

Final report

# Kanyashree Prakalpa in West Bengal, India

Justification and  
evaluation

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Arijita Dutta  
Anindita Sen

September 2020

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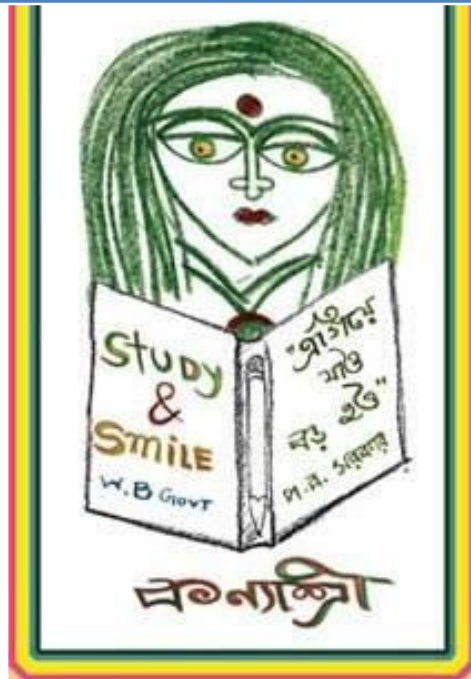
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# Kanyashree Prakalpa in West Bengal, India: Justification and Evaluation

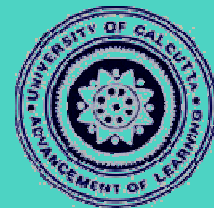


Arijita Dutta

Anindita Sen

**IGC**

International  
Growth Centre



University of Calcutta

**ARIJITA DUTTA** is a Professor at the Department of Economics, University of Calcutta, India. Her areas of interest include Development Economics and Economics of Social Sector.

**ANINDITA SEN** is an Associate Professor at the Department of Economics, University of Calcutta, India. Her areas of interest include Development Economics and Economics Gender and Environmental Economics.

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Anindita Sen

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# CHAPTER 1

## Introduction

The Kanyashree Prakalpa introduced by the Government of West Bengal in 2013 is a conditional cash transfer (CCT) scheme aimed at simultaneously reducing under-age marriage and adolescent dropout among girls. This scheme has received widespread recognition at both national and international levels, the latest being the most prestigious award for public services, The United Nations Public Service Award in 2017. This scheme was awarded the first place in the category “Reaching the Poorest and Most Vulnerable through Inclusive Services and Participation” in the Netherlands in July 2017. In this project, we have tried to analyze the justification for the implementation of this scheme and the impact of this scheme on underage marriage and adolescent dropout among girls in rural West Bengal.

### 1.1 What is the Kanyashree Prakalpa

The Kanyashree Prakalpa (KP), the flagship scheme of the Government of West Bengal was announced on March 8, 2013 and launched on October 1, 2013 and is entirely funded by the Government of West Bengal. It aims to reduce the probability of child marriage and increase the employability of girls by giving them education. This scheme is a two-tier conditional cash transfer scheme for girls aged from thirteen to eighteen with a family income less than Rs 1.2 lakh per annum. The income ceiling is not applicable to girls with special needs or orphans or those residing in J.J. homes. The income has to be certified by some local authority. The first component consists of an annual grant of Rs 750 for unmarried girls between 13 -18 who are enrolled in grades VIII – XIII or equivalent in some educational institution (KP1). The second component is a one-time grant of Rs 25,000 upon the attainment of 18 years, conditional upon her remaining both unmarried and pursuing

education/ vocational training/ technical training/ sports training till that age (KP2). The scheme requires girls to open a zero- balance savings account in some bank and the process of opening such accounts have been simplified by the authorities. The money is directly transferred to these accounts and this ensures financial inclusion of these girls and promotes their self esteem. This also ensures that there is very little leakage in the system. The application forms are available in the schools and the enrollment and opening of bank accounts is also facilitated by the school. The application, scrutiny and sanctioning is done through an e-portal and this reduces paperwork and reduces the response time at each stage. It also ensures transparency, efficiency and zero leakage. The awareness is spread through schools, mass media, celebrity endorsements and “Kanyashree Mela”s (fairs) and street theatre. The programme was publicized through ASHA newsletters by the Department of Health and Family Welfare at libraries of the Department of Mass Education and advertisements by the department of Consumer Affairs. All these, couple with a very strong political will have ensured that the awareness about this scheme is very high. This scheme has received a huge response from the grassroots and has received a lot of media attention from its very inception.

The program is supported by UNICEF India and has participated in designing and planning of communication strategy across the state. The UN organization has also participated in designing the MIS (monitoring and information system) of KP. They provide dedicated consultants to the program and takes progressive part in sharing good practice modules across the districts. Their hand-holding has offered a great technical support to the entire effort of KP by the government.

## **1.2 Why was the Kanyashree Prakalpa needed**

The Kanyashree Prakalpa has come as a much needed intervention at a time when the percentage of underage marriage among girls in West Bengal is the highest in India and mean years of schooling for women is lower than the national average. According to the Census 2011, West Bengal has the highest proportion of girls getting married before eighteen in the year before the survey. In this state, 7.8 percent of the females were married before eighteen compared to the all-India average of 3.7 per cent. This is quite surprising as historically, West Bengal (or Bengal as it was before the partition of India) has led the country in the fight for women liberation

and empowerment. In fact, it was Raja Rammohan Roy of Bengal, who first raised his voice against child marriage in India. Under pressure from nationalists and social reformers, the British Government introduced the Child Marriage Restraint Act in 1929 which fixed the age of fixed the age of marriage for girls at 14 and for boys at 18. The minimum age of marriage was increased from time to time, and finally, the Prohibition of Child Marriage Act was passed in 2006 which fixed the minimum age of marriage at eighteen for girls and twenty one for boys.

The high incidence of child marriage transforms itself into teenage pregnancy, high anemia among women and child stunting. To counter this malaise, adolescent girls in the state needed some kind of support and encouragement from state so that they could remain unmarried and continue education for proper skill development and eventual entry into the labour market. KP is one such program, which can satisfy both the targets of reduction of child marriage and adolescent dropouts from school.

### **1.3 How is Kanyashree Prakalpa different from Other Schemes**

Technically, Conditional cash transfers (CCTs) most commonly make payments to poor households on the condition that those households under-invest in the human capital of their children. Because attaching a constraint on the behavior of people one is trying to help is an unorthodox approach for economists (as textbook examples in economics argue for unconditional straight transfers in form of subsidies), a CCT can still be justified under two broad sets of conditions. First, when private investment in human capital among the poor is suboptimal from a social point of view and, second, when conditions are necessary for political economy reasons (that is, redistribution is politically feasible only when conditioned on good behavior) (Fiszbein et al 2009) CCTs serve the purpose best. Particularly in case of education of girl child, parents can discount the future more heavily than they should, replicating a case of “incomplete altruism.” Low levels of investment in adolescent girls’ schooling may be a rational strategy from the viewpoint of parents, who are maximizing their own welfare (either because girls are more costly in terms of dowries or because boys are more likely to take care of their parents than are girls who move to their husbands’ homes upon marriage). Yet they represent socially inefficient outcomes. CCTs offer incentives to

parents to send their daughters, (especially in adolescent ages) to school in order to address inefficient and inequitable gender disparities.

Over the last two decades, a whole bunch of schemes targeting to improve the entire lot of living conditions for the girl child have been implemented in India. They have targeted different social evils like female foeticide/ infanticide leading to low sex ratio; lack of empowerment and health care facilities for women, lack of education and for the girl child and child marriage.

Many of the schemes like the Balika Samridhhi Yojana in Gujarat, the Bhagyalakshmi in Karnataka, Kanya Jagriti Jyoti Scheme in Punjab and the Beti Hai Anmol in Haryana are scholarships which aim to improve the education of the girl child. These schemes offer assistance to the girls belonging to poorer households at various levels of education and try to lessen the burden of the girl child and motivate families to educate them. More effective are the conditional cash transfer schemes related to education of girls like the Bangaru Thali introduced in Andhra Pradesh in, Ladli in Delhi in 2008, Vidyalakshmi in Gujarat in 2003. While the Bangaru Thali gives yearly transfers to the girl child upon enrolment and completing each standard the Vidyalakshmi pays Rs 20,000 upon a girl completing class eight and then stops at the age when the girls are most vulnerable towards early marriage. In the Ladli scheme in Delhi, the girls can file the maturity claim after passing 10<sup>th</sup> standard if they are eighteen or have passed the 12<sup>th</sup> standard. While all these schemes, do promote education of the girl child, they are all conditional upon the girl successfully completing each stage of education, and thus may not be sufficient to motivate the weak students or those who are first generation learners who have to struggle to pass the examinations. Moreover, these schemes are not directly conditional upon the girl remaining unmarried till eighteen, though indirectly they do delay child marriage by promoting education.

The Mukhya Mantri Kanya Vivah Yojana was initiated in 2007 in Bihar, which gives an amount when the girl is eighteen to assist in her wedding, provided that she had remained unmarried till that time and no dowry was given at marriage. However, it has been observed that girls who drop out of the education system are most vulnerable to early marriage and this scheme does not require a girl to continue her education till eighteen. Excluding the pathway of continuing education in this framework resulted in limited impact for both these schemes.

The Kanyashree Prakalpa is definitely not the first conditional cash transfer scheme to target both dropout at the secondary level and early marriage together. One of the first CCTs to do so was the Apni Beti Apni Dhan (ABAD) scheme launched in Haryana in 1994 for households belonging to backward social castes and/or lying below poverty line. In this, bonds of Rs 2500 were distributed at the time of birth of a girl child and could be redeemed when she was eighteen conditional upon remaining unmarried and passing class 10. Using quasi-experimental design, Nanda et al (2016) found no impact of the program on possibility of getting married before 18 years of age. In fact, ABAD beneficiaries saw the CCT as a way to cover marriage and dowry expenses. Additional data show that more than half the families tended to or actually spent the cash transfer amount on meeting marriage expenses. As education emerged as the single most important pathway to control under-age marriage, ABAD beneficiaries exhibited higher chance of completing elementary education and aspirations of higher studies; but as it was not conditional upon continuing girls' education till 18 years, these effects were not strong enough to create a program effect for ABAD. Though this program is closest to KP in design, it differed in two extremely crucial points. First, KP identifies two simultaneous eligibility criteria: continued education and remained unmarried till 18<sup>th</sup> birthday, thus internalizing the pathway of education for reducing under-age marriage, while ABAD left out the condition of continuing girls' education till that day (clearing secondary education was enough for the scheme). The girls who dropped out of school after class 10 had a far higher chance of getting married at an underage. Secondly, the implementation was different. In ABAD, the parents had to register at the time of birth of the girl child whereas, in KP, the girls had to register themselves at the age of thirteen, thus expecting to create far stronger inspirational effects. Generating awareness among the parents was far more difficult than generating awareness among school going children as is done in KP.

The Ladli Lakshmi Yojana initiated in 2007 in Madhya Pradesh and subsequently implemented in other states like Jharkhand, Goa is another CCT where a girl receives a lump sum of more than Rs 1 lakh at the age of twenty one provided that she does not get married before eighteen and completes her secondary education. However, it is difficult to verify whether someone married before eighteen or not when she has already reached twenty one years of age. Also, the emphasis on the girl's *successfully* completing her education (instead of just continuing till eighteen as in KP) acts as a deterrent. Girls may be enrolled in an Institution, but are retained to a class more than once. The Girl Child Protection Scheme

launched in Andhra Pradesh in 1997 is a similar scheme where girls receive Rs 20,000 at the age of twenty years if she had remained unmarried till eighteen. This scheme, however did not link education to child marriage and again verification of the age of marriage would have presented a problem at twenty.

The Majhi Kanya Bhagyashree Scheme initiated by the government of Maharashtra in 2015, two years after the Kanyashree Prakalpa, awards staggered financial incentives to the families to educate the girl child and ensure proper nutrition. After the age of eighteen, the girl receives Rs 1 lakh per annum for continuing her studies if she is not married before that. This scheme is unique as it also provides incentives for the grandmother in order to eliminate male bias among the elderly. However, in order to receive the substantial amount of Rs 1 lakh, the girl has to continue education beyond eighteen, which might not be feasible in many families.

The Kanyashree Prakalpa is unique in its finer points too. It starts at the age of thirteen, when the girls are at their most vulnerable age. It requires the girls, themselves, to apply for the scheme, and the awareness is spread through schools. This, coupled with very high political will ensured that the awareness about this scheme is almost complete. The small annual stipend covers, at least partially, the cost of education and encourages the girls to continue their studies. The lump sum amount provided at eighteen requires them to have continued studies and remained unmarried till that age. The smaller portions, albeit little, is supposed to give the teenage girl a sense of self-empowerment and improve the aspirations to reach eighteen years. As there is no requirement of successfully completing any level, girls, irrespective of their merit are encouraged to continue studies and defer their marriage. Also, the entire process starting from the application to receiving the amount is electronically managed and the girls receive the money in their own bank account. This ensures very little leakage in the system and low administrative costs. In other words, the scheme enforces financial inclusion of the entire band of adolescent girls, who otherwise would have remained outside the net of formal banking system even at this age of JAM trinity.

**Box 1.1: The KanyashreePrakalpa has brought a smile to their lips**



**MonamiChakraborty,** Class XII,  
Student

NabapallyJogendraBalikaBidyamandi  
r, Barasat, N 24 Parganas : Daughter  
of truck driver, was looking for a loan  
so that she could study medicine. The  
KanyashreePrakalpa was a godsend

**ChampaGayen,** Class XI, Student  
NabapallyJogendraBalikaBidyamandir,  
Barasat, N 24 Parganas : Works as a  
domestic help while educating herself  
at the same time. Used the KP money  
to buy herself a new bag and pay her  
tuition fees



**Sonali Das,** college student, Barasat, N  
24 Parganas: family was pressurizing  
her to give up studies. Now she is  
doing her undergraduate studies using  
her KP money. Wants to train as a  
teacher.



## **1.4 Research Objectives**

Given the above backdrop, the current project has identified the following objectives:

1. To locate the justifications behind introducing a conditional cash transfer scheme for reducing under-age marriage and early dropout of adolescent girls in the state of West Bengal and analyze whether the design of the scheme was appropriate.
2. To identify any change, if any, in terms of social empowerment of the girls and enhanced aspirations for their lives.
3. To evaluate the programme effect in reduction of both under-age marriage and early dropout of adolescent girls after four years of implementation.

These research objectives would help to identify the success stories of this unique program so that they can be replicated in other settings, along with locating the lacunae of implementation and pathways that can be rectified in near future

## **Box 1.2 Awards and Recognition received by the KanyashreePrakalpa**

### **Awards received**

- 1st Place Winner in Category “Reaching the Poorest and Most Vulnerable through Inclusive Services and Participation”, United Nations Public Service Award, 2017
- United Nations WSIS Prize 2016 Champion in e-Government Category (WSIS Action Line C7)
- CSI-Nihilent Award, 2014-15.
- Skoch Award and Order of Merit 2015 for Smart Governance.
- National E-governance Award 2014 – 2015 awarded by the Department of Administrative Reforms and Public Grievances, Government of India.
- Manthan Award for Digital Inclusion for Development (South Asia and Asia Pacific) 2014 under the category E-Women and Empowerment.
- West Bengal Chief Ministers Award for Empowerment of Girls, 2014

### **The Scheme was appreciated as a good practice at:**

- Finalist in GEM-Tech Awards organized by ITU and UN Women, 2016
- Trafficking in Persons (TIP) Enclave organized by U. S. Consulate & Shakti Vahini (Siliguri, February 2016).
- National Workshop on "Conditional Cash Transfers for Children: Experiences of States in India" organized by NITI Aayog, India (Delhi, December 2015).
- Consultation on "Empowerment of Adolescent Girls" organized by the World Bank (Ranchi, May 2015).
- Consultation on "Child Marriage and Teenage Pregnancies" organized Tata Institute of Social Sciences (Delhi, March 2015).
- The "Girls Summit organized by DFID and UNICEF (London, July 2014)

# CHAPTER 2

## Data

In this chapter we briefly discuss the data we have used for our analysis. We use both secondary and primary data in our analysis. The secondary data used is the District Level Household and Facility Survey 4 (DLHS 4) and the 71<sup>st</sup> Round of the National Statistical Sample Office (NSSO 71). The primary data has been collected through independent random sampling.

