

DIFFERENTIALS IN MEN'S PARTICIPATION IN FAMILY PLANNING IN TANZANIA: A CASE STUDY OF MBEYA REGION

By

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Abstract

This paper investigates factors influencing men's participation in family planning in Mbeya Region, Tanzania. Mbeya was selected for this study because it is one of the regions with high fertility and low contraceptive use in the country. Using field data collected from 568 married men aged between 15 and 59 years, the paper shows that men's knowledge of contraceptives in Mbeya region was highest for male condoms and lowest for the diaphragm. The study also found that men's past use of modern contraceptives is significantly influenced by age, education, number of living children, and desired number of additional children. This significance of the association was confirmed by the application of logistic linear regression analysis.

1.0 Introduction

Tropical African countries are currently experiencing the highest fertility rates and the fastest population growth rates in the world (Ntozi, 1993). For example, according to the Tanzanian Demographic and Health Survey (TDHS, 1996) conducted in 1996, the fertility rate in the country is reported to be about 7 children per woman. The population growth rate has been estimated at about 2.8 percent per annum based on the 2002 population census (URT, 2002). The rural area registers the highest average fertility of over 6.6 children per woman while the figure for the urban women stands at about 5.5. When Tanzania is divided into zones, the Western Zone stands out above the rest at the average of 7.3 children per woman aged 40-49 years while the Lake Zone stands with the average fertility of 7.2 children per woman, followed by the Southern Highlands Zone with an average of 6.6 children. These figures are definitely among the highest in Tropical Africa.

This paper investigates the role of men in Mbeya Region in determining family size. Specifically the study aims at investigating men's use of contraceptives in relation to large family sizes as well as investigating differentials of men's past and current use of contraceptives. One of the main reasons for undertaking this study is that there has been little effort to promote the understanding of family and family planning so that appropriate policies, interventions and strategies could be made or undertaken in order to improve the quality of life of citizens and communities in Tanzania and elsewhere in the world. It is hoped that the results of this study will assist the National Family Planning Program in designing programs that will help in raising the level of contraceptive use and, therefore, reduce the fertility in Tanzania. Secondly, the results will also add more information towards a better understanding of the factors that affect fertility in Africa south of the Sahara.

In order to understand the underlying causes and the proximate determinants of high fertility rates, demographers have recently conducted studies in various parts of sub-Saharan African countries. Most of these studies have focussed their attention on women's knowledge, attitudes and practice (KAP) and behaviour in matters related to reproduction. Despite the fact that both men and women are actually biological partners in the reproductive process, most emphasis has been placed on the role of

women. Various reasons have been given to justify this, one of them being that women bear the physical as well as emotional strains of pregnancy and child-bearing. It is argued that women in tropical Africa do most of the work of raising the children (Ntozi, 1993; Isiugo-Abanike, 1994).

Recently, researchers have recognized the need to study men in relation to fertility in Africa. Because fertility decision-making in Sub-Saharan Africa is dominated by men, it is important to investigate men's involvement in family planning in order to better understand the fertility situation in the region. There are other reasons why it is important to study men's involvement in family planning. The first reason is that socio-cultural traditions in most parts of Sub-Saharan Africa support the dominant role of men in the society in most spheres of life (Green, 1990 and Hawkins, 1992). Secondly, as a process, human reproduction involves two sexes, namely a male and a female. In order to achieve family planning effectively, therefore, it is very unlikely that one sex can fulfil the requirements of reproduction itself without the other. Involving men in the process of reproduction makes them responsible in the effects of reproductive behaviour to their wives, partners and children. In this way, men will be able to foresee the consequences of their sexual activities. The third reason why men's behavior in family planning should be examined is that, in some tropical African countries, men generally play a significant role in decision-making process as husbands, religious or political leaders (Caldwell, 1982). They can therefore be instrumental in promoting or inhibiting contraceptive use. The fourth and last reason is a result of the existence of sexually transmitted diseases (STDs) and the emergence of the HIV virus and the AIDS pandemic. This situation has brought about an even more urgent need to explore men's involvement in some contraceptive methods such as the condom, which reduces the chances of getting the AIDS virus.

In her paper, Boserup (1985) states that men's motivation for family planning is weak due to the fact that women do most of the child rearing in Sub-Saharan Africa. Furthermore, Omondi-Odhiambo (1989) attributed the failure of the Kenyan aggressiveness of the anti-natality policy in the last two decades to the absence of male's involvement and neglect of men in IEC efforts in the Kenyan society. He claimed that the lack of data on social, cultural and economic reasons of men's fertility related behavior is responsible for this situation. Campbell (1985) showed that a Liberian husband's desire for large numbers of children had a dominating influence on fertility decisions. It is also the intention of this study to investigate the situation that prevails in the Tanzanian society.

