2: Frequency of Independent Variables**

	Overall	Kota	Jalore
Q9: Whether Neighbourhood is educated			
0: Not much-educated neighbourhood	18	14	21
1: Highly educated neighbourhood	82	86	79
Q10: Whether a neighbourhood is open minded			
0: Conservative	40	35	46
1: Open minded	60	65	54
Q11: Finding a groom is difficult for a highly educated girl			
0: Groom hunting is difficult	43	44	42
1: Groom hunting is not difficult	57	56	58
Q7E: Awareness about free cycle/scooty scheme			
0: Not aware	31	9	53
1: Aware	65	91	47
Q7E: Awareness about Mukhyamantri Dhanlakshi Yojna			
0: Not aware	33	9	56
1: Aware	67	91	44
Q13: Awareness about reservation for women in Panchayat			
0: Not aware	58	56	60
1: Aware	42	44	40
Q15: Awareness of reservation for girls in govt. job			
0: Not aware	72	66	77
1: Aware	28	34	23
Index of Level of Media Exposure			
0: No Exposure	44	33	55
1: Some Media Exposure	38	48	29
2: High Media Exposure	18	19	16
Index of girls' security			
0: Not secured	13	16	11
1: Secured	87	84	89

*Note: All figures are in %.*

*Source: Data collected by Author.*

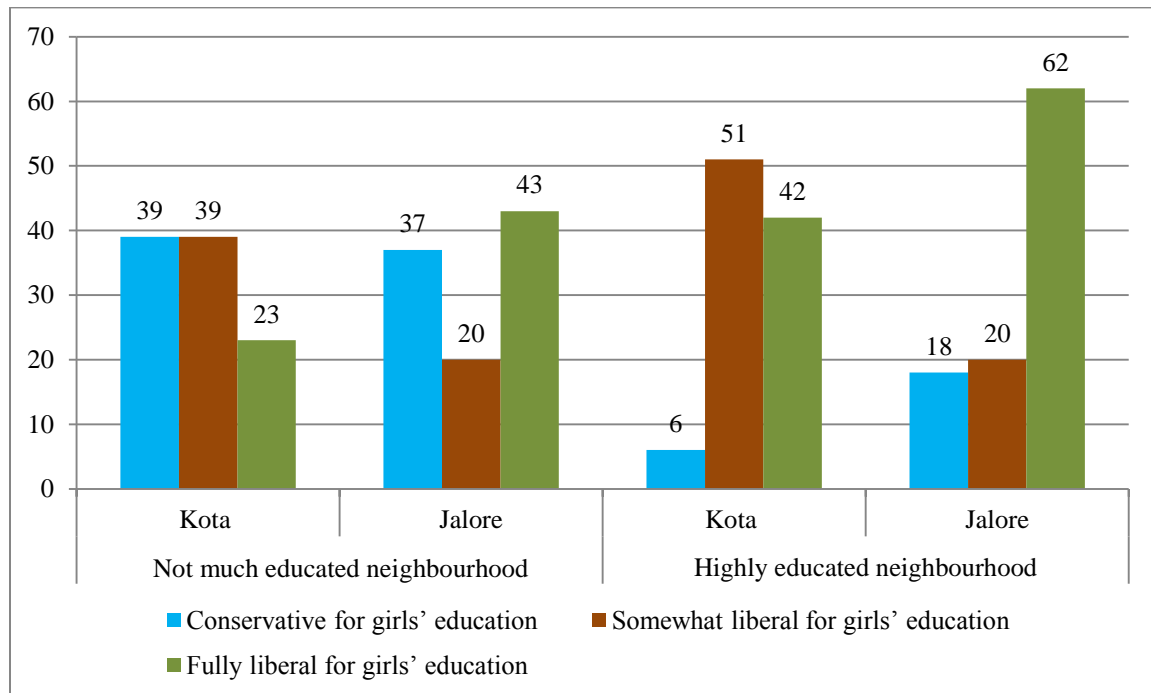
As mentioned above that people's awareness about the government schemes motivate parents to educate their girls and this is quite visible from the data. People in Kota are more aware of the schemes than people in Jalore. This could be the possible explanation for the better condition of women education in Kota than Jalore. Media exposure is also higher in Kota than Jalore. One-third of the respondents are not exposed to media in Kota whereas 55 percent of the respondents in Jalore are not exposed to media at all.

### ***6.5.2: The Relationship between Neighbourhood and Households' attitude towards Education***

This section examines the relationship between neighbourhood characteristics and the likelihood that people will liberal opinion on girls' education. Neighbourhood characteristics such as level of education of neighbourhood, their mindset and safe and secure environment for girls in the neighbourhood have a strong relationship with people's perception whether education for girls is important or not and this strengthens the support for women education. For the individual and collective growth, the neighbourhood plays an important role. For instance residence in a good neighbourhood has a positive result in educational and economic growth and affects the social mobility, on the other side, disadvantage neighbourhood has a negative impact on social and economic development of an individual (Ellen and Turner 1997; Galster et. Al 2010)

The data indicate if households claim to be located in an educated neighbourhood, their support for women education is higher. This support strengthens in Jalore which recorded the lowest women literacy rate in Rajasthan. The proportion of both the district of conservatives is low in an educated neighbourhood compared to a not educated neighbourhood. In Kota, six percent of the households in the educated neighbourhood is conservative whereas this proportion increases to 39 percent in the non-educated neighbourhood and the same trend is observed in Jalore, but the educated neighbourhood has a greater role in shaping people's perception in Jalore. As we can see in the graph that 43 percent of the households in the non-educated neighbourhood of Jalore fully support the women education and it goes up to 62 percent in an educated neighbourhood.

**Figure 6.2: Relationship between the level of Education of Neighbourhood and Households' attitude towards Education**



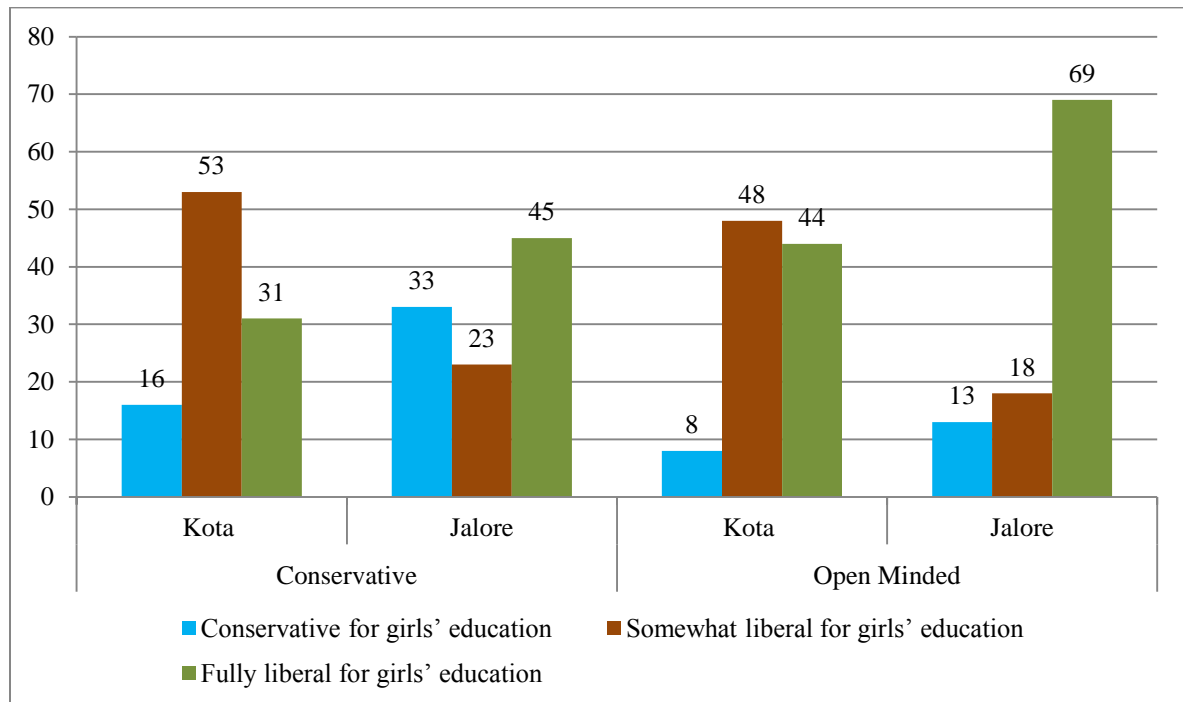
*Note: All figures are in %.*

*Source: Data collected by Author.*

Not only the level of education rather mindsets of the people residing in the neighbourhood also affect the people's perception towards girls education, especially in a district like Jalore where people do not send their girls to school due to several reasons. Data indicate that once households' inhabitant is in a neighbourhood where people are having progressive thinking are more likely to support women education. Almost 70 percent of the households fully support women education in Jalore where the neighbourhood is open-minded; whereas the households which claimed that people in their neighbourhood are not open-minded and believe in traditional thinking, close to 45 percent fully support women education. In Kota neighbourhood's thinking has no straight relationship for supporting women education; thought most of the households claimed that their neighbourhood is open minded and this could explain the higher female literacy rate in Kota. This mindset of the people is the biggest hurdle in girls' education. People often think why they should educate their girls. It will not serve any purpose.



**Figure 6.3: Relationship between the Neighbourhood's Mindset and Households' attitude towards Education**



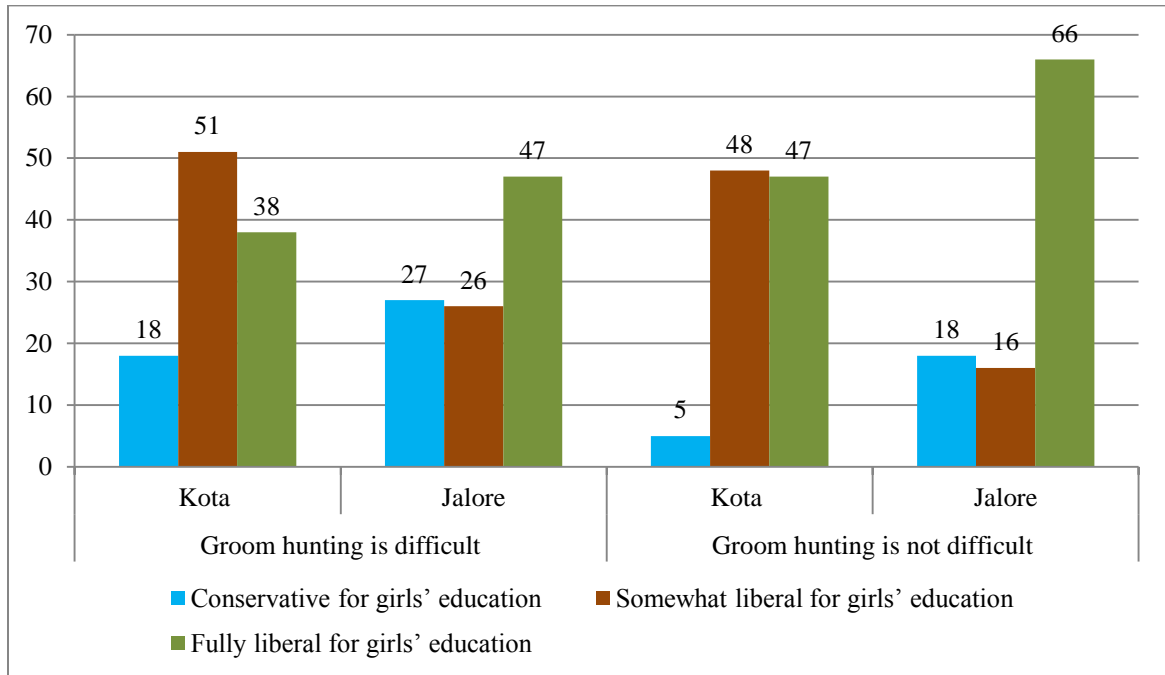
*Note: All figures are in %.*

*Source: Data collected by Author.*

### ***6.5.3: The Relationship between Social factors and Households' attitude towards Education***

Societal factors also determine families' attitudes towards girls' education. In a socially nested society like Rajasthan it is widely assumed that if a girl is more educated it would become difficult for the parents to get a suitable groom for their daughter, even if they find a suitable (educated) boy, the dowry demand would be high. Therefore, this ill-perception never encourages them to educate their girl child and rather it leads to the child marriage of girls. To restrict the ill-tradition of child marriage, the government of Rajasthan had introduced 'Rajasthan Child Marriage Prohibition Rules' in 2007 to legally ban the child marriage. And recently the practice of child marriage has almost disappeared. Parents want to educate their girls. Almost nine of the ten households in the survey agreed that education for girls is important.