### **2.1 DLHS Data – Baseline (2012-13)**

For a baseline study, we used the District Level Household and Facility Survey (DLHS 4) data. This is a nationwide survey conducted during 2012 – 13, that is, just before the implementation of the Kanyashree Prakalpa. It was funded by the Ministry of Health and Family Welfare and implemented by the Indian Institute of Population Studies. It covers all states of India other than the EAG states (Bihar, Chhattisgarh, Jharkhand, Madhya Pradesh, Orissa, Rajasthan, Uttaranchal and Uttar Pradesh) and Assam. It adopts a multistage, stratified random sampling, which covers all the districts of each state. The district-wise sample size varies from 1000 to 1750 households. For rural areas, the Census 2001 villages were the frame for First Stage Units (FSUs) of sampling stratified by size class and selection by probability proportional to size (PPS) sampling. The listing of all households in the first stage units provided the sampling frame for selecting the households in the second stage. We have used the data for rural areas for the districts considered in our study, Haora, Murshidabad and Kochbihar.

## 2.2 NSS (71<sup>st</sup> Round) Data

The analysis on determining factors behind adolescent dropouts has been carried out with unit level NSS 71<sup>st</sup> round data titled '*Key Indicators of Social Consumption in India: Education*'. The period of survey, when the data was collected, was January to June, 2014. The data set is published by Ministry of Statistics and Programme Implementation, Government of India. The main objective of the survey is to collect data on individuals between the age group 5 to 29 years who are participating in educational attainment within the country. It also collected information on the educational facilities and arrangements available for the students and contribution of government and private sectors on improving educational infrastructure within the country. It highlights the expenditure by government and cost incurred at household level to finance education. School and other education related information, attendance patterns and indicators of educational wastage in form of discontinuance and drop outs are provided in the data set along with basic socio economic and household level characteristics of an individual. The survey was conducted on 65,926 households across the Indian states and Union Territories within which 36,479 households were from rural areas and 29,447 households were from urban areas. For the analysis of adolescent dropouts, girls of age 15 -29 years and those who dropped out between age 15-18 years were considered. Thus, if a girl of 20 years of age dropout from school at an age of 10 year, she is termed as child dropout and not an adolescent dropout.

## 2.3 Survey Data (2016-17)

We base our study on an independent primary survey of 1050 households from three districts in West Bengal. The sample has a three-tier sampling frame from three districts based on two indicators which are closely linked to the scheme, namely *share of women with secondary education* and *share of married women below 18 years of age*. Table 2.1 shows the respective positions of all districts of West Bengal vis-à-vis these two indicators. For each of these indicators, the Education Index (EI) and the Marriage Index (MI) are created using the commonly acceptable goalpost method of UNDP. Finally a combined index of these two indices is created using the geometric mean following UNDP (2010). A higher score implies the district is worse off as both the indicators bear negative meaning in terms of development.

**Table 2.1: Districts of West Bengal in terms of share of women with under-age marriage and without secondary education**

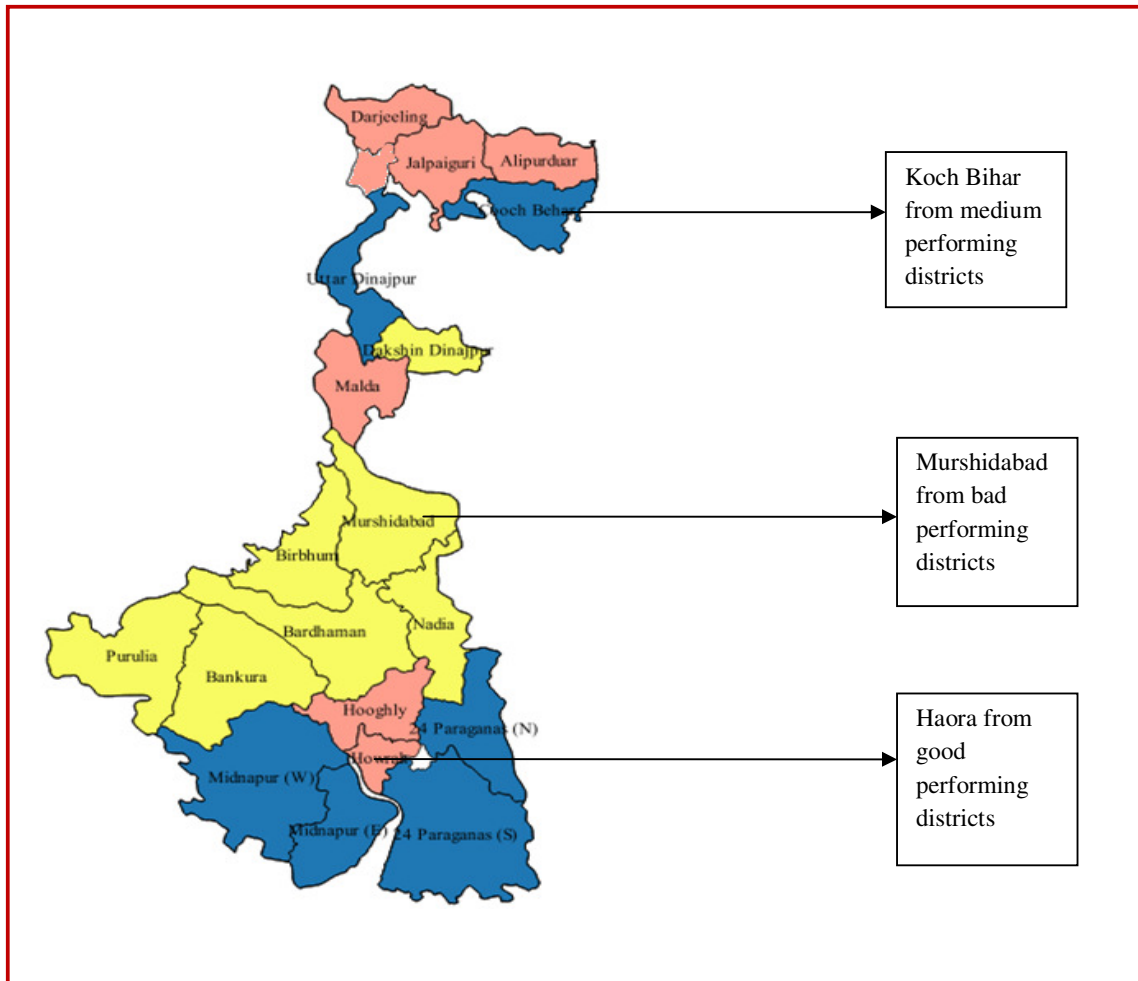
Districts	% of women without secondary education	Education Index (EI)	% of currently married women below 18 yrs	Marriage Index (MI)	Total Index
Kolkata	50.10	0.00	8.50	0.00	0.00
Darjeeling	73.80	75.00	10.20	5.40	20.12
Jalpaiguri	73.70	74.68	16.90	26.67	44.63
Haora	70.90	65.82	20.60	38.41	50.28
Hugli	69.50	61.39	25.00	52.38	56.71
Maldah	70.40	64.24	25.80	54.92	59.40
PurbaMedinipur	69.90	62.66	26.50	57.14	59.84
Koch Bihar	71.90	68.99	31.50	73.02	70.97
North 24 parganas	74.20	76.27	29.70	67.30	71.64
PaschimMedinipur	67.50	55.06	39.20	97.46	73.26
South 24 Parganas	77.20	85.76	29.10	65.40	74.89
Uttar Dinajpur	76.70	84.18	31.40	72.70	78.23
Puruliya	77.60	87.03	30.70	70.48	78.31
DakhinDinajpur	76.50	83.54	32.10	74.92	79.12
Birbhum	73.90	75.32	35.20	84.76	79.90
Barddhaman	77.50	86.71	34.30	81.90	84.27
Nadia	81.70	100.00	31.20	72.06	84.89
Bankura	75.60	80.70	40.00	100.00	89.83
Murshidabad	81.30	98.73	39.10	97.14	97.94

Source: DLHS 4 fact sheets

From this table, the districts are divided in three groups: good (shaded in pink), medium (shaded in light blue) and bad (shaded in light yellow). One district was chosen randomly from each group. Thus, Haora is selected as good district, Koch Bihar from the median and Murshidabad from the bad performing districts. This selection in fact covers the entire length of the state.

Two blocks were chosen from each district according to highest and lowest female literacy (no information is available on marriage age at block levels) obtained from Census 2011 (Table 2.2).

**Figure2.1: Map and location of three districts selected.**



**Table 2.2: Blocks selected from the districts**

District	Block with highest female literacy	Block with lowest female literacy
Haora	Sankrail (70.85)	Uluberia I (62.82%)
Murshidabad	Hariharpara (60.10%)	Suti II (35.10%)
Koch Bihar	Cooch Bihar 2 (65.59%)	Sitai (48.37%)

Source: Census 2011

In each of these blocks, the schools were ranked according to their performance in KP enrolment and grouped into good performing and bad performing schools in terms of KP enrolment (based on information provided by District Office overseeing the KP). This gives us the intensity of the program. One school was selected randomly from each group and two or three villages (depending on village population) were selected from the catchment areas of these schools. Finally a complete house-listing of adolescent girls and young women (13 -25 years) living in these villages were collected and from each village 83-84 adolescents/young women were surveyed based on random sampling from the total list.

The girls are divided into three age cohorts. The girls aged between 14-18 years are those which are currently within KP 1 phase, between 19-21 years those who have/could have availed the KP 2 and those between 22-25 years represent the age cohort who had crossed their 18<sup>th</sup> birthday when the Kanyashree Prakalpa started and could not get any benefits from it. Table 2.3 shows the distribution of 1357 adolescent girl members from the 1021 surveyed households in three districts. Out of them, 1021 were surveyed individually to collect information on other aspects of KP.

**Table 2.3: Distribution of individual members**

Age cohort	Age Group	Number of girls between 14 -25 years in the surveyed households	Number of individuals surveyed with further information
1	14-18	534	360
2	19-21	379	301
3	22-25	444	359

The villages selected and quota of girls and their households covered are given in Tables 2.4 A-C for the three districts Haora, Murshidabad and Koch Bihar respectively. In total, out of 1020 households visited in three districts, 340 belonged to Haora, 341 to Murshidabad and Koch Bihar each. Again, 452 belonged to villages where KP enrolment is high and 569 where it is low.

**Table 2.4A: Blocks and villages in Haora**

<b>Block</b>	<b>Village</b>	<b>Adjacent School</b>	<b>Intensity Status</b>
Sankrail	Radhadasi	DuillyaPanchpara High School	High
	Sandhipur	KanduahMahakali High School	Low
	Sulati	KanduahMahakali High School	Low
Uluberia 1	Gouripur	Gouripur Sri SriRamkrishnaVidyapith	High
	DakshinRamchandrapur	DakshinRamchandrapur High School	Low



**Table 2.4B: Blocks and villages in Murshidabad**

Block	Village	Adjacent School	Intensity Status
Hariharpara	Kedratala	Nischintapur High School	Low
	Dasturpara	Hariharpara H A B Senior Madrasha	High
	Kajipara	Hariharpara H A B Senior Madrasha	High
Suti 2	Bamuha	MuraliPukur High School	Low
	Muralipukur	MuraliPukur High School	Low
	Mahendrapur	Aurangabad High Madrasha	High
	Moulavipara	Aurangabad High Madrasha	High

**Table 2.4C: Blocks and villages in Koch Bihar**

Block	Village	Adjacent School	Intensity Status
Cooch Behar 2	Bararangras	BararangrasDineswari High School	High
	Chakchaka	Chakchaka High School	Low
Sitai	BaroAdabari	KismatAdabari High School	High
	BijlichatkaAdabari	KismatAdabari High School	High
	MorbhangaAdabari	KismatAdabari High School	High
	Balapukhari North	Sutibari Junior High School	Low
	Panikhawa South	Sutibari Junior High School	Low
	Panikhawa North (326)	Sutibari Junior High School	Low
	KismatAdabari (327)	KismatAdabari High School	High

## Box 2.1: Kanyashree in Enclaves

An enclave is a territory entirely surrounded by the territory of one other state. The India–Bangladesh enclaves, also known as the *chitmahals* and sometimes called pasha enclaves, were the enclaves along the Bangladesh–India border, in Bangladesh and the Indian states of West Bengal, Tripura, Assam and Meghalaya. Within the Indian mainland were 71 Bangladeshi enclaves, containing 3 Indian counter-enclaves. A joint census in 2010 found 14,215 persons of Bangladeshi enclaves residing within India. The enclave dwellers cannot get services from either of the countries hence live in a dismal position, where they have no legal right to enjoy any services provided by the government. After the ratification of Land Boundary Agreement on 6 June 2015, India received 51 Bangladeshi enclaves in the Indian mainland.

Koch Bihar the only district in the State which has several 'Enclaves' lying inside the Territory. This district consists a total of 51 Enclaves spreads over 6 blocks. Our research team observed that though they had no proper identity before inclusion, most of the children (both girls and boys) went to schools that time and most of them are first generation learner. District authorities pointed out that the school dropout and child marriage rate is already comparatively low here as parents realized that, unless they make their children educate, they can't get a good job and can't live outside the enclaves. The reason behind low child marriage is ambiguous. The parents told that, they want to make their girls self-sufficient before marriage. One indirect reason might be the difficulties in getting good grooms due to their proper identity.

As they were already admitted into the schools, they were also enjoyed the benefit of Kanyashree project before inclusion. In most of the cases, this extra money is used as the personal savings of the girl, sometimes this is also used for education or other family needs. But, sometimes they are facing problems during form fill up and account opening due to lack of proper document. The local administration, along with Anganwari, ASHA and CINI workers are putting in great efforts to include girls in KP here with regular counseling awareness generation. The interviewed girls in the enclaves see Kanyashree as a special gift from the government and are extremely enthusiast about it.



# CHAPTER 3

## Methodology

In this project, we have tried to analyze the need for the conditional cash transfer scheme like Kanyashree Prakalpa in West Bengal, the justification behind the design of the scheme and the impact it had on adolescent dropout and marriage before eighteen among girls in the four years since its inception. Using the DLHS 4 data, we have tried to analyze the ground reality in West Bengal in terms of age of marriage among girls and mean years of schooling among both men and women. Using simple data exploration methods, we have tried to locate the demographic characteristics of the households surveyed, the status of the relevant variables related to under-age marriage and dropout along with some other changes in the aftermath of the KP in Chapters 5 and 6. Similar analysis is also repeated for primary survey data.

In order to analyze the justification of the design of this scheme, we have tried to estimate the determinants of underage marriage and adolescent dropout among the girls in Chapter 7. A logistic regression was carried out on DLHS 4 data to estimate the determinants of underage marriage in West Bengal. The regression controlled for demographic factors like the religion and social group of the girl, the education level of the girl, the education level of her husband, the wealth level of the family, and village level characteristics like village infrastructure index, presence of women and child development schemes, presence of *Mahila Mandal*, self help groups and whether there has been any natural disaster in the village in the last one year. The estimated logistic equation is,

$$\text{Underage marriage} = f(\text{Household \& village characteristics, Education of both partners})$$

(3.1)

This regression results help us understand the factors influencing the adolescent early marriage among girls in West Bengal and the justification behind the design of the scheme.

