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Factors Affecting Discontinuation of Injectable Methods in Bangladesh

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Introduction

Despite an early and strong commitment by the government to the family planning programme, Bangladesh has achieved modest success in increasing the level of contraceptive prevalence. For instance, the use of contraception has increased from 12.7 percent in 1979 to over 25 percent in 1985 [1]. Besides government efforts, non-governmental organisations (NGOs) are also fairly active all over Bangladesh. According to surveys conducted at various times, the acceptance of the injectable method was not common and barely less than one percent were using this method at the time of the 1985 contraceptive Prevalence Survey(CPS) [1].

The injectable method was first introduced in Bangladesh in 1975. Since then, the use of injectables has varied from one survey to another; the 1985 CPS showing barely one percent use among currently married women. Acceptors of injectables in the government programme account for approximately 3 percent of all users of contraceptives. The Third Five-Year Plan projected an increase of the use of injectable contraceptives from 2.3 percent in 1985-86 to 2.5 percent in 1989-90.

The availability and accessibility of services are also important determinants of contraceptive practice, particularly in terms of method choice. Survey results also demonstrate that readily available family planning supplies and services increases their use. Women who can obtain the service at their doorstep are more likely to use family planning.

Although some information is available about the characteristics of acceptors and the incidence of side effects of the injectable method, very little is known about the method in Bangladesh. Since it is simple to use, many women in developing countries prefer injectables to others methods of contraception. A single injection protects the woman for a relatively long period and its administration bears no relation to the timing of coitus. One of the important advantages of injectables is that its use can be kept a secret; the need for secrecy has been most commonly

cited as the reason for choosing injectables by women in many developing countries [2].

The side effects associated with injectables are predominately bleeding, amenorrhoea, irregular menses and such factors as nausea, headache and weight gain. Although studies of the effectiveness of injectables suggest that minor menstrual side effects are common, these problems pose no threat to health and can be managed effectively by follow-up services and medical back up. Communication between husband and wife regarding contraception is certainly a favourable, if not necessary condition for the adoption of any method. A discussion of methods often involves sexual matters. In many cultures sexual modesty or shyness inhibits a husband and wife from talking about sex at all [3].

A man or woman may want to limit his or her family size or space the birth of children, but may not practice any contraception because doing so violates his or her religious beliefs. The husband and wife may differ in their attitude towards the use of contraception. The relative lack of reference to the wife's opposition when the husband wishes to use contraception suggests that it is a less common reason than the husband's opposition to use a method the wife so desires. The reasons for the husband's opposition vary depending upon the socio-cultural definition of the roles of men and women [2].

Even when the husband and wife both want to use contraception or when the opposition of one of the spouses does not affect the motivation of the other, the couple may not be able to adopt any method because of opposition from others who wield influence on or control over the couple's reproductive behaviour.

Objectives

The lack of knowledge about the efficiency of injectables in family planning and the characteristics of injectable users, and the reasons for discontinuation are important constraints in the formulation of contraceptive strategies. The purpose of this paper is to investigate the characteristics of users of injectables and to identify the factors that lead to the discontinuation of the method.

Data Source and Methodology

The study sample was drawn from both government and non-governmental clinics. A total of 30 clinics i.e. twenty government clinics/centres and ten non-governmental clinics, was selected. While the highest performing 10 programme centres from among the non-governmental organisations were selected, the governmental clinics were selected as fo1lows. All government clinics in all the upazilas which reported their performance to the Management Information

System (MIS) Cell of the Ministry were considered. A list of the upazilas on the basis of their January - June 1986 performance was prepared in ascending order, and the upazilas were categorized into low and high performance upazilas. Upazilas achieving less than 100 percent of their target were defined as low performance upazilas, and those achieving over 100 percent of their target were defined as high performance upazilas. Upazilas, achieving less than 50 dosages of injectables among the low performance upazilas were excluded from the study sample.

For the purpose of sampling, a recorded acceptor of injectables was defined as an eligible couple who, according to clinic records, had accepted injectable contraception from any of the selected service outlets during the reference period, January - June, 1986. The samples drawn from government and non-government areas were in the ratio of 2:1. In order to a reach target sample of 1000, the sample size of clients was considered as 1270 (850 in the government areas and 420 in the non-government areas).

