Rural-Urban Differentials of Knowledge and Practice of Contraception in Bangladesh

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Introduction

Bangladesh is a poor and densely populated country of the world. Resource scarcity and subsistence-level economic conditions characterize the economy (Hadi and Gani, 2005). The total population is about 156 million about 36 per cent of the population lives on less than $1 a day (UNICEF, 2004) .Other indicators also reflect the poverty of the country: the literacy rate of the population aged five years and older is 43.1 per cent (males 53.9 and females 31.8 per cent) and life expectancy is 62 years for both males and females (NIPORT, 2001).

Despite these low socio-economic indicators, Bangladesh has achieved a high level of success in its family planning programme. The level of ever use of family planning has increased steadily in Bangladesh in 2004, 80 percent of ever-married women of reproductive age reported having used a family planning method at some time, compared with only 14 percent in 1975, registering a more than fivefold increase over the past three decades. The contraceptive prevalence rate for currently married women in Bangladesh has also increased from 8 percent in 1975 to 58 percent in 2004 this translates to more than a sevenfold increase. The rural-urban division shows that 60 percent of the urban women and 52 percent of the rural women use contraceptive methods. Also during this period, the total fertility rate dropped by half, from about six children per woman to about three. However, Bangladesh still has a long way to go to achieve the replacement level of fertility, i.e. about 2.1 children per woman, which the government hopes, will be achieved by the year 2015. The contraceptive prevalence rate would have to rise to over 70 per cent for this target to be reached (Mitra, Ali, and

Islam. 2001). Therefore, the challenge for Bangladesh is not only to sustain the present level of contraceptive use, which itself implies to raise the contraceptive prevalence rate by at least an additional 12 per cent.

This paper make an attempt to examine the discrimination of contraceptive use among urban and rural women of Bangladesh with special attention to the knowledge and use of contraceptive methods, causes for not using contraceptive methods by women, intention and preference of using contraceptive methods in future. Determinants of contraceptive use among the urban and rural women have also been explored through binary logistic regression analysis.

Data source and methodology

This study utilizes the data extracted from 2004 Bangladesh Demographic and Health Survey, which were conducted under the authority of the National Institute of Population Research and Training of the Ministry of Health and Family Welfare. The BDHS 2004 is a nationally representative survey from 11,440 ever married women of age 10-49 and 4297 men age 15-54 from 10,500 households covering 361 sample points (clusters) throughout Bangladesh, 122 urban areas and 239 in the rural areas. Out of 11,440 ever-married samples, 2586 and 8854 women are taken from urban and rural areas respectively. Data collection took place over a five-month period from 1 January to 25 May 2004. For this purpose percentage distribution, bivariate analysis and multivariate logistic regression analysis are used.

Findings

Knowledge about various methods of contraception

Information on knowledge of family planning methods was collected by asking female respondents to name ways or methods by which a couple could delay or avoid pregnancy..

Table 1: Percentage distribution of ever-married and currently married women who know about any contraceptive method, by specific method, BDHS 2004.

Knowledge of Contraceptive methods	Ever married women	Currently married women
Any method	100	100
Any modern method	100	100
Pill	99.9	99.9
IUD	84.9	85.0
Injectable	98.5	98.6
Norplant	76.0	76.7
Condom	91.6	92.2
Female sterilization	96.1	96.1
Male sterilization	72.7	72.9
Any traditional method	80.3	81.0
Periodic abstinence	70.4	71.0
Withdrawl	57.8	58.7
Other	7.3	7.6
Mean number of method known	7.6	7.6
Number of women	11,440	10,582

If the respondent did not mention a particular method spontaneously, the interviewer described the method and asked whether the respondent had heard about the method. Table 1 elucidates that knowledge of family planning methods is widespread in Bangladesh. All currently married and ever married women know of at least one modern method of family planning, but knowledge of traditional methods is lower among them (81 percent for currently married women and 80.0 percent for ever married women) as compared with modern methods. On average, a woman has heard of 7.6 methods of family planning. There is virtually no difference in knowledge between ever-married and currently married women.

If we look at table-1 we observe that almost all respondents have heard of pills, injectables, and female sterilization. More than nine out of ten women know of condoms. Knowledge of other modern methods is also widespread; a majority of currently married women have heard of the IUD (85 percent), Norplant (77 percent), and male sterilization (73 percent). Knowledge of traditional methods is lower than modern methods. The data show similar levels of knowledge of specific methods for both currently married and ever-married women.

Ever use of any contraceptive method

The term "ever use of contraceptive methods" refers to the proportion of the population who were exposed to contraceptive use at least once. Thus a reported ever user might be a past or current user. Table 2 shows that women's age is significantly associated with ever use of contraception. Urban women in the age group 20-34 years are more likely to use modern and traditional contraceptive methods (89.1 percent) than their rural counterparts (84.2 percent). It is clear from our study that ever use of contraception varies with age of women. It is found lower among the younger and older women and higher among the middle aged women.

Table 2: Percentage distribution of ever married women who have ever used any contraceptive method according to some selected background characteristics.