A bi-variate probit regression is used to understand the influencing factors behind adolescent dropout on unit level data from NSSO 71<sup>st</sup> round. Literature suggests two types of determinants of Adolescent Dropout (AD): Household & Individual characteristics and school level factors. Within the first set, location, economic and social status, educational standard of household head, main occupation of the household, student's gender etc. are considered. Within the second set, the access to primary/upper primary or secondary schools and the ownership of the school last attended or currently attending (public/ private) are identified. The last one itself depends on a set of household and parental factors. To handle this endogeneity of variables, here a bivariate probit model is considered while jointly estimating two equations:

$$\text{School type} = f(\text{household and individual characteristics}) \quad (3.2)$$

$$\text{AD} = f(\text{household and individual characteristics}) \quad (3.3)$$

Using a bi-variate probit on these two equations the error terms are assumed to be jointly distributed.

To estimate the impact of this conditional cash transfer on adolescent dropout and underage marriage, we have used the difference in difference (DID) technique after propensity score matching (PSM) using the DLHS 4 data as a baseline study. We have used the girls aged between 18- 21 years in the survey data as the treatment group – they were exposed to the scheme at some point of time. The control group are the girls aged between 22- 25 who were above eighteen when the scheme was announced and thus could not avail the benefits of the scheme. The outcomes are (i) the proportion of girls marrying before eighteen, (ii) the proportion of girls dropping out of education before eighteen and (iii) the proportion of girls either getting married or dropping out before eighteen and thus moving out of the Kanyashree net. The difference between the proportions of girls in the two age cohorts tell us whether and how the incidence of dropout and underage marriage has changed among the girls who have been exposed to the scheme and those who have not. However, to read this difference as the impact of the scheme is misleading. One, the trend for both underage marriage and adolescent dropout is steadily falling. Thus, the difference captures not only the impact of the scheme, but also the general development-induced downward trend. Also, it is not certain whether we can call the girl who was seventeen years old when the scheme was introduced and availed it by not dropping out or getting married before eighteen as a success

of the scheme. As she had continued her education and not got married till seventeenth year of her age even without the scheme, she is more motivated than the average and in all probability might have continued her studies and remained unmarried for another year. To address the second issue we have matched each girl in the treatment group with those in the control group by PSM on the basis of household characteristics, thus identifying her closest twin who would in all probability behave like her in the absence of any scheme (Jalan and Ravallion, 2003a, 2003b). Thus, the first difference represents the average difference in outcomes where the differences were generated after matching. That is, each difference represents the difference in outcome between a girl in the treatment group and her twin in the control group. Or,

$$D_1^1 = \frac{1}{n_1} \sum_{i=1}^{n_1} (O_i^T - O_i^C) \quad (3.4)$$

Where  $D_1^1$ : first difference obtained from survey data

$O_i^T$ : outcome of the  $i$  th girl in the treatment group

$O_i^C$ : outcome of the match of the  $i$  th girl in the control group

$n_1$ : number of girls matched in the survey data

In order to address the first problem, that is eliminate the existing negative trend in dropout and child marriage, we estimate the difference in proportions of dropouts or underage marriage in the two age groups in the DLHS 4 data after similar propensity score matching. We then take the difference in these two differences as the estimate of the impact of this scheme on underage marriage and dropout. (Gertlet et. al 2011, Khandker et. al. 2010) Thus,

$$D_2 = D_1^1 - D_1^0 \quad (3.5)$$

where  $D_1^0$ : first difference obtained from DLHS 4 data such that

$$D_1^0 = \frac{1}{n_0} \sum_{i=1}^{n_0} (O_i^T - O_i^C) \quad (3.6)$$

$O_i^T$ : outcome of the  $i$  th girl in the age group 14 – 21 in DLHS 4 data

$O_i^C$ : outcome of the match of the  $i$  th girl in the 22- 25 in DLHS 4 data

$n_0$ : number of girls matched in the DLHS 4 data

As a robustness check, we estimated the impact of the scheme on marriage and dropout at the age of sixteen years too using similar techniques. We have also tried to see whether the scheme affected only the beneficiaries or had a far wider reach and brought about a reduction in underage marriage and dropout in society as a whole. We have also estimated the impact of this scheme on the adolescent girls belonging to Hindu and Muslim families separately and tried to assess whether the scheme had a greater impact on any one particular community.

During our field visits, we had observed that though the Kanyashree Prakalpa was introduced in the entire state at the same time, the rate of enrolment differed widely among schools. Thus, the intensity of the implementation of the scheme was not uniform. In some areas, the rate of enrolment was lower as the students came from more affluent families and in some cases it was because of the lax attitude of the school. Obtaining a list of the intensity of KP implementation in the different schools from the district officials, we have differentiated the schools and hence their catchment areas as high intensity and low intensity areas. We have then tried to estimate the impact the intensity of implementation has had on underage marriage and dropout of the society. For this, we have used a difference in difference technique using only the survey data following Duflo (2001). However, we have obtained the first differences between the girls in the two age categories after propensity score matching. Thus,

$$d_2 = d_1^{HI} - d_1^{LI} \quad (3.7)$$

Where  $d_1^{LI} = \frac{1}{n_0} \sum_{i=1}^{n_0} (O_i^T - O_i^C)$  is the average difference in outcomes after matching the girls aged between 14 – 21 years with those between 22- 25 in the low intensity areas and  $d_1^{HI} = \frac{1}{n_1} \sum_{i=1}^{n_1} (O_i^T - O_i^C)$  the corresponding difference in the high intensity areas.

In order to estimate whether the impact of the programme has improved over the years, we estimated the difference in the outcomes between the girls aged 18 – 19 years (high exposure as they were 14-15 years when KP was launched and hence had the exposure for the full 4 years) and those aged 20 – 21 (low exposure as they were 16-17 years old when KP was launched and had the exposure only for marginal years) in the survey data after matching them using PSM. The first difference represents the difference in outcomes of these two age

groups. To remove the time trend, we have also estimated the difference in outcomes after matching the two age groups in the DLHS 4 data. The difference of these differences tells us whether the impact of the programme has changed over the years. Thus the difference in difference in this case is:

$$D_2^E = D_1^1 - D_1^0 \quad (3.8)$$

where  $D_1^0$ : first difference obtained from DLHS 4 data such that

$$D_1^0 = \frac{1}{n_0} \sum_{i=1}^{n_0} (O_i^{18-19} - O_i^{20-21}) \text{ and}$$

$D_1^1$ : first difference obtained from survey data such that

$$D_1^1 = \frac{1}{n_1} \sum_{i=1}^{n_1} (O_i^{18-19} - O_i^{20-21})$$

such that  $(O_i^{18-19} - O_i^{20-21})$  is the difference after matching between the outcomes of the  $i$ th girl in the high exposure group with that in the low exposure group

$n_0$  and  $n_1$  are the number of matched girls in the DLHS 4 and survey data respectively.

Descriptive statistics done in Chapter 6 suggests that pressure on girls from parents to marry before eighteen has fallen and underage self-initiated marriage has increased during the last four years. In order to assess the impact of the scheme on self-initiated underage marriage and underage marriage arranged by parents, we have again tried to obtain the difference in difference. However, as DLHS 4 does not distinguish between self-initiated underage marriage and underage marriage organized by parents, we used only our survey data and divided the villages into low and high intensity of the programme. The girls aged between 18-21 of the low intensity villages were then matched with those aged between 22-25 in the same low intensity villages and the difference in their outcomes for (i) percentage of self-initiated underage marriage and (ii) underage marriage organized by parents. The same difference was obtained for high intensity villages and the impact of the scheme was estimated from the difference in these two differences. Thus, the differences are as in (3.7). The outcomes in this case are for (i) percentage of self-initiated underage marriage and (ii) underage marriage organized by parents.

## **CHAPTER 4**

### **Justification for the Kanyashree Prakalpa**

As the proportion of girls getting married before eighteen was alarmingly high and this led to relatively high chance of neo-natal mortality among adolescent mothers in the state, the Government felt the need to introduce some policy to contain the malaise of early marriage and felt, justly, that ensuring that the girls continued education would best serve the purpose. According to Mr Sanjay Mitra, the erstwhile chief secretary of West Bengal, the need for some sort of intervention in curbing the practice of child marriage was first felt by the Department of Health which was concerned about the high infant mortality in the state and realized that it was due to girls giving birth at very young ages.

The main rationale behind KP is dual conditional cash transfer directly to the adolescent girl would reduce the possibility of dropout and early marriage in the state. In order to explore whether there is any income effect that can control these two variables, we used secondary datasets available, namely NSSO (71<sup>st</sup> Round Data on expenditures on Education) and DLHS 4 (2012-13). It is hypothesized that increase in income or expenditure capacity of household would mean lower chance of dropping out because of two reasons. First, there may be some direct cost involved with keeping the girl in to the school, like expenditures for transport, books, stationery, examination fees and private tuition. If the spending capacity of the household gets enhanced, dropping out due to inability to incur these expenditures gets reduced. Secondly, there is an opportunity cost involved in continuing an adolescent in school, which means the household has to forego the extra income that he/she could have earned from working outside home. Though this possibility is particularly strong for boys, adolescent girls too often get involved in earning extra income for the household. A cash transfer can also decrease this possibility of dropping out as it can supplement the household income and minimize the loss of potential income by working outside. On the



other hand, literature also suggests that early marriage is strongly associated with poverty (Otoo-Oyortey and Pobi 2003). As the cost of dowry in South Asian countries increase with bride's age primarily because of fear of loss of virginity, poorer households tend to marry off their daughters earlier at a tender age. Based on these two hypotheses of persistent income-effect on both adolescent dropout and under age marriage, KP is expected to succeed to reduce them by a conditional cash transfer.

#### **4.1 Determinants of Adolescent Dropout among Girls**

Among all the celebrations over the Right to Education that came into effect from April 1 2010, the major issue that has attracted the notice of the policy maker is to improve gross primary enrolment among children. Automatically, the country has experienced a serious reduction in proportion of children who are never-enrolled to school. However, not much attention is paid to reduce the other serious issue, namely the dropout rate especially in secondary level in adolescent age. Available literature do point out that a significant share of students, belonging to the age group of 13 to 18 years are dropping out from school. The economic consequences for youngsters dropping out before finishing secondary education are dramatic in terms of low skill development and high unemployment. Though completing secondary education does not guarantee access to high paying job, it does represent a promise of greater access to further opportunities and it is fast becoming a prerequisite to remain employable and re-trainable, the two highly valued qualities in today's labour market. Additionally social consequences of early dropouts too are enormous. Early dropouts often lead to early marriage and employment in poorly paid jobs, while adversely effecting empowerment of women. However, it must be identified here that adolescent dropout before completing secondary classes, is not just related to household's socio-economic status, choice of schools, the infrastructure of schools etc, but also on the overall economic condition of the labour market and the related expected return from completing secondary education.

According to several studies, reasons behind dropping out from school during adolescence can be traced into the institutional developments and individual perception about returns from education. It depends upon various proximal household factors such as poverty level, distance of school from home, transport facilities, quality of teachers, social environment and many other factors (Ampiah *et al* 2009, Das 2007, Choudhury A. 2006).

Fortin L. *et al* (2006) finds that in light of a multi-factorial conceptualization of school dropout risk, the observations regarding the different subgroups suggest the existence of several possible developmental pathways, including behaviour problems, learning difficulties, family and classroom environments, leading to potential school dropout. Hanushek *et al* (2008) posits that school quality and grade completion by students are directly linked. With the student's own ability and achievement held constant, the study found that a student is far less likely to remain in school if attending a low-quality school rather than a high-quality school. This individually rational behaviour suggests that common arguments about a trade-off between quality and access to schools may misstate the real issue and lead to public investment in too little quality. Chugh 2011 posits that youngsters do not drop out merely because they are poor, but also because by the time they reach secondary level of education, they have accumulated a strong history of school failure, which puts them at higher risk of dropping out. School failure due to poor comprehension of studies, discrimination within class, poor teaching-learning process etc is a cumulative process, which needs to be tackled early, right from primary or elementary education to secondary education. According to Sikdar and Mukherjee 2011, in the secondary stage, the impact of alternative sources of work and household duties and quality of education imparted become the most important determinants for dropping out of school. Lower income quintiles find it harder to pay for secondary education – both public and private.

The strongest enabling factors with regard to girls' school participation are household resource factors such as parental, especially maternal schooling, father's occupation, and family income (Sen Gupta & Guha 2010; Unni 2009). Munshi K. *et al* (2006) brings out the interaction between traditional institution, namely the caste system, and forces of globalization shaping the economic mobility and welfare of particular groups of individuals in the new economy. It has been found that male working-class-lower-caste-networks continue to channel boys into local language schools that lead to the traditional occupation, despite the fact that returns to non-traditional white-collar occupations rose substantially in the 1990s, suggesting the possibility of a dynamic inefficiency. In contrast, lower-caste girls, who historically had low labour market participation rates and so did not benefit from the network, are taking full advantage of the opportunities that became available in the new economy by switching rapidly to English schools. Caste and cultural prejudice too appear to shape the dropout levels of young girls in Nepal (Vine 2006). Among the girls belonging to *Mahali* castes in Jharkhand and the *Lodha* in West Bengal tend to dropout from

school by early adolescence due to their involvement in household chores like collection of firewood and fetching water, tending livestock and sibling care, along with in farming activities (Ghosh 2007).

Using unit-level NSSO 71<sup>st</sup> Round data on consumption on education, it is estimated that among persons belonging to age group 6-18 years, almost 7% students are never enrolled (NE), while 10.21% are dropped out (DO). Table 4.1 posits that though there is a significant gender gap in NE, DO appears to be almost gender neutral at all-India level. The figures for West Bengal, however, speak of contrary situations. There is no significant gender gap in NE in the state, while male dropout is significantly higher than female dropout.

