SOCIO-ECONOMIC AND DEMOGRAPHIC FACTORS DETERMINING THE CONTRACEPTIVE USE IN UNDIVIDED DARRANG DISTRICT, ASSAM

Thesis Submitted to Gauhati University for the degree of Doctor of Philosophy in the Department of Economics,
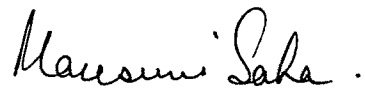
Submitted by
Mausumi Saha
2011

Declaration of the Candidate

I am to declare that this thesis entitled "Socio – Economic and Demographic factors determining Contraceptive use in Undivided Darrang District, Assam", is carried out by me under the guidance of Professor Runumi Dowerah Baruah, Department of Economics, Gauhati University, for the award of the Degree of Doctor of Philosophy in the Faculty of Arts (Economics). The findings embodied in the thesis are the records of the bonafide investigation conducted by me in the Undivided Darrang District, Assam.

I further declare that neither this thesis nor any part of it has been submitted before for any degree or diploma in anywhere/elsewhere.

Date :-

Palce : Guwahati.

Mausumi Saha.

(Candidate)

Dr. (Ms) Runumi Dowaarah Baruah

PROFESSOR

Department of Economics
GAUHATI UNIVERSITY
Gopinath Bardoloi Nagar
Guwahati – 781014, Assam :: India
☎   :   0361-2570287 (O)
     :   0361-2571013 (R)
Fax   :   0361-2570133
E-mail :   snb69@sancharnet.com

CERTIFICATE

It is certified that the thesis entitled "Socio-Economic and Demographic factors determining the Contraceptive use in undivided Darrang district, Assam" submitted by Ms. Mausumi Saha for the award of the Degree of Doctor of Philosophy in Arts (Economics) at Gauhati University, is an outcome of bonafeid research work carried out by her under my direct supervision and guidance.

She has fulfilled all the requirements of Ph.D. regulations and no part of this thesis was submitted to any other University/Institutions for any research Degree.

Date :

Place : Guwahati.

Runumi Dowerah Baruah.   Professor

Deptt. of Economics

(Research Guide)   Gauhati University

ACKNOWLEDGEMENT

Last but not the least, I thank to my husband and my only daughter 'Anwesha' for their silent co-operation and encouragement without which this attempt would not have been possible.

Finally, I alone take all responsibilities for any error or omission of this dissertation.

Date:

Place:

(Mausumi Saha)

Candidate

CONTENTS

CHAPTER - 4   118-127

Rural - Urban Differentials of Acceptance of Contraception.

CHAPTER – 5   130 - 155

Choice between Spacing and Terminal Method among the Respondents

SECTION   - 5.A   134 - 144

Choice of Terminal Method

SECTION - 5.B.   145 - 196

Choice of Modern Spacing Method

CHAPTER – 6   160-184

Unmet Need for Contraception.

****

:: List of Tables ::

:: Lists of figures ::

CHAPTER 1

INTRODUCTION

INTRODUCTION

1.1 A HISTORICAL PERSPECTIVE

Use of contraceptive is not a new practice of human society. In all culture and ages, everywhere in the world, people used to regulate their fertility through either traditional medicine or means or cultural practice to prevent conception. Thus, the prime objective of the use of contraceptives in our traditional society was to prevent conception. It was in 1800 in England, there developed a social movement to promote smaller families for the wellbeing of the people and individuals through the advocacy of wide spread use of contraceptive among couples. The movement faced much opposition from socio – cultural and religious beliefs. In the twentieth century, however, major developments took place in the area of research on contraception. It was only after 1950, that new methods were developed and marketed. Consequently, the knowledge of modern scientific method of contraceptive has become widespread and the practice of contraception has been promoted world wide as a fertility regulatory measure under the population policy and family planning programme to limit population growth. Initially, the United States Government and the international NGOs took leading role in funding the contraceptive research development through bilateral and multilateral development programmes for population control under the name of family planning programme. Later on, the task was entrusted with large international NGOs such as WHO and UN POPULATION COUNCIL. This is because the decision regarding contraceptive provision depends on many factors other than the state of medical knowledge of reproduction and

1

contraception. Social and cultural norms and ideas regarding women and men and their gender roles as well as economic and political consideration have a greater influence on such practice of a society. As such, peoples' attitude towards contraception has under gone a change over the years and it varies from society to society, community to community and region to region.

The use of contraceptive was initially popularised during the birth control movement in 1800 with a motive of social reform. For nearly two centuries, the movement has reflected and blended varying concerns of the people for social reforms – better health for women and their families, under reproductive choices for women, improvement of sexual expression for both the sexes through freedom from fear of pregnancy. It was also supported for promotion of eugenic and for a need to limit population particularly in Third World countries after World War II because, during decolonization, the growing trend of population was perceived as a threat by the wealthy nations. Birth control as a policy implementation to regulate the human fertility, at the same time, has faced various oppositions. It was opposed on the ground that it was racist, immoral and sexist. It was also denounced on the ground of philosophical beliefs i.e. on religious and ethical grounds. Specific birth control has also been attacked on the medical ground. However, despite all these debates and resistance, the issue of human fertility management lies at the centre of population and development issue and the necessity of birth control, as an integral part of population policy has been realized by almost all the nations of the world. In recent years, it has

also been felt that the provisions for human fertility regulation by contraception cannot be an end but only a means to the betterment of life. The demographic rationale for programme implementation was the prime background of the government initiative in all the large countries and most of the small countries. Later on through a series of conference documents, United Nations played a leading role in articulating and popularising the human right rationale including the status of women. Family planning programmes were also supported on the ground of maternal and child health and human rights in most of the Asian countries where it was supported earlier for demographic reasons. Programme rationale in many countries like Latin America, Middle East, Africa, has been different from that of South and East Asia. Family Planning has been treated as a constitutional right in China, Mexico, Ecuador, Yugoslavia, Portugal etc. on the ground of health rationale. The International Women's Movement for Reproductive Health and Rights has given a new dimension to the practice of family planning. Both the women's health advocates and women activists support the use of contraceptive on the ground of individual right i.e. women's control on her own body as well as on health ground. Thus, it has been observed that the rationale for contraception or family planning has undergone a change with the emerging social issues of the regions. It also varies widely among countries, populations, with respect to religious, cultural, social, political and economic differences. Hence, for a successful policy implementation, an in-depth study of the socio = economic and demographic factors responsible for differential fertility is required. In other

words, family planning programmes should not be homogeneous. They need different treatment, with different sub groups of population.

1.2. MEANING AND CONCEPT

In the study of 'Reproduction' or 'Fertility behaviour' terms such as population control, birth control or reproductive control or fertility control and family planning are very often used inter-changeably without regard to the fundamental difference in their concepts or meaning and implication particular for women. The two terms: 'birth control' and 'family planning' or 'population control', often being commonly used,- generally refer to both individual effort at fertility control as well as state's effort to limit the number of births of the society.

'Birth control' originally emphasises the right of women and men to make decisions about their reproductive capacities. In this regard, woman has the prior claim to full exercise of control because of her greater responsibilities for childcare related with the pregnancy and childbirth (Young 1985; Gupta, 2000).

'Population Control' is, on the other hand, a top down approach. It is the exercise or attempt to exercise control from outside. It might be national government, or international agencies, or the Church—who have controlled or interfered with the couples right to make decisions about the number of children they wanted.

'Birth Control' provides freedom of choices to individuals, where as 'Population Policy', being a 'top down' approach restricts it or curtails it.

In contrast, 'Population Control' can either be pro-natalist or anti-natalist. It can even be both with a single country if it favours a particular race, class, religious group. It includes reproduction policies, to limit births, health polices to reduce mortality or morbidity and migration and urbanization polices for a spatial distribution of population (Dixon=Muller, 1993). The fourth category that Dixon Muller added to 'Population Control' is family and welfare policies. 'Population Control' thus, refers to the measures at the broader level of a group, community or nation.

The most popularly used term 'family planning' differs from the concept of "birth control" in two respects, first, it is a top down approach as suggested by the word "planning" and hence, similar with 'Population Control'. Moreover, it refers exclusively to families (Gupta, 2000). Thus, family planning fails to recognize the changing trend of the society by excluding the needs of the individual or youths and others not living in the traditional family. The use of the term 'family planning' fails to trace the change in the concept from population control as development strategy to development as a population control strategy.

For this reason, a concept of reproductive right and sexual and reproductive health has been developed by the Feminists. This concept has been drawn on the basis of human rights' principles of freedom and entitlement as well as on the feminist principles of a woman's 'right to control her body'. However, the emergence of the new concept in the definition of the sexual and reproductive right attached to the use of contraceptives in the UN formulations is narrower compared to the feminist

principles of a woman's right to control her body. But obviously, the new concept is an evidence of a fundamental shift in the population policy which incorporates the certain aspects of women's right as a result of the efforts of international women's movement for reproductive's rights. (Gupta, 2000).

Contraceptive provision as has been developed and advocated in due course of time with the emergence of new concepts in this field, however, differs from one group to another in respect of assumptions and objectives. The first group emphasises on the safe and effective contraception to minimise the risk of contraception and there by promote well being of women, whereas, the second group emphasises the efficacy above safety and thereby to minimise contraceptive failure. But, despite the difference in their objectives, both the groups recognise the women's right to control their fertility which is often opposed by husbands or sexual partners, family, community, culture or leaders or state. In a developing country like India, where high birth rate, poverty, illiteracy, the high level of infant and child mortality, slow growth of urbanization are the main problems, the prime issue of the population policy is the quantity rather than the quality. Hence, the feminist view- women's right to control her own body attached to the use of contraception, has often been obscured and sometimes violated by the State machineries. Moreover, deep-rooted social customs and norms, culture and traditions like lower age of girls at marriage, son preferences, and socio-economic status of women etc in many parts of India, have crucial bearings on the fertility behaviour of the people. Thus, in India, the

use of contraception among the married couples (marriage is universal in India) depends on a number of socioeconomic and demographic factors.

1.3. BIRTH CONTROL MOVEMENTS AND POPULATION POLICIES IN INDIA: AN HISTORICAL OVERVIEW.

In colonised India, the birth control movement could not flourish to its full extent. This was because the colonial administrators needed a larger supply of productive labour to produce raw materials for the mines and factories of the West and a market for their products. Hence, population growth was rather encouraged (Michaelson, 1981). Secondly, imposition of higher rates of taxation by the British Colonial government under the 'Zamindari system' put tremendous pressure on the farmer, so that they required more hands, at work to pay tax (Mass, 1991). Thirdly, some national leaders rejected reproductive control on the grounds, that it would weaken the nation. Leftist viewed reproductive control as an imperialists' strategy to keep the Indians under oppression.

It was only in the 1920's that Mahatma Gandhi, expressed concern for women saddled with the excessive burden of child bearing and also recognised population growth as a problem. Gandhiji's advocacy for birth control on the ground of the spiritual value did not emphasise the women's right issue but helped to achieve greater autonomy to both men and women. Later, Gandhi advocated 'voluntary male sterilization', although he denounced any use of contraceptives in case of woman.

7

Differences of opinion could also be found with the women's movement regarding the Gandhian ideas on reproductive control. Some supported reproductive control on the ground of national interest, while others supported it on the ground of women and child welfare. Apart from this, there was another group, which supported the Gandhian ideal of 'self-control' as well as maternity and child welfare for imparting education and raising awareness among men of their responsibilities of fatherhood. But, oppositions mainly came from the religious orthodox women and also from single women (Gupta, 2000).

In India, though there were no legal restrictions, like Comstock law in US, on the dissemination of information on contraception but there were some opposition to birth control from orthodox Christians (including missionaries), Muslims and Hindus alike.

The All Indian Women's Conference (AIWC) was the first organisation to take up the issue of reproductive control and emphasised the urgency of improving the socio-economic status of women by imparting education among girls, rising the age of marriage of the girls etc. The1932 session of AIWC in Lucknow, felt the need of opening up of centres of information on contraception by the municipalities and local bodies for both men and women, to combat poor health of women, high infant mortality and increasing poverty in the country (Gupta, 2010). At the AIWC conference in 1935-36 in Trivandrum, recommendation was made for opening up of birth

control clinics. Since 1920, several birth control clinics were set up which could not survive because of paucity of funds.

The National Planning Committee set up by the Indian National Congress in 1935 under the chairmanship of Jawaharlal Nehru laid emphasis on the problem of population growth. The Committee felt the need of population control in the interest of social economy, family happiness and national planning (Samuelson, 1966). Thus, it has been argued that the socio-economic motive rather than the health of women and children and the welfare of families was the basic ground of the inclusion of reproductive control in the socio – economic planning in India.

In 1949, the Family Planning Association of India (FPAI), was instituted in Bombay to set up a family planning programme to cover the whole of India. This was a private body and affiliated to the Family Planning Association of Britain. Madam Dhanavanti Rama Rao, the Head of the Association, along with Madam Avabai Wadia led the Family planning movement in India after independence. Instead of 'Birth Control', family planning was introduced for the first time in the International Population Conference in London in 1948. The FPAI played an important role in the development of family planning programme at the official level. With the adoption of first Five-year plan, the government of India launched officially a National Family Planning Programme to stabilize the population growth at a level consistent with the requirements of the national economy (GOI, 1994).

1.4 FAMILY PLANNING DURING THE PLAN PERIOD

FIRST FIVE-YEAR PLAN (1951-56)

India was the first country to introduce a National Family Planning Programme during the first five-year plan (1952-56) with a motive to promote mother and child health and welfare. During the first five-year plan, contraceptive like Diaphagram with jelly and Rhythm method was adopted in private clinics that were considered to be more complacent in keeping with Indian culture and acceptable to all religions. Thus, the approach was clinical in general. But, the peoples' response to the programme was not encouraging mainly because of two reasons: first, under nourished and anaemic Indian women did not have regular cycles and second, inter spousal communication which was required by the method was absent.

SECOND FIVE-YEAR PLAN (1956-61)

During Second Five Year Plan period, the Central Family planning was established for coordinating the State Family Planning Boards. From failure of the programme during the first five-year plan period, it was realised that mere establishment of clinics or service point was not adequate to motivate the couple for adoption of family planning methods. Moreover, the clinical approach was female and middle class biased with emphasis on limiting rather than spacing. Hence, during the second five-year plan, mainly Tubectomy, as a device of contraception was carried out.

THIRD FIVE-YEAR PLAN (1961-66)

During the period of third five-year plan, knowledge, attitude and practice (KAP) studies were conducted. During this plan period, there was a shift from clinic approach to the Extension approach. The extension approach laid emphasis on community involvement and improving motivation as well spreading knowledge about non-clinical methods (such as condoms). This led to a positive response to the small-sized families. The chief objective of the plan was to enhance a couple's freedom of reproductive choice. But the national family planning programme during the third plan period has also been observed as a conditional agreement for food aid programme from USA i.e. PL 480 agreement to meet the food crisis during the mid 70's famines. As a result, the use of IUD and Pill (as a package programme by the US Government) was encouraged among women. Later, this caused certain problems such as cramps and spotting as experienced by the users.

FOURTH FIVE-YEAR PLAN (1969-74)

The action plan during the fourth plan period was to adopt mass communication techniques to disseminate the family planning message to the ignorant masses. The urgency and the gravity of the problem of growing population being realised, Government of India adopted a target-oriented approach to bring down the birth rate during a stipulated period. The American advertising agency J. Walter Thompson was one of the agencies that was involved with the family planning media campaigns (Gupta, 2000).

During this period, though officially a cafeteria approach was stated, the promotion of the programme was done mainly on one time motivational method. To fulfil the target, incentives were given to the clinic staff on the number of acceptors. This was done with a Camp Approach and coercive persuasion. Forced Vasectomy among the poor and illiterates was done during the plan period. Another significant development took place during this plan period was the passing of the Medical Termination of pregnancy Act (MTP) in 1971, which became effective in 1972. The recourse to abortion under the MTP Act was provided under broad health grounds (physical and mental), on eugenic grounds under juridical condition (such as incest or rape) and social reasons such as mental or social injury to the mother.

FIFTH FIVE-YEAR PLAN (1974-79)

During the Fifth Five Year Plan Period, intensified programmes and actions were to be adopted since the performance was very poor. In June 1975, there was a declaration of a state of Emergency by the Prime Minister, Indira Gandhi, which continued up to 1977. A coercive sterilization particularly male sterilization programme was implemented under the leadership of Sanjay Gandhi especially in the northern states where the performance of family planning was very poor. This was backed up with strong incentives for achieving targets and strong penalties for short falls in targets. Thus, the clients were pressurised to accept contraception methods, especially sterilization.

Forced sterilization during the emergency period resulted in defeat of the ruling Congress party at the next election. At the end of the fifth five-year plan, despite large-scale sterilization (laparoscope and Vasectomy) the birth rate did not fall to the expected rate (30 per thousand).

SIXTH FIVE YEAR PLAN (1980 -85)

After the fall of Congress Party led government in 1977, the Janata Party came to power at the centre for a short while. A revised statement was issued emphasising the voluntary nature of the programme. The name of the department providing family planning programme was changed into 'Family welfare.' But, there was no change in policy formulation or approach. The target approach and the provisions for incentives and disincentives continued.

SEVENTH FIVE YEAR PLAN (1985 ±90)

During this plan period, population policy was considered indispensible for the nation with an integrated approach of management of people and resources. Issues like, improving the quality of life, stabilisation of population growth at the manageable size became the prior concerns of the nation.

Laparoscopic sterilization in camps continued with massive campaign and propaganda at grass root level, through active participation of the women health groups at village level, such as, Mahila Mandals and Mahila Swasthya Sangh. The focus gradually shifted from terminal method to spacing method. Abortion services were expanded. From 1985 onwards,

T 17 27

emphasis on women's status was given. National Health Policy 1983, gave due importance to Mother and Child Health Goals.

EIGHTH FIVE YEAR PLAN (1992 -97)

The Eighth Plan documents articulated the links between population and development and accordingly formulated a National Population Policy. The Plan documents included a separate chapter on Women and development.

During the Eight-plan period, a gradual shift had been noticed towards promoting spacing method. In January 1992, the Indian Council for Medical Research along with women's health advocates drew attention towards the Women's reproductive health approach. Consequently, National Commission for Women (NCW) was established (1992) to consult all the major policy matters affecting women and to protect the rights and interests of women. In 1988-2000, a national perspective plan for women was also drawn up for the future direction.

NINTH FIVE-YEAR PLAN (1997-2002)

During the Ninth Five Year Plan period, a multi sectoral and target free approach towards population stabilization was undertaken. The declaration of The National Population Policy 2000 was made during the Ninth Plan, which aimed at bringing down the Total Fertility Rate (2.1) at the replacement level. Area specific micro planning at P.H.C. level was adopted to assess the reproductive and child health and to meet the all felt need of contraception to bring down the infant mortality and maternal mortality rates.

TENTH FIVE YEAR PLAN (2003-08)

During the 10th five years plan, a special budgetary provision was made to bring the men to the forefront of the population and reproductive health programme. Measures were taken to promote the acceptance level of NSV, a modified technique of male sterilization, under the supervision of trained medical practitioners. National family planning insurance scheme was also introduced by the Government of India during the plan period to minimise the existing gender inequality in the Policy measures. Introduction of modern reversible method of contraception for women, like IUD 380A which provides protection for 10 years was made. Efforts are being made to explore the possibilities to introduce female condoms in the National Family Welfare Programme for women empowerment to ensure protection not only from unwanted births but also from sexual transmitted diseases and other reproductive track infection.

Recently, Government of India has initiated the Social Marketing Scheme and launched the NRHM (National Rural Health Mission) in April 2005, to improve access of people, especially the rural poor women and children to quality primary health care including family planning services.

ELEVENTH FIVE-YEAR PLAN (2007-12)

During 11th plan period, Government of India has taken new initiatives to encourage and develop the AYUSH drug industry. The President of India has notified creation of Department of Health Research under the Ministry of Health and Family Welfare on 17.9.2007. Under this

15

new department, various research programmes related to family welfare and Reproductive Child Health have been undertaken to introduce AYUSH drug such as Pipalyadi Yoga, oral contraceptive, spermicidal agent (Neem oil) etc.

Table- 1.1 A

Plan Outlay on Health & Family Welfare in Different Plan Periods Centre, States & UTs

(Rs.in crores)

Period	Health	Family Welfare	Sub-Total	Total Plan	% of Health to	% of Family Welfare
Third Plan (1961-66)	225.9	24.9	250.8	8,576.5	2.6	0.3
Annual Plan (1966-69)	140.2	70.4	210.6	6,625.4	2.1	1.1
Fourth Plan (1969-74)	335.5	278.0	613.5	15,778.8	2.1	1.8
Fifth Plan (1974-79)	760.8	491.8	1,252.6	39,426.2	1.9	1.2
Annual Plan (1979-80)	223.1	118.5	341.6	12,176.5	1.8	1.0
SixthPlan (1980-85)	1,821.0	1,010.0	2,831.0	97,500.0	1.9	1.0
Seventh Plan (1985-90)	3,392.9	3,256.3	6,649.2	180,000.0	1.9	1.8
Annual Plans 1990-91 1991-92	960.9 1.042.3	784.9 856.6	1,745.8 1,898.9	61,518.1 65,855.8	1.6 1.6	1.3 1.3
Eighth Plan (1992-97)	7,575.9	6,500.0	14,075.9	434,100.0	1.7	1.5
Ninth Plan (1997-2002)	12,073.0	14170.*	4,463.70	859,200.0	1.4	1.6
Tenth Plan (1997-2002)	10,252.0	26,126.0	36,378.0	-	-	-
Eleventh Plan (2007-2012)	36,947.81	131,169.00	168,116.81	-	-	-

*: Figure: excludes arrears
Source: Family Welfare Statistics, India, 2006.

The Plan Outlay on Health and Family Welfare (Table-1.1) has been observed to increase during the succeeding plan periods. But, so far the percentage increase in plan out lay on Health and Family welfare to the total Plan Outlay is concerned, it has all along been poor during the plan

period. It is only from the 9th five-year plan period, a noticeable increase has been noticed in this respect.

Table-1.1.B

Scheme-Wise 10th Plan Allocation, Actual Expenditure, 2002-05, BE for 2005-06 (Family Welfare)

(Rs in crores)

Name of scheme	Revised 10th Plan Outlay	Expenditure			BE*
		2002-03	2003-04	2004-05	2005-06
Centrally Sponsored Schemes	24,628.50	3,736.44	4,047.30	4,583.73	6,000.28
Direction & Administration	1,413.00	301.47	294.36	273.21	280.21
Rural FW Services (Sub =Centres)	9,663.00	1,848.84	1,713.89	1,792.25	1,964.40
Urban FW Services	580.00	103.39	117.59	122.16	135.33
Grants to State Training Institutions	480.00	85.23	92.75	97.50	106.87
Free distribution of contraceptives	940.00	153.92	142.74	76.47	172.52
Sterilization (Beds)	12.00	1.76	1.97	2.01	2.02
F. W. Linked Health Insurance Plan	150.00				35.00
Procurement of Supplies & Materials	994.98	121.96	109.10	104.44	250.00
Routine Immunisation	1,557.88	115.11	127.70	151.32	507.00
Pulse Polio Immunisation	3,110.00	432.11	659.94	922.74	877.00
IEC (Inf,Edu. and Communication)	539.50	84.07	103.41	139.40	129.10
Training	250.00	6.58	19.61	13.84	30.93
Area Projects	1,835.80	158.91	262.90	379.82	547.76
a) IPP Projects	435.80	75.28	44.48	46.27	61.76
b) USAID assisted projects	400.00	40.24	55.00	46.24	50.00
c) EC assisted SIP Project	1,000.00	43.39	163.42	287.31	436.00
RCH Flexible Pool for State PIPs	3,102.34	323.09	401.34	508.57	962.14
Central Sector Schemes	1,221.50	155.09	343.97	280.06	423.72
Social Marketing Area Projects	20.00				10.00
Social Marketing of Contraceptives	660.00	98.87	141.72	231.92	241.04
F.W. Training and Res. Centre, Bombay	10.00	0.98	0.07	0.26	1.00
NIHFW, New Delhi	20.00	2.60	4.00	3.59	7.35
IIPS, Mumbai	10.00	1.70	1.14	1.09	1.65
Rural Health Training Centre, Najafgarh	45.00			1.56	3.98
Population Research Centres	45.00	5.71	5.85	6.68	7.30
CDRI, Lucknow	12.00	2.30	2.30	2.50	2.75
ICMR and IRR	100.00	20.00	27.00	30.00	30.00
Assistance to I.M.A.	1.00		0.25	0.25	0.30
Testing Facilities	2.50	0.38		0.44	0.45
Travel of Exports/Conf./Meetings etc.	57.00	3.42	42.22	0.54	3.50
International Co - operation	9.00	1.34	1.39	1.23	1.70
NPSE/National Commission on Population	100.00		100.00		10.00
NGOs (Public-Private Partnership -PPP)	130.00	17.79	18.03		102.70
Schemes Transferred To Sates/ Weeded	276.00	25.10	18.00		
District Projects	51.00	22.95	18.00		
Community Incentive Scheme	200.00				
New Initiatives	25.00	2.15			
GRAND TOTAL	26,126.00	3,916.63	4,409.27	4,863.79	6,424.00

Note: * Denotes Budget Estimate.
Source: Family Welfare Statistics, India, 2006.

During the 10th Plan period, the Plan out lay allocation on various schemes of family welfare, shown in Table-1.1B, exhibits that due importance was given in setting up urban centres and rural sub – centres for family welfare services in India. The Revised Plan Outlay for Rural Welfare Services was Rs, 1,413.00crores (of which actual expenditure made was Rs. 301.47, in 2002-03, Rs.294.36crores in 2003-04 and Rs. 273.21crores in 2004-05). Indian Government has spent huge amount of money for providing proper training to local people (both men and women) for disseminating the message of family planning and distribution of contraceptive at the grass root level. During 10th plan, Govt. granted Rs.480.00crores for State Training Institutions, Rs. 940crore for free distribution of contraceptives, Rs. 12 crores for sterilization beds, Rs 150 crores for family welfare linked insurance plan, Rs 660crores for social marketing of contraceptives under Central Sector scheme etc. which are directly related to the family planning Programmes. The Plan Outlay also included some other allotments such as, District Projects (Rs.51crores), Community Incentive Scheme (Rs.200.00crores) and New Initiatives (Rs.25.00crores) Scheme transferred to State are also directly and indirectly related to the Family Planning Programme implementations.

Government of India, thus, has formulated various plans and programmes of family planning under the broad spectrum of Population Policy 2000 with an objective to stabilise the population growth by bringing down the Total Fertility Rate at replacement level 2.1 by 2010. But, how far

these programmes and policies have been successful in its endeavour should be examined on the basis of policy performance.

1.5.A WORLD USE OF CONTRACEPTION

At the 2005 World Summit, Governments of almost all countries have committed to "achieving universal access to reproductive health by 2015", as set out at the International Conference on Population and Development"(A/RES/60/1). According to the United Nations Department, Economic and social Affairs, Population Division 2007, at the world level, though, contraceptive use continues to increase, yet universal access to reproductive health, is still far from being attained. In at least 43 countries, over 20 percent of the women of reproductive age who are married or in union, have not met their need for contraception. 63 percent of women of reproductive age group who are married or in union are currently using a contraceptive method for 716 million worldwide. The current status of the use of contraception in the world is presented in the following Table-1.2.B.

Table-1.2.A: World Contraceptive Use, 2007.
(% of Women in reproductive age group (15-49Years) married or in union using contraception)

Country or area	Women (in thousands)	Year	Any method	Total	Sterilization Female	Male	Pill	IUD	Con-dom	Other modern method	Rhythm	With-drawl	Other
WORLD	1134650	2003	63.1	56.1	19.7	2.7	8.5	15.5	5.7	3.9	3.6	2.9	0.5
More developed regions	154469	1999	67.4	56.1	8.6	4.5	16.5	9.4	13.	3.1	4.3	6.8	0.2
Less developed regions	980181	2004	62.4	56.1	21.5	2.5	7.2	16.5	4.4	3.9	3.4	2.3	0.6
AFRICA	148108	2003	28.0	21.4	1.6	0.0	7.4	4.2	1.7	6.4	3.6	1.3	1.6
Sub-Saharan Africa	122951	2003	21.5	14.8	1.5	0.0	4.2	0.5	1.8	6.7	3.8	1.2	1.6
Eastern Africa	45156	2004	25.4	20.3	1.8	0.0	6.3	0.5	1.2	10.6	2.7	1.4	1.0
Middle Africa	18729	2002	24.2	5.9	0.5	0.1	1.5	0.2	2.9	0.9	12.1	2.1	4.1
Northern Africa	30327	2005	51.0	45.6	1.8	0.0	19.8	18.4	1.2	4.4	2.3	1.5	1.6
Southern Africa	6074	2003	57.5	57.3	12.8	0.6	11.0	1.0	5.2	26.7	0.0	0.0	0.1
Western Africa	47823	2003	13.6	8.6	0.4	0.0	2.5	0.6	1.7	3.5	2.5	0.9	1.5
ASIA	750671	2004	67.9	61.7	24.0	3.0	6.1	19.6	5.3	3.6	3.4	2.5	0.4
Eastern Asia	290335	2004	87.6	86.4	28.1	6.2	3.5	40.4	6.9	1.2	1.2	0.0	0.0
South-Central Asia	321376	2005	54.2	45.8	28.4	1.0	6.0	3.5	5.0	1.9	4.9	3.1	0.5
South-Eastern Asia	103337	2003	59.9	51.0	7.4	0.5	13.8	9.6	2.1	17.5	3.5	4.6	0.8
Western Asia	35623	2002	54.5	34.4	3.3	0.0	8.9	15.4	5.3	1.4	2.6	14.9	2.6
EUROPE	96762	1997	67.5	52.5	4.7	2.9	18.6	14.1	1fl.	1	5.6	9.1	0.2
Eastern Europe	44336	1996	63.7	41.7	2.0	0.3	6.5	21.1	1fl.	0.7	9.4	12.5	0.1
Northern Europe	9878	2001	77.3	74.1	10.0	12.5	19.0	9.6	18.	4.9	1.0	2.1	0.1
Southern Europe	19571	1999	62.6	45.5	6.4	3.0	13.6	5.7	16.	0.4	2.7	13.9	0.5
Western Europe	22977	1995	74.8	70.2	5.9	2.9	46.4	10.5	3.9	0.5	2.6	1.6	0.4
Latin America & Caribbean	94780	2001	71.4	64.5	28.5	1.3	15.8	7.4	6.8	4.7	3.9	2.7	0.3
Caribbean	6344	2002	60.4	55.9	23.0	0.4	7.8	13.9	5.3	5.5	1.8	2.2	0.5
Central America	24341	2005	68.2	63.0	27.4	0.6	7.2	12.0	7.1	8.7	3.1	1.9	0.1
South America	64095	1999	73.7	65.8	29.4	1.7	19.2	5.3	6.9	3.2	4.4	3.1	0.4
Northern America	40194	2001	73.0	68.6	22.2	10.3	17.9	1.9	1fl.	4.2	1.4	2.9	0.0
Oceania	4134	1995	52.9	48.9	11.3	7.4	17.7	1.5	7.5	3.5	2.3	0.4	1.4
Australia/New Zealand	2588	1995	68.3	65.5	13.1	11.8	25.4	2.3	1fl.	1.4	2.0	0.2	0.6
Melanesia/Micronesia/Polynesia	1545	1996	27.1	21.0	8.1	0.2	4.7	7.3	0.1	7.3	2.8	0.6	2.7

Note: Other modern methods include injectable implants and vaginal barrier methods:
Source: Wall Chart on Contraceptive use, 2007, United Nations Department of Economic and Social Affairs Population Division.

The major findings from the Table-1.2A are as follows. 63 percent of women in the category of reproductive age group at the world level, who are married or in union, are using contraception .In the more developed regions and less developed regions, the equivalent figure is 67 percent and 62 percent respectively.

The level of contraceptive use is lowest in Africa. Only 28 percent of women of reproductive age who are married or in union in Africa, are using contraception. On the other hand, the percentage of using contraception is fairly high in Asia (67.9 percent) and in Latin America and Caribbean (71.4 percent).

The most commonly used modern methods are female sterilization (19.7 percent), IUDs (15.5 percent), oral pill (8.5 percent) and condom (5.7 percent). Short-acting and reversible contraceptive methods are more popular in developed countries, whereas, longer-acting and highly effective clinical contraceptive methods are more commonly used in developing countries. In developed countries, contraceptive users rely mostly on oral pills (16.5 percent) and condoms (used by 9.4 percent). In contrast, in the less developed countries contraceptive such as female sterilization and IUDs are used by 21.5 percent and 16.5 per cent of women who are married or in union respectively.

Despite the recent accelerated growth in the use of contraception, unmet need for family planning remains high in developing countries. It is 23 percent in sub-Saharan Africa. In Northern Africa, Asia, and Latin America

and Caribbean, the unmet need for family planning is lower, at around 16 per cent. In Europe, that percentage is 6 percent on an average.

1.5. B CONTRACEPTIVE USE IN ASIA

Table-1.2B shows that the Asian average of contraceptive prevalence rate estimated at 68.1 percent 2007 is higher than the World Average (63.1 percent). The most commonly used modern methods are female sterilization (24.0 percent), IUD (19.6 percent) oral pill (6.1 percent), condom (5.3 percent).It has also been noted that the East Asian countries being the less developed countries, except Japan, have recorded comparatively a higher percentage of women in the reproductive age group married or in union, using modern method of contraception. China, the most populous country of the world, with the highest level of contraceptive prevalence rate (90.4 percent) not only in Asia but also in the world, shows a greater reliance on female sterilization (31.8 percent), IUD (44.9 percent), and Condom (5.2).

Table-1.2B: Contraceptive Use, Asia 2007.
(% of Women in Reproductive Age Group Married or in Union Using Contraception)

Country/ Region	Women (in thousand)	year	Any method	Modern method								Traditional Methods			% of Unmet Need
				Total	Sterilization Female	Male	Pill	IUD	Con-dom	Other modern method	Rhythm	With-drawal	Others	
World	1134650	2003	63.1	56.1	19.7	2.7	8.5	15.5	5.7	3.9	3.6	2.9	0.5	..
More Developed Regions	154469	1999	67.4	56.1	8.6	4.5	16.5	9.4	13.9	3.1	4.3	6.8	0.2	..
Less Developed Regions	980181	2004	62.4	56.1	21.5	2.5	7.2	16.5	4.4	3.9	3.4	2.3	0.6	..
Asia	750671	2004	67.9	61.7	24.0	3.0	6.1	19.6	5.3	3.6	3.4	2.5	0.4	..
Eastern Asia	290335	2004	87.6	86.4	28.1	6.2	3.5	40.4	6.9	3.9	1.2	0.0	0.0	..
China	260743	2004	90.2	90.0	31.2	6.7	1.5	44.9	5.2	3.2			<0.2 >	..
China, Hong Kong Sar	1096	1992	86.2	79.7	18.9	0.9	17.1	5.1	34.5	3.2	5.1		<1.5 >	..
D.P.R. Korea	4407	2002	68.6	58.4	4.4	0.8	3.7	42.8	5.8	0.9		<10.4>	0.0	..
Japan	14924	2004	52.0	43.9		<2.3	1.1	..	41.0	0.3	4.2	14.7	0.2	4.6
Mongolia	474	2003	69.0	58.4	3.0	0.0	11.0	32.8	5.4	6.3	9.9	0.6	0.0	..
Republic Of Korea	8608	1997	80.5	66.9	24.1	12.7	1.8	13.2	15.1	0.0			<13.6 >	..
Souyh Central Asia	321376	2005	54.2	45.8	28.4	1.0	6.0	3.5	5.0	1.9	4.9	3.1	0.5	..
Afghanistan	4265	2003	10.3	8.5	0.7	0.0	5.0	0.0	0.6	2.2			<1.6 >	..
Bangladesh	32074	2004	58.1	47.3	5.2	0.6	26.2	0.6	4.2	10.5	6.5	3.6	0.6	11.3
Bhutan	109	2000	30.7	30.7	3.1	13.6	3.4	3.4	1.2	5.9	0.0	0.0	0.0	..
India	223179	'05-06	56.3	48.5	37.3	1.0	3.1	1.7	5.2	0.1	4.9	2.5	0.3	12.8
Iran (Islamic Republic of)	13611	2000	73.8	55.9	17.3	2.8	18.4	8.4	5.6	3.4		<17.4	0.0	..
Kazakhstan	2671	1999	66.1	52.7	2.8	0.0	2.4	42.0	4.5	1.0	4.7	2.9	5.9	8.7
Kyrgyzstan	1010	1997	59.5	48.9	1.8	0.0	1.7	38.2	5.7	1.3	3.2	6.0	1.5	11.6
Nepal	5601	2006	48.0	44.2	18.0	6.3	3.5	0.7	4.8	10.9	1.2	2.6	0.0	24.6
Pakistan	28299	2000/01	27.6	20.2	6.9	0.0	1.9	3.5	5.5	2.6	1.6	5.3	0.5	37.5
Sri Lanka	3099	2000	70.0	49.6	21.0	2.1	6.7	5.1	3.7	10.9	11.1	7.1	1.4	8.0
Tajikistan	1131	2005	37.9	33.1	0.4	0.4	2.1	26.3	1.4	2.4	0.3	1.4	3.2	..
Turkmenistan	876	2000	61.8	53.1	1.8	0.0	1.2	39.0	2.0	8.9	2.1	5.3	1.3	10.1

			64.9	59.3	2.1	0.1	2.3	49.7	2.1	3.0	1.7	1.1	2.8	13.7
Uzbekistan	5396	2006	64.9	59.3	2.1	0.1	2.3	49.7	2.1	3.0	1.7	1.1	2.8	13.7
South Eastern Asia	103337	2003	59.9	51.0	7.4	0.5	13.8	9.6	2.1	17.5	3.5	4.6	0.8	..
Cambodia	2271	2005	40.0	27.2	1.7	0.1	12.6	1.8	2.9	8.2	4.5	8.3	0.1	25.1
Indonesia	45891	'02-03	60.3	56.7	3.7	0.4	13.2	6.2	0.9	32.2	1.6	1.5	0.5	8.6
Lao People's D.R.	979	2000	32.2	28.9	4.7	0.0	12.9	3.0	0.5	7.7	2.2	0.7	0.3	39.5
Myanmar	8441	2001	37.0	32.8	4.6	1.5	9.8	1.8	0.3	14.8	1.8	1.0	1.3	19.1
Philippines	13615	2003	48.9	33.4	10.5	0.1	13.2	4.1	1.9	3.5	6.7	8.2	0.6	17.3
Singapore	685	1997	62.0	53.0		16.0	10.0	5.0	22.0	0.0		<7.0>	2.0	..
Thailand	11274	'05-06	71.5	70.1	24.5	1.0	30.9	1.2	1.4	11.1	0.6	0.4	0.2	23.0
Timor-Leste	133	2003	10.0	8.6	0.6	0.0	0.8	0.0	0.0	7.2	1.1	0.0	0.2	3.8
Viet Nam	15756	2002	78.5	56.7	5.9	0.5	6.3	37.7	5.8	0.4	7.5	14.3	0.1	4.8
Western Asia	35623	2002	54.5	34.4	3.3	0.0	8.9	15.4	5.3	1.4	2.6	14.9	2.6	..
Armenia	549	2005	53.1	19.5	0.6	0.0	0.8	9.4	8.1	0.6	3.8	27.7	2.1	13.3
Azerbaijan	1613	2001	55.4	11.9	1.2	0.0	1.0	6.1	3.2	0.4	3.0	40.5	0.0	11.5
Bahrain	107	1995	61.8	30.6	6.2	0.0	10.9	2.9	9.6	1.1	3.2	26.3	1.7	..
Georgia	740	2005	47.3	26.6	2.2	0.0	3.2	11.6	8.7	0.9	9.5	11.2	0.0	16.4
Iraq	3786	2006	49.8	32.9	2.6	0.0	14.6	12.2	1.1	2.2	2.1	7.5	7.5	..
Israel	879	'87-88	68.0	51.9		0.9	13.0	30.0	4.0	4.0	4.0	11.0	1.0	..
Jordan	867	2002	55.8	41.2	2.9	0.0	7.5	23.6	3.4	3.8	5.2	9.3	0.1	11.0
Kuwait	442	1999	52.0	39.3	4.1	0.0	23.4	8.8	2.9	0.1	4.1	5.7	3.1	..
Lebanon	732	1996	61.0	37.0	0.0	0.0	10.0	17.0	0.0	10.0	—		<24>	..
Occup. Palestinian Territory	545	2006	50.2	38.9	—	7.1	7.0	24.8	..	0.0	—		<11.3>	..
Oman	416	1995	23.7	18.2	4.5	0.0	6.1	2.2	1.5	3.8	1.0	2.3	2.3	..
Qatar	105	1998	43.2	32.3	4.1	0.0	15.8	9.0	2.9	0.5	2.3	6.8	1.8	..
Saudi Arabia	3873	1996	31.8	28.5	1.0	0.0	19.6	6.6	0.9	0.4	1.2	0.8	1.3	..
Syrian Arab Republic	3428	2006	58.3	42.6	1.2	0.0	12.9	25.7	1.6	1.1	9.2	1.7	4.8	30.6
Turkey	13393	2003	71.0	42.5	5.7	0.1	4.7	20.2	10.8	1.0	1.1	26.4	1.0	6.0
United Arab Emirates	568	1995	27.5	23.6	4.2	0.0	11.9	3.7	2.0	1.8	1.6	1.4	0.9	..
Yemen	3444	2003	23.1	13.4	1.7	0.1	6.3	3.4	0.4	1.4	1.7	2.1	5.9	50.9

Note: Other modern methods include injectable implants and vaginal barrier methods.
Source: Wall Chart on Contraceptive use, 2007, United Nations Department of Economic and Social Affairs Population Davison

24

In South Central Asia, Srilanka has recorded 70 percent of women in the reproductive age group, married or in union, using contraception. Some Asian countries like Afghanistan, Pakistan, Oman, Timor-Leste, the United Arab Emirates and Yemen show the contraceptive prevalence rate below 30 percent. 56.3 percent of married women in the reproductive age group in India is estimated to use contraception in 2005-06, which is below the both the Asian and the World Averages. A greater reliance on female sterilization is also found in India (37.3) which is higher than that in China (31.8 percent), Srilanka (21.0 percent) and Iran (17.3 percent).

The use of reversible method is comparatively higher in Srilanka - IUD(5.1 percent), oral pill (6.7percent) and condom (3.7 percent), while in India, the estimated percentages are IUD (1.7 percent), oral pill (3.1 percent) and condom (5.2 percent). Comparatively, a smaller percentage of women in the reproductive age group married or in union has been estimated to rely on traditional method of contraception in Asia as a whole and in particular in Eastern Asia and South Central Asia. The percentage of Modern Contraceptive Prevalence Rate is poor in the South Eastern Asia and Western Asia. But the practice of traditional method of contraception among the women of reproductive age group in these regions has been observed to be high. At the same time, unmet need of contraception has been high in Asia. In South Central Asia, Unmet Need of contraception has been recorded highest in Pakistan (37.5percent), followed by Maldives (37.0 percent) and Nepal (24.6 percent). But compared to Srilanka (8.0 percent) and

Bangladesh (11.3 percent), the unmet need in India has been estimated to be higher (12.8 percent).

1.6. USE OF CONTRACEPTIVE IN INDIA

The family welfare and planning programmes have been a part of development planning since 1951 (First five years plan) but, the unmet need of contraception in the country is considerably high. Though the contraceptive prevalence percentage has improved in recent years, still it is lower compared to the World and Asian average (Table-2.1B). It has been observed by many Social Researchers and Demographers that the poor socio-economic and demographic background is the prime cause of the low-level contraceptive prevalence rate in India.

SOCIO-ECONOMIC, DEMOGRAPHIC PROFILE AND THE KEY INDICATORS OF FAMILY PLANNING IN INDIA

India is the second most populous country in the world, contributing about 20 percent of births worldwide. Currently, India's economic growth rate has increased and poverty has declined. India's social indicators remain weak by most measures of human development, and living standards are still among the poorest in the world.

Table-1.3 explains the socio-economic demographic profile with some selective key indicators of family planning in India. India's annual population growth rate is 1.74 percent. In India, 50 percent of total population is of reproductive age. Nevertheless, over a quarter (28.6 percent) of population of India, currently lives below the national poverty. Twenty-eight

percent of the population lives in urban areas. Crude birth rate (25.8), total fertility rate (2.85), maternal mortality rate (301 per 10,000 live birth), infant mortality rate (66 per 1000 live birth) which are considerably high (Table-1.3)

Table-1.3

Socio - Economic and Demographic Profile, India, 2001

Total population	1,028.60
Population Growth	1.74
Population Density, 2003 (people per square)	324
Urban population 2003	28%
Population Below National Poverty Line	28.60%
Population of Reproductive Age Group	50%
Total Fertility Rate(2000-2005)	2.85
Contraceptive Prevalence Rate, 2000	48.3%
Pills	2.1%
Injectables	0
Implants	0
IUD	1.6%
Female Sterilization	34.2%
Male Sterilization	1.9%
Condom	3.1%
Traditional or Natural methods	5.4%
Unmet Need 2003	15.8%
For Spacing Birth	8.3%
For Limiting Birth	7.5%
Average Age at Marriage	19Years
Average Age at First Birth	20Years
Crude Birth Rate	25.8
Maternal Mortality Ratio (per 100,000 live births) 2003	301
Infant Mortality Rate (per 10,000 live births) 2000-05	66
HDI Rank (out of 177 countries) 2007	128
GDI Rank (out of 223 countries) 2007	113

Source: Census of India, 2001; Demographic Health Survey 1998-99 and India Reproductive Health Profile, 2003.

and reflect the poor reproductive health of Indian women. Low average age at first marriage (19 Years) and the average age at first birth (20 Years) are responsible for the poor reproductive health of women in India. As such, total unmet need of contraception is estimated high (15.8 percent) in 2003, of which, unmet need for spacing and for limiting are 8.3 and 7.5 respectively. Contraceptive prevalence rate (48.3) in India is considerably low. Strong preference for female sterilization (34.2) has been observed in India. The percentage of use of reversible method and traditional method are negligible. The HDI rank of India is 128 out of 177 countries and GDI rank is 113 out of 157 countries in the world (World Human Development Index, 2007).

The impact of Family Planning Programme may be interpreted in the light of some selected demographic indicators in India since its inception.

Table- 1.4

Trend in Population Growth Rate, Crude Birth Rate, Crude Death Rate and Sex Ratio, India, 1901-2001

Year	Population (in millions)	Percentage Decadal variation	Average annual Exponential Growth Rate	Crude Birth Rate	Crude Death Rate	Sex Ratio (females per 1000 males)
1901	238.4	–		45.8	44.4	972
1911	252.1	5.75	(+) 0.56	49.2	42.6	964
1921	251.3	-0.31	(+) 0.03	48.1	47.2	955
1931	279.0	11.00	(±) 1.04	46.4	36.3	950
1941	318.7	14.22	(+) 1.33	45.2	31.2	945
1951	361.1	13.31	(+) 1.25	39.9	27.4	946
1961	439.2	21.51	(+) 1.95	41.7	22.8	941
1971	548.2	24.8	(+) 2.2	41.2	19.0	930
1981	683.3	24.66	(+) 2.22	37.2	15.0	934
1991	846.4	23.87	(+) 2.14	32.5	11.4	927
2001	1028.6	21.54	(+) 1.93	24.8	8.9	933

Source: Family Welfare Statistics, 2006.

An interpretation of Table-1.4 states that India continues to grow in size but, its pace of net addition is decreasing gradually since 1961. The crude Birth rate in India decreased from 45.8 in 1991 to 24.8 in 2001. Similarly the Crude death rate has also been observed to fall from 44.4 in 1901 to 8.9 in 2001. But, despite the fall in the CDR, the annual exponential growth rate had been increasing from 1.25 percent in 1951 to 1.93 percent in 2001. A fall in sex ratio, from 1961, has been observed. However, it has increased during the last decade.

Table-1.5
Percentage Distribution of Married Couples with Wife (15 -44 years) by Age Group: Census - 1961, 1971, 1981, 1991 & 2001.

Age Group of wife (years)	Percentage Distribution of Married couples											
	Rural				Urban				Total			
	1971	1981*	1991	2001**	1971	1981*	1991	2001**	1971	1981*	1991	2001**
15-19	13.9	12.6	10.0	7.4	10.2	8.6	6.0	4.3	13.2	11.7	9.0	6.5
20-24	20.3	21.3	21.3	19.8	21.6	21.6	19.8	17.1	20.5	21.3	21.0	19.0
25-24	20.6	20.3	22.1	22.0	22.2	23.2	24.1	23.1	20.9	21.0	22.6	22.3
30-34	18.0	17.4	18.4	19.8	18.3	18.3	20.0	20.9	18.0	17.6	18.8	20.1
35-39	15.2	15.6	15.8	18.0	16.0	16.2	17.7	20.2	15.4	15.7	16.2	18.6
40-44	12.0	12.8	12.4	13.1	11.7	12.1	12.4	14.4	12.0	12.7	12.4	13.5
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

* = Excludes Assam and based on 20 percent sample data.
**= Excludes the Population of Mao Maram, Paomata and Purul sub - divisions of Senapati district of Manipur in 2001
Source: Registrar General, India.

The percentage of distribution of married couples with wife aged between 15-44 years (currently married women) by age group (shown in the above Table 1.5), exhibits that the percentage is comparatively thinly distributed in the age group 15-19 years and it has decreased over the

period. In rural India, it has declined from 13.9 percent in the year 1971 to 7.4 percent in 2001 and in urban India, it has declined from 10.2 percent in 1971 to 4.3 percent in 2001. This indicates a slow rise in the girl's age at marriage both in rural and urban areas but, still there exist considerable percentage of married couples with wife within 15-19 years. The percentage of currently married women within the age group 20-24 years, corresponding to the high fertility period, is comparatively higher in both rural and urban areas. The percentage is higher in the rural areas than in the urban areas. This has attributed to higher fertility in rural area in India. Another point to be noted in the above Table-1:5 is that, the percentage of married couples decreases as the age group of the wife increases.

Table-1.6

Trends in TFR, IMR, MMR, CMR, India (1951-2001)

Parameters	1951	1961	1971	1981	1991	2001
Total Fertility Rate			5.2	4.2	3.6	3.1
Maternal Mortality Rate (per 100,000 live birth)	N.A.	N.A.	N.A.	N.A.	398 SRS (1997-98)	301 SRS (2000-03)
Infant Mortality Rate (per 1000 live birth)		146	129	110	80	58 (2005)
Child Mortality Rate (0-4 years per 1000 live birth	57.3	---	---	41.2	26.5	17 (2005)
Expectation of life at birth Male: Female:	41.9 40.6	46.4 44.7	52.5 52.1	55.4 55.7 (1981-85)	60.6 61.7	63.8 66.19 (2001-05)

Source: Office of Registrar General of India; National Family Health Survey and Family Welfare Statistics in India, 2006.

The total fertility rate, maternal mortality, infant mortality, child mortality (0-4Years) and expectation of life at birth in India, presented in the Table-1.6 above, exhibits the impact of Family Planning Programme since the year of its inception. The total fertility rate (TFR) as per the SRS data exhibits a slow decreasing decadal trend and it has been estimated at 3.1 in 2001. It has also been observed to fall further to 2.9 in 2005.

The maternal mortality rate in India estimated in 1991 (40 years after the year of inception of the Programme) 398 per 100,000 live births, is considerably high. It has declined to 301 in 2003. The high rate of maternal mortality rate in India implies wide gap in the policy implementation and can be viewed as one of the prime causes of high Unmet Need of Family Planning in India. The other parameters of Family Planning Performance, the infant mortality rate has been observed to decline from 146 per 1000 live births in 1961 to 58 in 2005 (i.e. over 65 years) but still it is considerably high.

The other two parameters,- child mortality under 5 years of age and expectation of life at birth for both male and female babies, measuring the impact of Family Planning Programmes have shown little improvement over 50 years. Child mortality rate (0-4 years) has declined from 57.3 in 1951 to 17.0 in 2005. The expectation of life at birth of both male and female babies have however been observed to increase gradually in the succeeding decades. From 1981-85 onwards it has been observed to be consistently higher in case of female babies than that of the male babies.

Table-1.7
State Wise Estimated Birth Rate, Death Rate, Natural Growth Rate and Infant Mortality Rate, 2005

State/UT	Birth Rate			Death Rate			Natural Growth Rate			Infant Mortality Rate		
	Total	Rural	Urban	Total	Rural	Urban	Total	Rural	Urban	Total	Rural	Urban
INDIA	23.8	25.6	19.1	7.6	8.1	6	16.3	17.5	13.1	58	64	40
Andhra Pr.	19.1	20.1	16.7	7.3	7.9	5.9	11.8	12.2	10.8	57	63	39
Assam	25.0	26.6	15.3	8.7	9.2	5.6	16.3	17.4	9.6	68	71	39
Bihar	30.4	31.2	23.8	8.1	8.3	6.6	22.3	22.9	17.2	61	62	47
Chattisgarh	27.2	29	20.0	8.1	8.4	6.9	19.1	20.6	13.1	63	65	52
Gujrat	23.7	25.5	21.0	7.1	8.0	5.8	16.6	17.5	15.2	54	63	37
Haryana	24.3	25.7	21.0	6.7	7.0	5.8	17.6	18.7	15.1	60	64	45
Jharkhand	26.8	28.8	18.7	7.9	8.4	5.7	18.9	20.4	13.0	50	53	33
Karnataka	20.6	22.1	17.9	7.1	7.9	5.6	13.5	14.2	12.3	50	54	39
Kerala	15.0	15.1	14.8	6.4	6.3	6.5	8.7	8.8	8.2	14	15	12
Madhya Pr.	29.4	31.6	22	9.0	9.8	6.1	20.5	218	16	76	80	54
Maharashtra	19	19.6	18.2	6.7	7.4	5.7	12.3	12.2	12.5	36	41	27
Orissa	22.3	23.2	16.3	9.5	9.9	7.0	12.8	13.4	9.3	75	85	55
Punjab	18.1	18.8	17.0	6.7	7.2	5.8	11.4	11.6	11.2	44	49	37
Rajasthan	28.6	30.2	23.8	7.0	7.2	6.2	21.6	22.9	17.6	68	75	43
Tamil Nadu	16.5	16.9	16.0	7.4	8.2	6.2	9.2	8.7	9.8	37	39	34
Uttar Pradesh	30.4	31.3	26.5	8.7	9.1	6.8	21.7	22.2	19.7	73	77	54
W.B.	18.8	21.2	12.6	6.4	6.3	6.6	12.4	14.9	6.0	38	40	31
Arunachal Pr.	23.3	24.4	18.7	5.0	5.5	2.8	16.3	18.9	15.9	37	39	17
Delhi	18.6	19	18.5	4.6	5.5	4.5	13.9	13.5	14.0	35	44	33
Goa	14.8	13.9	15.4	7.1	8.9	5.8	7.7	5.0	9.5	16	16	15
Himachal Pr.	2.0	20.7	13.3	6.9	7.1	4.7	13.1	13.6	8.6	49	50	20
J & K	18.9	20.2	14.3	5.5	5.7	5	13.4	14.6	9.3	50	53	39
Manipur	14.7	14.5	15.5	4.1	4.0	4.4	10.7	10.5	11.1	13	12	14
Meghalaya	25.1	27.3	15.1	7.5	7.9	6	17.5	19.4	9.1	49	50	42
Mizoram	18.8	23.2	14.4	5.1	6.2	4.1	13.7	17.1	10.3	20	26	10
Nagaland	16.4	16.5	16.1	3.8	4.0	3.1	12.6	12.5	13.1	18	17	22
Sikkim	19.9	20.2	18.0	5.1	5.2	4.8	14.8	15.0	13.2	30	31	15
Tripura	16.0	16.5	13.8	5.7	5.7	5.8	10.3	10.7	8	31	31	29
Uttarkhand	20.9	22.1	16.6	7.4	7.9	5.3	13.6	14.2	11.2	42	56	19

Source. SRS Bulletin, Oct',2006.

Table-1.7 above shows that Uttar Pradesh and Bihar as per

Sample Registration System (SRS) 2005, have recorded highest Crude Birth

Rate (CBR) i.e. 30.4, while Madhya Pradesh (29.4), Rajasthan (28.6), Assam

(25.0), Haryana (24.3), Chhattisgarh (27.2), Jharkhand (26.8) and Meghalaya

(25.1) recorded higher birth rate than the national average. The lowest birth rate was recorded in the state of Kerala (15.0) among major state while Manipur (14.7) among the smaller states recorded the lowest birth rate during the year.

Crude Death Rate (CDR) as per 2005 at the state level, Orissa (9.5), Madhya Pradesh (9.0), Uttar Pradesh (8.7), Assam (8.7), Bihar (8.1), Chhattisgarh (8.1) and Jharkhand (7.9) are higher than the national average. On the contrary, the smaller states like the states other than Assam in the north eastern region have recorded the CDR below the national average.

Infant Mortality Rate (IMR) at the state level has been recorded highest in the state of Madhya Pradesh (76), followed by Orissa (75), Uttar Pradesh (73), Rajasthan (68), Chhattisgarh (63), Assam (68), Bihar (61) and Haryana (60) as against the national average (58). The lowest IMR has been recorded in the state of Kerala (14), followed by Maharashtra (36), Tamil Nadu (37), West Bengal (38) and Jammu and Kashmir (50).

It has been observed in the above Table-1.7, that, there is wide range of disparities between rural and urban CBR, CDR and IMR both at the national level and also at the states level, but the state of Kerala is an exception in this regard. A marginal gap between rural and urban CBR, CDR and IMR is observed in Kerala. The natural growth rate which is the difference between the CBR and CDR has been estimated 16.3 at national level. At the state level, the state of Kerala (8.3) has recorded the lowest natural growth.

Table-1.8

Maternal Mortality Rates: India /States, 1997-98, 1990-91, 2000-03.

India/ State	1997-98	1990-01	2001-03
INDIA	398	327	301
Andhra pradesh	197	220	195
Assam	568	398	490
Bihar	531	400	371
Gujrat	46	202	172
Haryana	136	176	162
Karnataka	245	266	228
Kerala	150	149	110
Madhya Pradesh	441	407	379
Maharashtra	166	169	149
Orissa	346	424	358
Punjab	280	177	178
Rajasthan	508	501	445
Tamil Nadu	131	167	134
Uttar Pradesh	606	539	571
West Bengal	303	218	194

Source: Family Planning Statistics, India, 2006.

The maternal mortality rate in India has been observed to decline over the period 1997 to 2003. But, it varies widely (Table-1.8) in the states. During the year 2001-03 the maternal mortality rate has been recorded highest in Uttar Pradesh (517), followed by the state of Assam (490), Rajasthan (445), Madhya Pradesh (379), Bihar (371) and Orissa (358) as against the national average, 301. Lowest maternal mortality rate was recorded in Kerala (110 per 1000 live births) in 2001-03.

The acceptance of the family planning by methods in India as per the Report of Family Welfare Statistics in India, 2006 (Table-1.9), gives us an idea about the contraceptive prevalence rate in the country. The year 2004-05 has ended up with 44.5 million total family planning acceptors comprising equivalent condom users 53.5 percent, sterilization acceptors lowest 11.0 percent, the equivalent oral pill users 21.0 percent and the IUD acceptors

34

13.8 percent. The percentage of the condom users, being the highest among the total acceptors, has, however, been observed to oscillate during the past decades.

Table-1.9

Family Planning Acceptance by Methods, India
(1980-81 to 2005-06)

Year	Sterilization	IUD insertions	Equivalent Condom Users	Equivalent Oral Pill Users	Total Acceptors
1980-81	2,053 (31.6)	628 (9.7)	3,718 (57.3)	91 (1.4)	6,490 (100.0)
1985-86	4,902 (25.9)	3,274 (17.3)	9,387 (49.6)	1,358 (7.2)	18,920 $ (100.0)
1989-90	4,188 (16.1)	4,942 (18.9)	14,159 (54.3)	2,79 (10.7)	26,082 (100.0)
1990-91	4,126 (15.1)	5,370 (19.6)	14,735 (53.9)	3,125(11.4)	27,356 (100.0)
1991-92	4,090 (15.9)	4,386 (17.1)	13,875 (53.9)	3,366(13.1)	25,717 (100.0)
1995-96	4,422 (13.1)	6,858 (20.4)	17,297 (51.4)	5,091(15.1)	33,668 (100.0)
1996-97	3,870 (12.1)	5,681 (17.7)	17,214 (53.8)	5,250(16.4)	32,015 (100.0)
1997-98	4,239 (12.6)	6,173 (18.4)	16,796 (50.0)	6,39 (19.0)	33,603 $ (100.0)
1998-99	4,207 (12.1)	6,083 (17.5)	17,448 (50.3)	6,944(20.0)	34,682 (100.0)
1999-00	4,595 (12.5)	6,200 (16.9)	18,135 (49.4)	7,747(21.1)	36,678 (100.0)
2000-01	4,735 (12.9)	6,047 (16.5)	18,204 (49.7)	7,640(20.9)	36,626 (100.0)
2001-02	4,827 (12.8)	6,273 (16.7)	17,785 (47.3)	8,695(23.1),	37,580 (100.0)
2002-03	4,903 (11.4)	6,148 (14.3)	22,604 (52.5)	413 21.9)	43,068 (100.0)
2003-04	4,925 (11.0)	6,115 (13.6)	23,847 (53.2)	9,918(22.1)	44,804 (100.0)
2004-05	4,920 (11.0)	6,169 (13.8)	23,940 (53.7)	9,543(21.4)	44,572 (100.0)
2005-06*	4,692 (10.2)	6,168 (13.4)	26,041 (56.5)	9,211(20.0)	46,113 (100.0)

*Figures are provisional; $ Sum of the figures given under Cols. 2,3,4 & 5 may not tally with the figures under Col. 6 due to rounding off.