Characteristics	Urban (N=2586)			Rural (N=8854)			All (N=11440)		
	Modern method	Traditional method	Never used	Modern method	Traditional method	Never used	Modern method	Traditional method	Never used
Women's age		***			***			***	
<20	68.4	5.5	26.0	60.3	6.9	32.8	61.9	6.6	31.5
20-34	86.3	2.8	10.9	79.6	4.7	15.8	81.2	4.2	14.6
35-49	78.6	5.3	16.1	70.2	7.8	22.0	72.1	7.2	20.6
Number of living children		***			***			***	
None	53.0	3.5	43.5	42.1	6.8	51.2	44.7	6.0	49.2
1-2	83.3	4.1	12.7	75.3	5.0	19.7	77.2	4.8	18.0
3-4	90.1	4.1	5.8	81.0	6.1	12.9	83.1	5.6	11.3
5+	78.2	4.6	17.2	72.4	8.9	18.7	73.3	8.2	18.5
Discussed about FP with husband		***			***			***	
Never	76.9	4.6	18.5	68.7	6.2	25.0	70.4	5.9	23.7
Once or twice	91.2	2.9	5.9	86.4	4.9	8.7	87.6	4.4	8.0
More often	95.5	2.5	2.0	84.9	6.5	8.6	87.8	5.5	6.7
Fertility Preference		***			***			***	
Wants	74.3	4.4	21.2	62.5	6.0	31.6	65.2	5.6	29.2
Undecided	80.9	2.1	17.0	66.1	7.6	26.3	69.3	6.4	24.3
Doesn't want	89.6	3.5	6.9	83.2	5.6	11.2	84.6	5.1	10.2
Not currently married	41.8	8.0	50.2	33.1	10.7	56.3	35.2	10.0	54.8
Religion					**			***	
Non Muslim	83.1	5.6	11.3	72.8	8.6	18.7	74.9	8.0	17.2
Muslim	80.5	3.9	15.5	72.7	5.8	21.5	74.5	5.4	20.1
Women's education		***			***			***	
Illiterate	73.4	5.4	21.2	68.2	6.1	25.7	69.1	6.0	24.9
Primary	80.5	3.9	15.6	74.7	6.5	18.7	75.9	6.0	18.1
Secondary	85.5	3.5	11.1	77.9	5.4	16.7	79.9	4.9	15.2
Higher	90.7	2.4	6.9	77.4	8.0	14.6	84.1	5.2	10.7
Husband's education		***			***			***	
Illiterate	74.4	4.3	21.3	69.6	5.7	24.7	70.4	5.5	24.1
Primary	80.6	3.8	15.6	72.4	5.9	21.7	74.0	5.5	20.5
Secondary	82.0	4.0	14.0	75.6	6.5	17.9	77.3	5.8	16.9
Higher	88.7	4.0	7.3	80.5	8.1	11.4	83.8	6.4	9.8
Women's occupation					*				
Do not work	81.4	4.0	14.6	71.9	6.3	21.7	74.0	5.8	20.2
Work for cash	78.9	4.5	16.6	75.4	5.5	19.1	76.3	5.2	18.5

Table 2: (Continued)

Characteristics	Urban (N=2586)			Rural (N=8854)			All (N=11440)		
	Modern method	Traditional method	Never used	Modern method	Traditional method	Never used	Modern method	Traditional method	Never used
Husband's occupation		***			***			***	
Manual	77.7	4.2	18.1	71.6	6.2	22.2	72.8	5.8	21.4
Non manual	86.2	3.6	10.2	78.2	5.9	15.9	80.9	5.1	13.9
Do not work	73.2	8.5	18.3	56.1	6.1	37.9	60.8	6.3	32.8
Region		***			***			***	
Barisal	88.6	3.8	7.6	73.8	6.0	20.2	75.9	5.7	18.4
Chittagong	71.9	5.3	22.8	62.1	8.3	29.5	64.7	7.5	27.8
Dhaka	83.9	3.3	12.8	76.4	5.9	17.7	78.8	5.1	16.1
Khulna	84.8	4.0	11.2	79.5	5.6	14.9	80.6	5.2	14.2
Rajshahi	83.4	4.3	12.3	80.9	4.5	14.6	81.2	4.5	14.3
Sylhet	64.2	6.4	29.4	35.6	9.3	55.1	39.9	8.9	51.3
Read about FP on newspaper last months		***			**			***	
No	79.5	4.2	16.3	72.4	6.1	21.4	73.9	5.7	20.4
Yes	91.9	2.9	5.1	82.0	5.5	12.5	86.8	4.3	8.9
Heard about FP on TV last months		***			***			***	
No	74.4	5.5	20.1	69.8	6.7	23.5	70.5	6.5	23.0
Yes	85.8	3.0	11.2	80.3	4.5	15.1	82.4	4.0	13.7
Visited by FP worker last 6m		***			***			***	
No	79.6	4.1	16.3	69.6	6.5	23.9	72.0	5.9	22.1
Yes	92.7	3.8	3.4	89.3	4.2	6.6	89.8	4.1	6.1
Wealth index		***			***			***	
Poorest	67.0	5.8	27.2	64.6	6.9	28.5	64.8	6.8	28.4
Poorer	69.0	6.3	24.7	73.2	5.1	21.8	72.7	5.2	22.1
Middle	77.9	4.5	17.5	73.7	6.9	19.5	74.3	6.6	19.2
Richer	80.0	5.1	14.8	78.0	5.3	16.6	78.3	5.3	16.3
Richest	86.3	3.0	10.7	76.7	6.6	16.7	82.3	4.5	13.2

Note: Significant level: ***, ** and * indicate $p<0.001$, $p<0.01$ and $p<0.05$ respectively.
N is the number of women.