Similar studies have been done elsewhere in Sub-Saharan Africa. For example, Adamchak and Adebayo (1987), in their survey of Nigerian students, found that the majority of men disapprove the idea of women using contraceptives without prior consent of their husbands. In the study conducted in Uganda (Ntozi, 1993), it is reported that marriage patterns, value of children, cultures and effective use of contraceptives, were behind the high fertility levels of women in Ankole, factors which are man-related.

In many parts of Africa south of the Sahara, family structures shape individual spousal perceptions of child related process and affect individual reproduction decision-making and actual fertility behavior (Fapohunde and Todaro, 1988). In another study done in Zimbabwe, Mbizvo and Adamchak (1991) found that 59 percent of men who had ever used contraceptives wanted men to have a major say in whether to use contraceptives or not.

One of the most recent studies on men's involvement in reproductive health is that by Sichona (1995, unpublished). In his research conducted in Mbozi District, Sichona reported that men's negative

attitudes towards family planning prevented their wives and daughters from effectively using modern family planning methods. His results show that men believe that a woman who uses contraceptives is a prostitute. He stated further that this negative attitude towards family planning is most likely a result of neglecting men on matters related to the family planning. Results from a study done by Ntozi (1993), reveal that the neglected study on men has left out an important set of data that can substantially supplement women-related fertility data in explaining changes in fertility. This study intends to identify factors that bring about these negative attitudes.

2.0 Study Area

The study area was Mbeya region, which is located in the southern highlands of the United Republic of Tanzania and is about 800 km from Dar es Salaam. Mbeya region was selected for this survey because of its unique characteristics. According to the 2002 national population census results, Mbeya region had a population growth rate of 2.4 percent between 1988 and 2002 (URT, 2002). This growth rate is still high. The high population growth rate in the region is a reflection of high fertility and low contraceptive use. According to the Tanzanian Demographic and Health Survey (TDHS, 2004), fertility in Mbeya Region stands at 5.7. The same report shows that the overall use of contraceptive methods stands at 45.1% for any method and at 23.5% for modern methods while the national levels stand at 26.4 and 20.0 percent for any method and modern methods, respectively. For these reasons, Mbeya Region was considered to be the ideal area for a research on family planning.

3.0 Data Sources and Sampling

Data for this study were obtained from a survey conducted by the authors in 2003/04 in their study to investigate the role of men in family planning. The study was conducted in two districts: Mbeya Rural and Mbeya Urban in order to facilitate comparison between rural and urban respondents. The study collected information from 560 married men from both rural and urban districts. Married men aged between 15 and 59 years and living with their wives were interviewed.

In the process of getting the respondents to be interviewed, this study used a multistage sampling plan because the sample was expected to be drawn from a large and diversified population with defined geographical areas. The selection procedure was a combination of multi-stage and systematic sampling procedures. A multi-stage sampling procedure was used at the district levels where using the 2002 Population and Housing Census enumeration area maps, one rural and one urban ward was selected. The second sampling stage involved selection of three villages from the selected rural ward and three streets in the selected urban ward. The third stage was the selection of ten-cell leaders from each of the selected villages/streets. A systematic sampling procedure was then used to pick married men eligible for the interview in each village/street until the desired sample was obtained.

4.0 Results and Disussion

4.1 Knowledge and use of family planning methods

4.1.1 Knowledge and use of family planning methods

Respondents were asked to state whether they knew the listed methods of contraception. They were expected to simply say 'yes' or 'no'. Data in Table 1 show the distribution of men's knowledge on contraceptives. From these data, we see that knowledge was highest for the male condom whereby 97.3% of the respondents reported to have heard about it. On the other hand, knowledge was lowest for the diaphragm whereby only 40.8% of the respondents reported to have heard about it. Almost all (98.2%) of the respondents reported to have ever heard of at least one modern method. The methods that had low rates of ever use include the female condom (0.2%), vasectomy (0.8%), diaphragm (1.5%) and norplant (3.1%).