Note : Figures in brackets indicates percentage to total acceptors for each year.
Source : Family Welfare Statistics in India, 2006.

The estimated provisional figures obtained from States / UTs in India, for 2005-06, show that the total number of acceptors has gone up to 46.1 million, comprising 10.2 percent sterilization acceptors, 13.4 IUD insertion, 56.5 percent equivalent condom users and 20.0 percent oral pill users.

Table- 1.10

Rural/Urban Break up of Sterilization, India, (1980-81 to 2004-05)

Year	Number of Sterilizations				
	Rural	Urban	Break -up not available	Total	% of Rural to total @
1980 -81	1,363,105	633,839	25,826	2,022,770	68.3
1985-86	3,085,196	1,244,541	572,172	4,901,909	71.3
1990-91	2,504,683	1,178,730	442,142	4,125,555	68.0
1995-96	2,449,606	1,227,636	745,077	4,422,319	66.6
1997-98	2,117,207	1,117,678	1,003,629	4,238,514	65.4
1999-00	2,701,749	1,367,991	525,726	4,595,466	66.4
2000-01	1,936,702	741,855	2,056,592	4,735,149	72.3
2001-02	2,359,837	1,843,009	624,419	4,827,265	56.1
2002-03	2,835,332	1,443,637	624,419	4,903,388	66.3
2003-04	2,511,249	1,217,493	1,196,082	4,924,824	67.3
2004-05	2,437,546	901,515	1,581,083	4,920,144	73.0

@ % of column (2)+(3), the total Figure: for which Rural\Urban Break=up is available.
Source: Family Welfare Statistics in India, 2006.

The rural–urban break up study of sterilization performed in India since 1980-81, shown in Table–1.10, exhibits that most of the sterilizations are performed in rural India. More than 60 percent of the total sterilizations during the period 1980-81 to 2004-05 in India were performed in rural area. An increasing trend has been observed in the percentage of rural sterilization from 68.3 percent in 1980-81 to 73.0 in 2004-05. This implies that there is a decreasing trend in the preference for sterilization in urban areas.

Table-1.11

Sex Wise Break up of Sterilization, India,(1980-81 to 2004-05).

Year	Number of Sterilization			% of Tubectomy to total
	Vasectomy	Tubectomy	Total	
1980 -81	438,909	1,613,861	2,052,770	78.6
1985-86	639,477	4,262,132	4,901,609	87.0
1990-91	254,905	3,870,650	4,125,555	93.8
1995-96	123,748	4,298,571	4,422,319	97.2
2000-01	109,902	4,625,247	4,735,149	97.7
2001-02	111,458	4,715,807	4,827,265	97.7
2002-03	121,694	4,781,694	4,903,388	97.5
2003-04	114,295	4,810,529	4,924,824	97.7
2004-05	136,445	4,783,699	4,920,144	97.2
2005-06*	165,342	4,526,690	4,692,032	96.5

*Figures are provisional
Source: Family Welfare Statistics, India, 2006.

A sex wise break up study of sterilization, as shown in Table-1.11, exhibits that Tubectomy, as a method of female sterilization, has been performed almost regularly in larger number than that of Vasectomy in India. The percentage of Tubectomy has been observed to be more than 95 percent of total sterilization since 1990-91. The percentage of Tubectomy to the total sterilization performed during the 2004 =05 and 2005 =06 are 97.2 and 96.5 respectively.

A rural urban break up study of IUD insertion performed in India, shown in Table-1.12, exhibits that most of the total IUD insertions have been

done in rural India. This has been reflected in the column (6) of the Table-1.12.

Table-1.12

Rural /Urban Break up of IUD Insertion, India, (1980-81 to 2004-05).

Year	Number of IUD Insertions				
	Rural	Urban	Break –up Not available	Total	% of Rural to total @
1980 -81	356,668	252,607	18,375	627,650	58.5
1985-86	2,308,512	728,120	237,228	3,273,860	76.0
1989-90	3,626,254	1,016,996	298,792	4,942,042	78.1
1990-91	4,053,584	1,052,429	264,261	5,370,274	79.4
1993-94	4,021,195	1,001,819	993,700	6,016,714	80.1
1996-97	4,341,557	1,072,512	266,602	5,680,671	80.2
1997-98	4,126,432	999,377	1,047,095	6.172,904	80.5
1998-99	3,861,942	894,578	1,326,038	6,082,558	81.2
1999-2000	4,420,847	1,015,951	763,047	6,199,845	81.3
2000-01	1,545,473	2,366,435	2,135,367	6,047,275	39.5
2001-02	3,911,705	971,016	1,389,824	6,272,545	80.1
2002-03	4,194,089	1,393,989	559,958	6,148,036	75.1
2003-04	4,008,262	1,097,385	1,009,020	6,114,667	78.5
2004-05	3,886,859	1,380,729	901,415	6,169,415	73.8

@ % of column (2) + (3), the total Figure: for which Rural\Urban break-up is available

Source: Family Welfare Statistics, India, 2006.

A steady increasing trend is observed in the percentage of rural to total IUD insertion = from 58.5 percent in 1980=81 to 81.3 percent in 1990=

38

2000. But, in the 2000-01, the percentage has dropped to 39.5. The reason of such decline in the percentage of rural IUD insertion may be attributed to the non-availability of break up records of a large number of IUD insertion (i.e. 2,135,367), shown in column (4) of the table 1.12. In the following year, the percentage again increased to 80.1. An oscillation can also be observed in the percentage from 2001-02 and in 2004-05. Finally, in 2005, it has been estimated at 73.8.

The percentage of couples effectively protected by various methods of contraception at all India level (shown in Table-1.13) will provide us an idea about the extent of successful implementation of the programmes of family planning in India.

The estimated number of eligible couples as per the Family Welfare Statistics in India 2006, has increased from 116033 in 1980=81 to 185177 in 2004–05 (i.e. increased by more than eighteen times). But, the percentage of couples effectively protected due to all methods has increased only from 22.8 in 1980-81 to 46.6 in 2004-05, which is still below 50 percent (i.e. increased by only two times).

Device wise couples protection rate shown in Table 1.13, exhibits that the percentage of couples currently and effectively protected by sterilization has increased till the year 1995-96, but, thereafter the percentage has registered a downturn course i.e. decreased from 30.2 in 1995-96 to 28.2 in 2004 -05. In case of IUD insertion, the percentage of couples currently protected has been observed to increase from 1.1 in

1980-81 to 7.1 in 2004-05, whereas the percentage of couples effectively protected due to IUD, as a temporary method, has increased from 1.0 in 1980–81 to 7.8 in 1995 – 96, but, thereafter it declined to 6.8 in 2004-05. The percentage of couples currently protected due to other methods has also been observed to increase from 3.3 in 1980 – 81 to 18.1 in 2004 -05, which is still very poor.

Table-1.13

Percentage Distribution of Couples Currently and Effectively Protected in India by various Methods of Family Planning

Year	Eligible Couples (Estimated)	Couples Currently & Effectively Protected Due to Sterilization	Couples Currently Protected due to IUD	Couples/Effectively Protected due to IUD	Couples Currently Protected due to other Methods	Couples/Effectively Protected due to other Methods	Couples Currently Protected due to all Methods	Couples/Effectively Protected due to all Methods
1980-81	116033	20.1	1.1	1.0	3.3	1.7	24.4	22.8
1985-86	129432	26.5	3.9	3.7	8.3	4.7	38.7	34.9
1990-91	145140	30.3	7.0	6.7	12.3	7.2	49.6	44.1
1991-92	148430	30.3	6.7	6.3	11.6	6.9	48.6	43.6
1994-95	158310	30.2	7.6	7.2	13.9	8.5	51.6	45.8
1995-96	161593	30.2	8.2	7.8	13.8	8.5	52.2	46.5
1996-97	164749	29.6	7.8	7.4	13.5	8.3	51.0	45.4
1997-98	165869	29.3	7.6	7.3	13.8	8.8	50.8	45.4
1998-99	168558	29.1	7.8	7.4	11.7	7.5	48.6	44.0
1999-00	171198	29.0	7.7	7.3	15.3	9.9	51.9	46.2
2000-01	173835	28.9	7.5	7.2	14.9	9.6	51.3	45.6
2001-02	176697	28.7	7.5	7.1	15.0	9.9	51.1	45.7
2002-03	179544	28.5	7.4	7.0	17.8	11.5	53.7	47.1
2003-04	182371	28.4	7.2	6.9	18.5	11.9	54.1	47.2
2004-05	185177	28.2	7.1	6.8	18.1	11.7	53.4	46.6

Note: (1) The CPR has been calculated on the basis of methodology adopted by the Department and note on "Estimation of Birth Averted and couples Protected" issued to all the States/UTs for working out the rate in 1979 taking into account different parameters at that point of time,
(2) The estimates of couple protected given in the above table are based on: (a) Age distribution of the Acceptors and; (b) estimates of joined survival ratios of husbands and wives in different age groups.
Source: Family Welfare statistics in India,2006.

Device wise couples protection rate shown in Table 1.13, exhibits that the percentage of couples currently and effectively protected by sterilization has increased till the year 1995-96, but, thereafter the percentage has registered a downturn course i.e. decreased from 30.2 in 1995-96 to 28.2 in 2004 -05. In case of IUD insertion, the percentage of couples currently protected has been observed to increase from 1.1 in 1980-81 to 7.1 in 2004-05, whereas the percentage of couples effectively protected due to IUD, as a temporary method, has increased from 1.0 in 1980–81 to 7.8 in 1995 – 96, but, thereafter it declined to 6.8 in 2004-05. The percentage of couples currently protected due to other methods has also been observed to increase from 3.3 in 1980 – 81 to 18.1 in 2004 -05, which is still very poor. But, an analysis of the data given in column of 14 in Table 2.13, shows that the percentage of couples effectively protected due to all methods has increased from 24.4 in 1980-81 to 53.4 in 2004 -05, which is just above 50 percent. However, from 1983-84 onwards, a shift has been observed in the trend of the use of contraception from permanent method (sterilization) to temporary method (IUD insertion) in India.

The NFHS Report 1, 2 & 3 can provide a better analysis regarding the present status and the trend in the use of contraceptives both at national as well as state level. Table-1.14A shows that the unmet need of family planning is not uniform among the states in India. The unmet need at national level though has been observed to decrease from 19.5 in NFHS I ('92-'93) to 15.8 in NFHS 2 ('98-'99) and finally to 13.2 in NFHS 3 (2005 -06), which is still considerably high.

Table-1.14 A

Key Indicators of Family Planning in India–NFHS Report 1, 2 & 3

State/UT	% of Unmet Need NFHS			% of Currently using any method NFHS			% of currently using any modern method NFHS			% of currently using Sterilization NFHS			% of currently using Spacing Method NFHS	
	1	2	3	I	2	3	1	2	3	1	2	3	2	3
	(92-93)	(98-99)	('05-06)	(92-93)	(98-99)	('05-06)	(92-93)	(98-99)	('05-06)	(92-93)	(98-99)	('05-06)	(98-99)	('05-06)
INDIA	19.5	15.8	13.2	40.6	48.2	56.3	30.8	42.8	48.5	30.8	36.1	38.3	6.8	10.2
Andhra Pr.	10.4	7.7	5.0	47.0	59.6	67.1	44.7	58.9	67.0	44.7	57.0	65.9	1.8	1.3
Assam	21.7	17.0	10.8	42.8	43.3	56.5	14.4	26.6	27.0	14.4	16.7	13.2	10.0	14.0
Bihar	25.1	24.5	23.1	23.1	24.5	34.1	18.6	21.6	28.8	18.6	20.2	24.4	2.2	4.2
Chhattisgarh	NA	13.5	10.5	-	45.0	53.2	-	42.3	49.1	-	38.4	44.2	3.9	5.1
Gujrat	13.1	8.5	8.2	49.3	59.0	66.6	41.0	53.3	56.5	41.0	45.3	43.5	8.1	13.1
Haryana	16.4	7.6	8.3	49.7	62.4	63.4	34.8	53.2	58.2	34.8	40.8	38.9	12.5	19.3
Jharkhand	NA	21.0	23.7	-	27.6	35.7	-	24.9	31.1	-	22.0	23.8	2.9	7.2
Karnataka	18.2	11.5	10.2	49.1	58.3	63.6	42.7	56.5	62.5	42.7	52.2	57.6	4.4	6.3
Kerala	11.7	11.7	9.0	63.3	63.7	68.6	48.3	56.1	57.9	48.3	51.0	49.7	5.1	8.6
Madhya Pr.	20.5	16.2	11.8	36.5	44.3	55.9	31.7	42.8	52.8	31.7	38.0	45.6	4.7	7.3
Maharashtra	14.1	13.0	9.6	53.7	60.9	66.9	46.1	59.9	64.9	46.1	52.2	53.2	7.6	12.0
Orissa	22.4	15.5	15	36.3	46.8	50.7	31.6	40.3	44.6	31.6	35.6	34.1	4.7	10.8
Punjab	13.0	7.3	7.4	58.7	66.7	63.3	34.0	53.8	56.0	34.0	30.9	32.0	23.0	23.9
Rajasthan	19.8	17.6	14.7	31.8	40.3	47.2	27.7	38.1	44.4	27.7	32.3	35.0	5.8	9.4
Tamil Nadu	14.5	13.0	8.9	49.8	52.1	61.4	39.5	50.3	60.0	39.5	46.0	55.4	4.3	4.6
Uttar Pr.	13.1	25.1	21.9	19.8	28.1	43.6	13.1	20.8	29.3	13.1	15.6	17.5	6.1	11.8
W.B.	17.4	11.8	8.8	57.4	66.6	71.2	30.6	47.3	49.9	30.6	33.8	32.9	13.5	16.8
Arunchal Pr.	20.4	26.5	19.3	23.6	35.4	43.2	10.7	32.8	37.3	10.7	20.7	22.9	12.2	14.8
Delhi	15.5	13.4	8.0	60.3	63.8	66.9	23.3	56.3	56.4	23.3	28.6	23.8	27.7	32.8
Goa	15.7	17.1	13.2	47.8	47.5	48.2	30.5	35.9	37.2	30.5	28.2	25.9	7.7	11.6
Himachal Pr.	14.9	8.6	7.3	58.4	67.7	72.6	45.8	60.8	71.0	45.8	52.4	55.3	8.4	16.0
J & K	17.5	20.0	15.0	49.4	49.1	52.6	29.7	41.7	44.9	29.7	30.7	28.9	11.1	15.5
Manipur	21.7	23.6	12.6	34.4	38.7	48.7	23.8	25.9	23.5	13.8	15.5	8.6	10.3	14.9
Meghalaya	25.1	35.5	35.1	20.7	20.2	24.3	10	15.5	18.5	10.0	6.5	9.6	9.1	8.9
Mizoram	11.9	15.5	17.4	53.8	57.7	59.9	44.6	57.1	59.6	44.6	45.3	42.9	11.7	17.2
Nagaland	26.7	30.2	26.3	13.0	30.3	29.7	6.4	24.2	22.5	6.4	12.3	9.9	12.0	12.7
Sikkim	NA	23.1	16.9	--	53.8	57.6	-	41.4	48.7	-	24.8	25.7	16.6	20.1
Tripura	13.5	17.7	10.5	56.1	55.5	44.9	19.1	26.1	17.6	19.1	26.7	1.5	16.8	25.5
Uttarkhand	NA	21.0	11.3	--	43.1	59.3	--	40.4	55.5	-	31.1	33.9	9.2	21.4

Source: Family Welfare Statistics in India 2006.

The states, like Kerala and Tamil Nadu, passing through the demographic transition stage III, with total fertility 1.8 and 2.0 respectively

(Census, India, 2001), have performed well in CPR (Couple Protection Rate). These states have shown a low level of unmet need of family planning – Kerala (9.0) and Tamil Nadu (8.9) which are below the national average of unmet need during NFHS 3. Unmet need in other states like Andhra Pradesh (5.0), Punjab (7.4), Maharashtra (9.6), Gujrat (8.2) ,Himachal Pradesh (7.3) and West Bengal (8.8) are considerably lower than the national average (13.2) during NFHS III (2005 -06).

It is only during NFHS 3, the unmet need of family planning in Assam has come down to 10.8, which is below the national average. The states performing poor in CPR (Couple Protection Rate) such as Bihar, Rajasthan and Uttar Pradesh along with some other states in north eastern regions like Meghalaya, Nagaland, Arunachal Pradesh etc. have also shown a higher percentage of unmet need of family planning than the national average (38.3).

During NFHS 3, the state of west Bengal has scored highest percentage of currently married couples using any method (71.2), which is well above the national average (56.3). However, in case of the percentage of currently using any modern method, West Bengal has scored only 49.9, which is just above the national average 48.5. On the other hand, the states recording percentage below the West Bengal average but above the national average in currently using any modern methods, are Andhra Pradesh (67.7), Kerala (68.6), Maharashtra (66.9), Karnataka (63.6) and Tamil Nadu (61.4). Assam has shown a marginal improvement in the percentage of currently

43

using any modern method (27.0) but it is well below the national average during the said period. Nagaland has been identified as the state performing equally poor in both cases currently using any method (29.7) and currently using any modern method (22.5) during NFHS 3.

So far the choice between sterilization and spacing methods of contraception is concerned, more or less strong preference for sterilization (as a permanent method) has been observed both at the state and at national level. Only exceptions are Manipur, Nagaland and Uttarkhand. A steady increasing trend in the use of sterilization has been observed in Andhra Pradesh over the three survey periods. During NFHS 3, the percentage of currently using sterilization in Andhra Pradesh has been the highest (65.9) amongst the states. In Kerala it is 49.7, in Karnataka 57.6 and in Tamil Nadu it is 55.4 during NFHS 3 as against the national average 38.3. In Assam, the percentage of currently using sterilization has shown a decreasing trend during the three survey periods and it has been recorded as 13.2 in NFHS 3 (2005 -06) which is well below the national average.

During the three survey periods, the percentage of currently using spacing method has, however, been observed to increase more or less both at the national and the state levels. In the current use of spacing method Delhi has, however, performed well above the national average and during NFHS 3, Delhi has scored 32.8 percent as against the national average of 10.2. The other states, which have shown a higher percentage of currently using spacing method during NFHS 3, are mainly Punjab (23.9), Tripura (25.5) and Uttarkhand (21.4). In Assam, an increasing trend in the currently

use of spacing method has been observed over the periods. During NFHS 3 (2005 -06), it is 14.0, which is above the national average (10.2).

Unmet need of contraception has been observed to decline during the three survey periods. NFHS-3 recorded lowest unmet need in Andhra Pradesh and highest in Meghalaya while, it is less than 10 percent in Kerala, Gujarat, Punjab, Himachal Pradesh, J&K and West Bengal.

For a better analysis of the practice of family planning in India, an interpretation of some selected demographic indicators of NFHS and DLHS Reports are necessary. Table-1.14B represents some selected demographic indicators of NFHS Report.

An analysis of the Table–1.14B reveals the fact that the percentage of contraceptive use is more effective in the states having higher median age at first birth for women (25-49 years) and lower percentage of birth of order 3 and above. Kerala shows a decreasing trend in the percentage of women at birth of order 3 and above, while an increasing trend in the median age at first birth for women (25 – 49 years). Thus, Kerala has been one of the leading states in India, which has successfully executed the family planning programmes in the state. Tamil Nadu has also been marked as another successful state in executing the family planning programmes. The state shows a higher median age 21.0 years at first birth for women in 2005-06 and the lower percentage of birth of order 3 and above (i.e. 21.6 percent) in 2002-04 than that of the national average. On the other hand, the state of Assam has been marked as one of the poor performing state in this

Table-1.14 B

Selected Demographic Indicators of NFHS I, II,&III, and DLHS I & II.

States	Median age at 1st birth for women (25-49)			% of Birth of order 3 or 3+				
	NFHS			NFHS			DLHS	
	NFHS-1 (1992-93)	NFHS-2 (1998-99)	NFHS-3 (2005-06)	NFHS-1 (1992-93)	NFHS-2 (1998-99)	NFHS-3 (2005-06)	DLHS-1 (1998-99)	DLHS-2 (2002-04)
INDIA	-	19.3	19.8	48.6	45.2	-	45.8	42.0
A.P	-	18.0	18.8	42.1	31.5	-	28.7	22.5
Assam	-	19.9	20.7	58.2	43.8	-	45.9	40.6
Bihar	-	18.9	18.7	56.4	54.6	-	56.7	54.4
Chhattisgarh	=	17.8	18.8	=	48.1	=	=	44.9
Gujarat	-	20.1	20.6	42.0	41.1	-	37.8	38.1
Haryana	-	20.1	20.3	47.5	41.6	-	41.5	38.4
Jharkhand	-	18.7	18.9		53.7	-	-	48.9
Karnataka	-	18.9	19.9	42.4	33.6	-	35.3	29.6
Kerala	-	21.9	22.7	26.0	21.1	-	17.1	15.5
Madhya Pradesh	-	18.7	19.4	49.8	52.8	-	47.7	49.4
Maharashtra	-	19.0	19.9	42.8	39.2	-	34.6	32.4
Orissa	-	19.6	20.0	48.0	42.9	-	45.3	42.1
Punjab	-	21.5	21.4	42.7	39.6	-	35.6	32.4
Rajasthan	-	19.4	19.6	50.7	52.9	-	51.7	47.4
Tamil Nadu	-	20.6	21.0	32.3	23.2	-	23.6	21.6
Uttar Pradesh	-	18.8	19.4	57.5	58.1	-	59.9	56.9
West Bengal	-	19.2	19.0	46.2	36.5	-	38.5	31.0
Arunachal Pradesh	-	20.3	19.9	54.6	46.0	-	56.8	48.8
Delhi	-	21.2	21.7	44.3	39.3	-	32.2	42.2
Goa	-	24.1	>25	32.2	24.9	-	22.0	20.0
Himachal Pradesh	=	20.5	21.2	42.7	33.3	=	31.4	24.4
J & K	-	20.3	21.4	44.1	50.3	-	50.6	31.8
Manipur	-	23.1	23.7	52.0	47.1	-	46.3	43.1
Meghalaya	-	20.4	21.7	53.5	60.1	-	57.0	59.5
Mizoram	-	22.8	22.3	45.0	46.0	-	40.6	41.5
Nagaland	-	21.2	21.8	48.1	59.6	-	59.9	57.7
Sikkim	-	21.4	21.9	-	42.1	-	43.9	30.5
Tripura	-	20.1	20.3	45.8	34.2	-	33.4	17.9
Uttarkhand	-	20.1	20.5	-	46.4	-	-	45.9

Source: Family Welfare Statistics in India, 2006.

regard. The demographic indicators of family planning like, the median age of 1st birth for women has been comparatively lower (i.e. 20.7 years) in 2005-06 while the percentage of birth of order 3 and above (i.e. 40.6 percent) has been considerably higher in 2002-04.

1.7 USE OF CONTRACEPTION IN ASSAM:

The state of Assam does not have its own state policy. As such, family planning programmes taken up by the state are under the guidelines of the Central Policy. Family Planning programme, at present, aims to promote the contraceptive use among eligible couples, to provide a free choice of contraceptive (including oral pill, IUD and sterilization) and to assure a high quality care to the users. Like other states of the country, Assam has also been giving priority on stabilization of population through Family Welfare Programmes. And thereby to bring down of the birth rate and growth rate of population in the state. The family planning services are being implemented through the Primary Health Care System. The Primary Health Care infrastructure has been developed as a three-tier system with Sub Centre, Public Health care (PHC) and Community Health Care (CHC).

The state of Assam constitutes 78438 square kilometres which is about 2.4 percent of the country's geographical area. Total population of the state being 26.64 million accounts for 2.5 percent of country's population (Census, 2001). The density of population of the state is 340 per square Kilometre which is marginally higher than the average density for the country i.e. 324 person per square kilometre (Census, 2001). This has been displayed in the Table-1.15.

Table-1.15

Assam with Districts, Census 2001.

District	Total Area (in Sq.Km)	Total Population	Density of Population	Urban Population (%)	% of SC Population	% of ST Population	% of Char Population
Dhubri	2798.00	163734	584	11.66	3.86	1.97	42.14
Kokrajhar	3538.00	905764	256	6.84	3.44	33.67	_
Bongaigaon	2152.00	904835	420	12.17	10.25	12.23	14.95
Goalpara	1824.00	822035	451	8.18	4.80	16.03	22.72
Barpeta	3245.00	164720	508	7.62	5.70	7.48	16.29
Nalbari	2257.00	114882	509	2.41	7.51	17.63	7.28
Kamrup	4345.00	252232	581	35.81	6.76	9.93	6.13
Darrang	3481.00	150432	432	4.91	4.55	16.61	9.46
Sonitpur	5324.00	168151	316	8.81	5.23	11.60	13.47
Lakhimpur	2277.00	889010	390	7.32	7.88	23.49	16.11
Dhemaji	3237.00	571944	177	6.91	5.33	47.29	15.95
Morigaon	1551.00	776256	500	4.91	12.93	15.55	11.76
Nagaon	3973.00	231462	582	12.00	9.30	3.86	3.88
Golaghat	3502.00	946279	270	8.37	5.41	9.93	_
Jorhat	2851.00	999221	350	16.91	7.87	12.32	21.52
Sibsagar	2668.00	105173	394	9.22	3.40	7.95	_
Dibrugarh	3381.00	118507	351	18.77	4.05	7.45	_
Tinsukia	3790.00	115006	303	19.49	2.72	5.85	4.57
KarbiAnglog	10434.0	813311	78	11.42	3.63	55.69	_
N.C.Hills	4888.00	188079	38	31.19	1.79	68.28	_
Karimganj	1809.00	100797	557	7.33	12.99	0.29	_
Hailakandi	1327.00	542872	409	8.39	10.91	0.15	_
Cachar	3786.00	144492	382	13.97	14.41	1.29	_
Assam	78438.0	266555	340	14.46	6.85	12.41	9.34

Source: Statistical hand book of Assam, 2008 and
Socio-Economic Survey Report, 2002-03.

The district wise demographic profile (Table -1.15) indicates that the occupied area of the districts is not proportional to the total size and density of population. For example, Karbi Anglong (10434 sqr.km) is almost 8 times larger than Hailakandi (1327 sqr.km) district. But, with respect to density of population, it is largely spread over in karbi Anglong (78 person per square kilometre), stands second at the bottom of the density table Kamrup,

the metro city of Assam, with total area of 4345 square kilometre has density of population 581 per square kilometre. Dhubri district stands at the top of the table of density of population (i.e. 585 persons per square kilometre) and it occupies total area of 2799 square km. Darrang district with density of population 432, remains at the eighth position of the density table, occupying 3481 square kilometre area.

The state of Assam has more than 87 percent rural population. This implies the process of urbanization in the state is very slow. Darrang is one of the 3 districts, having more than 95 percent of rural population (95.08). The other two districts are Morigaon (95.10) and Nalbari (97.63). This shows that Darrang is basically rural in character.

An analysis of the distribution of population with Schedule Caste and Schedule Tribes, also gives a clear picture, regarding socio- cultural background of the districts. The percentages of Schedule Caste and Schedule Tribes within the districts are also not equally distributed. The district with highest percentage of Schedule Caste is Cachar (14.41), followed by Karimganj (12.99) and Hailakandi (10.91) against the state average (6.85). But, the percentage of Scheduled Tribe population in these districts is very negligible. The districts with highest percentage of Scheduled Tribes are N.C. Hills (68.23) followed by Nalbari (17.63). The district Darrang with 55.44 percent of Scheduled Tribes stands 3rd among the districts and constitutes 4.55 percentage of Scheduled Caste. The district shows a wide range of socio – cultural diversity within the districts of Assam. Fourteen districts of Assam have considerable Char Area. People inhabiting in the

49

Char area of the districts, constitute a considerable percentage of the total population of the districts. Dhubri district constitutes the highest percentage of Char population (41.95), followed by the district of Bongaigaon (22.78) and the district of Jorhat (21.58). The Char population constitutes 9.45 percent of the total population of Darrang district.

Table-1.16

Socio-Economic Development Indices of Assam, by Districts, 2001 Census.

District	Sex ratio	literacy rate	HDI Index & Rank	GDI Index & Rank
Dhubri	947	48.21	0.214 (23)	0.206 (21)
Kokrajhar	943	51.63	0.354 (15)	0.418 (11)
Bongaigaon	945	59.33	0.263 (21)	0.376 (16)
Goalpara	956	58.03	0.308 (18)	0.413 (12)
Barpeta	941	56.24	0.396 (9)	0.448 (10)
Nalbari	939	67.23	0.343 (16)	0.357 (17)
Kamrup	901	74.16	0.574 (2)	0.642 (4)
Darrang	944	55.44	0.259 (22)	0.317 (18)
Sonitpur	929	59.00	0.357 (13)	0.397 (15)
Lakhimpur	951	68.56	0.337 (17)	0.491 (8)
Dhemaji	941	64.48	0.277 (20)	0.410 (13)
Morigaon	946	58.53	0.494 (4)	0.759 (2)
Nagaon	944	61.73	0.356 (14)	0.068 (22)
Golaghat	930	69.38	0.540 (3)	0.608 (7)
Jorhat	933	76.33	0.650 (1)	0.701 (3)
Sibsagar	928	74.47	0.469 (7)	0.468 (9)
Dibrugarh	931	68.96	0.483 (6)	0.642 (4)
Tinsukia	913	60.95	0.377 (10)	0.300 (19)
Karbi Anglong	926	57.70	0.494 (4)	0.26 (20)
N.C.Hills	884	67.62	0.363 (11)	0.877 (1)
Karimganj	947	66.24	0.301 (19)	0.012 (23)
Hailakandi	935	59.64	0.363 (11)	0.609 (6)
Cachar	945	67.82	0.402 (8)	0.409 (14)
Assam	935	63.82	0.407 (-)	0.537 (-)

Source: HDI Report, Assam, 2003, Govt of Assam & Census India, 2001

Some socio-economic indicators of the districts of Assam presented in Table-1.16, shows that the sex ratio of the district in Assam varies widely. Goalpara has been ranked first while Karbi Anglong has been ranked at bottom of the district's sex ratio table. Darrang district has recorded higher sex ratio than the state average.

The HDI and GDI indices of the districts of Assam shown in Table-1.16, exhibit that Jorhat stands at the top of the HDI index table and stands 3rd in GDI index table. There are five other districts which have higher HDI than the state average. They are Kamrup, Golaghat, Sibsagar, Dibrugarh and Morigaon. The lowest HDI has been estimated in the district of Dhubri (0.214). In GDI table, NC Hills stands 1st, Karimganj stands 23rd with lowest GDI. Darrang stands at 18th position in the GDI and 22nd position in the HDI tables. This explains the poor socio-economic background of Darrang district.

Table- 1.17

Percentage Decadal Growth Rate, India and Assam, 1901 -2001

Year	India	Assam
1901 -11	5.75	16.99
1911-21	-0.31	20.48
1921-31	11.00	19.91
1931-41	14.22	20.40
1941-51	13.31	19.31
1951-61	21.64	34.98
1961-71	24.80	34.95
1971-81	24.66	34.95
1981-91	23.86	24.24
1991-2001	21.34	18.85

Source: Statistics of Family welfare 2006.

51

Table-1.18

Percentage decadal growth of Population, Assam, 1901-2001.

State / District	% of Decadal growth			
	1951 -61	1961-71	1971-91	1991-2001
Assam	34.98	34.95	53.26	18.92
Dhubri	27.62	40.51	56.57	23.68
Kokrajhar	44.18	54.30	76.78	12.00
Bongaigaon	60.81	40.29	64.64	12.05
Goalpara	37.10	45.88	54.12	23.03
Barpeta	32.62	35.81	43.02	18.87
Nalbari	49.62	42.02	49.27	13.03
Kamrup	37.75	38.80	65.72	26.11
Darrang	44.75	43.24	55.63	15.82
Sonitpur	35.82	27.62	57.14	18.06
Lakhimpur	50.46	43.39	56.29	18.30
Dhemaji	75.21	103.42	107.50	19.45
Morigaon	37.89	37.51	50.90	21.35
Nagaon	35.91	38.99	51.26	22.26
Golaghat	26.04	30.85	58.12	14.27
Jorhat	24.17	17.47	33.10	14.69
Sibasagar	23.36	19.47	38.76	15.83
Dibrugarh	30.64	22.93	37.78	13.68
Tinsukia	35.92	31.02	47.03	19.51
Karbi Anglong	79.21	68.28	74.72	22.75
N.C. Hills	36.95	40.00	98.30	24.22
Karimganj	22.96	25.13	42.08	21.87
Haliakandi	27.23	23.61	45.94	20.89
Chachar	22.60	23.96	47.59	18.89

Source: HDI Report 2003, Assam.

An examination of the trend in population growth shows that the decadal percentage variation of Assam has been substantially larger than the average percentage of decadal variation of population for the country (Table-1.17). It was only during the last decade (1991-2001) that the decadal variation of population in Assam (18.85 percent) declined to the rate less than that of the national average (21.54 percent).

A discernible trend in the district wise decadal variation in population in Assam has been observed (Table-1.18). In the pre–independence era,

most of the districts particularly the lower Assam districts sustained high increases of population. It was only in 1991 that the rate of growth of population, as a whole, has become stable in Assam. Special attention can be drawn to the district of Darrang which showed a negative decadal growth in 1901–11 but, recovered immediately and continued to rise till 1971-91 and finally, stabilised and declined to 15.79 in 1991-2001. This substantial decline in the population growth in Assam as a whole and Darrang in particular, can not only be attributed to the promotion of family planning practices in the state and the district but also to some other socio–economic and demographic factors such as, promotion of the age of girls at marriage, improvement in infant mortality rates, women's literacy rate etc.

Table-1.19

Crude Birth Rate, Total Fertility Rate, Infant Mortality Rate, India, Assam (1981-2005).

Year	India			Assam		
	CBR	TFR	IMR	CBR	TFR	IMR
1981	33.9	-	-	33.0	-	-
1991	29.5	3.3 (1997)	80	30.9	3.2 (1997)	81
2001	25.4	3.1	68	27.0	3.0	74
2002	25.0	3.0	63	26.6	3.0	70
2003	24.0	3.0	60	26.3	2.9	67
2004	24.1	2.9	58	25.1	_	66
2005	23.8	2.9	58	25.0	2.9	68

Source: Statistics of F.W. 2006 and year book of F.W. 2001.

An examination of Table- 1.19 above shows a declining trend in CBR, TFR and IMR in India as well as in Assam. In case of Assam, the Total Crude Birth Rate has come down from 33.0 in 1981 to 25.0 in 2005, which is

still higher than the national average. The IMR rate in Assam has declined from 81 per 1000 live births in 1991 to 68 per 1000 live births, which is still higher than the national average.

Table-1.20

Estimated Crude Birth Rate and Total Fertility Rates
in Assam by Districts, 2001

State/District	Crude Birth Rate	Total Fertility Rate
India	25.9	3.2
Assam	27	3.2
Barpeta	30.8	3.8
Bongaigaon	29.4	3.5
Cachar	25.3	3.1
Darrang	29.1	3.4
Dhemaji	27.7	3.5
Dhubri	35.2	4.3
Dibrugarh	22	2
Goalpara	32	3.9
Golaghat	23.3	2.7
Hailakandi	30.2	3.8
Jorhat	19.4	2.2
Kamrup	22.1	2.6
Karbi Anglong	29.6	3.7
Karimganj	29	3.6
Kokrajhar	29.3	3.6
Lakhimpur	27.4	3.3
Morigaon	31.8	3.9
Nagaon	29.9	3.6
Nalbari	23	2.7
North Cachar	26.4	3.1
Sibsagar	21.6	2.4
Sonitpur	25.1	3
Tinsukia	29.3	2.9

Source: Christopher Z.Gulmoto, S. Irudaya Rajan, District Level Estimates of Fertility from India's Census 2001, E.P.W. Feb'2002, pp 665-672.

From Table-1.20 above it can be observed that the Estimated Birth Rate and Total Fertility Rate vary considerably among the districts in Assam. The Crude Birth Rate is highest in Morigaon district (31.8) and lowest (19.4) in Jorhat district. TFR has also been estimated lowest in Jorhat (2.2) and highest (4.3) in Dhubri. Darrang district has, however, shown a considerably higher CBR (29.1) and TFR (3.4) than the national and state average.

Table- 1.21

Comparative Statistics of Key Indicators of Family Planning, Assam, India.

	INDIA			ASSAM		
Current Use of	NFHS			NFHS		
	I	II	III	I	II	III
Any Method (%)	40.7	48.2	56.3	43.0	43.3	56.5
Any Modern Method(%)	36.5	42.8	48.5	20.0	26.6	27.0
Female Sterilization (%)	27.4	34.2	37.3	12.2	15.7	13.0
Male Sterrilization (%)	3.5	1.9	1.0	2.4	1.0	0.2
Pill(%)	1.2	2.1	3.1	2.8	6.3	10.3
IUD(%)	1.9	1.6	1.7	0.9	1.9	1.3
Condom (%)	2.4	3.1	5.2	1.7	1.8	2.4
Total Unmet Need (%)	19.5	15.8	13.2	21.7	17.0	10.8
For Spacing (%)	-	8.3	6.3	-	7.0	3.6
For Limiting (%)	-	7.5	6.8	-	10	7.2

Source: Report of NFHS-3, India and Report of NFHS-3, Assam; Ministry of Health and Family Welfare Government of India, 2005-06.

Table- 1.21 shows that the current use of any method in Assam has increased from 43.0 percent in NFHS-1 to 56.5 percent in NFHS-3, which is equal to the national average. But, the percentage of use of any modern method in Assam is well below the national average. However, the percentage of use of oral pill is higher than the national averages in Assam. The state averages of the use of other methods like male sterilization, IUD

insertion, Condom, are found to be lower than the national averages. On the other hand, the estimated total unmet need of family planning in NFHS-3 in Assam is 10.8 percent which is lower than the national average. The percentage of unmet need for spacing (3.6) in Assam has been estimated well above the national average during the survey period of NFHS-3 but, the unmet for limiting (7.2), however, is marginally lower than the national average.

As per the DLHS 2 report (shown in Table-1.22) the current use of any method of contraception in Assam is 57.5 percent. Among the districts, Hailakandi has recorded the highest percentage (81.1) and N.C. Hills has recorded the lowest percentage (12.2).The percentage of use of any modern method in the state varies between the lowest percentage (12.1) in N.C. Hills and the highest percentage (41.2) in Nalbari. Comparatively, a higher preference for female sterilization has been observed in the districts of Assam. Dibrugarh district has recorded highest percentage while Kokrajhar district has recorded the lowest percentage of use of female sterilization. The use of any modern spacing method at state level is 15.7 percent and it is observed to vary between 27.8 percent (in Lakhimpur) and 3.8 percent (in N.C. Hills).

District wise variations in the use of traditional methods have also been observed in the state. The percentage of use of traditional method in Hailakandi has been highest (67.6) while in Kokrajhar and Cachar it has been lowest (17.2). In N.C Hills, the use of traditional method has been nil. The use of oral Pills exceeds 15 percent in the districts of Barpeta, Darrang,

Table-1.22

Contraceptive Prevalence Rate by Districts in Assam, 2002-04.

Districts	Any Method (%)	Any modern method (%)	Any modern spacing method (%)	% of Male Sterilization	% of Female Sterilization	IUD (%)	Pill (%)	Condom (%)	Any traditional method (%)
Barpeta	59.3	29.4	21.2	0.0	8.2	0.8	18.7	1.7	29.8
Bongaigaon	44.3	24.7	18.3	0.0	6.4	1.6	14.5	2.2	19.6
Cachar	32.0	14.8	6.9	0.0	7.7	0.3	4.6	2.0	17.2
Darrang	68.8	38.9	21.1	0.2	17.6	1.3	18.2	1.04	29.8
Dhemaji	54.7	21.2	11.2	0.1	9.9	1.8	8.2	1.3	33.5
Dhubri	45.7	19.6	14.5	0.0	5.1	0.6	11.8	2.1	26.1
Dibrugarh	64.5	36.1	8.8	0.0	27.3	0.3	6.7	1.8	28.5
Goalpara	59.1	27.4	21.7	0.0	5.6	2.0	17.2	2.5	31.8
Golaghat	42.2	16.5	11.4	0.2	4.9	2.4	7.5	1.5	26.1
Hailakandi	81.1	14.7	11.7	0.1	3.2	0.3	8.0	3.3	67.6
Jorhat	58.0	15.6	9.0	0.0	6.5	0.2	7.5	1.3	42.5
Kamrup	67.1	14.0	20.4	0.0	23.6	1.8	14.0	4.6	22.9
Karbi Anglong	50.2	28.0	22.5	0.0	5.5	2.8	18.7	1.0	22.5
Karimganj	70.2	15.9	9.5	0.1	5.9	0.7	5.7	3.1	54.1
Kokrajhar	35.4	18.1	14.7	0.0	3.4	2.2	11.5	1.0	17.2
Lakhimpur	58.1	40.5	27.8	0.6	12.0	3.4	6.9	17.5	17.6
Morigaon	48.6	21.9	16.6	0.2	4.6	1.3	2.5	12.8	26.7
Nagaon	62.9	23.4	12.6	0.0	10.8	0.4	0.7	11.5	39.2
Nalbari	68.6	41.2	27.4	0.4	13.2	1.1	3.0	23.2	27.4
N.C.Hills	12.2	12.1	3.8	0.0	8.4	1.5	0.1	2.1	0.0
Sibsagar	60.2	25.1	12.4	0.1	12.0	1.2	8.7	2.5	34.9
Sonitpur	61.0	33.0	16.5	0.2	16.3	1.4	13.4	1.7	28.0
Tinsukia	60.5	36.8	14.0	0.0	22.0	1.9	11.4	0.8	23.7
Assam	57.5	28.7	15.7	0.1	12.8	1.2	12.2	2.3	28.7

Note: 1. Any modern method =sterilization (male/female), IUD, oral pill and Condom;
2. Any traditional method includes- Rhythm Method, Withdrawal Method
Source: DLHS- 2 Report (2002-04).

Goalpara, Karbi Anglong, Lakhimpur and Nalbari. In all the districts of Assam other than Lakhimpur and Kamrup, the use of condom has been found to be below 5 percent.

Table-1.23 A

Family Welfare Performance of Assam, by Sterilization, 2006-2009.

District	Sterilization 2006-07			Sterilization 2007-08			Sterilization 2008-09		
	Target	Achieve-ment	%	Target	Achieve-ment	%	Target	Achieve-ment	%
Barpeta	3500	54	1.54	1360	211	15.51	8370	3101	37.05
Bongaigaon	1100	99	9.00	750	226	30.13	4630	77	1.66
Cachar	4000	915	22.88	1190	278	23.36	7650	864	11.29
Darrang	3000	190	6.33	1241	2321	187.03	8160	647	7.93
Dibrugarh	6000	2009	33.48	979	1195	122.06	5590	685	12.25
Dhubri	3500	28	0.80	1352	37	2.74	7800	1341	17.19
Dhemaji	1000	448	44.80	471	174	36.94	2760	390	14.13
Goalpara	2050	149	7.27	679	102	15.02	4160	84	2.02
Goalaghat	1500	88	5.87	780	1109	142.18	4780	1081	22.62
Hailakandi	1000	228	22.80	448	182	40.63	3390	351	10.35
Jorhat	4500	965	21.44	824	524	63.59	4810	409	8.50
Kamrup	6500	2956	45.48	2081	3409	163.82	13220	7202	54.48
Karimaganj	1100	192	17.45	831	371	44.65	5640	669	11.86
Kokrajhar	1000	43	4.30	748	238	31.82	4440	98	2.21
K-Anglong	1200	56	4.67	672	84	12.50	3870	59	1.52
Lakhimpur	3700	596	16.11	734	828	112.81	5090	594	11.67
Morigaon	2050	1225	59.76	641	352	54.91	4600	659	14.33
Nalbari	2000	756	37.80	948	624	65.82	6470	308	4.76
Nagaon	6000	1537	25.62	1911	3998	209.21	11540	5306	45.98
N.C.Hills	200	30	15.00	155	30	19.35	880	46	5.23
Sonitpur	3500	1552	44.34	1387	1081	77.94	8770	752	8.57
Sivasagar	4500	1745	38.78	868	978	112.67	5900	1160	19.66
Tinsukia	2100	1421	67.67	950	1671	175.89	5480	1253	22.86
Assam	65000	17282	26.59	22000	20023	91.01	138000	27136	19.6

Source: Directorate of Health Services, Guwahati , Assam,2009.

The percentage of target achievement of sterilization in Assam, (presented in Table-1.23A above) during 2006-07 to 2008-09 shows a downward trend. But the year 2007-2008 has been remarkable in attaining 91.01 percent of target achievement of sterilization at the state level. In the same year the districts like Darrang, Dibrugarh, Golaghat, Kamrup, Lakhimpur, Nagaon, Sibsagar and Tinsukia have surpassed the target achievement. But, in the following year the the percentage of target

achievement of performing sterilization fell down drastically. At district level, the percentage varies widely (i.e. between 54.48 percent and 1.52 percent). In 2008-09 Kamrup recorded the highest percentage of achievement while Karbi Anglong district recorded the lowest. Darrang district performed poor in this regard (7.93). Other poor performing districts are Bangaigaon (1.66), Goalpara (2.02), Kokrajhar (2.21), Nalbari (4.76) etc. in 2008-09.

Table-1.23.B

Family Welfare Performance of Assam, by I.U.D. Insertion, 2006-2009.

District	I.U.D. Insertion 2006-07			I.U.D. Insertion 2007-08			I.U.D. Insertion 2008-09		
	Target	Achieve-ment	%	Target	Achieve-ment	%	Target	Achieve-ment	%
Barpeta	3500	1412	40.34	2472	608	24.60	4180	159	3.80
Bongaigaon	1200	1083	90.25	1358	1343	98.90	2310	726	31.43
Cachar	4000	2407	60.18	2168	801	36.95	3820	1082	28.32
Darrang	3000	1062	35.40	2256	1298	57.54	4080	606	14.85
Dibrugarh	3000	1463	48.77	1780	1618	90.90	2800	915	32.68
Dhubri	4000	703	17.58	2459	671	27.29	3900	439	11.26
Dhemaji	1000	278	27.80	857	631	73.63	1380	343	24.86
Goalpara	2000	1450	72.50	1235	1156	93.60	2080	945	45.43
Golaghat	1500	1888	125.87	1419	1310	92.32	2390	866	36.23
Hailakandi	1500	782	52.13	815	551	67.61	1700	623	36.65
Jorhat	2500	1899	75.96	1498	1975	131.84	2410	2102	87.22
Kamrup	5000	3544	70.88	3786	2971	78.47	6610	2364	35.7
Karimganj	2000	555	27.75	1510	416	27.55	2820	1035	36.70
Kokrajhar	1000	2256	225.60	1360	2281	167.72	2220	1838	82.79
K-Anglong	2500	1934	77.36	1221	1847	151.27	1940	1384	71.34
Lakhimpur	2000	899	44.95	1334	909	68.14	2550	1148	45.02
Morigaon	2900	871	30.03	1166	714	61.23	2300	412	17.91
Nalbari	2600	1928	74.15	1724	1674	97.10	3230	768	23.78
Nagaon	5000	2097	41.94	3474	1978	56.94	5770	1327	23.00
N.C.Hills	800	348	43.50	281	274	97.51	440	250	56.82
Sonitpur	3500	1412	40.34	2522	1634	64.79	4380	725	16.55
Sivasagar	3400	895	26.32	1578	1202	76.17	2950	762	25.83
Tinsukia	3000	1394	46.47	1727	1221	70.70	2740	863	31.50
Assam	60900	32560	53.46	40000	29083	72.71	69000	21682	31.42

Source: Directorate of Health Services, Guwahati ; Assam.

In case of IUD insertion, during 2006-07 to 2008-09, the percentage of targeted achievement (as shown in Table-1.23.B) at state level has decreased from 53.46 to 31.42. Districts like Jorhat and Kokrajhar, have recorded higher percentage of IUD insertion (above 80 percent). Darrang as a poor performer has recorded only14.85 percent.

Table-1.23.C
Family Welfare Performance, by Oral Pill Users, 2006-09

District	O.P. Users 2006-07			O.P. Users 2007-08			O. P. Users 2008-09		
	Target	Achieve -ment	%	Target	Achieve -ment	%	Target	Achieve -ment	%
Barpeta	4000	2044	51.10	2843	1917	67.43	3500	2087	59.63
Bongaigaon	1500	977	65.13	1562	574	36.75	1500	570	38.00
Cachar	4000	3837	95.93	2493	1718	68.91	2900	1943	67.00
Darrang	3000	1084	36.13	2594	1988	76.64	3100	1541	49.71
Dibrugarh	3500	702	20.06	2046	627	30.65	2100	899	42.81
Dhubri	3000	1690	56.33	2828	1675	59.23	3000	1802	60.07
Dhemaji	1500	101	6.73	985	124	12.59	900	465	51.67
Goalpara	3000	1890	63.00	1420	1251	88.10	1400	1296	92.57
Golaghat	2500	2313	92.52	1632	1769	108.39	1600	1931	120.69
Hailakandi	1000	37	3.70	937	468	49.95	900	495	55.00
Jorhat	3000	3748	124.93	1723	2753	159.78	1700	1781	104.76
Kamrup	4000	3680	92.00	4355	3251	74.65	5200	4094	78.73
Karimganj	3000	1304	43.47	1737	1026	59.07	2000	926	46.30
Kokrajhar	1000	1057	105.70	1564	995	63.62	1600	894	55.88
K=Anglong	1600	1448	90.50	1405	1536	109.32	1400	1121	80.07
Lakhimpur	3000	1483	49.43	1534	2104	137.16	1700	2122	124.82
Morigaon	1900	1358	71.47	1341	985	73.45	1600	1241	77.56
Nalbari	3000	2258	75.27	1983	1618	81.59	2000	1583	79.15
Nagaon	3500	1855	53.00	3995	1378	34.49	4200	1376	32.15
N.C.Hills	600	459	76.50	323	346	107.12	400	367	91.75
Sonitpur	3000	3013	100.43	2900	2583	89.07	3500	3210	91.71
Sivasagar	3000	1153	38.43	1814	1275	70.29	1800	1313	72.94
Tinsukia	3000	275	9.17	1986	313	15.76	2000	589	29.45
Assam	60600	37766	62.32	46000	32274	70.16	50000	33646	67.29

Source: Directorate of Health Services, Guwahati , Assam.

Table-1.23.C shows that the percentage of oral pill user in Assam have decreased from 62.32 in 2006-07 to 67.29 in 2008-09. Lakhimpur with highest percentage (124.82) stands at the top of the table followed by Golaghat (120.69) and Jorhat (104.76.) respectively. On an average, more or less all the districts have performed well in the percentage achievement of oral pill users in 2008-09. But Darrang district has performed poor in this regard (49.71 percent).

Table-1.23.D

Family Welfare Performance, by Vasectomy, 2006-09.

District	Vasectomy 2006-07		Vasectomy 2007-08		Vasectomy 2008-09	
	NSV	Conventional	NSV	Conventional	NSV	Conventional
Barpeta	—	---	—	—	—	2
Darrang	==	==	==	1	==	==
Goalghat	—	—	—	1	2	—
Jorhat	50	2	—	3	—	—
Kamrup	5	31	1	13	24	6
Nalbari	—	1	—	—	—	2
Nagaon	—	1	—	—	—	2
Tinsukia	—	20	—	---	—	—
Assam	55	55	1	18	26	12

Source: Directorate of Health Services, Guwahati, Assam

The state shows a very negligible response to male sterilization i.e. NSV and Conventional Vasectomy. It has been observed that total NSV performed in the state has decreased from 55 in 2006-07 to 1 in 2007 -08 and total conventional Vasectomy from 55 in 2006-07 to18 in 2007 -08. It has further been observed that the total number of Vasectomy performed in the state, has declined in the year 2008-09 (Table-1.23D above). Total NSV

declined to 26 and total Conventional Vasectomy to 12 during 2008-09. In Darrang, no single Vasectomy (NSV nor conventional vasectomy) was performed. This shows a clear preference for female sterilization at both the state and the district level, as it has also been observed at the national level.

As per the DLHS II (2002-04), the percentage of girls married below 18 years of age (as shown in Table-1.24) in Assam (23.8), is the second highest in the table and less than the national average 28.0. The percentage of girls who got married below 18 years has found highest in Arunachal Pradesh and lowest in Nagaland.

Table-1.24

Key Indicators of Family Planning Acceptance, North Eastern State, 2002-2004.

State/Country	% of marriage below18 years	% of llow Standard of living	% of births of order 3 or 3+	% of women's knowledge of F.P.	% of Husband's knowledge of NSV	% of couple's knowledge of any method	% of wife Husband's knowledge of any modern method.	% of unmet Need of F.P.
Assam	23.8	56.3	40.6	24.2	21.9	57.5	28.7	22.5
Arunachal	26.8	50.0	48.8	25.6	18.2	38.8	35.6	35.1
Manipur	9.6	46.9	43.1	39.1	38.3	33.5	21.1	40.9
Meghalay	16.7	64.8	59.5	2.3	1.5	17.1	14.7	55.8
Mizoram	14.0	39.7	41.5	24.8	25.7	53.8	52.6	25.0
Nagaland	7.4	48.2	57.7	13.9	12.4	39.6	33.0	33.8
Sikkim	12.0	34.2	30.5	50.3	51.2	65.3	55.3	18.2
Tripura	21.6	38.2	17.9	17.7	10.7	54.4	42.7	25.1
India	28.0	42.3	42.0	49.2	34.4	53.0	45.1	21.1

Source: Report DLHS II (2002-04).

Among the North Eastern States, Sikkim is the only state that shows the highest percentage of women having knowledge of family planning (50.3), couples having knowledge of any method (65.3) and the couples having knowledge of any modern method (55.3), which are well above the

national averages. Among the N.E. states, Meghalaya has recorded the least percentage of women having knowledge of family planning (2.3), couples having knowledge of family planning (17.1) and couples having knowledge of any modern method (14.7). Assam being the leading state in the N.E. region, however, has not performed well in this respect. The percentage of women in Assam, having knowledge of family planning has been estimated at (24.2) and the percentage of couples' knowledge of any modern method at (57.5).

The percentage of husband's knowledge of male sterilization with respect to NSV is very poor in the region as a whole. In Assam, it is 21.9 as against the national average (34.4). In this respect, Sikkim stands first in the table showing more than 50 percent husbands' knowledge of NSV and Nagaland stands at the bottom of the table showing 13.9 percent of knowledge.

The percentage of couples with 3 or more than 3 children in Assam is considerably high (40.6) but is marginally below the national average (42.0). The other states in the N.E. region which are ahead of Assam in this respect are Sikkim (30.5) and Tripura (17.9).

Assam, amongst the other states of the North Eastern Region, has shown 22.5 percent unmet need of family planning which is marginally above the national average 21.1 percent. Meghalaya with the highest percentage of unmet need 55.8 stands at the top of the table and Sikkim with the percentage 18.2 is at the bottom of the table.

As per the DLHS 2 Report most of the N.E. States recorded higher percentages of people living a low standard of life compared to the national average (42.3). This shows the poor socio - economic back ground of the region. Table-1.23 shows that States with the lower percentage of low standard of living, as compared to the national average, like Sikkim (34.2), Mizoram (39.7) and Tripura (38.2), have recorded comparatively higher percentage of women and men having knowledge of contraception than that of the other states of the region. Assam, with higher percentage of people of low standard of living, has recorded considerably lower accessibility of knowledge and information and hence, comparatively higher percentage of Unmet Need of contraception. Meghalaya has been marked as the state with least percentage of knowledge and highest percentage of Unmet Need of contraception and recorded the highest percentage of people of low standard of living (64.6).

Table-1.25

Key Indicators of Family Planning, India, Assam and Darrang, 1998-99 to 2002-04

INDICATORS	INDIA		ASSAM		DARRANG	
	1998-99	2002-04	1998-99	2002-04	1998-99	2002-04
Girls marring below age 18 Years (%)	36.9	28.0	28.7	23.8	43.3	21.4
Birth order 3+ (%)	45.8	42.0	45.9	40.6	48.3	33.9
CPR by any modern method (%)	42.5	45.7	28.4	28.7	29.2	38.9
Unmet Need (%)	25.3	21.1	37.6	22.5	52.2	12.6

Source: DLHS Report I, II.

The key indicators of DLHS-1 (1998-1999) and DLHS-2 (2002-2004) exhibited in Table-1.25 show the reproductive and family welfare

status of India, Assam and Darrang. The percentage of girls married below 18 Years of age is comparatively lower in Assam than that of the country as a whole during two survey period of Reproductive and Child Health Survey. In Darrang, the percentage of girls married below 18 years was highest (43.3), compared to the national average (36.9) and state average (28.7) during 1998-99. But, in 2002-04, a sharp fall in the percentage has been observed in Darrang (21.4).

The percentage of birth order 3 and above has been observed to be decreasing at state and district levels, while it has remained almost same at the national level. The percentage of birth of order 3 and above, in Darrang has declined to (33.9) as against the national average (42.0) and the state average (40.6) in 2002-04.

The percentage of couple protection rate by any modern method at the state level, it has been seen to remain more or less same. At the national level, the percentage is comparatively high and it has increased from 42.5 in 1998-99 to 45.7 in 2002 -04. In Darrang, the percentage of CPR by any modern method has been observed to increase from 29.2 percent in DLHS-1 to 38.9 percent in DLHS-2.

The percentage of unmet need of family planning is estimated least at the district level i.e. 12.6 for the period 2003-04. But, a sudden fall in the percentage of unmet need in Darrang i.e. from 52.2 percent to 12.6 percent (within the 5 years period, between DLHS-1 and DLHS-2), is quite rapid and has to be analysed with socio-economic and demographic factors of the empirical study of the present work. In fact, the decline of unmet need

by 39.6 percent is not matched with the percentage of increase in the use of contraceptive and the mean number of children born to couples from different communities of the district in the year (Table1.28).

Table-1.26

Percentage of Female Sterilization to the Total Sterilization, India, Assam and Darrang, 2004 -05

Country / State / District	% of Tubectomy to Total Sterilization	
	2004 - 06	2005 -06
India	97.2	96.5
Assam	99.1	99.7
Darrang	100.0	100.0

Source: Family Welfare Statistics in India, 2006; and District Family Welfare Bureau, Darrang, 2007.

A larger percentage of female sterilization (Tubectomy) has been observed in comparison to the male sterilization at all the three levels, national, state (Assam) and district (Darrang). In Darrang ,the percentage of Tubectomy (as female sterilization) to total sterilization has been 100 percent in Assam, it has been 99.1 percent and at national level it is more than 96 percent during the year 2002 -04 and 2005-06.

Table-1.27

Family Planning Acceptance, Char-Chapari and Main Land, Darrang, 2007.

	Family Planning Acceptance.
Char	11%
Main Land (Darrang)	56.5%

Source: - District Family Welfare Bureau, Darrang, District, 2007.

The percentage of Family planning acceptance among the main

land people and Char [©] inhabiting people in Darrang has been observed to

vary widely. The Reports of NFHS I, II and III and the Reports of DLHS I and

II do not provide us any detail information on the use of contraceptive by the

Char inhibiting people in Assam and Darrang in particular. However the data

of District Family Welfare Bureau, Darrang, 2007 (shown in Table-1.27)

shows the family planning acceptance level of the people of Char Chapari

(11 percent), which is quite negligible as compared to the acceptance level of

the people of the main land (56.5 percent).

Table -1.28

Mean Number of Children Ever Born by Caste and Religion, Darrang, 2002.

Community	Mean number of children ever born
Hindu	2.6
Muslim	3.3
Christian	2.5
SC	3.1
ST	2.6
Other Backward Classes	2.5

Source: DLHS-RCH, Darrang, 2002.

An examination of the mean number of children ever born to

women within the age group (15-49 years), shown in the Table-1.28, exhibits

a wide range of disparity with respect to caste and religion in the district.

[©]A sandy track of land lying at the middle of a river or adjacent to the river bank caused by continuous process of erosion of land and accumulation of sand and other solid materials, is called Char. Those lands are generally viable for agriculture and habitation.