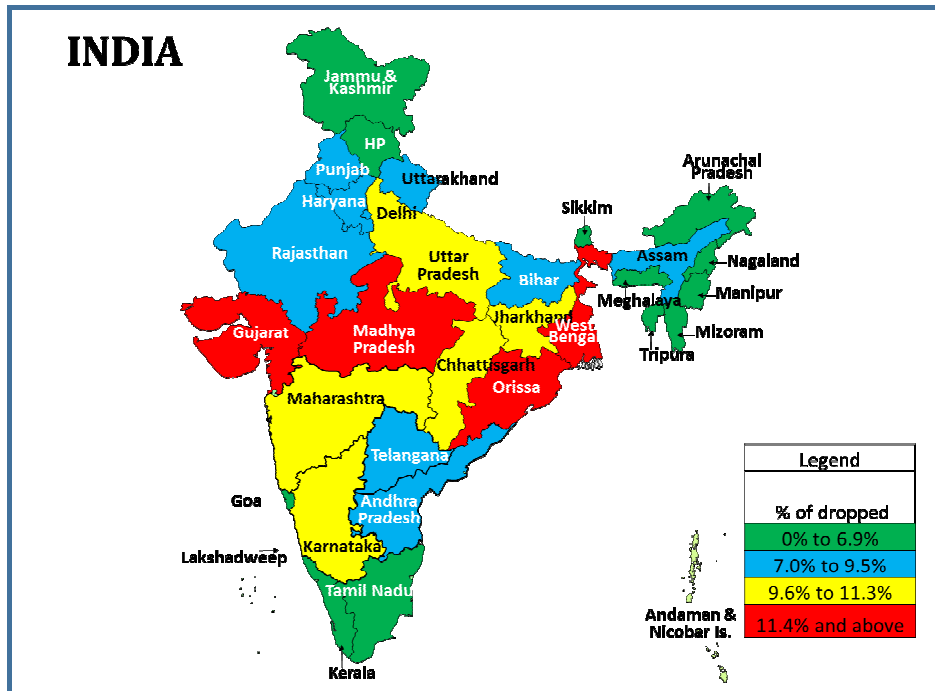
**Table 4.1: Shares of Never Enrolled and Dropouts by gender (weighted)**

Location		Never enrolled	Dropped Out	Currently continuing
<b>India</b>	<b>Male</b>	6.20	10.36	83.44
	<b>Female</b>	7.79	10.03	82.18
	<b>Persons</b>	6.93	10.21	82.86
<b>WB</b>	<b>Male</b>	5.01	14.84	80.15
	<b>Female</b>	5.34	9.36	85.3
	<b>Persons</b>	5.17	12.21	82.62

*Source: Analysis of NSSO 71<sup>st</sup> round unit level data*

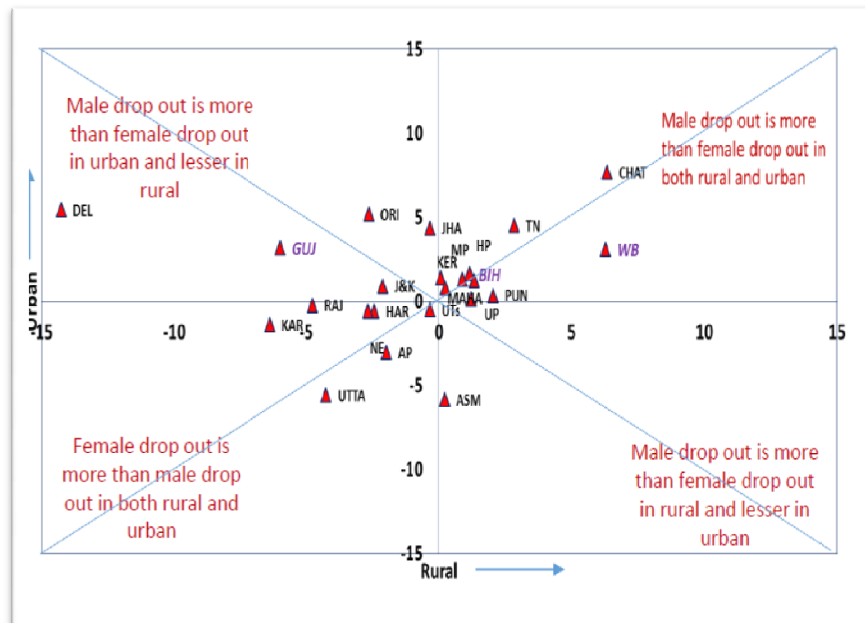
Across the states in India, West Bengal is a critical region in terms of dropouts. Figure 4.1 below posits that the state belongs to the most vulnerable cluster consisting of Madhya Pradesh, Gujarat and Orissa. The surprising result of Bihar and Rajasthan performing better than these states emanates from the fact that NE rates are particularly high in these states, well above the national average. It is also a bit puzzling to locate Gujarat, one of the richest states in India, to belong to this bracket of vulnerable states. In fact, Gujarat records highest dropouts among females and also overall persons, while West Bengal records highest dropouts among the males.

Figure 4.1: Clusters of Indian states by quartiles of dropout rates



Source: Analysis of NSSO 71<sup>st</sup> round unit level data

Figure 4.2: Male Female gap in adolescent dropout in rural and urban areas across states



Source: Analysis of NSSO 71<sup>st</sup> round unit level data

Figure 4.2 presents the above scatter diagram where states and UTs are plotted based on their rural and urban male female gaps with respect to dropout status. Here male to female gap (M-F) in dropout is considered. Four quadrants represent four different scenarios as denoted in the figure. The horizontal and vertical axes represent rural and urban sector respectively. 45 degree lines represent the equality between male female gap in dropout in rural and urban areas. As a state or UT is below the 45 degree line, and nearer to the horizontal axis, more is the male female gap in rural areas for the upper two quadrants and vice-versa. Similarly, as a state or UT is above the 45 degree line, and nearer to the horizontal axis, more is the male female gap in rural areas for the upper two quadrants and vice-versa. From the above figure, it could be seen that for Bihar and West Bengal, male drop out is more than female drop out in both rural and urban areas, though the distance from the origin is far higher for the latter, depicting higher shares of DO in West Bengal. This feature is also true in Gujarat, but only in urban areas. Alternative working opportunities and poor economic conditions of the household could be the probable reasons which would eventually come out in the latter section of this study from the reported reasons of dropping out for male population.

**Table 4.2: Reasons for DO in vulnerable states**

Reasons for DO	Gujarat		West Bengal		Bihar		India	
	M	F	M	F	M	F	M	F
Not interested	23.97	27.31	31.28	19.52	33.88	18.42	39.46	23.1
Economic activities	46.06	23.39	57.59	39.87	48.32	24.77	42.65	24.32
Domestic activities	1.54	29.59	1.39	15.04	12.50	43.03	5.18	27.58
Poor School infrastructure	0.00	5.88	0.56	1.09	0.21	0.36	1.06	6.01
Non availability of female teacher/girl's toilet	0.00	0.00	0.00	0.00	0.00	0.00	0	0.36
Marriage	0.00	0.59	0.00	11.87	0.00	2.28	0	4.03
Completed desired level	4.61	3.19	0.43	0.00	0.47	0.53	1.21	1.52
Unable to cope with studies	19.23	7.00	3.30	7.30	1.19	0.69	6.50	6.36
Others	4.59	3.04	5.45	5.31	2.41	9.92	3.95	6.71

Source: Analysis of NSSO 71<sup>st</sup> round unit level data

Table 4.2 brings out the reasons behind dropouts, as reported by households. Interestingly, highest share of females dropping out from school due to marriage is in West Bengal. Also, dropout due to involvement in economic activity is the highest in the state both

for males and females. Among adolescent female dropouts, 30% report the prime cause being marriage, which is the highest not only among the vulnerable states, but also among all states.

**Table 4.3: Marginal effects from regression results of bivariate probit model for dropouts among adolescent girls and boys in West Bengal (1st stage being enrolment in a public school vis-a-vis a private school)**

Categories	Girls	Boys
Religious group ( Hindu reference)		
Muslim		0.01***
Others	-0.17***	
Social group (SC & ST reference)		
OBC		-0.06**
Education of household head (illiterate reference)		
Above secondary	-0.09***	
Above higher secondary	-0.13***	-0.19***
Log MPCE	-0.19***	-0.19***

*Note: Only significant factors are shown here. The main occupation levels of the household is taken in control.*

*Source: Analysis of NSSO 71<sup>st</sup> round unit level data; \*\*\*: Significant at 1% level, \*\*: significant at 5% level*

Table 4.3 gives the second stage bi-variate probit results of dropping out from school in adolescent among those who completed primary education. While religion plays a significant role among both boys and girls, Muslim boys tend to dropout more and girls from religious groups other than Hindu and Muslim tend to have lower dropouts. Caste has a strong effect among the boys only. Education of household head and monthly per capita expenditure of the household have negative effects on dropouts among both the sexes. Thus, a complementary income in the form of cash transfer would be expected to reduce dropouts at adolescent level.

The above picture brings out the critical picture of adolescent dropouts in the state of West Bengal. Given that it is difficult to improve the labour market conditions and expected returns from education in the short run, a policy intervention is desirable to correct the situation. The scenario described above also gives strong rationale of introduction of a

conditional cash transfer scheme to offset, at least partially, this trend of dropout by improving the expected gain from completing secondary education with a lump sum grant-in-aid.

## **4.2 Determinants of Underage Marriage**

The practice of child marriage is deep rooted in Indian culture. In the earlier days, it was deemed auspicious to get a daughter married off before eight. In the present day, however, economic considerations and lack of education also add to the religious and social beliefs. However, it has been found that strong political will and action often lowers the rate of child marriage. We discuss the common reasons behind child marriage in India here and then try to estimate the determinants of child marriage in West Bengal from DLHS 4 data.

Most child marriages in India are fallouts of economic factors like poverty and the still prevalent dowry system. In India, poverty is one of the main determinants of early marriage. Not only is this practice most prevalent in poor households, backward and remote regions are also more vulnerable. The poor parents think of girls as an economic burden for families. They try to marry their daughters at the early age to reduce family expense and to minimize the cost of marriages. It has been observed that in India, “girls from poor families are nearly twice as likely to marry before they are women than girls from wealthy families” (ICRW 2008b). The system of dowry is one of the major reasons for child marriage in India. Though dowry has been made illegal India, it is still rampant and extortion from the brides’ family is reported regularly. This makes the situation very difficult for poor families. In most communities of India, the dowry amount may increase as the girls get older and she requires an older and more established bridegroom. For these reasons, girls from poorer families try to marry their daughters at an early age (Kumari 2007). It has been found that the quantum of dowry increase with the age and educational level of the prospective brides and so, even some affluent and upper caste parents prefer to keep their daughters uneducated and marry them off young to avoid heavy dowry demand (Nagi 1993).

In many places, especially in rural and backward regions of India, marriage is often regarded as the only option available to adolescent girls. As Yadav (2006) has pointed out, “If young girls are not to be married off, alternative opportunities need to be provided to

them. The fact is that there are no such constructive opportunities for them". However, in many cases students drop out as they are not interested in studies or find it difficult to cope up. The boys who drop out often enter the labour market. However, since participation of girls in labour market is much lower than boys, the girls marry after they drop out. (Mehra and Gupta, 2006)

Child marriage is still prevalent in India due to lack of education, enlightenment and awareness among the people. There has been observed a clear association between education and delaying of marriage (Raj et al, 2010). The education level of both the partners in marriage plays an important role. In highly patriarchal societies, the husband's educational attainment is likely to matter as much as the wife's. Men from lower educational attainment are more likely to want much younger wives, who are performing more on traditional female roles. (Srinivasan et.al., 2015). Raj et al (2010) and Raj and McDougal(2012) pointed out that across nations it is the poor and least educated girls who are most vulnerable to early marriage. Most illiterate and just-literate parents do not want to continue the education of their daughters because they consider education is essential for boys who will bear the economic burden of family. They also think that girls will go to some other family by marriage and so it is not worthwhile to waste money on her education. (ICRW, 2012). It has been observed that in the states which were educationally developed, child marriage is less common than the states which educationally backward. However, in underdeveloped countries like India, lack of educational facilities or any alternative for girls in rural areas force parents to marry off their daughter early. (ICRW, 2013). Again, a report of ICRW(2012) observes that girls with higher educational attainment will tend to postpone their marriage, in order to improve their chances of better economic livelihood and independence.

Gender discrimination, the system of patriarchy, men's control over resources, minimum participation of women in labour markets, the lack of any identity of a woman other than that of a wife or mother is the harsh reality in India even today. The women are discriminated against in the labour market, education, and all other spheres of life and the practice of child marriage thrives under these conditions of discrimination (Sagada 2005, Mathur et al 2003). The patriarchal system of our society is an important reason behind child marriage in India. Patriarchy has a strong hold on Indian society. It operates at all levels of economic strata and contributes in lowering the status of women in every possible manner.



In our patriarchal society, girls are considered as “Par ki Dhan”(somebody else’s property). They are considered as liabilities and economic burden of families. Parents are conditioned to think that marriage is essential and the ultimate goal for girls. Therefore, they get their daughters married as early as possible to remove their liabilities. Often, young girls are encouraged to marry older men, because older husband will be able to act as a guardian against behavior deemed immoral and inappropriate.

High demand and availability of “suitable grooms” is one of the reasons for child marriage. Generally, economically and educationally backward people always have difficulty in finding suitable grooms for their daughters. However, child marriage is not only restricted to poor families, but is prevalent also in wealthy families of a higher socio-economic class, too. Sometimes affluent families are driven by the need to protect their girl’s honor and their family name by making them marry at the early age to a family of equal wealth or social status.

Since ancient times, child marriage has been practiced as a social norm in India. Social, religious leaders, neighbours and other members in the community often put pressure on the parents to get their daughters married at an early age. In India, early marriages have been organized as a cultural tradition. Yadav (2006) have observed that there is tremendous pressure from older members of the Indian society like grandparents and prevails on parents to marry off their young girls early. There is also the fear of not getting the suitable match if the marriage is delayed. Srinivasan and James (2015) pointed out that some religious communities tend to emphasize more on child marriage among females because of traditional customs are prevalent in the communities. Similarly, the rigid caste system has remained in Indian society since ancient period and to protect this caste system, parents and community leaders have emphasized on early marriage. According to Srinivasan et. al (2015), women from socioeconomically underprivileged communities, namely Scheduled Castes (SC) and Scheduled Tribes (ST), are more likely than those from other castes to marry at an early age because of cultural reasons.

Lack of social security is also one of the most important causes behind child marriage. Marriage is considered ‘safe’ to keep the girls protected from sexual harassment and incidents of rape related to girls (ICRW 2008a). Many parents feel compelled to marry off their daughter at an early age in order to ensure her physical safety and safeguard her chastity (Mathur et al 2003). Parents in rural areas usually get their daughters married early e

because often schools are located a long distance away from homes and parents are fearful of their daughters commuting to distant schools and the potential for sexual assault or involvement with men (Khan 1993). The literature indicates that living in rural areas increases the likelihood of marrying early. Girls in rural residences are more likely to marry 1.5 years younger than girls in urban areas (Westoff 2003). Many Indian parents feel that if their daughter is not married early, There is the risk of her ending up in a self – initiated marriage, or engaging in premarital sex, which could lead to pregnancy and loss of family respectability. (Raj et al, 2010, Verma et.al, 2013)..

Not only are household characteristics very important determinants of child marriage, the vulnerability of villages also play an important role. Vulnerability caused by natural disasters and regional or national conflict exacerbate the likelihood of early marriage for girls. For instance decades of war and the devastating 2004 tsunami in Sri Lanka pushed desperate families to marry off their young daughters to relieve economic strife. Girls were forced into early marriage with tsunami widowers, primarily to receive state subsidies and benefits for marrying and starting a family (ICRW, 2012).

One of the reasons for child marriages is that people to a large extent are not aware of the provisions of the Law. The finding of NFHS 1992-93, India, is that the child marriage regulation act is not widely known among women in India, particularly to those belonging to the disadvantaged sections of Indian society. There is a need for stronger political will to amend, enforce or create awareness about the Indian laws and act on child marriage.

To estimate the determinants of child marriage in West Bengal, prior to the introduction of the Kanyashree Prakalpa, we have used a logistic regression on DLHS 4 data. The explanatory variables include dummies for the woman's and her husband's educational qualification, the vector of village characteristics like village infrastructure quintile, natural disaster, presence of Mahila Mandal & Self Help Groups, implementation of employment and other welfare schemes, etc. We have also controlled for household characteristics like religion, caste and wealth quintile to which it belongs.