**Figure 6.4: Relationship between Societal factors and Households' attitude towards Education**



*Note: All figures are in %.*  
*Source: Data collected by Author.*

When people were asked about the reasons why they think that education for girls is important, both districts have different reasons. For instance in Kota districts, close to half of the respondents from the household believe that education for girls is important to get a good job whereas in Jalore district a little more than a quarter households hold the same opinion. One interesting finding which needs special reference here is that one of the five surveyed households believes that education for girls is important because it becomes easy to get an educated and good family for marrying a daughter whereas on 4 percent of the households said the same. However, the rising phenomenon of girls' education is having more impact on supporting girls' education in Jalore. Close to 11 percent of households believe that all girls are educated nowadays, therefore, girls should get an education. In Jalore proportionally higher number of households supported the girl's education because they believe that through education girls can differentiate

**Table 6.3: Reasons for Supporting Education for Girls**

	Kota	Jalore
To get a good job	46.4	27.3
To get an educated and good family for marriage	18.7	3.6
To make stand on her	13.6	14.9
All girls are educate	6.5	10.7
She can manage her family well	3.2	0.3
Can do all calculate	1.9	0.0
She will be aware of her right	1.6	2.3
To differentiate between good and bad	1.6	4.9
Can give future to her children	1.0	6.8
will be Happy	0.7	1.0
Nobody likes to marry	0.3	0.3
Can sign instead of thumb	0.3	13.3
Others	0.6	5.5
Not applicable	3.6	8.1

*Note: All figures are in %.*

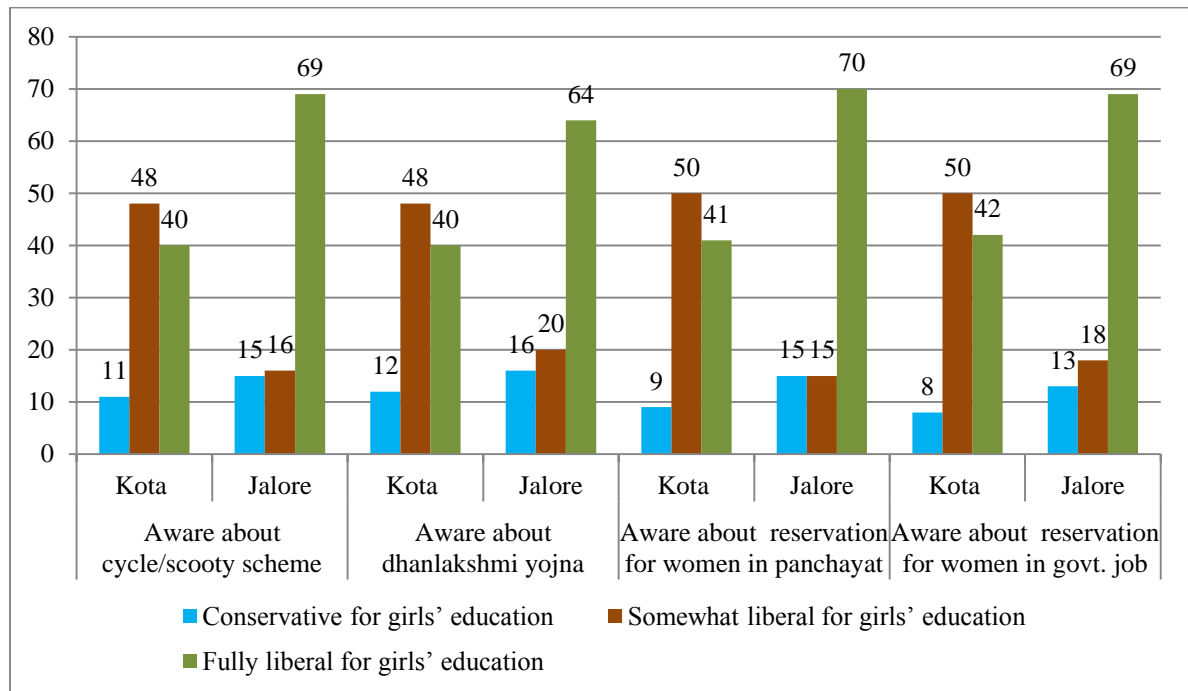
*Source: Data collected by Author.*

#### ***6.5.4: The relationship between Awareness about Government Policies and Households' attitude towards Education***

The government of Rajasthan has launched various policies to empower women in a traditional society like Rajasthan like 50 percent reservation for women in local government; reservation for women in a government job. Other than these two popular policies, the Rajasthan government has also launched some policies to increase enrollment of children in school and to control dropouts. In several studies, it was

reported that after completing basic education, the girl was less likely to continue their education. Therefore, the government has taken few policy measures. It has introduced cycle policy through which girls are entitled to get a cycle from the government if they complete class 8. Even a policy like **‘Dhanlakshmi’** which ensure conditional Cash Transfer for Girl Child with Insurance Cover (CCT), is meant to increase women participation in education. Families get transferred cash in their accounts under some condition like regular vaccination of the child and completion of it, enrolment and retention in the school of a girl child and let her unmarried at the age of 18 years. It was observed that if people are aware of such schemes they are more likely to support women education. The impact of this awareness is visible in Jalore. The data indicate that around seven out of ten households in Jalore support women education if they are aware of the women-centric policies such as reservation in Panchayat and jobs; and cycle scheme. Bihar state also witnessed that Cycle programme is much effective to increase the secondary class enrollement for girls. (Muralidhran and Prakash,2017) This is important to mention that if in a socially conservative district like Jalore where the women literacy rate is the lowest compared to all districts in Rajasthan, the awareness about the policies which give socio-economic and political power to women push parents to overwhelmingly support the women education. In Kota where women literacy is already higher and girls' education has supported the existence of such policy has no deep impact as compared to Jalore.

**Figure 6.5: Relationship between Awareness about Policies and Households' attitude towards Education**



Note: All figures are in %.

Source: Data collected by Author.

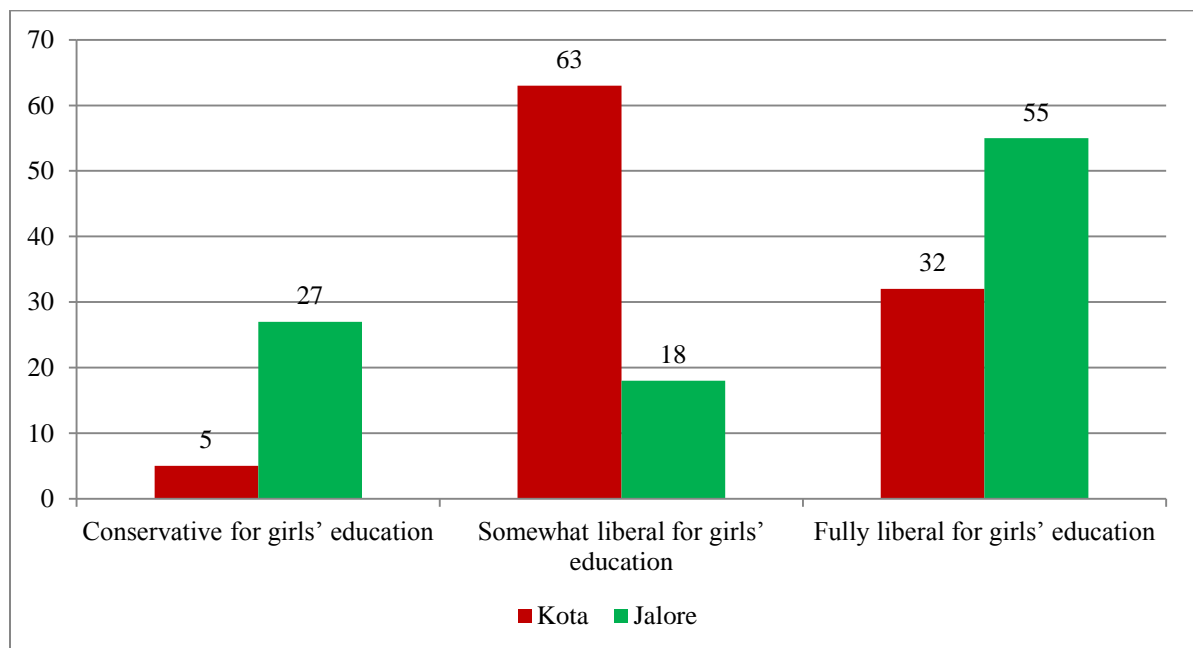
### **6.5.5: The Relationship between Media Exposure and Households' attitude towards Girls' Education**

In a society, media had been playing a crucial role in socialization and adopting new social culture. During the fieldwork, one of the groups, women asserted that women education is not in our culture'. Women are supposed to do household chores and child-rearing and bearing. Therefore, they do not motivate their girls to continue their studies. However, through the modes of new media, society is getting exposed to new social cultures which motivate people to support women education. Though many can claim that through a new mode of media, girls are getting exposed to bad culture and there are several news reports that in many states panchayats (especially khap panchayats) have barred the girls to use phones and restricted them to wear modern clothes like jeans and skirts. They believe that TV has spoiled the girls and they are getting exposed to ill-habits. People are watching more crime-based serials (like *Savdhan India* or *Crime Patrol*) which show how females are insecure in society and as a result, they don't send

their girl child to schools. Nonetheless, one cannot ignore the merits of these modes of media communication. Even, governments are using these platforms to advertise their policies and programmes through TV, radios, and newspapers. Many TV channels have taken social ills existed in Indian society such as child marriage and advocated women empowerment<sup>1</sup>and these TV serials have an impact on viewers especially the women viewers who asserted that through these serials they get the motivation to send their girls to schools. Data from the present study also confirm the claim as 54 percent of the households said that these serials related to women empowerment in this means of propaganda inspire them to educate their girls.

The data also suggest that people/households in Jalorewho are highly exposed to media (consumers of TV, radio, and Newspapers) strongly support women education. Around one of five households having high media exposure is conservative for girls' education whereas 55 percent of the households having high media exposure fully support the women education. There is no clear association between media exposure and support for women education in Kota.