Number of living children to a woman has been found to be associated with the use of contraception (Rutenberg et al., 1991; Robey, Rutstein and Morris, 1992). Therefore, number of living children is considered as an important factor for using

contraception. The maximum use of modern and traditional contraceptive methods is observed 94 percent among women who have 3-4 living children in the urban area whereas 87 percent women used modern and traditional contraceptive methods in the rural area. Childless women are less likely to use contraception in both the urban (57 percent) and rural (49 percent) area. Among all women the maximum contraception (modern and traditional methods) use rate (89 percent) is observed who have 3-4 living children and 82 percent for those who have 1-2 and more than 5 living children.

Discussing about family planning with husband is strongly associated with using contraception. Women who more often discuss about FP with their husband use modern and traditional contraceptive methods 98 percent and 91 percent in the urban and rural area respectively. Women who never discuss about FP with their husband are less likely use modern and traditional contraceptive methods both in the urban (82 percent) and rural (75 percent) areas. Fertility preference is highly related with contraception use. Women who do not want more children use (93 percent) modern and traditional contraceptive methods in the urban area and that is 89 percent in the rural area. Among all women who want more children use (71 percent) modern and traditional contraceptive methods, which rise to 76 percent among women who are undecided about desire for children and rises to a high of 90 percent among women who do not want more children.

Table 2 also reveals that the level of ever using modern and traditional contraceptive methods is higher in case of non-Muslim women (89 percent) than that of Muslim women (85 percent) in the urban area. On the other hand among the Muslim and non-Muslim women used contraception (modern and traditional methods) 79 percent and 81 percent respectively in the rural area. Among all women non-Muslim (83 percent) are the more user of contraception than their Muslim counterparts (80 percent). In Muslim culture, people believe that God has control over the human reproductive system or that children are a gift from God. Therefore, they should not prevent a child from coming into the world. Women's education is highly significantly associated with ever use of any contraceptive methods. Table 2 shows that use of modern and traditional contraceptive methods increases with increasing women's educational level. Women with primary, secondary and higher level of education use modern and traditional contraceptive methods 84 percent, 89 percent and 93 percent respectively in the urban area and 81 percent, 83 percent and 85 percent respectively in the rural area. Husband's education is also strongly related with ever use of

contraception. The picture of using contraception in accordance with husband's education is almost same as those of the women's education.

Working status is considered to be an influential factor. In the rural area women's working status has a significant effect on contraceptive use but in the urban area it can not have any significant effect on contraceptive use. Women who do not work for cash are the more users (85 percent) of contraception (modern and traditional methods) than the women (83 percent) who work for cash in the urban area. But in the rural area women who work for cash use (81 percent) modern and traditional contraceptive methods and women who do not work for cash use (78 percent) contraception. Husband's occupation is strongly associated with ever use of any contraception. Urban manual worker are the more user (82 percent) of contraceptive methods (modern and traditional) than that of the rural manual worker (78 percent) and urban non-manual worker are more likely to use (90 percent) modern and traditional contraceptive methods than that of the rural non-manual worker (84 percent). It is also observed that among all women whose husbands are non-manual workers are the more users (86 percent) of modern and traditional contraceptive methods than their counterparts whose husbands are manual workers (79 percent). Ever use of any contraception is significantly associated with the six administrative divisions of Bangladesh. In case of four divisions Dhaka, Rajshahi, Khulna and Chittagong uses of modern and traditional contraceptive methods are closely followed by the urban and rural women. But in Barisal and Sylhet divisions there are large differentials between urban and rural women regarding use of modern and traditional contraceptive methods. Contraceptive use is highest both in Khulna and Rajshahi divisions, while it is lowest in Sylhet division. Women who read about FP on newspaper use modern and traditional contraceptive methods in the urban (95 percent) and rural (88 percent) areas.

Table 2 also shows that there is a positive relationship between hearing about family planning on TV during the last six months preceding the survey and contraception use. It is observed that women, who have heard about FP on TV, use more contraception than who do not hear about FP on TV both in the urban and rural area of Bangladesh. Contraceptive prevalence rate is considerably higher (94 percent) for women who are visited by family planning workers during the last 6 months preceding the survey than those women who have not visited by family planning workers (78 percent) among all women. The same trend is observed among both the urban and rural women of Bangladesh. Wealth index is highly significantly related with

ever use of contraception. The contraceptive prevalence rate is increased as the wealth index goes up among both urban and rural women of Bangladesh.

Current contraceptive use status

The term "current contraceptive use status" refers to the method that was being used by an individual client at the time of survey. Any ever married women, who uses contraceptive method at the time of survey was regarded as a current user of family planning method.

Table 3: Percentage distribution of currently married women who are currently using specific contraceptive methods

Current contraceptive method	Urban (N=2372)	Rural (N=8210)	All (N=10582)
Modern methods			
Pill	26.9	26.0	26.2
IUD	0.5	0.6	0.6
Injections	9.1	9.8	9.7
Condom	8.3	3.0	4.2
Female Sterilization	5.3	5.2	5.2
Male Sterilization	0.5	0.7	0.6
Norplant	1.0	0.7	0.8
Traditional methods			
Periodic Abstinence	6.5	6.5	6.5
Withdrawal	4.1	3.5	3.6
Other	0.7	0.6	0.6
Not using	37.1	43.3	41.9
Total	100.0	100.0	100.0

Note: N is the number of women.