**Table 4.4: Determinants of child marriage among women in West Bengal**

<b>Women Age of Marriage &lt; 18 years</b>	<b>Coefficients</b>
Muslim	0.37***
Christian	-1.05***
Other religion	-0.78***
SC	0.20***
ST	-0.20*
OBC	-0.03
Husband primary education	0.36
Husband Middle education	0.33
Husband higher education	-0.12
Women primary education	-0.09
Women Middle education	-0.54***
Women Higher education	-2.08***
Wealth Quintile	-0.02
Village infrastructure quintile	-0.01
Natural Disaster	-0.02
Village with MahilaManda	-0.03
Village with Self Help Group	0.17*
Women & child development scheme score	-0.03
other welfare scheme score	-0.08
_cons	0.05***
Observations	7280
Pseudo R <sup>2</sup>	0.06

Sources- Own calculation from DLHS 4 data

\*\*\*: Significant at 1% level, \*: significant at 10% level

From the regression results in Table 4.4, we can see that Muslims girls have a higher probability of marrying before eighteen than Hindu girls while Christians have a lower probability. The education of the girl is very important in determining her age of marriage. A woman with middle or higher education had a significantly lower chance of marrying below the legal age. However, the chances of a girl with only primary education of marrying before eighteen were not significantly different from the illiterate ones. Interestingly, the husband's education level is not at all significant in determining the age of marriage of the girls indicating that even highly educated men were equally likely to marry underage girls as illiterate men. What is most important is that the wealth level of the family is not significant,

indicating that poverty is not one of the factors behind child marriage in West Bengal. Also, most of the characteristics of the village, captured by the village infrastructure quintile, the occurrence of any natural disasters, women and child development schemes operational there, presence of Mahila Mandal did not have any significant impact on child marriage. The only factor that is significant at the 10 percent level is the presence of self help groups. Thus, any development activities which improve the infrastructure of the village and the economic conditions of the villagers would not have any impact on the level of child marriage there.

This result, perhaps, is the reason why West Bengal has been steadily falling in terms of child marriage vis-a vis other states in India. While schemes which generated economic development in other states reduced child marriage also, in West Bengal none of the development schemes nor the economic growth had any impact.

Thus, a scheme specially targeting child marriage like the Kanyashree Prakalpa was definitely needed. Also, as education of the woman emerges to be the only factor that influences age of marriage (other than religion, which cannot be changed by policy), it was necessary that the scheme used education as a pathway to reduce child marriage. As income is not a significant determinant, any cash transfer directed towards eradicating child marriage would not have worked unless it had education as a dual objective.

Thus, it is expected, that the conditional cash transfer would reduce the adolescent dropout among girls and motivate them towards attaining higher education and these educated girls would then defer their marriage until they attained the legal age of eighteen.

# CHAPTER 5

## Descriptive Statistics

This chapter contains the general descriptive analysis of the two datasets, the DLHS 4 and the survey data which we would be using for evaluation of the programme. However, this is not aimed at comparing the two datasets as the purpose of collecting these datasets was different, the questionnaires were different and hence, the two datasets are not comparable at the micro-level.

### 5.1 DLHS 4 data analysis: An exploration

While looking at the mean age of marriage among men across Indian states as per DLHS 4 data, the age is one of the lowest in West Bengal after a very few others which have even lower mean age of marriage (Maharashtra, Chandigarh, Telengana etc.), while that figure among women is the lowest in West Bengal among non-EAG states. Similar results emerge for shares of men and women getting married before legal age of marriage. The dataset reports that more than 31% of surveyed women are married before their eighteenth birthday in the state (Table 5.1). Though the share was the highest in the state even in DLHS 3 dataset, the mean age of marriage among women was lower in a number of states. Thus it reflected deterioration in relative position of the state of West Bengal among Indian states.

*Table 5.1 Mean age at marriage and percentage of marriages below legally prescribed minimum age for Men & Women in India.*

State	DLHS-4 data		DLHS-4 data		DLHS-3 data		DLHS-3 data	
	Mean age at marriage		% of marriages below legal age at marriage		Mean age at marriage		% of marriages below legal age at marriage	
	Men	women	Men (<21)	women (<18)	Men	women	Men(<21)	Women(<18)
A & N	24.9	21.1	3.8	7.8	26	21.6	5.2	6
Andhra Pradesh	24.3	19.8	14.7	15.9	24	19	19.5	28.6
Arunachal P	24.5	21.3	18.3	13	25	21.7	14.5	8.2
Chandigarh	25.3	22.5	11.5	1.9	25	23.2	12.1	3.3
Goa	29.6	<b>25.3</b>	<b>1.7</b>	<b>0</b>	<b>30</b>	<b>25.1</b>	2.7	3
Haryana	23.8	20.8	17.3	5.9	23	19.7	27.4	15.9
Himachal Pradesh	26.2	22.3	2.9	0.5	26	21.9	6	1.6
Karnataka	26.4	20.5	7.2	14.1	26	19.8	11.1	22.4
Kerala	28.2	22.6	1	2.8	28	22.1	1.2	6.8
Maharashtra	25.1	20.1	9.3	12	24	19.3	12.4	17.6
Manipur	26.7	24.0	9.5	7	27	23.6	8.6	6.3
Meghalaya	27.1	23.4	12.2	5.7	24	21.1	27.7	15
Mizoram	26.1	23.1	13.5	6	25	21.7	20.9	9.9
Nagaland	27.1	24.6	2.6	6				
Puducherry	28.2	22.8	3.3	4.9	28	22.5	3.5	3.6
Punjab	24.6	21.9	11.7	3.9	24	21.3	15.5	5.8
Sikkim	24.6	22.8	15.5	8.3	25	21.5	21.1	16
Tamil Nadu	27.0	22.0	3.6	5.3	27	21.3	4.8	9.1
Telangana	24.0	19.8	11.8	10.7				
Tripura	26.2	20.9	13.5	18.9	26	20.2	16.5	21.1
<b>West Bengal</b>	<b>25.4</b>	<b>19.2</b>	<b>15.8</b>	<b>31.6</b>	<b>25</b>	<b>18.5</b>	<b>21.7</b>	<b>41.3</b>
Rural Area	25.6	21.94	11.75	10.15	23	19.2	28.4	26.9
Urban Area	26.6	22.7	6.21	5.62	26	21.2	12.6	11

*Source: Own calculation from DLHS 4 data and DLHS-3 Manual report : Reference period : 1-1-2008 to survey date (2012-13). All figure are in percentage*

Across different socio-economic characteristics, under-age marriage is dominant in rural areas, among BPL families, households following Islamic religious belief and among families with lowest wealth quintile (Table 5.2). However, education of respondent and her partner play different roles in terms of just under-age marriage (married between 15-17 years) and extremely under-age marriage (below 15 years). While illiterate women and her husband

have high chance of having extremely under-age marriage, those with just primary education have highest potential for just under-age marriage.

**Table 5.2: Demographic and Socio Economic characteristics of women in India and age of marriage in age cohort 20- 24**

Demographic and socioeconomic characteristics of women		(DLHS-4 data)			(DLHS-3 data)		
		Married %			Married %		
		< 15	15-17	18 +	< 15	15-17	18 +
Religion	Hindu	5.18	19.3	75.52	3.9	22	74
	Muslim	<b>5.41</b>	<b>22.17</b>	72.42	9.0	30.4	60.6
Caste	SC	5.28	20.5	74.22	17.5	32	50.3
	ST	<b>5.39</b>	<b>22.22</b>	72.39	14.9	38	46.9
	OBC	4.38	18.23	77.39	16.5	31	52.4
	OC	4.55	20.87	74.58	7	24	69.5
Type of locality	Rural	<b>5.85</b>	<b>24.63</b>	69.52	15.4	33	52
	urban	3.89	20.67	75.44	6.3	23	70.6
Highest education level of woman	Illiterate	<b>10.11</b>	29.09	60.8	25.3	40	34.7
	Primary	10.02	<b>32.67</b>	57.31	13.9	36.1	50
	Middle	5.57	29.45	64.98	6.7	29	64.7
	Secondary	2.91	22.03	75.78	1.9	16	82.5
	HS & above	0.77	9.46	89.77	1.1	4.7	94.2
Highest education level of husband	Illiterate	<b>9.45</b>	27.78	62.77	24.3	39.8	35.9
	Primary	8.31	<b>31.3</b>	60.39	16.4	36.5	47.1
	Middle	5.51	26.73	67.76	12	31.1	56.9
	Secondary	3.24	22.07	74.69	7.7	24.1	68.3
	HS & above	1.95	14.41	83.64	4	15.4	80.6
Having BPL card or Not	BPL	<b>6.22</b>	<b>25.62</b>	68.16	10.57	31.25	58.18
	APL	4.45	21.61	73.94	7.39	26.75	65.86
Wealth quintile index	Poorest	<b>10.82</b>	<b>29.99</b>	59.19	24.8	41	34.6
	Poor	7.91	26.24	65.85	20.8	38	41.5
	Middle	6.07	22.23	71.7	14	34	52.3
	Rich	4.01	18.46	77.53	7.8	27	65.1
	Richest	2.35	12.99	84.66	2.6	16	81.4

Source: Own calculation from DLHS 4 data and Srinivasan et. al. (2015) : Reference period : 1-1-2008 to survey date (2012-13)

The mean year of schooling is controlled by marital status and it also differs across age groups. However, data from DLHS 4 posit that mean age of marriage for women is lower in West Bengal compared to corresponding counterparts on Indian average (Table 5.3).

**Table 5.3: Mean years of schooling in India and West Bengal**

Age	Rest of India				West Bengal			
	MALE		FEMALE		MALE		FEMALE	
	Married	unmarried	Married	unmarried	Married	unmarried	Married	unmarried
<b>15-17</b>	8.56 (2.36)	9.4 (2.06)	9.36 (2.54)	9.51 (2.01)	8.22 (2.52)	8.44 (2.28)	8.34 (2.39)	8.86 (2.09)
<b>18-24</b>	9.35 (3.58)	11.09 (3.2)	9.87 (3.46)	11.8 (3.06)	8.1 (3.19)	9.1 (3.68)	8.33 (3.22)	9.41 (3.59)
<b>25-34</b>	9.86 (3.92)	11.47 (3.85)	9.41 (4.09)	12.12 (4.16)	8.35 (4.02)	8.6 (4.27)	8.20 (4.01)	9.2 (4.18)
<b>35-44</b>	9.63 (4.1)	10.1 (4.09)	8.46 (4.35)	9.63 (4.51)	8.78 (4.29)	8.94 (4.31)	8.07 (4.29)	8.12 (4.31)
<b>45-60</b>	8.56 (4.33)	8.79 (4.26)	7.14 (4.45)	7.79 (5.08)	8.85 (4.51)	8.89 (4.52)	7.53 (4.37)	7.9 (4.39)
<b>Above 60</b>	7.64 (4.48)	7.7 (4.59)	5.5 (4.24)	7.42 (5.12)	8.65 (4.6)	8.7 (4.6)	6.53 (4.17)	6.7 (4.2)

*Source: Own calculation from DLHS 4 data, within bracket-SD & without bracket-Mean*

## 5.2 Survey data analysis: An exploration

The demographic characteristics of the households surveyed are given in **Table 5.4**. Unlike the entire state, the share of Muslim population is higher, owing to inclusion of Murshidabad in the sample. Households belonging to scheduled caste and tribes (SC and ST) are higher in Koch Bihar. However, Haora seems to be hosting the highest share of BPL households. More than 70% of the households in Murshidabad have SHG members. The education and toilet infrastructure, however, seems to be least available in the same district, though access to pucca road is the best here. Murshidabad also suffers from frequent natural calamity (mainly flood). These figures do identify the district to be the least developed in terms of most indicators.



**Table 5.4: Demographic characteristics of the surveyed households**

Characteristics	Total	Haora	Murshidabad	Koch Bihar
<b>Religion</b>				
Hindu	49.01	62.37	8.69	79.11
Muslim & others	50.99	37.63	91.31	20.89
<b>Caste</b>				
General	53.93	50.54	84.11	24.18
SC & ST	33.89	39.84	2.12	61.50
OBC	14.18	8.60	13.78	14.32
<b>Households with BPL card</b>	55.83	68.17	53.81	44.60
<b>Household type</b>				
Joint	25.68	29.03	24.79	23.00
Nuclear	51.80	42.15	57.42	56.10
Broken	22.52	28.82	17.80	20.89
<b>Share of households with members of SHG</b>	36.32	66.24	72.03	51.64
<b>Average time to reach nearest high school for boys (mins)</b>	26.45	23.86	32.62	22.44
<b>Average time to reach nearest high school for girls (mins)</b>	26.95	24.21	32.72	23.49
<b>Average time to reach the nearest pucca road (mins)</b>	3.75	4.94	1.80	4.60
<b>Average time to reach the nearest bank (mins)</b>	42.72	46.07	38.59	30.35
<b>Share of households with toilet within the house</b>	78.94	83.66	61.02	93.66
<b>Share of households reporting any kind of natural calamity in preceding 1 year</b>	28.76	64.95	87.71	58.92

Source: Analysis of survey data

Table 5.5 posits that across three age groups the mean age of marriage decreased over time. For the entire sample of members residing in 1021 households for which we collected information, the mean age of marriage for the women is 17.01 years and for the men the corresponding figure is 20.0 years.

**Table 5.5: Mean age of marriage among members aging 15-34 years**

Age groups	Male	Female
15-17	NA	15.72
18-24	20.31	17.27
25-34	21.64	17.51
All	20.0	17.01

Source: Analysis of survey data

**Table 5.6: Mean years of schooling among members aging 15-34 years**

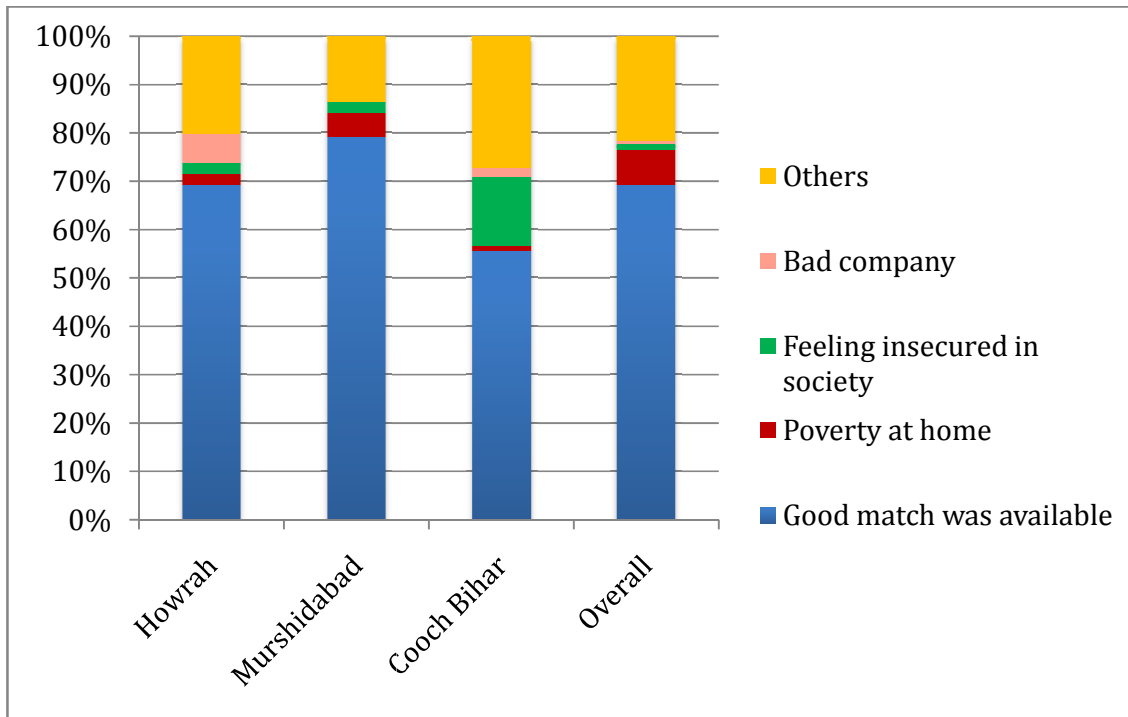
Age	West Bengal			
	MALE		FEMALE	
	Unmarried	Married	Unmarried	Married
15-17	16.66	8.61	8.33	10.93
18-24	25.64	15.4	11.74	11.53
25-34	NA	12.71	13.91	11.6
Dropout below 18 years %	81.02		75.46	

Source: Analysis of survey data

As expected, the mean years of schooling increases with age of the respondents. The mean age of education is higher for male compared to female in West Bengal, though dropout before eighteen years of age is higher for boys (Table 5.6). Essentially this hints that those men who continue education, complete higher education more frequently and women continue till a threshold and then stop before acquiring higher education. As the persons get married, the mean age of schooling drops significantly across these age groups; thus identifying continuation of education as a pathway to reduce underage marriage.