**Figure 6.6: Relationship between high Media Exposure and Households' attitude towards Education**



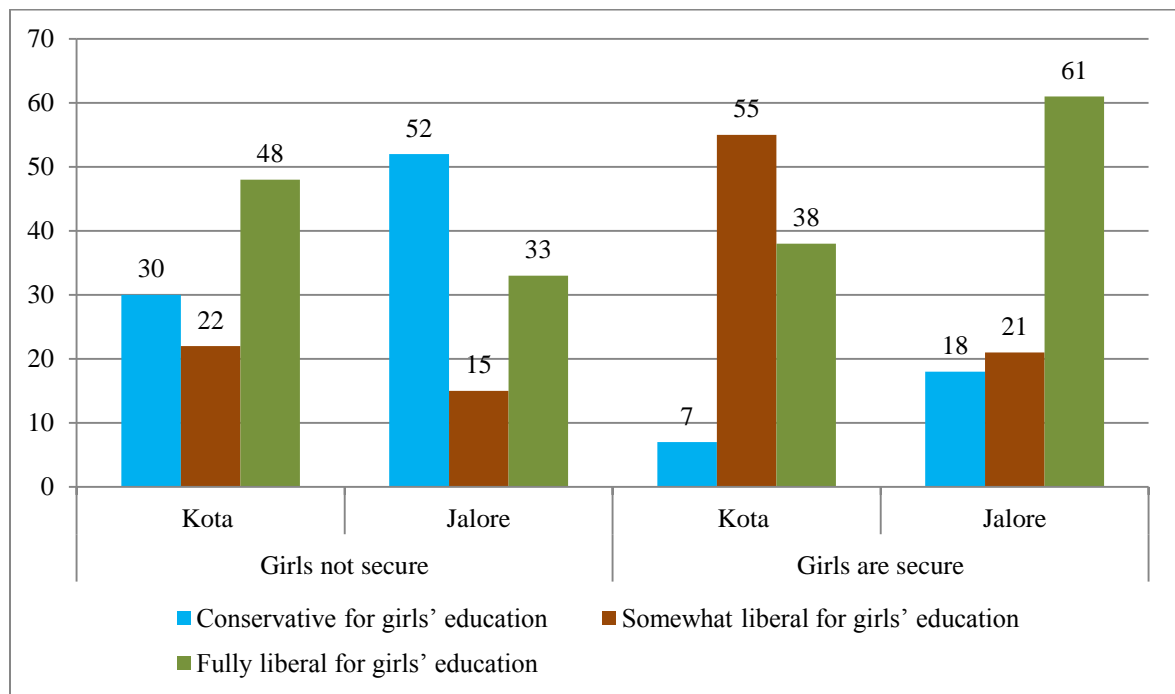
*Note: All figures are in %.*  
*Source: Data collected by Author.*

<sup>1</sup>. There are many TV serials which support women education, raised voice against child marriage, etc.

**6.5.6: The Relationship between Safety and Security for Girls and attitude towards girls' Education**

One of the concerns which obstruct women education is the safety and security for them. It is believed that in a society which practices violence against women, the women rights would be curbed in many ways. Parents would be skeptical about girls' safety about outside the house. Especially in the schools, girls may face various forms of violence at the hands of teachers, peers and other people in the school environment. If parents find out school isn't safe for their daughters, they may remove them from school. Amongst many barriers to girls' education, the violence makes them more vulnerable to it. For some girls, lack of safety in or around schools is the chief obstacle to getting an education.

**Figure 6.7: Relationship between Girls' Security and Households' attitude towards Educations**



*Note: All figures are in %.*  
*Source: Data collected by Author.*

## 6.6: Regression

Before choosing a regression model, the first step is to look at the nature of the dependent variable. In this chapter, the dependent variable is an ordinal variable which ranges from fully conservatives attitude of respondent on women education to fully liberals attitude of respondents. When the dependent variable is an ordinal variable which provides a ranking in the choice we apply Ordered choice model. To be specific, dependent variable should have at-least minimum three categories in systematic order which ranges from either low to high or high to low. In practice, we reduce the categories in binary format and run a logit regression but this practice cannot provide the ordinal variations occurred between each category. Therefore, the ordered logit model is used to take the probabilities into consideration of one event in comparison to the other events ordered before it. The ordered logit model calculates the cumulative probability and can be defined into four different odd models – like a proportional odd model, non-proportional odd model, partial odd model and constrained or unconstrained partial proportional odds model.

The result of cumulative probabilities of a dependent variable having N categories always comes as N-1 equation. For instance, if the dependent variable has four categories, the equation will be presented as three binary logit equations comparing the following groups – category 1 vs categories 2 3 4 (first equation); categories 1, 2 vs 3 4 (second equation; and 1,2,3 vs 4 (third equation). It means that for each binary equation the first groups would be written as 1 and the second group would be 0. We can take the example of the first equation which would be coded as 1 =1 and second category 2, 3 and 4 =0.

It means if the proportion of members of the statistical population who would reply strongly disagree, disagree, agree, and strongly agree are respectively  $p_1, p_2, p_3, p_4$ ; then the logarithms of the odds(not the logarithms of the probabilities) of answering in systematic ways are:

$$\text{Strongly disagree, } \log \frac{p_1}{p_2 + p_3 + p_4} \quad (1)$$



$$\text{Strongly disagree, disagree,} \quad \log \frac{p_1+p_2}{p_3+p_4} \quad (2)$$

$$\text{Strongly disagree, disagree, Agree,} \quad \log \frac{p_1+p_2+p_3}{p_4} \quad (3)$$

We cannot take the odd of 4<sup>th</sup> category of the dependent variable because the probability of the odd adding together would be summed up to the 1.

### 6.6.1: Proportional Odds Model

Proportional odds model (POM) is an ordered logistic regression model based on the estimate of the cumulative probabilities. This model arises when the dependent variable is ordinal and parallel lines assumption met between categories (Brant 1990; Fullerto and Xu 2012).

An ordered logit model for an ordinal response  $Y_i$  with C categories is defined by a set of C-1 equations where the cumulative probabilities  $g_{ci} = \Pr(Y_i < y_i | X_i)$  are related to a linear predictor  $\beta' X_i = \beta_0 + \beta_1 X_{1i} + \beta_2 X_{2i} + \dots$  through the logit function.

Proportional odd model, using cumulative frequency can be written as:

$$pr(Y_i \leq y_i | X_i) = \left[ \frac{\text{Exp}(\mu_c - \beta' X_i)}{1 + \text{Exp}(\mu_c - \beta' X_i)} \right] \quad C=1, 2, \dots, C-1$$

Using natural logarithm of the odds ratio of the model, this equation can be articulated in linear form as follow:

$$\text{Logit}[g_{ci}] = \log \left[ \frac{g_{ci}}{1-g_{ci}} \right] = \log \left[ \frac{pr(Y_i \leq y_i | X_i)}{pr(Y_i > y_i | X_i)} \right] = \mu_c - \beta' X_i, \quad C=1, 2, \dots, C-1$$

In these equations,  $Y_i$  is ordered categorical dependent variable,  $X_i$  vector of independent variables, parameter  $\mu_c$  which is known as threshold point or commonly known as a cut point, are in increasing order ( $\mu_1 \leq \mu_2 \leq \dots \leq \mu_{C-1}$ ).  $\beta'$  is a vector of logit coefficients of regression corresponds to  $X_i$ .

While applying ordered logit regression we need to check the parallel lines assumption. According to this assumption, the categories of the dependent variable are parallel to each

other. In other words, when the categories of the dependent variable change, the relationship between independent variable and dependent does not change. More precisely the parameter estimates do not observe change according to the cut off points (Fullerton and Xu, 2012).

If the assumption violates, the condition of parallelism related to categories breaks down. In this case, the Non-Proportional Odds model (generalized ordered logit model) and partial proportional odds model are the alternative models. To test the parallel line assumption we generally use Brant test (Brant 1990), Wald test (Williams 2006) or other similar tests. When Brant value get violated for all the independent variables then one can use non-proportion odd model, also known as generalized ordered logit model. But if Brant value does not get violated for each independent variable rather only some of the variable fail the Brant test, in that case, the partial proportional odd model can be used.

To understand the impact of the various independent variables on our dependent variable having three sequential categories, we used proportional odd model (POM) (see the result Table A3.10 in Appendix 3). A parallel line assumption test was done after POM and found the parallel line assumption was violated. The Brant values for both Jalore and Kota were violated and values were more than 0. Williams (2016) suggested if Brant value is more than zero, the result of POM could be misleading. Therefore, it was suggested to apply a non-proportional odd model (non-POM) popularly known as generalized ordered logit model.

### ***6.6.2: The Generalized Ordered Logit Model***

Generalized ordered logit model (Non-POM) is suggested by Fu(1998). It explains that the effect of independent variables is not the same on the odds of the dependent variable. Further,  $\beta$  coefficients are different for each category of the dependent variable. Generalized ordered logit model can be written as:

$$pr(Y_i \leq y_k | X_i) = \left[ \frac{Exp(\varphi_k - \beta'_k X_i)}{1 - Exp(\varphi_k - \beta'_k X_i)} \right] \quad k=1, 2, \dots, K-1$$

This equation can be expressed in linear form by taking the natural logarithm of the odds ratio of the model as follow:

$$\log\left[\frac{g_{ci}}{1-g_{ci}}\right] = \log\left[\frac{pr(Y_i \leq y_i | X_i)}{pr(Y_i > y_i | X_i)}\right] = \varphi_k - \beta'_k X_i, \quad k=1, 2, \dots, K-1$$

At this time,  $\varphi_k$  is considered as an estimator of unknown parameter and threshold value indicating K-1 estimators  $\varphi_1 \leq \varphi_2 \leq \dots \leq \varphi_{k-1}$ , in increasing order.  $\beta'$  is a vector of the regression coefficient representing  $X_i$ .

### ***6.6.3: Discussion on non-POM Result***

A study looks at factors that influence the people to support for women education in Rajasthan and try to compare two districts Kota (having high women literacy rate) and Jalore (having low women literacy rate). The dependent variable ‘support for women education’ is an ordinal variable having three categories 0 ‘low support’ 1 ‘moderate support’ and 2 ‘high support’. Therefore, three non-POM were used- one for Kota (310 observations) another for Jalore (308 observations) and a pooled model (618 observation). For the analysis, nine independent variables were included in the model (see the list of variables in Table 6.2). The likelihood ratios for Kota and Jalore are -- 257.765 and -257.043 respectively. The p-value of both models is of .0000 which assures that both the models as a whole are statistically significant, as compared to the null model with no predictors.

The result of non-POM suggests that social and neighbourhood factors affect people’s perception in supporting women education. These factors shapes people’s mind whether they hold conservative or liberal attitude towards women education in society. The model used for pooled data suggest that educated neighbourhood and neighbourhood which have positive and new thinking on social issues are more likely to support women education. The finding of non-POM suggested that these two factors are statistically significant for both the equations and holds a positive relationship with the liberal attitudes. If a household lives in a neighbourhood which is more educated and open-minded, are more likely to be liberal towards girls' education than household who live in the surroundings of non-literate and conservative people. This indicated that educated and open-minded neighbourhood pushes households away from being conservative towards

girls' education. The educated neighbourhood has a positive effect in Kota where the result is significant. In Kota, if people live in the educated neighbourhood they are more likely to hold liberal attitude towards girls' education and the trend is true for both the equation used in the non-POM analysis, whereas this factor is not significant in Jalore in presence of other variables. In fact in Jalore, the thinking of the neighbourhood is a more important factor than an educated neighbourhood. If household lives in a neighbourhood which is progressive in their thinking, the support for women education increases in Jalore.

In a traditional society like Rajasthan, the marriage and groom hunting for girls was also stated as the reason for not providing high education to girls this reflected in the focus group discussions during fieldwork. The factor holds true for the regression analysis. This holds true for Kota for both the equations, but for Jalore it is true for only the second equation. A question was asked to households whether they think that it is difficult to find a bridegroom for an educated girl or not. Those who believe that it is not difficult for the households to find a bridegroom for marriage for their girls they are more likely to be liberal.