It has been observed that the mean number of children ever born to Hindu women is 2.6, Muslim women is 3.3 and Christian women (2.5). The differential mean number of children ever born to women by caste i.e. SC women is 3.1, ST women is 2.6 and women in other backward class is 2.5.

1.8 BACKGROUND OF THE PRESENT STUDY:

From the above analysis, it is observed that the practice of family planning and the use of contraceptive are not uniform over the districts in Assam. It differs from district to district and community to community. In other words, depending on the socio–economic and demographic background, every district and people from different communities, exhibit a distinct choice of contraception to limit the size of their families. Darrang is one of the districts in Assam which has diverse demographic pattern of population – Schedule Caste (4.95 percent), Schedule Tribe (17.3 percent), and Char population (9.46 percent), as shown in Table-3.1 and Hindu population constitutes 57.74 and Muslim 35.54 (Census, 2001).

Darrang is also marked as one of the districts with poor socio-economic indicators (22nd in HDI rank with HDI index 0.407 and 18th in GDI rank with GDI index 0.537) in Assam (Table-1.16). Total Fertility Rate of the district (3.4) has been estimated higher than the state average (shown in Table-1.20).The mean number of children even born to women within 15 – 49 age group, is considerably high and it even differs widely among the different communities with respect to religion, caste, tribe and culture (Table-1.28). On the other hand, the use of contraceptive (any modern method) by the married

couples in the district though has been recorded higher than that of the state average by DLHS 2 (Table-1.26), the wide gap of acceptance of family planning between main land people (56.5 percent) and the Char people (11 percent) as reported by the District Family Welfare Bureau, Darrang, 2007 (shown in Table-1.27), gives us a space for an in-depth study of the pattern and extent of family planning practices by the couples from different communities with their distinguished socio-economic and demographic background in Darrang.

1.9 OBJECTIVES OF THE PRESENT STUDY:

Keeping in view the above background, the present research work intends to undertake a socio-economic and demographic study of the currently married women using contraceptive in the undivided Darrang district in Assam. The proposed study has been carried out, especially with respect to their socio-economic status and the sex composition of the living children and their impact on the use of contraceptive. The main objectives of the study are –

1) To investigate the socio-economic and demographic factors affecting the acceptance of contraceptive among the currently married women in the district.

2) To make a comparative study of the practice of family planning as between different communities of the district such as Bodo, non tribal population and people inhabiting the Char areas.

3) To estimate unmet need for contraceptive use in the district.

69

4) To analyse whether spacing of birth has received equal importance as sterilization, especially in the rural areas.

In Assam, several studies have been carried out by many social scientists on fertility, but no such study, especially on contraceptive use of the Char women and Bodo women, has been carried out. So far the district level study made by DLHS Report though provided us the data on reproductive and child health by caste (SC, ST, Muslims and General Caste Hindu) but did not made any study on the reproductive health of the women in the Char area. These are the prime rationales, which inspired me to undertake the present work on this vital field.

1.10 UNIVERSE OF THE STUDY:

Multiple pregnancies are often held responsible for high maternal mortality and poor reproductive health of women in developing countries like India. Each pregnancy increases the chance of dying from complications of pregnancy or child birth. One third of the deaths related to pregnancy and child births could be avoided if all women had access to contraception (World Report Fact Sheet, 2007). According to the Report, though the worldwide use of modern contraceptive including voluntary sterilization has increased to 65 percent in 2007, yet millions of unsafe abortions are being carried out each year in each developing country, which can be avoided if there had been universal access to contraception.

In India, 8 percent of maternal deaths occur due to abortions and the percentage is highest (29 percent) in the age group of 20-24 years. In

Assam, the percentage of maternal mortality rate (490) is considerably higher than the national average 301 (Report SRS, 2000-03). Moreover, the non-availability of family planning services in the rural area leaves no option for the women but to take recourse to unsafe abortions. This causes high maternal mortality, poor reproductive health and high infant mortality in the state.

Since the focus of the study is to examine the socio-economic and demographic characteristics of the currently married women (15-49 years) using contraceptive it is felt appropriate to choose an area that consists of variety groups of population with regard to caste (tribal and non-tribal), religion (Hindu and Muslim). For this purpose, the undivided Darrang district is chosen which includes the Udalguri district, which at present, is separated after the creation of BTAD area in 2003 (vide govt. notification no. GAG (B) 137/2002/Pt./526 dated 14/05/04). Although the percentage of ST and SC population and of Hindu and Muslim population are widely distributed over the districts of Assam, the selection of Darrang district for our study can be traced to a number of factors. Prime factor is that the district has a considerable variety of percentages of population of ST (16.61), SC (4.55) and Char inhabitants (9.46), shown in Table-1.15. According to the Census 2001, the district has121 Char and about 1.66108 lac of total Char population where the district health services have least coverage. As a result, most of the time, people in this area remain unserved and untouched from obtaining basic necessary services (Report District Family Welfare Bureau, 2007). The district also shows a wide range of disparities between the main land people

71

and the Char inhabitants, regarding the acceptance of family planning (Table-1.27). The district also recorded high maternal mortality rate 490 and high infant mortality rate 68 (SRS, 2000-03). Disparity regarding the fertility behaviour among tribal and non-tribal people and people of different religions has been observed (Table-1.28).

1.11 HYPOTHESES:

In relation to the above objectives following hypothesis are taken up for the study. They are –

1) The educational level of women and the sex composition of living children are the most important factors influencing the choice of contraception in the un – divided Darrang district, however, son preference is less pronounced in case of tribal community .

2) The traditional methods of contraception still hold sway in the rural areas, in spite of the government stress on modern method of contraception.

3) The over emphasis on sterilization as a method of limiting family size is still prevalent among majority of the women of the district who opt for it only after the birth of three or more children.

1.12 METHODOLOGY:

The analytical part of the present study has been carried out in two parts. The first part includes the tabulation of the percentage distribution of currently married women with at least one living child (ST, SC, General Caste Hindu and Muslim and Char women), currently using modern contraception

(terminal and spacing) by the demographic and socio-economic characteristics. The set of socio-economic characteristics includes respondent's education, husband's education, family property and husband-wife discussion, exposure to family planning messages in mass media and the motivational factors. On the other hand, the set of demographic variables includes current age of respondents, number of living children, number of living sons, number of living daughters, child loss, and place of residence, etc. As the tabular analysis cannot show us clearly the quantitative impact of various variables on contraceptive use, a popular technique viz. the binary logit regression has been selected. The binary logit regression also helped us in comparing the effects of different variables that have been considered in the study. We have used three binary logit regression equations separately for three categories of current users i.e. the total users of modern contraceptive, users of sterilization and the users of modern spacing method. Two categories for response variables (the current users) in the binary logit regression were 'yes' coded with 1 and 'no' coded with 0.

Second, for the analysis of unmet need in our sample study, respondents are categorized by the unmet need for limiting and unmet need for spacing. For a detailed analysis of the reasons of not using contraception, women with total unmet need are again categorized into three reason components for not using contraception viz. wants for children at later date, social inconvenience and private inconvenience. Finally, a cross table analysis has been done to examine the effects of socio-economic and demographic variables on the three-reason components of unmet need.

1.13 DATA SOURCE:

Both primary and secondary data were used in our study. For the collection of the primary data, a pre-coded questionnaire schedule was prepared and data were collected by sample survey (in the six blocks viz. Pub Mangaldoi, Pachim Mangaldoi, Sipajhar, Dalgaon-Sialmari, Udalguri and Khoirabari and four towns (viz. Mangaldoi, Kharupetia, Udalguri and Tangla) wherein the questionnaires were filled up through direct personal interview with the respondents. The interview schedule had three sections. Section-I contained the questions that were designed to collect the data on socio-economic backgrounds of the respondents. Questions concerning the reproductive behaviour like actual size of the family, desired size of the family, number of living sons, daughters, and knowledge and choice of contraception etc are included in the Section-II. In Section-III, we asked the questions related to the decisions regarding the fertility and choice of contraception (Appendix).

Since Assamese is the common language to interact with all sections of the women in the district, the interview was conducted in the Assamese language. Moreover, for the field study, we have trained the local women associated with the Mahila Samity, Self Help Group and women associated with different social activities, to form a team of four female members including myself (2 well qualified and 1 from the local area) to interview the women in the locality. This helped us to overcome the probable hurdles to approach the respondents and it paved the way to smooth access to the women (particularly in the Char and tribal area) and thereby to tap the

74

sources of information to furnish our data. Utmost care was taken not to distort the meaning of the question.

On the other hand, in case of the use of secondary data, the published data of Central and State's Health and Welfare Ministry like, the Reports of Family Welfare Statistics in India, Annual Reports of Ministry of Health and Welfare, Director of Health Service (FW) Assam, District Family Welfare Bureau, Darrang, NFHS Reports, DLHS Reports etc. were used. Moreover, the published reports of the Government of India and the State like, Reports of Registrar General India, Census of India as well as State of Assam, SRS Bulletin, Statistical Hand Book of Assam etc. were also consulted in the present study.

1.14. REVIEW OF LITERATURE:

A number of studies have been carried out in India and abroad that threw light on the various factors that influence the choice of a particular type of family planning and fertility behaviour of the couple. Some of the studies have shown that the social and cultural factors are of prime importance while, the others have emphasised the economic factors. As it is not possible to review all the works because of the vastness of the literature, a brief review of the selected literature on family planning and fertility behaviour have been enlisted here.

Fertility is a multi dimensional outcome of all socio-economic and cultural norms and practice of couples which is reflected in their biological reproductive behaviour (Mahadevan and Sumangalam, 1987). The literature

on fertility can be categorised broadly into two broad spectrums. One deals with the socio-economic factors, while the other deals with the socio-cultural factors determining the reproductive behaviour of the couples.

According to some population scientists, it is the socio-economic aspects, which ultimately determine the tastes and preferences of the people and the social status. According, to them 'development is the best contraceptive'. Better socio-economic infrastructure promotes easy access to knowledge and skills, enhances the social status and aspiration of life of the people irrespective of caste tribe and religion. But according to the other group of population scientists, people's tastes and preferences differ even within the same socio-economic stratum. The culture or the setting to which a women belongs has been considered as the most influential determinant of fertility. It is argued that at a general level, the degree of adherence to cultural norms and values play an important role in explaining the fertility preferences in many developing countries. The unilineal (either patrilineal or matrilineal) kinship descent and ethnicity generate strong cultural motives for high fertility (Lorimer et al., 1954; Freedman, 1975; Goldberg, 1976). Ethnic plurality has been considered as a pro-natalist force in a society and often proved as a hurdle to the persuasion of an effective population control programme (Choudhury, 1982). 'Minority Status hypothesis' examines the fertility behaviour of the minority group from a different angle. According to this hypothesis population belonging to the minority group encourage larger family norm to compete with the majority population (Goldscheider and Uhlenberg, 1969; Day, 1984). Hence, in a pluralistic society like Sri Lanka,

differential provisions in family planning services for different ethnic groups became a common practice. But, recently a declining trend of such extreme differences has been observed (Wijetunga, 1974). However, the causes of ethnic differential in contraceptive use can be explained in four ways. First, the socio-economic and structural hypothesis i.e. ethnic differential in contraceptive use arises because of the different social positions of each group. Second is the cultural hypothesis, i.e. attitudes, values and customs are different in different ethnic groups. Third is the minority status hypothesis i.e. the minority groups want to preserve themselves or prove their power over the majority groups. In other words the people belonging to the minority group support pro-natalist view and discard the use of contraception if socio-political mobility of the minority is poor (Berelson,1978; Goldscheider and Uhlengberg, 1969). Fourth is the family planning service hypothesis i.e. the multilingual barrier or ethnic discrimination with respect to the distribution of family planning services etc (Murthy and De Vos, 1984).

Religion has been one of the oldest socio-cultural characteristics associated with the mankind and human civilization. It has become a worldwide institution and has been one of the most powerful factors that disciplines and controls human society (Moulasha, 2000). A strong inverse relation has also been observed between religiosity and use of contraception and a positive relationship between religiosity and fertility among cross sections of women in Dacca city (Chaudhury, 1976). The relationship holds true even after allowance is made for the effect of other socio-economic variables. It means that religiosity has an independent effect on fertility

behaviour over and above one's socio-economic status (Simontish, 1952 Westoff et al., 1963). But, the differential fertility and contraceptive practices among the religious groups are largely due to differences in socio-economic status such as education, income, health and variation in cultural practices. When the variables are controlled religion per se may not be an important determinant of fertility. The higher fertility of Muslim is found to be associated with less economic activity and the scant education of Muslim women. (Hanna and Nadarajah, 1975; Omran, 1992).

Recent studies have considered socio-economic and demographic variables, other than the cultural factors, as the influential factors in determining the reproductive behaviour of the couple. Chaudhury (1982) has explained five major mechanisms by which a fall in infant fertility may affect the level of fertility – (i) biological effect (involuntary effect i.e. reduction in the period of Lactation amenorrhea), (ii) replacement effect (increase in the child survival ratio), (iii) insurance effect (gained confidence about the probability of survival of child), (iv) societal and community effect (break down of the social and traditional belief associated with high infant mortality) and (v) effect of increased dependency ratio (i.e. reduction in infant mortality resulting a larger number of children which will lead to an increase in economic burden). Thus, the declining child mortality leads to a decrease in the fertility level and the dependency ratio. But, complicacy may arise regarding the certain number of living children that the parents desire to have (Schultz 1969; 1976a; 1976b). This followed the concept of 'economics of fertility' or the demand theory of fertility (Leibenstein, 1974, 1975). According

to Leibenstien the decisions of parents regarding the number of children are determined by the marginal utility of child.

T.W. Schultz (1974) – has treated child as both a produced (investment) and consumer goods. He has analyzed that fertility is a rational economic choice within the household and child services are consumed by household. But, the paradox of inferior good arises in case of children as the higher income groups generally have fewer children. Esterline (1975) has resolved the paradox by formulating a generalized model for fertility decision of the couples. According to him, a woman varies her childbearing in order to optimize her household's utility. A number of factors affect her decision. They are income from children, cost of raring children, opportunity cost of mothers time spent on childbearing exclusive of other income generating activities, cost of education on children, cost of regulation of fertility such as cost of availing the information regarding fertility regulation and social cost like loss of prestige and parental disfavour etc. But, the demand theory of fertility was rejected on the ground that it neglected the supply side i.e. biological factors and the other socio-cultural factors such as socio-economic status and tastes which had an independent role in influencing the people's decision making regarding fertility. Moreover, the demand theory of fertility does not have any explanation in certain cases such as in case of extramarital fertility or premarital fertility(Jones, 1977).

Differential reproductive behaviour can also be observed among the couples with respect to caste, tribe and religion and also with respect to

the place of residence. The rural – urban differences in level of the fertility preferences arises mainly because of the differential economic cost of rearing children and so forth the derived economic benefits from children. The cost of rearing children is higher in the nuclear urban families than that of in the extended rural families. Moreover, the rural couples are comparatively more dependent on their children for old age security because of lack of access to institutionalised welfare services that may be available to the urban couple (Choudhury, 1982). Other critical variables associated with lower fertility among urban women are perception and approval of non-domestic role for women which are correlated to education (Hass, 1974; Cocharane, 1979). Female education also works in two ways: first, it reduces the duration of exposure to conception (assumed most conception is within marriage) by delaying age of entry into marriage and second, it increases marriage disruption (Cocharane, 1979). Beside this, female education empowers a woman to exert her right in society and family. This enhances the socio-economic status of women, helps capacity building and decision-making capacity including reproductive decision of women. Female education, thus, ensures an approach towards an egalitarian relationship between sexes. The greater the egalitarian relationship between sexes, the more the weight is given to wife's health and wellbeing. This ensures the greater participation of wives in the process of fertility decision-making (Mansion, 1984).

A brief review of the literature on fertility transitions place in the developed countries and the present fertility trend in those countries showed that the demographic transition in Europe during the early 20th century

particularly, in northern and western Europe, were mainly due to social modernization, urbanization and industrialization which all together embraced a whole complex of fundamental changes in society related to rising standards of material well being of the mass (Kirk,1975 ;1980) . Besides a strong motivation for small family norm, higher status of women, enjoyment of full freedom of choice with men regarding fertility behaviour were the main factors responsible for the fertility transition in Europe (Glass, 1976). Among the developed countries, Ireland has been demographically remarkable with the highest fertility rate in the Western Europe, the lowest marriage rate, the lowest rate of use of contraception (Kirk, 1975, 1980). However, the practice of celibacy and late marriage in traditional Irish society (due to economic and /or sociological reasons) kept the population of Ireland within its available resources (Honhan, 1960). The long term decline in fertility in America occurred in association with the urban transformation, led to socio-economic transformation such as transformation from agrarian society to non-agrarian society, trend toward secularization, wide spread education, a shift in ethnic and sex composition due to immigration along with greater internal mobility of population. These all together led to an improvement in the level of living and so to an extension of the average length of time (Westoff, 1977).

In Japan the postponement of marriage was one the mechanism through which Japanese fought against the sustained natural increase which mainly arose from a drastic fall in mortality. (Davis, 1963; Henry and Phyllis, 1979).

In contrast to the developed countries a high fertility trend has been observed in most of the Middle East countries which was the outcome of their socio-cultural and religious beliefs. Encouragements of early marriage by Islamic teachers, high values ascribed to female chastity, low status of women were the main factors that discouraged the use of contraception. However, in some Islamic countries like Tunisia, a decline in fertility among the young women was also observed. This was due to the rise in the age at marriage and wide practice of birth control methods especially in cities in Tunisia. (Henry and Phyllis, 1979)

However, fertility transition had already occurred in a number of countries in Asia. Among them, Sri Lanka, Kerala in India, Thailand and China and Indonesia have experienced fertility decline with limited development. Transitions that took place in Sri Lanka, Kerala and China were mainly because of a number of factors. First, extended better health facilities increased the life expectancy and survival ratio of children. Second, higher aspiration of parents for children education increased the cost of rearing children. Third, welfare institutions provided minimum subsistence for masses which decreased the dependence on children. Fourth, the improved communication and transportation facilities led to an easy access to information, knowledge and services. Same study has also observed that the LDCs with little change in fertility such as Pakistan, Bangladesh and Zaire lacked modern communication and transportation. Other socio-economic determinants such as lower status of women in Muslim society counted as the prime responsible determinant of such slow decline in fertility. In

82

Thailand where development is only at a moderate level and contraceptive use is rising rapidly, the decline in fertility as has been experienced is due to the higher status of Thai Women. Thai women's rate of participation in labour force, in social and economic affairs is considerably high. Thai society shows no son preference of parents. A striking contrast has been observed in case of Taiwanese societies regarding fertility regulation with the tradition of strong son preference. The Taiwanese society has a high aspiration for higher education for children. As a result the cost of rearing children influences the fertility behaviours of the couples. But all of this appears to operate along with traditional family values, which are changing slowly but are still very different from western ones (Freedman,1979). Recently, the adoption of free trade policy by the Thai government to encourage the foreign investment and multinational companies, the expansion of job markets for the young women, expanded market for contraception have resulted in an increased use of contraception amongst the women in Thailand.

A comparative study made by Cain (1984) in some poor agricultural villages in Bangladesh and Southern India shows a greater dependence of the elderly upon their children for old age support and female's dependence on male counterparts. This is because woman   in Bangladesh has no access to cash agriculture and other important activities which would permit her access to land and property. The   socio-economic status of women is very poor in Bangladesh. This causes strong son preference of women in Bangladesh as sons are more profitable for them. In

I

other words, high fertility is more profitable for women in Bangladesh than the women in Indian village.

It has also been observed that despite the overall success of a family planning programme in Indonesia, cultural and religious values impose a major barrier for family planning practices. Most Indonesian are Muslim and hold traditional cultural values. Both Islamic culture and traditions support the husband's approval for the use of contraception and a considerable number of women did not use contraception because of husband's disapproval (War and Donald, 1986; Josef, Baughman and Utomo, 1988).

In Nepal, short birth intervals are common, with one in four births occurring within 24 months of a previous birth. Unplanned and unwanted births are often associated with increased mortality risk. Knowledge of family planning is virtually universal. The recent contraceptive prevalence rate among currently married women has increased. The level of current use is nearly twice as high in urban areas (50 percent) as in rural areas (27 percent). Educational differences in current use are large. Women who have completed school leaving certificate use contraceptive (modern spacing methods) more than that of the women with no education (Report of Nepal Family Health Survey, 1996)

In Pakistan, the traditional social-structure supports a natural fertility pattern in which the majority of women do not use any means of fertility regulation. The educational level attained by the Pakistani women remains very low; majority of them do not have formal education. As such,

son preference is also very high even among the currently married women. In Pakistan, infant mortality rate is also high. Another observation of the report is that although a majority of husbands are not in favour of family planning but wives are more likely to favour family planning than their husbands are. (Demographic and Health Survey, Pakistan, 1990-91).

In India, many studies showed that the socio cultural factors are more influential in determining the reproductive behaviour and use of contraceptives by couples. The minority status of the Muslim and traditional socio-cultural beliefs are the key factors for the rapidly escalating Muslim population in India (Sinha, 1991).

In contrast, a comparative study made by Srinivas (1995) of fertility transition in three states –Tamil Nadu, Goa and Kerala has shown that different socio –economic variables are responsible for the successful implementation of family planning at the state level. It is the political will and efficient bureaucracy in Tamil Nadu that seems to have played a crucial role in fertility transition by overcoming the intrinsic cultural barriers imposed by low literacy level, relatively higher mortality, low standard of living and high heterogeneity of population. Whereas in Goa, a favourable social background such as higher status of women, low infant mortality, fair literacy rate are the factors behind the fertility decline, a long standing practice of contraceptive use by the Goan population even before the commencement of the official family programme in 1961, (after its integration with Indian Union), helped to accelerate the fertility decline in the state. On the other hand, Kerala with

strong socio-economic background such as, higher status of women, fairly high literacy level (both male and female) could not curve the fertility successfully till early 1970's when well organized family planning programme with efficient management were implemented. On the other hand, besides poverty, poor management like a poor communication network and lack of a proper infrastructure have also made programme implementation difficult in some other states like Bihar and some south Indian villages. Beside this, poor training of the grassroots workers, over emphasis on achieving materialistic approach, lack of follow up services before and after adoption of a method because of poor supervision, negligence of duties of grassroots workers etc have been counted as the major obstacles to the successful implementation of the programme (Dharmalingam, 1995; Malliek, 2003-04).

A number of studies in India have shown that female education has a positive impact on family planning practices. Education imparts new ideas and raises aspirations for life of a woman. Moreover, education imparts knowledge and skills, which help a woman to accept family planning for better aspiration of life (Kaur, 1976; Kurup, 1984; Khan and Gupta, 1985; Thangdari, 1987; Kumar, 1988; Sundar 1990; Dwivedi, 1992; Doshi, Desai and Velhal, 2006). Education of women along with occupational mobility of the people exerts tremendous effect on promoting favourable attitude to family planning irrespective of caste (Reddy, 1984). It has also been argued that the educational effect on the level of contraceptive use is weak at the community level than that of at the individual level (Roy et al., 1991). But education does not have a direct impact on the level of contraceptive use. It

86

works indirectly through the modern value acquired by education or due to the association of socio-economic factors with a high level of women's education. But, the effect of education in rural areas is not significant as it is in urban areas. This is because in rural milieu modern ideas and values have not permeated. On the other hand the modern attitudes and ideas of urban areas are more conducive for the acceptance of family planning by a less educated women (Srikantan, et.al., 1988; Srikant, Mulay and Radker, 1992). But other studies have also observed that education has a positive impact on the acceptability of the programme irrespective of caste, religion and status (Chaudhury, 1979; Srivastava, 1989). It has also been observed that in rural areas, caste and religion play an important role in the acceptance of family planning (Reddy, 1984). But, other studies reveal a more complex relationship between the caste and use of contraception. Acceptability of family planning is high in case of an advanced caste. On the other hand, a relationship specific to area and caste in Orissa, showed that the level of acceptance of contraception is more pronounced in case of schedule caste and schedule tribe than the advanced caste. Another observation regarding family planning acceptance shows that female education up to primary level and with proper check on dropout rates from school helps in the long run to reduce fertility (Sundar, 1990). Differential fertility has also been observed with educational status of wives. It is lower in case of literate women. Differential fertility with respect to the educational status of women is comparatively less pronounced in urban areas (Vaidyanathan,1988). Surveys in different parts of the countries show that reduction in fertility with

increasing educational status of women and has particularly been marked with ten years of schooling (WHO, 1972; Jolly, 1981). Professor, Ashis Bose, (1994) has, thus, advocated the promotion of female literacy rate as the first step, schooling up to high school or at least middle school as the second step and providing the basic needs to the common people as third step for successful implementation of Family Welfare programmes in India. According to him, Family welfare programmes should not be confined to female sterilization only. It should also include female literacy in its agenda.

A general observation of the acceptance of family planning among all castes and all educational groups is the desired number of son or the sex composition of the children in India. The desire for son among the Indian couples is a deep-rooted cultural factor and there is no indication of it weakening in near future (Srikantan and Bhate, 1989; Arnold et. al., 2002; Arnold, 2001; Basu, 1993).Professor Bose has coined a term "Demographic Fundamentalism" to describe the pervasive and persistent bias for sons all over India except in Kerala and among some tribal communities in Orissa and the North East (Bose, 1994). In every state in India, women with two sons are more likely to use contraceptive than the women with two daughters (Vaidyanathan,1988; Report, NFHS-3, 2005-06). Rajasthan stands out as having very strong son preference. Haryana and Madhya Pradesh also show a strong son preference. It is moderately strong in all the states of northern states, central and eastern states of India. Son preference is comparatively weak but still substantial in western and southern India as well as in Assam (National Family Health Survey Subject Report No. 3). Thus, studies in India

have identified mainly three major factors responsible for son-preference in India. First, the economic utility of son like, son is looked upon as the source of income, assistant in agriculture production, premium expected to be earned in the form of dowry by having son and above all, as an old age support. Second, the socio-cultural utility of having son are for continuation of family line, family status and the utility of sons in performing ritual duties or performing the religious functions at the time of funeral pyre of the parents are most common (Karve, 1965; Kapadia, 1996; Miller, 1981; Dyson and Moore 1983; Bardhan, 1988; Basu, 1989; Caldwell, Reddy and Caldwell, 1989 and Mallick, 2003-04). In Bihar and Rajasthan, the number of surviving sons has the largest influence on the use of contraception followed by the education of wife (Kanitkar and Murthy, 1983). Recent studies have shown that the desire for son has become more and more pronounced even among the urban educated couple with the availability of sex selective abortion. This has been observed in the increased preference for smaller family with higher rate of contraceptive use. (Das, 1987). Indian couple with fewer sons are more likely to continue having children or want to have children and less likely to use contraception and they have shorter birth intervals (Das Gupta, 1987; Bairagi and Bhattacharya, 1989; Nath and Land 1994; Mutharayappa, Choe, Arnold and Roy, 1997; Raju and Bhatt 1995). Hence, the preference for a particular sex of the children has been one of the main causes of higher fertility in India. Studies based on NFHS 1992-93 data showed that the sex-preference increases the total national fertility in India by 8.4 percent (Arnold, 1997; Mutharayappa, Choe and Fred, 1997; IIPS Report, 1997).

In demographic literature, there are many studies on women's autonomy and level of family planning acceptance. Regional variations in women's status and autonomy can be observed in India. As a result, regional variation in fertility has also been observed as one moves from Northern states to Southern states and from western states to the eastern states in India (Dyson, Tim, Mick and Moore, 1983). Most of the studies show that women's autonomy has a negative impact on fertility preference and a positive impact on the level of contraceptive use. A women enjoying higher socio-economic status has freedom of choice and access to resources and thus is empowered to take active part in the decision making process in all spheres of life including fertility regulation such as, spacing of number of children or avoiding unwanted pregnancies and accordingly, the use of contraception (Lakshamamma and Reddy, 1991). Women's autonomy attached to the education of women, along with occupational mobility, exerts tremendous effect on promoting favourable attitude to family planning irrespective of caste (Reddy, 1984). Women involved in white colour jobs or clerical jobs generally have fewer children than the women engaged in manual works (Vaidyanahtan, 1988). A survey report shows that the female immigrant of Delhi who are engaged in domestic work even with less or no education have a less desire for larger number of children because of high opportunity cost of rearing children. The motivation for small family of such women took place through three ways - a) greater incompatibility between job and child bearing; b) greater exposure to the benefit of small family; c) greater effectiveness in achieving a small family (Sundar,1990). Woman

enjoys higher status and autonomy as one moves from high to less gender stratified society. The more the gender stratification, the lesser the space for inter spousal communication and women's participation in the choice of contraception. Moreover, unequal relationship between husband and wife discourages the use of contraception (Dharmalingam, 1995). A recent study in this field has explored the extent to which gender stratification or social set up (matriarchal or patriarchal) influences agreement between spouses and their use of birth control (Basu,1992; Cain,1993). Gender stratification however, appears to influence the husband's and wife's say in determining the contraceptive use. But, so far the unmet need for contraception of a woman is concerned, husbands preference for fertility over wives unmet need is less significant in the community where the use of contraception is low (Mason and Smith, 2000). Another study (Sing, Faujdar and Ranjan, 2007) shows that preference for daughter in a matrilineal society like Meghalaya and preference for son in Manipur has been one of prime causes of their higher fertility. But, women in Meghalaya have higher involvement in reproductive decision making than in Manipur. Thus, husband= wife contraceptive intension in Manipur is highly influenced by the fertility preference of the husband while in Meghalaya it is highly influenced by the fertility preference of wives.

Women often do not prefer the use of contraception because of many reasons. Programme related or method related reasons have been found to be most common. Method failure has been the major reason for discontinuation of the use of contraception amongst the nonusers. It is found

91

that 38 percent of currently married women (aged 13-49 years) who discontinued using contraception did so because of a method-related problem or method failure in India. The proportion of women who discontinued the use of contraceptives because of a method-related problem or method failure to the total discontinued users ranges widely – from 11 percent in Meghalaya to 94 percent in Nagaland. The result has not been found to vary widely across the socio-economic and demographic groups of population either within individual states or within India as a whole ad it is not found to have higher correlation with the state level fertility (NFHS Subject Report, No.13, 1999). According to the Report the proportion of women reporting opposition to family planning (9 percent) is lower than the proportion of women reporting method related or method failure reasons for not intending to use contraception (15 percent) in India. But, the proportion reporting opposition to family planning is however, found to be higher amongst the Muslim women than amongst Hindu women or women of other religion.

A district level study has been made by RCH-RHS 2002. The report of the study shows that the contraceptive prevalence rate (CPR) to any method in Darrang district is 69 percent of which 30 percent are using modern method and 18 percent are using traditional methods. Female sterilization is higher compared to male sterilization. The acceptance of both male and female sterilization between ST and SC are higher compared to other caste groups. In urban areas, use of modern method is comparatively higher than that in the rural areas. The use of contraception is higher among

92

the couples with higher level of education and standard of living and where the government facilities are available. The couples within the age group of 15-19 years ever using any family planning method is 27 percent which is well below that of the couples in the age group of 40-44 years (85 percent). However, the proportion of women accepting a method with no living daughter is higher (54 percent) than the women with no living son (41 percent). This shows the existence of son preference in the district. (DLHS survey, 2002, Darrang).

1.15 PLAN OF THE STUDY:

There are altogether eight chapters including the present introductory one as mentioned below-

CHAPTER - 1   INTRODUCTION.

CHAPTER - 2   PROFILE OF THE STUDY AND SOCIO-ECONOMIC AND DEMOGRAPHIC BACKGROUND OF THE RESPONDENTS.

CHAPTER - 3   A COMPARATIVE STUDY AMONG TRIBAL, NON-TRIBAL AND CHAR INHABITING RESPONDENTS.

CHARTER- 4   RURAL-URBAN DIFFERENTIALS IN ACCEPTANCE OF CONTRACEPTION.

CHAPTER - 5   CHOICE BETWEEN TERMINAL AND SPACING METHOD AMONG THE RESPONDENTS.

CHAPTER - 6   UNMET NEED FOR CONTRACEPTION.

CHAPTER - 7   BINARY LOGIT REGRESSION ANALYSIS OF THE DETERMINATS OF TERMINAL, SPACING AND TOTAL USE OF CONTRACEPTION.

CHAPTER - 8   SUMMARY OF FINDINGS AND CONCLUSION.

.

****

94

CHAPTER 2

PROFILE OF THE STUDY AND SOCIO-ECONOMIC AND DEMOGRAPHIC BACKGROUND OF THE RESPONDENTS

PROFILE OF UNDIVIDED DARRANG DISTRICT

2.1.1 INTRODUCTION:

Darrang is considered as the oldest district of Assam which came into being after the annexation of it by the British ruler in 1833. With the conversion of Darrang into a district, Mangaldoi was made the district Headquarter. But due to various reasons, the British shifted the head quarter to Tezpur in 1835. The district initially comprised of two sub-divisions - Tezpur sadar sub-division and Mangaldoi sub- division with head quarter at Mangaldoi. Thus, Darrang district, originally, included present Sonitpur district and Udalguri district.

Darrang was segregated twice. First it was segregated on the creation of present Sonitpur district in 1983 when Mangaldoi sub division was upgraded to a district, named as Darrang district and Tezpur sub division was upgraded to another district, named as Sonitpur district.

Darrang was further synchronised on creation of Udalguri district under BTAD area on 14/05/2004 (vide Govt. notification No. GAG (B) 137/2002/Pt/526 dated 14/05/04). However, our present work is related to the undivided Darrang district, Census 2001 and hence, includes the Udalguri district.

LOCATION:

The district is situated on the northern bank of the mighty river Brahmaputra extending from 26° 9' North to 26° 52 North latitude and 91° 45' East to 92° 22' East latitude in the state of Assam. At

present, Kamrup and Morigaon Districts bound the district on the South. On the North, the district is bounded by the states of Bhutan and Arunachal Pradesh and on the East, the district is bounded by Sonitpur District and on the West, by Kamrup District. The tributaries of Brahmaputa like Barnadee, Nanai, Nowanai, Mangaldoi nadee, Jia, Dhanashree, and Panchnai are flowing through the district. These rivers frequently cause flood in the district during the monsoon season.

The total area of the undivided Darrang is 3481 sq. km. (Census, 2001) and consists of 11 community development blocks and 155 Gaon Panchayats, 1341 villages and 4 notified towns, 30 tea estates and 121 char villages and 7 PHCs (Public Health Centres). The undivided Darrang district includes the Udalguri District, which at present, is separated after the creation of BTAD area in 2004.

POPULATION:

According to the Census 2001, the district has total population of 15, 04,320 out of the state population 2, 66, 55,528. The density of population is 432 per sq. km, which is higher than the state average 340 per sq.km. The sex ratio of the district (i.e. 944) is higher than the states average (i.e. 935). The literacy rate of the district (55.44 percent) is well below the state level (i.e. 63.25 percent). The Census, 2001 also shows that the percentage of urban population in the district is 4.06 percent, which is less than the state level i.e. 12.98 percent. This implies that the district is rural in character and the growth of urbanization is very slow in the district.

96

The main inhabitants of the undivided Darrang are the Assamese (Hindu and Muslim) and Bodo (Hindu and Christian) communities (Census, 1991). Bodo communities are mostly concentrated in the northern part of the undivided Darrang which at present falls in BTAD area. Bodo population constitutes 10.64 percent (approx) and the Assamese population constitutes 66.94 percent to the total population of Darrang (Census,1991). The other tribes like Deori, Hojai, Kochari, Sonowal, Lallung, Miri and Rabha are not significant in number. The other significant community is the Tea Tribe. They inhabit in the tea gardens and the surrounding areas of the tea gardens in the district. Most of the tea gardens are mainly concentrated in the northern part of the undivided Darrang (at present it is in the Udalguri District). The other significant community of the district is the Muslim population of religious minority who are the main inhabitants of the Char areas and low lying flood prone areas along the northern bank of Brahmaputra river (Report, District Family Welfare Bureau, Darrang, 2008). According to the report, the total population of the Char area is 1,66,108 (11.04 percent). According to the Census 2001, Hindu population constitutes 57.74 percent, Muslim 35.54 percent, Christian 6.47 percent, Scheduled Tribe 16.61 percent and Scheduled Caste 4.5 percent of the total population of Darrang.

The undivided Darrang has 2 Sub Divisions, 11 Development Blocks, namely Sipajhar, Khoirabari, Bhergaon, Pachim Mangaldoi, Kalaigaon, Pub-Mangaldoi, Dalgaon-Sialmari, Rowta, Mazbat, Udalguri, and 4 towns namely Mangaldoi Municipal Board, Tangla Town Committee,

Kharupetia Town Committee and Udalguri Town Committee. The district has 9 Revenue Circles, 155 Gaon Panchayats.

The occupational pattern of the people in the district is mainly agriculture. Women's participation in agriculture is comparatively less than the male counter parts (female 55896 and male 183676). The total number of main workers in the district is 404428 persons (male 343108 and female 61320). The district accounts for comparatively a larger proportions of female marginal workers (female 80253 and male 43312). Women in Darrang district are mostly engaged in house hold industry.

2.2 DETAILS OF THE SAMPLE COVERAGE:

A multi stage sample design has been chosen for the requirements of the present study. Due to the constraints of resources, it has been decided to keep the sample size at 700-750. This total sample size has been distributed near proportionately among the five selected groups of women in the district namely the ST (Bodo), the non ST (SC, General Caste Hindu, Muslim) and the Char women. The currently married women in the age group of 15-49 years, having at least one living child, has been chosen as the sample unit for the collection of data for the present study.

There are 11 blocks in Darrang district, comprising of a large number of villages in each block. But, it is not practically feasible to select all the villages. Moreover, all the villages of the district are not equally important with respect to the proportions of tribal, non-tribal and char inhabitants to the total population of the district. The present study, thus, is conducted by

stratified random sampling, with proportional representation of the tribal, non-tribal and Char population in the district. First, a purposive sample of 6 blocks is chosen. Among 6 selected blocks, 2 blocks are chosen from the tribal (Bodo) dominated area namely, Khoirabari Development Block and Udalguri Development Block, showing the percentage of ST population 62.9 and 65.2 percent respectively (Office of Deputy Commissioner, Darrang, 2006). Other two blocks are selected from the non-tribal dominated area i.e. Sipajhar Development Block and Pachim Mangaldoi Development Block with the percentage of non-tribal 99.13 and 97.71 respectively (Census, 1991) and the remaining two blocks namely the Pub Mangaldoi and Dalgaon-Sialmari Development Blocks are for the Char sample.

In the second stage, three villages are chosen from each selected block for the purpose of the study. Out of three villages chosen from each tribal (Bodo) dominated block, the first one was Bodo dominated, the second one was non-Bodo dominated and the third one was characterised by mixed population. On the other hand, out of three villages chosen from each selected block dominated by non-tribal population, first one was SC and General Caste Hindu dominated, second one was Muslim dominated and the third one contained mixed population.

In the next stage, the population of each village was stratified on caste / tribe i.e. ST (Bodo), non-ST i.e. SC, General Caste i.e. Hindu and Muslim. From each village, according to the principle of proportional allocation, a sample of the currently married women (15-49 years age group)

with at least one living child is drawn by simple random sampling method. Villages so chosen from the respective tribal and non-tribal dominated blocks based on Census 1991 village population list are-

Nalbari- ST dominated village (with 84.26 percent ST population, 3.82 percent SC and the rest general Caste population); Bekigaon- Non-ST dominated (with 21.35 percent ST, 26.22 percent SC, and the rest General Caste population) and Thane Udalguri- village having mixed population (with 48.94 percent ST, 5.31 percent SC and the rest General Caste population) from the Udalguri Development Block (Census, 1991).

Umananda - dominated by ST (with 66.25 percent ST, and the rest non-ST population), Sukuliapara-dominated by the Non-ST population (with 30.72 percent ST, 21.38 percent SC and the rest General Caste population) and Deuripara- characterised by mixed population (with 54.56 percent ST and the rest General Caste population) from the Khoirabari Development Block.

Bijulibari - dominated by SC and General Caste Hindu population (with 32.0 percent SC and the rest General Caste population), Maroi- dominated by Muslim population (with cent percent General Caste population) and Jayantipur- characterised by mixed population (with 17.19 percent ST and the rest General Caste population) from the Sipajhar Development Block.

Konwarpara - dominated by General Caste Hindu (with 9.79 percent SC population, 1.94 percent ST and the rest General Caste people); Manitari- dominated by Muslim (with cent percent General caste population) and Deonagaon- characterised by more or less mixed population (with 9.28 percent SC, 19.85 percent ST and the rest General Caste people) from the Pachim Mangaldoi Development Block.

On the other hand, we have drawn two samples for Char women from two selected blocks namely, Pub Mangaldoi and Dalgaon-Sialmari Development Blocks (characterised by homogenous group of population i.e. Muslim people) by simple random sampling method. From Pub Mangaldoi Development Block (comprising of 75 Char villages) a sample of 43 and from the Dalgaon-Sialmari Development Block (comprising of 23 Char villages) a sample of 25 currently married char women with at least one living child are drawn. Finally, a sample of altogether 426 currently married women with at least one living child is drawn from the six selected blocks.

In case of urban sample, a sample of 298 currently married women (15-49 years) is drawn. For urban sample, all the four towns-Mangaldoi, Tangla, Udalguri and Kharupetia have been selected. In the next stage, the population of each town is stratified on the basis of caste/tribe - ST, SC, General Caste i.e. Hindu and Muslim. And from each stratum, a sample of currently married women with at least one living child (15-49 years) is drawn with proportional allocation of population. Both rural and urban sample is based on the village and the ward lists of census 1991. Table-2.1.A

and Table-2.1.B provide a detailed picture of the entire sample population-village wise and town wise.

Table-2.1.A

Distribution of Total Sample: Block / Town

Development Blocks / Towns	ST (Bodo)	SC	General Caste Hindu	Muslim	Char	Total
Udalguri Dev. Block:						
Nalbari	32	2	5	=	=	39
Niz-Udalguri	6	5	12	--	--	23
Thana Udalguri	10	3	10	5	--	28
Total	**48**	**10**	**27**	**5**	**--**	**90**
Khoirabari Dev. Block:						
Umananda	30	5	5	--	--	40
Sukuliapara	7	6	12	--	--	25
Deuripara	12	-	10	5	--	27
Total	**49**	**11**	**27**	**5**		**92**
Sipajhar Dev. Block:						
Bijulibari	3	4	19	5	-	31
Maroi	--	--	5	18	-	23
Jayantipur	8	6	12	8	-	34
Total	**11**	**10**	**36**	**31**	**-**	**88**
Pachim Mangaldoi Dev. Block:						
Konwarpara	2	5	19	4	-	30
Manitari	-	-	4	23	-	27
Deonagaon	5	5	15	6	-	31
Total	**7**	**10**	**38**	**33**		**88**
Pub Mangaldoi Dev. Block	-	-	-	-	43	30
Dalgaon-Sialmari Dev. Block	-	-	-	-	25	38
Total Char sample	**-**	**-**	**-**	**-**	**68**	**68**
Total Rural Sample	**115**	**41**	**128**	**74**	**68**	**426**
Urban Sample:						
Mangaldoi Town	-	17	39	20	-	76
Kharupetia Town	-	20	41	12	-	73
Udalguri Town	15	14	43	--	-	72
Tangla Town	8	21	38	10	-	77
Total Urban Sample	**23**	**72**	**161**	**42**		**298**
Total Sample Size	**138**	**113**	**289**	**116**	**68**	**724**

Source: sample survey of the present study.

Table-2.1.B

Percentage Distribution of Total Sample: Block / Town

Development Blocks / Towns	ST (Bodo)	SC	General Caste Hindu	Muslim	Char	Total
Rural Sample						
Udalguri Dev. Block:	48 (53.3)	10 (11.1)	27 (30.0)	5 (5.2)	—	90 (100.0)
Khoirabari Dev. Block:	49 (53.3)	11 (12.0)	27 (29.3)	5 (5.4)	—	92 (100.0)
Sipajhar Dev. Block:	11 (12.0)	10 (11.4)	36 (40.9)	31 (35.2)	—	88 (100.0)
Pachim Mangaldoi Dev. Block:	7 (8.0)	10 (11.4)	38 (43.2)	33 (37.5)	—	88 (100.0)
Pub Mangaldoi Dev. Block:	–	–	–	–	30 (100.0)	30 (100.0)
Dalgaon-Sialmari Dev. Block:	–	–	–	–	38 (100.0)	38 (100.0)
Total	–	–	–	–	68 (100.0)	68 (100.0)
Total Rural Sample	115 (27.4)	41 (9.6)	128 (30.0)	74 (17.4)	68 (16.0)	426 (100.0)
Urban Sample						
Mangaldoi Town	–	17 (22.4)	39 (51.3)	20 (26.3)	–	76 (100.0)
Kharupetia Town	–	20 (27.4)	41 (56.2)	12 (15.8)	–	73 (100.0)
Udalguri Town	15 (20.8)	13 (18.1)	43 (59.7)	–	–	72 (100.0)
Tangla Town	8 (10.4)	21 (27.3)	38 (49.4)	10 (13.0)	–	77
Total Urban Sample	23 (7.7)	72 (24.2)	161 (54.0)	42 (14.1)	–	298 (100.0)
Total Sample Size	138 (19.1)	113 (15.6)	289 (39.9)	116 (16.0)	68 (9.4)	724 (100.0)

Note: figures in parentheses denote percentage.
Source: sample survey of the present study.

It is revealed from Table-2.1.A and 2.1.B that a total of 724 currently married women were interviewed for the present study. Out of 724 currently married women 19.15 percent are tribal women 15.6 percent are

SC, 16.1 percent are Muslim, 41.2 percent are General Caste Hindu and 9.4 percent are Char women.

Our urban and rural samples consist of 298 and 426 currently married women constituting 41.2 and 58.8 percent of the total sample size respectively.

Out of 426 currently married women in the rural sample 30.0 percent are General Caste Hindu, 27.0 percent are tribal - ST (Bodo) women, 17.4 percent are Muslim and 16.0 percent and 9.6 percent are SC, and Char women respectively.

The urban sample of 298 currently married women is comprised of 7.7 percent ST (Bodo), 24.2 percent SC, 54.0 percent General Caste Hindu and 14.1 percent Muslim women.

2.3 SOCIO-ECONOMIC BACKGROUND OF THE SELECTED DEVELOPMENT BLOCKS AND TOWNS:

DALGAON-SIALMARI DEVELOPMENT BLOCK:

Dalgaon-Sialmari Development Block occupies an area of 33061.31 square metres. The National Highway No. 52 lies on the North of the block and on the South and West of the block there lies the Pub-Mangaldai Development Block. The mighty river Brahmaputra is flowing on the South of the block. On the East of the block, there are Bechimari Development Block and Rajib Gandhi Sanctuary, Orang. On the North, there are Kalaigaon and Bechimari Development Blocks. There are 10 Gaon Panchayats and 95 villages including 35 Char villages under the block. Total population of the block are 1,46,171. SC population constitutes 1.42 percent

and ST constitutes 0.19 percent of the total population. 97 percent of the population are Muslim while 3 percent are Hindu. The block is known for the production of commercial crops and others agricultural productions. There are six Commercial Banks in the block. It is one of the socio-economically backward blocks in our present study. There are four Colleges and 9 High Schools and Higher Secondary Schools.

SIPAJHAR DEVELOPMENT BLOCK:

The block occupies an area of 48,371 square metres. Total population of the block is 1, 97, 224. SC population constitutes 3.7 percent, ST constitutes 0.5 percent and General Caste population constitutes 95.8 percent to the total block population. 69.9 percent of the total population are literate. The literacy rate of the block is 57.1 percent and female literacy rate is 42.9 percent. There are 25 Gaon Panchayts under the block. There are 64 High Schools around 7 provincialised Higher Secondary Schools and 4 Junior Colleges, 5 Senior College and 2 B.Ed. Colleges in the block. There are all total 9 PHCs and 48 sub centres under the block. Majority of the people are engaged in primary sector while a smaller fraction of the people is engaged in service sector and business.

PUB MANGALDOI DEVELOPMENT BLOCK:

Pub Mangaldoi Development Block is situated on the West of Dalgaon-Sialmari Development Block. There is Pachim Mangaldoi Development Block on the West and Udalguri Development Block on the North. On the South, there is Sipajhar Development Block. Total population of the block is 1,31,371. The proportions of SC and ST population are 7.04

percent and 0.96 percent respectively and the rest 92 are the General Caste. There are 11 Gaon Panchayats in the block. The literacy rate of the block is very poor (i.e. 24.29 percent). There are two colleges. The block has only one PHC. The main occupation of the people is cultivation.

PACHIM MANGALDOI DEVELOPMENT BLOCK:

It is situated on the West of the Pub Mangaldoi Development Block and the East of Sipajhar Development Block. The Noa river flows on the Pachim Mangaldoi Development Block. The total population of the block is 83164 (Census, 2001). SC constitutes 8.01 percent, ST constitutes 1.71 percent to the total population while the majority people i.e. 94.09 percent belong to General Caste. Main occupation of the people in the block is farming. A small fraction of the people is engaged in the service sector, business, and commerce.

UDALGURI DEVELOPMENT BLOCK:

Udalguri Development Block occupies an area of 4.69 square kilomitres. No. 1 Sapekhaiti village stands on the West of the block and Golandi River is flowing on the East of the block. On the North, there is Khoirabari Development Block and on the South, there is Purani Goroibari Village. Main occupation of the people in the block is cultivation. There are only 2 High Schools and 2 Higher Secondary Schools and only 1 PHC in the Block. Road communication in the block is poor.

KHOIRABARI DEVELOPMENT BLOCK:

Khoirabari Development Block is one of the socio-economically backward blocks in our present study. The block has been divided into two

parts after the creation of Udalguri district. A small portion remains with the Darrang district and a large portion of the block falls under the BTAD area i.e. Udalguri district at present. The estimated total population of the undivided Khoirabari Development Block is approximately 54,226 and the total population of block under the Darrang district is estimated at 4973 (Census, 2001). Majority of the people are cultivators and few are engaged in other activities like small business, daily wage labour and service sectors. Road communication is poor.

MANGALDOI TOWN:

As per Census 2001, the Mangaldoi Municipal Board has a total of 2, 39,220 population. General Caste population constitute a major proportion to the total population i.e. 95.73 percent while, the rest 15.19 percent 0.81 percent of the total population are SC and ST respectively. Total literacy rate of the Town is found higher as compared to that of the other three towns in the district (i.e. 88.54 percent). Mangaldoi is the district head quarter town. It is more developed and socio-economically more advanced as compared to other towns in the district.

KHARUPETIA TOWN:

As per the Report of Census, 2001, total population of Kharupetia Town is 17,783. Majority of the people in the town are the General Caste people (i.e. 88.66 percent) while 11.2 percent are SC and 0.14 percent are ST. Total literacy rate is 82.33 percent. Kharupetia Town is well known for business and commerce.

TANGLA TOWN:

Tangla is a small town and majority of the people in Tangla Town are engaged in small business and commerce. Total population of the town is 18,228. Major proportion of the total population (84.0 percent) belong to the General Caste, 8.35 percent belong to ST and 7.69 percent belong to SC. Total literacy rate is 84.79 percent.

UDALGURI TOWN:

Udalguri Town is the district head quarter of the newly created Udalguri District under the BTAD area. The growth of urbanisation is slow. Total population of the town as per the Census 2001, is 14,897 persons. Majority of the people in the town (i.e. 75.8 percent) are General Caste people. SC population constitutes 9.01 percent; ST population constitutes 16.32 percent to the total population of the town. Total literacy rate of the town is estimated at 82.79 percent (Census, 2001). Main occupation of the people is business and commerce. At present, there is one 30 bedded P.H.C. which is just adjacent to the boundary of the town.

2.4 SOCIO-ECONOMIC BACKGROUND AND DEMOGRAPHIC ATTRIBUTES OF THE RESPONDENTS:

The socio-economic background of the respondents refers to a set of variables that ultimately define the relative social status of the women in the society. Hence, the study of socio-economic background of the respondents is of great importance in the studies of population. In this

section, an attempt has been made to study the socio–economic background of the respondents with some important attributes. The selected socio-economic variables for our present study are caste, religion, place of residence, type of family, income of the family, educational qualification, occupation, distance from health centre, exposure to media. On the other hand, demographic variables selected for the study include the age of the respondent, age at marriage, age at first birth, husband-wife discussion, knowledge of family planning methods, use of contraceptive, total number of abortions, number of living children and experience of child loss etc.

2.4. A SOCIO – ECONOMIC BACKGROUND OF THE RESPONDENTS BY PLACE OF RESIDENCE:

Place of residence has been considered as one of the most important variables that influence the fertility behaviour of the couples.

Table-2.2

Total Sample Size by Rural/Urban

Place of residence	Total	
Urban	298	(41.2 %)
Rural	426	(58.8 %)
Total	724	(100.0%)

Source: Sample survey of the present study.

The total sample size of the currently married women in the present study is 724 of which rural-urban distribution is (shown in the Table-2.1) is 426 (i.e. 58.8 percent) and 298 (i.e. 41.2 percent) respectively.

CASTE AND COMMUNITY:

Caste and community have been considered as an important attribute of an individual. Till today, Indian society is hierarchically divided on the basis of caste which is more evident in the rural area than in the urban area. The caste system is associated with ritual practice and traditional norms of the community. But, with growing urbanisation, change in the attitude towards life has taken place and growing importance has been given to the economic position of the people. However, several studies conducted in rural India have been found to contradict the results in this context.

Table- 2.3.

Total Sample Size by Selected Groups of Respondents.

Respondents	Urban	Rural	Total
ST (Bodo)	23 (7.7%)	115 (27.0%)	138 (19.1%)
SC	72 (24.2%)	41 (9.6%)	113 (15.6%)
General Caste Hindu	161 (54.0%)	128 (30.0%)	289 (39.9%)
Muslim	42 (14.9%)	74 (17.4%)	116 (16.0%)
Char	--	68 (15.9%)	68 (9.4%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: sample survey of the present study.

In the present study, the respondents belong to mainly three communities- tribal women i.e. ST (Bodo), the non-tribal and the Char women. Non-tribal women are again divided into three groups i.e. Scheduled Caste (SC), General Caste Hindu and Muslim in the plain land. The third group of respondents, the Char women are by religion Muslims and the inhabitants in the riverine area. Thus, finally, there are five selected groups of currently married women. As presented in Table–2.2, the total coverage of

110

the sample in our present study is 724 currently married women of which 39.9 percent are General Caste Hindu, 18.71 percent are ST (Bodo), 15.6 percent are SC, and 16.0 percent and 9.4 percent are Muslim and Char women respectively.

FAMILY COMPOSITION:

The type of family in which a women lives in is also an important variable for fertility study. In a nuclear family, couples live alone with their unmarried children whereas, in a joint family or an extended family, a woman lives with her parents in laws and other relatives and also with married children. Thus, a woman in a nuclear family enjoys comparatively more privacy and freedom to exercise her choices and decisions regarding contraception. But, at the same time in a nuclear family, couples lack the relatives in house to help with child care. This causes differential fertility behaviour of women as well as of couples with respect to type of family that they live in.

Table: 2.4
Percentage Distribution of Respondents by Types of Family

	Urban	Rural	Total
Nuclear	201 (67.4%)	75 (17.6%)	276 (38.1%)
Non nuclear	97 (32.6%)	351 (82.4%)	448 (61.9%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: Sample survey of the present study.

In the present study, Table-2.4 shows 38.1 percent of the total respondents of the sample live in nuclear family, whereas, 61.9 percent live in non–nuclear families. Overall, 72.8 percent of nuclear family in our sample

111

study live in the urban area whereas, 78.3 percent of non-nuclear family live in the rural area.

EDUCATIONAL STATUS OF WOMEN:

Education plays an important role in the life of an individual as it determines the socio–economic position to a large extent. Educational qualification widens the mental horizon of an individual as well as helps to develop reasoning. Female education is very essential because it works in various ways. First, it not only educates a woman but educates the whole family. Second, female education helps to develop reasoning and decision making capacity of a woman. Third, higher the educational qualification of a girl, higher the age at marriage and lessen the reproductive span of life of a girl exposed to the risk of child bearings. Fourth, an educated woman can have a better access to a better knowledge of her reproductive health and child care. Hence, family welfare programme should include programmes on promotion of female literacy and should not be confined to female sterilization.

In our study, out of 724 respondents (Table- 2.5,) 22.7 percent are illiterate, 18.0 percent are educated up to primary school, 10.0 percent are educated up to middle school, 22.1 percent are below matriculation, 13.8 percent and 13.4 percent are qualified up to matric or higher secondary school and graduation and above respectively.

Table- 2.5

Percentage Distribution of Respondents by Education.

	Urban		Rural		Total
Illiterate	12	(4.0%)	152	(35.7%)	164 (22.7%)
Up to Primary	40	(13.4%)	90	(21.1%)	130 (18.0%)
Up to Middle	33	(11.1%)	40	(9.4%)	73 (10.0%)
Under Matric	96	(32.2%)	64	(15.0%)	160 (22.1%)
HSLC/ HS pass	48	(16.2%)	52	(12.2%)	100 (13.8%)
Graduate/ above	69	(23.2%)	28	(6.6%)	97 (13.4%)
Total	298	(100.0%)	426	(100.0%)	724 (100.0%)

Source: Sample survey of the present study.

The rural-urban differential educational status of the respondents, as shown in the Table- 2.5, exhibits that the urban proportion of the illiterate women are comparatively less i.e. 4.0 percent than that of the rural proportion i.e. 35.7 percent. Major proportion of respondents (i.e. 32.3 percent) in the urban area have been observed to attain education below matriculation while, in the rural area, major proportion of respondents (i.e. 21.1 percent) have attained education up to primary school. As expected the proportions of women at the higher levels of education have been observed to be higher than that in the rural area. Thus, at the level of graduation and above, the proportion (i.e. 23.2 percent) of respondents in the urban area are found to be higher than that in the rural area (i.e. 6.6 percent).

EDUCATIONAL STATUS OF HUSBANDS:

An educated husband, baring a few, is more likely to plan their family lives and participate in women's reproductive health. In such cases, couples can have free discussion and mutual consent regarding family planning which helps to avert multiple and unwanted pregnancies.

Table-2.6

Percentage Distribution of Husbands by Educational Status.

	Urban	Rural	Total
Illiterate	4 (1.3%)	92 (21.6%)	96 (13.3%)
Up to Primary	22 (7.4%)	74 (17.4%)	96 (13.3%)
Up to Middle	23 (7.7%)	43 (10.1%)	66 (9.6%)
Under Matric	58 (19.5%)	83 (19.5%)	141 (19.5%)
HSLC/ HS pass	100 (33.6%)	73 (17.1%)	173 (23.9%)
Graduate/ above	91 (30.5%)	61 (14.3%)	152 (21.0%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: Sample survey of the present study.

In our field study, an equal proportion of husbands of 724 of the respondents (shown in Table- 2.6), i.e.13.3 percent is found illiterate and has attained education up to primary school, 9.6 percent up to middle, 19.5 percent attained education under matriculation, 23.9 percent and 21.0 percent have completed HSLC or HS education and graduation and above respectively.

The rural-urban differentials with respect to the educational status of the husbands of the respondents, as shown in the Table 2.6, exhibits that in the urban area the proportion of the illiterate husbands are comparatively lower (1.3 percent) than that of the rural proportion (21.6 percent). The proportions of the respondents whose husbands have attained education up to matriculation or higher secondary school and up to graduation and above are higher (i.e. 33.6 percent and 30.5 percent respectively) in the urban area than that in the rural area (i.e.17.1 percent and 14.3 percent respectively).

OCCUPATIONAL STATUS OF THE RESPONDENTS:

Woman's contribution towards her family is often ignored as it is not directly related to the income stream. In such case, woman has little access to finance and hence enjoys less autonomy. In contrast, women who earn, enjoy financial independence have greater freedom of choices. Thus, an employed woman is comparatively in an advantageous position to participate in the decision making process regarding the number of children that they give birth to and the spacing between children.

Table: 2.7

Percentage Distribution of Respondents by Occupation

	Urban	Rural	Total
House Wife	205 (68.8%)	392 (92.0%)	597 (82.5%)
Daily Wage	18 (8.8%)	3 (0.7%)	21 (2.9%)
Service Holder	75 (36.6%)	31 (7.3%)	106 (14.6%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: Sample survey of the present study.

In our sample study as shown in the Table-2.7, a bulk of respondents (82.5 percent) out of 724 respondents are house wives while, only 2.9 percent are labourer or daily wage earners and 14.6 percent are service holders.

The proportion of house-wife amongst the 724 currently married women in our sample study are highest (i.e. 82.5 percent) and it is higher in the rural area than that in the urban area. On the other hand, 32.3 percent of the respondents are service holders and the proportion of service holder women are higher (51.3 percent) in the urban area than that in the rural area.

The proportion of daily wage earner women is least (i.e. 14.6 percent) in our sample study but it is found to be comparatively higher in the urban area than that in the rural area.