Looking at the stated reasons behind the under-age marriage of those adolescent girls (aged between 18-25 years) married before 18 years, the most predominant is availability of good match (Figure 5.1). As boys drop out early in the state, availability of suitable groom is difficult for better educated girls, as in a patriarchal society husbands are supposed to be more educated than their wives. Poverty at household is significant only in Murshidabad. Thus overall in three districts nearly 70% of the girls report that availability of a good match could not be avoided even at the tender age.

**Figure 5.1: Reasons behind Underage marriage of the girls**

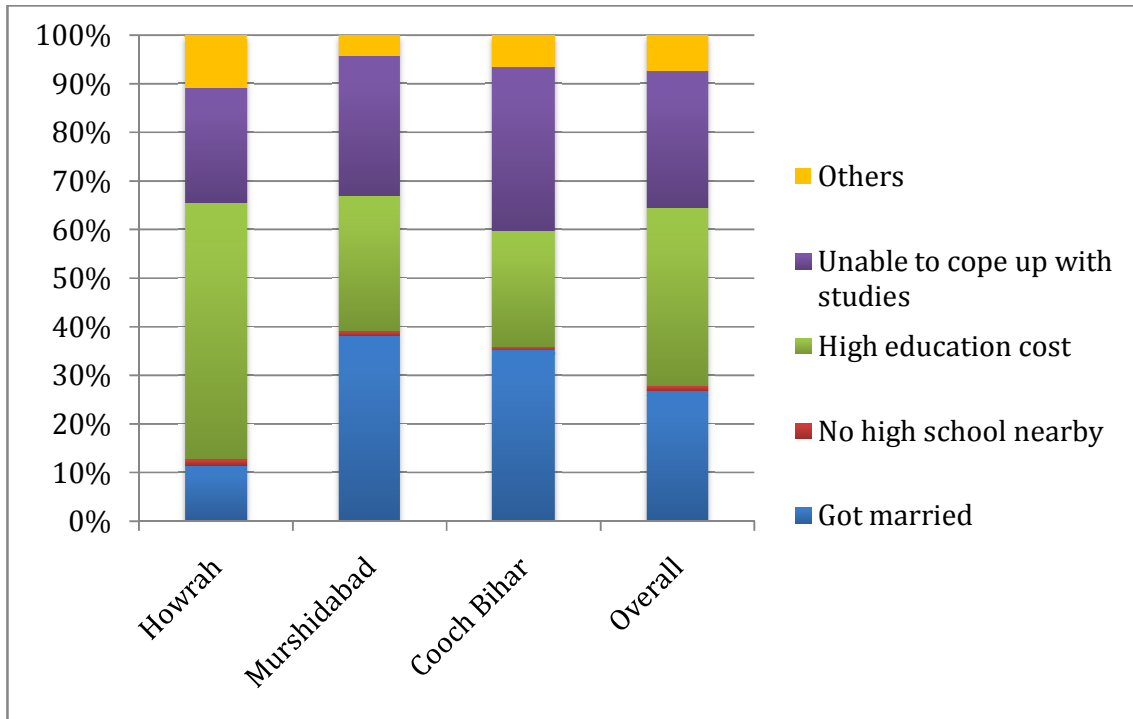


Source: Analysis of survey data

Exploring the reasons reported by the adolescent girls who dropped out before 18 years of age (Figure 5.2), there seems to be more varied across districts. Getting married and hence dropping out from school is the most cited reason behind adolescent girls dropout in Murshidabad, while in Haora majority of the girls reported high cost of education as the prime reason. Around 20-25% of girls in all three districts report that they were unable to cope up with studies and hence left the school. These results actually invoke certain thought-provoking questions. While no school nearby was seldom given the main reason behind dropping out, it meant access to high school for girls is high in rural Bengal. On the other hand, high cost of education in spite of being taught in government schools where there is no school tuition fees, came up as a surprise. While disaggregating the cost components of education, on the average Rs 450 is spent monthly on private tuition, thus substantially pushing up the cost for education. This is supported by anecdotal evidence from NSSO 71<sup>st</sup> round where West Bengal tops the list of major states on per capita expenditure on private tuition outside school (only second to Tripura among all states). Again frequent reporting of inability to cope up studies at secondary level means schools are not being enjoyed by a majority of girls, raising questions on quality of education imparted. This too is supported by

anecdotal evidence from poor quality of school education in the state by ASER reports in preceding years.

**Figure 5.2: Reasons behind Under-18 years dropouts of the girls**



Source: Analysis of survey data

# CHAPTER 6

## Coverage of Kanyashree Prakalpa and Changes

This chapter deals with coverage of the Kanyashree Prakalpa and the corresponding changes that were observed in the society as a whole. It is based on the analysis of the survey data where the girls are divided into three age cohorts 14-18 (category 1), 19 – 21 (category 2) and 22 -25 (category 3). We try to analyze the extent of coverage of this programme, and what proportion of girls aged between fourteen and eighteen are still out of the reach of this scheme as they have dropped out or got married despite the existence of this scheme. We have also tried to examine to what extent the scheme was properly targeted by examining to what proportion of girls from families exceeding the income stipulated by the government have availed this scheme. We also compare the intra household bargaining power of the Kanyashree recipients vis-à-vis the non recipients and also that between age category two and three in terms of early marriage discontinuing education. The aspirations of the girls availing the CCT have also been compared with those not under it. Lastly, we have examined to what extent the underage marriages were self-initiated.

### 6.1 Coverage of Kanyashree Programme

Table 6.1 posits the coverage of the eligibility of the programme. The girl can come under KP only if she is unmarried and not dropped out from school. The table shows that in the districts of Haora and Murshidabad nearly one fourth of adolescent girls in the age group 14-18 years are not eligible of the programme, that is they are either married or dropped out or both. A clear exception is Koch Bihar as the ineligible share is below 20%.

It is interesting to see that between the two age cohorts 19-21 years (who were exposed to KP) and 22-25 years (who were not exposed to KP) under-age marriage and dropouts reduced in all three districts.

**Table 6.1: Proportion of girls between 14 – 18 fulfilling KP criteria**

Districts	Blocks	Not school going	Married	Not school going/ Married in spite of KP	
Haora	Sankarial	11.78	9.09	14.81	22.96
	Uluberia	29.02	21.77	30.6	
Murshidabad	Hariharpara	31.84	28.42	34.61	26.17
	Suti 2	24.09	13.56	24.89	
Koch Bihar	CB 2	9.58	8.31	12.46	17.07
	Sitai	19.59	19.93	21.96	

Source: Analysis of primary data

Across districts the share of KP beneficiaries is the highest in Haora and the lowest in Murshidabad. Though in Murshidabad 75% of girls in the age group were eligible, the coverage among them was only 27%. Thus the coverage of KP is not very high in either of the districts (Table 6.2).

**Table 6.2: Coverage of KP across districts**

District	Age group 14-18 years	Age group 19-22 years
Haora	57.58	21.43
Murshidabad	26.92	17.82
Koch Bihar	53.33	30.30
Overall	47.19	23.15

Source: Analysis of primary data

The benefits of Kanyashree were supposed to be offered to girls belonging to households with annual income not exceeding 1.20 Lakhs. Since it is difficult to collect income data from household, we collected family expenditures per month in our primary survey. Creating two categories of family expenditures below and above 1.20 Lakh annual expenditures, we attempt to locate the benefits incidence. While on the whole, the coverage varied between to 25%, higher coverage was found in higher income category. Though the difference is not statistically significant, it clearly hints towards wrong targeting (Table 6.3).

**Table 6.3: Bad targeting of the program among those who are unmarried & studying**

Family Expenditure category	KP recipient	Non KP recipient
Less than stipulated family income pa	23.85	76.15
Greater than Rs stipulated family income pa	26.23	73.77

Source: Analysis of primary data

Table 6.4 shows that the fall in dropout before eighteen years was the most pronounced in Haora. The corresponding fall in under-age marriage was highest in Murshidabad. The combined output of KP (either dropped out or married or both before 18 years) dropped most significantly in Haora.

**Table 6.4: Changes in dropouts and marriage before 18 years**

Age Cohort	% DO before 18 years	% Marriage before 18 years	Either DO or marriage before 18 years
Haora			
19-21	53.49	19.83	28.71
22-25	87.16	27.33	73.05
Change* %	38.63	27.44	60.70
Murshidabad			
19-21	62	29.47	43.27
22-25	71.22	50.00	73.43
Change* %	12.95	41.06	41.07
Koch Bihar			
19-21	51.85	30.23	44.58
22-25	71.01	35.86	63.83
Change* %	26.98	15.7	30.16
Overall			
19-21	56.18	25.08	38.54
22-25	76.79	37.39	69.95
Change* %	26.84	32.92	44.90

Note: \* the change was calculated as the fall in percent points as % share of the base period

Source: Analysis of primary data

## Box 7.1: The KanyashreeYodhhas – a movement worth emulating



The movement of “**Kanyashree Yaodhhas**” was introduced in five blocks by the district administration of Murshidabad with the help of an NGO, The Child in Need Institute (CINI). This constituted a group of girls handpicked for their leadership qualities and trained in useful skills like martial arts, computer literacy, home nursing, first aid, etc. Along with this, they were made aware about the evils of child marriage and the need for continuing education. They were encouraged to spread their knowledge among their friends and other villagers. These girls have been in the news frequently, for preventing child marriages among their friends and villagers. Inspired by the success of this experiment, this scheme has now been introduced in all the other blocks of this district. The district has now achieved a very fine network of extremely motivated young girls who keep track of their friends who drop out of school or are forced to get married early and talk to their parents and duly inform the CINI and government officials who step in.



## Box 6.2: KanyashreeYodhhas – some inspirational stories



Beauty Dutta of Rukunpur village in Hariharpara district of Murshidabad is a KanyashreeYodhha. She came to know that AarjumaKhatun, a 13 year old studying in class VI was being forced into marriage. She immediately alerted the CINI workers who got in touch with the district officials .

She is very pleased to have been of help and says “I got training in home nursing and first aid and acquired skills to help me in my later life. But my greatest pleasure was being able to save an innocent girl being forced into marriage. I have received a lot of support from my family and community”

AshapuraBiswas of the Chuyan village of Hariharpara, Murshidabad, also a KanyashreeYodhha took a very courageous step when she learnt that SangitaBiswas, a 13 yearold girl was being forced into marriage by her parents. She informed the District administration and the CINI representatives who stopped this illegal marriage.

Not only that, she motivated Sangita to enrol in a nearby school and continue her studies and kept in touch with the girl and her parents to motivate



## 6.2 Intra-household bargaining power

The next set of changes is related to intra-household bargaining power in pressure and resistance to early marriage and dropout. Across the two age cohorts discussed above, the family pressure for early marriage reduced in all three districts (Table 6.5). Also, the successfully resisting such pressure increased everywhere representing a rise in intra-household bargaining power. Similarly, Table 6.6 shows the trend of fall in pressure for dropout in districts except Murshidabad. However, the rise was insignificant statistically.

**Table 6.5: Pressure and resistance towards early marriage**

			Haora		MSD		KB	
Age categories in Years			19-21	22-25	19-21	22-25	19-21	22-25
No pressure from family			91	85.83	54.46	50.42	56	53.33
Pressure from family	Resisted	Successful	3	2.5	5.94	2.52	6	3.33
		Unsuccessful	0	0.83	7.92	3.36	14	6.67
	Didn't resist		6	10.83	31.68	43.7	24	36.67
Total			100	100	100	100	100	100

Source: Analysis of primary data

**Table 6.6: Pressure and resistance to dropout**

			Haora		MSD		KB	
Age in years			19-21	22-25	19-21	22-25	19-21	22-25
No pressure			84.69	82.05	86.73	88.07	75.51	80.17
Pressure	Resisted	Successful	5.1	0.85	1.02	1.83	4.08	0
		Unsuccessful	4.08	6.84	9.18	3.67	11.22	6.03
	Didn't resist		6.12	10.26	3.06	6.42	9.18	13.79
Total			100	100	100	100	100	100

Source: Analysis of primary data

Moving from macro-level changes in bargaining power, the next analysis deals with micro-level changes comparing KP recipients and non-recipients. Across the age groups, clearly KP beneficiaries faced lower pressure from family to marry early (Table 6.9) or to dropout from school compared to non-KP beneficiaries (Table 6.7). They also showed better intra-household power to resist these pressures (Tables 6.10 and 6.8).

**Table 6.7: Pressure for early DO – across KP status**

KP Status	No Pressure came	Pressure came only once	Pressure came multiple times	Not attended school
Age 14-17 years				
NON KP	93.65	3.17	2.65	0.53
KP	95.86	1.78	2.37	0
Age 18-21 years				
NON KP	77.83	9.57	9.13	3.48
KP	87.14	7.14	5.71	0
Age 22-25 years				
NON KP	79.15	7.32	8.73	4.79

Source: Analysis of primary data

**Table 6.8: Resisting early marriage among KP and non-KP participants**

KP Status	YES	NO
Age 14-17 years		
NON KP	45.45	54.55
KP	71.43	28.57
Age 18-21 years		
NON KP	60.47	39.53
KP	88.89	11.11
Age 22-25 years		
NON KP	88.89	11.11

Source: Analysis of primary data

**Table 6.9: Pressure for early marriage across KP status**

Kp Status	No pressure came	Pressure came only one time	Pressure came multiple times
Age 14-17 years			
NON KP	90.48	6.88	2.65
KP	93.49	3.55	2.96
Age 18-21 years			
NON KP	61.74	17.39	20.87
KP	84.29	10	5.71
Age 22-25 years			
NON KP	62.54	17.18	20.28

Source: Analysis of primary data

**Table 6.10: Resisting early dropouts among KP and non-KP participants**

Kp Status	YES	NO
14 - 18		
NON KP	33.33	66.67
KP	54.55	45.45
19 - 21		
NON KP	34.83	65.17
KP	54.55	45.45
22 - 25		
NON KP	17.29	82.71

Source: Analysis of primary data

### 6.3 Changes in aspirations

Capability approach by Prof Amartya Sen talks about the capability of the person, not just what he or she does. Thus it is extremely crucial to see if the KP has been able to change the mindset of the girls in the state to think about their future. Generally gender roles of women are too narrowly defined in a patriarch society and her activity is restricted to the household chores and child rearing. If any change appears in the mindset of the girls, then only the program effect, if any, can be sustained. We had asked the girls about where do they foresee themselves at the age of 25 years: married with children and no earning (representing the strong gendered roles), married and earning (some change), unmarried and earning or unmarried and in higher studies. The last two represent strong liberal open roles of the women.

**Table 6.11: Changes in aspirations across age groups and KP status**

<b>Q: How do u foresee yourself at the age of 25 ?</b>					
	Married with children, not earning	Married & earning	Unmarried & earning	Unmarried & in higher studies	Cannot say
Age 14-17 years					
KP	13.02	30.77	25.44	27.81	2.96
Non KP	22.75	32.8	13.76	22.75	7.41
Age 18-21 years					
KP	25.71	32.86	21.43	17.14	2.86
Non KP	36.52	42.17	5.65	5.22	6.96

Source: Analysis of primary data

Table 6.11 shows that KP beneficiaries express far more progressive aspirations for themselves in both age groups, thus poised to make some changes in the social status and norms for the women.