The government of Rajasthan has introduced various schemes to improve the condition of women and their level of educational attainment. The objective of these schemes was to give benefits to the girls and their households if they go for higher education. Therefore, it was hypothesized that if the household would be aware of such schemes they would be more likely to support women education. This result shows that some of the policies/schemes are making an effect in shaping people's mind towards women education. For instance, if the household is aware of a policy which ensures reservation for women in government jobs, they are more likely to be liberal towards women education. This holds true for the first equation of Kota but not hold for Jalore. In Jalore people's awareness about the reservation of women in Panchayat has a greater impact. Therefore, we can say that to some extent the policies or schemes introduced by the government have an impact on people's perception.

The most important and significant factor is women's security in the neighbourhood as well as at the school which affects people's perception towards the girls' education. It is significant for both Kota and Jalore in both the equations; if people believe that their girls

are safe and secure in their locality and schools they are more likely to support women education. In a nutshell, we can surely assert that other than the socio-economic factor, the neighbourhood and social and political set up can push for the greater support for women education.

**Table 6.4: Generalized Logit Model (Non-Proposal Odd Model)**

Support for women Education	Pooled		Kota		Jalore	
	Coef.	SE	Coef.	SE	Coef.	SE
Mleq1						
Educated neighbourhood	1.053***	0.276	1.696***	0.488	0.274	0.352
Open minded neighbourhood	0.726***	0.254	-0.172	0.441	1.721***	0.424
Perception about groom hunting	0.668***	0.235	1.224***	0.471	0.332	0.302
Awareness about cycle policy	0.518*	0.311	1.125	0.910	0.095	0.379
Awareness about Dhanlakshmi policy	0.147	0.324	-17.862	3470.1	0.276	0.380
Awareness about reservation in local government	-0.094	0.312	-0.625	0.587	0.174	0.436
Awareness about reservation in government job	0.772**	0.372	1.079*	0.575	0.917*	0.543
Level of media exposure	-0.053	0.161	0.027	0.302	-0.047	0.210
Index of girls' security	1.273***	0.284	1.355**	0.536	2.531***	0.520
_cons	-1.408	0.348	16.044	3470.1	-2.346	0.597
mleq2						
Educated neighbourhood	0.341	0.251	1.097**	0.456	0.081	0.334
Open minded neighbourhood	0.495***	0.190	0.183	0.287	0.808***	0.297
Perception about groom hunting	0.730***	0.177	0.829***	0.277	0.680**	0.263
Awareness about cycle policy	0.248	0.235	0.274	0.509	0.729**	0.312
Awareness about Dhanlakshmi policy	-0.466**	0.236	0.431	0.526	-0.303	0.311
Awareness about reservation in local government	0.405**	0.202	0.149	0.303	0.834***	0.321
Awareness about reservation in government job	0.125	0.221	0.249	0.308	0.157	0.362
Level of media exposure	-0.221*	0.118	-0.022	0.182	-0.281	0.179
Index of girls' security	0.186	0.259	-1.067***	0.382	1.824***	0.470
_cons	-1.109	0.314	-1.876	0.620	-2.544	0.548
<i>Number of obs</i>	618		310		308	
<i>Model chi2(18)</i>	121.8		78.24		83.38	
<i>Prob&gt; chi2</i>	0		0		0	
<i>Pseudo R2</i>	0.0973		0.1318		0.1396	
<i>Log Likelihood</i>	-565.3065		-257.7656		-257.0436	

Note: \*\*\*, \*\* and \* are assigned for significant level for 1 percent, 5 percent and 10 percent respectively.

## **CHAPTER 7**

## **CONCLUSION**

In general, development is always linked to the economy and growth in income, but several developmental thinkers have emphasized the need to redefine the meaning of development. A concrete example for this shift was visible in 1980s when the economists widened the scope of developmental indicators and used overall human development to measure the economic growth in countries. Human Development Index was introduced; and education became one of the indicators which explained development in a larger perspective.

In India, emphasis has been given to increase the reach of education to the marginal sections of the society with an aim to enhance human capital which can contribute in the economic growth of India. The government of India and state governments have introduced various schemes and policies to improve the condition of education in India; but despite these, there is a huge social divide in achieving universal education. People from marginalized castes and communities have low access to education as compared to upper castes. In addition, women within each section are more vulnerable and do not get equal access to educational opportunity. As a consequence, the participation of girls in education is very low and even when they get access to education; there is a much higher probability of them dropping out from the schools as compared to boys. This unequal access to educational opportunity makes their condition worse in the social structure.

The women literacy is the worst in Rajasthan amongst all Indian states. The states which were at the same level of education as Rajasthan have improved their status in literacy rate. There is no doubt that even the state of Rajasthan has improved a lot on the educational parameters over the decades and has successfully implemented the Right to Education. While the participation of girls in elementary schools has increased, there in at secondary schools is not satisfactory.

The government of Rajasthan has also launched various schemes and policies to improve the status of education with more emphasis to women education, but its targets could not be successfully achieved. During the same time period, the educational policies launched by other states impacted the level of education in a positive manner, especially in the case of women education. Not only does this differential exist inter-state, but it is also

observed intra-state within Rajasthan. With the same policies and schemes launched by the Rajasthan government, some districts of Rajasthan have performed well on the parameter of the literacy rate, while performance of some districts is way below the state average and this prompted us to find out the reasons for the regional and intra-state variation.

This study has taken the discussion further and aimed to solve the puzzle of the regional disparity using comparative method. The objective of the study was to find out the reasons responsible for the huge gap in male-female literacy rate despite implementing several policies and schemes related to education. It also tries to investigate whether socio-economic status of the family is sufficient to explain the existing gender divide in Rajasthan or any inherited societal factors could explain this pattern systemically. The study also aims to assess the quality of education being provided to the children at schools in Rajasthan.

A comparative method was used in the study where two districts of Rajasthan, namely Kota and Jalore were selected. The reason for choosing these two districts was to draw comparisons. Kota district of Rajasthan has the highest level of literacy, while Jalore has the lowest literacy rate. A mixed methodology was used where household survey was conducted using standardised interview schedule (questionnaire) in Hindi language; and during the fieldwork, focus group discussions were also done for the thick description. Using face to face interview, 310 interviews were completed in Kota and 308 interviews in Jalore. Questions were asked on various indicators like level of educational attainment of the family members, kind of educational institutions they approach, the distance of schools of different levels, opinion on various social issues related to girls' education, awareness about government policies and quality of learning outcome (see the annexure for the questionnaire and codebook used for the study).

There are various factors that can contribute to the improvement of the girls' education, like effective policies by the government, participation and intervention of local organisations/government and school itself. The government's flagship programme SSA can be seen as a good example of this kind of collaboration which was done to improve



the accessibility of schools and educational institutions. On the other hand, for increasing enrolments and retention at schools, the schemes like mid-day meal, free textbook and uniforms were quite effective. It helped in increasing enrolment and retention in schools. At the same time, the schemes like 'free cycle' and 'laptops' are great ideas to include women in the higher education system. Girls who used to dropout from the school due to distance and could not enrol themselves in secondary schools have started enrolling because of the free cycles. It enabled them to travel long distances to reach their school. Infrastructural development also improves the likelihood of higher participation of women in higher schooling. For instance, the lack of separate toilets with running water was one of the reasons for girls' dropout. The government has taken the initiative under *Swachh Bharat* mission to make separate working toilets for women at schools to curb the dropout.

Higher enrolment and retention alone cannot improve women's status in India. It's the kind of quality education a girl is getting that is more important to give them a voice and make them aware about their rights in the society. The study showed that the quality of education provided to students in the government schools is not good. There is a district wise differential in the learning outcome. The level of learning outcome is poor in Jalore in comparison to Kota district. It also revealed that the girls are more likely to be sent to government schools as private schools are more expensive. Parents do not want to invest that much in a girl's education. Therefore, the quality of education must improve in government schools so that the students studying there could develop the skills and confidence through quality education and avail its benefits without any gender discrimination.

The study has underlined the various factors that hinder women education such as social and economic position of the households; the family size, as in big families, girls are more likely to dropout as boys' education is preferred to girls'; numbers of dependent siblings at home as the girls have to leave school to take care of their younger siblings; and educational mobility in the household. Other than these household factors, the infrastructure has also played an important role in improving girls' education. For

instance, if secondary schools are not closely located, there are higher chances of dropping out, especially for women.

Along with social and infrastructural factors, attitudinal factors also influence people's perception towards girls' education. This study has outlined factors such as awareness about educational schemes and policies; opinion on girls' safety and security and neighbourhood factors, which shapes individual's perception towards women education. In India, supporting women education is not an easy task as education would open the doors for equal occupational opportunities as men. There is a perception that men and women are not equal and they cannot enjoy the same status as men. This perception is deep rooted in the Indian culture and social structure.

## **7.1: Suggested Mechanisms**

The discussion about the findings which came out from the study enable us to devise a few mechanisms which can facilitate the support for women education and bridge the gender divide existing in the Indian education system, especially at secondary level. The next section broadly discusses the possible mechanisms for controlling dropout; improving the quality of education; and motivates parents to send their children to schools.

### ***7.1.1: Controlling Dropout***

The first mechanism to improve the education system is to control the dropout rate in the state. In the study, it was observed that the educationally backward district of Jalore has higher dropout rate than Kota. Generally it was seen that there is no particular time like harvesting, festivals or marriage season that leads to discontinuity in studies. Rather there are several other reason which are responsible for the dropout. The most important reason is that the children and their parents are not aware of the value of schooling which reduces their motivation to get quality education. The second factor that leads the boys to discontinue their education is either migration or their participation in economic activities. On the other hand, the girls mostly leave schools to attend their household chores or marriage. For controlling dropout due to migration, the government can make

some effective labour laws to control participation of children (below 16 years) in any kind of full-day paid or hazardous work so that they can focus on their schooling.

This was noticed during the survey in Rajasthan, especially in Jalore, where most families reported that their male family member and young male children have migrated to the neighbouring states for employment without completing their schooling. Young boys around the age of 14, work at shops or factories to earn their livelihood. Therefore, it is high time that some strict laws are laid down to control the working condition and working hours of the minors. India can look into the existing labour laws in developed countries where they have specified the working hours of students on various occasion. For instance, students are allowed to work for 18 hours a week during school sessions and 40 hours a week if schools are not in session.

#### ***7.1.2: Improve the Quality of Education at Government School***

The study indicates that the quality of education students are getting in the state is not so good. Their learning outcome is not up to the desirable standard, especially among the students studying in government schools. On the other hand, children studying in private schools perform much better on the set parameters. Therefore, there is a dire need to check the quality of education provided at the government schools. Teachers can play an important role in shaping the knowledge process of the students through innovative teaching learning process and in return teacher should get incentive either in monetary form or in the form of a letter of appreciation.

The finding from the study reveals that the parents are opting for non-aid private schools over government schools in Rajasthan. The most cited reason for this shift was the quality of education provided by the private schools. Therefore, it is high time we find possible ways through which quality can be improved in government schools. For instance, the head-master can get directly involved with the parents by establishing parent-teacher committees which meet regularly to assess the quality of education their children are getting in the school and assess their progress. Information about improved quality at government schools will be spread by the parents in their neighbourhood and

people who are sending their children to private schools will be incentivised to switch to government schools.

The government should assess the quality of schools and give awards to the schools which perform better in providing good results together with improved infrastructure. This will motivate other schools to perform better to win the award. Households should also be awarded for sending their children to schools regularly. A similar kind of programme named 'PROGRESSA' was evident in Mexico.