Table 1: Distribution of men's knowledge, ever use and current use of contraceptive methods

Contraceptive method	Ever heard of method		Ever used the method		Currently using the method	
	Percent	Number	Percent	Number	Percent	Number
Male condom	97.3	559	40.9	543	22.2	514
Calendar	61.6	555	16.4	481	7.3	464
Withdrawal	85.7	559	33.0	506	16.3	485
Vasectomy	62.1	559	0.8	481	0.4	460
Tubal ligation	74.8	559	4.2	505	4.4	479
IUD	69.7	558	5.5	493	2.8	472
Injection	92.8	559	41.7	515	29.1	495
Diaphragm	40.8	557	1.5	484	0.7	453
Norplant	60.5	559	3.1	481	2.6	465
Pill	92.5	560	42.7	513	22.4	486
Traditional	65.5	550	8.6	466	4.8	457
Female condom	65.7	466	0.2	414	0.3	400

The questions about use of contraceptives, respondents were asked to state whether they (or their wives) ever used or were currently using the listed methods. Their responses are tabulated in Table 1. Despite the fact that most of the respondents knew at least one method of modern contraception, ever use and current use remain very low, explaining why the fertility is still high in the region. In particular, the most ever used modern methods were the pill (42.7 %), injection (41.7%) and the condom (40.9%). The corresponding percentages for current use were, respectively, 22.4, 29.1 and 22.2.

4.1.2 Differentials in knowledge and use of modern family planning methods

Knowledge, ever use and current use of modern contraceptive methods were then cross-tabulated against some selected socio-demographic characteristics. The results are as shown in Table 2. The data show slight differences in knowledge between respondents aged below 20 years and those aged above 20 years. The knowledge for those aged between 20 and 29 years is 5.8 higher than those aged below 20 years. Otherwise, there are no significant differences in knowledge and ever use of modern contraceptives across the various socio-demographic variables. However, significant differences are noticed when comparing current use of modern contraceptives according to age, education, number of living children, and the desired number of children of the respondents as shown in Table 2. Knowledge and ever use of modern contraceptives do not seem to change significantly with the type of resident.

In particular, young husbands are less likely to use modern methods most probably because of the cultural pressure to show their ability to bear children. It is only when they reach the age of between 30 and 39 that they increase the use of modern methods of contraception to almost 64%. By that age, they have already obtained their desired number of children. On education, the data show that the more educated one is, the more probable he and his wife are likely to use modern methods. Noticeable lower rates of ever use are seen for respondents with no education than those with adult, primary or at least secondary education. For example the percentage of ever users among respondents with at least secondary education is higher by 34.9% than for those with no education. With regard to residence, the rate of ever-users in urban areas seems to be 7.5% lower than in rural areas.

Ever use of modern contraceptives starts slowly at 6.9% when the couple has no living child and reaches a peak of 75.3% when the couple has 3 children. On the other hand, current use of modern contraceptives is lowest (42.1%) for the couples who desire for 1 or 2 children and then increase to a maximum of 68.4% for those who desire to have 4 children. Thereafter, current use drops consistently to 50.6% for those who desire for 7 or more children. These results may suggest that contraceptives are used for child spacing.

Table 2: Differentials in knowledge of modern family planning methods

Variable	Knows at least one modern method		Ever used of at least one modern method		Currently using at least one modern method	
	Percent	Number	Percent	Number	Percent	Number
Age						
< 20	92.3	12	15.4	2	15.4	13
20-29	99.3	150	72.8	110	60.3	151
30-39	98.1	212	75.9	164	63.9	216
40+	97.9	184	75.5	142	60.1	188
$\chi^2 = 12.13$ $p = 0.0069$						
Education						
Nil	96.9	31	46.9	15	34.4	32
Adult education	100.0	33	78.8	26	48.5	33
Primary	98.1	415	74.5	315	63.1	423
Secondary+	98.5	65	81.8	54	69.7	66
$\chi^2 = 14.62$ $p = 0.0022$						
Residence						
Rural	98.2	332	76.6	259	61.5	338
Urban	98.3	226	69.1	159	59.1	230
$\chi^2 = 0.33$ $p = 0.5643$						
Number of living children						
0	98.3	57	27.6	16	6.9	58
1	100.0	112	77.7	87	73.2	112
2	96.6	86	77.5	69	62.9	89
3	98.8	84	83.5	71	75.3	85
4	98.8	83	82.1	69	67.9	84
5	100.0	44	79.5	35	75.0	44
6+	96.8	92	74.7	71	50.5	95

$\chi^2 = 95.18$ $p = 0.0000$						
Number of desired children						
1-2	100.0	57	49.1	28	42.1	24
3	96.9	94	72.2	70	67.0	65
4	98.4	190	78.8	152	68.4	132
5	100.0	82	81.7	67	65.9	54
6	98.2	56	73.7	42	49.1	28
7+	97.5	79	72.8	59	50.6	41
$\chi^2 = 22.23$ $p = 0.0005$						

4.2 Multiple Logistic Regression Analysis

Having identified significant relationships between current use of modern family planning methods (as a dependent variable) and variables such as age, education, number of living children and desired number of children (independent variables), a multiple logistic regression analysis was used to determine the relationships existing between these two sets of variables. The dependent variable was recoded on a 0-1 scale so that a 0 indicates nonuse and a 1 indicates the use of modern contraceptives. The findings are presented in Table 3.