### **Box 6.2: Wushu Training in Tufanganj, Kochbihar: An Innovation**

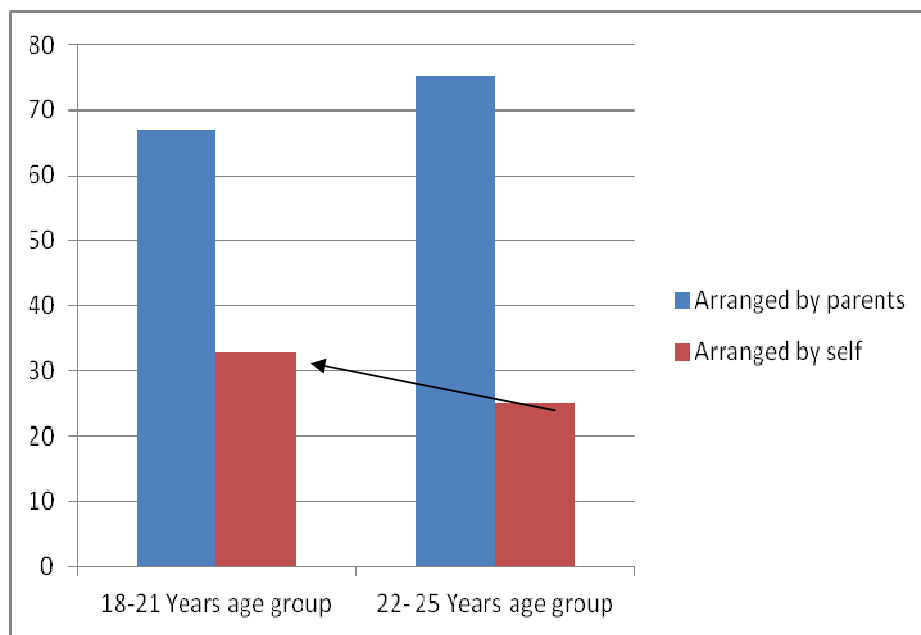


A traditional Chinese martial art form, Wushu, has been introduced in Tufanganj Devi Girls school, in Koch Bihar district, which was perceived as some additional involvement of the adolescent girls by the district project manager of Kanyashree Programme. The training is given by a national level Wushu trainer. Initially it was targeted for the Kanyashree girls for self defense. Afterwards, due to immense popularity, all girls of the school were given this support. Till May, 2017 1500 girls were enrolled for the training. Girls appeared very happy in this program. After a preliminary training, interested students can opt for certificate course from Wushu Association of India. Last year, a student received 3<sup>rd</sup> position in Bengal Wushu Olympic. More importantly, most of the girls appeared to be more confident to protest any type of misbehaviour against them in the society. One girl shared her personal experience of protest and resistance that she had put up against a miscreant at

## 6.4 Self-initiated Marriage

It was found that over the age cohorts, there has been a sustained increase in self-initiated under-age marriage, along with a fall in under-age marriage arranged by parents (Figure 6.1). On one hand it indicates that adolescent girls are becoming more empowered to take their decisions specially defying social norms, while on the other hand they often tend to use that empowerment to take wrong decisions in life. Keeping in mind that pre-marital relationships, leave apart pre-marital sex, bearing a very strong social taboos in Indian culture, adrenal rush among the girls in matured adolescence (16-18 years) leads them to get involved in romantic relations often with local boys and to avoid social stigma gets married even against parent's wishes. Unless strong awareness campaign and sex education is offered to these girls, it might lead to overall rise of under-age marriage very soon.

**Figure 6.1: Under-age Marriages arranged by parents and self**



*Source: Analysis of survey data*

### Box 6.3: The story of two siblings

Ms Sonali Das, resident of urban areas of Howrah, was not a good performer in studies. She was shifted to her maternal uncle's place in Purba Medinipur and got admission to a local school at the age of 16 years. Within six months, her parents suspected her to be romantically involved with a local boy and immediately arranged for marriage. Ratna got married at the age of 17+ years, marginally missing KP2 completion.



Ms Rupali Das, Sonali's younger sibling, 17 years now, passed Madhyamik Examination in 2016 with 75% marks. She seemed to be a good student with soft spoken nature. She was enrolled as KP recipient right from age 14 years and received K1 money regularly. Immediately after getting admission to class XI, she chose to get married to a local boy, against parents' approval. She was afraid of her sister's fate. She was 16+ then and immediately got pregnant. This is her current photo with her husband and daughter.

# CHAPTER 7

## Impact of Kanyashree Prakalpa

While it is observed from the previous analysis that the proportion of girls getting married or dropping out of education before eighteen is less among the girls aged 18 – 21 years than those in the control group aged 22 – 25 years, whether the change is due to the impact of the Kanyashree Prakalpa or due to the general development induced downward trend, cannot be confirmed unless a proper impact evaluation is done, taking into account this trend. In this chapter, we try to estimate the impact of the programme on adolescent dropout and underage marriage by using the difference-in-difference technique after matching each girl in the treatment group (18 – 21 years) with the control group (22 – 25 years) using propensity score matching techniques.

To estimate the impact of the Kanyashree Prakalpa on marriage or dropout before eighteen or either, we take girls aged between eighteen and twenty one as the treatment group in the survey data. These girls have crossed the age of eighteen and therefore, their age of marriage and dropout (if any) will reveal whether they have married before eighteen or not. The girls aged fourteen to seventeen years have been left out as we cannot say for sure that an unmarried girl of fifteen years (say) will remain unmarried till eighteen years. The outcomes considered are (i) dropout before eighteen years, (ii) marriage before eighteen years and (iii) either dropout or marriage before eighteen years and they are all are binary variables assuming the value one when the girl drops out, marries or does either of the two and zero if not. The second column of Table 7.1 shows the average difference in outcomes of the Kanyashree recipients (aged between 18 and 21) and their matched counterparts (aged 22-25). As is evident from the table, there is a significant reduction in all the three outcomes for the Kanyashree recipients. That is, the proportion of girls marrying before eighteen has declined by 0.22 percent points, those dropping out before eighteen has declined by 0.39 percent points and those either discontinuing education or marrying before eighteen has declined by 20 percent points. In order to check to what extent these drops have been



influenced by the Kanyashree Prakalpa, we have calculated the average difference in these outcomes between girls aged between 18 – 21 years and their matched counterparts aged between 22 – 25 years from the DLHS 4 data. Column 3 in Table 7.1 gives this difference and we observe that there had been significant reductions in the proportions of girls getting married or dropping out or doing either of the two among these two age cohorts even before the introduction of the scheme, but these were much smaller. The difference of these two differences (in column 4 of Table 7.1) gives us an estimate of the impact of the Kanyashree Prakalpa in reducing dropout and underage marriage. As we can see, there has been a significant reduction in the proportion of girls dropping out or marrying before eighteen years among the Kanyashree recipients.

**Table 7.1: Impact of the Kanyashree Prakalpa on the recipients**

	<b>Difference between KP recipients (18-21) and age group 22-25 (survey data)</b>	<b>Difference between 18 -21 and 22 -25 DLHS data</b>	<b>Difference in difference</b>
DO_18	-0.39***	-0.01***	-0.39***
UM_18	-0.22**	-0.08***	-0.14***
DO_18/ UM_18	-0.20***	-0.08***	-0.12***

Source: Calculation from primary survey data; \*\*\*: Significant at 1% level, \*\*: significant at 5% level

The Kanyashree Prakalpa had been introduced by the government with an eye on removing the malaise of child marriage from the state and encouraging education among adolescent girls. It sought to bring about a social change in the norms and practices regarding marriage and education of girls. To check how far this scheme has actually had an impact on society as a whole, we estimated the impact of this scheme on all girls aged between 18 and 21 in the survey data using the same technique as discussed above. Here we matched all the girls between 18 – 21 years in the survey *and* DLHS 4 data with those aged between 22 – 25 years in the respective data sets. The average difference in outcomes is given in the second and third columns of Table 7.2 respectively. The impact of the scheme on society has been estimated as the difference in these differences and is shown in column four of the table. As is shown in Table 7.2, there has been a significant decline in the proportions of girls getting married or dropping out before eighteen among all girls in the society and not just the

Kanyashree recipients. Thus, we can say, that the scheme has indeed succeeded in reducing child marriage and adolescent dropout in the state.

**Table 7.2: Impact of the Kanyashree Prakalpa on dropout or marriage before eighteen among all girls**

Changes	Difference between two age cohorts in 2017 Survey Data	Difference between two age cohorts in 2012 DLHS 4	Difference in difference
	D11	D10	D2= D11 - D10
<b>(between 18-21 years &amp; 22-25 years)</b>			
DO_18	-0.24***	-0.01***	-0.22***
UM_18	-0.16***	-0.08***	-0.11***
UM or DO_18	-0.17***	-0.08***	-0.09***

Source: Calculation from primary survey data; \*\*\*: Significant at 1% level

As a robustness check, we estimated the impact of the scheme on the proportion of girls marrying or discontinuing education at the age of sixteen. As sixteen is the age when the students generally complete their secondary education, rate of dropout and marriage at this age is pretty high (as pointed out in earlier chapter). To estimate the impact on the girls aged between sixteen and twenty one, we matched them to their counterparts in the age cohort 22 - 25 and estimated the difference in difference after PSM matching in the same manner discussed above. As is evident from Table 7.3, the impact of the scheme on marriage and drop out and either marriage or dropout is significant.

**Table 7.3: Impact of KP on Dropout/ Marriage at 16 among all girls**

Changes	Difference between two age cohorts in 2017 Survey Data	Difference between two age cohorts in 2012 DLHS 4	Difference in difference
	D11	D10	D2= D10-D11
<b>Women aged 16 years &amp; above women (between 16-21 years &amp; 22-25 years age cohorts)</b>			
DO_16	-0.17***	-0.05*	- 0.13***
UM_16	-0.13***	-0.07***	- 0.11**
UM or DO_16	-0.12***	-0.1***	- 0.11

Source: Calculation from primary survey data; \*\*\*: Significant at 1% level, \*\*: significant at 5% level

To check whether the programme had similar impacts on Hindus and Muslims, we have estimated the impact of the scheme on Hindu and Muslim girls separately using similar

difference-in-difference techniques after PSM between girls aged between 18- 21 years with those aged between 22- 25 years in both survey and DLHS 4 data. It is estimated that the impact of the scheme on the dropout is higher among Hindus, while the impact on under-age marriage is higher among the Muslims (Table 7.4).

**Table 7.4: Difference in Impact of KP across religions**

	<b>Difference between age groups 18-21 &amp; 22-25 Survey (2016 -17)</b>	<b>Difference between age groups 18-21 &amp; 22-25 DLHS (2012-13)</b>	<b>Difference in difference</b>
<b>Drop Out before 18 years</b>			
Hindu	-0.32***	0	-0.32***
Muslim	-0.25***	0.02	-0.27***
<b>Marriage before 18 years</b>			
Hindu	-0.07***	-0.02	-0.05
Muslim	-0.2***	0	-0.2***
<b>Drop Out/ Marriage before 18 years</b>			
Hindu	-0.13***	-0.01	-0.13***
Muslim	-0.2***	0.05	-0.25***

Source: Calculation from primary survey data; \*\*\*: Significant at 1% level

Though the Kanyashree Prakalpa was introduced throughout the state at the same time, during our field visit we observed differences in the intensities of implementation. These differences sometimes stemmed from the difference in affluence across regions. Sometimes, they were due to the lack of initiatives of the school. We have tried to examine whether the difference in the intensity of the programme had any impact on the dropout and underage marriage of the girls. For this, the villages were divided into high and low intensity villages according to the intensity of enrollment in the programme in the nearest school (as discussed in Section 2.3). We then matched the girls aged between 18 – 21 years to those aged between 22 – 25 years in both the regions separately and calculated the first differences. These differences captured in **Table 7.5** give us the change (in percentage points) in dropout and underage marriage between the girls of the two age groups. The difference-in-difference in column four gives us how the difference in the intensity of implementation of the programme had an impact on the rate of dropout and early marriage. As we can see, the fall in dropout in high intensity areas was higher than low intensity areas (with weak statistical

significance), though the decline in underage marriage before 18 years was far more pronounced in low intensity areas compared to high intensity areas. This possibly hints towards low eligibility of women in terms economic and social criteria in low-intensity areas. Thus being less vulnerable, they automatically perform better in reducing the underage marriage.

**Table 7.5: Impact of different intensities of implementation on adolescent dropout and underage marriage**

Changes	High intensity (Survey Data)	Low Intensity (Survey Data)	Difference in difference
	D11	D10	D2= D11 - D10
<b>(between 18-21 years &amp; 22-25 years)</b>			
DO_18	-0.26***	-0.20***	-0.06*
UM_18	-0.09***	-0.13***	0.04**
UM or DO_18	-0.11***	-0.12***	0.01

Source: Calculation from primary survey data; \*\*\*: Significant at 1% level, \*\*: significant at 5% level,

\*: significant at 5% level

Since the scheme was introduced in 2013, the girls in the treatment group (18 -21 years) have different levels of exposure to the programme. Those aged twenty or twenty one years in 2016 were sixteen or seventeen years when the scheme was introduced and hence, were exposed to the scheme for only one or two years. However, those aged eighteen or nineteen years had higher levels of exposure. It is to be expected that the impact of the scheme will be greater, the higher is the level of exposure. In order to estimate the difference in impact due to difference in exposure, we have compared the girls aged 18-19 years (high exposure) with those aged 20-21 years (low exposure) after PSM in the survey and DLHS data (Table 7.6). Surprisingly, though the difference in dropout or underage marriage is not significantly different in 2012-13, the proportions have significantly increased in the survey data. The impact of the exposure to the scheme, that is, the difference-in-difference calculated by removing the time trend thus shows that dropout and underage marriage is significantly higher among those with a lower exposure to the scheme!!! Thus, though the scheme had a positive impact on both underage marriage and adolescent dropout, this impact seems to be *dwindling over the years and is a matter of concern*. One of the possible reasons behind this may be the fall in the real value of the KP2 money. It has remained constant at Rs 25,000 over the years, though the KP1 money has been increased from Rs 500 to Rs 750. Another

reason may be that girls who were near eighteen years when the KP was announced decided to defer their marriage and continue education for another couple of years to get the money. However, for the younger girls, the waiting of four or five years to get the money was not incentive enough or represented too long a gestation period. A third possible reason may be the increase in self-initiated underage marriage which we will discuss shortly.

**Table 7.6: Impact on different exposure levels**

	Difference between matched high exposure (18- 19) and low exposure (20 – 21) girls		Difference in difference
	Survey (2016 -17)	DLHS (2012 -13)	
UM_18	0.12***	0.03	0.09*
DO_18	0.21***	0.05	0.16***
UM or DO_18	0.16***	0.08	0.08**

Source: Calculation from primary survey data; \*\*\*: Significant at 1% level, \*\*: significant at 5% level,

\*: significant at 5% level

As we have observed from data exploration that self-initiated underage marriage has increased since the introduction of the Kanyashree Prakalpa, we tried to estimate the impact of the scheme on such marriages. However, as the DLHS data does not distinguish between self-initiated underage marriage and underage marriage organized by parents, we have tried to estimate whether the intensity of implementation had any impact on (i) self initiated underage marriage and (ii) underage marriage organized by parents.