Table 3 summarizes the current level of contraceptive use among women who were currently married at the time of interview. The result shows that the contraceptive prevalence rate is 62.9 percent among currently married women in the urban area. The

corresponding rate is only 56.7 percent in the rural area. The corresponding CPR of all women is 58.1 percent among currently married women out of which 47.4 percent women use modern contraceptive methods and 10.7 percent women use traditional contraceptive methods. Among individual methods, pill accounted the highest use (26.9 percent), followed by the injection (9.1 percent), condom (8.3 percent), periodic abstinence (6.5 percent) and female sterilization (5.3 percent) in the urban area. In contrast, among women in the rural area pill is the most common method (26 percent) followed by the injection (9.8 percent), periodic abstinence (6.5 percent) and female sterilization (5.2 percent). It is clear that condom is less likely to use (only 3 percent) in the rural area than that of in the urban area (8.3 percent). It is an important feature to note that both in the urban and rural area male sterilization are not used as much as female sterilization. This finding deserves special attention by family planning programme managers.

Urban - rural differentials in current contraceptive practice

Table 4 presents urban - rural differentials with regard to current contraceptive practices among currently married women. The table depicts that age is significantly associated with current use of contraception. Both in the urban and rural area currently married women belonging to middle age group (20-34 years) are more likely to use modern contraceptive methods than their younger (<20 years) and older (35-49 years) counterparts. It is also observed that allover in Bangladesh current use of modern and traditional contraceptive methods rises as the age of women rises i.e., 42 percent among women under 20 years of age, which rises to 62 percent among women of 20-34 years of age and finally it rises to a high of 63 percent among currently married women who are in the age group 35-49 years. Here it is clear that current use of contraception varies with age of women.

In the urban area the rate of current use of modern contraceptive methods is found to be higher among women, whose age at marriage is within the group 20-24 years where as in the rural area women whose age at marriage belongs to less the 15 years are more likely to be current users of modern contraceptive methods. For Bangladesh as a whole 49 percent of currently married women whose age at marriage is

25 years and over used modern and traditional contraceptive methods and around 57 percent of women belonging to 20-24 years of marital age used modern and traditional contraceptive methods out of them around 45 percent used modern contraceptive methods. Children ever born are found to be significantly associated with current use of any contraceptive methods.

Table 4: Percentage distribution of currently married women who are currently using contraceptive method according to some background characteristics

Characteristics	Urban (N=2372)			Rural (N=8210)			All (N=10582)		
	Modern method	Traditional method	Never used	Modern method	Traditional method	Never used	Modern method	Traditional method	Never used
Women's age		***			***			***	
<20	40.8	7.0	52.2	33.3	7.5	59.2	34.7	7.5	57.8
20-34	55.6	9.0	35.4	52.4	8.2	39.4	53.1	8.4	38.5
35-49	50.8	17.6	31.5	44.6	16.8	38.6	46.0	17.0	37.0
Age at marriage		-			**			**	
<15	51.7	11.1	37.3	47.4	10.6	41.9	48.2	10.7	41.0
15-19	52.0	10.8	37.2	43.1	10.4	46.5	45.5	10.5	43.9
20-24	52.4	12.4	35.1	40.9	11.5	47.6	45.2	11.8	43.0
25+	39.1	19.6	41.3	28.6	10.7	60.7	33.3	15.7	51.0
Children ever born		***			***			***	
None	20.1	7.1	72.8	15.6	6.4	78.0	16.7	6.6	76.7
1-2	56.1	9.7	34.2	49.3	7.9	42.8	51.0	8.4	40.7
3-4	61.2	11.8	27.0	55.4	11.5	33.0	56.7	11.6	31.7
5+	45.6	17.4	37.0	42.6	15.8	41.5	43.1	16.1	40.8
Discussed about FP with husband		***			***			***	
Never	39.8	10.0	50.2	35.9	9.0	55.1	36.7	9.2	54.1
Once or twice	63.5	12.9	23.6	61.9	12.4	25.6	62.3	12.5	25.1
More often	70.5	12.0	17.5	62.0	17.3	20.6	64.5	15.8	19.6
Fertility Preference		***			***			***	
Wants	42.8	7.8	49.5	34.6	7.5	57.9	36.5	7.5	56.0
Undecided	54.3	4.3	41.3	30.2	4.7	65.1	35.3	4.6	60.1
Doesn't want	56.6	13.5	29.9	52.9	12.6	34.5	53.7	12.8	33.5
Religion		*			***			***	
Non Muslim	54.2	15.4	30.4	51.4	12.8	35.8	52.0	13.3	34.7
Muslim	51.3	10.9	37.8	45.4	10.4	44.2	46.8	10.5	42.7
Women's education		*			*			*	
Illiterate	51.8	10.7	37.6	47.5	10.5	41.9	48.3	10.5	41.2
Primary	48.9	11.1	40.0	45.2	11.5	43.3	46.0	11.4	42.6
Secondary	51.3	11.3	37.4	44.9	9.4	45.6	46.6	9.9	43.4
Higher	58.4	13.6	28.0	42.3	12.5	45.2	50.3	13.0	36.7

Table 4: (Continued)