Only 868 clients were successfully interviewed (592 in the government areas and 276 in the non-government areas). The overall non-response rate was about 32 percent. Table 1 shows that in both the government and the non-government areas, the most common reason for non-response was the absence of the respondent at the given address.

Table 1: Reasons for non-response by area (%)

Reasons	**Government (N = 258)**	**NGO (N = 144)**	**Total (N = 868)**
Partial interview and false*	4.7	--	3.0
Refused	5.4	1.4	4.0
Absent	21.3	28.5	23.9
Change of address	5.8	29.1	14.2
Full address and not found**	36.4	29.2	33.8
Incomplete address and not found***	26.4	11.8	21.1

* The respondent was interviewed on the basis of the clinic records, but on verification, it was found that she was not an injectable client.

** The respondent could not be located inspite of obtaining the complete address from the clinic.

*** The clinic records were incomplete. As a result, the respondent could not be located.

The second most common reason for non-response in the government area was incomplete address (26.4 percent) while in the non-government area, the reasons related to change of address (29.1 percent) and failure to locate the client inspite of obtaining her complete address from the clinic (29.2 percent). This large non-response may have implications on the findings of the study.

Results

Characteristics of the respondents

The socio-economic characteristics of the respondents such as their education, religion, land ownership and occupational status are of particular interest in understanding their family planning behaviour.

Table 2 shows that over two thirds of the respondents were in the age group of 25-34 years; and only 14 percent were under 25. The mean age of the acceptors from non-government (29.3 years) and government areas (30.4) did not differ significantly.

Table 2: Socio-demographic characteristics of respondents

Characteristics	**Government (N = 592)**	**NGO (N = 276)**	**Total (N = 868)**
Age	11.5	18.5	13.7
< 25	70.4	62.7	68.0
25 - 34	18.1	18.8	18.3
35 +	30.4	29.3	29.9
Mean age (in years)			
Wife's education	62.8	51.8	59.3
No schooling	23.5	27.2	24.7
1-5 years	5.9	9.4	7.0
6-8 years	6.3	8.3	6.9
9-10 years	1.5	3.3	2.1
11 + years			
Husband's education	34.1	32.3	33.5
No schooling	19.6	14.5	18.0
1-5 years	14.2	12.0	13.5
6-8 years	21.8	23.2	22.2
9-10 years	7.3	9.0	7.8

11-12 years	3.0	9.0	5.0
13 + years			
Occupation of clients	94.3	88.4	92.4
Household work	0.2	--	0.1
Agricultural work	4.2	4.0	4.2
Services	--	0.3	0.1
Skilled labour	1.3	7.3	3.2
Others			
Occupation of the husband	24.7	1.11	7.2
Agriculture	13.9	0.7	9.7
Agricultural labour	7.2	4.0	6.2
Skilled labour	3.0	6.5	4.1
Business	26.4	33.0	28.5
Services	24.8	54.7	34.3
Others			
Number of children ever born	0.5	--	0.3
0	4.2	11.6	6.6
1	14.7	19.5	16.2
2	19.4	23.2	20.6
3	21.6	19.2	20.9
4	16.8	10.9	14.9
5	22.8	15.6	20.5
6+	4.1	3.3	3.9
Mean			
Number of living children	0.7	0.4	0.6
0	4.9	12.7	7.4
1	17.6	26.8	20.5
2	23.1	22.5	22.8
3	23.3	18.8	21.9
4	15.9	10.1	14.1
5	14.5	8.7	12.7
6+	3.7	3.1	3.5
Mean			
Number of additional children	54.0	71.7	61.8
1	43.6	27.3	36.4
2	2.4	1.0	1.8
3+	1.5	1.3	1.4
Mean	126	99	225
N			
Total desired family size	5.2	4.4	4.9

More than 59 percent of the respondents were illiterate (Table 1). About 25 percent had received primary level education and a little over two percent had higher secondary or higher education. Further, a higher proportion of respondents from non-government areas were literate (45 percent) as compared to those from government areas (37 percent)-it may be noted here that the former were from urban areas while the latter (government areas) were from rural areas. As compared to the respondents, about a third of their husbands were illiterate, with a little difference between non-government (32.3 percent) and government (34.1) areas. Again, the percentage of husbands who had received primary (or more) education was higher in the non-governmental areas as compared to government areas.