### ***7.1.3: Motivating People to Support Girls' Education through Policies***

In Indian families, having sons is always preferred over daughters as sons are considered as the name-bearer of the family. Sometimes the bias for sons increases the family size leading to more daughters in families. This trend is comparatively more visible in poor households. In these conditions, the possibility is that the education of girls of these families would be sacrificed. Therefore, the government should take cognizance and make legislation on family size and educate people about family planning. Through this kind of activities, the families would understand the benefits of smaller families and its economic implications.

Also, the government should deal with the attitude towards son bias existing in Indian families. It can be done through revising the inheritance right for daughters and by providing social and economic security to the people in their old age. It will reduce their dependency on their sons.

Another important factor which affects people's perception towards women education is the neighbourhood factor. The educated and progressive neighbourhood positively affects the perception towards women education. Therefore, the government should organize community level adult educational mission so that people can get exposed to education and its importance. Through these programmes, members of the communities can be given charge to motivate people in their locality to get education themselves and support education of their children, especially girls.

## **7.2: Limitations of the Study**

While analysing the data for the study, I encountered some limitations. Most of the limitations were part of the research design. Therefore, this section outlines the limitations of the present study. The first limitation was associated with the representation of the sample. The data was not representative on basis of locality. While sampling the locations from each tehsil, an available list of villages and towns was used from census 2011. The locations were selected using systematic random sampling. After drawing final sampling frame, all the locations in the sample were rural. Therefore, I was unable to use locality variable to present the different pattern in rural and urban areas.

The second limitation was linked to the representation of Muslims in Kota district. The respondents from each sampled locality were chosen using simple random sampling method after reaching the field location. In Jalore, we got good representation of Muslim households, but no Muslim household were covered in Kota; due to which the religion variable was not used in the final model. In Jalore, we can clearly see the variation in the responses and educational attainment on the basis of religion but this could not be compared with the pattern in Kota.

The next limitation was related to survey design. After reading the various literatures on educational mobilization, we noticed that mothers' educational attainment has greatest impact on the girls' education. However, the present questionnaire could not use this indicator to explain the girls' educational attainment. Similarly, a child between 6-14 years age was selected and asked to take up the learning test to assess the quality of education,. But the gender of the child was not ascertained in that section which constrained me in the evaluation of the gender wise difference in learning outcomes.

The final limitation encountered was the general problem which is usually faced in survey research, i.e. to get the income level of the households. People were not ready to disclose their household income and those who responded have under-reported their income. Nonetheless, the type of occupation the household was involved in is used as a proxy of economic status of the household.

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## APPENDIX 1: ADDITIONAL TABLES FOR CHAPTER 3

**Table A1.1: State-wise Preference for Government Schools by Caste Groups**

Going to Govt school	SC	ST	OBC	Other
Jammu & Kashmir	78	52	79	58
Himachal Pradesh	82	77	57	54
Punjab	47	60	37	25
Chandigarh	67	NA	78	48
Uttarakhand	50	69	51	63
Haryana	62	64	43	26
Delhi	53	77	64	50
Rajasthan	75	58	40	30
Uttar Pradesh	37	51	35	26
Bihar	77	87	77	60
Sikkim	73	83	63	52
Arunachal Pradesh	83	92	94	89
Nagaland	32	0	42	33
Manipur	62	48	48	63
Mizoram	65	0	NA	31
Tripura	89	90	86	88
Meghalaya	42	0	0	49
Assam	87	85	81	81
West Bengal	86	89	80	73
Jharkhand	71	76	67	44
Odisha	86	77	69	53
Chhattisgarh	83	69	68	32
Madhya Pradesh	81	69	51	32
Gujarat	78	65	61	26
Daman & Diu	55	57	65	24
D & N Haveli	86	73	56	27
Maharashtra	65	46	42	30
Andhra Pradesh	73	63	41	25
Karnataka	57	63	44	32
Goa	52	31	9	31
Lakshadweep	92	NA	NA	NA
Kerala	81	58	38	31
Tamilnadu	72	59	35	24
Puducherry	0	61	41	40
A & N Islands	93	NA	78	79
Telangana	50	43	28	16
All India	69	65	49	44

*Note: All figures are in %.*

*Source: NSSO 71<sup>st</sup> Round*

**Table A1.2: State-wise Preference for Government Schools by Occupation types**

Govt. school	Self-employed in agriculture	Self-employed in non-agriculture	Regular wage workers	Casual labour in agriculture	casual labour in non-agriculture	Other occupation
J&K	62	54	60	90	84	39
Himachal Pradesh	64	45	62	75	86	47
Punjab	26	34	54	82	69	23
Chandigarh	54	58	66	NA	33	50
Uttarakhand	67	53	60	95	84	49
Haryana	28	34	50	91	81	29
Delhi	54	57	78	50	75	50
Rajasthan	44	35	45	78	77	36
Uttar Pradesh	33	29	33	66	56	31
Bihar	71	72	72	98	94	65
Sikkim	81	54	63	NA	100	67
Arunachal Pradesh	90	75	79	100	100	76
Nagaland	47	22	28	NA	100	45
Manipur	59	47	52	40	33	49
Mizoram	76	52	59	NA	89	67
Tripura	91	85	83	100	99	77
Meghalaya	45	33	44	90	65	16
Assam	85	79	75	96	96	67
West Bengal	73	73	83	96	95	67
Jharkhand	67	57	60	97	87	48
Odisha	74	55	66	93	92	56
Chhattisgarh	69	44	74	92	93	37
Madhya Pradesh	52	36	60	87	87	30
Gujarat	48	42	63	91	94	43
Daman & Diu	42	43	69	NA	100	0
D & N Haveli	74	61	75	NA	100	25
Maharashtra	38	29	44	69	75	32
Andhra Pradesh	34	31	46	73	70	17
Karnataka	43	29	54	74	67	14
Goa	33	18	31	75	21	35
Lakshadweep	96	92	88	87	67	89
Kerala	31	36	45	58	57	27
Tamilnadu	32	30	47	66	63	34
Puducherry	40	29	68	81	69	35
A & N Islands	93	71	74	60	89	63
Telangana	30	22	34	55	58	4
All India	50	44	55	81	77	42

Note: All figures are in %.

Source: NSSO 71<sup>st</sup> Round

**Table A1.3: State-wise Dropout by Caste Groups**

<b>Dropout</b>	<b>SC</b>	<b>ST</b>	<b>OBC</b>	<b>Others</b>
Jammu & Kashmir	53	34	36	33
Himachal Pradesh	16	24	10	11
Punjab	13	25	14	14
Chandigarh	0	13	5	7
Uttarakhand	0	4	6	5
Haryana	12	17	16	9
Delhi	7	36	19	19
Rajasthan	57	35	31	22
Uttar Pradesh	11	20	18	12
Bihar	32	38	23	11
Sikkim	43	67	29	46
Arunachal Pradesh	48	80	0	77
Nagaland	10	0	17	33
Manipur	16	24	17	4
Mizoram	53	NA	NA	40
Tripura	58	64	64	54
Meghalaya	51	40	0	51
Assam	29	42	42	41
West Bengal	51	51	49	43
Jharkhand	25	31	24	12
Odisha	55	55	49	35
Chhattisgarh	31	34	31	24
Madhya Pradesh	42	31	32	20
Gujarat	54	27	33	17
Daman & Diu	41	33	9	41
D & N Haveli	73	0	100	32
Maharashtra	57	44	36	30
Andhra Pradesh	56	46	48	39
Karnataka	48	42	38	31
Goa	74	50	44	22
Lakshadweep	45	NA	NA	NA
Kerala	52	53	41	19
Tamilnadu	46	39	27	16
Puducherry	67	48	33	50
A & N Islands	51		40	54
Telangana	27	35	22	24

*Note: All figures are in %.*

*Source: NSSO 71<sup>st</sup> Round*

**Table A1.4: State-wise Reasons for Dropout**

State	not interested in education	financial constraints	engaged in domestic activities	engaged in economic activities
Jammu & Kashmir	17	23	14	16
Himachal Pradesh	16	12	21	14
Punjab	18	22	14	18
Chandigarh	20	17	10	16
Uttarakhand	13	10	30	16
Haryana	26	12	17	15
Delhi	17	11	13	18
Rajasthan	21	10	22	16
Uttar Pradesh	21	22	16	12
Bihar	20	16	25	14
Sikkim	26	5	8	12
Arunachal Pradesh	18	21	15	10
Nagaland	17	8	14	17
Manipur	12	20	23	20
Mizoram	27	10	16	19
Tripura	6	36	6	6
Meghalaya	20	15	13	25
Assam	16	21	20	20
West Bengal	21	33	9	11
Jharkhand	20	12	23	17
Odisha	24	25	14	11
Chhattisgarh	29	15	15	15
Madhya Pradesh	22	14	21	15
Gujarat	19	12	18	18
Daman & Diu	9	35	9	15
D & N Haveli	15	22	6	9
Maharashtra	17	15	15	22
Andhra Pradesh	31	17	11	13
Karnataka	20	18	14	21
Goa	27	24	18	2
Lakshadweep	13	5	6	26
Kerala	17	14	6	16
Tamilnadu	23	21	10	19
Puducherry	26	24	6	29
A & N Islands	48	10	8	13
Telangana	16	15	14	22
Total	20	18	16	16

Note: All figures are in %.

Source: NSSO 71<sup>st</sup> Round



## APPENDIX 2: ADDITIONAL TABLES FROM CHAPTER 5

### Goodness of fit

Goodness – of –fit statistic examines the fit of a logistic model against the data. Inferential tests and descriptive measure(R-squared) are main tools to access the fitness of the model. Among the various R-squared analogue Menard's (2000) empirical study suggest that McFadden's(1973) likelihood ratio index(Rho-squared) or pseudo R-squared is preferred over others. But a more useful measure of goodness of fit is a summary of the predictive ability of the model is a classification table.

The degree to which predicted probability match with actual outcome is examined as a classification table. There are three type of classification table to show the validity of predicted probability. (1) The two way classification table ( $2 \times 2$  table), (2) the prediction success table, (3) the histogram of predicted probability.  $2 \times 2$  table is a more useful measure of goodness of fit. In this table rows represent the two possible outcome and columns represent the high and low probability, based on cut-off point. The proportion of correctly predicted  $Y=1$  observation is called the model's sensitivity. It is also called the true positive fraction. The percentage of correctly classified  $Y=0$  observation is defined as model's specificity. Hence 1-specificity is the proportion of observation misclassified as an event (fraction of  $Y=0$  that are incorrectly classified as  $Y=1$ ). It is also called the false positive fraction. The cut-off point can vary across the whole range of the probability in the interval  $\{0, 1\}$ .

### Receiver Operating Characteristic Analysis

Receiver operating characteristic (ROC) is a graph of sensitivity verses 1-specificity, across all cut off point (Hosmer & Lemeshow, 2000, p.160-164). Both sensitivity and 1-specificity changes as a function of the cut-off on estimated probability. Because each cut-off belongs to specific sensitivity and specific specificity, the ROC curve is the graph based on multiple cut-offs. The model with greater the area under the ROC curve is considered a batter performance model (Afifi & Clark, 1990). A model with no predictive power would have a 45-degree line, with a ROC area of 0.5.

Using household-level data, we estimate equation for Jalore and Kota areas. In order to evaluate the power of the model to discriminate between an individual aged 14 and above and below 25 years who are secondary pass and those who aren't, the sensitivity and specificity of the model are measured. Sensitivity estimate the ability of the model to correctly predict the actual secondary pass and specificity measure the ability to correctly predict not secondary pass. Since the estimated value for the dependent variable (completion of secondary education between age 14 and above years and below 25 years) is probability lying between 0 and 1, the classification of the estimated probability (into secondary pass and not pass) depends on a particular cut-off probability value. This cut-off probability depends on the need of the research specification. By default, the probability value of 0.5 was selected as the cut-off to analyze our classification.