Characteristics	Urban (N=2372)			Rural (N=8210)			All (N=10582)		
	Modern method	Traditional method	Never used	Modern method	Traditional method	Never used	Modern method	Traditional method	Never used
Husband's education		***			*			***	
Illiterate	53.3	8.1	38.6	47.6	9.9	42.5	48.5	9.6	41.8
Primary	50.3	8.9	40.8	45.5	10.0	44.5	46.5	9.8	43.7
Secondary	49.5	13.7	36.8	44.4	11.7	43.9	45.7	12.2	42.1
Higher	53.8	14.9	31.3	44.9	13.1	42.0	48.6	13.7	37.6
Women's occupation		**			***			***	
Did not work	50.3	10.9	38.9	44.4	10.5	45.1	45.7	10.6	43.7
Work	56.3	12.6	31.1	52.8	11.2	36.1	53.6	11.6	34.8
Husband's occupation		***			***			***	
Manual	49.4	9.4	41.2	45.2	10.1	44.7	45.9	10.0	44.1
Non manual	56.0	13.4	30.5	50.6	12.4	36.9	52.5	12.7	34.8
Did not work	37.3	22.4	40.3	31.5	11.2	57.3	33.3	14.2	52.4
Region		***			***			***	
Barisal	51.5	15.5	33.0	41.3	10.8	47.9	42.8	11.4	45.8
Chittagong	46.9	9.7	43.4	34.1	9.7	56.2	37.5	9.7	52.9
Dhaka	51.5	11.3	37.2	47.1	10.6	42.3	48.5	10.8	40.7
Khulna	51.4	14.2	34.4	50.6	12.6	36.7	50.7	13.0	36.2
Rajshahi	61.7	10.3	28.1	57.3	10.5	32.2	57.8	10.5	31.7
Sylhet	40.4	10.1	49.5	18.7	9.6	71.6	22.1	9.7	68.2
Read about FP on newspaper last months		**			-			*	
No	51.0	10.9	38.1	46.0	10.7	43.3	47.0	10.7	42.2
Yes	56.5	14.5	29.0	48.0	8.5	43.5	52.4	11.6	36.1
Heard about FP on TV last months		***			**			***	
No	47.3	11.4	41.3	44.8	10.9	44.3	45.2	11.0	43.9
Yes	54.9	11.2	33.9	49.2	10.0	40.8	51.3	10.4	38.2
Visited by FPW last 6 months		***			***			***	
No	49.9	11.4	38.7	42.2	10.7	47.1	44.0	10.9	45.1
Yes	67.5	10.5	21.9	65.5	10.0	24.5	65.7	10.1	24.2
Wealth index		**			**			**	
Poorest	49.2	8.8	42.0	44.2	9.0	46.8	44.7	9.0	46.4
Poorer	46.2	8.6	45.2	47.8	10.2	42.0	47.7	10.0	42.3
Middle	47.1	10.7	42.2	46.6	11.3	42.2	46.6	11.2	42.2
Richer	50.6	11.0	38.3	46.6	11.1	42.2	47.4	11.1	41.5
Richest	54.4	12.4	33.2	43.8	12.8	43.4	50.0	12.5	37.5

Note: Significant level: ***, ** and * indicate $p<0.001$, $p<0.01$ and $p<0.05$ respectively and FPW: family planning worker

The maximum use of modern and traditional contraceptive methods is observed 73 percent among urban women who have 3-4 children whereas the corresponding figure is 67 percent among rural women having 3-4 children. Childless women are less likely to use contraception in both the urban (27 percent) and rural (22 percent) area.

Women who discuss about family planning with their husband are obviously more practicing contraception than their counterparts who never discuss with their husband among both urban and rural women. Women who more often discussed about family planning with their husband used modern and traditional contraceptive methods 82.5 percent and 79 percent in the urban and rural area respectively. Women who never discussed about family planning with their husband are less likely use modern and traditional contraceptive methods both in the urban (50 percent) and rural (only 45 percent) area. Fertility preference is highly related with current contraception use, women who did not want more children used (70 percent) modern and traditional contraceptive methods in the urban area and that of 65.5 percent in the rural area. In Bangladesh women who want more children used (44 percent) modern and traditional contraceptive methods, which rises to 40 percent among women who are undecided about desire for children and rises to a high of 66.5 percent among women who did not want more children. Table 4 suggests that current use of contraception varies by women's characteristics. The level of currently using modern and traditional contraceptive methods is higher in case of non-Muslim women (70 percent) than that of Muslim women (62 percent) in the urban area. On the other hand among the Muslim and non-Muslim women used contraception (modern and traditional methods) 56 percent and 64 percent respectively in the rural area. Hence we can conclude that in Bangladesh non-Muslim (65 percent) women are the more user of contraception than the Muslim women (57 percent).

Let us take a look at women's educational level, which is cited as the most important variable associated with contraceptive use in many countries. It has been observed that better educated women are more likely to use contraception (Rutenberg et al., 1991; Robey, Rutstein and Morris, 1992). The situation of Bangladesh reflects this

pattern. Women's education is highly significantly associated with current use of any contraceptive methods. Table 4 also shows that women with primary, secondary and higher level of education used modern and traditional contraceptive methods 60 percent, 63 percent and 72 percent respectively in the urban area and 57 percent, 54 percent and 55 percent respectively in the rural area. Husband's education is also significantly related with current use of contraception. The picture of using contraception in accordance with husband's education is almost same as those of the women's education.