The economic status of a person is generally determined by his/her occupation involvement. About 7.8 percent of the respondents were involved in various income-earning activities (Table 2). Respondents from government areas were less economically active than those from non-government areas. Among working women, 4.2 percent were in service. It may be argued that when motherhood is highly valued in relation to employment, women may be discriminated against in the labour market and the status of working women will be low. This situation would encourage women to have large families. On the other hand, if work brings status and economic independence to women, they may avoid having large families [4]. Among the husbands, 29 percent were involved in business or trading activities; services being the second most common occupation (23.1 percent). In general, the husbands of acceptors of the injectable method were found to belong to the lower income strata.

Table 2 also shows that only 7 percent of the respondents had one child at the time of survey. The average number of children ever born was high with about four children per respondent, suggesting little impact of contraception. Similarly, the average number of children per respondent was 3.5; with lower averages of ever born and living children in non-government areas as compared to government areas. This difference could be the result of not only the definitional attribute of the sub-groups but also the compositional variation of other characteristics among the groups.

One obvious reason why the majority of couples in less developed countries do not use any contraception is that they want more children than they have. Family size norms may have a programmatic value to the extent that the decision to adopt contraception is influenced partly by individual family size norms. A married couple may not adopt contraception until they have reached their desired family size, and if they do, it is very likely that they will adopt a temporary method for the purpose of spacing rather than terminating their reproduction. The present data suggest that only 26 percent of the respondents

wanted additional children. The average number of additional children desired was 1.4, and the total desired family size was almost 5 children.

Contraceptive Use Status Prior to Method Acceptance and Reasons for Changing Over to Injectables

A little over 44 percent of the respondents reported to have used a family planning method prior to the acceptance of injectables. Among the contraceptors, pill users constituted as much as 79.5 percent; condom and IUD users, 9.6 and 9.1 percent respectively, while the rest (1.8 percent) used other conventional methods.

There was a pronounced area-wise variation in the case of the pill and IUD. In the rural areas (government), the percentage of IUD and condom users was higher as compared to that in urban areas (about 11 percent as compared to 6 percent, for both methods), while the percentage of pill users in the urban, NGO areas was higher (83.3 percent) than that in the rural areas (77.2 percent). The condom was more or less equally used prior to the changeover to injectables with 9.9 percent users in rural (government) and 9.0 in urban (NGO) areas; other methods had been used by 2.1 and 1.4 percent of the respondents in the two areas respectively.

The most common reason for switching, over from the pill to injectables was that it was easy to use (54.9 percent); nausea and giddiness were mentioned by 34.0 percent of the pill users (Table 3).

Table 3: Percentage distribution of respondents by reasons for switching over to injectables

Reason(s) for Switching over method	**Pill (N = 306)**	**Condom (N = 37)**	**IUD (N = 35)**
Amenorrhoea	1.3	--	--
Spotting	3.3	--	21.4
Pain in abdomen	0.9	--	37.1
Nausea giddiness	34.0	--	--
General weakness	12.4	--	--
Burning headache	10.8	27.0	28.6
Simple to use	54.9	70.3	14.3

The total may not add up to 100 percent because of multiple responses.

It is difficult to assess the degree of bias in the reporting of side effects. Women who use the pill are likely to be more concerned about their health and hence are more prone to report general health problems than non-users. IUD users who had switched over to injectables had done so largely because of pain in the abdomen (37.1 percent), spotting (21.4 percent), burning sensation and headache (29 percent). Many studies have indicated that women experience increased bleeding and pain in the pelvic area immediately following the insertion of IUDs. Although these side effects subside in most users within a month or two, increased menstrual flow often twice the usual level has been found to be a regular feature among IUD user [6].

About half (49.3 percent) of the respondents had chosen injectables because it had fewer side effects. About 40.6 percent mentioned that injectable methods provide 90 days of complete protection from unwanted pregnancy; and 8.8 percent stated that they preferred injectables because other methods are associated with side effects. Among other reasons for preference of injectables were that it could be taken 'secretly' (stated by 1.1 percent) and because the doctor had suggested it (0.2 percent).

Use Status at the Time of Interview

At the time of interview only 61.3 percent of the respondents were using injectables and about 24 percent were using other methods of contraception such as the pill, condom and IUD. Nearly 15 percent were not using any method of contraception.

Reasons for Discontinuation

With a few exceptions, the most common reason for discontinuing the use of injectable contraceptives was disturbance of menstrual bleeding (Table 4).