OCCUPATIONAL STATUS OF HUSBANDS:

In a patriarchal society like India, women's social status is determined by the husband's occupational status. It also has a great influence on the behavioural pattern including the tastes and requirements of an individual and so of the couples. Husbands engaged in primary sector, are generally observed to prefer a larger family than that of the husbands who are engaged in service sector. This is because people who are service holders often come across with different sections of people and have to stay away from their home. On the other hand, people who engaged in primary or secondary occupation, generally are in close touch with their rural home.

Table: 2.8
Percentage Distribution of the Husbands by Occupation.

	Urban	Rural	Total
Farmer	4 (1.3%)	187 (43.9%)	191 (26.4%)
Trade/Self-employed	141 (47.3%)	96 (22.5%)	237 (32.6%)
Service-holder	143 (48.0%)	101 (23.7%)	244 (33.7%)
Daily wage-earner	10 (3.4%)	42 (9.9%)	52 (7.2%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: Sample survey of the present study.

Moreover, husband engaged in primary occupation prefer to have comparatively a large number of children (particularly male children) as workers in their family farming. This has a direct influence on the

116

reproductive behaviour of the couples and hence, on the use of contraception.

In our field study, husbands of 26.4 percent respondents, as shown in Table-2.8, are engaged in the primary occupation, mainly farming and the remaining 32.6 percent, 33.7 percent and 7.2 percent are the small businessmen or traders or self-employed , service-holders and daily wage-earners respectively.

In the rural area, the proportion of husbands engaged in farming is comparatively higher (43.9 percent) than that of the urban areas (1.3 percent). The proportion of small traders or the self-employed husbands in the rural sample of our study, are 22.5 percent while, it is higher in the urban area i.e. 47.3 percent. In case of the service holders, the proportion of husbands are higher in the urban area i.e. 48.0 percent than that in the rural area i.e. 23.7 percent. However, the proportions of husbands who are the daily wage earners are found only small in percentage i.e. 3.4 percent in the urban area and 9.9 percent in the rural area.

MONTHLY INCOME OF FAMILY:

The level of income is one of the prime socio-economic indicators that reflect the standard of living of individuals. Although it is very difficult to get a clear picture about the household income especially in the rural areas, as most of the respondents do not maintain a proper account of their income. Hence, the data regarding the family income have been collected by taking into account of all their sources of income. The monthly family (household)

117

income of the respondents in the present study, we mean not the sole income of the head of the family rather the aggregation of the total of all sources of income earned by the family members, as shown in Table- 2.9 below.

Table: 2.9

Percentage Distribution of Respondents by Monthly Family Income.

	Urban	Rural	Total
Less than Rs 5000	39 (13.1%)	189 (44.4%)	228 (31.5%)
Rs 5000- Rs 10,000	67 (22.5%)	106 (24.9%)	173 (23.9%)
Rs 10,000-Rs 20,000	75 (25.2%)	51 (12.0%)	126 (17.4%)
Rs 20,000 and above	117 (39.3%)	80 (18.8%)	197 (27.2%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: sample survey of the present study.

It is observed from Table- 2.9 that majority of 724 respondents, i.e. 31.5 percent belong to the lowest income group i.e. less than Rs.5000/- ,while the rest i.e. 23.9 percent, 17.4 percent and 27.2 percent belong to the income groups of Rs.5000/- to 10,000/- , Rs.10,000 to Rs. 20,000/- and Rs.20,000/- and above respectively.

Table-2.9 also exhibits that in the urban area 39.3 percent of respondents are in the highest income group of Rs.20,000/- and above while, comparatively smaller proportions (i.e.13.1 percent, 22.5 percent and 25.2 percent) belong to the lower income groups i.e. less than Rs.5,000/-, Rs.5000/- to Rs.10,000/- and Rs.10,000/- to Rs.20,000/- respectively. In the rural area including the Char area, comparatively a larger proportion of respondents (44.4 percent) are found in the lowest income category i.e. less

than Rs. 5,000/- while, it is found to be the least (18.8 percent) in the highest income category i.e. Rs. 20,000/- and above.

MONTHLY EXPENDITURE OF FAMILY:

Expenditure schedule of a household reflects the partial picture of standard of living of a family or a couple or an individual. It reveals the taste and preferences of individual in practice. Hence, monthly expenditure of a family is considered as one of the important variables that finally reflect on the standard of living and the behaviour of the individual.

Table: 2.10

Percentage Distribution of Respondents by Monthly Family Expenditure

	Urban	Rural	Total
Less than Rs. 5000	78 (26.2%)	284 (66.7%)	362 (50.0%)
Rs.5000 – Rs.10,000	99 (33.2%)	65 (15.3%)	164 (22.7%)
Rs.10,000-Rs.20,000	102 (34.2%)	65 (15.3%)	167 (23.1%)
Rs. 20,000 and above	19 (6.4%)	12 (2.8%)	31 (4.3%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: Sample survey of the present study.

Table-2.10 shows that majority (i.e.50.0 percent) of the respondents belong to the lowest expenditure group less than Rs.5000/-. A small proportion (i.e. 4.3 percent) of respondents belongs to the expenditure group of Rs.20,000/- and above and the remaining 22.7 percent and 23.1 percent belong to the expenditure groups of Rs.5000/- to Rs.10,000/- and of Rs.10,000/- to Rs.20,000/-. The same trend is observed in both urban and the rural area. The proportion of respondents is observed to decrease at the

higher expenditure categories but, the decrease in the rural area is more rapid than that in the urban area.

HUSBAND-WIFE DISCUSSION:

Healthy and free discussion between husband and wives regarding the children to be born to the couples, spacing between children, ensures proper choice of contraception and helps to avoid multiple or unwanted pregnancy. In a male dominated society, women prefer men to initiate a discussion because they are afraid of being seen as promiscuous. In most of the cases, it is found that educated men from forward caste, nuclear families and with fewer children initiate the discussion related to family planning (Padma, 2005).

Table : 2.11

Percentage Distribution of Husband Who Have Ever Discussed the Use of Family Planning.

	Urban	Rural	Total
Discussed	214 (71.8%)	207 (48.6%)	421 (58.1%)
Not Discussed	84 (28.2%)	219 (51.4%)	303 (41.9%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: Sample survey of the present study.

In our field study, out of 724 total respondents, presented in the Table-2.11 above, 58.1 percent have reported ever discussed with husbands regarding family planning while, the remaining 41.9 percent reported not discussed. The proportions of urban couples who have ever discussed family planning are found to be 20.0 percent.

FIRST TIME HUSBAND-WIFE DISCUSSION ON FAMILY PLANNING:

Most of the couples in our field study observed to breach the matter only after the birth of second child. In such cases, the possibilities of unwanted birth of child occur. This reduces the effective use of contraception by couples. Thus, the data collected from the respondents reported the first time of discussion will give us an idea about the fertility behaviour of the couples and the use of contraception.

Table: 2.12

**Percentage Distribution of Respondents by
Timing of Husband-Wife Discussion on Family Planning**

	Urban	Rural	Total
Before birth of 1st child	32 (15.0%)	18 (8.7%)	50 (12.5%)
After birth of 1st child	108 (50.5%)	66 (31.9%)	174 (38.4%)
After birth of 2nd child	74 (34.6%)	123 (59.4%)	197 (49.1%)
Total	214 (100.0%)	207 (100.0%)	421 (100.0%)

Source: sample survey of the present study.

In the urban area, the proportion of couples who have discussion before the birth of first child is higher (i.e.15.0 percent) as against the rural proportion (i.e. 8.7 percent). More than half of the 214 couples who have discussion in the urban area are found to have the discussion after the birth of the first child (i.e. 50.5 percent) while, 34.4 percent are found to have the discussion after the birth of the second child. On the other hand, in the rural area, highest proportion of 207 couples, who have ever discussed, are found to have the discussion after the birth of the second child (i.e.59.4 percent).

DISTANCE TO HEALTH CENTRE:

Distance to the source of family planning (primary health centre, sub centre, or hospital) from the place of residence has been considered as one of the factors that may influence the need of contraception. During the interaction schedule, a number of respondents in the rural area reported the non availability of services in the nearest primary health centre and hence, they depend for services to the next nearest hospitals or health centres. Thus, data are collected on the distance to the nearest health centre usually frequented by the respondents for services.

Table: 2.13.

Percentage Distribution of Respondents by Accessibility to the Health Facility

	Urban	Rural	Total
1-2 Km	233 (78.2%)	291 (68.3%)	524 (72.4%)
3-4 Km	46 (15.4%)	89 (20.9%)	135 (18.6%)
5-6 Km	19 (6.4%)	35 (8.2%)	54 (7.5%)
7-8 Km	—	3 (0.7%)	3 (0.4%)
9 Km and above	—	8 (1.9%)	8 (1.1%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: sample survey of the present study.

In our sample study out of 724 respondents, as shown the Table-2.13 above, 72.4 percent reported to have the accessibility to the Family planning services within 1 to 2 kilometres while, 18.6 percent have within 3 to 4 kilometres, 7.5 percent within 5 -6 kilometres, 0.4 percent and 1.1 percent within 7-8 kilometres and 9 kilometres and above respectively.

Major proportion i.e. 78.2 percent of women in the urban area, have the access to the health centre within 1-2 kilometres while, the rest 15.4

percent and 6.4 percent have within 3-4 kilometres and 5-6 kilometres. On the other hand, 68.3 percent of women in the rural area, have the accessibility within the distance of 1-2 kilometres from the nearest health centre while, the rest 20.9 percent, 8.2 percent, 0.7 percent and 1.9 percent have the accessibility within the distance between 3-4 kilometre, 5-6 kilometre, 7-8 kilometre and 9 kilometre and above respectively.

EXPOSURE TO FAMILY PLANNING MESSAGES:

Exposure to family planning messages in the mass media does have a direct influence on the need of family planning. A woman is considered to be exposed to the family planning messages if she has heard on radio or seen on television or seen any street play or hoardings or read in news paper any message related to family planning during the month prior to our interview otherwise, she is considered as unexposed.

Table:2.14

Percentage Distribution of Respondents who are Exposed to Family Planning.

	Urban	Rural	Total
Exposed	291 (97.7%)	344 (80.7%)	635 (87.7%)
Not Exposed	7 (2.3%)	82 (19.2%)	89 (12.3%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: sample survey of the present study.

In our sample, out of 724 currently married women (shown in the Table-2.14), 87.7 percent are exposed to the message of family planning while, the remaining 12.3 percent are not exposed. The proportion of women

exposed family planning messages on media is higher (i.e. 97.7 percent) in the urban area than that in the rural area (i.e. 80.7 percent) because, the media exposure and communication facilities in the urban area are comparatively better than that in the rural area.

2.4.B DEMOGRAPHIC CHARACTERISTICS OF THE RESPONDENTS:

CURRENT AGE OF THE RESPONDENTS.

The need of family planning and contraception generally increases with women's age. It is observed that at higher age most of the women usually attain their desired size of the family and prefer to use contraception to limit the number of children. For the present study, the current age of the respondents as shown in the Table-2.15, has been divided into six categories namely, age below 20 years, 20 to 24 years, 25 to 29 years, 30 to 34 years, 35 to 39 years and 40 years and above.

Table: 2.15.

Percentage Distribution of Respondents by Current Age.

Age	Urban		Rural		Total	
Below 20 years	3	(1.0%)	41	(9.6%)	44	(6.1%)
20-24 years	28	(9.4%)	69	(16.2%)	97	(13.4%)
25-29 years	92	(30.9%)	92	(21.6%)	184	(25.4%)
30-34 years	63	(21.1%)	83	(17.8%)	146	(20.2%)
35-39 years	62	(20.8%)	91	(21.4%)	153	(21.1%)
40 -45 years	33	(11.1%)	31	(7.3%)	64	(8.8%)
45-49 years	17	(5.7%)	19	(4.5%)	36	(5.0%)
Total	298	(100.0%)	426	(100.0%)	724	(100.0%)

Source: sample survey of the present study.

In our field study, out of 724 respondent, highest proportion i.e. 23.4 percent and 21.1 percent belong to the age group of 35-39 years and 25-29 years respectively while, 20.3 percent belong to the age group of 30-34 years. Below 20 years and 20-24 years it is 5.3 percent and 14.2 percent respectively .The rural-urban percentage distribution of respondents by the current age shows that in the urban area major proportion i.e. 27.5 percent of respondents are in the current age category of 25 to 29 years while it is 21.6 percent in the rural area. The proportion of respondents in the higher age category of 30 years and above is 58.7 percent in the urban area where as it is found to be comparatively less in proportion i.e. 51 percent in the rural area.

AGE AT MARRIAGE:

Age at marriage is one of the most important characteristics in the study of women's fertility. Lower the age at marriage longer is the reproductive span of life exposed to the risk of childbearing of a woman. This problem is more acute in case of illiterate and socio=economically poor women because they have less knowledge of and access to contraception.

In India, the legal minimum age of marriage is 18 years for a girl. But, data from our field study (Table-2.16.) shows that a considerable number of girls get married at the age below 18 years. Out of 724 currently married women in our sample study 13.7 percent have entered into the wedlock at the age below14 years. 45.2 percent got married at the age between 15 to 19 years and the rest 32.7 percent 7.9 percent and 0.6

percent got married at the age of 20 to 24 years 25 to 29 years and 30 years and above respectively.

Table-2.16.

Percentage Distribution of Respondents by Age at Marriage

Age at Marriage	Urban	Rural	Total
below 14 years	19 (6.4%)	80 (18.8%)	99 (13.7%)
15-19 years	107 (35.9%)	220 (51.6%)	327 (45.2%)
20-24 years	130 (43.6%)	107 (25.1%)	237 (32.7%)
25-29 years	38 (12.8%)	19 (4.5%)	57 (7.9%)
30 years and above	4 (1.3%)	–	4 (0.6%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)
Mean age at marriage	20.4 years	18.1 years	19.1 years

Source: sample survey of the present study.

The percentage distribution of the respondents by the age at marriage presented in the Table-2.16 above, shows that the proportion of respondents who got married at a higher age group in the urban area are comparatively higher than that in the rural area. Thus, it is obtained from the Table- 2.16 that the mean age at marriage of the 724 currently married women is 19.1 years, while it is 20.4 years in the urban area and 18.1 years in the rural area.

AGE AT FIRST BIRTH:

Age of women at first birth of her baby/child has also been considered as an important variable in the study of women's reproductive

126

health and behaviour. In India, it has been observed that women, particularly in rural areas and among the socio – economically backward communities get married at their early teenage and hence, give birth to their child at the age below 18 years.

Table-2.17.

Percentage Distribution of Respondents by Age at First Birth.

Age at First Birth	Urban	Rural	Total
Below 14 years	-	9 (2.1%)	9 (1.2%)
15—16 years	13 (4.4%)	116 (27.2%)	129 (17.8%)
17—18 years	37 (12.4%)	106 (24.9%)	143 (19.8%)
19—20 years	87 (29.2%)	129 (30.3%)	216 (29.3%)
21—22 years	88 (29.5%)	42 (9.9%)	130 (18.0%)
23—24 years	73 (23.8%)	24 (6.1%)	97 (13.4%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)
Mean age at 1st birth	20 years	18 years	19 years

Source: Sample survey of the present study.

Table-2.17. above shows that the proportion of currently married women in our sample study, who gave first birth at the lower age i.e. below 14 years is 2.1 percent in the rural area while, it is nil in the urban area. On the other hand, in the higher age at first birth category i.e. above 20 years, the proportion of women is comparatively higher in the urban area than that in the rural area. Thus, the mean age of 298 women at first birth in the urban area is found to be higher i.e. 20 years as compared to that in rural area

(i.e.18 years). The mean age of 724 currently married women at first birth in our sample study is 19 years.

TOTAL NUMBER OF LIVING CHILDREN:

The average number of living children born to the women is considered as one of the prime indicators to explain the fertility status of women and hence, the use of contraception.

From the Table-2.18 it can be observed that majority (i.e. 45.9 percent) of the respondents have two living children and followed by 34.1 percent who have three living children, 12.3 percent with four living children and 4.8 percent, 3.5 percent with five and six living children. Thus, the mean number of children in our sample study is 3. Comparatively, a higher proportion of women with 2 living children is found in the urban area (i.e. 54.7

Table: 2.18

Percentage Distribution of Respondents by Total Number of Living Children

Number of Living Children	Urban	Rural	Total
1 child	18 (6.0%)	17 (4.0%)	35 (4.8%)
2 children	161 (54.7%)	157 (36.9%)	318 (43.9%)
3 children	94 (31.5%)	131 (30.8%)	225 (31.1%)
4 children	25 (8.4%)	60 (14.1%)	85 (11.4%)
5 children	–	35 (8.2%)	35 (4.8%)
6 children and above	–	26 (6.1%)	26 (3.5%)
Total	298 (100.0%)	426 (100.0%)	724(100.0%)
Mean no. of children	**2 (2.4)**	**3 (3.04)**	**3 (2.8)**

Source: Sample survey of the present study.

percent) than that of in the rural area (i.e. 36.9 percent) and the proportion of women with higher number of living children (i.e. 4, 5 and 6 or more than 6 children), are higher in the rural area than that of in the urban area. Thus, the mean number of living children in the urban area (2.4) is lower as compared to the mean number of living children in the rural area (3.04).

ABORTIONS AND MULTIPLE PREGNANCIES:

Factors like, social taboos, improper knowledge of reproductive health of women and absence of proper understanding often cause unwanted pregnancies and spontaneous or induced abortion. It reflects on the poor state of reproductive health of women. Table-2.19 below shows the percentage distribution of the respondents who have ever experienced abortions (induced or spontaneous).

Table: 2.19.

Percentage Distribution of Respondents by Total Abortions.

	Urban	Rural	Total
Abortion	95 (31.8%)	260 (61.0%)	355 (49.0%)
No abortion	203 (68.1%)	166 (39.0%)	369 (51.0%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: Sample survey of the present study.

Out of 724 currently married women (shown in the Table - 2.19), 355 respondents (49.0 percent) have experienced either spontaneous or induced abortions. A high percentage of abortions (i.e. 61 percent) are found in the rural area.

EXPERIENCE OF CHILD LOSS:

Child loss affects the couple's reproductive behaviour. This is because couples who have experienced the child loss generally want to replace dead children and hence, want the next child without spacing. Moreover, child loss also affects the couple's need for spacing between two children.

Table: 2.20

Percentage Distribution of Respondents by Experience of Child Loss.

Experienced Child Loss	Urban	Rural	Total
Yes	38 (12.7%)	159 (37.3%)	197 (27.2%)
No	260 (87.2%)	267 (62.7%)	527 (72.8%)
Total	298 (100.0%)	426 (100.0%)	724 (100.0%)

Source: Sample survey of the present study.

In our sample study (shown in the Table- 2.20. above), out of 724 women 27.2 percent lost at least one child while the rest 72.2 percent have not experienced any loss of children. The proportion of women who have the experience of loss of children are higher in the rural area (i.e. 37.3 percent) than that in the urban area (12.7 percent).

KNOWLEDGE OF CONTRACEPTION:

So far the knowledge of contraception is concerned among the currently married women in our sample study, it is found higher in   case of modern method i.e. 98.2 percent. Knowledge regarding female sterilization

Table: 2.21

Percentage Distribution of Respondents by Knowledge of Contraception.

Knowledge of Contraception by Methods	Currently Married Women
Any Modern Method	98.2%
Any Modern Spacing Method	95.9%
All Modern Methods	34.7%
Female Sterilization	97.2%
Male Sterilization	66.3%
Oral Pill	97.1%
Condom	58.2%
Sponge (Today)	49.8%
IUD or Coper-T	51.2%
Traditional	8.3%
Others	2.4%

Note: * Multiple responses
Source: Sample survey of the present study.

is 97.2 percent, oral pill 97.1 percent. In case of any modern method it is found to be 95.9 percent (shown in the Table 2.21 above). It has also been observed that a minimum percentage i.e. 8.2 percent and 2.4 percent of respondents have the knowledge of traditional and other methods of contraception respectively.

CURRENT USE OF CONTRACEPTIVE:

Out of 724 currently married women (shown in Table: 2.22), 50.6 percent are the regular users of modern methods of contraception while, 49.9 percent are the non-users including the irregular or discontinued users.

Table: 2.22

Percentage Distribution of Respondents by Current use of Contraceptive

Use of Family Planning:	Total User / Non-Users.
Total Users	401 (55.4%)
Total Non Users	323 (44.6%)
Total	724 (1000.0%)
Total Use by Methods:	
Female Sterilization	86 (21.4%)
Male Sterilization	—
Oral Pill	279 (69.6%)
Condom	73 (18.2%)
Today	16 (4.0%)
IUD or Coper-T	23 (5.7%)
Conservative Herbs.	3 (0.7%)
Withdrawal	14 (3.5%)
Total Users	401 (100.0%)

Source: Sample survey of the present study.

Again, out of 401 total users in the sample, 21.4 percent are the users of Female sterilization, 69.6 percent are the oral pill users, 18.2 percent are Condom users while, 4.0 and 5.7 percent are found to use Today and Coper-T respectively. The remaining 0.7 percent and 3.5 percent are the users of conservative herbs and traditional withdrawal method. There is not a single case of male sterilization reported in our field study.

2.5 CONCLUSION:

From the above profile of our study it has been observed that the knowledge of any method of contraception is more or less universal i.e. 98.2 percent and of any spacing method is 95.9 percent while, the knowledge of all method is comparatively low i.e. 34.7 percent. The current use of family planning amongst 724 currently married women with at least one child is only 55.4 percent, while 44.6 percent of the respondents are not currently using any contraceptive. Pill users constitute a major proportion (69.6 percent) to the total users in the sample followed by the adopters of female sterilization (21.4 percent) and the condom users (18.0 percent) while, the proportions of the users of other methods are comparatively negligible.

Out of 724 respondents the General caste (Hindu) population confines to the highest proportion (39.9 percent). The total literacy rate of the respondents is 77.3 percent. Majority of the respondents (82.5 percent) are house wives while, 17.5 percent have participated in the work force. The bulk of the respondents (31.5 percent) are in the income group of less than Rs. 5000/-. One fourth of the total respondents i.e. 25.4 percent are in the age group of 25-29 years and the mean age at marriage of the respondents is 17.8 years and the mean number of living children is 3. From the demographic profile study, it is also observed that out of 724 respondents, 27.2 percent and 49 percent respondents have experienced child loss and abortion (either spontaneous or induced) respectively.

****

2.6   PRESENTATION OF DATA BY FIGURES:

Figure: 2.6.1 : Knowledge of Modern Contraceptive
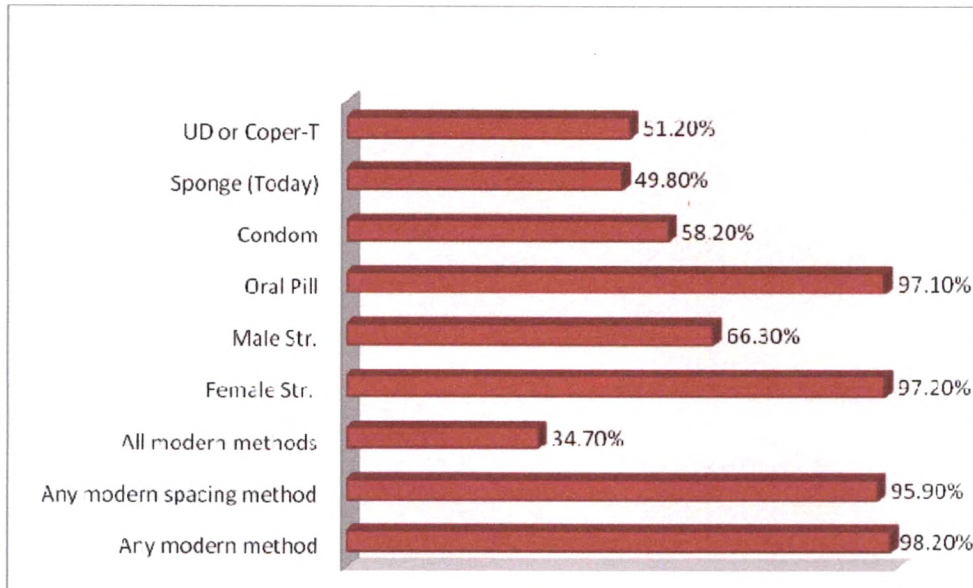
Figure:2.6.2: Total Use of Contraception by Methods
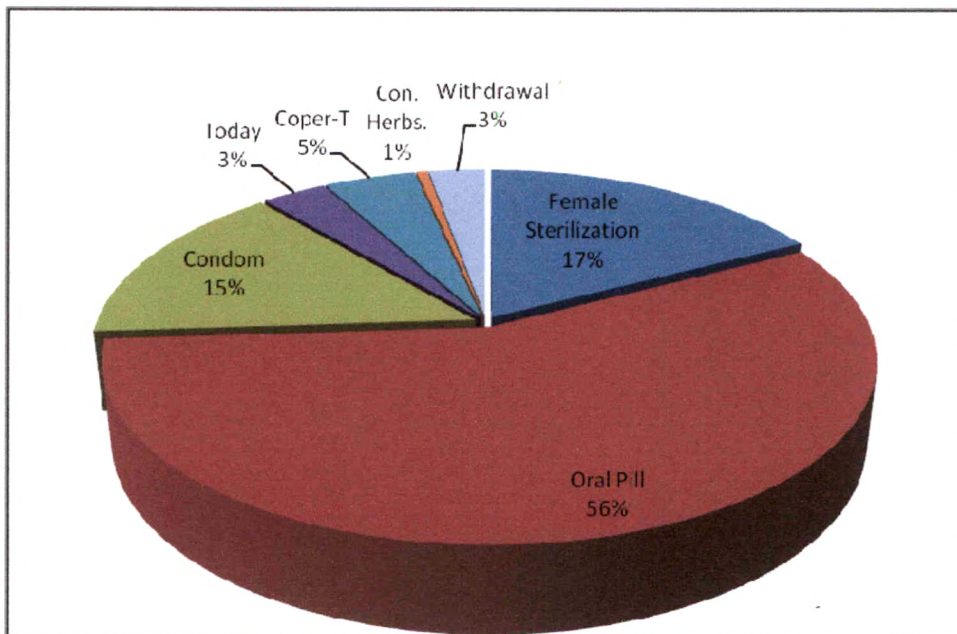
CHAPTER 3

A
COMPARATIVE STUDY
AMONG
TRIBAL, NON-TRIBAL
AND
CHAR INHABITING RESPONDENTS

3.1. INTRODUCTION:

India is home to almost more than half of the world's tribal population. Tribal population constitutes 8.2 percent of India's total population (Office of the Registrar General and Census Commissioner, 2001) and is larger than that of any other country in the world. Over 84 million people belonging to 698 communities are identified as members of scheduled tribes (India Ministry of Tribal Affairs, 2004). About 67.76 million persons have been enumerated in the country (excluding Jammu & Kashmir) as members of the Scheduled Tribes (Census,1991).The proportion of scheduled tribes population in the total Indian population has increased from 5.3 percent in 1951 to 8.2 percent in 2001 (India Ministry of Tribal Affairs, 2004) since their formal recognition in 1950. Approximately more than 533 tribes were spread throughout different parts of India (Primary Census Abstract, 2001). The concentration of Scheduled Tribes varies substantially between the Indian states (Registrar General and Census Commissioner, 2001) and is found predominantly high in a number of districts of the states such as Assam, Bihar, Madhya Pradesh, Maharashtra, Manipur, Orissa, Rajasthan, Sikkim, Tripura, Andaman & Nicobar Islands and Daman and Diu (Census, 2001).

Scheduled Tribes have been formally recognised as a distinct indigenous community by the Indian constitution in 1950 and have been considered as the weakest sections of the population in view of common socio-economic and socio-demographic factors like poverty, illiteracy, lack of developmental facilities, lack of adequate primary health facilities etc

135

(Thakur, Thakur and Saini, 1991; and Basu, 1994). Despite the constitutional protection provided to the Scheduled tribes in India in 1950, they remain the most backward and ethnic groups in India. They are backward not only in comparison to the general population, but also compared to Schedule Caste. Indigenous women are malnourished (Samuel., Rao, 1992; and Maiti, Unisa and Agrawal, 2005) and their dietary energy intake is not adequate to compensate their heavy physical work load (Chatterjee and Lambert, 1990). It is a striking feature that though the ST women in India suffer from high levels of female morbidity and mortality, they do not generally seek medical facilities from health centres. They simply neglect the serious health problems like, RTIs/STDs, menstrual disorders and unwanted pregnancies primarily due to lack of awareness, lack of accessibility to health facilities, proper information and guidance. The extent of knowledge and practice of family planning was also found low among the Scheduled Tribes (Kanitkar and Sinha, 1988).

Table-3.1 below shows some striking demographic features of the all India women and the all India ST women based on the Report of NFHS-3, 2005-06. It is observed that 55.0 percent of the ever married women amongst the ST in India entered into the wedlock at the age of 18 years while, it is 44.5 percent amongst the ever married women at all India level. The total fertility rate of the ST women is higher (3.12) while the median age at the birth of first child for ever married ST women and the want for no more children amongst the ST women aged 25-26 years are comparatively less (19.1 years and 74.3 percent respectively). The current use of any method of

Table 3.1

Selected Demographic Indicators for All Women and Scheduled Tribe Women in India.

Demographic Indicators	All India Women	All India Scheduled Tribe Women
Women of Age 20-24 Married by Age 18 years	44.5 %	55.0 %
Total Fertility Rate (TFR)	2.68	3.12
Median Age at 1st Child Birth for Women 25-49 years	19.8	19.1
Married Women With 2 Living Children Wanting No More Child	83.2%	74.3 %
Family Planning (Currently Married Women Age 15-49 years):		
Currently Using Any Method	56.3 %	48.0 %
Currently Using Any Modern Method	48.5 %	42.7 %
Female Sterilization	37.3 %	35.3%
Condom	5.3 %	1.7 %
Total Unmet Need	12.8 %	13.9%

Source: National Family Health Survey-3, 2005-2006.

family planning amongst the ever married ST women is found less (i.e. below 50 percent) while, the current use of any modern method is 42.7 percent. More than 35 percent of the ever married ST women opted for female sterilization (i.e. 35.3 percent) while, it is found 37 percent amongst the all Indian women. The use of condom is found nominal in percentage i.e. only 1.7 percent as against the total use of condom amongst the all India ever married women i.e. 5.3 percent. The total unmet need amongst the ever married ST women is found comparatively higher i.e. 13.9 percent.

The NFHS-3 shows that the demographic characteristics of the all Indian ST women differ to a great extent from that of the all India women. This causes the differential use of contraception. Hence, a comparative study

of the differential socio-economic and demographic characteristics amongst the ST and non-ST women can provide us an insight view of the differential use of contraceptives amongst the ST and the non-ST women in our present study.

3.2. TRIBAL, NON-TRIBAL AND CHAR WOMEN IN THE UNDIVIDED DARRANG DISTRICT:

In our sample study, the currently married women with at least one living child, as it has been mentioned earlier, is grouped into three broad categories - the tribal i.e. ST (Bodo) women and the Non- tribal i.e. the SC, the General Caste and the Muslim women and the women inhabiting the char area in the undivided Darrang district of Assam.

The Bodos are recognised as a plains tribe in the Sixth Schedule of the Indian Constitution. Bodos belong to a larger ethnic group called the Bodo-Kachari and represents one of the largest ethnic groups of Brahmaputra valley. Bodos have patriarchal society and by religion they recently follow Bathouism, Hinduism and Christianism. Udalguri and Kokrajhar are considered as the centre of the Bodo area. According to the Census1991, Bodos constitute 5.3 percent of the total population in the state. In our sample study we have taken the sample of the ST (Bodo) women from the Udalguri and Khoirabari development blocks (at present included in the newly created BTAD area i.e. Udalguri district) in the undivided Darrang district of Assam.

Amongst the non-tribals of the main land area of the district i.e. the General Caste Hindu women, constitute the major proportion to the total female population in the district. The General Caste Hindu women are the main inhabitants of the urban Darrang and are considered as the socio economically privileged community in the district. The other non-tribal group of respondents is the SC. The SC people are found comparatively in larger proportion in the urban area. The general literacy rate amongst the SC is 69.2 percent while, female literacy rate is observed to be 48.44 percent (Census, 2001). The SC people practice agriculture for their livelihood but recently a swing in the occupational habit of the SC people in the urban area (i.e. towards the non-farming and service sector) is found. The third group of respondents in the non-tribal category is the Muslim women who are mainly the inhabitants of rural Darrang. Agriculture is the main occupation of most of the Muslim households in the rural area in the district. Recently, the female literacy rate amongst the Muslim is observed increasing though it is still below the average level.

Finally, the Char women are the inhabitants of the low lying flood prone area along the northern bank of the Brahmaputra River of the district. They constitute 11 percent of the total population of the district (Directorate of Char Area Development Assam, 2002-03). Char people have originally migrated from the Mymensinga district of the neighbouring country Bangladesh and at present they have been living in these places for a long period. They speak Bengali but regard Assamese language as their mother tongue. Char society is patriarchal society. The practice of Polygamy in the

Char area leads to increasing population. It is found that a Char woman spends 80 percent of her reproductive life in pregnancy and lactation. The socio-economic and demographic characteristics of the Char women are very poor. 67.9 percent of the total population in the Char area in the state is below poverty line (Directorate of Char Area Development Assam, 2002-03). Char villages are thinly populated and house are scattered. People in the Char area lead a transitory life as they have to shift to the nearby highland area during flood. Land erosion caused by the flood during the rainy season also makes people homeless and landless in the Char area.

Table-3.2

Percentage distribution of Respondents by Place of Residence: Tribal, Non-tribal and Char women

	SC	ST	General Caste Hindu	Muslim	Char	Total
Urban	72 (63.7%)	23 (16.7%)	161 (55.7%)	42 (36.2%)	–	298 (41.2 %)
Rural	41 (36.28%)	115 (83.3%)	128 (44.3%)	74 (63.8%)	68 (100.0%)	426 (58.8 %)
Total	113 (100.0%)	138 (100.0%)	289 (100.0%)	116 (100.0%)	68 (100.0%)	724 (100.0%)

Source: sample survey of the present study.

The tribal, non-tribal and the Char women in our sample study have their own distinct and widely varying socio-economic and demographic background and hence, differential reproductive behaviour. In this section of the present study, we have made a comparative study amongst the ST

(Bodo), the non ST (SC, General Caste Hindu and Muslim) women and the Char women.

Table-3.2 shows that out of 724 respondents of the sample, 41.2 percent are from the urban areas and 58.8 percent are from the rural areas. Out of the 138 ST respondents, only 16.7 percent are from the urban Darrang and 83.3 percent are from the rural Darrang. This is because the ST people (Bodo) mainly reside in the rural Darrang. In case of 113 SC respondents, 63.7 percent are from the urban Darrang and 36.2 are from the rural Darrang. Out of 289 General Caste Hindu respondents, 55.7 percent are from the urban Darrang and 44.3 percent are from rural Darrang. In case of 116 Muslim respondents, 36.2 percent are from urban Darrang and 63.8 percent from the rural Darrang. And 100 percent of 68 char respondents of the sample are from Char area of Darrang.

3.3. SOCIO-ECONOMIC AND DEMOGRAPHIC ATTRIBUTES: TRIBAL, NON-TRIBAL AND CHAR WOMEN

An inter community comparison amongst the tribal, non-tribal and Char respondents by socio-economic as well as demographic background is presented below.

3.3.A SOCIO-ECONOMIC ATTRIBUTES: TRIBAL, NON-TRIBAL AND CHAR WOMEN.

Table-3.3.A shows some of the selected socio-economic variables of the respondents by tribal, non-tribal and Char inhabiting women. It is observed from Table- 3.3.A that the proportion of illiterate women has been highest

Table-3.3. A

Differential Socio-Economic Attributes: Tribal, Non-Tribal and Char Women.

Socio-Economic Back Ground	Tribal	Non-Tribal		Char Inhabitants	Total
	ST	SC	General Caste Hindu	Muslim	Char	
Illiteracy :						
Illiterate Respondents (%)	39.9	11.5	2.4	25.0	88.2	55.0
Illiterate Husbands (%)	22.5	5.3	0.3	8.6	70.6	13.3
Occupation of Wives:						
House Wives (%)	95.7	85.8	71.3	82.8	100.0	82.5
Daily Wage Earner (%)	—	5.3	3.5	4.3	--	2.9
Service Holders (%)	4.3	8.8	26.0	12.9	—	14.6
Occupation of Husbands:						
Farmer (%)	55.1	17.7	9.3	25.9	55.9	26.4
Traders or Self Employed (%)	34.1	49.6	32.5	34.5	—	32.6
Daily Wage Earner (%)	3.6	2.7	—	3.4	44.1	5.8
Service Holders	3.6	30.1	56.4	31.9	—	32.3
Family Income:						
Below Rs.5000/- (%)	40.6	37.2	14.5	41.9	94.1	44.6
Above Rs. 5000/- (%)	39.1	31.9	23.2	37.4	5.9	23.9
Above Rs. 10,000/- (%)	20.8	31.0	62.3	20.7	—	31.5
Property Status :						
Landless (%)	10.2	12.6	3.6	7.5	73.5	10.7
Agricultural Land and House (%)	89.5	83.0	69.7	77.4	26.5	70.2
House and others (%)	—	5.0	26.7	5.7	--	19.1
Husband Wife Discussion on F.P.(%)	42.2	70.9	81.4	44.3	—	58.6
Women Exposed To Media (%)	97.2	96.3	98.4	89.5	2.3	81.6
Accessibility to the F.P. sources (%) (Within 3 Km.)	90.8	92.0	94.6	88.1	23.5	86.5

Source: sample survey of the present study.

amongst the Char women (88.2%), followed by the ST (Bodo) women (39.9 percent), the Muslim women (25.0 percent), the SC (11.5 percent) and it has been least amongst the General Caste' Hindu women (2.4 percent). Highest rate of illiteracy is found amongst the husbands in the Char area (i.e.70.6

percent) and the least amongst the General Caste Hindu (i.e. 0.2 percent). The proportion of illiterate husbands amongst the ST (Bodo), SC and Muslim is found to be 22.5 percent, 5.3 percent and 8.6 percent respectively.

Majority of the respondents (82.5 percent) in our sample study (as it has been stated in the previous chapter) are house-wife or engaged in house hold activities (including domestic farming). Thus, 95.7 percent of ST, 85.8 percent of SC, 82.7 percent of Muslim and 71.3 percent of General Caste Hindu women are found to be engaged in the household activities. In the Char area, 100.0 percent of the respondents are house wives. The proportion of service holder women is found highest amongst the General Caste Hindu (i.e.26.0 percent) followed by the Muslim (i.e. 12.9 percent), the SC (i.e.8.8 percent) and the ST (4.3 percent).

The ST and the Char society are agrarian in character. This has been reflected by the occupational status of the husbands. More than 55.0 percent husbands of the ST (138) and the Char women (68) are farmers while, the proportion of husbands engaged in farming in the non-tribal communities are comparatively lower. The proportion of self-employed husbands or the traders are found highest amongst the SC (49.9 percent) and it is found to be more or less equal amongst the ST and Muslim women (i.e. 34 percent and 35 percent women). The proportion of the husbands who are service holder, are found to be highest amongst the General Caste Hindu (i.e. 56.4 percent) followed by the Muslim (i.e. 31.9 percent) and the SC (i.e. 30.1 percent) and amongst the ST, it is found to be the least (i.e. 3.6

.

percent). The proportion of daily wage labourer is observed to be highest amongst the husbands in the Char area (44.1 percent).

Majority of the families (94.01 percent) in the Char area belong to the lowest income category in our sample study i.e. less than Rs.5000/-. The monthly family income status of 138 ST (Bodo) women and 116 Muslim women in our sample study is found to be more or less the same i.e. 40 percent belong to the income category of less than Rs.5000/- and more than 37 percent belong to the income category of Rs.5000/- Rs.10,000/ and 20.7 percent belong to the category of Rs.10,000/ and above. The income status of 289 General Caste Hindu women in our sample study is found highest i.e. 62 percent belong to the highest income category of Rs.10,000/- and above.

The property status of the Char respondents has been very low in our sample study. 73.5 percent are found to be landless while, the remaining 26.5 percent claimed to have land on which they erected their thatched shed and cultivated Rabi crops for their lively hood (especially, in the Char area nearer to the town). The property status of the ST, SC and the Muslim women is found to be more or less same i.e. majority of the respondents have owned both the house and the agricultural land. This is because most of the ST, SC and the Muslim respondents are the inhabitants of the rural Darrang and those who live in the town areas keep close touch with their rural ancestral house. On the other hand, comparatively a larger number of respondents belonging to General Caste Hindu in our sample study are service holders and disposed their rural property to settle down in the urban

area for their livelihood. Thus, the proportion of asset holders like house and other property is found comparatively higher amongst the General Caste Hindu women (i.e. 26.7 percentage).

Husband wife discussion has been considered as one of the prime social factors that fosters the use of contraception amongst the couples. In the socio-economically backward Char area where the use of contraception is socially discarded, the illiterate Muslim women hardly have any discussion with their husbands on family planning. The proportion of women who discussed family planning matters with their husbands is found highest amongst the General Caste Hindu (i.e. 81 percentage) while, it is found 71.0 percent amongst the SC, 44.0 percent amongst the Muslim in the Main land and 42.0 percent amongst the ST (Bodo).

Amongst the social factors, the exposure to the family planning programme is found around 90.0 percent and above amongst the respondents except the Char women. In the Char area, the proportion of women exposed to the family planning programme is found very nominal in percentage i.e. 2.7 percent only. This is because the household amenities including electricity and the mode of transportation or communication in the Char area are very poor. Higher percentage of illiteracy, poverty and also social customs and religiosity amongst the Muslim in the Char area have been identified as the main reasons of poor exposure and poor social interactions amongst the women in the Char area. On the other hand, the exposure to mass media in our sample study is found above 96.0 percent

amongst the ST, SC and the General Caste Hindu women and it was just below 90.0 percent amongst the Muslim women (excluding the Char inhabitants).

It is observed during the field survey that 86.5 percent of the 724 currently married women in our sample study had the accessibility to the source of family planning within 3 kilometres. However, it is found above 90.0 percent amongst the ST (Bodo), SC, General Caste Hindu women while, above 88 percent amongst the Muslim women in the main land area and only 23.5 percent in case of the Char women.

3.3.B DEMOGRAPHIC ATTRIBUTES: TRIBAL, NON-TRIBAL AND CHAR WOMEN.

Differential demographic attributes of the tribal, non-tribal and Char women have been presented in the Table-3.3.B below.

Table-3.3.B shows the differential demographic attributes of the Tribal i.e. ST (Bodo) women, the non-tribal women (SC, General Caste Hindu and Muslim) and the Char women. It is also observed from Table-3.3 that the current mean age of 724 currently married women with at least one living child is 31years. The estimated current mean age is found lowest (i.e. 25 years) in case of the Char women while, it is found highest (i.e. 33 years) in case of the General Caste Hindu women. The estimated current mean age of the ST women is 31 years. The estimated mean age of the SC and Muslim women are found to be equal (i.e. 30 years).

Table-3.3.B

Differential Demographic Attributes: Tribal, Non-Tribal and Char Women

Demographic Background	Tribal	Non-Tribal			Char inhabi -tant	Total
	ST	SC	General Caste Hindu	Muslim	Char	
Mean age of respondents (in years)	31	30	33	30	25	31
Mean age at marriage (in years)	19	18	21	18	15	19
Mean age at 1st birth of child (in years)	19	19	22	19	15	19.8
Mean number of living Children	4	3	2	3	3	3
Abortion (%)	76.1	46.0	31.1	55.2	79.4	50.4
Loss of at least one Child (%)	39.9	21.2	13.1	33.6	60.3	27.2
Use of Family Planning:						
Total Users (%)	51.4	68.1	62.3	60.2	7.4	55.4
Total Non –Users (%)	48.6	31.9	37.7	39.8	92.6	44.6
Use of Contraception by Methods:						
Female Sterilization (%)	57.7	33.8	9.4	2.9	--	21.4
Oral Pill (%)	23.9	51.9	62.8	55.9	100.0	58.1
Condom (%)	2.8	2.6	20.0	2.9	--	10.5
Today (%)	--	--	1.1	13.2	--	2.7
Coper-T (%)	4.2	--	2.8	--	--	2.0
Con. Herbs. (%)	11.3	2.6	--	10.3	--	4.3
Withdrawal (%)	--	9.1	3.9	14.7	--	6.0

Source: sample survey of the present study.

The mean age at marriage of 724 currently married women in our sample study is 19 years, which is just one year above the legal age at marriage for girls i.e. 18 years. In the Char area, where child marriage is a common practice, the mean age at marriage is found to be the least (i.e.15 years) while, it is found to be the highest amongst General Caste Hindu women (i.e. 21 years). Amongst the ST (Bodo) women, it is 19 years and in .

case of the SC and the Muslim women, it is found to be equal to the legal age at marriage for girls (i.e.18 years).

Except the General Caste Hindu women, the mean age at birth of the first child of respondents is found below 20 years (i.e. 19 years). The mean age at the birth of the first child is found to be highest amongst the General Caste Hindu women (i.e. 22 years) and lowest amongst the Char women (i.e.15 years).

Lowest mean age at marriage and lower mean age at the birth of the first child amongst the Char women followed by the SC and the Muslim and the ST women in our sample study have resulted in higher proportions of multiple pregnancies and hence higher abortions. Thus, it is found that half of 724 currently married women in our sample study have the experience of abortions (induced or spontaneous). In the Char area, the proportion of abortions (spontaneous) is found highest (i.e. 79 percent). Induced abortion is not a common practice in the char area. It is against the religion. The proportion of abortion (both spontaneous and induced) is found to be the least amongst the General Caste Hindu women (i.e.31percent). Amongst the ST, it is found to be 76 percent and amongst the SC women and the Muslim women, it is found to be 46 percent and 55 percent respectively.

A preference for a larger family (at least for 3 children) has been observed amongst the educated Bodo women in the urban area. Present ethnic clashes between Bodos and non-Bodos and the formation of Bodoland have raised the demand for larger families amongst the Bodo to prove their

majority in the near future. Thus, the mean number of living children of currently married ST women in our sample study, is found highest i.e. 4 children. In the Char area, where practice of family planning is regarded as unreligious, the practice of polygamy marriage, early marriage and larger number of children in a family without any spacing are common. In our field study, the mean number of living children of the Char women is, however found 3, which is also equal to the mean number of living children of the SC and Muslim women but, less than that of the ST women (i.e. 4). The lower current mean age, mean age at marriage and the mean age at the birth of first child for the Char women account for higher number of expected birth of children. This reflects on the poor reproductive health of currently married women in our sample study, especially in the Char area. The mean number of living children is found to be least amongst the General Caste Hindu woman (i.e. 2).

Poor reproductive health also accounts for higher child death. 27 percent of the total of 724 currently married women in our sample study has experienced the death of at least one child. The proportion of women who have experienced loss of at least one child has been found to be highest amongst the Char women (i.e. 60 percent) followed by ST (Bodo) women (40 percent) and the Muslim women (i.e. 34 percent) SC women (i.e. 21 percent). Amongst the General Caste Hindu women, it is found to be the least (i.e. 13 percent).

It is observed that the current use of contraception is highest amongst 113 SC women (i.e. 68 percent), followed by 62 percent amongst

289 General Caste Hindu women, 60 percent amongst 116 Muslim women and 51.4 percent amongst the ST Women but it is found nominal amongst the Char women i.e.7.4 percent. The use of modern spacing method is higher amongst the non-tribal group of women, while it is lower amongst the tribal i.e. the ST women in the district. Generally, lack of awareness, poverty, incentives for undergoing sterilization, have been considered as the contributory factors for accepting the female sterilization than for opting for modern spacing methods (Basu. Kapoor. and Basu. 2004).

However, oral pill is the only method in use amongst the small number of total users (i.e. 5) in the Char area. The largest proportion of users of oral pill in the main land area are found in the General Caste Hindu (i.e. 62.8 percent) while, it is more than 40 percent amongst the SC and the Muslim women and it is about 24 percent amongst the ST women. Condom, the only method of male contraceptive found in use is highest amongst the General Caste Hindu women (i.e. 20.0 percent) while, in case of other groups of respondents i.e. the ST, the SC and the Muslim it is only 3 percent. The use of injectable method (like Today) is found to be highest i.e.13.2 percent amongst the Muslim women and the use of Coper-T is found comparatively highest amongst the ST (i.e. 4.2 percent).

The use of other methods (the traditional methods) in our sample study of 724 currently married women is found to be nominal in percentage (i.e.10.3 percent). It is highest amongst the Muslim women (i.e. 25 percent), followed by the ST (i.e. 11 percent) and the General Caste Hindu women (i.e. 2.8 percent) and the SC (i.e. 2.6 percent). Availability of modern amenities

like, radio, television in the tribal villages and non-tribal villages (except the Char villages) has however increased the awareness of family planning amongst the couples in the rural area. As such, most of the couples, except few, rely on the modern methods of contraception and less on traditional methods because of the chance of method failure and the complicacy that may arise in the case of the traditional methods. But, unsystematic ways of motivation for modern spacing method and non availability of supplementary vitamins to poor rural women to neutralise the side effects of the oral pill like, Mala-D etc. have resulted in a large scale irregular users and unmet need amongst the women in the rural area.

It can be inferred from the above analysis of the socio-economic and demographic characteristics of the tribal, non-tribal and char women in our sample study that the financial incentive to the beneficiaries of female sterilization played an important role in influencing the Bodo couples to adopt female sterilization in the district. This finding of the present study is in conformity with that of the studies where the ignorance, credulity and poverty of the tribal population have been identified as the major contributory factors responsible for the higher acceptance of female sterilization among them (Bose,1994; Basu, Kapoor and Basu, 2004). On the other hand, the Bodo women find the modern spacing method more complicated and costlier. It is also observed in the field study that because of the provision of financial incentive to the motivators, the health workers like ASHA/ANM give more stress on motivating the couples (especially the couples in the backward areas i.e. the SC and ST couples) to opt for female sterilization instead of the

151

modern spacing method. Thus, the lack of awareness and non-accessibility to the contraception are the prime factors that deny the freedom of choice of contraception to the poor illiterate women in the rural area. On the other hand, the General Caste Hindu women are more inclined towards the modern spacing method. In the char area, the use of contraceptive is regarded as against the religion and hence, the current use of contraception is found very nominal.

3.4. DECISION REGARDING REPRODUCTION AND USE OF CONTRACEPTION

The decision making power regarding the childbirth and the choice of contraception, particularly in a stereo type male dominated society lies with the husband. Many studies show that women's silent concurrence or lack of protest is interpreted as having been arrived at joint decision. It is seen generally that women neither question the decision of their husbands nor enter into any discussion with them (Khan and Patel, 1996).

Social and cultural factors including the gender norms, condition women's reproductive intentions i.e. the number of children they actually want and how they want their births to be spaced. Women often do not get the support that they need to fulfil their reproductive intentions and hence, have an insignificant role in decision making process regarding the number of children that they give birth to (Barneett and Stein, 2000; Padma, 2005). It has been observed that the total fertility rate in many countries would have decreased by one child per women, if the women could have the total number of children that they wanted (Padma, 2005).

3.4.A DECISION REGARDING TOTAL NUMBER OF CHILDREN

In our field study, as shown in the Table-3.4 below, it is revealed that a smaller proportion (i.e. 6.5 percent) of 724 currently married women report that the decision regarding the total number of child bearing is decided by themselves while, major proportion (i.e. 67.4 percent) are jointly decided and the rest (i.e. 26.1percent) are decided by the husbands. The same trend is observed in case of the SC and General Caste Hindu women. But, the ST, Muslim and the Char women show different trends. More than half

Table-3.4.

Decision Regarding Total Number of Children:
Tribal, Non-Tribal and Char Women

	Tribal	Non-Tribal			Char Inhabitant	Total
	ST (Bodo)	SC	General Caste Hindu	Muslim	Char	
Husband Oriented	28 (20.3%)	19 (16.8%)	11 (3.8%)	63 (54.3%)	68 (100.0%)	189 (26.1%)
Wife oriented	40 (29.0%)	3 (2.7%)	4 (1.4%)	–	–	47 (6.5%)
Joint Decision	70 (50.7%)	91 (80.5%)	274 (94.8%)	53 (45.7%)	–	488 (67.4%)
Total	138 (100.0%)	113 (100.0%)	289 (100.0%)	116 (100.0%)	68 (100.0%)	724 (100.0%)

Source: sample survey of the present study.

i.e. 54.3 percent of the decisions among the Muslim are husband oriented and the rest 45.7 percent are joint decision. A cent percent husband oriented decision has been observed in the Char area. On the other hand, larger participations (29.0 percent) of ST women, in the decision making process

regarding the total number of child bearing, have been observed as against the proportion of husband oriented decision i.e. 20.3 percent.

3.4.B. DECISION REGARDING TOTAL NUMBERS OF SONS AND DAUGHTERS:

Table- 3.5 shows that a major proportion (i.e. 60.0 percent) of the decision regarding the total number of living sons or daughters that the couples actually want to have, is joint decision while, 29.6 percent are found husband oriented and the rest i.e. 10.9 percent are wife oriented. The same trend is observed in case of the SC and General Caste Hindu women. Exception is found amongst the ST (Bodo), Muslim and the char women. In the char area, 100.0 percent is husband oriented while, amongst the Muslim women in the main land of the district, comparatively a higher proportion of

Table-3.5.

Decision Regarding Total Number of Sons and Daughters: Tribal, Non-Tribal and the Char Women

	Tribal	Non-Tribal			Char Inhabi-tants	
	ST (Bodo)	SC	General Caste Hindu	Muslim	Char	Total
Husband Oriented	14 (10.1%)	27 (23.9%)	32 (11.1%)	73 (62.9%)	68 (100.0%)	214 (29.6%)
Wife Oriented	58 (42.0%)	10 (8.8%)	11 (3.8%)	—	—	79 (10.9%)
Joint Decision	66 (47.8%)	76 (67.3%)	246 (85.1%)	43 (37.1%)	0 —	431 (59.5%)
Total	138 (100.0%)	113 (100.0%)	289 (100.0%)	116 (100.0%)	68 (100.0%)	724 (100.0%)

Source: sample survey of the present study.

154

the decision (i.e. 62.9 percent) is husband oriented and the rest (37.1 percent) are jointly decided. On the other hand, 42.0 percent of the ST women (i.e. 2 in every 5 ST women) have the decision making power regarding the total number of sons or daughters that they intend to give birth to.

3.4.C. DECISION REGARDING SPACING BETWEEN TWO CHILDREN:

Most of the decisions regarding the spacing between the children amongst the 724 currently married women are also found joint decision (i.e.56 percent) and 28.7 percent are husband oriented while, a nominal proportion (i.e. 15.2 percent) is wife oriented (Table-3.6).

Table-3.6.

Decisions Regarding Spacing between Children:
Tribal, Non-Tribal and Char Women.

	Tribal	Non-Tribal			Char Inhabitant	
	ST (Bodo)	SC	General Caste Hindu	Muslim	Char	Total
Husband Oriented	4 (2.9%)	29 (25.7%)	29 (10.0%)	79 (68.1%)	68 (100.0%)	209 (28.7%)
Wife oriented	82 (59.4%)	6 (5.3%)	22 (7.6%)	– --	– --	110 (15.2%)
Joint Decision	52 (37.7%)	78 (69.0%)	238 (82.4%)	37 (31.9%)	–	405 (55.9%)
Total	138 (100.0%)	113 (100.0%)	289 (100.0%)	116 (100.0%)	68 (100.0%)	724 (100.0%)

Source: sample survey of the present study.

The wife oriented decision regarding the space between the two children is 2.9 percent amongst the SC and 7.6 percent amongst General Caste Hindu while, it is found nil in case of the Muslim and the Char women.

Nominal proportion (i.e. 15.2 percent) is wife oriented (Table-3.6). The wife oriented decision regarding the space between the two children is 2.9 percent amongst the SC and 7.6 percent amongst General Caste Hindu while, it is found nil in case of the Muslim and the Char women. On the other hand, a larger proportion of decision (i.e. 59.4 percent) amongst the tribal i.e. ST (Bodo) regarding the spacing between the births of two children is wife oriented.

It is worthwhile to notice that the proportion of husband oriented decision amongst the SC and the General Caste Hindu women are comparatively less in percentage than that of the Muslim. In the Char area, women do not have the decision making power. They follow the decision of the husbands or the male members of the family. In case of the Muslim, above 30 percent of women report that they participate jointly with their husbands in the reproductive decision making process. On the contrary, ST women have a higher participation in the fertility related decision-making process.

3.4.D. DECISION REGARDING CHOICE OF CONTRACEPTION:

Table-3.7 shows that 33.9 percent of the total use of contraceptive, in case of 401 currently married women using contraception in our sample study, is husband oriented while, 17.0 percent are wife oriented and the rest i.e. 49.1 percent is joint decision.

However, comparatively a higher proportion of ST women (23.9 percent) compared to non-ST women reported the choice and the use of

contraceptive is wife oriented. Amongst the Muslim half of the total decisions regarding the use of contraception is husband oriented while, a nominal proportion (i.e.2.9 percent) is wife oriented and 47.3 percent are joint decision.

Table-3.7

Decision Regarding Choice of Contraception: Tribal, Non-Tribal and the Char Women

	Tribal	Non-Tribal			Char Inhabitant	Total
	ST	SC	General Caste Hindu	Muslim	Char	
Husband Oriented	22 (31.0%)	21 (27.3%)	59 (32.8%)	34 (50.0%)	–	136 (33.9%)
Wife Oriented	17 (23.9%)	10 (13.0%)	34 (18.9%)	2 (2.9%)	5 (100.0%)	68 (17.0%)
Joint Decision	32 45.0%	46 59.7%	87 48.3%	32 47.1%	-- --	197 (49.1%)
Total	71 (100.0%)	77 (100.0%)	180 (100.0%)	68 (100.0%)	5 (100.0%)	401 (100.0%)

Source: sample survey of the present study.

On the other hand, cent percent use of the contraceptive in the Char area is wife oriented. During the field study in the Char area it is observed that the women in the Char area are exhausted of multiple pregnancies and have a poor reproductive health. Recently, the visit of the health workers and the least development in the roadways linking the Char to the main land (in a few Char areas nearer to the town), have helped in imparting the knowledge of contraception amongst the Char women particularly, amongst the women belonging to the younger age group. Thus, a few number of women (5) in the Char area using contraception (oral pill)

are found desperate to get rid of multiple pregnancies and hence have opted for contraception without the knowledge of their husbands.

3.4. E. DECISION REGARDING THE CHOICE OF STERILIZATION:

In our field study it is observed that 27.9 percent decisions of the total use of sterilization (86) are husband oriented while, 25.6 percent and 48.8 percent are wife oriented and the outcome of joint decision respectively (Table- 3.8). As regards the decision regarding the use of female sterilization to limit the size of family amongst ST (Bodo) community 34.1 percent are found to be wife oriented, 17.1 percent are husband oriented and 48.8 percent are the outcome of joint decision. The socio-economic status of women in the tribal society is comparatively higher and in certain spheres of the socio-economic life they take active part in decision making process.

Table-3.8.

Decision Regarding the Choice of Sterilization:
Tribal Non-Tribal and Women.

	Tribal	Non-Tribal			Total
	ST	SC	General Caste Hindu	Muslim	
Husband oriented	7 (17.1%)	8 (30.8%)	7 (41.2%)	2 (100.0%)	24 (27.9%)
Wife oriented	14 (34.1%)	8 (30.8%)	—	0	22 (25.6%)
Joint Decision	20 (48.8%)	10 (38.5%)	10 (58.8%)	—	42 (48.8%)
Total	41 (100.0%)	26 (100.0%)	17 (100.0%)	2 (100.0%)	86 (100.0%)

source: sample survey of the present study.

On the contrary, the proportion of husband oriented and wife oriented decision regarding the use of sterilization are found equal in percentage i.e. 30.8 percent. It is observed that the husbands of the less educated or illiterate and poor women belonging to the SC community are less concerned about the family and dependent on the earnings of the wives. In such cases to get rid of multiple pregnancies women often opt for the terminal method so that they can give much time for their work outside the home for their livelihood. On the other hand, amongst the General Caste Hindu women out of the total use of sterilization (17) major proportions i.e. 41.2 percent and 58.8 percent are found husband oriented and joint decision while, wife oriented decision is found nil. On the contrary, in a traditional male dominated Muslim society within the limited use of sterilization (2) in the urban area 100.0% are the husband oriented.