Working status of women has a significant effect on current contraceptive use both in the urban and rural area of Bangladesh. Women who did not work for cash are the fewer users (61 percent) of contraception (modern and traditional methods) than the women (69 percent) who worked for cash in the urban area. Whereas in the rural area women who worked for cash used (64 percent) modern and traditional contraceptive methods and women who did not work for cash used (55 percent) contraception. Husband's occupation is strongly associated with current use of any contraception.

Urban manual worker are the more user (59 percent) of contraceptive methods (modern and traditional) than that of rural counterparts (55 percent) and urban non-manual worker are more likely to use (69 percent) modern and traditional contraceptive methods than that of their rural counterparts (63 percent). It is also observed that in Bangladesh non-manual worker are the more user (65 percent) of modern and traditional contraceptive methods than the manual worker (56 percent).

Current use of any contraception is significantly associated with the six administrative divisions of Bangladesh. In Dhaka, Rajshahi and Khulna division use of modern and traditional contraceptive methods is closely followed by the urban and rural women. But in Barisal, Chittagong and Sylhet divisions there are large differentials among urban and rural women regarding use of contraceptive methods. Contraceptive use is highest in Rajshahi (68percent) division, while it is lowest in Sylhet (32percent) division among all women. Women who read about family planning on newspaper used modern and traditional contraceptive methods in the urban (71 percent) and rural (56.5

percent) area. It is observed that women, who heard about family planning on TV during the last six months preceding the survey, use (62 percent) more contraception (modern and traditional methods) than who did not hear (56 percent) in Bangladesh. This is also true for the urban and rural area of Bangladesh. Table 4 also explains that visited by family planning worker during the last 6 months preceding the survey is strongly associated with current use of any contraceptive method. In Bangladesh the contraceptive prevalence rate is considerably higher (76 percent) for women who have contacted with family planning workers during the last 6 months preceding the survey than those women who have not contacted with family planning workers (55 percent). The same trend is observed in both the urban and rural area of Bangladesh. Use of modern and traditional contraceptive methods is increased as the wealth index increases from the poorest to the richest among all women. There is no difference of using modern contraceptive methods among urban and rural middle class women but a notable discrimination is observed in the highest and lowest level among the urban and rural women.

Reasons for not using contraceptive methods

There is considerable number of women who were not using contraception during the period of survey. Different reasons are identified for not using the contraceptive methods. Reasons for not using contraception are ascertained by asking the questions as "which is the main cause that you do not use any contraceptive methods?"

Table 5 presents data on the main reasons for not using contraception. In the urban area infecundity appears to be the primary reason for nonuse of contraception among those nonusers not intending to use contraception in the future; 55 percent of urban nonusers say they do not intend to use because of infecundity (either "being menopausal", "having had hysterectomy" or "being sub fecund"). Infrequent sex is the next most commonly cited reason for nonuse (9.1 percent), followed by fatalistic attitudes (believing that having children depends on God's will) (8.6 percent), and 'not having sex' (6 percent).

Table 5: Percentage distribution of currently married women who are not using contraceptive method and who do not intend to use in the future, by main reason for not using contraceptive method

Main reason for not using FP method	Urban	Rural	All
Not having sex	6.0	4.6	4.9
Infrequent sex	9.1	7.1	7.5
Menopausal/ hysterectomy	48.0	42.6	43.6
Subfecund/ infecund	7.0	5.0	5.4
Postpartum amenorrhea	0.5	0.7	0.7
Fatalistic	8.6	16.5	15.0
Respondent opposed	1.9	2.0	2.0
Husband opposed	1.9	4.0	3.6
Others opposed	0.0	0.1	0.1
Religious prohibition	1.8	4.5	4.0
Knows no source	0.5	0.2	0.3
Health concerns	1.0	1.7	1.6
Fear side effects	4.3	3.7	3.8
Cost too much	0.0	0.1	0.1
Inconvenient to use	0.0	0.1	0.1
Interfere with body	3.3	0.9	1.3
Other	4.9	5.7	5.5
Do not know	1.2	0.4	0.5
Total	100.0	100.0	100.0

Table 5 also reveals that in the rural area the major reasons for not intending to use contraception are menopausal or hysterectomy (42.6 percent), fatalistic (16.5 percent), infrequent sex (7.0 percent), not having sex (4.6 percent) and religious prohibition (4.5 percent).

Intention to use contraception in future

Intention to use contraception" is considered as an important factor for understanding the utility of the contraceptive method. From the previous study we observe that many currently married women in the urban area (37.1 percent) and in the rural area (43.3 percent) are not using any contraceptive methods. So it is very necessary to investigate whether they would like to use contraception in the future or not.

Table 6: Percentage distribution of women who intend to use contraception in future

Intention to use	Urban (N=1079)	Rural (N=4157)	All (N=5235)
Use later	60.7	62.4	62.1
Unsure about use	1.5	1.5	1.5
Does not intend	37.8	36.1	36.4
Total	100.0	100.0	100.0

Note: N is the number of women.

Table 6 reveals that 60.7 percent urban women and 62.4 percent rural women intend to use contraception in the future. It reveals from the study that more than one-third of the women do not intend to use contraception in future both in the urban and rural area. The same situation is found for all women in Bangladesh.