Table 4: Percentage distribution of drop-outs by reasons for discontinuation

Reason for discontinuation	**Percent (N = 336)**
Amenorrhoea	20.2
Spotting	38.7
Burning sensation, headache and abdominal pain	13.7
Nausea, giddiness, weakness	22.9
Switched to other method	3.3
Lack of supply	14.9

Planned pregnancy	5.1
Other	7.2

The percentage may not add to 100 percent because of multiple responses.

The discontinuation of a method because of its disruptive effect on the menstrual cycle is, in some cases, related to the perceived consequences on the health of the user. But, more importantly, in many societies, this disruption of the menstrual cycle is a matter of concern because social belief systems surrounding menstruation impose various behavioral restrictions on menstruating women [2]. These include prohibition of sexual intercourse, praying and visiting religious places. The non-use of contraceptives which prolong menstruation is expected to be higher among cultural groups which traditionally impose greater behavioural restrictions on menstruating women.

The absence of menstruation (amenorrhoea) may give rise to the fear of loss of fertility or ageing in some women, while in others, it may produce anxiety of an unwanted pregnancy. On the other hand, increased bleeding is also seen as harmful and weakening, a fear that has some basis where anaemia is a common problem among, women of childbearing ages [1].

Although the physical, psychological and social concomitants of menstrual bleeding are generally seen in a negative light, many women do not want either more or less bleeding than usual. There are widespread perceptions and beliefs about potential health hazards based on ethnic concepts of anatomy and physiology. These perceptions and beliefs may be scientifically invalid but they often constitute important reasons for non-use of contraceptives.

Other side effects, though not uncommon were not usually given as reasons for discontinuing injectable contraception, and also were not necessarily regarded as a disadvantage. For example, weight gain. Some of the other reasons which were frequently quoted for discontinuing injectables are self-explanatory and are commonly given as reasons for discontinuing other methods of contraception as well. These included the desire for a further pregnancy, a change over to another method or 'no further need for contraception'.

Proper counselling and poor follow up services are also important for the continuation of a method. The survey revealed that 78 percent of the respondents had talked to the family planning worker about the possible side effects of the injectable method, prior to its acceptance. This suggests that most of the respondents were well-informed about the side effects associated with injectables.

Another important cause of discontinuation was interruption in the supply of injectables. Shortages in supplies resulting from logistic and management difficulties is compounded by the shortage of trained staff in rural areas. A further difficulty encountered in some areas particularly when the distribution of injectables is restricted to trained health workers in particular centres, is the failure of women to attend the centre at the right time for repeat injections. Sometimes, this is due to their inability to keep track of dates correctly, but it may also be due to unavoidable external factors.

Discussion and Conclusion

Users of injectable contraception are generally poor and illiterate; a characteristic, which many of these women share, is that they are among the most disadvantaged groups. They are most poorly served by health and social services.

In this study, most of the respondents had been motivated to opt for injectable contraception by their neighbours, friends or relatives who were already using it. Injectables were chosen in preference to other methods of contraception either because of specific advantages or because other methods were found to be unsatisfactory in some way. Injectable methods provide a highly acceptable alternative to these methods and are highly effective in preventing pregnancy. However, they were found to cause significant menstrual disturbances in the majority of users, and this was the most common reason given by the respondents for discontinuing injectables. Regular and normal menstruation is widely regarded as a sign of continuing health and fertility. Although the disturbances associated with injectables rarely pose any threat to health, they are likely to give rise to anxiety. Irregular or prolonged bleeding causes problems for women in societies in which the activities of menstruating women are culturally restricted, such as among Muslims and Hindus. The quality of counselling and follow up services would therefore be major factors in determining the duration of use of the method. Another important factor in the discontinuation of injectable contraception is the difficulty of getting re-supplies. This may result from logistic and management problems. Other reasons frequently quoted by drop-outs such as a desire for a further pregnancy, change over to another method, or no further need for contraception, were common to those given by drop-outs of other methods as well.

In conclusion, it can be said that injectables are particularly popular among some of the most disadvantaged women. There are two major problems associated with the use of injectable methods. First, menstrual disturbances are both frequent and significant, and are the dominant reason for women giving up the method. However, the effects of these disturbances can be minimised through

better counselling. Secondly, interruptions in re-supply of injectables commonly occur and also result in discontinuation. For those who wish to continue with the method, re-supplies must be ensured through their availability in clinics, and if necessary, through the training of field workers.

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