3.5 CONCLUSION

Thus, from the above discussion it follows that the decision making power of women largely depends on the social and cultural norms of the society within which the women live in. The decision regarding the number of children and the use of family planning irrespective of caste and religion, more or less lies with the husband in our society. Due to the unequal status of women in a traditional male dominated society women hesitate to take part in decision making process. But, exception is observed in the tribal (Bodo) society. Bodo women have been observed to have more autonomy in the choice of contraception and to decide the size or number of children (son

159

or daughter). On the other hand, women in the other community including the privileged General Caste Hindu women are found to have less autonomy in the reproductive decision making process compared to their tribal counter parts. Women in the Muslim society are tightly bound by the traditional norms and culture and the male folk play the leading role in the decision making process. The Char women have no say in the decision making regarding the number of children and the use of contraceptive. But, Muslim women with better socio-economic and demographic background compared to the Char women, are found to participate jointly with the husband in certain spheres of reproductive decision making and a few take decision regarding the choice of contraception (spacing method). It is also observed that amongst the poor, illiterate or less educated and working women, the decision regarding the choice of terminal method to limit the size of the family lies with the women as they have the financial autonomy.

Hence, finally it can be concluded that with the spread of education and urbanisation, the traditional cultural values of the society undergo a change. Female education and economic empowerment of women are the prime pillars of capacity building in women. This ensures greater participation of women in the decision making process including the reproductive decision and hence, the freedom of choice and equal right to women.

****

3.6: PRESENTATION OF DATA BY FIGURES:

Figure:3.6.1: Percentage Distribution of Literate Respondents by Tribal, Non-tribal and Char women.
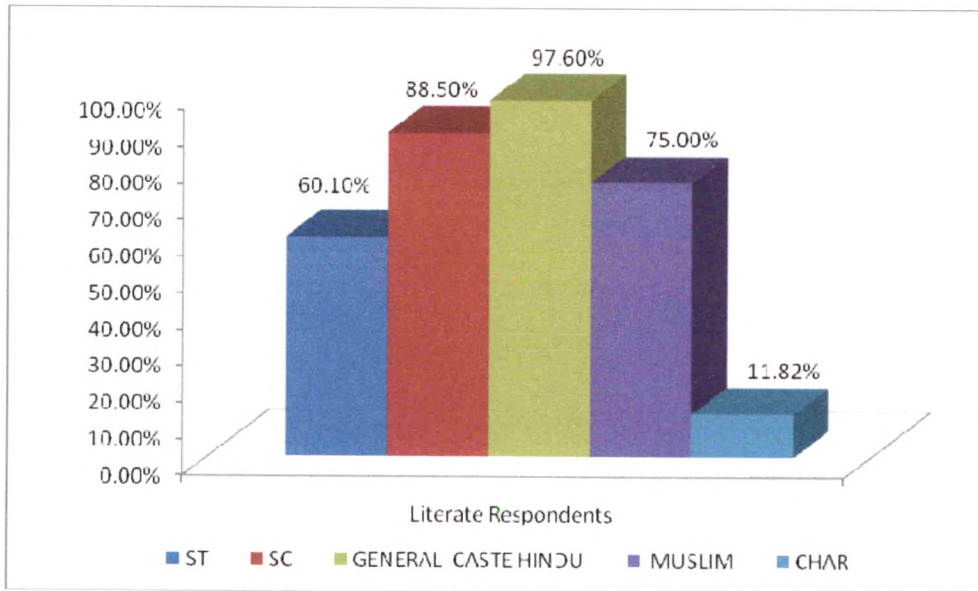
Figure: 3.6.2 : Percentage Distribution of Literate Husbands by Tribal, Non-tribal and Char women.
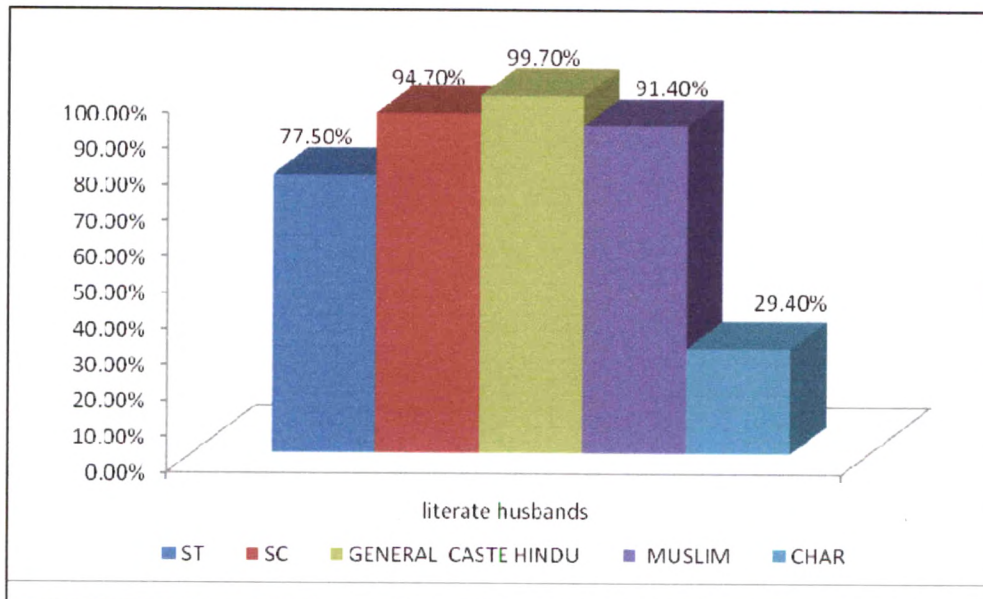
Figure:3.6.3: Selected Differential Demographic Attributes amongTribal, Non-tribal and Char women.
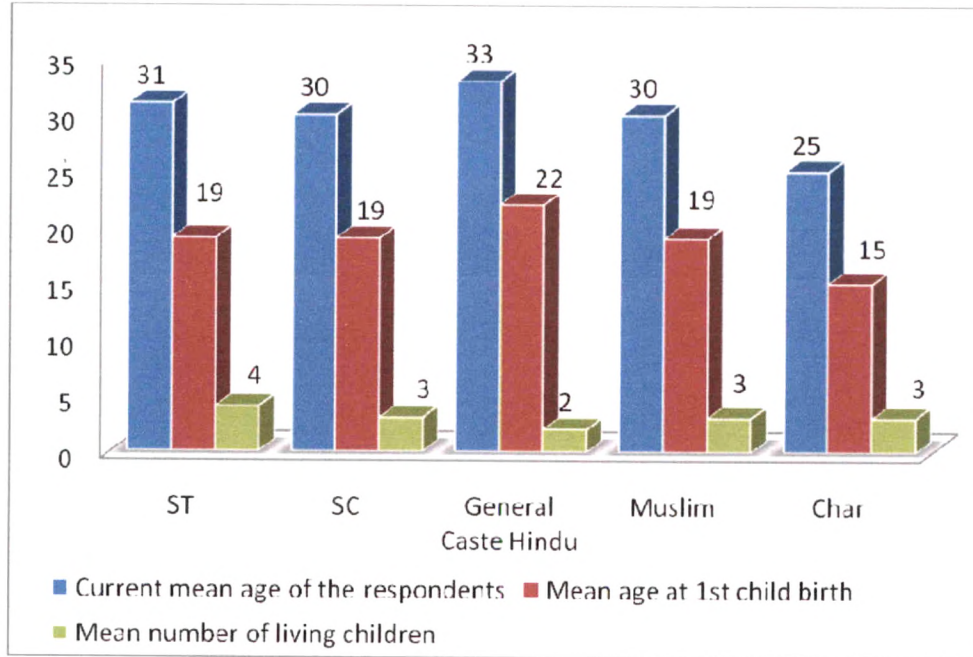
Figure: 3.6.4 Percentage Distribution of Total Abortions by Tribal, Non-tribal and Char women.
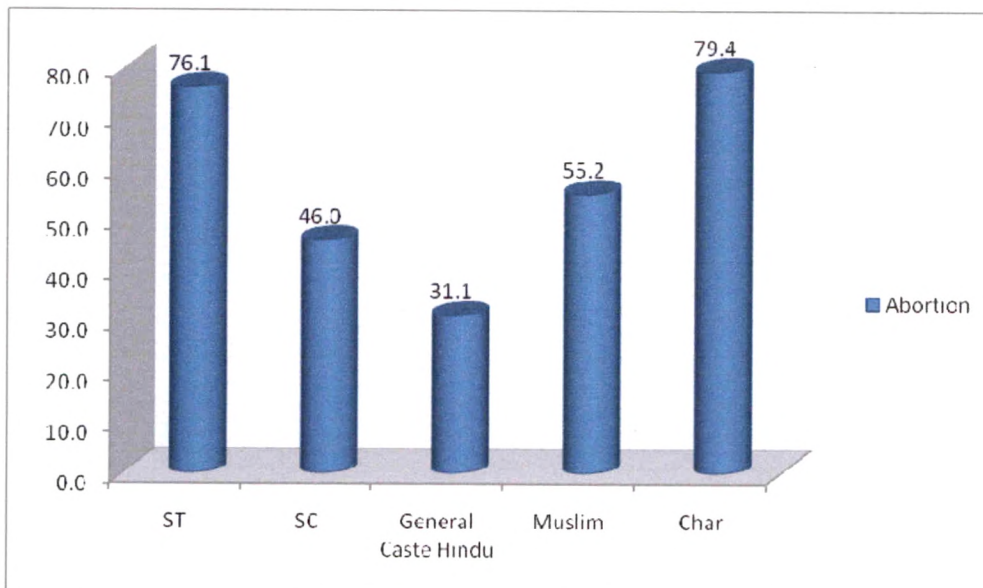
Figure: 3.6.5: Percentage Distribution of Users and Non-Users by Tribal, Non-tribal and Char women.
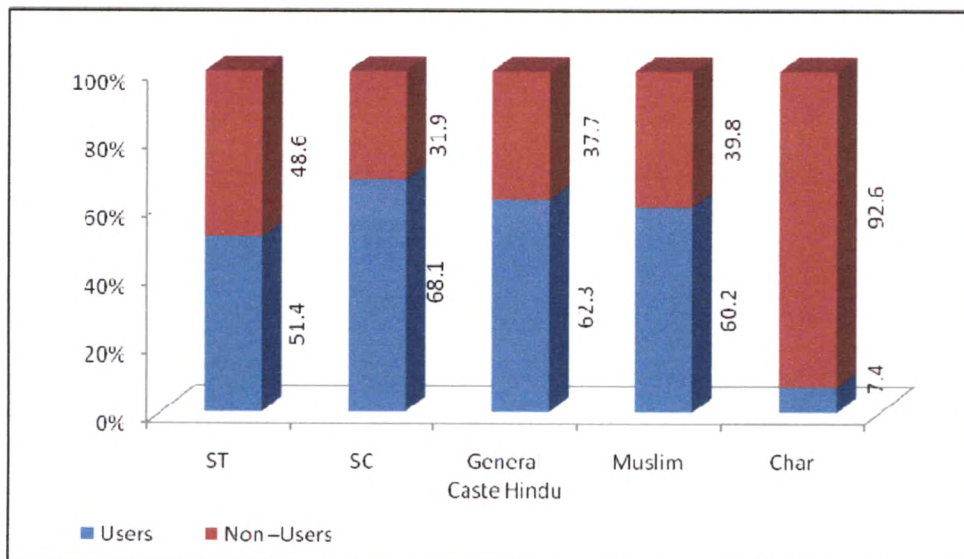
Figure 3.6.6: Percentage of Users of Contraception by Methods : Tribal, Non-Tribal and Char Women

****

163
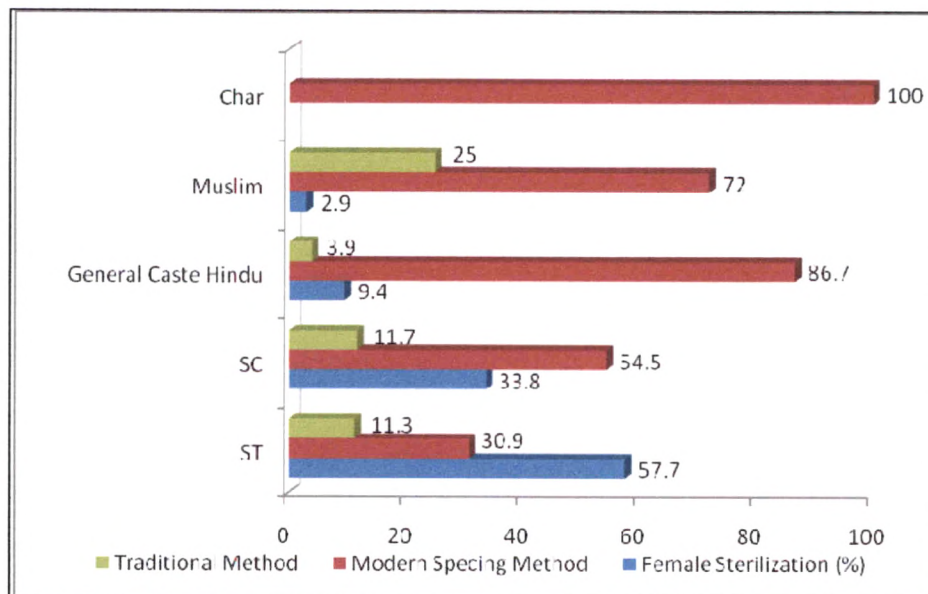
CHAPTER 4

RURAL-URBAN DIFFERENTIALS
IN
ACCEPTANCE OF CONTRACEPTION

4.1. INTRODUCTION

The emergence of new scientific methods of contraception in the late fifties has, however, brought a revolutionary change in the use of contraception and reproductive life of the couples. Modern scientific methods of contraception, thus, helped the couples to plan the birth of their children and thereby to limit the size of the family more effectively. Since the adoption of family planning programmes in 1951 in India, various efforts have been made by both the Central and the State Governments to promote the knowledge and the use of contraceptive through various family planning programmes. As a result, the knowledge of family planning methods has been observed to increase but the proper knowledge of the device and the use of contraceptives are still awaited.

In our sample study, though the knowledge of family planning methods has been observed to be above 90 percent of the targeted population, yet the correct use of contraceptive as a whole, in the Darrang district, is not satisfactory. Couple's knowledge about the use of contraception is found full of misconception, particularly in the rural area. Consequently, the use of contraception has been observed to vary widely with respect to the place of residence. In this section of the present study, we will discuss the total use of contraception in the rural and urban undivided Darrang district of Assam.

4.2. TOTAL CURRENT USERS BY RURAL-URBAN BACKGROUND: TRIBAL, NON-TRIBAL AND CHAR WOMEN.

Imbalanced regional development and emphasis on focused urbanisation in India have been identified as the prime causes of the differences in rural-urban socio-economic infrastructure. This has a direct impact on the socio-economic life of the couple and hence on the behaviour. Couples have comparatively limited choice for and access to family planning in the rural area. This is because, in rural milieu modern ideas and values have not permeated and hence it is not conducive for the couples to accept the small family norm. On the other hand, higher aspiration for life, modern values and ideas in the urban area along with higher opportunity cost of rearing children, easy access to information and facilities motivate the couples to adopt small family (Srikant el.al.1988, Kaur 1976; Kurup, 1984, Khan and Gupta, 1985; Reddy, 1984). Hence, place of residence has been considered to be one of the most important variables influencing the fertility behaviour of the couples.

The rural-urban percentage distribution of the current users by tribal, non-tribal and Char women shown in the Table- 4.1 exhibits that the highest proportion (i.e.87.0) of currently married women in the urban area, using contraception at present, belong to the ST (Bodos) community while it ranges from 65 percent to 69 percent amongst the non-tribal women in the urban area.

Table-4.1.

Percentage Distribution of the Total Users and Nonusers by Rural/Urban background: Tribal, Non – Tribal and Char Women

U/R		Tribal	Non-Tribal			Char Inhabi- tants	Total
		ST	SC	General Caste Hindu	Muslim	Char	
Urban	Users	20 (87.0%)	47 (65.3%)	109 (67.7%)	29 (69.0%)	— —	205 (68.8%)
Urban	Non- Users	3 (13.0%)	25 (34.7%)	52 (32.3%)	13 (31.0%)	— —	93 (31.2%)
Urban	Total	23 (100.0%)	72 (100.0%)	161 (100.0%)	42 (100.0%)	—	298 (100.0%)
Rural	Users	51 (44.3%)	30 (73.1%)	71 (55.5%)	39 (52.7%)	5 (7.3%)	196 (46.0%)
Rural	Non- Users	64 (55.7%)	11 (26.8%)	57 (44.5%)	35 (47.3%)	63 (92.6%)	230 (54.0%)
Rural	Total	115 (100.0%)	41 (100.0%)	128 (100.0%)	74 (100.0%)	68 (100.0%)	426 (100.0%)

Source: sample survey of the present study.

In the rural area the proportion of currently married women, using contraception at present is found highest amongst the SC women (73 percent) while it is found 55.5 percent amongst General Caste Hindu, 52 percent amongst Muslim, below 45 percent amongst the ST and the least 7 percent amongst the Char women .

4.3. RURAL-URBAN CONTRACEPTIVE USE BY MODERN AND TRADITIONAL METHODS: TRIBAL, NON-TRIBAL AND CHAR WOMEN.

Table-4.2 shows that the users of modern scientific method amongst 401 total current users in our sample study are higher in both urban and rural areas. But, in the urban area, the proportion of users of modern

scientific method of contraception (i.e. 94.1percent) is comparatively higher than that in the rural area (i.e. 85.2 percent). A small proportion of respondents is observed to use other methods (i.e. traditional methods) but the use of traditional method is found comparatively higher (i.e. 14.8 percent) in the rural area than that in the urban area (i.e. 5.9 percent). During the interaction with the respondents it has been observed that rural respondents though prefer traditional method are not sure about the effective use of the method as they lack the proper knowledge of it. As a consequence, they often experience method-failure and are not using any method at present.

Table-4.2.

Percentage Distribution of the Total Users of Contraceptive by Methods: Rural/Urban

U/R		Tribal	Non -Tribal			Char Inhabi-tants	Total
	Methods of Contraception	ST	SC	General Caste Hindu	Muslim	Char	
Urban	Modern Methods	20 (100.0)	42 (89.3)	105 (96.3)	26 (89.7)	–	193 (94.1)
Urban	Traditional Methods	–	5 (10.6)	4 (3.7)	3 (10.3)	–	12 (5.9)
Urban	Total	20 (100.0)	47 100.0	109 (100.0)	29 (100.0)	–	205 (100.0)
Rural	Modern Methods	43 (84.3)	26 (86.7)	68 (95.8)	25 (64.1)	5 (100.0)	167 (85.2)
Rural	Traditional Methods	8 (15.7)	4 (13.3)	3 (4.2)	14 (40.0)	0 –	29 (14.8)
Rural	Total	51 (100.0)	30 (100.0)	71 (100.0)	39 (100.0)	5 (100.0)	196 (100.0)

Note: figures in the parentheses represent percentage
Source: sample survey of the present study.

They want to opt for modern scientific method, but because of other reasons, such as fear of side effects, lack of knowledge, non-accessibility to the measures, social taboos or religious constraint, cannot adopt the modern family planning measures.

The use of modern methods of contraception in our sample study is found to be highest in percentage amongst the ST (Bodo) in the urban area (i.e. 100.0 percent) while, it is to be found highest amongst the General Caste Hindu in the rural area (i.e. 95.8 percent). The rural–urban differences in the proportional use of the methods of contraception are found significant amongst the ST and Muslim respondents, exception being the SC and the General Caste Hindu respondents. The use of other methods is found to be comparatively higher amongst the Muslim (i.e. 10.3 percent in the urban area and 40.0 percent in the rural area) while, it is found to be least amongst General Caste Hindu (i.e. 3.7 percent in the urban area and 4.2 percent in the rural area). In the Char area, the only method in use is the modern spacing method (i.e. the oral pill) and hence the use of modern contraceptive is found highest in percentage amongst the Char respondents (i.e. 100.0 percent out of a small total of 5 users).

4.4. SOCIO – ECONOMIC AND DEMOGRAPHIC PROFILE OF THE TOTAL USERS: RURAL / URBAN

Rural –Urban differentials in the acceptance of contraception by socio-economic and demographic variables are presented in the Table-4.3.

It is observed from Table-4.3 that the use of contraception has increased with the increase in the age of the women in both urban and rural areas. Women in the higher or at the middle of their reproductive age (i.e. above 30 years) are generally found to opt for contraception to limit the childbearing. Women in this age group are often observed to attain their desired goal of family size. In our sample study, rural-urban differentials in the use of contraception with respect to the current age of the respondents are found very marginal. In the urban area the proportion of current users in the age group 15-19 years are 1.0 percent (out of 205 total users) while, the rest 16.6 percent, 33.7 percent 21.0 percent, 27.8 percent are in the current age categories of 20-24 years, 25-29 years, 30-34 years, 35-39 years and above respectively. In the rural area the proportions of the total users in the respective current age categories are 13.3 percent, 28.6 percent, 21.4 percent, 23 percent and 9.7 percent. Thus, there is a marginal difference in the estimated mean age of the current users in our sample study (i.e. 30.2 years in the urban area and 30. 4 years in the rural area).

The use of contraception is highly influenced by education. It is observed that in the urban area the use of contraception is 12 times more when the respondents have attained education below matriculation than the respondents with no education (i.e. 3.9 percent). But, after a certain level of education i.e. up to matriculation or higher secondary and above, the proportion of the respondents using contraception are observed to decrease. A similar trend is also found in the rural area.

Table - 4.3.

Percentage Distribution of the Total Users of Contraception (Modern and Traditional) by Socio – Economic and Demographic Attributes: Rural/ Urban.

Socio–Economic And Demographic Variables	Urban	Rural	Total
Current Age of Respondents:			
15 – 19 years	2 (1.0%)	—	2 (0.5%)
20 – 24 years	34 (16.6%)	32 (16.3%)	66 (16.5%)
25 – 29 years	69 (33.7%)	57 (29.1%)	126 (31.4%)
30 – 34 years	43 (21.0%)	47 (24.4%)	90 (22.4%)
35 years and above	57 (27.8%)	60 (30.6%)	117 (29.2%)
Total	205 (100.0%)	196 (100.0%)	401(100.0%)
Educational Status of Respondents:			
Illiterate	8 (3.9%)	52 (26.5%)	60 (15.0%)
Up to primary	26 (12.7%)	38 (19.4%)	64 (16.0%)
Below matriculation	99 (48.3%)	58 (29.6%)	157 (39.2%)
Up to matriculation/HS	34 (16.6%)	24 (12.2%)	58 (14.5%)
Graduation & above	38 (18.5%)	24 (12.2%)	62 (15.5%)
Total	205 (100.0%)	196 (100.0%)	401(100.0%)
Educational Status of Husbands:			
Illiterate	3 (1.5%)	25 (12.8%)	28 (7.0%)
Up to primary	13 (6.3%)	31 (15.8%)	44 (11.0%)
Under matriculation	58 (28.3%)	57 (29.1%)	115 (28.7%)
Up to matriculation	63 (30.7%)	34 (18.0%)	97 (24.2%)
Graduation and above	68 (33.2%)	49 (25.0%)	117 (29.2%)
Total	205 (100.0%)	196 (100.0%)	401 (100.0%)
Respondents' Occupation:			
House wives:	133 (64.9%)	167 (85.2%)	300 (74.8%)
Daily wage-earner	11 (5.3%)	3 (1.5%)	14 (3.5%)
Service-holders	61 (29.8%)	26 (13.3%)	87 (21.7%)
Total	205 (100%)	196 (100.0%)	401 (100.0%)
Husbands' Occupation:			
Farmers	3 (1.5%)	57 (29.1%)	60 (15.0%)
Self- employed /Traders	95 (46.3%)	57 (29.1%)	152 (37.9%)
Service-holders	107 (52.2%)	72 (36.7%)	179 (44.6%)
Daily wage-earners	–	10 (5.1%)	10 (2.5%)
Total	205 (100.0%)	196 (100.0%)	401 (100.0%)
Income Status:			
Less than Rs. 5000/-	30 (14.6%)	55 (26.8%)	85 (21.2%)
Rs.5000/- to Rs.10,000/-	49 (23.9%)	53 (27.0%)	102 (25.4%)
Rs.10,000/- to Rs.20,000/-	54 (26.3%)	26 (13.3%)	80 (20.0%)
Rs.20,000/- and above	72 (35.1%)	62 (30.2%)	134 (33.4%)
Total	205 (100.0%)	196 (100.0%)	401(100.0%)

Expenditure Status:			
Less than Rs. 5,000/-	58 (28.3%)	107 (54.6%)	165 (41.1%)
Rs. 5000/- to Rs. 10,000/-	74 (36.1%)	41 (20.9%)	115 (28.7%)
Rs. 10,000/- to Rs. 20,000/-	59 (28.8%)	43 (21.9%)	102 (25.4%)
Rs. 20,000/- and above.	14 (6.8%)	5 (2.6%)	19 (4.7%)
Total	205 (100.0%)	196 (100.0%)	401(100.0%)
Total No. of children			
1 child	10 (4.3%)	8 (4.1%)	18 (4.5%)
2 children	105 (56.1%)	52 (26.5%)	157 (39.2%)
3 + children	90 (43.9%)	136 (69.4%)	226 (56.4%)
Total	205 (100.0%)	196 (100.0%)	401(100.0%)
Mean no. of children	**2.39**	**2.65**	**2.51**
No of living sons:			
0 son	13 (6.3%)	14 (7.1%)	27 (6.7%)
1 son	93 (45.4%)	68 (40.2%)	161 (40.1%)
2 sons	96 (46.8%)	82 (41.8%)	178 (44.4%)
3 + sons	3 (1.5%)	32 (16.3%)	35 (8.7%)
Total:	205 (100.0%)	196 (100.0%)	401 (100.0%)
No. of living daughters:			
0 daughter	59 (30.7%)	33 (16.8%)	92 (22.9%)
1 daughter	77 (37.6%)	74 (37.8%)	151 (37.7%)
2 + daughters	89 (45.8%)	89 (45.4%)	158 (39.4%)
Total	205 (100.0%)	196 (100.0%)	401(100.0%)
Accessibility to source of Family Planning:			
1 - 2 Km.	81 (39.5%)	128 (65.3%)	209 (52.1%)
3 – 4 Km.	67 (32.7%)	60 (30.6%)	127 (31.7%)
5 – 6 Km.	57 (27.8%)	6 (3.1%)	63 (15.7%)
7 – 8 Km and above	–	2 (1.0%)	2 (0.5%)
Total:	205 (100.0%)	196 (100.0%)	401(100.0%)
Husband-wife discussion:			
Yes:	170 (82.9%)	131 (66.8%)	301 (75.1%)
No:	35 (17.5%)	65 (33.2%)	100 (24.9%)
Total:	205 (100.0%)	196 (100.0%)	401 (100.0%)
Motivated Use:			
Respondents :	56 (27.3%)	44 (22.4%)	100 (24.9%)
Husband:	116 (56.6%)	64 (32.7%)	180 (44.9%)
Rélatives:	33 (16.1%)	14 (7.1%)	47 (11.7%)
ANM/ASHA:	–	74 (37.8%)	74 (18.5%)
Total:	205 (100.0%)	196 (100.0%)	401 (100.0%)

Source: Sample Survey of the present study.

Husband's education is observed to have a significant and positive influence on the use of contraception in both urban and rural areas. 63.9

percent of the total use of contraception in the urban area and 43.0 percent of the total use of contraception in the rural area has been found amongst the women whose husbands have attained education up to matriculation or higher secondary and above. The significant rural-urban difference in the use of contraception by educational status of respondents and their husbands is that the proportions of illiterate respondents and the proportion of the respondents whose husbands are illiterate, using contraception, is comparatively higher (i.e. 26.5 percent and 12.8 percent respectively) in the rural area than that in the urban area (i.e. 3.9 percent and 1.5 percent respectively). The impact of exposure to the mass media and greater interactions with the outer world, frequent visit to the health centre etc. in the recent days have raised the awareness of family planning amongst the illiterate couples in the rural area. This suggests that the family planning programme has been successful up to a certain extent to promote the practice of family planning among the illiterate couples, particularly in the rural area.

The occupational status of woman does affect the use of contraception. In our sample study, though the majority (68.8 percent in the urban area and 92 percent in the rural area) of the 724 currently married women are housewives, the proportion of service-holder women using contraception to the total users of contraception is found to be considerably high (29.8% percent in the urban area and 13.3 percent in the rural area).

The percentage distribution of respondents by the occupation of husbands (presented in the Table-4.3) shows that in the urban area the

172

proportion of women using contraception is highest when husbands are service holders (i.e. 52.2 percent) followed by the traders or self employed (i.e. 46.3 percent). On the other hand, in the rural area the percentage distribution of current users by farmer husband and the husband who are self employed or traders do not show any difference, while the proportion of respondents using contraception, whose husbands are service-holders are 36.7 percent.

A positive relationship between the use of contraception and the income status of the respondents has been observed. The percentage of the current users of contraception (Table-4.3), in both urban and rural areas increases with the increase in the level of income and it is found highest (35.1 percent in the urban area and 30.2 percent in the rural area) in the highest income group of Rs. 20,000/- and above. On the other hand, the proportion of total users in the higher expenditure categories are found comparatively higher in the urban area than that in the rural area. In a rural society family bonds amongst the relatives are found very strong and hence, they often support one another in all respect of their social life including the financial matter. They have frequent interactions regarding the family matters including the family planning. Moreover, in the rural area public health care system delivers the methods like pills and condoms to the respondents which are absent in the urban areas. Consequently, in most of the cases financial constraint in the lower income groups does not act as the prime hurdles to the accessibility to contraception.

A significant difference between the use of contraception in the urban and the rural area can be observed with respect to respondents with the total number of living children. In the urban area comparatively larger proportions i.e. 56.1 percent and 43.9 percent, as against the rural proportions 26.5 percent and 69.4 percent, are observed to have 2 and 3 or more than 3 living children. Thus, the estimated mean number of children of the urban user (2.39) is comparatively lower than that of the rural mean (2.65).

The use of contraception amongst the currently married women has been observed to vary with the number of living sons and daughters. It is found that the proportion of respondents with no son is very nominal in the both rural and the urban area but it is also observed to increase by almost 7 times in the urban area and 5 times in the rural area when the respondents have 1 son. The proportion of women using contraception is found to be highest (i.e. 46.8 percent in the urban area and 41.8 percent in the rural area) with 2 living sons. On the other hand, the use of contraception is observed to be higher amongst the respondents with no living daughters (30.7 percent in the urban area and 16.8 percent in the rural area) and it is observed to decrease with the numbers of living daughters. This implies that the respondents are more likely to use contraception with increasing number of sons and decreasing number of daughters. Moreover, the proportion of women using contraception with no living daughters is found to be higher (22.9 percent) than the proportion of women with no living son (i.e. 6.7

percent). This clearly indicates the existence of son preference amongst the respondents.

The use of contraceptive is likely to be higher amongst the respondents who have discussion with their husbands. In the urban area most of the women using contraception (i.e. 82.9 percent out of 205) have discussion with the husbands while, in the rural area comparatively, a lesser proportion of women (i.e. 66.8 percent out of 196 users) discuss such matters with their husband.

Easy access to contraception again largely depends on the distance to the source of family planning, particularly in the rural area where mode of transportation and means of communication are often found poor. In the rural area, out of 196 total users a major proportion (i.e. 65.3 percent) of respondents is observed to have the accessibility to the health facilities within 1-2 kilometres, while the rest 30.6 percent, 3.1 percent and 1.1 percent have the accessibility to the health facilities within 3-4, 5-6, 7-8 kilometre respectively. This suggests that the easy accessibility to the health facilities to the poor rural women can help in promoting the use of contraception.

Husbands are observed as the prime motivator of the current use of contraception, especially in the urban area (i.e. 56.6%). It is observed that in a traditional male dominated society like Darrang, even in the urban area, the husband plays a leading role to decide the use of contraceptives. Women often feel hesitant to discuss family planning because of her politeness and social taboos. Only 27.3 percent of the total use of contraceptive are motivated by the respondents themselves and 16.1 percent are motivated by

175

the relatives in the urban area. On the contrary, the absence of healthy discussion between the husband and the wife often results in a poor contraceptive prevalence rate in the rural area. The role of the health workers can be a vital factor in motivating the couples for family planning and thereby help to promote the use of contraception in the rural area. Comparatively a large proportion (i.e. 37.2 percent) of the total use is motivated by the health worker like ASHA or ANM than that by the husband in the rural area. This suggests that a well systematic effort by the health workers in motivating the couples for family planning may help in improving the contraceptive prevalence rate amongst the rural couples in the district.

4.5 CONCLUSION:

The proportion of met need of contraception or the total current use in our sample study of the undivided Darrang district of Assam is 55.4 percent. The urban proportion to the total use of contraception is 51.1 percent while, the rural proportion is 48.9 percent. The use of modern scientific method is found highest amongst the ST (Bodo) in the urban area while in the rural area, it is found highest amongst the General Caste Hindu. The use of contraception is found highly influenced by education in both the urban and rural areas. However, compared to the urban area, a larger proportion of the total users in the rural area is found illiterate (i.e. 26.5 percent of respondents themselves and 13 percent of husbands). This suggests that the family planning programme has been successful up to a

certain extent in disseminating the knowledge of contraception amongst the illiterate couples in the rural area.

A preference for larger family has been observed in case of the rural women using contraception than that of the urban women in our sample study. The existence of son preference has been observed to be more prominent in the urban area than that of in the rural area. Preference for a smaller family (reflected by the lower average number of children of the urban users) and higher use of contraception with increasing number of living sons but with decreasing number of daughters, have been observed in case of the urban users.

However, the rural-urban differentials in the use of contraception in respect to the mean age of the respondents has been found insignificant, rather it is found more or less equal (i.e. 30.2 years in the urban area and 30.4 years in the rural area). Thus, it can be finally concluded that the higher mean age and higher mean number of children of the users of contraception in our sample study, have made the family planning programmes partially ineffective in the district as a whole and in the rural area in particular.

4.6 : PRESENTATION OF DATA BY FIGURES:

Figure: 4.6.1 : Rural-Urban Contraceptive Prevalence Rate

RURAL-URBAN CONTRACEPTIVE PREVELANCE RATE
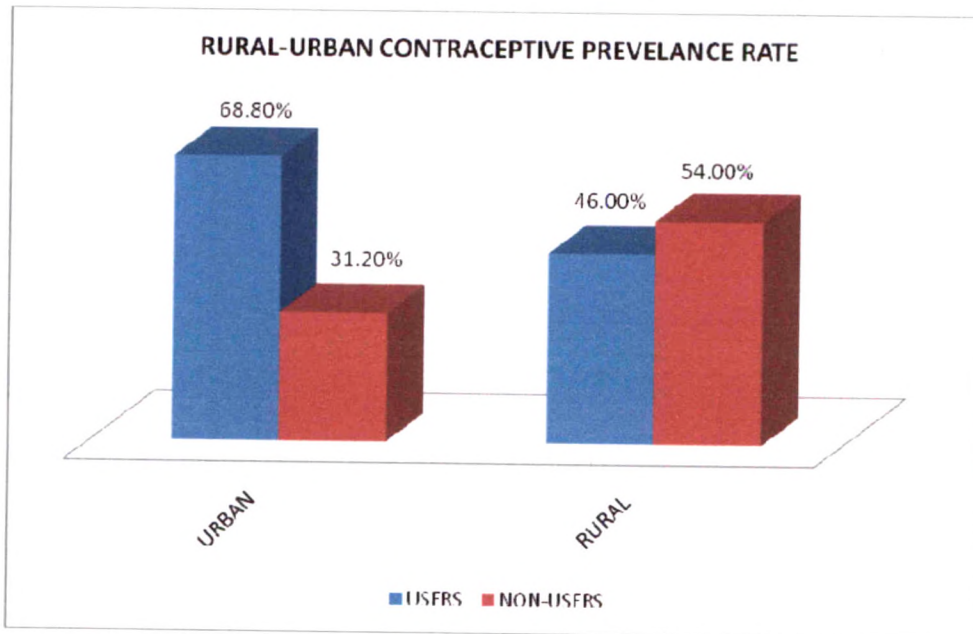
Figure: 4.6.2: Use of Modern Method and Traditional Method: Rural-Urban
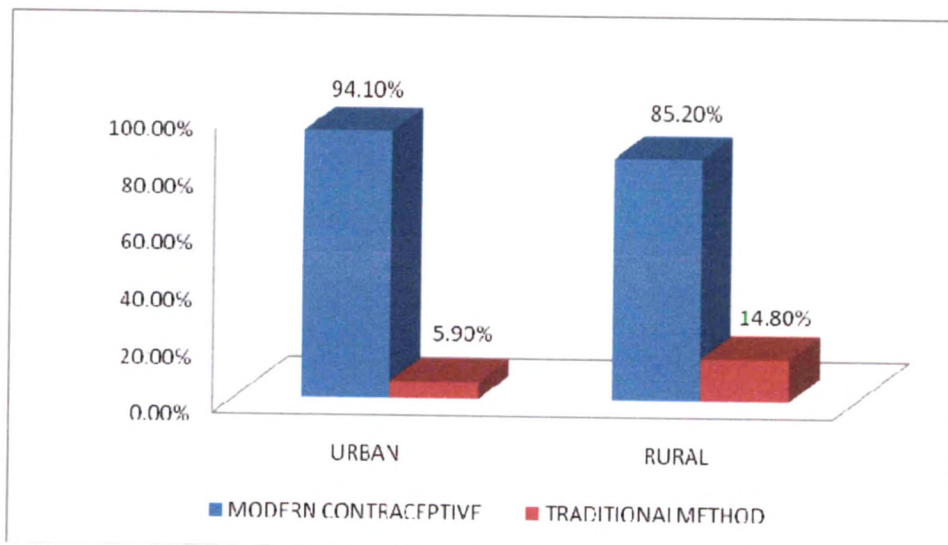
Figure 4.6.3: Rural-Urban Acceptance of Contraception by Mean Number of Children
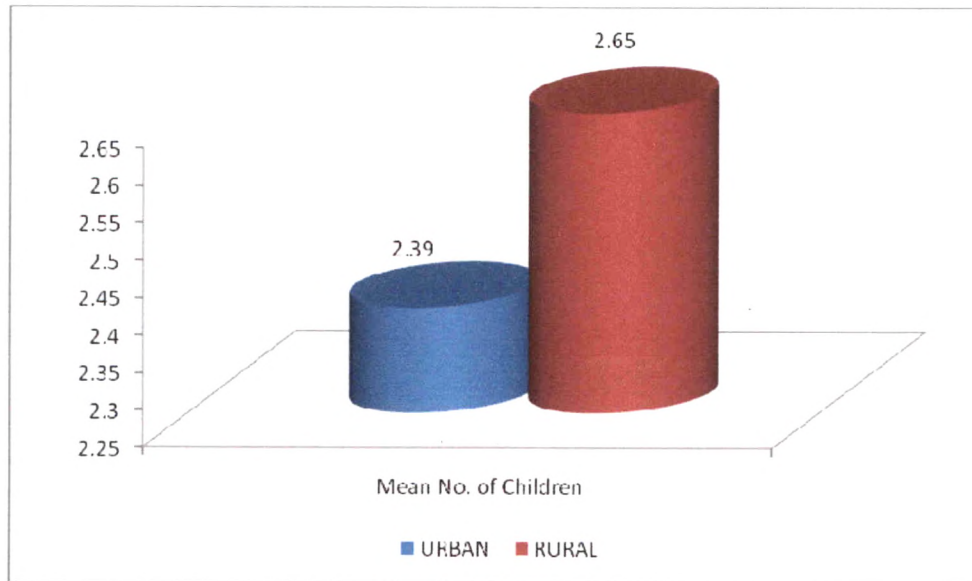
Figure 4.6.4: Rural-Urban Acceptance of Contraception by Literate Respondents and Husbands

****
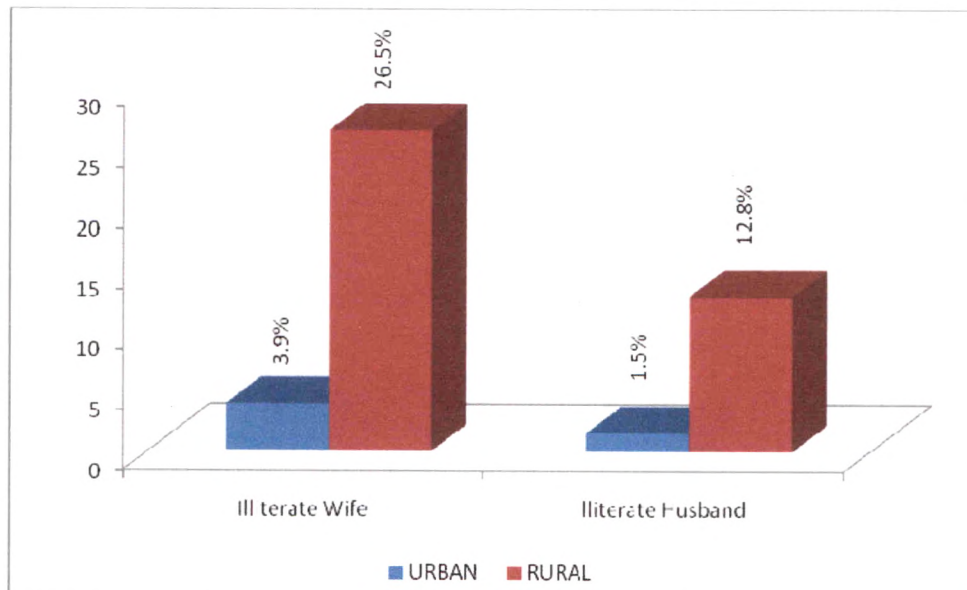
CHAPTER 5

CHOICE BETWEEN
TERMINAL AND SPACING METHOD
AMONG
THE RESPONDENTS

5.1. INTRODUCTION:

The terminal or irreversible method of contraception or sterilization, also known as the permanent method, helps the couples to limit the size of their families or the number of the children born. In other words, the use of sterilization is meant to limit the actual size of the family. On the other hand, the use of modern spacing method is generally meant to regulate the birth intervals between the two children or to space between two births of the children by the couples. Thus it helps the couples to avoid the risk of unwanted pregnancies and thereby to improve the reproductive health of the mother. It has been observed in many studies that the proper use of modern spacing methods by either of the couples helps to reduce spontaneous abortion and thus helps in a greater way to improve the reproductive health of the women.

In our sample study, it has been observed that all total 360 women are currently using modern methods of contraception (shown in the Table-5.1. below). Out of 360 total users of modern contraceptive the proportion of women who opted for female sterilization (i.e. 23.9 percent) are lower than the proportion of women who opted for modern spacing method (i.e. 76.1 percent). The same trend has been observed in case of the users of modern methods of contraception in both urban and rural area. This implies that the spacing method has been the most popular method in use amongst the current users in our sample study.

Table-5.1

Total Use of Modern Methods of Contraception:
(Sterilization and Spacing): Rural/Urban

U/R	Sterilization	Spacing	Total
Urban	38 (19.7%)	155 (80.3%)	193 (100.0%)
Rural	48 (28.7%)	119 (71.3%)	167 (100.0%)
Total	86 (23.9%)	274 (76.1%)	360 (100.0%)

Source: Sample survey of the present study.

From the Table-5.1 above, it is revealed that the use of female sterilization is higher in the rural area while the use of modern spacing method is higher in the urban area. More than half of the total users of female sterilization (i.e. 55.8 percent) in our sample study are found in the rural area and the rest (i.e. 44.2 percent) are found in the urban area. On the other hand, more than half of the total users of modern spacing method (i.e. 56.6 percent) are found in the urban area while the rest (i.e. 43.4 percent) are found in the rural area. It is worthwhile to mention that in our sample study we did not find even a single case of male sterilization.

The choice of the modern scientific method (i.e. the terminal and the modern spacing method) in our sample study has been observed to vary widely among the groups of respondents i.e. tribal (the ST i.e. Bodo), non-tribal (i.e. SC, General Caste Hindu and Muslim) and Char women.

5.2. TOTAL USE OF TERMINAL AND SPACING: TRIBAL, NON-TRIBAL AND CHAR WOMEN

Table-5.2. below shows that the use of female sterilization is highest amongst the ST (Bodo) women (i.e. 47.7 percent) followed by SC

women (i.e. 30.2 percent), General Caste Hindu women (19.7 percent) and the Muslim women (2.3 percent). In the Char area, the use of sterilization is found nil.

Table - 5.2.

Percentage Distribution of Total Users of Terminal and Spacing Methods: Tribal, Non-Tribal and Char Women.

	Respondents	Female Sterilization	Spacing	Total
Tribal	ST	41 (47.6%)	22 (8.0%)	63 (17.5%)
Non-tribal	SC	26 (30.2%)	42 (15.3%)	68 (18.9%)
	General Caste Hindu	17 (19.8%)	156 (56.9%)	173 (48.1%)
	Muslim	2 (2.3%)	49 (17.9%)	51 (14.2%)
Char inhabitant	Char	0 —	5 (1.8%)	5 (1.4%)
	Total	86 (100.0%)	274 (100.0%)	360 (100.0%)

Source: sample survey of the study.

On the other hand, the use of modern spacing method is found to be highest amongst the General Caste Hindu (56.9 percent) followed by the Muslim (17.9 percent), SC (15.3 percent). Least use of modern spacing method is found amongst the ST women (i.e. 8.0 percent). This finding of our present study is in conformity with that of the study where female sterilization is found most commonly used amongst the ST women (Santhals) and a small proportion of ST women was observed to prefer modern spacing method (Basu, Kapoor and Basu, 2004). The use of spacing method is found cent percent amongst a small number of users (i.e. 5 users) of contraception in the Char area.

Table-5.3

Rural-Urban Percentage Distribution of the Users of
Terminal and Spacing Methods: Tribal, Non-Tribal and Char Women.

		Sterilization			Spacing		
		Urban	Rural	Total	Urban	Rural	Total
Tribal	ST	8 (19.5%)	33 (80.5%)	41 (100.0%)	12 (54.5%)	10 (45.5%)	22 (100.0%)
Non-Tribal	SC	14 (53.8%)	12 (46.2%)	26 (100.0%)	28 (66.7%)	14 (33.3%)	42 (100.0%)
	General Caste Hindu	14 (82.4%)	3 (17.6%)	17 (100.0%)	91 (58.3%)	65 (41.7%)	156 (100.0%)
	Muslim	2 (100.0%)	0 —	2 (100.0%)	24 (49.0%)	25 (51.0%)	49 (100.0%)
Char inhabitant	Char	-	-	-	-	5 (100.0%)	5 (100.0%
Total		38 (100.0%)	48 (100.0%)	86 (100.0%)	155 (100.0%)	119 (100.0%)	274 (100.0%)

Source: sample survey of the study.

The rural-urban percentage distribution of total sterilization (86) in our sample study, as shown in the Table-5.3, depicts that the proportion of respondents opting for sterilization in the rural area is 55.8 percent, which is higher than the urban proportion i.e. 44.2 percent. Majority of the total users of female sterilization in the rural area belong to ST and SC women while, the percentage of use of female sterilization amongst the General Caste Hindu women is found very nominal (i.e.17.6 percent). The use of female sterilization in our sample study is found nil amongst the Muslim women in the rural area and the Char inhabitants. During the interaction schedule it has been observed that a negligible percentage of Muslim women have opted for female sterilization in the urban area which can safely lead to the conclusion that sterilization is yet to be socially accepted in the rural Muslim society. On

the other hand, in the Char area where the use of family planning is discarded on religious ground, the use of female sterilization is found nil. This finding of our sample study that the Muslim women compared to the women belonging to the other religions are less likely to use sterilization, is supported by the Report of NFHS-3 India.

The use of the modern methods varies widely amongst the respondents. Hence, for a detailed analysis of the differentials in the use of contraception, a study of the background profile of the currently married women who opted for the modern contraception (terminal and the spacing method) in our present study is essential. In this Chapter, we deal with the choice and preferences of the currently married women-tribal, non-tribal and the Char women with the socio-economic and demographic background characteristics in two sections. Section-A of the Chapter-V deals with the socio-economic as well as demographic profile of the women who opted for limiting and Section-B of the Chapter-V deals with the study of socio-economic as well as the demographic profile of the users of modern spacing methods.

SECTION: A
CHOICE OF TERMINAL METHOD

5.A.1. INTRODUCTION:

Many studies have found that the use of modern methods (terminal and spacing) are highly influenced by some socio-economic and demographic factors like the educational and occupational status of both husband and wife, types of family, economic status like monthly family income and expenditure of the users, current age, age at marriage, age at first birth, actual size of the family, total number of living sons, accessibility to the source of family planning, motivational factors, discussion between the husband and wife etc. According to the Report, NFHS–3 in general, modern spacing method is commonly used by the better-educated and wealthier women, while female sterilization is commonly used by the less-educated women. According to the Report, in the states like Andhra Pradesh, Karnataka and Tamil Nadu the terminal method is more commonly practised amongst the currently married women (i.e. 55-63 percent of currently married women are sterilized, compared with 37 percent nationally). Female sterilization accounts for 66 percent of the total use of contraception in these states. On the contrary, a reflection of the all India trend in the use of female sterilization has been observed in Assam. In Assam the use of female sterilization amongst the currently married women (age 15-45 years) has been observed to drop from 15.7 percent in NFHS-2 to 13.0 percent in NFHS-3. The use of female sterilization is highest amongst the women who have no education (17.8 percent) and it gradually decreases(i.e. 7.9 percent)

185

with the education of women and is found least amongst the women who have completed 10 years education and above (Report NFHS-3, Assam).

5.A.2. SOCIO–ECONOMIC AND DEMOGRAPHIC CHARACTERISTICS OF WOMEN WHO OPTED FOR STERILIZATION. : RURAL/URBAN

Some selected socio-economic variables of the respondents opting for sterilization have been discussed with the help of Table-5.A.1. It is observed from Table - 5.A.1 that the women in our sample study in the undivided Darrang district of Assam generally opt for sterilization to limit the size of their family after attaining the peak period of fertility in their reproductive lives. Table-5.A.1 shows that more than half (i.e. 52.3 percent) of 86 women who opted for female sterilization, have opted for the method at the age of 35-39 years and above. This minimises the effectiveness of the use of sterilization.

An inverse relationship between the choice of sterilization and education of the respondents has been observed. Table-5.A.1 also shows that comparatively a major proportion of illiterate women (i.e. 33 percent) have opted for sterilization and the proportions of users are found to decrease gradually as the level of education of the users increases. This finding of our field study complies with the findings of the NFHS-3 report in Assam. This finding is also in conformity with the studies by Das and Acharya, 1999; Choe, 1985; and Liang, 1984. In the rural area, a half of the total users of female sterilization (i.e. 50.0 percent out of 48 women opting for sterilization) are illiterate. The use of sterilization has been observed to

Table-5.A.1

Percentage Distribution of Urban, Rural and Total Users of Sterilization by Socio-Economic and Demographic Characteristics.

Socio – Economic And Demographic Characteristics	Urban	Rural	Total
Current Age of Respondents			
20–24 Years	2 (5.3%)	—	2 (5.3%)
25–29 Years	7 (18.4%)	2 (4.2%)	9 (10.5%)
30–34 Years	14 (36.8%)	16 (33.3%)	30 (34.9%)
35 Years and above	15 (39.5%)	30 (62.5%)	45 (52.3%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Education of Respondents			
Illiterate	5 (13.2%)	24 (50.0%)	29 (33.7%)
Up to Primary	13 (34.2%)	9 (18.8%)	22 (24.7%)
Up to Middle	10 (26.3%)	8 (16.7%)	18 (20.9%)
Under Matric	4 (10.5%)	7(14.6%	11 (12.8%)
HSLC/HS pass	6 (15.8%)	—	6 (7.0%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Education of Husbands			
Illiterate	0	14 (29.2%)	14 (16.3%)
Up to Primary	10 (26.3%)	12 (25.0%)	22 (25.6%)
Up to Middle	8 (21.1%)	8 (16.7%)	16 (18.6%)
Under Matric	9 (23.7%)	10 (20.8%)	19 (22.1%)
HSLC/HS pass	8 (21.1%)	2 (4.2%)	10 (11.6%)
Graduate/ above	3 (7.9%)	2 (4.2%)	5 (5.8%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Occupation of Respondents			
House-wife	27 (71.1%)	42 (87.5%)	69 (80.2%)
Labourer/Daily Wage earner	5 (13.2%)	2 (4.2%)	7 (7.0%)
Service-holder	6 (15.8%)	4 (11.1%)	10 (11.6%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Occupation of Husbands			
Farmer	-	22 (45.8%)	22 (25.6%)
Trade/Self Emp.	25 (65.8%)	12 (25.0%)	37 (43.0%)
Service holders	13 (34.2%)	8 (16.7%)	21 (24.4%)
Daily Wage earner	—	6 (12.5%)	6 (7.0%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Monthly Income Status			
Less Than 5000	13 (34.2%)	18 (37.5%)	31 (36.0%)
5000-10,000	11 (28.9%)	24 (66.7%)	35 (40.7%)
10,000-20,000	—	2 (5.6%)	2 (5.6%)
Above 20,000	14 (36.8%)	4 (11.1%)	18 (20.9%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)

Expenditure Status			
Less Than 5000	19 (50.0%)	38 (79.2%)	57 (66.3%)
Rs.5000/–10,000/-	9 (23.7%)	6 (12.5%)	15 (17.4%)
Rs.10,000/–20,000/-	9 (23.7%)	4 (8.3%)	13 (151%)
Above Rs.20,000/-	1 (2.6%)	—	1 (2.6%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Mean Age at Sterilization	**26.5 Years.**	**29.8 Years.**	**28.4 Years.**
Total Number of Living Children			
2 Children	14 (36.8%)	4 (8.33%)	18 (20.9%)
3 Children	13 (34.2%)	14 (29.2%)	27 (31.4%)
4 Children	11 (28.9%)	8 (16.7%)	19 (22.1%)
5 Children+	—	22 (45.8%)	22 (45.8%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Mean Number of Living children	**2.9**	**4.0**	**3.5**
Number of Living Sons			
0 Son	3 (7.9%)	8 (16.7%)	11 (9.3%)
1 Son	17 (44.7%)	13 (27.1%)	30 (39.5%)
2 Sons	18 (47.4%)	17 (35.4%)	35 (34.9%)
3 Sons +	—	10 (20.8%)	10 (29.2%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Number of Living Daughters			
0 Daughter	12 (31.5%)	15 (31.3%)	26 (30.2%)
1 Daughter	11 (28.9%)	10 (20.8%)	20 (23.3%)
2 Daughters	8 (21.1%)	13 (27.1%)	23 (26.7%)
3 Daughters+	7 (18.4%)	10 (20.1%)	17 (19.8%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Husband Wife Discussion			
Yes	28 (73.7%)	22 (45.8%)	50 (58.1%)
No	10 (26.3%)	26 (54.2%)	36 (41.9%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Accessibility To F.P.			
1-2 Km	10 (26.3%)	41 (85.4%)	51 (59.3%)
3-4 Km	26 (68.4%)	7 (14.6%)	33 (38.4%)
5-8 Km+	2 (5.3%)	—	2 (5.3%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)
Motivated By			
Husband	14 (36.8%	7 (14.6%)	21 (24.4%)
Respondent	15 (39.5%)	2 (4.2%)	17 (19.8%)
Others	9 (23.7%)	1 (2.1%)	10 (11.6%)
ANM /ASHA	—	38 (79.2%)	38 (79.2%)
Total	38 (100.0%)	48 (100.0%)	86 (100.0%)

Source: sample survey of the study.

decrease gradually with the increase in the level of education attained by the respondents.

Like women's education, husband's education is also observed to have a negative effect on the choice of sterilization. More than one fourth of the total users of female sterilization in our sample study are the women whose husbands have received education to the primary level and it is found to decrease with the increasing level of education of the husbands. Major proportions of husbands of the 38 women who opted for sterilization in the urban area, have attained education up to the level of primary and middle school (i.e. 26.3 percent and 21.1 percent respectively). On the other hand, the proportion of illiterate husbands of 48 women who opted for sterilization in the rural area is 29.2 percent while, an equal proportion i.e. 4.2 percent is qualified up to matriculation or higher secondary school of education and graduation and above and the rest 25.0 percent, 16.7 percent, 20.8 percent, attained education up to primary school, middle school and below matriculation respectively.

The choice of sterilization is also observed to vary with the occupational status of women. Out of 86 women who opted for sterilization 80.2 percent are house wives while, it is found less in proportion amongst the working women or service holders and it is only 7.0 percent amongst the daily wage earners. This is because the opportunity cost for the period of the post operational care in case of the women engaged in the extra house-hold activities is higher. In the urban area the proportion, 71.1 percent, out of the

189

total of 38 urban women who opted for sterilization, are house-wives, while, the rest 13.2 percent and 15.8 percent are daily wage earners and service holders respectively. On the other hand, in the rural area 87.5 percent women who opted for sterilization are house-wives and the rest 4.2 percent and 11.1 percent constitute daily wage earners and service holders respectively.

The choice of sterilization is closely associated with the occupational status of husbands. In the urban and rural area major proportions of the husbands of the total users of sterilization are traders or self employed (i.e. 65.8 percent) but, in the rural area comparatively a major proportion of the husbands of the total users of sterilization is found to be farmers (i.e. 45.8 percent).

In our present study, the use of sterilization is found common amongst the women belonging to the lower economic stratum. Majority of the total users of sterilization in our sample study (as shown in the Table-5.A.1.) are found in the lower income and expenditure groups i.e. less than Rs.5000/- per month and Rs.5000/- to Rs.10,000/-. Report NFHS-3 of Assam supports this finding. In our sample study most of the sterilizations in the rural area have been done in the various camps conducted from time to time. Moreover, the provision for financial incentives to the beneficiaries of sterilization is found to attract most of the couples in lower economic stratum, particularly in the rural area.

The mean age at sterilization amongst the adopters of sterilization in our present study has been observed to be high i.e.28.4 years. It is observed to be higher in the rural area (i.e.29.8 years) than that in the urban area (i.e.28.4 years). Thus, higher mean age at sterilization amongst the respondents minimised the effects of female sterilization in our sample study.

The proportions of women with 3 or more than 3 living children, opting for sterilization have been found higher in percentage (45.8 percent). In the urban area 36.8 percent of women who opted for sterilization, have 2 living children while, the rest 34.2 percent and 23.7 percent have 3 and 4 living children respectively. On the other hand, in the rural area, more than 90 percent of the women opting for sterilization have 3 and more than 3 children. This finding regarding the higher use of sterilization amongst the rural respondents with 3 or more than 3 children is supported by the study by Dr. Das and Dr. Acharya, (1999). The average number of living children of the women who opted for female sterilization in our sample study has been observed to be high (i.e. 3.5). It is found higher in the rural area (i.e. 4) than that in the urban area (i.e.2.9).

The choice of sterilization is found to be highly influenced by preference for son amongst the women. Nearly 41 percent of 86 women opting for sterilization are found to have one living son, followed by 34.9 percent having two living sons and 13 percent having 3 or more than 3 living sons while only 9.3 percent have no son. In the urban area 44.7 percent out of 38 women who have taken recourse to sterilization, have one living son

and 47.4 percent have two living sons while only 5.3 percent have no son. Thus, the acceptance of sterilization is observed to increase with the number of living sons. This finding is found similar with that of that of the study where a positive relation is found with number of children and the use of sterilization (Reddy, 1984). Moreover, in our sample study choice of sterilization bas been observed to increase as the number of sons increased from one son to two sons (i.e. from 44.7 percent to 50.0 percent). This indicates that the 94.7 percent of women who opted for sterilization tend to be satisfied with their family composition after having at least one son.

On the contrary, 30.2 percent of women opting for limiting the size of family (sterilization) have been observed to have no daughter. The proportions of women who opted for limiting the family size have, however been observed to decrease with the increase in the number of living daughters while, it has been observed to increase with the number of living sons. A larger proportion of women have been observed to take recourse to sterilization with no living daughter than that with no living son. This has a clear indication of the existence of son preference amongst the currently married women in our sample study.

Table-5.A.1. also shows the percentage distribution of the total users of sterilization in our sample study by the husband-wife discussion. More than 58 percent of 86 women opting for sterilization have had discussion with the husbands on family planning. In the urban area, amongst 38 users of female sterilization 73.7 percent have discussion on the family

planning with their husbands while in the rural area, comparatively a less proportion i.e. 45.8 percent out of 48 users of sterilization, is found to have discussion on family planning.

In our sample study, most of the female sterilization has been done in the medical camp in the rural area. It benefits the respondents in the interior villages in the rural area. Thus it is observed that all the adopters of sterilization (i.e. 100.0 percent) in the rural area have the accessibility to nearest health centre within the distance of 3-4 kilometres.

Major proportion (i.e. 79.2 percent) of the total use of female sterilization in the rural area is found to be motivated by the health workers. Provision for financial incentives to the motivators has induced the health workers to take more interest in motivating the couples for adoption of female sterilization in the rural area.

5.A.3. CURRENT MEAN AGE OF WOMEN WHO OPTED FOR STERILIZATION: TRIBAL AND NON-TRIBAL WOMEN.

Current age of the women who opted for sterilization reflects the effective use of the method by the users. Low age in the use of sterilization can have a negative impact on the fertility and thereby lead to successful implementation of the population control policy.