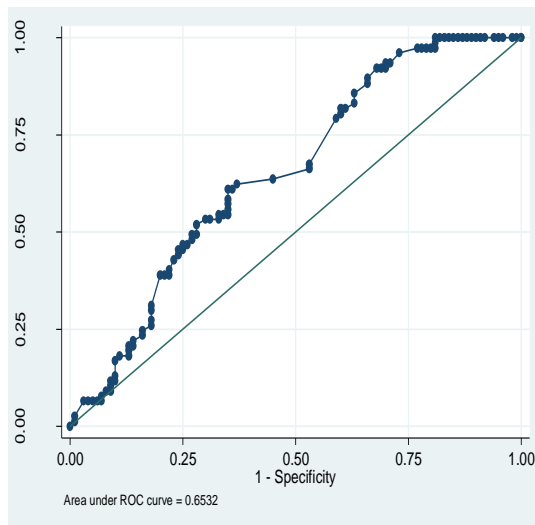
**Table A2.1: Sensitivity and Specificity of Different Estimated Model**

Models	Classification Table for predicted probability of Secondary Education			
	Sensitivity (%)	Specificity (%)	Correctly Classified (%)	Area Under ROC
Kota Male	44.16	76.00	62.15	0.66
Kota Female	38.71	86.67	71.57	0.77
Jalore Male	39.36	87.43	70.11	0.72
Jalore Female	5.26	99.42	82.30	0.74
<i>Pooled</i>	<i>16.97</i>	<i>90.92</i>	<i>67.18</i>	<i>0.68</i>

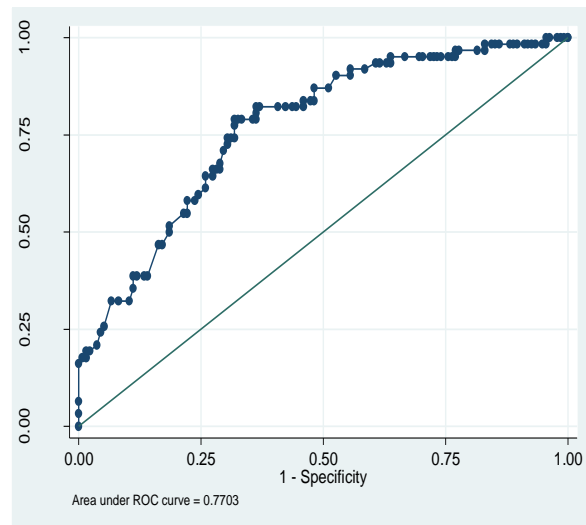
The estimated model for Jalore male (for cut off=0.5) correctly predicts the true secondary pass 66 percent of the time and the true not secondary pass 82 percent of the time. On the whole the model correctly predicts the actual secondary pass status 66 percent of the time. Figure (2) shows the ROC curve for the fitted models with sensitivity plotted on x-axis and 1-specificity on the y-axes. The 45-degree reference line is the line of non-discrimination and the 0.5 area below it represent the classification occurring purely by chance. The graph indicates that fitted model is quite adequate (since area under the ROC curve is 79 percent for Jalore male). Similarly, figure (2) shows that there is scope for improvement in terms of the predictive power of the models but all fitted models is still adequate (since a portion of the curve lies above the reference line).

**Figure A2.1: Receiver Operating Characteristic Curve for Estimated Models**

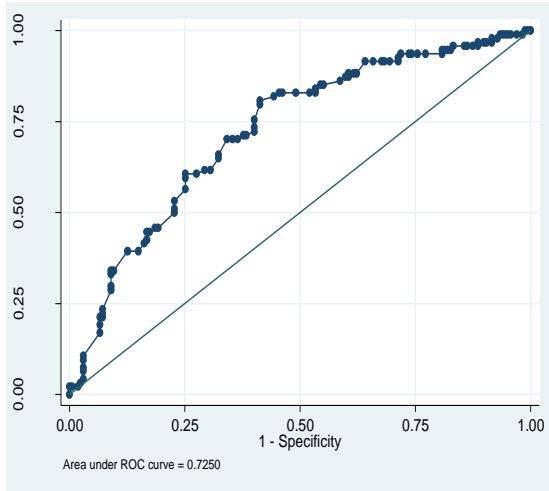
**Kota Male**



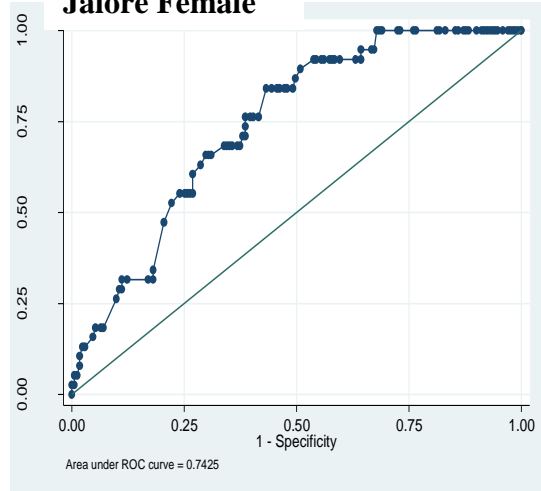
**Kota Female**



### Jalore Male



### Jalore Female



### APPENDIX 3: ADDITIONAL TABLES FROM CHAPTER 6

**Table A3.1: Relationship between the level of Education of Neighbourhood and Households' attitude towards Education**

	Not much-educated neighbourhood		Highly educated neighbourhood	
	Kota	Jalore	Kota	Jalore
Conservative for girls' education	39	37	6	18
Somewhat liberal for girls' education	39	20	51	20
Fully liberal for girls' education	23	43	42	62

*Note: All figures are in %.*

*Source: Data collected by Author.*

**Table A3.2: Relationship between the Neighbourhood's Mindset and Households' attitude towards Education**

	Conservative		Open Minded	
	Kota	Jalore	Kota	Jalore
Conservative for girls' education	16	33	8	13
Somewhat liberal for girls' education	53	23	48	18
Fully liberal for girls' education	31	45	44	69

*Note: All figures are in %.*

*Source: Data collected by Author.*

**Table A3.3: Relationship between Societal factors and Households' attitude towards Education**

	Bridegroom hunting is difficult		Bridegroom hunting is not difficult	
	Kota	Jalore	Kota	Jalore
Conservative for girls' education	18	27	5	18
Somewhat liberal for girls' education	51	26	48	16
Fully liberal for girls' education	38	47	47	66

*Note: All figures are in %.*

*Source: Data collected by Author.*

**Table A3.4: Relationship between Awareness about Cycle/Scooty Scheme and Households' attitude towards Education**

	Not aware about cycle/scooty scheme		Aware about cycle/scooty scheme	
	Kota	Jalore	Kota	Jalore
Conservative for girls' education	7	28	11	15
Somewhat liberal for girls' education	31	24	48	16
Fully liberal for girls' education	32	48	40	69

*Note: All figures are in %.*

*Source: Data collected by Author.*

**Table A3.5: Relationship between Awareness about Dhanlakshmi Yojna Scheme and Households' attitude towards Education**

	Not aware of dhanlakshmi yojna		Aware of dhanlakshmi yojna	
	Kota	Jalore	Kota	Jalore
Conservative for girls' education	0	26	12	16
Somewhat liberal for girls' education	68	20	48	20
Fully liberal for girls' education	32	53	40	64

*Note: All figures are in %.*

*Source: Data collected by Author.*

**Table A3.6: Relationship between Awareness about Reservation for Women in Panchayat and Households' attitude towards Education**

	Not aware of reservation for women in panchayat		Aware of reservation for women in panchayat	
	Kota	Jalore	Kota	Jalore
Conservative for girls' education	13	27	9	15
Somewhat liberal for girls' education	49	23	50	15
Fully liberal for girls' education	38	50	41	70

*Note: All figures are in %.*

*Source: Data collected by Author.*

**Table A3.7: Relationship between Awareness about Reservation for Women in Govt. Job and Households' attitude towards Education**

	Not aware of reservation for women in govt. job		Aware of reservation for women in govt. job	
	Kota	Jalore	Kota	Jalore
Conservative for girls' education	13	24	8	13
Somewhat liberal for girls' education	49	21	50	18
Fully liberal for girls' education	38	55	42	69

*Note: All figures are in %.*

*Source: Data collected by Author.*

**Table A3.8: Relationship between Media Exposure and Households' attitude towards Education**

	No media exposure		Low media exposure		High media exposure	
	Kota	Jalore	Kota	Jalore	Kota	Jalore
Conservative for girls' education	18	20	9	22	5	27
Somewhat liberal for girls' education	54	18	41	24	63	18
Fully liberal for girls' education	28	62	51	53	32	55

*Note: All figures are in %.*

*Source: Data collected by Author.*

**Table A3.9: Relationship between Girls' Security and Households' attitude towards Education**

	Girls not secure		Girls are secure	
	Kota	Jalore	Kota	Jalore
Conservative for girls' education	30	52	7	18
Somewhat liberal for girls' education	22	15	55	21
Fully liberal for girls' education	48	33	38	61

*Note: All figures are in %.*

*Source: Data collected by Author.*

**Table A3.10: Ordered Logit Regression**

	Pooled Data		Kota		Jalore	
	coefficients	P>z	coefficients	P>z	coefficients	P>z
Educated neighbourhood	0.681	0.00	1.464	0.00	0.206	0.49
Open minded neighbourhood	0.516	0.00	0.162	0.52	0.955	0.00
Perception about groom hunting	0.667	0.00	0.801	0.00	0.558	0.02
Awareness about cycle policy	0.387	0.09	0.471	0.31	0.584	0.05
Awareness about dhanlakshmi policy	-0.336	0.14	-0.230	0.62	-0.143	0.62
Awareness about reservation in local government	0.301	0.12	0.042	0.88	0.677	0.02
Awareness about reservation in government job	0.246	0.25	0.401	0.17	0.274	0.44
Level of media exposure	-0.201	0.07	-0.014	0.94	-0.215	0.19
Index of girls' security	0.621	0.01	-0.284	0.43	1.886	0.00
/cut1	0.127		-0.333		1.575	
/cut2	1.969		2.445		2.725	
Number of obs	618		310		308	
LR chi2(9)	74.93		37.02		69.09	
Prob> chi2	0		0		0	
Pseudo R2	0.0598		0.0624		0.1156	
Log likelihood	-588.743		-278.374		-264.185	

\* p < 0.05, \*\* p < 0.01, \*\*\* p < 0.001

**Table A3.11: Tests of the Parallel Regression Assumption**

Kota	Pooled data			Kota			Jalore		
	Chi2	df	P>Chi2	Chi2	df	P>Chi2	Chi2	df	P>Chi2
WolfeGould	52.59	9	0.00	50.87	9	0.00	12.02	9	0.212
Brant	62.25	9	0.00	-8043	9	0.00	11.61	9	0.236
score	53.7	9	0.00	50.3	9	0.00	13.8	9	0.13
Likelihood ratio	46.87	9	0.00	41.22	9	0.00	14.28	9	0.113
Wald	55.48	9	0.00	47.46	9	0.00	13.62	9	0.137

## ANNEXURE 1

State	District	Block	Village	Respondent
<input style="width: 40px; height: 20px;" type="text"/>	<input style="width: 40px; height: 20px;" type="text"/> <input style="width: 40px; height: 20px;" type="text"/>	<input style="width: 40px; height: 20px;" type="text"/> <input style="width: 40px; height: 20px;" type="text"/> <input style="width: 40px; height: 20px;" type="text"/>	<input style="width: 40px; height: 20px;" type="text"/> <input style="width: 40px; height: 20px;" type="text"/>	<input style="width: 40px; height: 20px;" type="text"/> <input style="width: 40px; height: 20px;" type="text"/> <input style="width: 40px; height: 20px;" type="text"/>

### Educational Attainments in Contemporary Rajasthan: An Analysis Focusing on Issue of Gender Disparity

Respondent's Name \_\_\_\_\_  
 Address \_\_\_\_\_  
 Village's Name \_\_\_\_\_  
 Block's Name \_\_\_\_\_  
 District's Name \_\_\_\_\_  
 Name of State      **Rajasthan**

Q1 .Detail of members, Who lives in your house?