Preference of using future contraceptive methods

Preference of future contraceptive method depends on the adjustment of these methods with their physiological condition. To investigate the preference of different methods women were asked "which methods will you in the future for contraception?"

Table 7 depicts that in the urban area most of the women (45.1 percent) have preferred to use pill as their future contraceptive method. The next preferred method of contraception is injection (15.1 percent) followed by condom (4.9 percent) and female sterilization (3.2 percent). 27.7 percent women do not know which method they will choose in the future.

Table 7: Percentage distribution of women according to their preference of using specific contraceptive methods in future

Preferred future method	Urban	Rural	All
Pill	45.1	45.2	45.2
IUD	1.1	0.3	0.5
Injections	15.1	19.2	18.4
Condom	4.9	1.7	2.3
Female Sterilization	3.2	1.6	1.9
Periodic Abstinence	0.8	1.5	1.4
Withdrawal	0.7	0.6	0.6
Other	0.1	0.3	0.2
Norplant	1.2	1.0	1.1
Don't know	27.7	28.6	28.4
Total	100.0	100.0	100.0

It may happen that choose of a method depends on their husband or they did not adjust with any contraceptive methods yet. On the other hand in case of rural area most of the women (45.2 percent) reported that they will choose pill for contraception in future. The next preferred method is injection (19.2 percent) followed by condom (1.7 percent), female sterilization (1.6 percent) and periodic abstinence (1.5 percent). The same trend is observed for all women in the whole country.

Determinants of current contraceptive practice

The determinants of contraceptive use are important in any effort to reduce fertility within a country. This fitted model considers current use of contraception as dependent variable and it is coded as 1 if the women currently practice contraception, otherwise it is 0. Table 8 presents the model for the determinants of current contraceptive practice among currently married women. In the urban and rural area eight and nine variables respectively were found to influence the practice of contraceptives significantly after keeping the other explanatory variables constant.

Table 8 shows that except women's education all the variables entered into the logistic regression model are found to be significant determinants of current contraception use for all women. The logistic regression analysis also shows that children ever born, discussion about family planning with husband, husband's occupation, visits of family planning workers in the last six months preceding the survey, and mass media exposure appear to be the most significant predictors of current contraception use among both urban and rural women. Moreover age, religion, permission to go to hospital/health center and region also affect the contraceptive use of rural women, whereas, education and occupation of women influence the contraceptive use of urban women. Table 8 reveals that in the rural area contraception use is increased as the age of women rises. Women aged 20-34 years and 35-49 years are 1.321 times and 1.567 times respectively more likely to use contraceptives than their counterparts below 20 years. Women who work for cash are using contraception 1.431 and 1.068 times more than those women who do not work for cash in the urban and rural area respectively. Women, whose husbands are non-manual workers, are 1.309 times and 1.412 times more using contraception than their counterparts in the reference category in the urban and rural area respectively. Muslim women are 0.713 times and 0.577 times less likely to use contraceptives than their non-Muslim counterparts in the urban and rural area respectively. This may due to, in part, superstitution (having children is obeying God's will) exhibited among the Muslim than non-Muslim. In the urban area, the odds ratio (2.026) reveals that with the visit of family planning workers to the household, contraceptive use increases rapidly. In view of likelihood it is obvious that,

the visit of family planning workers can motivate the spouse to use contraceptives by counseling the family planning services and supplies to achieve their widespread availability. Almost the same result is observed for the rural area (odds ratio is 2.023) of Bangladesh. In the urban area women who have discussed about family planning with their husband once or twice are 3.692 times more using contraceptives than those who have never discussed. Women who have discussed more often with their husband are 5.573 times more likely to use contraception than those who have never discussed. The same dimension of contraceptive use is observed among rural women of Bangladesh.

In the urban area women having 1-2 children are 5.655 times more likely to use contraception than women without children. Highest use of contraception is found in case of those women who have 3-4 children (odds ratio 9.678). Women possessing more than 5 children are 7.162 times more using contraception than women without children. On the other hand rural women having 1-2, 3-4, and more than 5 children are 4.065, 6.77., and 5.560 times respectively more likely to use contraception than their counterparts in the reference category. Mass media plays a significant role for raising consciousness about contraceptive use among the people throughout the country. In the urban area women exposed to mass media are 1.629 times more using contraceptives as compared with those who do not access to mass media. The same trend is observed among women in the rural area. This may be due to the fact that mass media campaign influence women to use contraception both in the urban and rural area of Bangladesh. Rural women, who are permitted to go to hospital/health center alone, are 1.526 times more likely to use contraception than their counterparts in the reference category. Highest use of contraception is found among rural women of Rajshahi division (odds ratio 1.957). Rural women in Sylhet division are 69 percent less likely to use contraception than their counterparts in the reference category.