Table-5.A.2 below shows that the average age of the users of sterilization in the urban area is above 30 years (i.e. 30.6 years) and the

mean age of the women using sterilization among the SC is 30.8 years, 31.5 years among the ST, 32.6 years among the General Caste Hindu and 33.5 years among the Muslim.

Table-5.A.2.

Percentage Distribution of the Total Users of Sterilization By Current Mean Age : Tribal and Non-tribal women

	Tribal	Non -tribal			Total
Current mean age	ST	SC	General Caste Hindu	Muslim	
Urban	31.5 years	30.8 years	32.6 years	33.5 years	30.6 years
Rural	34.2 years	32.7 years	32 years	--	33.7 years

Source: sample survey of the present study.

In the rural area, the picture is more or less the same. The current mean age of the women adopting sterilization in the rural area is 32.7 years among the SC, 34.2 years among the ST and 32 years among the General Caste Hindu. Higher mean age of the current users of sterilization limits the success of the Family Planning programme.

5.A.4. DIFFERENTIAL USE OF STERILIZATION BY THE MEAN AGE AT STERILIZATION: TRIBAL AND NON-TRIBAL WOMEN

The timing of sterilization is an important measure of the effective use of sterilization. Mean age of the respondents at sterilization in our sample study has been considerably high. It is observed to vary widely amongst the

tribal and non-tribal respondents in our study. The rural-urban difference in

the mean age at sterilization amongst the respondents varies by 3.3 years.

Table-5.A.3

Percentage Distribution of the Total Users of Sterilization by Mean Age at Sterilization: Tribal And Non-Tribal Women

	Tribal	Non-tribal			
	ST	SC	General Caste	Muslim	Total
Urban	28.9	26.1	25.3	28.5	26.5
Rural	31.2	26.8	26.5	–	29.8
Total	30.8	26.4	25.6	28.5	28.4

Source: Sample survey of the present study.

It can also be observed from the Table-5.A.3 that in the rural area

the mean age at sterilization amongst the ST respondents is the highest

(i.e.31.2 years) as against their non-tribal counterparts. This can be identified

as one of the reasons of higher mean number of children amongst the users

of sterilization in the rural area (Table-5.A.1).

5.A.5. MEAN NUMBER OF LIVING CHILDREN OF WOMEN WHO OPTED FOR STERILIZATION: TRIBAL AND NON-TRIBAL.

The percentage distribution of the users of female sterilization

(Table-5.A.4.) exhibits that most of the current users in our sample study opt

for female sterilization or prefer to limit the family size after having 3 or more

than 3 children. It is observed that the use of sterilization amongst the tribal

and non-tribal differs considerably with respect to the total number of living

children (Table–5.A.4). Amongst the SC, comparatively, a major proportion

(i.e. 38.5 percent) opting for sterilization, have 3 living children. A major percentage (i.e. 43.9%) of women opting for sterilization amongst the ST (Bodo) is observed to prefer larger family (i.e. 5 or more than 5 living children). On the other hand, majority (i.e. 47.1 percent) of the General Caste Hindu women are observed to limit their child bearing with 2 living children. An equal preference (i.e. 50.0 percent) for 3 and 4 living children has been observed amongst the Muslim users of female sterilization.

Table-5.A.4.

Percentage Distribution of the Total Users of Sterilization by Total Number of Living Children: Tribal and Non-tribal women

No. of Living Children	Tribal		Non-tribal		Total
	ST	SC	General Caste Hindu	Muslim	
2 Children	-	7 (26.9%)	8 (47.1%)	-	15 (23.4%)
3 Children	13 (31.7%)	10 (38.5%)	7 (41.2%)	1 (50.0%)	31 (36.0%)
4 Children	10 (24.4%)	5 (19.2%)	2 (11.8%)	1 (50.0%)	18 (20.9%)
5 Children +	18 (43.9%)	4 (15.4%)	-	--	22 (25.6%)
Total	33 (100.0%)	26 (100.0%)	17 (100.0%)	--	86 (100.0%)
Mean No. o Children	4.1	3.2	2.6	3.5	3.5

Source: sample survey of the present study.

Thus, the mean number of living children amongst the ST women who opted for Sterilization is found to be highest i.e. 4 (or 4.1), followed by Muslim 3.5, the SC 3.2 and the mean number of children of the users of female sterilization is found least i.e. 2.6 amongst the General Caste Hindu women.

5.A.6. TOTAL NUMBER OF LIVING SONS OF THE WOMEN WHO OPTED FOR STERILIZATION: TRIBAL AND NON-TRIBAL.

According to the NFHS-3, in Assam and the North-East Region, son preference is not that much prominent as it is in the Northern states of India. But, DLHS Report 2002-04, has however, shown that the son preference is common in the Darrang district of Assam.

Table-5.A.5.

Percentage Distribution of the Total Users of Female Sterilization by Total Number of Living Sons: Tribal and Non-Tribal women

No. of sons	Tribal	Non -tribal			Total
	ST	SC	General Caste Hindu	Muslim	
0	9 (22.0%)	--	2 (11.8%)	-	11 (12.8%)
1	13 (31.7%)	8 (30.8%)	9 (52.9%)	-	30 (34.9%)
2	13 (31.7%)	14 (53.8%)	6 (35.3%)	2 (100.0%)	35 (40.7%)
3 +	6 (14.6%)	4 (15.4%)	--	—	10 (26.3%)
Total	41 (100.0%)	26 (100.0%)	17 (100.0%)	2 (100.0%)	38 (100.0%)

Source: sample survey of the present study.

The use of female sterilization is observed to vary widely amongst the respondents with respect to the number of living sons (Table-5.A.5). Higher use of sterilization amongst the respondents has been observed with the increase in the number of living sons. A higher preference for 2 sons is observed amongst the SC respondents who opted for sterilization (i.e. 53.8 percent). On the other hand, a higher preference for 1 son (i.e. 52.9 percent)

is observed amongst the General Caste Hindu women who opted for sterilization. Amongst the Muslims cent percent of women those who opted for female sterilization (out of 2 users in the urban area) have 2 sons. On the contrary, in case of the users of sterilization amongst the ST the preference for a particular number of sons is not that much prominent.

It is observed that 22.0 percent of ST women (Bodo) have no sons and 31.7 percent have 2 or 3 sons. The higher acceptance of female sterilization amongst the ST women with no son in comparison to their counterparts in the non-tribal communities, in our sample study, indicates that the son preference amongst the ST is not as strong as amongst the non-tribal women.

5.A.7. TOTAL NUMBER OF LIVING DAUGHTERS OF WOMEN WHO OPTED FOR FEMALE STERILIZATION AND: TRIBAL, NON-TRIBAL RESPONDENTS

The use of female sterilization in our sample study decreases with the increase in the number of living daughters (Table-5.A.6). It is observed that more than 41 percent of the General Caste Hindu women who take recourse to female sterilization have no daughters while, amongst the SC, it is found to be 38.5 percent. Amongst a small number of Muslim women (i.e. only 2 users), opting for sterilization, have 2 sons while one has1 daughter and the other has 2 daughters.

Table-5.A.6.

Percentage Distribution of the Total Users of Female Sterilization by Total Number of Living Daughters: Tribal and Non-Tribal women

Number of daughters	Tribal	Non -tribal			Total
	ST	SC	General Caste Hindu	Muslim	
0	6 (14.6%)	10 (38.5%)	7 (41.2%)	-	23 (26.7%)
1	10 (24.4%)	7 (26.9%)	4 (23.5%)	1 (50.0%)	22 (25.6%)
2	13 (31.7%)	5 (19.2%)	4 (23.5%)	1 (50.0%)	23 (26.7%)
3+	12 (29.3%)	4 (15.4%)	2 (11.8%)	-	18 (20.9%)
Total	41(100.0%)	26(100.0%)	17 (100.0%)	2 (100.0%)	86 (100.0%)

Source: sample survey of the present study.

Thus from the Table - 5.A.5 and Table - 5.A.6 it is observed that in comparison to their non-tribal counterparts, a higher percentage (i.e. 22.0 percent) of ST women in our sample with no sons have opted to limit the family size. This finding of the present study gives us enough evidence to accept the hypothesis that amongst the ST women the son preference is less prominent than that of the non-ST women.

5.A.8   CONCLUSION:

The prime users of sterilization in our sample study are the ST and the SC, followed by the General Caste Hindus. Amongst the Muslim women in the urban area, the use of sterilization is very scanty.

The mean age of women, opting for sterilization is observed to be considerably high i.e. 30 years in the urban area and 34 years in the rural area. The mean age of ST women, opting for sterilization, are highest i.e. 32 years in the urban area and 34 years in the rural area. The SC women, also

exhibits a higher mean age of accepting sterilization i.e. 31 years in the urban area and 33 years in the rural area. The mean number of children of the total users of sterilization is found high i.e. 3.5 and it is still higher amongst ST (4.1).

The use of sterilization is, however found to be influenced by the number of living sons. Larger proportion of respondents in our sample study has taken recourse to sterilization when they have no daughter as compared to that of the respondents when they have no son. However, a larger acceptance of female sterilization amongst the tribal (Bodo) women with larger number of daughters in comparison to its non-tribal counter parts proves the fact that the preference for son amongst the Tribal women (Bodo) is less prominent.

Easy access to the camp based sterilization in the rural area is observed as one of the prime causes of higher acceptance of female sterilization amongst the less-educated women and those in the lower economic stratum (especially in the SC and ST categories) in the rural area.

****

SECTION - B
CHOICE OF MODERN SPACING METHOD

5.B.1. INTRODUCTION:

The use of modern spacing method is generally meant to regulate the birth intervals between the two children or to space between two births of the children by the couples. Proper use of modern spacing methods by either of the couples helps to reduce spontaneous abortion and thus helps in a greater way to improve the reproductive health of the women. The Report, NFHS-3 for Assam, shows that generally better-educated and wealthier women are more likely to use spacing method than their counterparts who are less educated, unemployed or poor. Educated women have a better access to knowledge and information of contraceptive method and its side effects and hence can make better choice about what method they prefer. In our sample study it has been observed that urban women are better educated and have better access to contraception and more inclined to spacing in comparison to their rural counterparts.

5.B.2. TOTAL USE OF MODERN SPACING METHODS: TRIBAL, NON-TRIBAL AND CHAR WOMEN

In our sample study in the undivided Darrang district of Assam, out of the total of 401 users of contraceptive, the total users of modern spacing methods are 274 (i.e. 68.3 percentage).

The rural urban distribution of the total users of modern spacing methods by place of residence presented in the Table-5.B.1, shows that the

201

use of modern spacing method is higher in the urban area i.e. 56.6 percent than that in the rural area including the Char area i.e. 43.4 percent.

Table-5.B.1

Percentage Distribution of Total Users of Modern Spacing Methods: Tribal, Non-Tribal and Char Women

U/R	SC	ST	General Caste Hindu	Muslim	Char Inhabitants	Total
Urban	28 (66.7%)	12 (54.5%)	91 (58.3%)	24 (49.0%)	—	155 (56.6%)
Rural	14 (33.3%)	10 (45.5%)	65 (41.7%)	25 (51.0%)	5 (100.0%)	119 (43.4%)
Total	42 (100.0%)	22 (100.0%)	156 (100.0%)	49 (100.0%)	5 (100.0%)	274 (100.0%)

Source: survey of present study.

The use of modern spacing method amongst the different groups of respondents in our sample study has been observed to be higher in the urban area than that in the rural area with the exception being the Muslims. In our field study, it has been observed that the modern spacing method is the only method of contraception used by the Muslim women in the rural area. Thus more than half of the total users of modern spacing methods amongst the Muslim are found in the rural area. On the other hand, in the Char area where the acceptance of female sterilization is nil, the use of modern spacing method has been found cent percent amongst a small number (i.e. 5) of women using contraception.

5.B.3 SOCIO-ECONOMIC AND DEMOGRAPHIC CHARACTERISTICS OF THE USERS OF MODERN SPACING METHODS: RURAL/URBAN

A study of background characteristics of the respondents using modern spacing method gives us a fair idea about the choice and practice of

contraception (spacing method) amongst the currently married women in our sample study. Background profiles of the respondents opting for modern spacing method have been presented by a bi-variate table. The selected socio-economic as well as demographic characteristics of the women using modern spacing method are shown in Table-5.B.2.

Table-5.B.2 shows that the proportion of the respondents using modern spacing methods in both urban (38.1 percent) and rural (i.e. 40.3 percent) area is the highest in the age–group of peak reproductive period i.e. 25–29 years but it is significantly found large in proportion in the higher age group of 35 years and above (i.e. more than 18 percent) in both the urban and rural area. During the field survey, it has been realised that couples, especially the women at higher age group (i.e. 35 years and above) prefer modern spacing method to sterilization to limit the size of the family. Factors like social taboos and psychological factors, fear of operation or side effects associated with sterilization have been recognised as the main hurdles for the wide acceptance of sterilization amongst the women, exception being the ST women.

Table-5.B.2 also shows below that the proportion of respondents using the modern spacing method increases with the level of educational status of the respondents and it is highest in percentage up to the level below matriculation but beyond this, it tappers off gradually, especially in the urban area. The proportion of illiterate users of modern spacing method in the

Table - 5.B.2.

Percentage distribution of Urban, Rural and Total Users of Modern Spacing Methods by Socio-Economic and Demographic Characteristics

Background Variables	Urban	Rural	Total
Current Age of Respondents			
15-19 years	2 (1.3%)	4 (3.4%)	6 (2.2%)
20--24 years	32 (20.6%)	24 (20.2%)	56 (20.4%)
25--29 years	59 (38.1%)	48 (40.3%)	107 (39.1%)
30--34 years	33 (21.3%)	21 (17.5%)	54 (19.7%)
35 years and above	29 (18.7%)	22 (18.5%)	51 (18.6%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274 (100.0%)**
Education of Respondents			
Illiterate	3 (1.9%)	24 (20.2%)	27 (9.9%)
Up to Primary	13 (8.4%)·	23 (19.3%)	36 (13.1%)
Up to Middle	9 (5.8%)	10 (8.4%)	19 (6.9%)
Under Matric	72 (46.5%)	19 (16.0%)	91 (33.2%)
HSLC/HS pass	24 (15.5%)	19 (16.0%)	43 (15.7%)
Graduation / above	34 (21.9%)	24 (20.2%)	58 (21.2%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274 (100.0%)**
Education of Husbands			
Illiterate	2 (1.3%)	11 (9.2%)	13 (4.7%)
Up to Primary	1 (0.6%)	11 (9.2%)	12 (4.4%)
Up to Middle	8 (5.2%)	20 (16.2%)	· 28 (10.2%)
Under Matric	30 (19.4%)	12 (10.1%)	42 (15.3 %)
HSLC/HS pass	59 (38.1%)	30 (25.2%)	89 (32.5%)
Graduation / above	55 (35.5%)	35 (29.4%)	90 (32.8%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274 (100.0%)**
Caste/Communities :			
ST (Bodo)	12 (7.7%)	10 (8.4%)	22 (8.0%)
SC	28 (18.1%)	14 (11.8%)	42 (15.3%)
General Caste Hindu	91 (58.7%)	65 (54.6%)	156 (56.9%)
Muslim	24 (15.5%)	25 (21.0%)	49 (17.9%)
Char Inhabitant	--	5 (4.2%)	5 (1.8%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274 (100.0%)**
Occupation of Respondents			
House wife	98 (63.2%)	99 (83.2%)	197 (71.9%)
Labour/ Daily wage -earner.	5 (3.2%)	--	5 (1.8%)
Service-holders	52 (33.5%)	20 (16.8%)	72 (26.3%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274 (100.0%)**
Occupation of Husbands			
Farmer	1 (0.6%)	23 (19.3%)	24 (8.7%)
Trade/Self- employed	67 (43.2%)	27 (22.7%)	94 (34.3%)
Service-holders	87 (56.1%)	65 (54.6%)	152 (55.5%)
Daily wage- earner	--	4 (3.4%)	4 (1.5%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274(100.0%)**

Monthly Income Status			
Less than Rs. 5000	13 (8.3%)	27 (22.7%)	40 (14.6%)
Rs.5000- Rs.10,000	34 (21.9%)	21 (17.6%)	55 (20.1%)
Rs.10,000- Rs.20,000	54 (34.8%)	25 (21.0%)	79 (28.8%)
above Rs. 20,000	54 (34.8%)	46 (38.7%)	100 (36.5%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274 (100.0%)**
Expenditure Status			
Less than Rs. 5000	34 (21.9%)	52 (43.7%)	86 (31.4%)
Rs.5000- Rs.10,000	63 (40.6%)	22 (18.5%)	85 (31.0)
Rs.10,000- Rs.20,000	48 (31.0%)	35 (29.4%)	83 (30.3%)
above Rs. 20,000	10 (6.5%)	10 (8.4%)	20 (7.3%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274(100.0%)**
Total Number Of Living Children			
≤ 2 children	86 (55.5%)	45 (37.8%)	131 (47.8%)
3 children	69 (44.5%)	40 (33.6%)	109 (39.8%)
4 children+	–	34 (28.6%)	34 (12.4%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274(100.0%)**
Mean number of living children	**(2.4)**	**(2.9)**	**(2.6)**
1st Use Of Spacing :			
After 1st birth	93 (56.0%)	40 (33.7%)	133 (48.5%)
After 2nd birth+	62 (40.0%)	79 (66.4%)	141 (51.5%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274(100.0%)**
Average years of spacing between 2 children with respect to the sex of older child:			
a) son	3.4 Years	2.7 Years	3.1 Years
b). Daughter	2.3 years	1.9 Years	2.3 Years
Number Of Living Sons			
0 son	10 (6.4%)	6 (5.0%)	16 (5.8%)
1 son	76 (49.0%)	55 (46.2%)	131 (47.8%)
2 sons	69 (44.5%)	54 (45.4%)	123 (44.9%)
3 sons +	–	4 (3.4%)	4 (1.1%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274(100.0%)**
Husband Wife Discussion			
Yes	131 (84.5%)	86 (72.3%)	217 (79.2%)
No	24 (15.5%)	33 (27.7%)	57 (20.8%)
Total	155 (100.0%)	119 (100.0%)	274(100.0%)
Accessibility To F.P.			
1-2 Km	113 (72.9%)	65 (54.6%)	178 (65.0%)
3-4 Km	25 (16.1%)	46 (38.7%)	71 (25.9%)
5-6 Km	17 (11.0%)	6 (5.0%)	23 (8.4%)
6-7 km and above	–	2 (1.7%)	2 (0.7%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274 (100.0%)**
Motivated By			
Husband	90 (58.2%)	44 (37.0%)	134 (48.9%)
Wife	41 (26.5%)	28 (23.5%)	69 (25.2%)
Others	24 (15.5%)	12 (10.1%)	36 (13.1%)
ANM /ASHA	–	35 (29.4%)	35 (12.8%)
Total	**155 (100.0%)**	**119 (100.0%)**	**274(100.0%)**

Source: sample survey of the present study.

urban area is lower than that in the rural area. Out of the total of 155 users of modern spacing method in the urban area, 8.4 percent are educated up to primary school, 5.8 percent up to middle school and 46.5percent below matriculation, while 15.5 percent and 21.9 percent up to matriculation or higher secondary school and graduation and above. In the rural area, out of 119 users of modern spacing method, 20.2 percent are illiterate, while 19.3 percent and 8.4 percent are educated up to primary school and middle school levels. An equal proportion i.e. 16.0 percent of respondents using spacing method have attained education below matriculation and up to matriculation or higher secondary school level and the rest 20.2 percent are qualified up to the level of graduation and above.

Educated husbands are keener to participate in the reproductive life of wives and hence encourage family planning for better health of the mother and the child. In our present study, the user of modern spacing method amongst 274 women is observed to increase with the educational status of the husbands (Table- 5.B.2.). In the urban area the proportion of husbands i.e. 1.3 percent of a total of 155 respondents is illiterate while the rest 0.6 percent, 5.2 percent, 19.2 percent, 38.1 percent and 35.5 percent have attained education up to the levels of primary school, middle school, below matriculation, up to matriculation or higher secondary school and graduation or above respectively. On the other hand, 9.2 percent husbands of 119 women using modern spacing methods in the rural area, belong to both the categories of no education and education up to primary school. the

proportion of respondents using modern spacing method in the other categories of education i.e. up to the levels of middle school, below matriculation, up to matriculation or higher secondary school and up to the level of graduation and above are 16.2 percent, 10.1 percent, 25.2 percent and 29.4 percent respectively.

General Caste Hindu women constitute highest proportion to the total users of modern spacing method in our sample study (i.e. 56.9 percent), followed by the Muslim women (i.e. 17.9 percent), the SC women (i.e. 15.3 percent) the ST (Bodo) women (i.e. 8 percent) and the Char women (1.8 percent).

The proportion of house-wives amongst the 274 currently married women who opted for modern spacing methods in our sample is considerably high (83.2 percent in the rural area and 63.2 percent the urban area). The proportion of women in other occupational categories of daily wage earner or labourer and the service holders are 3.2 percent and 33.5 percent in the urban area. In the rural area the use of modern spacing method is found to be 16.8 amongst the service holders women while it is found to be nil amongst the daily wage earners.

The use of modern spacing method is found to vary widely among 274 women who opted for the method with the occupational status of the husbands. It is found that the proportion of the users of the modern spacing method is highest when husbands are service holders (i.e. 55.5 percent), followed by the traders and self employed (i.e. 34.3 percent), farmers (i.e. 8.7

percent) and the daily wage earners (1.4 percent). The same trend is observed in both the urban and the rural area.

A positive relationship between the use of spacing method and the monthly family income-and-expenditure status of the respondents has been observed. The proportion of respondents using spacing methods belonging to the lowest income category (less than Rs.5000/-) is 14.6 percent and it is found to increase up to 36.5 percent at the highest level of income category (above Rs.20, 000/-). Similar trend has been observed in the monthly family expenditure categories but an exception is found in the rural area. A major proportion i.e. 43.7 percent, out of the total of 119 users of spacing methods in the rural area, is in the lowest expenditure category (less than Rs.5000/-), while, the rest 18.5 percent, 29.4 percent and 8.4 percent are in the categories of Rs.5000/- to Rs.10,000/-, Rs.10,000/-to Rs. 20,000/- and Rs.20,000/- and above respectively. It is found that the free distribution of oral pill and condoms by the health functionaries and the familial support from the relatives including the financial supports in the rural area are the prime factors underlying higher acceptance of contraception amongst the respondents belonging to the lower economic stratum.

It is also observed that the urban women using modern spacing method are keener to adopt small family norm (mean number of children is 2.4) in comparison to their rural counter parts (mean number of children is 2.9). But, the average use of modern spacing method between two births of children when the older child happens to be a son are comparatively longer

(i.e. 3.1 years) as against the average use of spacing when the older child happens to be a daughter (i.e. 3.2 years). Thus, the average years of spacing is found to shorter when the older child was a daughter than when it was a son and the difference is 0.8 months. This implies that the couples generally want to have the birth of next child (preferably son) without spacing when they have a daughter and prefer to space between two births of children or postpone the next birth of chid when the older child happens to be a son. A similar trend has been observed in both the urban and rural area. This clearly indicates the existence of son preference amongst the women using modern spacing method in our sample study.

Again, the use of modern spacing method amongst 274 current users in our sample study has been observed to decrease with the number of living sons. Major proportion of respondents using modern spacing method (i.e. 47.8 percent and 44.9 percent) has been found with 1 and 2 living sons. This implies that women using contraception in our sample study prefer terminal method to spacing method after having 1 or 2 living sons as they have attained the desired size and sex composition of the children. Similar trend has been observed in both the urban and the rural areas.

The use of modern spacing methods is observed to be highly influenced by the husband-wife discussion on family planning. It is found that 79.2 percent of the total users of the method (i.e. 274) have had some kind of the discussion. In the urban area it is found 84.5 percent of the total of 155

users have resorted to discussion while, in the rural area it is found to be 72.3 percent.

The use of contraceptive has also been observed to vary with the accessibility to the health facilities especially in the rural areas. A larger proportion (i.e. 65 percent) of the total users of modern spacing method (i.e. 274) in our sample study is found amongst the women who are within the distance of 1-2 kilometres from the source of family planning or health centre. In the rural area the proportion of 119 total users of modern spacing methods, within the distance of 1-2 kilometres is found 54.6 percent while, the rest 38.7 percent, 5.0 percent and 1.7 percent are found within 3-4 kilometres, 5-8 kilometres and 7-8 kilometres and above respectively.

A major proportion (i.e. 48.9 percent) of the total users of modern spacing method (274) is motivated by the husbands while, 25.0 percent by the respondents themselves and the rest 13.0 percent and 12.7 percent are by others (i.e. relatives or friends or neighbour) and the health workers like doctors or nurse or ANM or ASHA workers respectively. In the urban area, more than half of the total users of modern spacing method are motivated by the husbands while, in the rural area it is about 37.0 percent. The proportion of the total use motivated by the respondents in the urban area is 26.5 percent and it is 23.5 percent in the rural area. The exception that is observed in the rural area is the proportion 29.4 percent of the total use of modern spacing method is motivated by the health workers. This implies a better backup service and a systematic and sustainable effort by the health

workers in motivating the couples for opting for modern spacing method can promote the use of spacing in the rural area.

5.B.4. CURRENT MEAN AGE OF WOMEN USING MODERN SPACING METHOD: TRIBAL, NON-TRIBAL AND CHAR WOMEN.

A comparative study of the differential current mean age of the users of modern spacing methods by the groups of respondents shown in the Table–5.B.3, gives us an idea about the impact of the contraceptive use in the district. In our sample study, the current mean age of 274 women currently using the modern spacing method is considerably high i.e. 29.1 Years in the urban area and 28.4 years in the rural area.

Table-5.B.3.

Percentage Distribution of Users of Spacing Method by Current Mean Age: Tribal, Non-tribal and Char women

R/U	Tribal	Non- Tribal			Char Inhabitants	
	ST (Bodo)	SC	General Caste Hindu	Muslim	Char	Total
Urban	28.7 yrs	29.7 yrs	29.3 yrs	28.7 yrs	–	29.1yrs
Rural	25.5 yrs	27 yrs	29.8 yrs	27.8 yrs	23 yrs	28.4 yrs

Source: Sample survey of the present study.

The current mean age of the ST women using the modern spacing method is found 28.7 years in the urban area while, it is found lower in the rural area i.e.25.5 years. On the other hand, the mean age of the non-tribal women is found comparatively higher both in rural and the urban area.

During the field study, it has been observed that most of the users of the modern spacing method amongst the General Caste Hindu women in

the higher age groups prefer to use the modern spacing method to sterilization as a device to limit the size of the family. This may be a reason of higher mean age of the users of modern spacing method amongst the General Caste Hindu (29.8 years).

5.B.5. MEAN NUMBER OF LIVING CHILDREN OF WOMEN USING MODERN SPACING METHOD: TRIBAL, NON-TRIBAL AND CHAR WOMEN

The use of modern spacing method varies amongst the respondents of different groups with respect to the actual size of the family.

Table - 5.B.4.

Percentage Distribution of Users of Modern Spacing Methods by Mean Number of Living Children: Tribal, Non-Tribal and Char Women

U/R	Tribal	Non-Tribal			Char Inhabitants	
Mean Number of Children	ST (Bodo)	SC	General Caste Hindu	Muslim	Char	Total
Urban	3.3	2.7	2.3	2.5	--	2.4
Rural	3	2.9	2.6	3.7	3.4	2.9
Total	3.1	2.7	2.4	3.1	3.4	2.6

Source : sample survey of the present study.

Table-5.B.5 shows that the mean number of living children of the General Caste Hindu women is least in both the urban and the rural area. It is highest amongst the ST i.e. 3.3 in the urban area and amongst the Char women i.e. 3.4 in the rural area.

5.B.6. DIFFERENTIAL USE OF SPACING BY FIRST USE: TRIBAL, NON-TRIBAL AND CHAR WOMEN.

Use of spacing varies amongst the respondents in respect to the first time of use. It does not merely reflect the intention of the couples regarding the spacing between two children but also reflects the reproductive intentions of the couples

Table- 5.B.5.

**Percentage Distribution of Respondents by first Use of Spacing:
Tribal, Non-Tribal and Char Women.**

	Tribal	Non-Tribal			Char Inhabitant	Total
1st Use Of Spacing	ST	SC	General Caste Hindu	Muslim	Char	
ᵻ After birth of first child	--	19 (45.2%)	101 (64.7%)	13 (26.5%)	--	115 (42.0%)
After birth of second child	22 (100.0%)	23 (52.4%)	55 (35.3%)	36 (73.5%)	5 (100.0%)	159 (58.0%)
Total	22 (100.0%)	42 (100.0%)	156 (100.0%)	49 (100.0%)	5 (100.0%)	274 (100.0%)

Source : Sample survey of the present study.

. Table-5.B.5. above shows that the General Caste Hindu women with lower average number of children (i.e. nearly 2) preferably use the modern spacing method after the birth of first child (64.7 percent) in comparison to their SC counterparts (i.e. 45.2 percent) and the Muslims (26.5 percent). On the other hand, the use of spacing method after the birth of second child or more is found to be highest amongst the ST and the Char women (i.e. 100.0 percent) followed by the Muslims (i.e. 73.5 percent), the SC women (52.4 percent) and Char women (100.0 percent).

213

5.B.7 DIFFERENTIALS IN THE AVERAGE USE OF SPACING BETWEEN TWO BIRTHS WITH RESPECT TO THE SEX OF OLDER CHILD

The mean birth interval or the average years of use of spacing between two births has been observed to vary widely with respect to the sex of the older child. It is observed from Table-5.B.7 that the average years of

Table -5.B.6

Percentage Distribution of the Users of Modern Spacing Method by the Average Years of Spacing between Two Births: Tribal and Non Tribal women.

	Tribal	Non-tribal			
Older child happens to be	ST (Bodo)	SC	General Caste Hindu	Muslim	Total
a) a son	2.3 yrs	2.7 yrs	3.1 yrs	3.1 yrs	3.1 yrs
b) a daughter	2.1 yrs	1.6 yrs	2.1 yrs	1.4 yrs	1.9 yrs

Source : Sample survey of the present study.

use of modern spacing method between two births of children was shorter if the older child was a girl than if it was a boy and the difference is 1.2 years. This pattern of differential average use of spacing between two births with respect to the sex of older child is an indicative of son preference. Son preference with respect to the average use of spacing is, however, observed to be less pronounced amongst the ST (Bodo) respondents. Amongst the Char women, the use of spacing between two children with respect to the sex of the older child has been insignificant as the use of family planning

amongst the char women is very poor and they generally prefer to have larger family.

5.B.8   CONCLUSION:

Modern spacing method of contraception is the most popular method in use in the district. In our sample study, it has been observed that the percentage of users of modern spacing method is higher in the urban area than that in the rural area (including the Char area), exception being the Muslim women. Modern spacing method is the only method in use amongst the Muslim women in the rural area.

The use of modern spacing method is found to be higher in proportion when the women have attained education up to middle school and above. However, education of husband is also found to have a more significant influence on the use of the contraception. In the urban area, the use of the modern spacing method is found higher when the husbands have attained education above the middle school.

The use of modern spacing method is found comparatively higher in the age groups of below 30 years (i.e. 61.7 percent). But, a considerable proportion of women (i.e. 38.4 percent) in the higher age groups i.e. 30-34 years and above prefer to opt for modern spacing method to female sterilization to limit the size of the family because of the fear of side effect and the existence of social taboos associated with sterilization.

The use of contraceptive for spacing between two births amongst the women in our study has been found to be less effective as majority of the

215

users of spacing method have opted for the method after the birth of the second child. This implies that a major proportion of women using modern spacing method preferred to postpone the use of contraception until their desired size of family and desired sex composition of children are achieved. Spacing between births of two children is also influenced by the sex composition of the older child of the respondents. A major proportion of women preferred spacing between two births when the older chid happened to be a son rather than a daughter.

In the rural area, the health workers like the ASHA and ANM as motivators have limited influence on the use of modern spacing method. They are mainly appointed to render service to the pregnant women for vaccination and to promote institutional deliveries. Moreover, they generally counsel the women for opting for sterilization as these yields certain incentives to them. Accessibility to the source of family planning in the rural area matters to a great extent to promote the use of contraception. In our field study it has been observed that a considerable proportion of users of modern spacing methods (i.e. 38.7 percent) have to cover the distance of 3-4 kilometres in the rural area to access the source of family planning. This is because most of the nearest sub centre or the health centres in the rural area lack proper facilities and services. Thus, an easy access to qualitative family planning services can improve the use of modern spacing methods amongst the currently married women in the district.

*****

5.3: PRESENTATION OF DATA BY FIGURES:
FIGURE: 5.3.1: Use of Sterilization and Modern Spacing Method
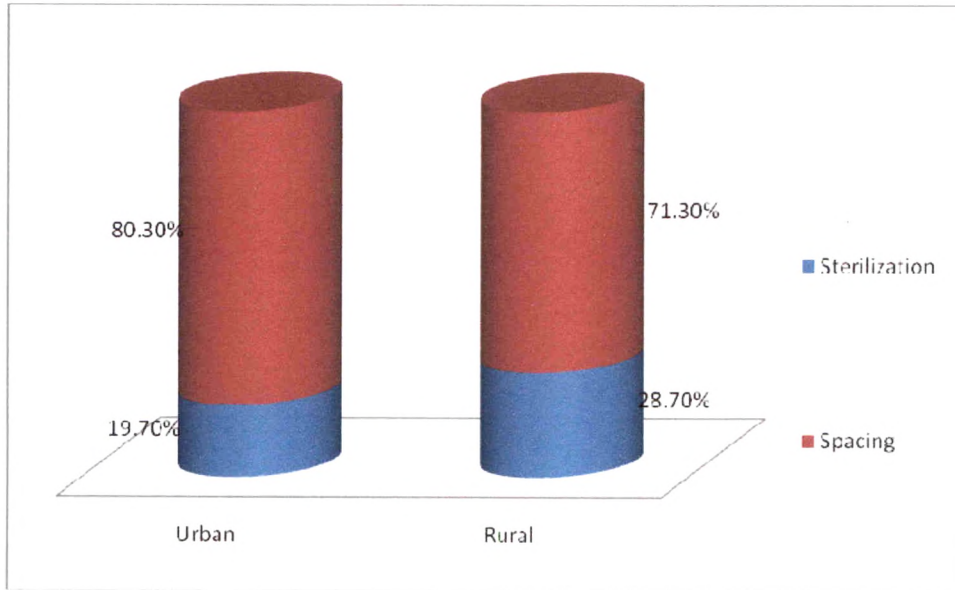
FIGURE: 5.3.2: Use of Sterilization & Spacing by Tribal, Non-Tribal and Char Women
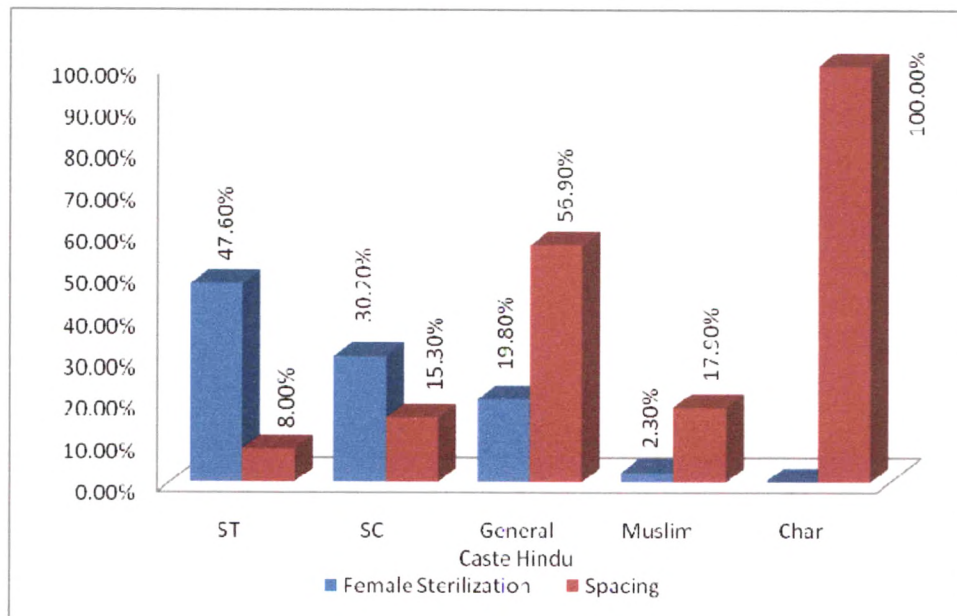
Figure: 5.3.3: Mean number of Children of the Users of Sterilization by Tribal, Non-Tribal and Char Women
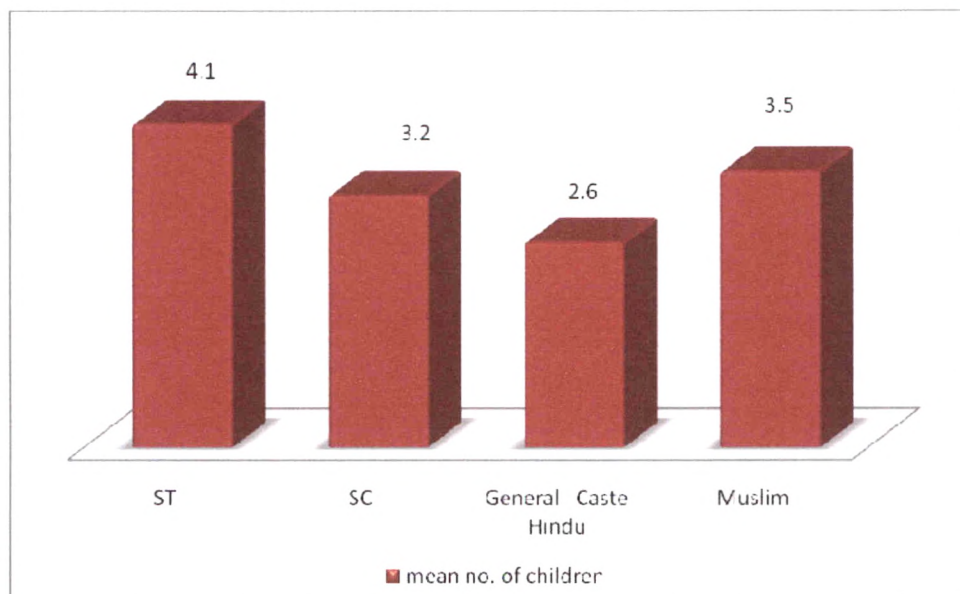
Figure: 5.3.4: Use of Sterilization and number of Living Sons by Tribal, Non-Tribal and Char Women.

218
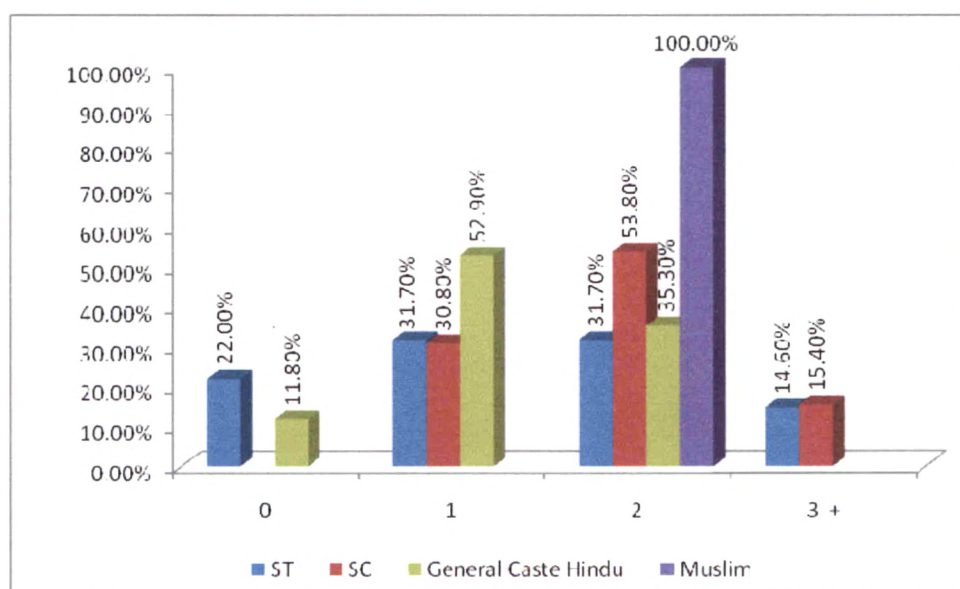
Figure : 5.3.5: Use of Sterilization and number of Living Daughters by Tribal, Non-Tribal and Char Women.
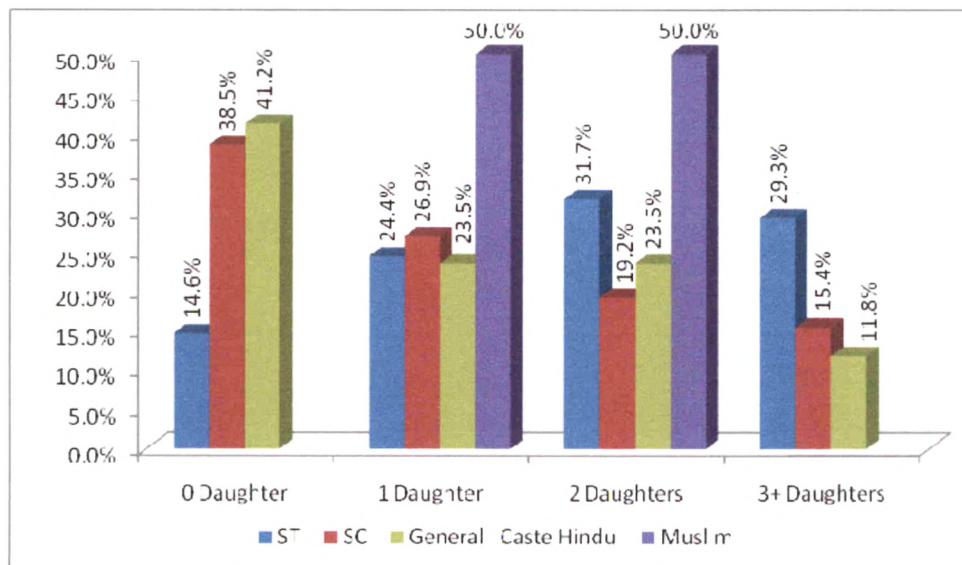
Figure: 5.3.6: Rural–Urban Percentage Distribution of the users of Modern Spacing Method by Tribal, Non-Tribal and Char Women.
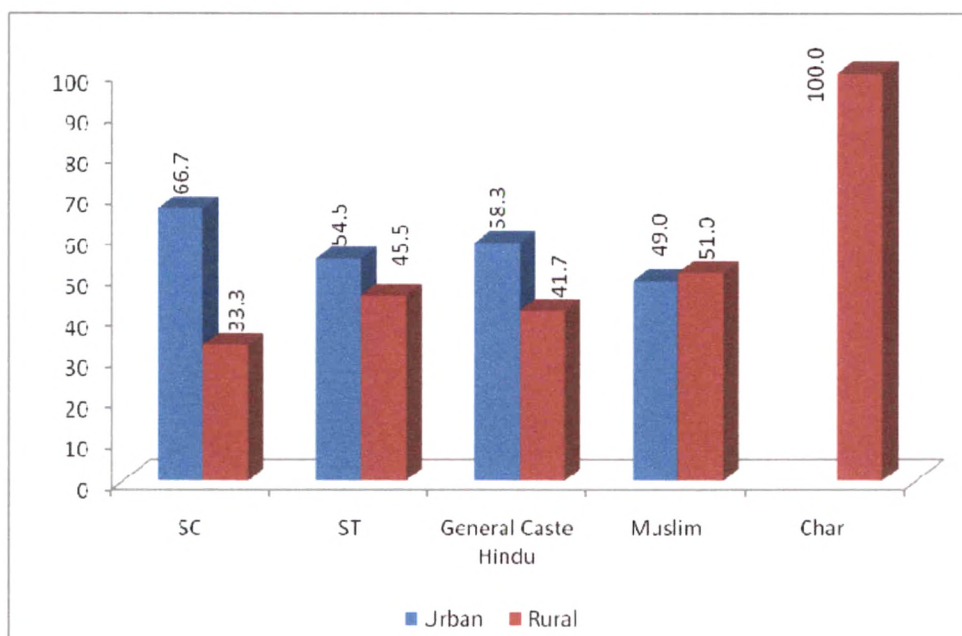
Figure: 5.3.7: Differentials in the use of Spacing by First Time of Use.
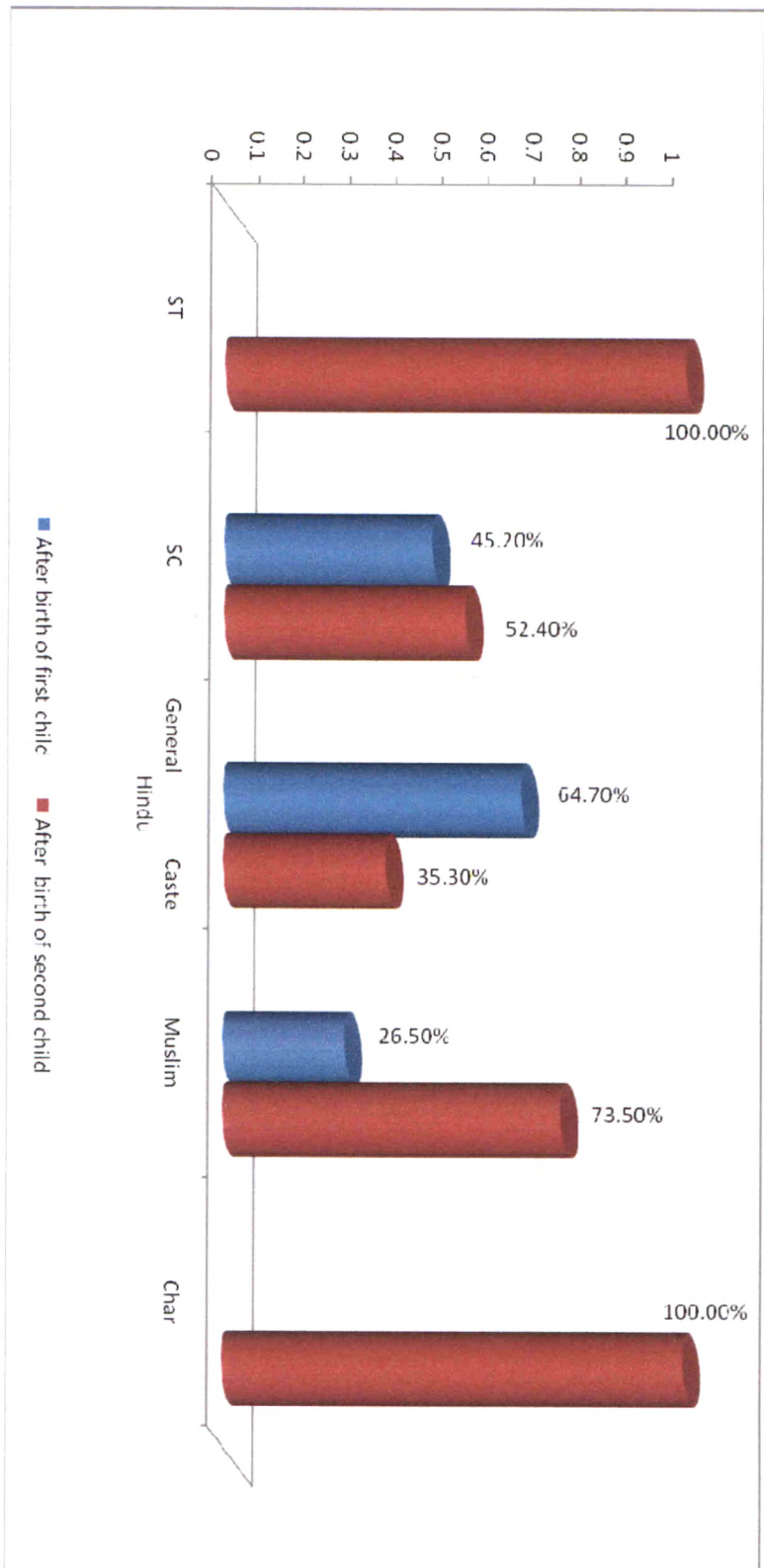
CHAPTER 6

UNMET NEED FOR CONTRACEPTION

6.1.1. INTRODUCTION:

The concept of unmet need of family planning has been regarded as the most important aspect in the policy implementation of family planning programme. The concept, in general, identifies the fraction of married women of the reproductive age group who wants to avoid or postpone childbearing but are not using contraception at present. Hence, the incidental impact of family planning programmes cannot be truly projected without an analysis of unmet need or the volume of non-users. In other words, it is the other side of the same coin of contraception. According to the NFHS-1 (1992-93) the total unmet need for family planning was 19.5 percent and the unmet need for spacing and for limiting were 11.0 and 8.5 percent (IIPS, 1995) respectively. However, the second and third round of NFHS recorded a declining trend of unmet need of family planning in India. The estimated total unmet need declined to 15.8 percent during NFHS-2 (1998-99) and 13 percent during NFHS-3 (2005-06). The unmet need for spacing and for limiting has also registered a declining trend during both the survey periods but the decline in the unmet need for spacing was slightly higher than that of the unmet need for limiting. NFHS-2 estimated the unmet need for spacing at 7.5 percent which further declined to 6 percent in NFHS-3. The unmet need for limiting, estimated at 8.3 in NFHS-2, has declined to 7 per cent in NFHS -3. Taking the world as a whole, India accounted for a considerable proportion of women with unmet need for family planning. It has been realised that had the unmet need for family planning been eliminated, there would have been a substantial reduction in World Fertility

(Westoff and Bankole, 1996). If the unmet need could be brought down to zero by proper follow up measures of family planning programme, India would have reached the replacement level fertility (Pathak et.al 1998).

6.1.2. HISTORICAL DEVELOPMENT OF THE CONCEPT OF UNMET NEED:

The definition and measurement of unmet need of family planning have under gone a sea change and developed considerably during the past decade. Westoff and Pebley (1981) initially identified 11 measures of unmet need based on various combinations of women's breast feeding status, fecundity and whether a modern or traditional method was used. But these early measures did not take into account the unmet need for spacing because of lack of data (NFHS Survey Report No. 1). Nortman (1982) introduced measures of unmet need for limiting. Nortman, however, excluded the pregnant women and amenorrhoeic women for consideration. Subsequently, in the KAP studies, unmet need of family planning was measured by KAP gap which refers to the differences between reproductive intentions and contraceptive use (Westoff 1988).

The concept of KAP gap as defined by Westoff helps us to estimate the percentage of fecund, non pregnant, non amenorrhoeic married women who are not using contraception and either want to space or limit their childbearing. Later on, Bongaart (1991) modified the measure by including unmarried women and pregnancy resulting from contraceptive failure. A much broader definition was evolved by inclusion of other aspects

like incorrect and occasional use of contraception (Dixtion Muller and Germain, 1992). NFHS (I,II and III) has categorised unmet need of family planning as unmet need for limiting and unmet need for spacing.

The present study of unmet need (both limiting and spacing) has followed the definition of KAP studies and hence has included the fecund non-pregnant, non-amenorrhoic currently married women who were not using any contraception but intend to use in future (shown in Table-6.3 in the following section).

6.1.3. NON – USERS BY PLACE OF RESIDENCE: TRIBAL, NON-TRIBAL AND CHAR WOMEN

The rural – urban percentage distribution of non – users in our sample study by the groups of respondents is presented in the following Table - 6.1.

Table-6.1.

Percentage Distribution of Non-Users: Rural/Urban

U/R	Tribal	Non -tribal			Char inhabitants	Total
	ST	SC	General Caste Hindu	Muslim	Char	,
Urban	3 (4.5%)	25 (69.4%)	52 (47.7%)	13 (27.1%)	--	93 (23.5%)
Rural	64 (95.5%)	11 (30.6%)	57 (52.3 %)	35 (72.9%)	63 (100.0%)	230 (71.2%)
Total	67 (100.0%)	36 (100.0%)	109 (100.0%)	48 (100.0%)	63 (100.0%)	323 (100.0%)

Source: sample survey of present study.

223

In our sample study, the total number of respondents currently not using contraception is 323 (out of the total sample size 724) i.e. 44.6 percent which is considerably high. The rural urban percentage distributions of non – users by the groups of respondents, presented in the Table-6.2, also shows that the proportion of non users in the rural area (i.e. 71.2 percent) are well above the urban proportion (i.e. 28.8 percent).

Table-6.2.

Percentage Distribution of Users and Non-Users : Rural/Urban

		Tribal ST (Bodo)	Non -Tribal			Char Inhabi- tants	Total
		ST	SC	General Caste Hindu	Muslim	Char	
Urban	Non- Users	3 (13.0%)	25 (34.7%)	52 (47.7%)	13 (31.0%)	–	93 (31.2%)
Urban	Users	20 (87.0%)	47 (65.3%)	109 (67.7%)	29 (69.0%)	–	205 (68.8%)
Urban	Total	23 (100.0%)	72 (100.0%)	161 (100.0%)	42 (100.0%)	–	298 (100.0%)
Rural	Non Users	64 (55.7%)	11 (26.8%)	57 (44.5%)	35 (47.3%)	63 (96.3%)	230 (54.0%)
Rural	Users	51 (44.3%)	30 (73.2%)	71 (55.5%)	39 (52.7%)	5 (7.4%)	196 (46.0%)
Rural	Total	115 (100.0%)	41 (100.0%)	128 (100.0%)	74 (100.0%)	68 (100.0%)	426 (100.0%)

Source: sample survey of present study.

Majority of the non-users (i.e. proportion of the total non-users within each selected group of respondents) reside in rural areas with the

exception being the SC. The majority of the SC women in our sample study are found in the urban area. Thus, it is found that 30.6 percent of the total non-users amongst the SC reside in the rural area while, 69.4 percent reside in the urban area.

Table-6.2 shows that the urban proportion of non-users (i.e. 31.2 percent out of 298 currently married women in the urban area) is lower than the rural proportion of non – users (i.e. 54.0 percent out of 426 currently married women in the rural area). The urban proportion of currently married women not using contraception at present, are found highest amongst the General Caste Hindu women (i.e. 47.7 percent) and least amongst the Bodo (i.e.13.0 percent). This is because, most of the General Caste Hindu women in the non-users category are found in the higher age category or in the category of having attained menopause. On the other hand, the rural proportion of currently married women not using contraception at present is found highest (i.e. 96.3 percent) in the Char area (as the acceptance of family planning in the Char area is almost nil i.e.7.4 percent) and least amongst the SC (i.e. 26.8 percent).

6.1.4. CATEGORIZATION OF UNMET NEED BY REASONS FOR NOT USING CONTRACEPTION:

Unmet need of family planning has also been categorised by reasons by many studies. In general, justification of government spending and non government spending on family planning is based on unmet need (Casterline and Sinding, 2000). An accurate identification of the causes of

unmet need helps in policy formulation of family planning and thereby to reduce unmet need.

A primary cause of unmet need of family planning has been the desire for additional children (Westoff and Bankole 1995). Women in this category want to space the child birth but at present do not use any contraception and hence, are excluded from the category of women of current users.

Son preference and as a consequence, the low status of women is very much common in India (Arnold et. al. 1998). Studies in India have highlighted three dimensions of the utility of having a son. These are economic, social and religious. Economic utility of having a son arises since he is seen as a wage earner, assistant in agriculture production and above all, as a security in old age. Social utility of having son comes out of the kinship and descent system, and status of family in society provided by son and the premium to be expected from having a son in the form of dowry payment. Religious utility stems from the performance of sacred rites of lighting the funeral pyre of both parents by sons (Miller, 1981; Bardham 1988; Basu 1989; Karve, 1965; Kapadia, 1966; Dyson and Moore, 1983; Caldwell, Reddy and Caldwell, 1989). In societies like India, where the preference for having sons is strong, the intention not to use contraception will depend on number of living sons. Generally, preference for at least one living son is found strong amongst the couples. It is also observed that the woman with one or two children may want to limit or space the child bearing

but, because of son preference she is often forced by her family to go for another child.

Another most common reason of women not using contraception is that they lack the knowledge of family planning. (Westoff and Bankole 1995). Unmet need has been observed to be low where the knowledge of family planning is high (Bongaart and Bruce, 1995).

Fear of side effects of the use of contraception (particularly Sterilization) has been one of the common concerns among the men and women who do not prefer to use contraception (Stash, 1997; Bhusan, 1996; Viswanathan, 1998).

Women often do not use contraception due to some social reasons. Women have unmet need for family planning because they often have to bear the high social cost in challenging the husband's oppositions or other family members' oppositions (Nag,1984; Dharmalingam, 1995). This is because of the fact that the decision to use family planning methods is determined by husbands (Viswanathan, 1998, Khan et al, 1996). Women also have unmet need of family planning because of the religious restrictions. The religious bar to contraception is one of the prime reasons of women's unmet need for contraception.

Women's general health condition has been reported as another reason of women's unmet need. Most of the women have unmet need because they believe that they are unlikely to become pregnant and hence, show a casual approach to contraceptive (Casterline et al., 1997; Yinger, 1998). Many women may correctly perceive their inability to conceive while,

other run a risk of unintended pregnancy. A study by Mishra et. al, (1994) found that the proportion of users at older age group decreases mainly because of two reasons: first, women, in this group may already be using contraception and second, women in this age group have almost completed their desired family size as they have reached the middle of their reproductive age. Thus, the women who stopped using contraception may feel that they have attained menopause and have no need for contraception (Ramesh et. al. 1996). The proportion of women (in a society like Bangladesh where the use of contraceptive is generally low and preference for larger family is common) in the unmet need category is found higher with higher parity of children. This is because; women in older age group with higher parity lack the desire for having more children compared to the women with lower parity (Kabir, Elahi and Moslehuddin,1987).

Women also do not use contraceptives because they dislike it and find the particular method available to them as inconvenient (Yinger, 1998). Women avoid contraceptives (spacing) because, they consider it more problematic and complicated to plan child bearing than to bear a child or go with Sterilization (Visaria, 1997). Thus, it has been realised that the fear of side effects of contraceptive is one of the major causes for not using contraception by women.

A study made by Kaushik, Murali and Vemuri (2003) analysed six reason components of unmet need-health related reasons, social reasons, programme related reasons, technology related reasons and others.

In our present study we have categorised the women who do not intend to use contraception into mainly three reason components i.e. want for children at later date, social inconvenience and private inconvenience.

The component of want for children at later date includes the responses like want for a son or a daughter or does not matter. Women in this reason component were not using any method at present but intend to use at later date. The component private inconvenience includes the responses that relate to the method per se i.e. disliking and inconveniency of using a particular method. The reasons of not using contraception that directly originated because of family planning programmes e.g. cost, fear of side effects, fear of method failure, lack of knowledge, irregular supply, casual approach etc. are also included in the private inconvenience component. Reasons like difficulties in getting pregnant, health not permitting are also counted as private inconvenience. The reason component of social inconvenience for the use of contraception is comprised of the groups of respondents who cited the reasons like opposition of husbands, other people and also religious leaders.

It has been observed that women did not use contraception for multiple reasons and hence one single answer might not reflect the reason for why they were not using the same (Westoff and Bankole, 1995). Furthermore, women often do not reveal the real reason because of embarrassment, politeness or other cultural constraint and hence, prefer to provide a substitute cause that they consider reasonable (Bagaarts, 1995,

Casterlive it. al., 1995 Nag, 1984). To keep all these probable errors that are involved in categorization of reasons of not using contraception by the women at the minimum level, we finally designed the questionnaire after a pilot survey of field area in such a way to check and recheck the responses of the women and thereby to single out one possible reason of not using contraception.

6.1.5. INTENTION TO USE CONTRACEPTION AMONG THE NON USERS BY NEED FOR TOTAL, LIMITING AND SPACING.

In the present study, during the interview schedule, all the currently married women who were not using any contraception were asked about their future intentions regarding the use of the same. It was found that the reasons of not using contraception in both the cases of intended users and non–intended users were the same. The intention to use contraception (intended and non–intended) is again classified according to the need for contraception i.e. limiting and spacing.

Table: 6.3.

Intention to Use Contraception and the Need For Total, Limiting and Spacing .

Intention to Use	Total	Limiting	Spacing
Yes:	294 (91.0%)	142 (83.0%)	152 (100.0%)
No	29 (9.0%)	29 (17.0%)	--
Total	323 (100.0%)	171 (100.0%)	152 (100.0%)

Source: sample survey of the present study.

. From Table–6.3 above it is observed that 91.0 percent out of

323 women not using contraception, intended to use contraception in future,

while 9.0 percent did not intend to use in future. It is worthwhile to mention

that non-intended users were the discontinued users and most of them were

infecund or have attained menopause. Thus, it constitutes 17.0 percent of

the total need for limiting amongst 323 non- users. The total need for limiting

amongst 323 women not using contraception (including the Char women), is

found to be considerably high in our sample study i.e. 171 (52.9 percent)

while, total need for spacing amongst the 323 women not using

contraception, is however, found to be 152 (i.e. 47.1 percent). This implies

that the preference for female sterilization as a method of contraception is

higher than that of the modern spacing method amongst the non users.