S. No	Name	Sex (Code)	Relation with Respondent (See Code)	Age	Education (See Code)	School (See Code)
A.						
B.						
C.						
D.						
E.						
F.						
G.						
H.						
I.						
J.						
K.						
L.						
M.						
N.						
O.						



		Q2. What are the distance of given below from your house?																																										
		a. Government Primary School _____ Kilometers																																										
		b. Government Middle High School (8 <sup>th</sup> ) _____ Kilometers																																										
		c. Government High School (10 <sup>th</sup> ) _____ Kilometers																																										
		d. Government Sr. Secondary School (12 <sup>th</sup> ) _____ Kilometers																																										
		Q3. What is the distance of private school of your child? _____ 99. NA																																										
		Q4. What is the mode conveyance of your child to go to school? 1. By foot 2. Rickshaw 3. School Bus 4. Govt. transport Bus 5. Cycle 6. Other																																										
		Q5a. What is the reason of sending in Govt. school? (Write reason) (see codes) _____																																										
		Q5b. What is the reason of sending in Private school? (Write reason) (see codes) _____																																										
		Q6. (If any child has left the school) then what were the reasons of leaving school? a. Boy (Write reason) _____ (see codes) b. Girl (Write reason) _____ (see codes)																																										
		Q7. Rajasthan Govt. has launched various Services/Schemes to promote education. I will read some of schemes for you, you need to tell that you know about it? If 'Yes' then any child from your family has got its benefit or 'No' ?																																										
		<table border="1"> <thead> <tr> <th></th> <th>Heard</th> <th>Not Heard</th> <th>Benefited</th> <th>Not Benefited</th> <th>Not Implemented</th> </tr> </thead> <tbody> <tr> <td>a. Free Books</td> <td>1</td> <td>2</td> <td>1</td> <td>2</td> <td>9</td> </tr> <tr> <td>b. Mid day Meal</td> <td>1</td> <td>2</td> <td>1</td> <td>2</td> <td>9</td> </tr> <tr> <td>c. Scholarship</td> <td>1</td> <td>2</td> <td>1</td> <td>2</td> <td>9</td> </tr> <tr> <td>d. Free Uniforms</td> <td>1</td> <td>2</td> <td>1</td> <td>2</td> <td>9</td> </tr> <tr> <td>e. Free Cycle/Scooty for Girls</td> <td>1</td> <td>2</td> <td>1</td> <td>2</td> <td>9</td> </tr> <tr> <td>f. Mukhyamantri Dhanlakshmi Scheme</td> <td>1</td> <td>2</td> <td>1</td> <td>2</td> <td>9</td> </tr> </tbody> </table>		Heard	Not Heard	Benefited	Not Benefited	Not Implemented	a. Free Books	1	2	1	2	9	b. Mid day Meal	1	2	1	2	9	c. Scholarship	1	2	1	2	9	d. Free Uniforms	1	2	1	2	9	e. Free Cycle/Scooty for Girls	1	2	1	2	9	f. Mukhyamantri Dhanlakshmi Scheme	1	2	1	2	9
	Heard	Not Heard	Benefited	Not Benefited	Not Implemented																																							
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d. Free Uniforms	1	2	1	2	9																																							
e. Free Cycle/Scooty for Girls	1	2	1	2	9																																							
f. Mukhyamantri Dhanlakshmi Scheme	1	2	1	2	9																																							



Q16. Do you want that your daughter take benefit of this reservation after completing her education?

1. Yes    2. No    8. Can't Say

Q17. According to you, do you think female education is necessary?

1. Yes    2. No    8. Can't Say

Q17a. If "Yes" then why?

99. NA

Q17b. If "No" then why?

99. NA

Q18. If girl is well-educated and didn't find an eligible match within society, then in such circumstances, acceptance is given if girl and boy go for an inter-caste marriage. Are you satisfied or unsatisfied with it?

1. Satisfied    2. Some extend satisfied    3. Unsatisfied  
8. Can't Say

Q19. Often heard about the racial discrimination is made in schools on caste basis. Do you have ever heard something like that in your surrounding areas?

1. Yes    2. No    8. Can't Say

Q19a. If "Yes" then what kind of discrimination?

99. NA

Q20. Often news flashes like girls are humiliated/ badly behaved in schools. Do you have ever heard something like that in your surrounding areas?

1. Yes    2. No    8. Can't Say

Q20a. If "Yes" then what kind of Bad Behavior was done ?

99. NA

Q20b. Did your children have ever told you about such incident?

1. Yes    2. No    8. Can't Say

Q21. What is your present financial condition of your family? Is it good, just fine or not good?

1. Good    2. Just fine    3. Not Good    8. Can't Say

Q22. If you will make a comparison of your present financial condition with few years back then what will you say? – It's improved from earlier, it's same as was earlier or it's not good as earlier?

1. Improved from earlier    2. Same as was earlier    3. Not good as earlier  
8. Can't Say

Q23. What is your judgment for your financial condition in coming few years? – It will improve, will be same or will be worse?

1. Will be Improve 2. Will be same 3. Will be worse 8. Can't Say

Q23a. If the financial condition of your house will improve, then Will you send your child to school?

1. Yes 2. No 8. Can't Say 9. NA

Q24. Do male from your house stay out for their job/business?

1. Yes 2. No

Q25. Who is the decision-maker at your home?

1. I/Respondent 2. Husband/Wife 3. Both together 4. In-Laws 5. All Together  
8. Can't Say

Q26. According to you what is the advisable age for marriage?

a. Advisable age for Boy \_\_\_\_\_ 98. Can't Say

b. Advisable age for Girl \_\_\_\_\_ 98. Can't Say

Q27. Now will read two sentences for you, you have to tell from which you are more satisfy?

1. If girl is educated though she needs to support house instead of doing job.  
2. Even girl should learn how to read and write to do a job.  
8. Can't say

Q28. If girls are given equal education to boys, they can also contribute to family income? Are you satisfied or unsatisfied with it?

1. Satisfied 2. Some extend satisfied 3. Unsatisfied  
8. Can't Say

Q29. If I will ask you about some circumstances, you have to told me that how much secure you feel for your daughter? Do you say she is fully secure, some extend she is secure, some extend she is unsecure or she is fully unsecure?

	Fully Secure	Some Extend Unsecure	Fully Unsecure
a. In your Neighborhood	1	2	3
b. At Home	1	2	3
c. While going to School	1	2	3
d. In School	1	2	3

Q30. Do you use following things mentioned below?

	Yes	No
<input type="checkbox"/> a. Watching T.V.	1	2
<input type="checkbox"/> b. Listening Radio	1	2
<input type="checkbox"/> c. Newspaper Reading	1	2
<input type="checkbox"/> d. Participate in village/alley meets	1	2
<input type="checkbox"/> e. Internet Usage	1	2

Q31. Do programs related to women empowerment in this means of propaganda inspire you to educate your girl child?

1. Yes      2. No

Q32. Are you satisfied or unsatisfied with the methods of teaching in schools? (Later ask fully or at some extend)

1. Satisfied      2. Some extend satisfied      3. Unsatisfied  
8. Can't Say

Q32a. If 'satisfied' then give reason \_\_\_\_\_ 99. NA

Q32b. If 'unsatisfied' then give reason \_\_\_\_\_ 99. NA

### **BACKGROUND DATA**

B1. Gender of Respondent:      1. Male      2. Female

B2. Qualifications

- a. Respondent's Education \_\_\_\_\_
- b. Respondent father's Education \_\_\_\_\_
- c. Respondent mother's Education \_\_\_\_\_
- d. Respondent Husband/wife's Education \_\_\_\_\_

B3. Occupation (If farming, ask that he is owner/labor and area of field)

- a. Respondent's Occupation \_\_\_\_\_
- b. Respondent father's Occupation \_\_\_\_\_
- c. Respondent mother's Occupation \_\_\_\_\_
- d. Respondent Husband/wife's Occupation \_\_\_\_\_

B4. From which caste/community you belong?  
\_\_\_\_\_

B5. From which caste group you belong?

1. Scheduled Caste    2. Scheduled Tribe    3. Backward Class    4. Others

B6. What is your religion?  
1. Hindu 2. Muslim 3. Christian 4. Sikh 5. Other

B7. Place  
1. Village 2. Town 3. City

B8. Classify the build of Respondent's house.  
1 "Hut" 2 Kaccha House" 3 "Kaccha-pakka House" 4 "Pakka House".

B9. Total Monthly Income of Family

--	--	--	--	--	--	--	--	--	--

**QUESTIONS FOR CHILDREN**

Q1. In which class do you study? \_\_\_\_\_

Q1a. In which school do you study?  
1. Government School 2. Private School

Q2. Do you like going to school?  
1. Yes 2. No

Q2a. If "Yes" then Why? \_\_\_\_\_ 99. NA  
 Q2b. If "No" then Why? \_\_\_\_\_ 99. NA

Q3. Which activity you like the most in school?  
1. Playing/Sports 2. Study 3. Playing games on computer  
4. Drawing/Painting/Sketching/Dancing/Music/Singing 5. None

Q4. How many brother/sister you have?  
a. Brother \_\_\_\_\_  
b. Sister \_\_\_\_\_

Q4c. Among your all brother/sister you are on no. \_\_\_\_\_

Q5. Do your teachers in school teach you well?  
1. Yes 2. No

Q6. Who teaches you better in your school 'Madam or Sir'?  
1. Female Teacher 2. Male Teacher 3. None of them 4. Don't Know

		Q7. Does your teacher come to school daily? 1. Yes                      2. Sometimes on leave 3. Often on leave        4. Rarely Comes
		Q8. How many students are there in your class? a. Boys _____ b. Girls _____ <b>(NOTE: If it is only boys or girls school then mark code no. 99)</b>
		Q9. Does your school have facility of drinking water? 1. Yes                      2. No.    3. Fetch from outside
		Q10. Does your school have facility of Toilets? 1. Yes                      2. No
		Q10a. <b>(If yes then)</b> Is there a separate toilet for girls? 1. Yes                      2. No
		Q11. What is medium of instruction in your school? 1. English    2. Hindi    3. Regional Language
		Q12. Do you get homework from the school regularly? 1. Yes                      2. No
		Q13. Does anyone in your family helps in study at home? 1. Father                      2. Mother    3. Siblings    4. Others    5. None
		Q14. Do you take any private tuition? 1. Yes                      2. No
		Q15. Do teachers check your homework regularly? 1. Yes                      2. No
		Q16. Use cards to check the reading ability in Hindi and mark appropriate options? 1. 1 <sup>st</sup> Stage                      2. 2 <sup>nd</sup> Stage                      3. 3 <sup>rd</sup> Stage 4. 4 <sup>th</sup> Stage                      5. Unable to read 5.
		Q16a. Time taken _____
		Q17. Use cards to check the reading ability in English and mark appropriate options? 2. 1 <sup>st</sup> Stage                      2. 2 <sup>nd</sup> Stage                      3. 3 <sup>rd</sup> Stage 4. 4 <sup>th</sup> Stage                      5. Unable to read
		Q17a. Time taken _____