Table 8: Results of logistic regression for current contraceptive use among currently married women

Characteristics	Urban		Rural		All	
	Coefficient of β	Odds Ratio	Coefficient of β	Odds Ratio	Coefficient of β	Odds Ratio
Women's age						
<20 (Ref)	-	1.000	-	1.000	-	1.000
20-34	-0.042	0.959	0.279	1.321**	0.215	1.239**
35-49	0.236	1.266	0.449	1.567***	0.424	1.529***
Women's education						
Illiterate (Ref)	-	1.000	-	1.000	-	1.000
Primary	-0.121	0.886	-0.056	0.946	-0.065	0.937
Secondary	-0.006	0.994	-0.040	0.961	-0.019	0.981
Higher	0.421	1.524*	-0.184	0.832	0.136	1.146
Women's occupation						
Do not work (Ref)	-	1.000	-	1.000	-	1.000
Work for cash	0.358	1.431**	0.065	1.068	0.135	1.144*
Husband's occupation						
Manual (Ref)	-	1.000	-	1.000	-	1.000
Non manual	0.269	1.309*	0.345	1.412***	0.331	1.392***
Did not work	0.154	1.167	-0.291	0.748	-0.160	0.852
Religion						
Non muslim (Ref)	-	1.000	-	1.000	-	1.000
Muslim	-0.338	0.713	-0.549	0.577***	-0.497	0.608***
Visited by FPW during last 6 months						
No (Ref)	-	1.000	-	1.000	-	1.000
Yes	0.706	2.026***	0.705	2.023***	0.689	1.992***
Discussed about FP with husband						
Never (Ref)	-	1.000	-	1.000	-	1.000
Once or twice	1.306	3.692***	1.367	3.923***	1.346	3.843***
More often	1.718	5.573***	1.820	6.173***	1.789	5.983***
Children ever born						
None (Ref)	-	1.000	-	1.000	-	1.000
1-2	1.733	5.655***	1.402	4.065***	1.483	4.407***
3-4	2.270	9.678***	1.913	6.770***	2.001	7.395***
5+	1.969	7.162***	1.716	5.560***	1.777	5.909***

Table 8: (Continued)

Characteristics	Urban		Rural		All	
	Coefficient of β	Odds Ratio	Coefficient of β	Odds Ratio	Coefficient of β	Odds Ratio
Mass media exposure						
No (Ref)	-	1.000	-	1.000	-	1.000
Yes	0.488	1.629**	0.178	1.195**	0.239	1.270***
Permitted to go to hospital or health center						
No (Ref)	-	1.000	-	1.000	-	1.000
With someone	0.049	1.050	0.122	1.130	0.118	1.125
Alone	0.026	1.026	0.423	1.526***	0.339	1.404***
Region						
Barisal (Ref)	-	1.000	-	1.000	-	1.000
Chittagong	-0.427	0.652	-0.378	0.686**	-0.342	0.710**
Dhaka	-0.270	0.764	0.284	1.328**	0.190	1.209*
Khulna	-0.130	0.878	0.346	1.413**	0.272	1.313*
Rajshahi	0.283	1.327	0.671	1.957***	0.597	1.817***
Sylhet	-0.751	0.472*	-1.169	0.311***	-1.068	0.344***
Constant	-2.001	0.135***	-2.129	0.119***	-2.160	0.115***

Note: Ref = Reference Category; ***, ** and * indicate $p<0.001$, $p<0.01$ and $p<0.05$ respectively.

Discussions and recommendations

The study reveals that all the urban and rural women know about contraceptive methods. However, the contraceptive prevalence rate is 62.9 percent among currently married women in the urban area. The corresponding rate for rural women is 56.7 percent. The study estimates that all the currently married women know about at least one modern contraceptive method, but knowledge about traditional methods is lower (81 percent) as compared with modern methods. All ever-married women know of at least one modern method of family planning, and eight out of every ten women know of at least one traditional method. There is virtually no difference in knowledge between ever-married and currently married women. From this finding it is clear that there is

a wide gap between knowledge and use of contraception. We also observe from this study that, 60.7 percent urban women and 62.4 percent rural women intend to use contraception in the future and about 45 percent women prefer pill as their future contraceptive method both in the urban and rural area. The study shows that urban women are more using modern contraceptive methods than their rural counterparts. Currently married women in the higher age group are more likely to use contraceptive methods than their younger counterparts both in the urban and rural area. Women who discuss about family planning with their husband are obviously more practicing contraception than their counterparts who never discuss with their husband among both urban and rural women. In Dhaka, Rajshahi and Khulna division use of modern and traditional contraceptive methods is closely followed by the urban and rural women. But in Barisal, Chittagong and Sylhet divisions there are large differentials among urban and rural women regarding use of contraceptive methods. Our study reveals that with the visit of family planning workers to the household, contraceptive use increases rapidly both in the urban and rural area of Bangladesh. Use of modern and traditional contraceptive methods is increased as the wealth index increases from the poorest to the richest among all women. There is no difference of using modern contraceptive methods among urban and rural middle class women but a notable discrimination is observed in the highest and lowest level among the urban and rural women.

The logistic regression analysis for current use of contraception shows that children ever born, discussion about family planning with husband, husband's occupation, visits of family planning workers in the last six months preceding the survey, and mass media exposure appear to be the most significant predictors of current contraception use among both urban and rural women. Moreover age, religion, permission to go to hospital/health center and region also significantly affect the contraceptive use of rural women, whereas, education and occupation of women influence the contraceptive use of urban women.

In the light of the above discussions there are clear policy and programmatic implications. Any further acceleration in contraceptive prevalence and fertility decline will require major efforts directed at improving women's status, increasing access to the

media and improving programme efforts in the low performing divisions especially in rural areas. Priority should be given by the government of Bangladesh to development in the social sector, including enhancement of women's status, especially through increased female educational and employment opportunities, an improvement access to media. Such investments, in addition to their direct benefits, would further accelerate the process of rising use of contraception and further the process of fertility decline in the country.

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