From the results we see that education and the number of living children are significant predictors of men's current use of modern contraceptives with p values equal to 0.0097 and 0.0000 respectively. In particular the odds ratios show that men with no education were 3.7 (1/0.27) times less likely to use modern contraceptives than those with primary education. Those with adult education were 1.6 (1/0.62) times less likely to use modern contraceptives than respondents with primary education while those with at least secondary education were 0.9 more likely.

Those with 1 or 2 children are 60 (1/0.0166) times less likely to use modern methods than those with one child. This makes sense because these men would wish to have more children. Similarly, men with two children are 1.3 times more likely to use the methods than those with only one child. Similar conclusions can be made for men with 3, 4, 5 and 6 or more children.

On age, the results show that men aged less than 20 years are 0.8 times more likely than those aged 30-39 to use modern methods and those aged 20-29 are 0.8 more likely to use the same methods than their brothers aged 30-39 while older men (aged 40 or more) are almost as likely to use the methods as those in 30-39 age group.

The number of desired children does not seem to have any significant relationship with men's use of modern contraceptives.

Table 3: Estimated logistic regression equations for current use of modern family planning methods.

Variable	Coefficient	SE	Odds ratio
Age		(p=0.1256)	
<20	0.2671	1.0405	1.3062
20-29	0.7497*	0.3202	2.1164
30-39	0	(Reference)	1
40+	-0.0229	0.2697	0.9774
Education		(p=0.0097)	
Nil	-1.2992**	0.4111	0.2728
Adult education	-0.4827	0.4056	0.6171
Primary	0	(Reference)	1
Secondary+	0.0973	0.3169	1.1022
Number of living children		(p=0.0000)	
0	-4.0978**	0.6612	0.0166
1	0	(Reference)	1
2	-0.2660	0.3447	0.7664
3	0.3429	0.3812	1.4091
4	-0.1116	0.4161	0.8944
5	0.8040	0.5904	2.2345
6+	-0.7361	0.5799	0.4790
Number of desired children		(p=0.1989)	
1-2	-0.9623*	0.4039	0.3820
3	-0.1592	0.3458	0.8529
4	0	(Reference)	1
5	-0.5736	0.4179	0.5635
6	-0.2285	0.4712	0.7957
7+	0.0116	0.5119	1.0117
Constant	1.0172		
Model χ^2	128.896		
P value	0.0000		

* Significant at 5% level

** Significant at 1% level

5. Summary and Conclusions

5.1 Summary of findings

As far as knowledge of contraceptives is concerned the findings show that 98.2% of the respondents have heard of at least one modern method. Male condom ranked highest whereby 97.3% of the respondents reported to have heard about it. The least known method is the diaphragm where only 40.8% of the respondents reported to have heard about it. Respondents with no education reported a lower rate of knowledge of modern contraceptives than those with adult, primary or at least secondary education.

About 61% of the respondents reported current use of at least one modern method of contraception. The findings show further that current use of injection, pill and male condom appear to have relatively higher rates (29.1%, 22.4% and 22.2% respectively) than other methods.

The findings also reveal a significant association between use of modern methods of contraception and number of living children as suggested by the chi-square test ($p=0.0397$).

A logistic regression analysis showed that education and number of living children are significant correlates of men's current use of modern contraceptives with p values equal to 0.0097 and 0.0000 respectively. In particular the odds ratios show that respondents with no education are 3.7 (1/0.27) times less likely to use modern contraceptives than those with primary education. Those with adult education are 1.6 (1/0.62) times less likely to use modern contraceptives than respondents with primary education. Those with adult education were 1.6 (1/0.62) times less likely to use modern contraceptives than respondents with primary education while those with at least secondary education were 0.9 more likely. Men with no living children were seen to be 60 times less likely to use modern contraceptives than those with one living child.

5.2 Recommendations

The study revealed very low rate of use of male condom, which is known to serve two purposes namely family planning and prevention from HIV infection. There is therefore a need to strengthen Information, Education and Communication (IEC) activities aimed at sensitising people on the use of modern contraceptive methods, particularly the condom.

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