## ANNEXURE 2: CODE BOOK

### Q1: Household information:

**Col. (3): Sex:** male-1, female-2

**Col. (4): Relation to head:** self-1, spouse of head-2, married child-3, spouse of married child-4, unmarried child-5, grandchild-6, father/mother/father-in-law/mother-in-law-7, brother/sister/brother-in-law/sister-in-law/other relatives-8, servants/employees/other non-relatives-9

**Col. (6) and B2: Education Level:** Not enrolled –01; enrolled in :NFEC/ AIEP-03,TLC/AEC-04, Other non-formal –05; below primary (nursery/ Kindergarten, etc.) -06, primary (class I to IV/ V)-07,upper primary/middle-08, Secondary-10, higher secondary-11; diploma or certificate (below graduate level) in: agriculture -21, engineering/ technology-22, medicine -23, crafts -24, other subjects-29; diploma or certificate (graduate and above level) in: agriculture-31, engineering/ technology-32,medicine-33,crafts-34,other subjects -39;Graduation level degree courses in:agriculture-41, engineering/ technology-42, medicine-43,crafts-44 , other subjects -49; Post-graduation and above degree courses in:agriculture-51, engineering/ technology-52, medicine-53,crafts-54, other subjects -59;

### Q2a Q2b Q2c 2d Q3: Distance

d<1km	:	1
1km $\square$ d < 2 kms	:	2
2kms $\square$ d < 3 kms	:	3
3kms $\square$ d < 5 kms	:	4
d $\square$ 5 kms	:	5

### Q5a: Reason for sending GOVERNMENT School

01. Teaching is good
02. Teachers and Staff available
03. Geographically closer
04. Affordable (Economically Cheap)
05. Good Facilities (building, toilets, equipment)
06. Previous Experience was good
- 07.No Other Option available (No other schools except government schools here)
- 08.Other schools are not good/ stable
- 09.Everyone sends their children to government schools in our area
- 10.Other schools are co education; That wasn't acceptable to me / us.
- 11.Other schools are gender specific (Only boys/ Only Girls)
- 12.It is best to send girls to Government school
13. Other schools differentiate on basis of religion
- 14.Other schools differentiate on basis of caste
- 15.Others (Record answer)\_\_\_\_\_
98. Can't say/D.K.
99. N.A.

**Q5b: Reason for sending PRIVATE School**

01. Teaching is not good in government schools
02. Private school ensures better education.
03. Teachers and staff aren't available/absent in government schools
04. Other schools were closer than government school
05. Private schools more affordable than government school
06. Lack of good facilities (toilets, teaching equipment etc) in government school
07. Previous experience with them (government school) was not good
08. Government school not available in this area
09. Government school is co education; that is not acceptable to us
10. Government school is gender specific hence unable to send.
11. I can afford sending my child/ children to private school
12. Others send their children to private school (peer pressure)
13. Government school isn't English medium. Wanted an English medium
14. Government school has children from all religion; that is not acceptable to me/us
15. Government school differentiates on the basis of religion
16. Government school entertains all caste; that is not acceptable to me/ us
17. Government school differentiates on the basis of caste
18. Others (specify)\_\_\_\_\_ 98. D.K. 99. N.A.

**Q6a and Q6b: Reason for Dropouts:**

<i>parent not interested in studies</i>	...01	<b>applicable for “never enrolled” cases only</b>	...13
<i>inadequate number of teachers</i>	...02	<i>No tradition in the community</i>	
<i>school is far off</i>	...03	<i>education not considered necessary</i>	...14
<i>to work for wage/salary</i>	...04	<b>applicable for “ever enrolled” cases only</b>	
<i>for participating in other economic activities</i>	...05	<i>child not interested in studies</i>	...15
<i>to look after younger siblings</i>	...06	<i>unable to cope up or failure in studies</i>	...16
<i>to attend other domestic chores</i>	...07	<i>unfriendly atmosphere at school</i>	...17
<i>financial constraints</i>	...08	<i>completed desired level/class</i>	...18
<i>timings of educational institution not suitable</i>	...10	<b>applicable for female students only</b>	...20
<i>for helping in household enterprises</i>	...11	<i>non-availability of lady teacher</i>	
<i>Language/medium of instruction used unfamiliar</i>	...12	<i>non-availability of ladies toilet</i>	...21
98. D.K.		<i>boys are not educated in our society</i>	.....22
		<i>others</i>	...29
		99. N.A.	

**Q17a: Why education is necessary for girl:**

1. To make stand on her feet
2. To get a educated and good family for marriage
3. She will be aware about her rights
4. To get a good job
5. To differentiate between good and bad
6. Nobody like to marry an uneducated girl
7. All girls are educated nowadays
8. Girls are equal to boys
9. She can manage her family well after marriage
10. She can be helping hand in family income
11. 11. Other .....
98. cant' say 99. Not applicable

**17b: why education for girls is not good:**

01. Educating girls is not our family tradition
02. **She is “paraya dhan”.**
03. **She won't follow** family values after getting education
04. **She won't take interest in household work**
05. **Girls' education is not necessary**
06. More she will be educated, more dowry need to be paid
07. She would be argumentative
08. She will choose her own life-partner
9. Sending girls to schools leads to love affairs
10. Schools are not safe
11. Others.....
- 98. can't say 99. Not applicable**

**Q19a: Discrimination on the basis of caste:**

1. Separate sitting arrangement for dalit/tribal students
2. They are not allowed to drink water from same source
3. They are not treated equally by teachers
4. Nobody want to be friend of them
5. Make fun of them
6. Teachers ask them to do their personal work
7. They are not suppose to take part in many activities
8. No attention on their performance
09. Other.....
- 98. can't say 99. Not applicable.**

**Q20a: Misbehave with Girls in schools:**

1. Sexual harassment
2. Molestation
3. Eve-teasing

4. Rude behaviour of teachers
5. They get scold if they talk to any boys
6. They are consider incapable for doing many things
07. Others .....
- 98. can't say      99. Not applicable.**

**Q32a. Satisfaction with teaching at school**

01. Teaching is good
02. Teachers and Staff available
03. Good Facilities
04. homework is regular
05. All students are treated equally
06. School has strict rule and regulation
07. Focus on co-curricular activities
08. Others .....
- 98. can't say      99. Not applicable**

**Q32b. Dissatisfaction with teaching at school**

01. Teaching is not good
02. Teachers and Staff are not available
03. Poor Facilities
04. homework is not regular
05. students are not treated equally
06. School has no strict rule and regulation
07. No focus on co-curricular activities
08. Others .....
- 98. can't say      99. Not applicable**

**FOR CHILDREN**

**Q2a: Why do you like to go to school?**

1. To learn new things
2. To study
3. I have many friends
4. I would like to be a successful
5. I like my teacher there
6. I get opportunity to play games
7. We learn good things from school
08. Others ....
- 98. can't say      99. Not applicable**

**Q2b: Why do you not like to go to school?**

- I don't want/like to study**
- I do not have friends
- I don't like my teacher there**
- I don't get opportunity to play games there**
- Teaching is not good
- It is very far
- I don't like homework**
- Others ....

**98. can't say    99. Not applicable**

**z3: What is your main occupation?**

1.	Scientists
2.	Engineers
3.	Doctors
4.	Lawyers
5.	Accountants
6.	College/Univ. Teachers
7.	Writers
8.	Modern Artists
9.	Other higher professionals
10.	Science and engineering technicians
11.	Computer operators
12.	Alternative doctors
13.	Medical technicians
14.	School teachers
15.	Nursery teachers
16.	Folk and commercial artists
17.	Priests
18.	Other lower professionals
19.	Elected Officials District level elected officials
20.	Managers
21.	Officials Class I
22.	Officials Class II
23.	Class III Employee (Clerical)
24.	Superintendents
25.	Traditional clerks
26.	Class IV Employee
27.	Other administrative, managerial and clerical workers
28.	Big businessmen
29.	Medium businessmen

45.	Mechanics, machine tool operators, drivers
46.	Electricians, Plumbers
47.	Jewellers
48.	Tailors
49.	Weavers
50.	Shoemakers
51.	Blacksmiths
52.	Carpenters
53.	Other skilled workers
54.	Miners
55.	Masons, bricklayers
56.	Potters
57.	Stone-cutter and carvers
58.	Furniture, basket, mat makers
59.	Rikshaw-pullers
60.	Unskilled labourers
61.	Other semi-skilled and unskilled workers
62.	Owner-cultivators 20+ Acres
63.	Owner-cultivators 10 -20 Acres
64.	Owner-cultivators 5- 10Acres
65.	Owner-cultivators 1- 5Acres
66.	Owner-cultivators less than 1 Acre
67.	Tenant-cultivators 5+ Acres
68.	Tenant-cultivators 0-5 Acres
69.	Plantation workers
70.	Agricultural labourers rearers
71.	Other agriculture workers
72.	Live-stock farming
73.	Dairy farming

30.	Small businessmen
31.	Petty shopkeeper
32.	Hawkers, Vendors
33.	Sales executives
34.	Salespersons
35.	Shop Assistants
36.	Rentier
37.	Other businessmen
38.	Waiters
39.	Dhobi
40.	Barbers, beauticians
41.	Ayahs, maids, domestic servants
42.	Chowkidars, caretakers
43.	Sweepers, scavengers
44.	Other service workers

74.	Poultry farming
75.	Shepherds
76.	Forest produce gatherer
77.	Other breeders and cattle
78.	House-wife/husband
79.	Students not seeking employment
80.	Employment seekers
81.	Unemployed workers, non-workers
82.	Any other occupation
83.	Political activists, missionaries
84.	Unidentifiable or unclassifiable
85.	Not ascertained

**B4: What is your Caste/Jati-biradari/Tribe name?**

1.	Brahmins
2.	Rajputs
3.	Kayasthas
4.	Vaishya
5.	Jain
6.	Punjabi Khatris
7.	Sindhi
8.	Other Upper Castes
9.	Jat (Hindu Only)
10.	Other PP
11.	Gujjar/Thevar
12.	Yadav
13.	Kurmi
14.	Lodh
15.	Koeri
16.	Gadaria
17.	Mali
18.	Other Peasant OBC
19.	Darzee (Tailors)
20.	Thatihar (Make Vessel)
21.	Lakhera (Make Lac Bangles)
22.	Badhai (Carpenters)
23.	Kumhar (Potters)
24.	Lohar (Black Smith)
25.	Sunar (Gold Smith)
26.	Other Craftsmen

36.	Chamar
37.	Balmiki
38.	Pasi
39.	Namashudras
40.	Dhobi
41.	Dom
42.	Nomadic/Service SC
43.	Lowest SC
44.	Bunkar (Weavers)
45.	Other SC
46.	Meena
47.	Bhil
48.	Naikda
49.	Garasia
50.	Seharia
51.	Patelia
52.	Kathodi
53.	Other STs
54.	Ashrafs (Sayyad Shaikh)
55.	Mughal (Khan)
56.	Rajput (Peasant Proprietors )
57.	Other Upper Caste
58.	Peasants/Traders
59.	Craftsmen/Weavers
60.	Service
61.	Ex-Untouchables/Muslim Dalits

27.	Kewat (Fishermen & Boatmen)
28.	Dhobi (Washermen)
29.	Nai (Barber)
30.	Teli (Oil Pressers)
31.	Jogi (Mendicants & seek Alms)
32.	Trader OBCs
33.	Landless Labourers
34.	Entertaining Castes
35.	Other Service OBCs

62.	Other Muslim OBC
63.	Muslim No Caste/Other Muslims
64.	Jat Sikh
65.	Khatri/Arora Sikh
66.	OBC Sikh
67.	Other Minorities
68.	Hindu no caste
69.	Not Ascertained/Answer refused