During the field study, it is observed that majority of the non-users in the

rural area were comparatively less educated and belonged to the lower

economic strata. They did not have the access to proper information and

knowledge of the modern spacing method. They even found it to be

cumbersome as it involved regular use (oral pill). As a result, they revealed

their preference for female sterilization to get rid of multiple pregnancies as

it needed to be used just once. On the other hand, health workers too

preferred to promote female sterilization (amongst the women irrespective

of their educational qualification) as it requires one time motivation and

yielded monetary incentives to both the motivators and beneficiaries.

Unsystematic ways of motivation for modern spacing methods by the health

workers, poor knowledge and access to the modern spacing method also

caused greater confusion in the minds of the less educated poor women regarding the use of modern spacing method in the rural area. Moreover, a larger fraction of non-users who wanted to space the birth of child, in our sample study, were unsure about when they would opt for contraception than amongst the women who wanted to limit the child bearing. This suggests considerable ambiguity regarding the use of contraception amongst the intended users with unmet need for spacing.

6.1.6 UNMET NEED FOR CONTRACEPTION BY REASON COMPONENTS: LIMITING, SPACING AND TOTAL

As regards the unmet need the present study has included the fecund non-pregnant, non-amenorrhoic currently married women who were not using any contraception but intend to use it in future for limiting and spacing (i.e. excluded 20 pregnant women from 294 intended users). The analysis of unmet need is done by three reason components of unmet need i.e. want for children at later date, social inconvenience, private inconvenience.

Table-6.4

Percentage Distribution of Non-pregnant Women by Reason Components of unmet need.

Reason Components	Total	Limiting	Spacing
Want Children at Later Date	38 (13.8%)	0	38 (25.0%)
Social Inconvenience	69 (25.2%)	49 (40.2%)	20 (13.2%)
Private Inconvenience	167 (60.9%)	73 (59.8%)	94 (61.8%)
Total	274 (100%)	122 (100%)	152 (100.0%)

Source: sample survey of the present study.

The distribution of non-pregnant women not using contraception (intended users) by reason components is shown in the Table – 6.4 above. It shows that the private inconvenience contains the highest percentage of women (60.9 percent). Highest percentage of women with unmet need for limiting i.e. (59.8 percent) has reported the private inconvenience as the reason for not using contraception. The factors like lack of knowledge (in case of limiting and spacing), afraid of sterilization 'worry about the side effects' in our present study are found to be the major reasons of unmet need in the above mentioned reason component. A considerable proportion of women with unmet need for spacing reported that non-accessibility or the irregular supply of the modern spacing methods as the reasons of not using contraception. During our field study, it has been observed that most of the non – users were discontinued users (oral pill users). They have stopped using oral pill because of side effects. Moreover, in the rural area, health workers often have faced shortage in supply of oral pills from the health centre and they are not well equipped to provide the service to the users like supplementary vitamins for the oral pill users. This caused irreparable side effects on the reproductive health of women (especially the pill users). Most of the discontinued users cited the said reason for not using oral pill. The element like 'health does not permit' has been marked as one of the major causes of unmet need in the reason component of private inconvenience. Reasons like the inconvenience to use the methods and dislike for the existing methods (i.e. method related) has also been observed to be one of the main reasons of unmet for spacing amongst the poor illiterate women in

233

the rural area. The health related reason like 'difficult to get pregnant' or 'health does not permit' has also been observed to be an important factor of unmet need for spacing in the reason component of private inconvenience.

Social inconvenience has recorded the second highest percentage of total unmet need (25.2 percent). 40.2 percent of women with unmet need for limiting and 13.2 percent of women with unmet need for spacing reported social inconvenience as the main reason of not using contraception. During the field study it has been observed that husband's opposition in case of both the spacing and limiting has been one of the prime factors of unmet need of contraception amongst the respondents. However, a considerable proportion of women in the rural area reported use of contraception was against religion.

The third major component i.e. want for children at later date, constitutes 13.8 percent of total unmet need while it constitutes 25.0 percent of total unmet need for spacing. Amongst the women with unmet need for spacing in the reason component of want for children at later date, preference for son has been observed to be higher than that for daughter. A few of the women with unmet need for spacing showed no preference for the sex of children.

Large scale poverty and non – availability of back up services from the health workers, non – accessibility to the required contraception, have been identified as the major causes of poor reproductive health of women in the rural area. Hence, the main focus of the study is to identify the

234

major areas that require attention and thereby to bring it into the notice of family planning personnel to improve the reproductive health of the women.

6.1.7. UNMET NEED BY REASON COMPONENTS: RURAL /URBAN

The rural-urban percentage distribution of women with unmet need by reason components is given in the Table-6.5 below. It is revealed that the total unmet need of the currently married women out of the total of 323 non-users in our sample study is 274 (i.e. 84.8 percent). In both the urban and rural areas, the reason component of unmet need like private inconvenience are comparatively more dominant. However, private inconvenience on account of health related reasons are more dominant in the urban area. On the other hand, in the rural area private inconveniencies

Table-6.5

Percentage Distribution of Reason Components
of Unmet Need: Rural / Urban.

U/R	Want for Children at Later Date	Private Inconvenience	Social Inconvenience	Total
Urban	14 (21.5%)	46 (70.8%)	5 (7.7%)	65 (100.0%)
Rural	24 (11.5%)	121 (57.9%)	64 (30.6%)	209(100.0%)
Total	38 (13.9%)	167 (60.9%)	69 (25.2%)	274(100.0%)

Source: sample survey of the present study.

like improper knowledge of the existing method, afraid of side effects, irregular supplies of methods etc. are the prime factors of unmet need. As it has been expected, social inconvenience as a reason component of unmet need is found to be comparatively more dominant in the rural area (i.e.30.6

percent) than that in the urban area (7.7 percent). The proportion of women in the reason component like want for children at later date in the rural area (including the Char women) is found to be 11.5 percent while, it is found to be 21.5 percent in the urban area.

6.1.8. UNMET NEED BY REASON COMPONENTS: TRIBAL, NON-TRIBAL AND CHAR WOMEN:

The percentage distribution of reason components of unmet need of the respondents in the three selected groups in our present study (presented in the Table-6.6 below) shows that the reasons related with private inconvenience has been the major cause of not using contraception amongst the respondents. It constituted 85.7 percent amongst the General caste Hindu, 77.2 percent amongst the ST, 63.3 percent and 45.0 percent

Table-6.6.

Percentage Distribution of Reason Components of Unmet Need by Tribal, Non-Tribal and Char Women

		Want for Children at Later Date	Private Inconve-nience	Social Inconve-nience	Total
Tribal	ST	5 (1.8%)	44 (77.2%)	8 (2.9%)	57 (100.0%)
Non-tribal	SC	7 (23.3%)	19 (63.3%)	4 (13.3%)	30 (100.0%)
	General Caste Hindu	13 (14.3%)	78 (85.7%)	–	91 (100.0%)
	Muslim	5 (12.5%)	18 (45.0%)	17(42.5%)	40 (100.0%)
Char Inhabitants	Char	8 (14.3%)	8 (14.3%)	40 (71.4%)	56 (100.0%)
	Total	**38 (13.8%)**	**167(60.9%)**	**69(25.2%)**	**274 (100.0%)**

Source: sample survey of the present study.

amongst the SC and Muslim respondents. It is worthy to be mentioned that most of the General Caste Hindu respondents cited the health related problems while the Bodo, SC and the Muslim women cited the method related problems. On the contrary, social component (husbands' opposition to the family planning and religious bar against the use of contraception) has been identified as the major component of unmet need amongst the Muslim women (i.e. 42.5 percent) and the Char women (i.e. 71.4 percent). This finding of our study is in conformity with that of the study where the social component has been found to predominate among the Muslim women (Kaushik, Murali and Vemuri, 2003). As the Muslim women are tightly bounded by the social customs and traditions particularly in the rural area and their mobility is also socially restricted for various reasons, they do not have easy access to the measures of family planning (Ram, 2001). It is worthwhile to mention that despite the social opposition to family planning, women in the Char area showed a strong willingness to adopt the family planning as they were exhausted of bearing children and yet afraid of going against the will of their husbands. In the Char area nearer to the town, a small proportion of women in the lower age group expressed a strong desire for the use of contraception but they could not do that as the measures were not regularly available to them. This implies that people in the Char area need proper counselling for family welfare.

In the following section of the present study, we have attempted to make an analysis of the reason component-variables of unmet need of

the currently married women with the background of socio-economic as well as demographic attributes.

6.2. UNMET NEED BY SOCIO-ECONOMIC CHARACTERISTICS:

Some selected socio-economic background variables of the respondents in the reason components of unmet need are discussed below.

6.2.1 REASON COMPONENTS OF UNMET NEED BY EDUCATIONAL STATUS OF RESPONDENTS:

Table–6.7 below shows that major proportion (i.e. 38.3 percent) of the total of 274 women in the unmet need category is illiterate while, 23.4 percent, 1.4 percent, 18.9 percent, 9.1 percent and 8.8 percent have attained education up to primary school, middle school, below matriculation, up to matriculation or higher secondary education and graduation and above respectively.

Table-6.7

Percentage Distribution of Reason Components of Unmet Need by Educational status of Respondents

Educational Status of Respondents	Want for Children at Later Date	Private Inconve- nience	Social Inconve- nience	Total
Illiterate	8 (7.6%)	48 (45.7%)	49 (46.7%)	105 (100.0%)
Up to Primary	11 (17.2%)	36 (78.3%)	17 (26.6%)	64 (100.0%)
Up to Middle	3 (75.0%)	1 (25.0%)	-	4 (100.0%)
Below Matriculation	9 (17.3%)	40 (76.9%)	3 (5.8%)	52 (100.0%)
HSLC /HS passed	5 (20.0%)	20 (80.0%)	-	25 (100.0%)
Graduate &above	2 (8.3%)	22 (91.7%)	-	24 (100.0%)
Total	**38 (13.8%)**	**167 (60.9%)**	**69 (25.2%)**	**274 (100.0%)**

Source: sample survey of the present study.

238

The percentage distribution of component variables by the educational status of women in the unmet need category presented in Table-6.7 above, also shows that the social and private inconvenience are the major reason components constituting 46.7 percent component and 45.9 percent amongst the illiterate women. It has been observed that the social inconvenience becomes less important as the level of education of women goes up. This is obvious because education helps women to overcome the social obligation and access proper knowledge and information regarding the methods of contraception. Thus, amongst 64 women who have attained education up to primary school, the proportion of unmet need in the component of social inconvenience is observed to drop almost by half of that amongst the illiterates and it has been observed to drop to zero at the higher level of education (i.e. up to matriculation or higher secondary and above). On the other hand, the proportions of unmet need amongst the women in the component of private inconvenience (related with health problems) are positively correlated with the level of education. As the awareness of the reproductive health amongst the women increases with the level of education, the proportion of women with unmet need at the higher level of education in the component like social inconvenience become zero. On the other hand, the proportion of women with unmet need at higher level of education in the component of private inconvenience is found comparatively larger than that of in the other components. The proportion of unmet need for spacing in the component of want for children at later date has, however, been observed to be least

amongst the respondents who attained education up to graduation and above.

6.2.2. REASON COMPONENTS OF UNMET NEED BY EDUCATIONAL STATUS OF HUSBANDS:-

From the Table–6.8, it is revealed that the proportion of illiterate husbands of 274 women in the unmet need category, is 24.8 percent while, the proportion of husbands i.e. 19.0 percent, 6.9 percent, 21.5 percent, 19.0 percent and 8.7 percent have attained education up to primary school, middle school, below matriculation, up to matriculation or higher secondary school and graduation and above respectively.

Table - 6.8

Percentage Distribution of Reason Components of Unmet Need
by Educational Status of Husbands

Education of Husband	Want for Children at Later Date	Private Inconvenience	Social Inconvenience	Total
Illiterate	2 (2.9%)	36 (52.9%)	30 (44.1%)	68 (100.0%)
Up to Primary	8 (15.4%)	21 (40.4%)	23 (44.2%)	52 (100.0%)
Up to Middle	2 (10.5%)	11 (57.9%)	6 (31.6%)	19 (100.0%)
Under Matric	9 (15.3%)	40 (67.8%)	10 (16.9%)	59 (100.0%)
HSLC /HS pass	12 (23.1%)	40 (67.8%)	-	52 (100.0%)
Graduate /above	5 (20.8%)	19 (79.2%)	-	24 (100.0%)
Total	**38 (13.9%)**	**167 (60.9%)**	**69 (25.2%)**	**274 (100.0%)**

Source: sample survey of the present study.

The percentage distributions of reason components for not using contraception (shown in the Table–6.8) also show that the proportion of

women whose husbands are illiterate and less educated is found to be higher in the component of social inconvenience and it is observed to drop to zero level when husbands have attained education up to matriculation and above.

On the contrary, the proportion of women with unmet need in the private inconvenience component is observed to increase with the level of husband's education. During our field study it has been observed that husbands with higher education were more aware of family planning and reproductive health of wives. This has resulted in an increased awareness amongst the women regarding their health and the use of the methods of contraception. On the other hand, husband's education, however, does not show a definite relationship with the proportion of unmet need amongst the women in the component of want for children at later date.

6.2.3. **REASON COMPONENTS OF UNMET NEED BY OCCUPATIONAL STATUS OF RESPONDENTS:-**

From Table – 6.9, it is revealed that a major proportion of women with unmet need (out of the total of 274 women) is house wives i.e. 90.5 percent while, the rest 2.6 percent and 6.9 percent are daily wage earners and service holders.

Table-6.9

Percentage Distribution of Reason Components of Unmet Need by Occupational Status of Respondents

Occupational Status of Respondents	Want for children at Later Date	Private Inconve-nience	Social Inconve-nience	Total
House-wives.	29 (11.6%)	150 (60.5%)	69 (27.8%)	248 (100.0%)
Service-holders	9 (47.4%)	10 (52.6%)	–	19 (100.0%)
Labour/Daily wage earner	–	7 (100.0%)	--	7 (100.0%)
Total	38 (13.9%)	167 (60.9%)	69 (25.2%)	274 (100.0%)

Source: sample survey of the present study.

It is also observed form Table – 6.9 above that social and private inconvenience correspond to larger proportions (i.e. 27.8 percent and 60.9 percent respectively) of unmet need amongst the women who are house wives. On the other hand, the proportion of unmet need on account of social inconvenience amongst the service holder women is found to be nil as the women engaged in service enjoyed better socio-economic status and hence, could take active part in the decision making including the reproductive decision. Consequently, the social reason of the unmet need is found to have no influence on the service holder women.

6.2.4 REASON COMPONENTS OF UNMET NEED BY OCCUPATIONAL STATUS OF HUSBANDS:-

The percentage distribution of unmet need by husband's occupational status estimated from the Table–6.10 reveals that 34.7

percent of husbands of 274 women in the unmet need category are farmers while, the rest 31.3 percent, 18.6 percent and 8 percent, are traders or self-employed, service–holder and daily wage earners respectively.

Table-6.10.

**Percentage Distribution of Reason Components
of Unmet Need by Occupational Status of Husbands.**

	Want for Children at Later Date	Private Inconve-nience	Social Inconve-nience	Total
Farmer	5 (4.3%)	61 (53.0%)	49 (42.6%)	115 (100.0%)
Trade/Self Employed	14 (16.3%)	67 (77.9%)	5 (5.8%)	86 (100%)
Service-holder	11 (21.2%)	39 (75.0%)	2 (3.8%)	52 (100.0%)
Daily Wage-earner	8 (38.1%)	–	13 (61.9%)	21 (100.0%)
Total	**38 (13.9%)**	**167 (60.9%)**	**69 (25.2%)**	**274 (100.0%)**

Source: sample survey of the present study.

Table-6.10 also reveals that private inconvenience as the reason component of unmet need is found to be high amongst the women whose husbands are farmer (53 percent), traders or self employed (77.9 percent) and also the service holders (75 percent). The percentage of social reason component is also found to be higher amongst the women whose husbands are farmers (i.e. 42.6 percent) and daily wage earners (i.e. 63.6 percent) as compared to the women whose husbands are traders (5.8 percent) and service holders (3.8 percent). This is because, a significant proportion of husbands of the women with unmet need, engaged in farming and daily wage earners, are from the Char area and the Muslim community and the

social component of unmet need amongst these groups of women is found to be considerably high (Table-6.6).

On the other hand, most of the women with unmet need whose husbands are service holders and self employed or traders are found to cite the private inconvenience like health related reason for not using contraception while the women whose husbands are farmers are found to cite the reasons like programme and method related reasons. This may be interpreted as a reflection of greater awareness and knowledge regarding the use of contraception and reproductive health amongst the women whose husbands are self employed or traders and service-holders. The service holder husbands impart knowledge and education of contraception to wives and hence, provide freedom of choice of contraception. This leads to a decline in the level of unmet need.

6.2.5. REASON COMPONENTS OF UNMET NEED BY ECONOMIC STATUS:

From the Table -6.11 and Tabe-6.12 above, it is observed that out of three reason components of unmet need, private inconvenience component has been the most important reason component of not using contraception amongst the women in the upper income and expenditure groups (i.e. above Rs.10,000/-).

Table-6.11.

Percentage Distribution of Reason Components of Unmet Need by Monthly Family Income.

Monthly Income	Want for Children at Later Date	Private Inconve-nience	Social Inconve-nience	Total
Less than Rs.5000/-	14 (10.5%)	69 (51.9%)	50 (37.6%)	133 (100.0%)
Rs.5000/- to Rs.10,000/-	8 (15.7%)	36 (70.6%)	7 (13.7%)	51 (100.0%)
Rs.10,000/-to Rs.20,000/-	4 (9.5%)	31(73.8%)	7 (16.7%)	42 (100.0%)
Above Rs.20,000/-	12 (25.0%)	31 (64.6%)	5 (10.4%)	48 (100.0%)
Total	**38 (13.9%)**	**167 (60.9%)**	**69 (25.2%)**	**274 (100.0%)**

Source: sample survey of the present study.

Table-6.12

Percentage Distribution of Reason Components of Unmet Need by Monthly Family Expenditure.

Monthly Expenditure	Want for Children at Later Date	Private Inconve-nience	Social Inconve-nience	Total
Less than Rs.5000/-	20 (12.3%)	86 (53.1%)	56(34.6%)	162 (100.0%)
Rs.5000/- to Rs.10,000/-	9 (18.9%)	31 (63.3%)	9 (18.4%)	49 (100.0%)
Rs.10,000/ to Rs.20,000/-	7 (14.0%)	40 (80.0%)	3 (6.0%)	50 (100.0%)
Above Rs.20,000/-	2 (15.4%)	10 (76.9%)	1 (7.7%)	13 (100.0%)
Total	**38 (13.9%)**	**167 (60.9%)**	**69 (25.2%)**	**274 (100.0%)**

Source: sample survey of the present study.

On the other hand, social component has been the important reason component of unmet need amongst the women in the lower income categories (i.e. below Rs.10,000/-). It is obvious that the women in the lower

income stratum have lesser access to the knowledge of contraception and hence, often cite the reason like fear of side effects, or casual approach of not using contraception. Thus, during the interactions with the respondents, it is observed that women in the lower income group (a proportion of Muslim women in the rural area and a major proportion of Char women) often cited the reasons like, the social opposition or religious bindings of not using contraception. On the other hand, women in the upper income categories have better access to the knowledge of contraception and often cited private inconvenience like the health and method related reasons of not using contraception. Most of them avoided the use of contraception because they did not like the existing method or were not convenient with the methods or thought that they could not become pregnant etc.

6.2.6 REASONS COMPONENTS OF UNMET NEED BY HUSBAND-WIFE DISCUSSION:-

Table-6.13

Percentage Distribution of Reason Components of Unmet Need by Husband-Wife Discussion.

Husbands-wife Discussion	Want for Children at Later Date	Private Inconve- nience	Social Inconve- nience	Total
Yes	14 (14.3%)	84 (85.7%)	-	98 (100.0%)
No	24 (4.8%)	83 (47.2%)	69 (39.2%)	176 (100.0%)
Total	38 (13.9%)	167 (60.9%)	69 (25.2%)	274 (100.0%)

Source: sample survey of the present study.

Table-6.13 below reveals that, 98 (i.e. 35.8 percent) women with unmet need of contraception, discussed family planning measures with their

husbands while, 176 women (i.e. more than 64.2 percent) did not discuss with their husbands. A major proportion i.e. 85.7 percent of 98 women who discussed with their husbands were found in the private inconvenience component of unmet need and 14.3 percent were in the component group of want for children at later date. The proportion of unmet need in the social inconvenience component has been found to be nil. On the other hand, a significant proportion (i.e. 39.2 percent) of 176 women, who have no discussion with their husbands, are found in the reason component of social inconvenience while the proportion of women with unmet need on account of want for children at later date and private inconvenience have accounted for 4.8 percent and 47.2 percent respectively.

6.3.   UNMET NEED BY DEMOGRAPHIC CHARACTERISTICS:

Reason components of unmet need for contraception in the light of demographic background of the respondents are discussed below.

6.3.1. REASON COMPONENTS OF UNMET NEED BY CURRENT AGE OF RESPONDENTS:

The percentage distribution of 274 women not using contraception in our sample study by their current age (shown in the Table–6.14 below) shows that comparatively a major proportion of women with unmet need (i.e. 33.6percent) belong to the highest age group of 35-39 years and above while, the rest 21.2 percent in the age group of 20-24 years, 19.7percent in 25–29 years, 16.1 percent in 30-34 years and 9.5 percent in lowest age group of 15-19 years. This is mainly because of the fact that at the higher

age group, women are often observed to attain the desired size of family and want to limit the childbearing and hence, have higher unmet need for limiting.

Table-6.14

Percentage Distribution of Reason Components of Unmet Need by Current Age of Respondents

Current Age of Respondents	Want for child at Later Date	Private Inconve- nlence	Social Inconve- nlence	Total
15 -19 years	12 (46.2%)	11 (42.3%)	3 (11.5%)	26 (100.0%)
20- 24 years	13 (12.1%)	19 (32.8%)	26 (44.8%)	58 (100.0%)
25 -29 years	10 (18.5%)	29 (53.7%)	15 (27.8%)	54 (100.0%)
30–35 years	3 (6.8%)	28 (63.6%)	13 (29.5%)	44 (100.0%)
35–39 years +	–	80 (87.0%)	12 (13.0%)	92 (100.0%)
Total	**38 (13.9%)**	**167 (60.9%)**	**69 (25.2%)**	**274 (100.0%)**

Source: sample survey of the present study.

On the other hand, the women in the lower age group want to continue childbearing as their desired goal is yet to be attained. Hence, the proportion of unmet need amongst the younger women in reason component of want for children at later date is found to be higher. Moreover, the women with unmet need in the higher age group often show the reasons of not using contraception for private inconvenience (i.e. health or method related reasons). On the contrary, the women with unmet need in the lower age category generally show the reasons like the want for children at later date, social inconvenience and knowledge related reasons.

It is also observed from the Table - 6.14 that private inconvenience (like health and method related problems) in the higher age–

group (i.e. 35-39 years and above) has been the most dominant reason component of unmet need (i.e. 87.0 percent). On the other hand, as we move down to the lower age – groups (i.e. below 35 years), want for children at later date, social opposition are identified as the major causes of not using contraception. On the other hand, the unmet need for social inconvenience has been observed to decrease with the increase in the age of the respondents.

6.3.2. REASON COMPONENTS OF UNMET NEED BY TOTAL NUMBER OF LIVING CHILDREN:

Table-6.15 below shows the percentage distribution of non – users with the number of living children by the component variable of unmet need. Half of 30 women with unmet need for spacing having one living child

Table-6.15
Percentage Distribution of Reason Components of
Unmet Need by Total Number of Living Children

	Number of Living Children			Total
	1	2	3 +	
Want for Children at Later Date	9 (30.0%)	12 (13.6 %)	17 (10.9%)	38 (13.9%)
Private Inconvenience	15 (50.0%)	70 (79.5%)	82 (52.6%)	167(60.9%)
Social Inconvenience	6 (20.0%)	6 (6.8%)	57 (36.5%)	69 (25.2%)
Total	30 (100.0%)	88 (100.0%)	15 (100.0%)	274(100.0%)

Source: Sample survey of the present study.

stated the private inconvenience for not using contraception while, 9 women (30.0 percent) stated want for additional child as the reasons of not using

Table-6.16.

Percentage Distribution of Reason Components
of Unmet Need by Number of Living Sons.

No. of Living Sons	Want for Children at Later Date	Private inconvenience	Social Inconvenience	Total
0 sons	29 (31.2%)	42 (45.2%)	22 (23.7%)	93 (100.0%)
1 son	9 (1.7%)	68 (80.9%)	7 (8.3%)	84 (100.0%)
2 sons	—	50 (61.7%)	31 (38.3%)	81 (100.0%)
3 sons +	—	7 (43.8%)	9 (56.3%)	16 (100.0%)
Total	38 (13.9%)	167 (60.9%)	69 (25.2%)	274 (100.0%)

Source: sample survey of the present study.

amongst the women when they have one living son and it is found nil amongst the women with two or, more than two living sons. In other words, the want for children at later date amongst the women with unmet need decreases with the increase in the total number of living sons in the family. In general, Indian family planning programme expects the couples to limit the child bearing to two living children. But in our field survey, it has been observed that 13.9 percent (i.e. 38 women) out of 274 women not using contraception, have the want for children at later date and 44.7 percent of them have two or more than two living children (Table-6.15). Again, amongst 38 women in the component of want for children at later date (Table– 6.16.), a major proportion i.e. 31.2 percent has no son and 1.7 percent has one living son. On the other hand, women with two sons and three or more than three sons are observed to cite the reasons like social inconvenience for not using contraception. The estimated mean number of sons amongst the women with unmet need has been found to be 1.4. Thus, the existence of son preference (at least one son) amongst the respondents

with unmet need in the reason component of want of children at later date

cannot be denied.

6.3.4. REASON COMPONENTS OF UNMET NEED BY EXPERIENCE OF CHILD LOSS:

Table-6.17
Percentage Distribution of Reason Components
of Unmet Need by Child Loss

No. of Child Loss	Want for Children at Later Date	Private Inconvenience	Social Inconvenience	Total
Yes	28 (20.1%)	71 (51.1%)	40 (28.8%)	139 (100.0%)
No	10 (7.4%)	96 (71.1%)	29 (21.5%)	135 (100.0%)
Total	**38 (13.9%)**	**167 (60.9%)**	**69 (25.2%)**	**274 (100.0%)**

Source: sample survey of the present study.

It is observed from Table–6.17 above, that out of 274 women not using contraception, nearly 51 percent women have the experience of loss of at least one child and the rest 49 percentage have not experienced the loss of a child.

It is also observed from the Table-6.17 that the social factors correspond to a considerable proportion of women with unmet need (i.e. 28.8 percent) who have experienced the loss of at least one child. It is obvious, because most of the women who have experienced the loss of at least one child and wanted to space the childbearing, are often opposed by the husbands or the family members. On the other hand, the reason like private inconvenience (i.e. 51.1 percent) has been identified as the major reason of not using contraception amongst the women who have experienced child loss. This implies that poor knowledge and apprehensions

252

of side effects of the contraception are responsible for a larger proportion of unmet need and hence, poor reproductive health of the mother and higher mortality of children.

6.4 CONCLUSION

The total unmet need in our study has been estimated at 37.8 percent. The unmet need for limiting is observed 44.5 percent while, it is 55.5 percent for spacing method. In both the urban and rural area the proportion of unmet need is found to be highest in the reason component of private inconvenience. The reason like social inconvenience is found to be higher in the rural area (i.e. 25.2 percent) than that in the urban area. Amongst the General Caste Hindu, ST (Bodo), SC respondents private inconvenience (like health and method related reasons) of not using contraception are found to be major reasons of unmet need. Reasons like social inconvenience is found to be nil amongst the General Caste Hindu respondents. Major proportions of the Muslim women and Char women (i.e. 42.5 percent and 71.4 percent respectively) reported social reason as the major cause of unmet need.

Among the socio-economic background variables, illiteracy(of both the respondents and the husbands), and poor economic status have been identified as the most important variables for the poor accessibility to and poor knowledge of contraception. On the other hand, private inconvenience like health and method related reasons have been found to

be the major causes of unmet need amongst the literate and educated women and the women belonging to the higher economic stratum. The younger women reported want for children at later date as the major reason of unmet need. The want for children at later date has become less significant while private inconvenience has become more prominent reasons of unmet need amongst the older women. Unmet need has also been observed to decrease with the increase in number of living sons (i.e. 31.2 percent women with no son have cited the reason like want for children at later date while, 23.7 percent women showed the social reasons). Thus, it can be finally concluded that the private and social inconveniences are the prime reasons of unmet need amongst the respondents.

****

6.5: PRESENTATION OF DATA BY FIGURES:

Figure: 6.5.1: Unmet Need: Total, Limiting and Spacing
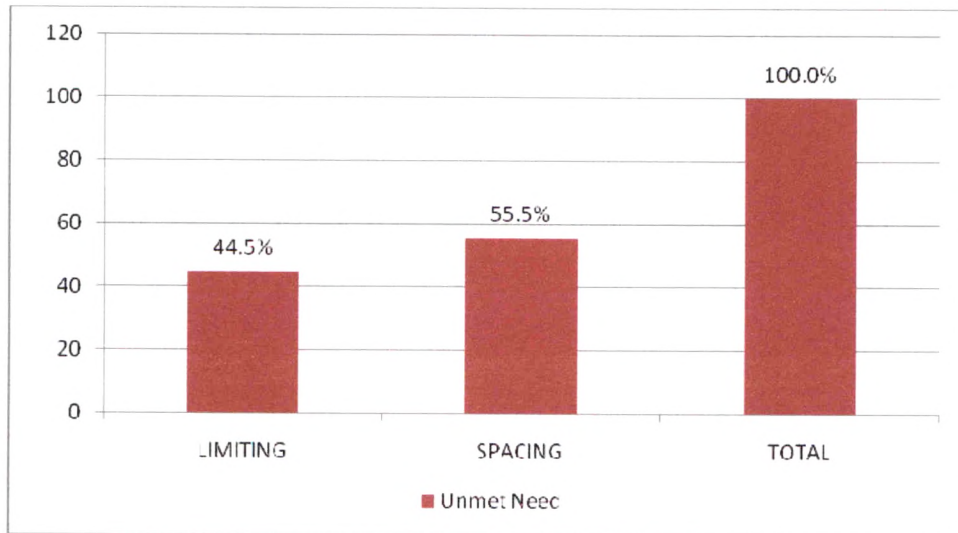
Figure: 6.5.2: Reason Components of Unmet Need by Rural-Urban
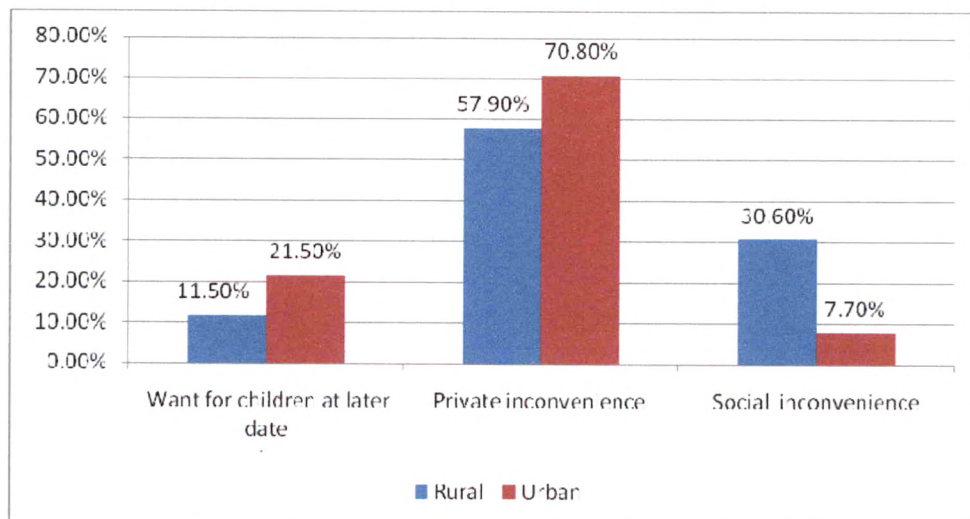
Figure: 6.5.3 :   Reason Components of Unmet Need by Tribal, Non Tribal and Char Women.
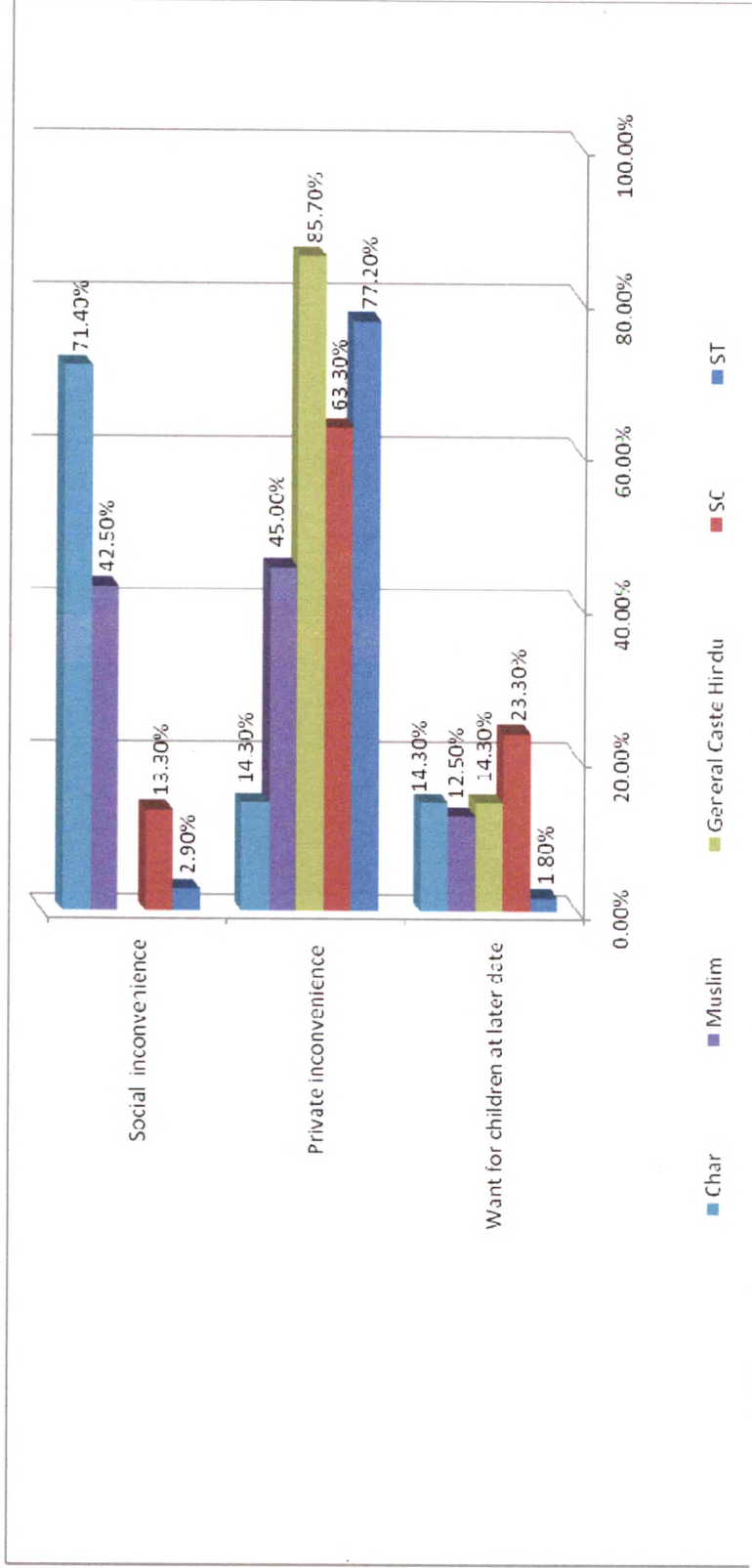
CHAPTER 7

BINARY LOGIT REGRESSION ANALYSIS OF THE DETERMINATS OF TERMINAL, SPACING AND TOTAL USE OF CONTRACEPTION

7.1 INTRODUCTION:

An attempt has been made in this section to assess the effects of each back ground variable on the current use of contraceptive among the currently married women. For this, binary logit regression has been carried out thrice, separately, for the total users of modern contraceptive, the users of sterilization and the user of modern spacing method. Only the currently married women, who have given birth to at least one living child, are included in the model. The two categories used for the respondent variable (i.e. current use of contraceptive) in the model are 'No' coded with '0' and yes coded with '1'.

The back ground variables entered in the model as predictor variables are as follows: (i) Current Age of the Respondents, (ii) Husbands' education, (iii) Respondents' Educational status, (iv) Respondents' work status, (v) husbands' work status, (vi) Place of residence, (vii) Respondents by communities, (viii) Number of living children, (ix) Number of living sons, (x) Discussion with husband and (xi) Motivational factors.

7.2 FRAMEWORK OF THE LOGIT REGRESSION MODEL

In order to evaluate the effects of a selected group of various socio-economic and demographic variables on the probability of using the modern contraceptive methods (terminal and modern spacing) by the currently married women with at least one living child we have adopted binary logit regression model. Binary logistic regression model is an appropriate statistical technique because the dependent variable is

257

dichotomous. The logistic regression model for the log odds of contraceptive use is,

$$Ln\,[P_i\,/\,1\text{-}P_i] = \beta_0 + \sum_{i=1}^{n} (\beta_i\,X_i) \quad [\text{where, } n=11]$$

Where,

$Ln\,[P_i\,/\,1\text{-}P_i]$ is simply the conditional odds of using contraceptive method, X_i represents the explanatory variables used in the equation β_i represents the effects of parameters associated with the explanatory variables, and β_0 is the constant term.

In this study we have used SPSS 15 version software for designing the logistic model. Three binary logit regression models are used for the analysis. One is for the use of total use of modern contraceptive as a whole, the second is for the use of terminal method and the third is for the modern spacing method.

The equation for the total use (T) of modern contraceptive is as follows,

$$Ln\,[P_i/1\text{-}P_i]_{(T)} = \beta_{0(T)} + \beta_1 X_{1(T)} + \beta_2 X_{2(T)} + \dots + \beta_{11} X_{11(T)} \qquad \dots\dots\dots (1)$$

Where,

X_1 = current age of the respondents,

X_2 = education of respondents,

X_3 = education of husbands,

X_4 = communities,

X_5 = occupation of respondents,

X_6 = occupation of husbands,

X_7 = monthly family income,

X_8 = number of living children,

X_9 = number of living sons,

X_{10} = husband wife discussion,

X_{11} = motivational factor.

Similarly, the second equation for the use of female sterilization method (STR) is,

$$Ln\,[P_i/1\text{-}P_i]_{(STR)} = \beta_{0(STR)} + \beta_1 X_{1(STR)} + \beta_2 X_{2(STR)} + \dots + \beta_{11} X_{11(STR)} \qquad \dots\dots (2)$$

Where,

$X_1, X_2, X_3, \dots\dots\dots\dots\dots\dots, X_{11}$ are defined as in equation (1)

The third equation for the use of modern spacing method (SPC) is,

$$Ln\ [Pi/1\text{-}Pi]_{(SPC)} = \beta_{0\ (SPC)} + \beta_1 X_1\ _{(SPC)} + \beta_2 X_2\ _{(SPC)} + \ldots + \beta_{11} X_{11\ (SPC)}\ \ldots\ldots\ldots(3)$$

Where,

$X_1, X_2, X_3, \ldots\ldots\ldots\ldots\ldots\ldots\ldots, X_{11}$ are defined as in equation (1)

7.3 EMPIRICAL RESULT AND EVALUATION:

The results of three binary logit regressions of the users of contraception in our study are given in the Table-7.1, Table-7.2 and Table-7.3. In our analysis, Table-7.1 presents the odds ratios of binary logit regression on the users of female sterilization, Table-7.2 displays the odds ratios of binary logit regression on the users of spacing methods and Table-7.3 exhibits the odds ratios of binary logit regression on the total users of modern contraception. We have presented the odds ratio of binary regression for different categories with corresponding p-value and the estimate of parameters (β). The analysis is in terms of the possible association of each independent variable with the currently married women having at least one living child using contraception.

In order to examine the association between the use of female sterilization and the age categories of women, we have taken the women in the age category of 20-24 years as the reference category as no case of female sterilization has been found in the age category below 20 years. The results of binary logit regression (Table-7.1) show that women in the higher age category i.e. 25-29 years and 30 years and above are more likely to opt for female sterilization (p-value being 0.05). Specifically, if the women are in

the higher age group of 25-29 years and 30 years and above, the chances of opting for sterilization are 2 and 3 times (odds ratios are 2.114 and 3.122 respectively) more as compared to the women in the reference age category. The larger number of users of female sterilization in the higher age category (particularly above 30 years) reduces the effective use of female sterilization. This finding is supported by an earlier study (Baruah,1999) where the percentage of Tubectomy acceptors have been observed to be higher at the higher age group (i.e. above 30 years) in the states of Assam, Manipur and Meghalaya as against the percentage of women using Tubectomy in other North Eastern states.

A highly significant relationship has also been observed between the women in the higher age categories and the use of modern spacing methods. Women in the age group of 20-24 years and 25-29 years are 2.234 and 3.120 times and women in the age group of 30 years and above are 1.342 times more likely to use modern spacing methods as compared to the women in the reference age category of 15-19 years. In most of the cases it has been observed that women prefer to postpone the use of spacing methods until the desired family size and the desired sex composition of the children are achieved. Most of the women using the spacing method in the higher age group in our sample study prefer the modern spacing method to terminal method to limit the size of the family. This finding of our present study is in conformity with that of the study where Muslim women in Maharashtra, because of poor accessibility and reach of the programme,

high failure rate, have been observed to prefer more spacing methods as the means to limit the size of the family (Ram, 2001).

Table-7.3 shows that the women in the age groups of 25-29 years and 30 years and above have 2.869 and 3.447 times more intensity to use modern contraception than that of the women in the reference age-category of 15-19 years.

The other variable namely, education is worthwhile to notice. It has a statistically significant influence on the use of contraceptive. But, the logit regression result (Table-7.3) on the total use of modern contraception shows husband's education has a stronger influence compared to the respondent's education on the use of contraceptive. The women, whose husbands have attained education up to primary, below matriculation and up to matriculation or higher secondary education and above, are likely to resort to modern contraception 1.221, 3.012 and 4.222 times more respectively as compared to the women whose husband are illiterate (significant at 5% probability level). This implies the use of contraception generally increases amongst the women as the education of the husband's increases. While, the women who attained primary education, education below matriculation and up to matriculation or higher secondary and above have 1.091, 3.453 and 2.958 times more intensity to use modern contraception (significant at 5% probability level) in comparison to their counterparts in the no education categories (illiterates). In a traditional patriarchal society like the undivided Darrang district of Assam, husband's educational status may be one of the

determining factors that influence the use of contraception amongst the women.

On the other hand, the result of binary logit regression (Table-7.1) on the users of sterilization, shows that the women whose husbands attained education up to primary, below matriculation and up to matriculation or higher secondary school and above, are likely to opt for Sterilization 1.444 times 2.917 times and 4.647 times more than the reference category of women whose husbands are illiterate. However, women who have attained education up to primary school, below matriculation and up to matriculation or higher secondary and above have less intensity (odds ratio being 0.926, 0.908 and 0.892) to opt for sterilization than the illiterate women. This implies that the less educated women are more likely to opt for female sterilization. This finding of our present study is similar to the results obtained in the Report of NFHS-3 Assam.

From the Table-7.2, it is clear that the women whose husbands attained education up to primary school, below matriculation and up to matriculation or higher secondary and above are likely to use modern spacing methods 1.219, 3.013 and 4.223 times more than the women whose husband are illiterate. On the other hand, the odds of binary logit regression on the users of modern spacing method also show that the women, who attained education up to primary school, below matriculation, up to matriculation or higher secondary education and above are likely to use the method 1.091, 4.080 and 5.110 times more than the illiterate women. Thus,

the use of modern spacing method has been observed to increase amongst the women, who attained education up to the level below matriculation but, after a certain level of education (i.e. at the level of matriculation or higher secondary and above), the effect of education on the use of contraception is observed to reach a plateau.

On the whole, we can come to the conclusion that the probability of using contraception increases amongst women when the education of women increases. But, it is observed to increase more significantly amongst the women when husband's education increases. This finding of our empirical study based on the survey data has given us enough evidence to accept our hypothesis that the level of education of the respondents is an important factor influencing the choice of contraception. However, the education of husbands is found to be equally important.

In order to examine the effect of communities on the prevalence of contraception, we have considered four categories viz. ST, SC, General Caste Hindu and Muslim (including Char women). Since, the use of contraception amongst the Char respondents is very nominal, we have clubbed the Muslim with Char women, taking Muslim women as the reference category. The logit regression Table-7.3 shows that the women of General Caste Hindu community have 3.612, SC community have 1.212 and ST (Bodo) community have 1.033 times more intensity to use a modern method of contraception respectively than the women in the reference category.

Similarly, the logit odds of using the spacing method show that the General Caste Hindu women have more intensity (odds ratio being 3.981) to use spacing method while, the SC and ST women have somewhat less intensity (odds ratios being 0.922 and 0.812 respectively) as compared to the Muslim women. On the contrary, women in the ST, SC and General Caste Hindu community have more intensity (odd ratios are 3.632, 3.541 and 2.322 respectively) to opt for female sterilization than the women in the Muslim community.

As regards the variable, place of residence, the logit regression Table-7.3 shows that the women in the rural area are less likely (odds ratio being 0.974) to use modern contraceptive in comparison to their urban counter parts. Similar is the trend with the use of spacing method. But, in case of female sterilization, the women in the rural area are 1.306 times more likely to take recourse to female sterilization as compared to their urban counter parts (p-value being 0.038). It is found that the acceptance of female sterilization is greater in the rural area in our study. This is mainly because of the special programmes organized by the government for backward classes especially for the SC and the ST (Bodo) in the rural areas. This finding of our present study complies with the findings of the study-'comparative study of contraceptive use in Assam and West Bengal' by Dr. Das and Dr. Acharya, 1999.

Table-7.2 also shows a strong positive relationship (significant at 0.05 percent probability level) between the monthly income status of the

respondents and the choice of modern spacing method. Women belonging to the higher monthly family income category of Rs. 5000/- to Rs.10,000/- and Rs.10,000/- and above are likely to use spacing method 1.434 and 4.652 times more compared to the women in the reference category of monthly income less than Rs. 5,000/-. On the other hand, the odds ratios of the binary logit regression on the users of female sterilization show that women belonging to the income group of Rs. 5,000/- to Rs. 10,000/- and Rs. 10,000/- and above have less intensity (odds ratio being 0.873 and 0.986 respectively) to opt for sterilization than the women in the reference category of monthly income less than Rs. 5,000/- (Table-7.1). On the whole, a strong positive relation between the monthly family income of the respondents and the use of modern contraception has been observed (Table-7.3). The binary logit regression on the total users of modern contraceptive shows that the women in the higher income groups are more likely to use modern contraception.

We have also examined the relationship between occupation and the use of contraception. It is observed that the occupational status of the husbands has a statistically significant influence on the use and choice of contraceptive methods. The odds ratio of logit regression on the users of sterilization, shown in the Table-7.1, exhibits that the women whose husbands are traders or self employed are 1.605 times more likely to opt for sterilization (p-value being 0.021) while, the women whose husbands are, service holders and farmers 3.833 and 1.583 times more likely to opt for sterilization than the women whose husband are daily wage earners (p-value being 0.021 and 0.032). Similarly, in case of modern spacing method, the

266

respondents whose husband are traders or self-employed, service holders and farmers, are 4.913, 3.611 and 1.551 times more likely to use the method than those whose husbands are daily wage earners (significant at 5% probability level). The overall use of modern contraception, thus, is observed higher amongst the women whose husbands are traders and service holders (odds ratio being 2.921 and 4.913 respectively) and also amongst the women, whose husbands are farmers (odds ratio being 1.774) as compared to the women whose husbands are daily wage earners.

We have also examined the relationship between the occupational status of the respondents and the use of contraception. It has been observed from the binary logit regression analyses that house wives and service holders, have more tendency to use modern contraception (odds ratio being 3.448 and 4.829 respectively) as compared to the daily wage earners. On the other hand, odds ratios of the logit regression on the use of sterilization and modern spacing method provide us a better analysis of the use of contraception with regards to the occupational status of the women. House wives and service holder women are nearly 3.940 and 2.983 times more likely to opt for sterilization and 3.123 and 4.942 times more likely to use spacing method than the women in the reference category of daily wage earners. The higher intensity to opt for both sterilization and spacing method amongst the house wives and service holder women in our study may be due to the higher exposure and access to information and knowledge as compared to the women who are daily wage earners.

The use of contraceptive is also observed to be highly influenced by the predictor variable like actual size of the family. It is found that the total use of modern contraceptive amongst the women increases with the number of living children. Specifically, a woman with 3 or more living children has 4.521 times more intensity (p-value being 0.012) to take recourse to modern contraception while a woman with 2 living children has 2.971 times more intensity (p-value being 0.06) to take recourse to modern contraception as compared to a woman with 1 living child. Similarly, women with 2 children and 3 or more than 3 living children have a higher intensity (odds ratio being 1.279 and 4.675 respectively) to opt for sterilization or limit child bearing (p-value being 0.013 and 0.011). On the other hand, women with 2 living children are 2.461 times more likely and women with 3 or more than 3 living children are 2.322 times more likely to opt for spacing method (p-value being 0.013 and 0.011 respectively). Most of the couples in our study are found to postpone the use of contraceptive till their desired size of family or sex composition of children is attained. Thus, the survey data and the findings of the logit regression on the users of sterilization and the total number of living children have shown that the use of sterilization amongst the women increases with the number of living children and it is highest amongst the women who have 3 or more than 3 living children. The logit odds of adopting female sterilization amongst the women with 2 children is 1.279 while it is higher i.e. 4.675 amongst the women with 3 or more than 3 children. This validates our hypothesis that sterilization as a method of limiting family size is

prevalent among the women of the district who opt for it only after the birth of 3 or more than 3 children.

Another variable namely, the number of living sons (sex preference of the children) is worthy of notice. The odds ratio of logit regression on the total use of modern contraception shows that the women with 1 and 2 or more living sons are likely to use a modern method 3.232 times and 4.332 times more than the women with no son. The choice of the terminal method (female sterilization) is found to be highly influenced by the number of living sons. The women with 1 and 2 or more living sons are likely to limit the size of family 1.092 and 3.109 times more than the women with no living son. On the other hand, the women with 1 living son and 2 or more than 2 living sons are likely to use spacing methods 2.939 and 2.206 times more than the women with no living son. This shows comparatively a greater preference for two sons amongst the couples in the sample study as a whole. This finding of our empirical study, thus, provides us enough evidence to accept our hypothesis that sex preference is the determining factors affecting the choice and use of contraception.

Another socio-cultural factor namely the husband-wife discussion, is observed to be a highly significant predictor variable (significant at 5% probability level) for the use of contraceptive. Table-7.3 shows that the women in the 'yes' category are likely to use modern contraception 2.135 times more than the women in the 'no' category. Women who had discussion with their husbands on family planning are found to have 1.591 and 2.863

times more intensity to opt for sterilization and spacing method respectively (Table-7.1 and 7.2).

The motivation variable, in the logit regression analysis, also has a statistically significant influence on the use of contraceptive in the rural area. The logit odds of opting for female sterilization is 3.131 times more when couples are motivated by the health workers, nurse or ANM or government doctors while, it is 1.823 and 1.171 times more in case the motivation comes from the respondents themselves and the husbands than being motivated by others (relatives and friends). This finding of the present study implies that the performance of the health workers in motivating the couples to opt for female sterilization is remarkable in the rural area. The government policy of incentive payments to the motivators of sterilization is observed as one of the prime cause of taking initiative in motivating the couples for female sterilization by the health workers in the rural area. On the other hand, incentive payments to the beneficiaries also resulted in higher acceptance of female sterilization by the couples belonging to the lower income stratum.

On the contrary, poor performance of the health workers in motivating the couples to opt for modern spacing method is observed. From the Table-8.2, it is observed that the use of spacing motivated by ANM/ASHA/health workers is likely to be less (odds ratio being 0.985) than that of the reference category. The use of spacing method motivated by the husbands and respondents are likely to be more (odds ratio are 3.648 and 1.971 respectively) than that of the reference category.

Table- 7.1.

**Odds Ratio of Binary Logit Regression for
the Determinants of the Use of Female Sterilization
Among the Currently Married Women with at Least One Living Child**

Socio-economic variables	β	Odds ratio	p- value
Current age of Respondents:			
20-24 years *(Ref)*			
25-29 years	0.678	2.114	0.043**
30+ years	0.991	3.122	0.049**
Education of Husbands:			
Illiterate: *(Ref)*			
Up to Primary	1.222	1.444	0.046**
Under Matric	0.981	2.917	0.013**
HSLC/HS pass and above	1.311	4.647	0.011**
Education of Respondents			
Illiterate : *(Ref)*			
Up to Primary	-.074	0.926	0.384
Under Matric	-0.92	0.908	0.043**
HSLC/HS pass and above	-1.011	0.892	0.102
Communities:			
Muslim *(Ref)*			
SC	3.822	3.541	0.042**
ST	2.429	3.632	0.043**
General Caste Hindu	1.976	2.322	0.053
Place of Residence:			
Urban: *(Ref)*			
Rural	0.689	1.306	0.038**
Family Income:			
Less than Rs. 5000/- : *(Ref)*			
Rs. 5000/- to Rs.10,000/-	-1.023	0.873	0.053
Rs.10,000/ - and above	-0.014	0.986	0.044**
Occupational Status of Husbands:			
Daily wage- earner: *(Ref)*			
Traders/Self-employed	1.560	1.605	0.032**
Service-holder	1.345	3.833	0.021**
Farmer	0.305	1.583	0.032**

	Continued Tab;e-7.1		
Occupational Status of Respondents: Daily wage-earner: *(Ref)*			
House-wives	2.299	3.940	0.001*
Service-holder	1.112	2.983	0.035**
Total number of Living Children 1 child: *(Ref)*			
2 children	0.897	1.279	0.013**
3 + children	1.643	4.675	0.011**
Total number of Living Sons 0 Son: *(Ref)*			
1 son	0.261	1.092	0.010**
2 +Sons	0.998	3.109	0.042**
Place of Residence Urban: *(Ref)*			
Rural	0.689	1.314	0.038**
Discussion with Husband No: *(Ref)*			
yes	1.591	1.591	0.052
Motivated by Others: *(Ref)*			
ANM/ASHA	1.222	3.131	0.023**
Husband	0.098	1.823	0.047**
Respondent	0. 110	1.171	0.051
Constant: *13.231*			

Note: (ref) denotes reference category.
* Indicates significant at 1% i.e. p < 0.01.
** Indicates significant at 5% i.e. p < 0.05.

Table- 7.2.

**Odds Ratio of Binary Logit Regression for
the determinants of the Use of Modern Spacing Method
Among the Currently Married Women with at Least One Living Child.**

Socio-economic variables	β	Odds ratio	p-value
Current age of Respondents:			
15-19 years: (Ref)			
20-24 years	0.765	2.234	0.046**
25-29 years	1.065	3.120	0.031 **
30+ years	0.021	1.342	0.123
Education of Husbands:			
Illiterate : (Ref)			
Up to Primary	1.021	1.219	0.036 **
Under Matric	0.879	3.013	0.051
HSLC/HS pass & above	1.311	4.223	0.049* *
Education of Respondents			
Illiterate: (Ref)			
Up to Primary	0.967	1.091	0.039 **
Under Matric	1.001	4.080	0.044 **
HSLC/HS pass	1.511	5.110	0.011 **
Communities:			
Muslim (including Char): (Ref)			
SC	-0.018	0.922	0.052
ST	-0.190	0.812	0.036**
General Caste Hindu	1.921	3.981	0.010 **
Place of Residence			
Urban(Ref)			
Rural	-.0094	0.951	0.049 **
Family Income:			
Less than Rs. 5000/- (Ref)			
Rs. 5000/- to Rs.10,000/-	0.675	1.434	0.052
Rs.10,000/- and above	0.989	4.652	0.032 **
Occupational Status of the Husbands:			
Daily wage-earner: (Ref)			
Traders/Self-employed	0.991	4.913	0.009 *
Service-holder	1.564	3.611	0.012 **
Farmer	0.033	1.551	0.043 **

		Continued Table-7.2	
Occupational Status of the Respondents:			
Daily wage-earner: (*Ref*)			
House-wives	1.098	3.123	0.038 **
Service-holder	1.123	4.942	0.053
Number of Living Children:			
1 child: (*Ref*)			
2 children	0.997	2.461	0.013**
3 + children	0.986	2.322	0.011 **
Number of Living Sons:			
0 Son: (*Ref*)			
1 son	1.023	2.939	0.010 **
2 +Sons	0.098	2.206	0.042 **
Discussion with Husband:			
No: (*Ref*)			
Yes	1.059	2.863	0.051
Motivated by:			
Others: (*Ref*)			
ANM/ASHA	-0.017	0.985	0.101
Husband	1.008	3.648	0.032**
Respondents	0.964	1.971	0.046**
Constant: 15.076			

Note: (ref) denotes reference category.
* *Indicates significant at 1% i.e. p < 0.01.*
** *Indicates significant at 5% i.e. p < 0.05.*

Table- 7.3.

**Odds Ratio of Binary Logit Regression for
the Determinants of the Total Use of Modern Contraceptive
Among the Currently Married Women with at Least One Living Child.**

Socio-economic variables	β	Odds ratio	p-value
Current Age of Respondents:			
15-19 years: (Ref)			
20-24 years	0.179	1.534	0.035**
25-29 years	0.198	2.869	0.045 **
30+ years	1.008	3.447	0.032 **
Education of Husbands:			
Illiterate : (Ref)			
۱ Up to Primary	0.597	1.221	0.048 **
Under Matric	1.007	3.012	0.044 **
HSLC/HS pass & above	1.234	4.222	0.039* *
Education of Respondents:			
Illiterate : (Ref)			
Up to Primary	0.056	1.091	0.039 **
Under Matric	1.076	3.453	0.046 **
HSLC/HS pass and above	0.989	2.958	0.013 **
Categories of Respondents:			
Muslim (including Char) : (Ref)			
SC	0.671	1.212	0.053
ST	0.049	1.033	0.035**
General Caste Hindu	1.612	3.612	0.013 **
Place of Residence:			
Urban: (Ref)			
۰ Rural	-0.016	0.974	0.051
Family Income:			
Less than Rs.5000/ : (Ref)			
Rs.5000/- Rs.10;000/	0.087	1.463	0.042**
Rs.10,000/ and above	0.906	2.653	0.054
Occupational Status of Husbands:			
Daily Wage-earner: (Ref)			
Traders/Self Employed	1.025	2.921	0.013 **
Service-holder	1.041	4.913	0.042 **
Farmer	0.031	1.774	0.044 **

			Continued Table-7.3
Occupational Status of Respondents:			
Daily wage-earner *(Ref)*			
House-wives	1.034	3.448	0.043 **
Service-holder	1.088	4.829	0.013 **
Number of Living Children:			
1 child : *(Ref)*			
2 children	0 .997	2.971	0.006*
3 + children	1.006	4.521	0.012 **
Number of Living Sons:			
0 Son: *(Ref)*			
1 son	1.088	3.232	0.011 **
2 +Sons	1.102	4.332	0.027 **
Discussion with Husband:			
No: *(Ref)*			
yes	0.078	2.135	0.341
Motivated by:			
Others: *(Ref)*			
ANM/ASHA	0.967	2.613	0.054
Husband	1.006	3.113	0.034**
Respondents	0.934	2.312	0.046**
Constant:* *17.987			

Note: (ref) denotes reference category.
* Indicates significant at 1% i.e. p < 0.01.
** Indicates significant at 5% i.e. p < 0.05.

276

7.4   CONCLUSION:

From the findings of the logit regression analysis in our present study it can be concluded as follows.

1). The overall use of contraceptive (both sterilization and spacing) amongst the currently married women with at least one child is highly influenced by the educational status of the respondents and the husbands. But, in a traditional patriarchal society like the un-divided Darrang district, the influence of husband's education on the use of contraception is more than that of the respondents. The women who attained education up to primary school, below matriculation and higher secondary education are more likely to use contraception than the illiterate women. But, at the higher level of education i.e. up to matriculation or higher secondary and graduation and above, the influence of women's education on the use of contraception has reached a plateau. On the other hand, the women whose husbands are educated up to primary, below matriculation or higher secondary school and above are more likely to use contraceptive than that of the women whose husbands are illiterate. Thus, the overall influence of respondent's education and the husband's education on the use of contraception is found positive.