**Table 7.7: Impact on self initiated underage marriage**

	Difference between 18-21 and 22-25 after matching		D2
	High intensity of the program	Low intensity of the program	
UM_18 arranged by parents	-0.26***	-0.22***	-0.03
U_18 arranged by self	0.09	-0.05	0.15***

Source: Calculation from primary survey data; \*\*\*: Significant at 1% level, \*\*: significant at 5% level,

\*: significant at 5% level

The second and third columns of Table 7.7 show the difference in self-initiated marriage and those organized by parents between the age groups 18-21 years and 22-25 years after matching for two levels of intensity of implementation. Interestingly, the proportion of

underage marriages arranged by parents has declined while those initiated on their own has increased significantly. This actually compounds the fear of parents that drove them to marry their daughters at an early age – that if not married off early, they will enter into a romantic relationship and get married, something which is still considered a taboo in most parts of India. It is probable, that in villages where the implementation was strong, parents deferred the marriage of their daughters, but this increased the probability of them marrying before eighteen themselves.

Such increase in underage marriage initiated by the girls themselves brings to light the need for awareness campaigns along with the cash transfer. A conditional cash transfer is a very good instrument to bring about a social change, but in order to sustain the impact, it needs to be supplemented with a wide spread campaign and training programmes.

# CHAPTER 8

## Policy Suggestions

The Kanyashree Prakalpa has generated a huge response and has been hailed nationally and internationally as a scheme which is capable of bringing in social change in marriage practices and educational attainments of women in West Bengal. This report has estimated the impact of this conditional cash transfer on underage marriage and adolescent dropout among girls and found that there has indeed been significant improvement in these two parameters in the four years since the implementation of the programme. The mindset of the girls who have availed this scheme has changed and they now aspire to higher studies and employment. The running of this programme is smooth and there are very few hitches which a girl might face in the entire process of enrolling for the scheme and finally getting the lump sum amount at the age of eighteen. However, although the scheme has attained huge popularity and has achieved considerable success, this study identifies a few major concerns which should be addressed in order to sustain the impact of this programme.

First, as reported in Chapter 7, though the initial impact of this programme was substantial, the impact seems to have dwindled over the years. The proportion of girls dropping out or marrying before eighteen seem to have increased in the last two years despite the huge fall in the first two years of implementation of the programme. This is a serious issue as it suggests that the programme might not be able to achieve any impact in the long run if this trend continues. One possible reason for this decline in impact may be the fall in the real value of the amount given at the age of eighteen. This amount has remained constant at Rs 25,000 over the last four years though the annual grant has been increased from Rs 500 to Rs 750. A rise in the KP2 amount may be considered by the government.

Another possible reason for the dwindling impact may be the rise in self-initiated underage marriage which nullifies the impact the programme has in reducing social pressure among parents to get their daughters married off early. Such marriages may actually lead to a vicious cycle of early marriages. Parents, afraid of girls entering into undesirable alliances and marriages, would want to marry off their daughters to a person of their choice as soon as

she reached maturity (which is usually around sixteen or seventeen). Girls, on the other hand might rush into marriage before their parents could arrange their marriage which would only serve to increase the fears of their parents. The Kanyashree Prakalpa with an eye on empowering adolescent girls has indeed made them financially literate and reduced pressure from families regarding discontinuing education and marrying early. However, without adequate awareness about the evils of early marriage and the need for education, such policies cannot hope to have an impact in the long run. Awareness campaigns among girls, generating leaders among them who can motivate their friends not to take hasty and wrong decisions and giving them sex education at this crucial junction of life is a something that the government should surely consider. In this respect, the efforts of the Murshidabad district administration in developing the idea of “Kanyashree Yodhhas” are laudable. Similar strategy may be adopted in all the districts to improve and sustain the impact of the programme.

Another issue that emerged from this study is that even after giving cash transfers to motivate the girls to study, the dropout rate is quite high and most of the dropout is due to inability to cope up with either the cost of the pressure of studies. Since there is a very fine network of schools in rural West Bengal and accessibility was not reported a major reason for dropout, education infrastructure does not emerge as the factor responsible for low educational attainment. However, as these schools are government sponsored and impart free education, not being able to bear the cost of studies indicates that the students have to take recourse to private tuitions to keep up with the school. Incidentally, the NSSO 71<sup>st</sup> Round reports that West Bengal has the highest incidence of students taking private tuitions. Thus, our study points to the quality of education as the major reason for dropout. Students either cannot cope up with studies and drop out and in order to cope up, they have to take private tuitions, which they often cannot afford and have to drop out. Hence, a major educational reform must be undertaken where not only the educational infrastructure, but also the quality of education must be improved to retain the students.

The Kanyashree Prakalpa is designed for those students with an annual family income of less than Rs. 1,20,000. However, in our study we have observed that this scheme has been almost equally availed by students whose families report a monthly expenditure more than the Rs 10,000 stipulated by the scheme. This “bad targeting” of the programme has resulted from the clause that the family income has to be certified by some local political representative and is often misquoted. Such universal reach of the scheme intended for the



girls of only very low income families has actually contributed to its huge impact and improved its performance. However, such bad targeting violates the tenets of natural justice as a girl whose parents are engaged in the formal sector would not be able to avail the scheme even if her income is marginally above the ceiling, but someone from the informal sector with a much higher income can easily do so. Thus, the targeting of the scheme must be improved. It would be a good idea to have a reasonably high ceiling of family income such that girls from families falling outside the ambit of the scheme would not find the KP2 amount attractive enough to under report their income and self-select themselves out of the scheme.

In all, the Kanyashree Prakalpa has emerged as quite a successful scheme which has the potential to go a long way in ushering in social change if supplemented with awareness campaigns and educational reforms.

# Chapter 9

## Conclusion

The Kanyashree Prakalpa, which was introduced in 2013, was a much needed intervention in the light of the shockingly poor performance indicators related to under-age marriage and adolescent dropout for girls in the state of West Bengal during the first two decades of the new millennium. The programme moved away from simple scholarship for girls or life-cycle investments for girl children whenever she was born that were being offered by the other states; rather it took the shape of a unique conditional cash transfer scheme with dual targets. Conditional Cash Transfer (CCT) schemes in various forms and levels have been widely introduced in several African and Latin American countries to augment enrolment and retention rates, while bridging the gender gap. The main aim behind such CCTs is to counter the propensity to under-invest in most of the human development indicators, especially related to women and girls, in developing country setting. Literature suggests that the link between education and marriage timing does not operate in isolation; rather, they are conditioned jointly by the broader cultural and socioeconomic context. High shares of out-of-school girls coupled with early marriage have serious implications on their empowerment, health care and skill development, which were identified to be strongly present in the state of West Bengal.

Given similar contexts, there has been plethora of schemes to control vulnerability of young girls across Indian states. However, the Kanyashree Prakalpa has been unique and elegant with a few finer points. The program offers Rs 750 annually to all girls aged 13-17 years and belonging to poorer and backward caste households. It also offers a lump-sum transfer of the Rs 25,000 after the girl crosses eighteen years of age conditional upon the girl remaining unmarried and continuing education till then. All the transfers are done to a single operated bank account in the name of the girl, the opening of which is facilitated by the government.

The prime objectives of this study were to analyze the justification behind the design of this scheme in the current setting of the state and to identify the program effect, if any,

after four years of introduction. For the first objective, econometric modelling has been used on unit level information from DLHS 4 and NSSO 71<sup>st</sup> round dataset. For the second objective, the DLHS 4 unit level data have been utilised as baseline and the primary survey have been used as end-line information. The summary of the findings of the study are as follows:

1. Exploring DLHS 4 dataset for the state, it becomes clear that share of women married before eighteen years of age was the highest in West Bengal across all non-EAG states. Also, under-age marriage was dominant in rural areas, among BPL families, households following Islamic religious belief and among families with lowest wealth quintile. Looking at NSSO 71<sup>st</sup> round dataset, it is clear that that the state belongs to the most vulnerable cluster consisting of Madhya Pradesh, Gujarat and Orissa in terms of adolescent dropouts for girls. Interestingly and contrary to expectations and general trends, adolescent male drop out is more than adolescent female drop out in both rural and urban areas in Bihar and West Bengal, though the distance from the origin is far higher for the latter, depicting higher shares of DO in West Bengal.
2. Among the determining factors behind adolescent girl dropouts in West Bengal, monthly per capita expenditure in the household appears to be a significant one with substantially high marginal effects. This result directly justifies that extra income transfer to the poorer households in the form of CCT might help to reduce the dropouts among girls, even after completing primary education.
3. However, such direct link between household wealth quintile and under-age marriage seemed to be weak in West Bengal, though it appeared strongly in most of the other Indian states. It was actually important to identify that higher education and continuation of education in the adolescent age bears a strong correlation with remaining unmarried till the eighteenth birthday. These two results succinctly point out that education is the major pathway to reduce under-age marriage and targeting just the second indicator in isolation might not work at all in the state. Also, transfer of income from CCT would rather be given directly to the girl, rather than to household head, who would decide about early marriage not just by economic considerations, but by existing social norms.

4. In order to get an idea about the current condition among adolescents in West Bengal, we collected primary data from three selected districts namely Haora (good performing), Koch Bihar (medium performing) and Murshidabad (poor performing). Two blocks were chosen from each district according to highest and lowest female literacy. From these blocks villages were identified using information of intensity of KP programme across schools (provided by respective district authorities). In total 1021 households were surveyed using random selection techniques from complete house listing where 1357 adolescent girl members resided.
5. Looking at the stated reasons behind the under-age marriage of those adolescents girls (aged between 18-25 years) married before 18 years, the most predominant is availability of “good match”. As boys drop out early in the state, availability of suitable groom is difficult for better educated girls, as in a patriarchal society husbands are supposed to be more educated than their wives. Poverty of household as a reason for dropout is significant only in Murshidabad.
6. Exploring the reasons reported by the adolescent girls who dropped out before eighteen years of age from primary survey data, there seems to be more varied across districts. Getting married and hence dropping out from school is the most cited reason behind adolescent girls dropout in Murshidabad, while in Haora majority of the girls reported high cost of education as the prime reason. Around 20-25% of girls in all three districts report that they were unable to cope up with studies and hence left the school. The high reported cost of education in spite of being taught in government schools where there is no school tuition fees, came up as a surprise. While disaggregating the cost components of education, on the average Rs 450 is spent monthly on private tuition, thus substantially pushing up the cost for education. Thus it is clear that the presence of the Kanyashree Prakalpa and the political will behind this programme might not be enough to reduce early dropout and what the state needs is a strong educational reform across the districts.
7. In the districts of Haora and Murshidabad, nearly one fourth of adolescent girls in the age group 14-18 years were not eligible of the programme, that is, they are either married or dropped out or both. A clear exception is Koch Bihar as the ineligible share is below 20%. Across districts the share of actual KP beneficiaries is the highest in Haora and the lowest in Murshidabad. Though in Murshidabad 75% of girls in the

age group were eligible in terms of two criteria, the coverage among them was only 27%. This hints that the coverage of the programme is yet to pick up.

8. Across the age categories, fall in dropout before eighteen years was the most pronounced in Haora. The corresponding fall in under-age marriage was highest in Murshidabad. The combined output of KP (either dropped out or married or both before 18 years) dropped most significantly in Haora
9. Creating two categories of family expenditures below and above 1.20 Lakh annual expenditures, we attempt to locate the benefits incidence. While on the whole, the coverage varied between to 25%, higher coverage was found in higher income category. Though the difference is not statistically significant, it clearly hints towards wrong targeting.
10. Comparing two age cohorts (14-17 years and 18-22 years) and beneficiaries and non-beneficiaries of the programme, there seems to have occurred a clear shift in intra-household bargaining power and empowerment of the girls. While the former comparison locates the macro-level social changes occurring over the years, the latter identifies the micro-level shift in bargaining power among the beneficiaries of the programme.
11. In order to explore the changes in aspirations, if any, we had asked the girls where do they foresee themselves at the age of 25 years: married with children and no earning (representing the strong gendered roles), married and earning (some change), unmarried and earning or unmarried and in higher studies. The last two represent strong liberal open roles of the women. Analysis of data shows that KP beneficiaries express far more progressive aspirations for themselves in both age groups, thus poised to make some changes in the social status and norms for the women.
12. It was found that over the age cohorts, there has been a sustained increase in self-initiated under-age marriage, along with a fall in under-age marriage arranged by parents. On one hand it represents more empowerment to take their decisions specially defying social norms among the adolescent girls, while on the other hand wrong decisions in life by them due to lack of awareness and social stigma about self-initiated marriage.

13. However, the reported changes in early dropouts and under-age marriage might not be entirely due to the program. Some movements in reduction of these indicators is expected with process of development, even without specific policy intervention. Thus in order to cull out the programme effect, we need to carry out impact evaluation on the baseline and endline datasets. Here we used a combined methodology of Propensity Score Matching (PSM) and difference-in-difference (DID). First we matched the individuals of two age cohorts (18-21 years) and (22-25 years) in DLHS data using PSM which give us the effect of normal development discourse over the years. Next, we compared similar analysis for survey data where the change captured the simple development-induced changes and also the program effect. Finding the second difference in relevant indicators across the two points gave us the programme effect solely.
14. Using this methodology we identify a significant decline in the proportions of girls getting married or dropping out before eighteen among all girls in the society and not just the Kanyashree recipients. Thus, we can say, that the scheme has indeed succeeded in reducing child marriage and adolescent dropout in the state. As a robustness check, we estimated the impact of the scheme on the proportion of girls marrying or discontinuing education at the age of sixteen and the results remained similar.
15. Looking at the disaggregated impact on different religion groups, it is estimated that the impact of the scheme on the dropout is higher among Hindus, while the impact on under-age marriage is higher among the Muslims.
16. Since the scheme was introduced in 2013, the girls in the treatment group (18 -21 years) have different levels of exposure to the programme. Those aged 20-21 years in 2016 were 16 or 17 years when the scheme was introduced and hence, were exposed to the scheme for only one or two years. However, those aged 18 or 19 years had higher levels of exposure. It is generally expected that the impact of the scheme will be greater, the higher is the level of exposure. However, the impact of the exposure to the scheme shows that dropout and underage marriage is significantly lower among those with a higher exposure to the scheme!!! Thus, though the scheme had a positive impact on both underage marriage and adolescent dropout, this impact seems to be *dwindling over the years and is a matter of concern.*

17. Using survey data only, we have tried to estimate whether the intensity of implementation had any impact on (i) self initiated underage marriage and (ii) underage marriage organized by parents. Interestingly, the proportion of underage marriages arranged by parents has declined (not significantly) while those initiated on their own has increased significantly. It is probable, that in villages where the implementation was strong, parents deferred the marriage of their daughters, but this increased the probability of them marrying before eighteen themselves.

Given the above summary of findings, it is evident that the Kanyashree Prakalpa has been able to usher in the much desired changes in socio-cultural status of the adolescent girls in West Bengal. It was not only instrumental in reducing the under-age marriage and early dropouts among the girls, it probably re-shaped and redefined the intra-household bargaining power of the young women helping her to take her own decisions. However, the study identifies a few niche areas of concern too. The dwindling exposure effect of the programme along with reported high cost of education in rural Bengal is definitely something that should attract policy makers' attention. Similarly, rise in self-initiated marriages is another concern that they must recognize. Introducing a CCT and hence controlling immediate dropout and under-age marriage is the first step towards the trajectory. In order to sustain the push, complementary educational reform for improving the quality of education imparted in the school is the need of the hour. Similar complementary policy to increase awareness and sex education among the adolescent girls is also called for to strengthen the program effects further in near future. Moving away from one-department syndrome of development policy intervention, often resulting in coordination failure, the state authorities should implement an all-inclusive policy to correct the existing anomalies and thus strengthening the unique program module. It is the time not be complacent and remember the lines

*“Miles to go before I sleep... Miles to go before I sleep”*

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