2). An universal phenomenon is observed that the place of residence and caste and tribe are the significant factors that determine the use of contraception. Thus, the empirical result of our study shows that

the use of modern contraceptive is higher in the urban area than that in the rural area. It is found highest amongst the forward caste (i.e. General Caste Hindu) women. Regarding the choice of methods, female sterilization is found comparatively popular amongst the ST (Bodo) and SC women. The use of modern spacing method is found higher amongst the non-tribal women. Amongst the Muslim women in the main land, the use of female sterilization is found least.

3). Another important phenomenon of our empirical study is that the use of female sterilization is higher amongst the less educated women and the women in the lower income strata. The use of modern spacing method is found comparatively higher amongst the better educated and wealthier women. This is because of the advantage of one time use associated with terminal method. Moreover, the incentive payment to the beneficiaries of sterilization attracts women from the lower level of income and education. On the other hand, the health workers in the rural area generally, put more efforts in motivating the couple for sterilization for the interest of the incentive payments that they receive as a motivator. The use of modern spacing method, like oral pill, is more cumbersome and costlier for the illiterate and poor women as it requires the knowledge of regular use and involves recurring cost. Unsystematic way of motivating the illiterate, less educated and poor couples by the health workers for modern spacing method is also identified as another important cause

of lower acceptance of modern spacing methods amongst the poor and less educated women in the rural area.

4). Major proportion of the women practicing terminal method has opted for sterilization after having 3 or more than 3 children. This reduces the effective use of sterilization.

5). Sex preference (son) has emerged as a determining factor affecting the choice and use of contraception. The result of logit regression analysis shows that the women with no son are less likely to opt for sterilization than the women with 1 and 2 living sons.

CHAPTER 8

SUMMARY
OF
FINDINGS AND CONCLUSION

8.1   SUMMARY OF FINDINGS:

The thesis is based on empirical investigations, which it is hoped, will provide certain insight to the policy- makers of the state to formulate appropriate policy relating to contraceptive use in the background of socio-economic and demographic status of the currently married women in the state of Assam in general and undivided Darrang district in particular. A summary of the foregoing chapters will help in suggesting the broad contours of appropriate strategy and policy related to contraceptive use amongst the currently married women in the district.

Chapter-I being an introductory one, besides highlighting the development of the women's movement and the concept of family planning, abroad and in the country, has focused on the relative position of India in the World Chart of contraceptive use, the relative position of the state of Assam vis-a-vis other states of India, inter district comparison with regards to contraceptive prevalence rate and the unmet need in the background of some selected socio-economic and demographic attributes of the users based on the report of Family Welfare Statistics, India, NFHS, DLHS and state and District Family Welfare Bureau. Though the Government of India has adopted various programmes and policies for family planning to check the growth rate of population yet, the response of the people to the programme is not satisfactory and it differs from people to people of different caste, tribe, religion and region.

It appears from the comparative data analysis of the NFHS-1, NFHS-2 and NFHS-3 and also the DLHS-1 and DLHS-2 that the backward regions with lower GDI and HDI indices have been performing consistently poor in the context of family planning practices. Assam is ranked in the bottom list of the GDI and HDI tables and marked as one of the poor performing states in the country in this respect. An inter district comparative study of HDI and GDI indices in Assam (HDI Report, Assam, 2003) shows that Darrang district is one of the districts with poor socio-economic indicators (22nd in HDI rank and 18th in GDI rank) in Assam. Total Fertility Rate of the district (3.4) has been estimated higher than the state average. The mean number of children ever born to women within 15-49 age groups is considerably high and it even differs widely among the different communities with respect to religion, caste, tribe and culture (Table-1.28). On the other hand, the use of contraceptive (any modern method) by the married couples in the district of Darrang has been recorded higher than the state average by DLHS-2 Report. The wide gap of acceptance of family planning between main land people (56.5 percent) and the Char people (11 percent) as reported by the District Family Welfare Bureau, Darrang 2007, (Table-1.27), provides space for an in-depth study of the pattern and extent of family planning practices by the couples from different communities- Tribal, Non-tribal i.e. SC, General Caste Hindu and Muslim and the Char women with their distinguished socio-economic and demographic background in Darrang.

While presenting the socio-economic and demographic background of the currently married women in Chapter-II based on our

sample survey, it has been found that out of 724 currently married women with at least one living child, the General Caste Hindu women constitutes the highest proportion (39.9 percent) and the ST (Bodo), SC, Muslim and the Char women constitute 19.1 percent, 15.6 percent, 16.0 percent and 9.4 percent respectively. The total illiteracy rate of the respondents is 22.7 percent. Majority of the respondents (82.5 percent) are house wives while, the household income of the bulk of the respondents (31.5 percent) are in the income group of less than Rs. 5000/-. One fourth of the total respondents (i.e. 25.4 percent) are in the age group of 25-29 years and the mean age at marriage of the respondents is 17.8 years. The average desired family size is 2.99 children while, their mean number of living children is 3. From the demographic profile of the study, it is also observed that out of 724 respondents, 27.2 percent and 49 percent had experienced child loss and abortion (either spontaneous or induced) respectively.

On the other hand, the demographic attributes of 724 respondents related to the family planning reveal that the knowledge of any method of contraception is more or less universal (i.e. 98.2 percent), while, the knowledge of all methods is comparatively low (i.e. 34.7 percent). The current use of contraceptive of the currently married women in our sample study with at least one child is only 55.4 percent. Pill users constitute a major proportion (69.6 percent) of the total user in our sample study, followed by the adopters of female sterilization (21.4 percent) and the condom user (18.0 percent). The users of injectables and IUD / Coper-T together constitute 9.7

percent while, the proportion of the users of other methods (traditional methods) are comparatively negligible i.e. 4.2 percent.

Chapter-III makes a comparative study of socio-economic and demographic status of the Tribal, Non-tribal (SC, General Caste Hindu and Muslim) and Char women based on the survey data. Amongst the five selected groups of respondents, the General Caste Hindu women have been found to be most affluent in respect to the socio-economic and demographic status while the Char women the least. The rate of illiteracy (of both the respondents and husbands) is least amongst the General Caste Hindu (i.e. 2.4 percent and 0.2 percent respectively) followed by SC (11.5 and 5.3 percent respectively), Muslims (25.0 and 5.3 percent respectively), ST (39.9 and 22.5 percent respectively) and it is found to be the highest amongst the Char respondents (88.2 and 70.5 percents respectively). Thus, the disparity of male and female illiteracy has been found to be highest amongst the Muslims and least amongst the General Caste Hindu.

Majority of the families i.e. 94.0 percent in the Char area are found in the category of monthly family income below Rs.5000/-.The monthly family income status of the ST (Bodo) women and the Muslim women in our sample study is found more or less the same i.e. comparatively a major proportion belongs to the income category below Rs.10,000/-. The income status of the General Caste Hindu women in our sample study is found highest i.e. major proportion belong to the highest income category of Rs.10, 000/- and above. The General Caste Hindu women are also found more affluent in respect to

the asset holdings as most of them are urban dwellers and service holders. Only 3.6 percent of them are land less, 69.7 percent are the owner of both agricultural land and house, 26.7 percent are the owner of house and other properties. The property status associated with the assets holdings in case of the SC, ST and Muslim women are more or less the same (i.e. most of them have the agricultural land and house). The property status of the Char women is found very poor as they are often being displaced by the land erosion and during the flood.

Lowest current mean age, lowest mean age at marriage and lowest mean age at the 1st birth of child characterise the Char women in our sample study and this is followed by the SC, Muslim, ST and General Caste Hindu women respectively. As a consequence of this, Char women having the mean number of living children (i.e. 3) which is lower than that of the ST women (i.e. 4) but, equal to that of the SC and Muslims women, correspond to highest expected birth of children. The mean number of living children is found to be least amongst the General Caste Hindu woman (i.e. 2).

Proportions of multiple pregnancies and abortions are found to be highest in the Char area while it (both spontaneous and induced) is found the least amongst the General Caste Hindu women. Poor reproductive health also accounts for higher child death. It is found highest amongst the Char women (i.e. 60 percent) and the least (i.e. 13 percent) amongst the General Caste Hindu women while, it is found 40 percent amongst the ST (Bodo)

women and 34 percent and 21 percent amongst the Muslim and SC women respectively.

The exposure to the family planning programme is found around 90 percent and above amongst the respondents other than the Char respondents. This is because the household amenities including electricity and the mode of transportation or communication in the char area are very poor. The financial incentive to the beneficiaries of female sterilization and the camp based female sterilization programme in the rural area, particularly in the ST and SC villages, have been identified as the major causes of higher acceptance of female sterilization amongst the ST (68.0 percent) and the SC women (62.0 percent) in our study. On the other hand, the General Caste Hindu women being the most privileged group in our sample study are more aware of the family planning and inclined towards the modern spacing method. In the Char area, the use of contraceptive is regarded as against religion and hence, the current use of contraception is found very nominal, (only the oral pill users) i.e. 7.4 percent (which is even lower than the report of the District Family Welfare Bureau Report, 2003 i.e. 11 percent).

Bodo women have been observed to have more autonomy in the choice of contraception and to decide the number of children (son or daughter) than that of their non-tribal counter parts, including the privileged General Caste Hindu women. The Char women have no say in the decision making regarding the number of children and the use of contraceptive. But, Muslim women with better socio-economic and demographic background

compared to the Char women, are found to participate jointly with their husbands in certain spheres of reproductive decision making and some of them take decision regarding the choice of contraception (spacing method). It is also observed that amongst the poor, illiterate or less educated working SC women, the decision regarding the choice of terminal method to limit the size of the family lies with the women as they have the financial autonomy.

Chapter-IV makes a review of the rural urban differential use of contraception in the district. The total use of contraception is found higher in the urban area than in the rural area. The total use of contraception is found to increase with the increase in the level of education of the respondents. But, after a certain level of education (i.e. up to matriculation or higher secondary education and above), it reaches a plateau. The other variable that has an influence on the total use of contraception is the husband's education. It is found that with the attainment of education up to primary school amongst the husbands in the urban area, the use of contraception increases significantly and it gradually increases with the increase of husband's education. The use of contraception in the urban area has been found to be 64.0 percent when the husbands have attained the level of education up to matriculation or higher secondary and above. Similar trend has also been observed in the rural area.

Though the use of contraception is also observed to increase with the increase in the income of the respondents but, a considerable proportion of the total users in the rural area are found in the lower income category.

Free distribution of oral pills and condoms at the health centres and the familial support from the relatives in the rural society have been identified as the major factors responsible for easy access to the family planning amongst the respondents belonging to the lower income category in the rural area.

The mean age of total users of contraception is found to be higher i.e. 30 years in the urban area while, in the rural area, it is still higher i.e. 31 years. This reduces the effective use of contraception. The higher mean age as well as higher mean number of children of the users of contraception, as a whole in our sample study, has made the family planning programmes partially ineffective in the district and particularly in the rural area.

Chapter-V outlines the socio-economic and demographic factors affecting the choice between terminal and spacing methods of contraception amongst the respondents. The current mean age of the women who opted for female sterilization (32.3 years) has been observed to be high in our sample study. It is revealed that the most of the women generally opted for sterilization to limit the size of their family after attaining the peak period of fertility in their reproductive life. This reduces the effectiveness of the use of sterilization. On the other hand, the current mean age of the users of modern spacing method in our sample study is also found considerably high (28.4 years). Moreover, the use of modern spacing method has been less effective as most of the users have adopted the spacing method after the birth of the second child. Due to fear of side effects and the existence of social taboos associated with female sterilization, a considerable proportion of women in

the higher age group i.e. 30 years and above, have taken recourse to the modern spacing method instead of sterilization, as the means to limit the size of the family.

Female sterilization is preferred by the less educated women. The use of sterilization is found common amongst the women in the lower economic stratum. The scheme of financial incentives for the beneficiaries of female sterilization has attracted most of the couples in the lower economic category. On the other hand, modern spacing method is commonly used by the better-educated and wealthier women in our sample study.

Son preference as reflected by the use of sterilization by the women in our sample study of the undivided Darrang district is comparatively less pronounced in case of the ST (Bodo) women in comparison to their non-tribal counter parts. 22.0 percent of ST women have opted for sterilization with no son while 11.8 percent of General Caste Hindu women have opted for sterilization with no son. The proportion of SC and Muslim women who opted for sterilization having no son is found to be nil in our sample study. On the other hand, the proportion of ST women with no daughter, opting for limiting the size of the family, is found less in proportion i.e. 24 percent as compared to their non-tribal counter parts i.e. 38.5 percent of SC, 41.2 percent of General Caste Hindu. However, amongst the Muslim women it is found to be nil (Table-5.A.5 and Table- 5.A.6 in Chapter- V).

Major proportion of respondents wanted to have next child immediately without spacing to attain the desired sex composition of the

children when the older child happened to be a daughter while, they wanted to space the next birth of the child when the older child happened to be a son. But, exception has been found in case of the Bodo women. The average spacing has been found to be higher (i.e. 2.1 years) amongst the Bodo women when the older child happened to be a daughter as compared to their non-tribal counter parts (Table- 5.B.7).

In our field study, it has been observed that health workers like the ASHA and ANM are mainly appointed to render service to the pregnant women for vaccination and to promote institutional deliveries. Moreover, they generally counsel the women for opting for sterilization as it yields financial incentives to them. Most of female sterilization in the rural area in our sample study is done under the medical camp. A considerable proportion of women (i.e. 25 percent) using modern spacing method have to cover a distance of 3-4 kilometres to have access to the source and quality services of family planning as the nearest health centre are short of adequate and quality supply of contraceptive. An easy access to qualitative family planning services can improve the use of modern spacing methods amongst the currently married women in the district.

Chapter-VI makes a review of the reason components of unmet need of the currently married women in the district. Total unmet need in our sample study of 724 currently married women is estimated at 37.8 percent. The unmet need for limiting is observed to be 44.5 percent while, it has been 55.5 percent for spacing. Three reason components of not using

contraception amongst the 274 women in our sample study are the want for children at later date (13.9 percent), private inconvenience (60.9 percent) and social inconvenience (25.9 percent). The proportion of women with unmet need has been found to be highest in the reason component of private inconvenience in both the urban and rural area. But, the proportion of unmet need is found higher in the reason components of social inconvenience in the rural area as against that in the urban area. Amongst the General Caste Hindu women, private inconvenience like, health related reasons for not using contraception is found to be the major reason of unmet need. But, reasons of private inconvenience like, knowledge and method related reasons for not using contraception are found to be higher amongst the ST and SC women. The Muslim women are tightly bound by the social customs and traditions, particularly in the rural area. A major proportion of the Muslim women and Char women (i.e. 42.5 percent and 71.4 percent respectively) reported social inconvenience as the major cause of not using contraception (Table-6.6).

Illiteracy (of both the respondents and the husbands), and poor economic status have been identified as the most important socio-economic variables for the poor accessibility to and poor knowledge of contraception. On the other hand, private inconvenience (like health related reasons) has been found as the major cause of unmet need amongst the literate and educated women and the women belonging to the higher economic stratum.

This implies that socio-economically privileged women have a better knowledge regarding the reproductive health of women and family planning.

Most of the women in the younger age group (i.e. below 30 years) reported that want for children at later date as the major reasons of unmet need while, women in the older age group (i.e. above 30 years) reported private inconvenience such as health and the method related reasons of unmet need. Women with larger number of children (i.e. with 2 or more than 2 children) showed social and private inconveniences as the prime causes of unmet need. Preference for son has also been observed to be the major cause of unmet need amongst the respondents. A major proportion of women with no son have cited the reason like want for children at later date (i.e. 31.2 percent) as the prime cause of unmet need while, 23.7 percent showed the social reasons. The unmet need on account for want for additional child at later date has been observed to decrease with the increase in the number of living sons (shown in the Table-6.17). Women who have the experience of loss of at least one child cited social and programme related reasons for unmet need for contraception (for spacing).

Chapter-VII outlines effects of various socio-economic and demographic variables on the use of modern contraceptive. The empirical results of the binary logit regression analysis, based on our sample survey data indicate that the use of modern contraceptive (both sterilization and spacing) is highly influenced by the socio-economic variables like, education,

occupational status, occupational income status, husband-wife discussion on family planning, motivation and caste and communities etc, and demographic variables, like age of the respondents, total number of living children and the number of living sons etc. It is important to note that the husband's education appeared to be one of the most significant factors to influence the use of contraception among the women. The motivation factor like the motivation by the health workers has been observed to have significant influence on the use of sterilization while, motivation by husband for spacing method has been observed to be more significant. Son preference has been observed to be another significant factor in determining the choice of contraception among the respondents. Respondents have more intensity to opt for terminal method with increasing number of sons while, they have more intensity to opt for spacing (in expectation to have a male child) with lesser number of sons.

8.2   CONCLUSION AND SUGGESTION:

In conclusion, our findings suggest that with the emergence of modern scientific method of contraception and the programme publicity, the use of traditional method of contraception like contraceptive herbs has become less popular and obsolete. Greater exposure to the mass media and family planning messages have raised the awareness of family planning amongst the less educated and poor women in the rural area. Thus, women even in the rural area prefer to use modern method of contraception instead of traditional methods. But, the absence of proper knowledge regarding family planning and the use of modern contraception, inadequate supplies and unsystematic way of motivation by the health workers in the rural area,

have resulted in some method failure and fear of side effects. Most of the respondents cited above reasons for their discontinuation of contraceptive use.

Social customs, like preference for son, are prevalent in our society. The current users have an average of 2 living sons (mean number of living sons of 401 total current users is 1.6) while, the women with unmet need have an average of 1 son (mean number of living sons of 274 women with unmet need is 1.18) and 33.9 percent of the 274 women in the unmet need category have no son. This shows that with respect of son's presence in the family, social norms and values are not changing fast in the un-divided Darrang district of Assam. This kind of fertility preference normally, prevents the couples from adopting small family norm and hence, a desired family size. The current users in our study have an average of 3 living children. This makes the use of contraception less effective amongst couples. However, the preference for son varies with background variables like caste and communities. In the present study the Bodo women who have limited the size of the family, have an average of 2 (or, 1.5) living daughters and an average of 1 (or, 1.4) living son. Moreover, the preference for son is found to be more prominent amongst the women who have adopted small family norms in the urban area.

Analysis of unmet need by reason components clearly shows that there are differences in the reproductive intentions amongst the women in the urban and rural area and amongst the tribal, non-tribal and Char women.

Amongst the rural Muslim women and Char women, social reasons of unmet need are found to be the dominant reason of not using contraception. Amongst the ST (Bodo) and SC women, private inconvenience like programme and method related reasons of unmet need are prominent while, the private inconvenience like health related reason is the dominant reason for unmet need amongst the General Caste Hindu women.

The findings of the empirical study show that the factors like - education, particularly the education of husband, has a significant influence on the use of contraception. As the approach of our family planning policy is female oriented, it generates a sense of uneasiness among the illiterate and less educated husbands who view themselves as undesirable and not responsible in the matter of family planning. Hence, the family planning policy should be made more holistic in its approach by increasing the males' involvement in the programme. The other variables like, number of living children, number of living sons, economic status, husband-wife discussion, occupational status and motivation by the health workers, have turned out to be significant or important in explaining the contraceptive use and method choice amongst the couples.

This leads us to make certain prescriptions relating to the promotion of reproductive health of women and the contraceptive use such as extension of family planning services especially to the Muslim, Char and the tribal communities. Information education and communication (IEC)

activities may help in bringing a rapid change in the attitude towards contraception among the couples.

Effort should be made to remove the misconceptions about the use of family planning and convince men about the importance of contraception for the general health and wellbeing of the family. Strategies like promoting education among women and husbands and educating the public (particularly the male members i.e. husbands) about the benefits of the small family norms, delivering health talks to the public and health functionaries on the counter productive results of craze for more sons and children will help to promote the use of contraception and minimise the unmet need.

Strategies should be formulated to increase the use of modern spacing methods amongst the women in the younger age groups to prevent the multiple pregnancies or unwanted births of child and abortions. This will help in bringing down the total fertility of women in the district. Health workers should also be directed to motivate the people to opt for modern spacing method and render backup services to the method adopters. A sustainable effort by the health workers for motivating the couples for spacing method may yield an expected result in this respect.

8.3   LIMITATIONS:

The thesis will remain incomplete unless the limitations of the present research are highlighted. First, it is felt that the limited size of the

sample in our study to draw inferences relating to the reproductive behaviour of the women in the district can be considered as a limitation of the study.

Second, variables like standard of living index based on composition of different variables like size of land owned, number of durable commodities, live stock owned, drinking water facilities, and modern sanitary, etc could have provided us a better insight view of the socio-economic status of the respondents and hence, a better interpretation of the study.

Third, since family planning is the mutual effort of both the wife and the husband, data on the reproductive intentions of the husbands and their attitude towards the use of contraceptive would have provided us useful information to analyse the contraceptive behaviour of the women. Hence, inclusion of male as the respondents in our sample might have yielded us a better analysis in this regard.

Last but not the least, in some cases, there might be some omissions in the process of data collection from the respondents as the quantitative information such as age, monthly family income and expenditure, age at marriage, age at first birth, method chosen, reasons of not using a method, reason of discontinuation and reasons of not intended to use or intended to use in future etc. are from their authentic records and based on their knowledge.

****

REFERENCES

Arnold Fred, Kishore, Sunita and Roy T.K., (2002).	Sex Selective abortions In India. Population and Development Review 28(4); Pp.759-785
Arnold Fred., (2001).	Son Preference in South Asia in Z.A. Sathar And J.E. Phillips (Eds). Fertility Transitions In South Asia, Oxford University Press. Oxford
Arnold, Fred, Chloe, M.K. and Roy, T.K., (1998).	Son preference the family building and child mortality in India. Population Studies, 52; pp. 301-315
Arnold, Fred., (1996).	Son preference in South Asia. Paper presented at the International Union for Scientific Study of Population (IUSSP) seminar on comparative perspectives on Fertility Transition in South Asia, Islamabad, 17-20
Arnold, Fred., (1997).	Gender Preferences for Children: Findings from the Demographic and Health Surveys. Paper Prepared for the 23rd General Population Conference of the International Union For the Scientific Study on Population (IUSSP), Beijing, 11-17 October
Bairagi.R. and Battacharya., (1989).	"Parental Sex Preference and Its Effects on Fertility Intentions and Contraceptive Use In Calcutta". Rural Demography 16 (1 And 2), PP. 43-56
Bardhan P.K., (1988).	Sex Disparity in Child Survival In Rural India. In T. N. Srinivasan and P.K. Bardhan eds. Rural Poverty In South India, Oxford University. pp: 472-82.
Baruah D. R., (1999)	"Demographic characteristics of sterilisation and IUD acceptors- A study of the North Eastern states" Assam Economic Review. vol-7. pp-101-108.
Barneett, J. and Stein, BJ., (1998).	Women's Voices, Women's Lives: The Impact of Family Planning. A Synthesis of Findings From the Womens' Studies Project. North Crolina: Family Health International.
Basu A., (1992).	Culture, the Status of Women and Demographic Behaviour, Illustrated with the Case of India. Oxford
Basu A.M. (1993).	How Pervasive are Sex Differentials In Childhood Nutritional Levels In South Asia? Social Biology, 40(1-2), Pp. 25-37.
Basu, A.M. (1997).	The Politicization of Fertility to Achieve Non-Demographic Objectives. Population Studies 51:5-18
Basu, A.M., (1989).	Is Discrimination In Food Really Necessary for Explaining Sex Differentials in Childhood Mortality? Population Studies, 43: 193-210

Basu, S., Kapoor K. Anoop and Basu, K.S., (2004).	"Knowledge, Attitude and Practice of Family Planning Among Tribals", Journal of Family Welfare, vol.50;N(2), June,2004; pp:24-30.
Basu, S.K., (1994).	A Health Profile of Tribal India. Health For The Millions. (2):12-4.13
Berelson Bernard, (1978).	"An Evaluation of the Effects of Population Control Programme." Studies In Family planning. Vol.5. No.1. pp: 2-12.
Bhat Mari, P.N. and Francis Zavier A.J. (2003)	"Fertility Decline and Gender Bias in Northern India". Demography, Vol.40, No.4,PP:63-65
Bhusan,I., (1996).	Understanding Unmet Need. Working paper No.4. Baltimore, John Hopkins School of Public Health/Centre for Communication Programs
Bongaart, J., (1990)	Measurement of unwanted fertility, Population and development review, Vol:16, N:3
Bongaart, J., (1991)	"The Kap-gap and Unmet Need for Contraception." Poulation Review, Vol.17. No.2 pp. 293 – 313.
Bongaart, J. and Bruce, J., (1995)	"The causes of Unmet Need for Contraception and the Social Content of Services." Studies In Family Planning. Vol.26. No.2. pp: 57-75.
Bose Ashish, (1969).	Differential Fertility by Religion in India, In: A.R. Kamat (ed.), Population Problems of India, Monograph, Series No.II, CFPI, New Delhi, PP.78-83
Bose, Ashish. (1994).	"Demographic Zones in India". B.R. Publishing Corporation, D.K. Fine Art Press Pvt. Ltd. Delhi. pp. 6- 14
Cain M.T. (1993).	Patriarchal Structure and Demographic Change. Pp (43-60) in Women's Position and Demographic change. Edited by N. Federici, K.O. Masen and S. Stronger, Oxford Clarendon
Cain Mead, (1984).	Women's Status and Fertility in Developing Countries: Son preference and economic society. World Bank Staff Working Papers No.682. Population and Development Series, No. 7, Washington D.C. The World Bank
Caldwell, (1989).	The causes of Demographic Change: Emperical Research in South India. Madison: University of Wisconsin Press.
Casterline and Sinding, (December, 2000)	Unmet Need for Family Planning in Developing Countries and Implications for Population Policy John B. Casterline Steven W. Sinding": Population And Development Review, vol:26. No:4. pp: 691-723

Casterline et al., (1997).	Factors Underlying Unmet Need for Family Planning in the Philippines. Studies in Family Planning. Vol:28. No: 3. Pp:173-191
Chatterjee M, Lambert J, (1990).	Women and Nutrition: Reflections from India and Pakistan. ACC/SCN Symposium Report. Nutrition Policy discussion Paper No. 6, pp. 73-108, Geneva, Administrative committee on coordination / Subcommittee on nutrition
Choudhury, Huda Rafiqul, (1982).	Social Aspect of Fertility', with special reference to developing Countries. Bangladesh Development Study. Vikash Publishing House Pvt. Ltd. pp: 1-2,107.
Christopher Z.Gulmoto, S. Irudaya Rajan, (2002).	District Level Estimates of Fertility from India's Census 2001, E.P.W., pp 665-672.
Cochrane Susan H. (1979).	Fertility and Education: What do we really know? World Bank Staff Occasional Papers, No. 26. Baltimore, Maryland and London: Johns Hopkins University Press.
Das Gupta M., (1987).	Selective discrimination against female. Children in Rural Punjab, India. Population and Development Review 13: 77-100.
Das Madhumita and Sanghamitra Acharya, (1999).	Factors influencing Family Planning Method Choice in West Bengal and Assam. The Journal of Family Welfare. Vol. 45. No. 4. pp.30-42.
Das Narayan, (1987).	Sex preference and fertility behaviour: A study of recent Indian data, Demography, Vol. 24, No. 4, PP. 517-531
Davis Kingsley, (1963).	"Theory of Change and Response in Modern Demographic History", Population Index, 29(4), PP. 345-366
Day, L.H., (1984).	Minority – Group Status and Fertility: A More Detailed Test of the Hypothesis. Sociological Quarterly 25(4): 456-472
Dharmalingam A., (1995).	The Social Context Of Family Planning. In A South Indian Village. International Family Planning Perspectives. vol.21, No.3. pp. 98 – 103.
Dixon Muller, (1993).	Population policy and Women's right : Transforming Reproductive Choice, Praeger Publishers, West Port. PP: 15-16 inJyotsna Agnihotri Gupta (2000), New Reproductive Technologies, Women's Health And Autonomy, Freedom or Dependence? ,Indo-Ditch Studies on Development Alternatives-25, Sage Publications, New Delhi, Thousand Oaks, London.

De Silva W.I.,(1994).

Husband-wife Communication and Communication and contraceptive behaviour in Sri Lanka. Journal of Family Welfare. Vol.40. No.2. pp.1 – 13.

Dixtion Muller R, and Germain A., (1992).

"Stalking the elusive unmet need for family planning." Studies in family Planning. Col: 25. No: 5. pp: 330 – 335.

Doshi Unnati, Tejal Desai and Gajanand, D. Velhal, (Dec'2006).

"Knowledge and Perception of Women towards Male and Female Sterilization"; Journal of Family Welfare; Vol. 52, No. 2. pp.92 – 99.

Dwivedi. S.N, (1992).

Contribution of some socio-economic variables towards explaining the level of adoption of various family planning devices in India during 1987; Demography India, Vol. 21, No. 2, PP. 239-245.

Dyson,Tim and Mick and Moore, (1983).

On Kinship Structure, Female Autonomy and Demographic Behaviour in India. Population and Development Review (New York), Vol. 9, No. 1 (March), PP. 35-59

Easterlin Richard, AM., (1975).

"An Economic Framework for Fertility Analysis Studies in family Planning, 6(3): PP. 54-63. Fort A. Investigating the social context of family and family planning , (998) : A quantitative study in Peru . International Family Planning Perspectives 1989; Vol: 15, No: 3: pp: 88-95

Freedman Ronald, (1997).

Do Family Planning Programme Affect Fertility Preferences? A Literature Review, Studies in Family Planning, Vol-28/ No:1, pp.1-13

Freedman Ronald, (1975).

The Sociology of Human Fertility, New York: John Wiley & Sons.

Freedman Ronald, (1979).

"Theories of fertility decline: A reprisal". Social forces vol:58(1); PP. 1-17.

Glass Devid, V., (1976)

Trends in fertilities in developed countries, Royal societies of London. Section B. (Biological Science), Transactions, Vol. 274. pp.1 – 52.

Golberge Devid., (1976).

'Residential Location and Fertility'. In Population and Development; The Search for Selective Intersections, edited by G.U. Ridker, pp: 367-428, in International Encyclopedia of Population Vol. one, The Free Press, A Division of Macmillan Publishing Co., Inc., New York, Collier Macmillan Publishers, London.

Goldscheider, Calvin and Peter R. Uhlenberg,(1969).

Minority Group Status and Fertility. The American Journal of Sociology 74 (4): PP: 361-373

Goodburn, Elizabeth, Rukhsana Gazi, and Mushtaque Chowdhury (1995).

Beliefs and practices regarding delivery and postpartum maternal morbidity in rural Bangladesh. Studies in Family Planning 26(1): 22-32.

Gupta, Joyatsna, (2000).

"New Reproductive Technologies, Women's Health and Autonomy, Freedom or Indepence?" Sage Publication, New Delhi, Thousand Oaks London, pp:

Hanna, B and T. Nadarajah, (1975).

'Fertility Differentials in Srilanka.' Proceedings of Seminar on Population Problems in Srilanka in the Seventies: in Choudhury, Huda Rafiqul, (1982), "Social Aspect of Fertility, with special reference to developing Countries". Bangladesh Development Study. Vikash Publishing House Pvt. Ltd. pp: .

Hass, Paula H., (1974).

"Maternal role incompatibility and Fertility in Urban Latin America." Journal of Social Issues. Vol.28 .No.2. pp.11-127., in International Encyclopedia of Population Vol. one, The Free Press, A Division of Macmillan Publishing Co., Inc., New York, Collier Macmillan Publishers, London. p: 249

Henry Alice and Phyllis T. Piotrow, (1979).

Age at marriage and fertility. Population Reports, Series M, No. 4, Whole Issue.

Honanhan, W.A., (1960).

'The Population of Ireland'. Journal of the Institute of Actuaries, 86(1,372) in Rafiqul Huda Chowdhury, 'Social Aspect of Fertility', with special reference to developing Countries. Bangladesh Development Study. Vikash Publishing House Pvt. Ltd. pp: xvii.

Joesef, Mohamed R, Andrew L. Baughman and Budi Utomo, (1988).

Husband's approval of contraceptive use in metropolitan Indonesia: Program implications. Studies in Family Planning (New York), Vol. 19, No. 3, PP. 162-168.

Jolly. KG., (1981).

'Differential Fertility Performance by Educa-tion, Age at Marriage and Work Status of women in Delhi Matrpolies, Demography India; vol: 10/No: 1&2.

Jones Favin W., (1977)

"Economic and Social Support for High Fertility : Conceptual Framework." In the Economic and Social Support for High Fertility, edited by Lado T. Ruzicka, pp.30-34. Canberra: Deprtment of Demography and Development Studies Centre. Australian National University.

Kabir, Mk, Elahi,KM and Moslehuddin, M.,(1987).

"Unmet Need for Contraception in Rural Bangladesh": Evidence from A Micro Study. journal of Family Welfare. Vol. 34. No.1. PP:3-10

Kanitakar Tara and B.N. Murthy, (1983).

Factors Associated with contraception in Bihar and Rajasthan: Findings from recent sample surveys, published in Dynamics of population and family welfare, 1983, edited by K. Srivasan and S. Mukkerji. Himalaya Publishing House, Delhi.

Kapadia, (1966).	Marriage and Family in India. 3rd edition. Bombay: Oxford University Press.
Karve, (1965).	Kinship Organisation in India. Bombay Asia Publishing House.
Kaur, Surjit, (1976).	Family Planning in Two Industrial Units: A Study. Sterling Publisher, New Delhi
Kausik, S and Vemuri Murli D., (2003).	Components of Unmet Need in India: A Study based on National Family Health Survey. Demography India. Vol.32. No.1. pp. 61-68
Khan M E. and Patel BC., (1996)	Male involvement in family planning : A KAP survey of Agra district Project Report, Population council.
Khan ME. and Patel BC.,(1996).	Male involvement in family planning: A KABP survey Agra district project report, Population Council
Khan, M.E. and R.B. Gupta (1985).	Determinants of High Family Planning Practices: A case study of Nilgiri; Reading the Population Research. Methodology and Perspective 1992, Edited by P. Krishnan, Chi. H. T. and Mahadevan, K.; B.R. Publishing Corporation, PP. 524-525
Kirk Maurice, (1980)	Demographic and Social Change, Europe 1975-2000. Liverpool England, Liverpool University Press
Kirk Maurice, Massimo Livi Bacci and Egon Szababy,* (1975).	Law and fertility in Europe: A study of legislation directly or indirectly affecting fertility in Europe. Vol. 2, Dolhain, Belgium Ordina Editions
Kirk, D., (1967).	Factor Affecting Muslim Natality. In O. Schieffelin (eds.), Muslims Attitude towards Family Planning, Population Council, New York
Kulkarni, P.M., (1996)	Differentials in the Population Growth . of Hindus and Muslims in India, 1981-1991, Monograph Series, No.-1, Population Foundation of India, New Delhi.
Kulkuarni, P.M. and M. Alagarajan., (2005)	Population Growth Fertility and Religion in India. Economic and Political Weekly XL (5): 403-410.
Kumar Anil, (1988).	Some socio-economic factors affecting the use of contraception in Alleppy District in Kerala in Reading in Population Research, Policy, Methodology and Perspective 1992, edited by P. Krishnan, Chi H.T. and K. Mahadevan, B.R. Publishing Corporation, PP. 530-532
Kurup, R.S. (1984)	"Factors affecting contraceptive practices in Kerala"; Reading in Population Research Policy, Methodology and Perspective (1992); Edited by P. Krishnan, Chi. H. Tnan and K. Mahadevan; B.R. Publishing Corporation

302

Lakshamamma. T. and Reddy B.P. (1991).	"Knowledge and Practice of Family Planning in Ongole Taluk of Prakasham District, District in Andhra Pradesh", Journal of Family Welfare; Vol. 37, Bo. 1, March 1991, PP. 48-58
Libenstine Harvey, (1974).	"An Interpretation of economic Theory of Fertility, Promising Path or Blind Alley?" Journal of economic Literature, 12(2); PP. 457-479.
Libenstine Harvey, (1975).	"The Economic Theory of Fertility Decline."Quarterly Journal of Economics. Vol.89. No.1. pp:1-31.
Lorimer, Frank, Meyer Fortes, K.A. Busia, Andrey I. REchards, Priscilla Reining and Giorgio Mortara, (1954).	"Culture and Human Fertility in non-industrial and transitional societies, Paris", United Nations Educational, Scientific and Cultural Organization
Mahadevan, K. and M. Sumangalam. (1987).	Social Development, Cultural Change and Fertility Decline: A Study of Fertility Change in Kerala. Sage Publications, New Delhi.
Maiti, S, Unisa, S., Agrawal K. P, (2005).	Health care and Health among Tribal women in Jharkhand: A Situational Analysis. Studies of Tribes and Indigenous 3(1): 37- 46
Mallick, Premkant, (2003-04).	A study of non acceptance of contraceptives among women Bihar, a seminar paper for the partial fulfilment of the master of population studies, International Institute for Population Science, Govinda Station Road, Deonar, Mumbai-400088.)
Mason Karen Oppenhein (1984).	The status of women: A review of its relationships to fertility and mortality (New York). The Rockefeller Foundation
Mason Karen Oppenhein and Herbert L. Smith., (2000).	"Husband's versus Wife's Fertility Goals and use of contraception:. The influence of gender context in five Asian countries"; Demography, Vol. 37,/ No. 3: PP. 299-311
Mass, (1991).	Population Target. The Political Economy of Population Control in Latin America. The Women's Press, Toronto. P.39
Mechaelson, K.L, (1981).	Population Policy, Family Size and Reproduction of Labour Force In India; the case of Bombay In Michaelson ed (1981) and the poor get children. Radical Perspectives on population Dynamics, Monthly Review Press, New York.
Miller, (1981).	The Endangered Sex: The Neglect of Female Children in Rural North India. Ithaca: Cornell University Press.

Mishra K. Vinod, Robert D. Retherford, P. S. Nair, and Griffith Feeney, (1999).	"Reasons for Discontinuing and not intending to Use Contraception in India", NFHS Subject Report No. 13, International Institute for Population Sciences. Mumbai, India.
Moulasha, K., (2000).	Religious Affiliation and Fertility Behaviour in Maharashtra State; A Study of Hindus and Muslims, Ph. D. Thesis, International Institute for Population Science, Mumbai-88
Murty K. Radhakrishna and Susan De Vos, (1984).	Ethnic Differences in Contraceptive Use in Sri Lanka , Studies in Family Planning, Vol:5,No, P-222
Mutharayappa, R., M.K. Choe, F. Arnold and T.K. Ray, (1997).	Son preference and its effects on fertility in India National Family Health survey subject Report No. 3, PP. 1-55
Nag, M., (1984).	Some Cultural Factors Affecting Cost of Fertility Regulation. Population Bulletin of the United Nation: 17: 17-36
Nath D.C. and K.C. Land, (1994).	Sex preference and third birth intervals in a traditional Indian society; Journal of biological science (26), PP. 377-388
Nortman, Dorothy L., (1982).	"Measuring The Unmet Need For Contraception to Space And Limit Births". International Family Planning Perspective:8: pp: 125-134
Omran, A.R., (1992).	Family planning in the legacy of Islam. London; Routlege.
Padma Rama, G., (2005).	Men's Participation in Reproductive Health: A Study Of Home Villages In Andhra Pradesh. Gender And Social Issues In Reproductive Health Research. Achutha Menon Centre For Health Science Studies .Sree Chitra Tribunal Institute For Medical Science & Technology, Trivandrum, India. pp: 2-19.
Pathak, K. B., et. al., (1998).	Accelerating India's Fertility Decline. The Role Temporary Contraceptive Methods, NFHS Bulletin No.9 Mumbai: IIPS and Honolulu, East West Centre of Population
Rajarethnam T. (1995)	"Family Size Desire, Sex Preference, Socio-economic condition and contraceptive use in Rural Karnataka, India", Demography India, Vol. 24, No. 2.
Raju K.N.M. and T.N. Bhat, (1995).	Sex composition of living children, against socio-economic variables while accepting family planning methods. Demography India (24), PP. 87-99.
Ram U., (2001).	"Unwanted pregnancies / births among Tribal, Muslims in Maharastra" Demography India; pp-281-297, vol: 30, N(2),
Reddy, M.M, (1985).	Sex combination of living children and the adoption of sterilization- A rural study in Andhra Pradesh. The Journal of Family Welfare. Vol.31. No.4. pp.61-68

Reddy, Meera V., (1984).	The influence of Demographic Variables on the Adoption of Sterilization, Journal of Family Welfare, Vol. 30, No. 3. pp.46 -56.
Reddy. Manikrishna M., (1984)	"Socio-economic and Demographic Factors and Their Influence on Family Planning Behaviour among Non-Adaptors"; Journal of family Welfare, Vol. 30, No. 4, PP. 92-101
Roy T.K. et al., (1991).	Education, Fertility and Contraception among Hindus and Roman Catholics in Goa, Journal of biosocial Science, vol: 23, no:3, PP: 353-358.
Samuel L.K., Rao P.S.S., (1992).	"Socio-economic Differentials in Mothers at Risk Based on Prepregnancy Weights and Heights". Indian Journal of Medical Research, Vol. 96: pp.159-167.
Samuelson, T.J, (1966).	The development of India's Policy of Population Control, Milibank Memorial Fund Quarterly, No. 44, p: 52
Schultz T. Paul, (1969).	"An Economic Model of Family Planning and Fertility", Journal of Political Economy, 77(21), PP. 153-80
Schultz T. Paul, (1976a).	"Determinants of Fertility, A Micro-economic Model of Choice." In Econmic Factors In Population Growth, edited by Ansley J, Coale, pp: 89-124, New York Willey, in International Encyclopedia of Population Vol. one, The Free Press, A Division of Macmillan Publishing Co., Inc., New York, Collier Macmillan Publishers, London.
Schultz T. Paul,, (1976b).	"Interrelation Between Mortality and Fertility," in Population and Development. Edited by Ronald G Ridker. Pp: 239-289.
Schultz Thedore W., (1974).	Economics of the Family, Marriage, Children and Human Capital, Chicago University of Chicago Press,
Sharon R. Edwards, (1994)	The Role of Men in Contraceptive Decision-Making: Current Knowledge and Future Implications. Source: Family Planning Perspectives, Vol. 26, No. 2, pp. 77-82
Simontish, Ronald G., (1952)	Religious Instruction in Catholic College for Men, Washington, DC: the Catholic University of America Press.
Sing Abhishek, Faujdar Ram, Rajiv Rajan, (2007).	Couples Reproductive Intensions in Two Culturally Constrasting States of North Eastern India, Demography India, Vol. 36. No.1. pp. 39-53.
Sinha R.B.N., (June 1991)	Attitudes of Hindus and Muslims to Family Planning, Journal of Family Welfare, Vol. 37, No. 2, PP. 47-49

305

Srikanta, K.S; and Vaijayanti Bhate, (1989).	*National Fertility and Mortality Survey, Maharashtra, 1980,* Publication No. 70, Gokhale Institute of Politics and Economics, Pune.
Srikantan, K.S., Sanjeevanee Mulay and Anjali Radkar, (1988).	Fertility Differentials by Socio-demographic Characteristics of Couples in Maharashtra, 1980, *Artha Vijnana,* Vol. 30, No. 2.
Srinivas K., (1995).	"Lessons from Goa, Kerala and Tamil Nadu. The Three Successful Fertility Transition States in India", Demography India, Vol. 24, No. 2.
Srivastava, S.K., (1989).	Family Planning and Population Problem in India. Commonwealth Publisher, New Delhi.
Stash, S., (1997).	"Explanations of unmet need for contraception in Chitwan, Nepal. Studies in Family Planning. Vol:30. No: 4. Pp: 267-287
Sundar Ramamani, (1990).	"The Status of Women and family planning Acceptance: Some Field Results". Journal of Family Welfare, Vol. 36, No. 2, PP. 60-68.
Thakur D.S., Thakur D.C., Saini (1991).	A.S. Socio-economic Impact of Tribal Development Programmes in Himachal Pradesh. Journal of Rural Development Vol:10: pp: 823-830.
Thangadari, M. (1987).	"Communication in Family Planning"; Reading in Population Research Methodology and Perspective, 1992; edited by P. Krishnan, Chi. M. Tnan and K. Mahadevan, PP. 520-522
Vaidyanathan, VK., (1988).	"Status of Women And Family Planning: The Indian Case". Asian Pacific Population Journal, vol:4,no:2; pp:3-18
Visaria, L., (1997).	Unmet Need for Family Planning in Gujrat; A qualitative Explanation. Economic and Political Weekly. 26th April . pp: 29 - 36.
Viswanathan, H., (1998)	Reaching Women: A Study of Unmet Need in Uttar Pradesh, India. Washington D.C. International Centre for Research on Women.
War Wick, and Donald, (1986).	The Indonesian Family Planning Programme: Government Influence and client choice. Population and Development Review (New York); Vol. 12, No. 3, PP. 453-490
West Off, Charles F., (1964).	"The Fertility of American Population". In Population: The Vital Revolution, edited by Ronal Freedman, PP. 110-112, Garden City, N.Y. Doubleday,
Westoff and Bankole, (1995).	Unmet Ned: 1990-1994. Demographic And Health Survey. Comparative Studies; No.16. Calverton Maryland: Macro International

Westoff and Bankole, (1996).	The Potential Demographic Significance of Unmet Need. International Family Planning Perspective. Vol: 22. No:1. pp.16 – 20.
Westoff Charles F, (1988)	The potential demand for family planning: A new measure for unmet need and estimation for five Latin American countries. International Family Planning Perspective: 14: pp: 45 – 53.
Westoff et. al., (1963).	The Third child: A Study in Prediction of Fertility, New Jersey. Princeton University Press. pp: 79-107.
Westoff, Charles F., and Anne Pebley, (1981).	"Alternative Measure of Unmet Need for family planning in Developing Countries". International Family Planning Perspective: 7:126-136
WHO, (1972).	Family Formation Patterns and Health: An International Collaboration Study.
Wijetunga.W. M.K., (1974).	'Sri Lanka in Transition'. Wesley Press
Yinger,N.V., (1998).	Unmet need for Family Planning: Reflecting Women's Perceptions. Washington D.C.International Centre for Research on Women
Yong, (1985).	Serving Two Masters, Routledge and Kegan Paul, p:102

****

REPORTS

Government of Assam	Assam Human Development Report, 2003.
Government of Assam.	Directorate of Char Area Development, (2002-03). "Socio-Economic Survey Report, Char area of Assam",
Government of Assam.	Directorate of Economics Statistics 2008. Statistical Hand Book of Assam.
Government of Assam.	Directorate of Health Service, Assam, 2009. Socio-Economic and Demographic Report for the years, (2006-07), (2007-08) and (2008-09).
Government of Assam.	District Family Welfare Bureau, Darrang (2007). Year wise Family Welfare Performance Report in Darrang,
Government of India	Ministry of Health and Family Welfare,1994. Indian Country Statement, ICPD, Cairo,
Government of India,	Ministry of Health and Family Welfare, 2001. Year book of Family Welfare Programme in India.
Government of India.	IIPS and ORC Macro (1996, 1999 and 2008). Ministry of Health and Family Welfare. New Delhi. National Family Health Survey, Assam, of various years: NFHS -1 (1992-93); NFHS-2 (1998-99) and NFHS-3 (2005-06).
Government of India.	IIPS,(1995). National Family Health Survey Subject Report, No. 3. International Institute for Population Sciences.
Government of India.	India Ministry of Tribal Affairs (2004). The National Tribal Policy (Draft), New Delhi.
Government of India.	Ministry of Health and Family Welfare (August, 1995; Oct' 2000 and Sept' 2007). National Family Health Survey, India: NFHS-1 (1992-93), NFHS-2 (1998-99) and NFHS-3 (2005-06): International Institute for Population Sciences, Mumbai.
Government of India.	Office of Registrar General and Census Commissioner. A Primary Census Abstract, (2001).Report on total population, population of scheduled castes and scheduled tribes and their proportions to the total population, New Delhi.
Government of India.	IIPS, (1998-99 and 2002-03). Ministry of Health and Family Welfare, New Delhi.

Government of India.

Reproductive and Child Health Project, Rapid Household Survey, India: (DLHS-1) and, (DLHS-2).

IIPS, (1999 and 2002). Reproductive and Child Health Profile, District Level Household Survey Report, Assam: (DLHS-1), (DLHS-2), International Institute for Population Science, Mumbai. *Conducted by Taleem Research Foundation, Ahmadabad.*

Government of India.

IIPS, (1999). NFHS Subject Report No.13, International Institute for Population Sciences. Mumbai, India.

Government of India.

SRS Bulletin, (2001 and Oct', 2006). Simple Registration System, Registrar General India. Vital Statistics Division, New Delhi.

Government of Pakistan

Demographic and Health Survey Report, Pakistan, (1990-91). National Institute of Population Studies, Islamabad, Pakistan.IRD Macro International Inc. Columbia, Maryland, USA.

Ministry of Health, Kathmandu,Nepal.

Family Health Division Department (1997). Nepal Family Health Survey Report. Demographic and Health Survey, Macro International Inc. Government of Nepal.

U.N. Report, (2007).

United Nations Department of Economic and Social Affairs Population Division. Wall Chart on Contraceptive Use.

****

BIBLIOGRAPHY

1. Bhowmik. K.L. M.K. Chowdhury: Puranjan Das and K.K. Chowdhury (1971). Fertility of Zemi Women in Nagaland. Calcutta Institute of Social Studies.

2. Bose, Ashish. (1994). Demographic Zones in India". B.R. Publishing Corporation, D.K Fine Art Press Pvt. Ltd. Delhi.

3. Cochrane. Susan Hill (1979). Fertility and Education. What do we really know? Published for the World Bank. The John Hopkins University Press.

4. Corsa, Leslie and Deborah Oakley (1979). Population Planning. The University of Michigan Press.

5. Choudhury Haque Rafiqul (1982). Social Aspects of Fertility: with Special Reference to Developing Countries, Vikash Publishing House Pvt. Ltd.

6. Desai, A.R. (1980). Urban Family and Family Planning in India. Bombay Population Prakashan.

7. Dutta, Chattapadyay Purnima (1995). Loops and Roots. The conflict between official and traditional family planning in India. Ashish Publishing House.

8. Foreit, James R. and Tomas Frejka (1998). Family planning oeration research. A book of readings Population Council.

9. Guilmoto, Christopher Z. and S. Irudya Rajan (2005). Fertility transition in South Asia. Sage Publications.

10. Gupta, Joyatsna, (2000). "New Reproductive Technologies, Women's Health and Autonomy, Freedom or Indepence?" Sage Publication, New Delhi, Thousand Oaks London.

11. Jain, Anurudh (Editor), Do population policies matter? Fertility and polities in Egypt, India, Kenya and Mexico. Population Council.

12. Krishnaraj, Methreyi Ratna M, Sudarshan and Abusaleh and Sharrif (1998), Gender, Population and Development Oxford University Press.

13. Kulkarni Sumati and Minja, Kim Choe (1998). "Wanted and Unwanted Fertility in Selected States of India". International Institute for Population Sciences Mumbai, India. National Family Health Survey Subject Reports Number 6. East-West Center Program on Population. Honolulu, Hawaii, U.S.A.

14. Padma, R.G., (2005). "Men's participation in Reproductive Health" A Study of some villages in Andhra Pradesh. Achutta Menon Centre for Health Science Stuies, Chitra Tirunal, Institute for Medical Science and Technology.

15. Raina. B.I. (1990). Panning Family in India. Pervedic times to early 1950's. Commonwealth Publishers (1st Edit).

16. Rajendran, T., (1997). Socio-economic differentials in fertility and family size of sterilization acceptors of the 1980s in rural Karnataka. The Journal of Family Welfare 43(4): 46-58.

17. Rajarethnam T., (1999). Socio-cultural determinants of Contraceptive Method choice in Goa, Kerala and India, Journal of Family Welfare, Vol. 45, No. 2, PP. 1-11

18. Rao, N. Baskara (1976). Family Planning in India: A case study of Karnataka. Vikas Publishing House Pvt. Ltd.

19. Reddy. M.M. Krishna (1996). Fertility and Family Planning Behaviour in India Society. Kanishka Publishers, Distributors, New Delhi.

20. Roy, T.K., S.K. Mahanty and R.K. Sinha, (2009). "Should Unmet Need be Programme Priority in India? Some Reflection" Demography India , Vol. 38. No.2. pp.209 - 223.

21. Sharma K. Ravendra, Manju Rani and Arvind Pandey, (2009). "Value of Children in Uttar Pradesh, India: How Rural Parents See it?" Demography India. Vol.38. No.2. pp. 225 - 239

22. Thomas Scharping (2003). Birth Control in China (1949-2000). Population Policy and Demographic Development. Routledge Curzon, Taylor and Francis Group. London and New York.

23. Sing, Rahul (1994). Family Planning success stories (Asia Latin America Africa). USB Publisher's Distributors Ltd (1st Edition)

24. Srivastava, S.K. (1989). Family Planning and Population Problem in India. Commonwealth Publishers.

****

APPENDIX

INTERVIEW SCHEDULE
(Confidential- For Research Purpose Only)

SECTION- I

	Questions	Response Category
Q.1.	Name of the District.	
Q.2.	Name of the Block	
Q.3.	Name of the Village.	
Q.4.	Ward number.	
Q.5.	Name of the town.	
Q.6.	Name	
Q.7.	Address.	
Q.8.	Age of the respondent.	...................................Years
Q.9	Age of the husband.	...................................Years
Q.10	Religion.	(1) Hindu (2) Muslim (3) Christian
Q.11	Social category	(1) SC (2) ST (3) General (4) Char
Q.12	Educational qualification of respondent.	(1) Illiterate; (2) Up to Primary (3) Up to Middle (4) Under Matric (5) Matric /Hr. Secondary passed (6) Graduate and above
Q.13	Educational qualification of husband.	(1) Illiterate; (2) Up to Primary (3) Up to Middle (4) Under Matric (5) Matric / Hr. Secondary passed (6) Graduate and above
Q.14	Occupation of the respondents.	(1) House Wife (2) Service- holder (3) Labour /Daily Wage-earner
Q.15	Occupation of the husbands.	(1) Farmer (2) Trader/Self- employed (3) Service- holder
Q.16	Type of family	(1) Nuclear family (2) Non-nuclear family
Q.17	Family income (monthly)	(1) Less than Rs.5000/- (2) Less than Rs.10, 000/- (3) Less than Rs.20,000/- (4) Above Rs.20, 000/-
Q.18	Monthly expenditure of the family	(1) Less than Rs.5000/- (2) Less than Rs.10, 000/- (3) Less than Rs.20,000/- (4) Above Rs.20, 000/-
Q.19	Family property	(1) Landless ; (2) Agricultural land ; (3) House ; (4) Other...................(Specify)
Q.20	Distance of residence from PHC / Health Sub-Centre.	---------------------------------(In Km)
Q.21	Age at marriage	Respondent's age ....
Q.22	Have you ever given birth to a child? (live birth)	Yes ....(1) No .... (2)
Q.23	Have you ever given birth to a boy or a girl who was born alive but, later died?	Yes .... (1) No .... (2)
Q.24	In all, how many boys and how many girls died?	Boys died .... Girls died ....

SECTION: II

Records of Live Birth During the Life Time, Whether Currently Alive or Not.

Name given (first, next baby)	Sex of the baby boy=1, Girl=2	Current age of the baby.	What was your age at the birth of the baby? (Age in yrs)	Is the Name still alive? (Yes.1 No.2)	If dead, how old was name when he / she died? (month/years)
Q.25 (a)	(b)	(c)	(d)	(e)	(f)

Records of Fertility Related Behaviour and Use of Contraception.

	Questions and filters	Coded response	Skip to
Q.26	Besides these live births did you have pregnancy which terminated into still birth? If yes, how many?	Total number————————	
Q.27	Did any of your pregnancy terminated into induced or spontaneous abortion?	(1) Yes (2) No	
Q.28	If yes how many?	(1) Induced————————— (2) Spontaneous ———————	
Q.29	Prior to 1st pregnancy did you and your husband ever discuss the no. of children you should have?	(1) Yes (2) No	
Q.30	How many children did you/ your husband prefer to have?	Specify_____	
Q.31	Did you and your husband ever discuss the use of a family planning method?	(1) Yes (2) No	
	a) If yes, who initiated the discussion?	(1) Wife (2) Husband	
	b) When did you discuss for the first time?	1. Before first birth of child 2. After first birth of child 3. After the birth of second child	
Q.32	Did you and your husband discuss the following aspects at any time?	(1) Gap between children (2) No. of children (3) What method to use (4) Source of Method (5) Side effects of Method (6) To seek health advice to use the method (7) None.	
Q.33	Which of the family planning methods are you aware of?	Specify———————	
Q.34	Are you currently pregnant ?	(1) Yes (2) No	→Q.50
Q.35	If no, are you/your husband currently using any family planning method (including sterilization)?	(1) Yes (2) No	→Q.50
Q.36	If yes, which method you /your husband are using?	Specify_____	
Q.37	For how long have you been using this method continuously?	1) Months (less than 100 months) 2) More than 100 months 3) Do not remember	

Q.38	Where did you/your husband go to obtain the method? (incuding sterilization)	(1) Govt. Hospital (2) PHC (3) Sub Centre (4) Do Not Know (5) Doctor/ ASHA / ANM	
Q.39	Who did motivate you to use the current method?	(1) Husband (2) Wife (3) Relatives/Friend (4) ANM/ Nurse/ASHA (5) Do Not Know (6) Other	
Q.40	In the last few months, have you discussed the practice of F.P. with your husband friends / neighbours or relatives?	(1) Yes (2) No	
Q. 41	With who have you discussed?	(1) Husband ; (2)Mother; (3) Mother In Law (4) Relatives; (5) Friends / Neighbors (6) Others _____(Specify)	
Q.42	In the last few months have you heard or seen any massage about family planning?	(1) On radio; (2) T.V. (3) Film show (4) Newspaper/ magazine; (5) Wall painting/ hoarding (6) Drama / folk- dance / street play	
Q.43	Before the adoption of sterilization or the method other than sterilization, have you/your husband been informed about all the methods?	1). Yes 2). No → 3). Do Not Remember →	]Q.46
Q.44	How much did the operation or the device cost you? (If no charge, record 00 and 99 for don't know)	Rs.————————	
Q.45	Have you ever found difficulty in obtaining the methods? (If yes, specify)	(1) No problem; (2) Not regularly available with PHC/ ANM (3) Not regularly available with medical shops/ chemist; (5) Other	
Q.46	When adopted this method, did any health worker/ ANM inform you about possible health problems that may occur?	(1) Yes; (2) No ; (3) Do Not Remember	
Q.47	Have you/your husband had any health problem after you/your husband started to use the method?	(1) Yes (2) No →	Q 49
Q.48	If yes, what were the problems?	Specify...........................	
Q.49	Are you satisfied with your method?	(1) Yes (2) No	
Q.50	(For those who are not currently using any method) Have you/your husband used any method in the past and discontinued?	(1) Yes (2) No	
Q.51	If yes, What was the last method that you/your husband used?	Specify—————————————	
Q.52	What was the reasons for discontinuation of the use?	Specify ———————————	
Q.53	Has ANM/health worker ever advised you to use any method?	(1) Yes (2) No	
Q.54	If yes, what was method advised?	Specify ———————————	

Q.55	Do you want to use any method of family planning at any time in future?	(1) Yes (2). No → (3) Not yet decided →	]Q.58
Q.56	If yes, when would you want to use?	(1) within one year (2) one to two years (3) more than two years (4) can't say.	
Q.57	Which method would you prefer to use?	Specify————————	
Q.58	Would you like to have another child?	(1) Want More Child ; (2) Want no more Child (3 Not Decided → (4) Up To God →	]Q 61
Q.59	Would you prefer your next child to be a girl /boy?	(1) Boy (2) Girl (3) Does not Matter (4) Up to God	
Q.60	How long would you like to wait to have another child?	(1) Soon /Not less than 24 months (2) More than 24 months (3) Not decided	
Q.61	What is the main reason for not using a method of contraception to delay or avoid pregnancy?	1.Want more children / more sons/ more daughters 2.Fertility related reason /sub-fecund /in-fecund / postpartum / breast feeding 3.Husband opposed/other people opposed/against religion 4.Lack of knowledge/worry about side effect/afraid of sterilization 5.Difficult to get method /costs too much /inconvenient to use /do not like existing method /irregular supply. 6.Health related reason/ In-fecund 7. Others ....(specify)	

SECTION : III.

Decision Regarding the Number of Child Birth and Choice of Contraceptive.			
Q.62	Decisions regarding total number of children.	(1) Husband oriented (2) Wife Oriented (3) Joint Decision	
Q.63.	Decisions regarding total number of sons or daughters to be born.	(1) Husband oriented (2) Wife Oriented (3) Joint Decision	
Q.64	Decisions regarding spacing between two births.	(1) Husband oriented (2) Wife Oriented (3) Joint Decision	
Q.65	Decisions regarding choice of contraceptive in use.	(1) Husband oriented (2) Wife Oriented (3) Joint Decision	
Q.66	(Only for those who has undergone abortions), Decisions regarding abortions.	(1) Husband oriented (2) Wife Oriented (3) Joint Decision	
Q.67	Decision regarding sterilization.	(1) Husband oriented (2) Wife Oriented (3) Joint Decision	

****