

# Reducing the unmet needs of family planning among women of reproductive age in Northern Region of Ghana

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## ABSTRACT

The recent Ghana Demographic and Health Survey 2014, estimated that 30 % of currently married women have an unmet need for family planning services, with 17% having an unmet need for spacing and 13% having an unmet need for limiting. The objective of the study was to review the unmet need of family planning in order to make appropriate recommendation to improve family planning use in the Northern Region of Ghana. A conceptual framework which outlines the factors that interplay to determine the use of family planning services in Northern Region of Ghana was designed and used for the study. The data were sought from unpublished documents from the Regional Health Directorate of Northern Ghana, websites of Ghana Health Service, online international publications and University of Leeds Library. The unmet needs of family planning in the region was found to result from a number of factors including inaccessibility to family planning services, non-availability of some type of contraceptive methods in the communities, religious beliefs that contradict the use of family planning, traditional and cultural belief system which promotes high fertility preferences, high illiteracy level, non-approval of family planning by men who are the decision makers, misconception about the use of contraception and high poverty in the region. The identified possible strategies for tackling the factors responsible for unmet need of family planning in the Northern Region, community-based family planning services, family planning health education outreach, peer education and religious-based education were found to be considerably effective, feasible and sustainable.

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## 1. Introduction

Family planning (FP) has been a tool for controlling population growth and advancing development for decades (May, 2017). The 1994 International Conference on Population and Development (ICPD) held in Cairo saw this need and thus included reproductive health (RH) in its programme of action. The ICPD, in which Ghana participated, adapted the principle that all couples and individuals have the basic right to decide freely and responsibly the number and spacing of their children and to have the information, education and means to do so (Tsui, Brown, & Li, 2017).

According to GHS/GSS (2019), fertility rates in Ghana has experienced a decline from 6.4 births per woman in 1988 to 3.8 births in 2018, but this declining rates is not evident in all regions across the country. Women in rural places have 2.5 times more children than their urban counterparts.

Northern Region (NR) has the highest fertility rate of 7 births per woman as compared to other regions (Finlay & Fox, 2013). Hence, there is need to investigate the unmet need of FP among women of reproductive age in the NR; to help make appropriate recommendations to reduce the high fertility rate in the region (Askew, Maggwa, & Obare, 2017).

Worldwide, 70 million unwanted pregnancies occur every year; with 20 million resulting in unsafe abortion which contributes to 13% of all maternal mortality (Akpanjar, 2018). An estimated 358,000 maternal deaths occurred worldwide in 2018 with developing countries accounting for 95% of all the deaths. Sub-Saharan Africa accounted for nearly three fifths of the total maternal deaths (WHO, 2015). FP promotion, in settings with high birth rates, reduces poverty and hunger, and averts 32% of all maternal deaths and nearly 10% of childhood deaths (Agyei-Mensah & Owoo, 2015).

In most less-developed countries; poverty, gender inequalities and illiteracy constitute barriers to women's right to access effective FP services (USAID, 2017). FP has a direct link to controlling population growth which has a potential of overburdening basic service provision such as health, water, sanitation and education, slowing economic growth and increasing poverty (May, 2017). According to WHO (2015), contraceptive prevalence rate (CPR) is a measure of access to RH/FP services. In Sub-Saharan Africa, CPR remains under 15% despite the high proportion of women wanting fewer numbers of children (USAID, 2017). According to Bongaarts and Sinding (2009), increased CPR is associated with reduced total fertility rate (TFR).

The NR is thus one of the poorest in Ghana, with high infant and maternal mortality coupled with gender inequalities and low female education. Increasing FP use will help reduce the health and economic burden of high population in the region. The aim of the study was To review the unmet need of FP in order to make appropriate recommendation to improve FP use in the NR of Ghana.

## 2. Method

Understanding the factors influencing FP use is important to develop strategies to meet the unmet needs of FP. The data for the study includes unpublished reports/documents from the NRHD, documents from the websites of GHS, international publications accessed via internet and books on FP from University of Leeds Library. In February 2012, documents on FP were requested from the FP unit of the NRHD. They included current situation of FP, on-going programmes and activities and reports for the last three years. Published data and official reports from Ghana Government pertaining to the dissertation were obtained electronically from the websites of GHS and other relevant government ministerial websites. The documents include the Ghana Demographic Health Survey (GDHS) reports, Ghana Trend Analysis reports, Cultural Factors Constraining the Introduction of FP among the Kassena-Nankana of Northern Ghana and others.

The GDHS reports were utilized including other relevant existing national policies and development strategy documents in the form of drafts or final policy. Data on Ghana was also recovered electronically from websites of international organizations including WHO, UN, UNAIDS, UNFPA, USAID and other local NGOs. Books on unmet needs of FP were search from the university's library and three textbooks with relevance to the subject of study were selected. Other FP books of relevance were also used. Documents on FP were gotten from the RH unit of WHO Geneva. These include documents such as Social Determinants of Sexual and Reproductive Health, Making Decision about Contraceptive Introduction and other.

Medline, Popline and Global health databases were used to access literature for the dissertation. Popline is useful for information on HIV&AIDS and RH in developing countries. Global health database covers journal articles and writings on international public health. It has useful information on RH issues of women. Medline also covers sexual and RH issues in Europe and America as well as in developing countries.

Keywords: The following keywords were used; family planning, contraception, unmet need, contraceptives, low utilization, Northern Ghana, Ghana, developing countries. Search Terms: The Medline, Popline and Global Health databases were searched using the search terms as in the example in Table 1.

**Table 1.** Search Keywords

NO	SEARCHES	RESULT
1	(FP OR Contraception OR Contraceptive* Usage)	6717
2	(Unmet need* OR Low utilization)	453
3	(Ghana) OR (Developing countries)	426932
4	1 AND 2 AND 3	138
5	4 limited by language	136
6	5 limited by last 20 years	127

Scirus and Eldis were also used for the search of additional documents related to the keywords listed above. All English language articles relating to unmet needs of FP in developing countries were considered given preference to peer reviewed journals. Only full text documents and publications in the last 20 years were selected in order to get literature for NR. Non English language articles were not included and FP articles not related to unmet needs were also excluded. The publications were then reduced by reading titles and abstracts of publications using the inclusion and exclusion criteria discussed. When the criteria were applied to the searched publications in the table above, 20 articles were selected for use among these results. A similar process was used to search for publications on strategies to improve FP uptake and for publications in other databases. At the end of all the searches, 85 publications were selected and used for the study. This is as shown in the reference list of this dissertation.

### 3. Result and Discussion

Unmet need for FP is defined as women of reproductive age who prefer to avoid or postpone childbearing, but are not using any method of contraception (WHO, 2015). A survey in the country suggests that a considerable number of Ghanaian women wish to control the timing and number of birth but do not use any form of contraception. Studies suggest that a range of obstacles other than physical access to services prevent women from using FP (May, 2017), such as; fear of social disapproval; women's perceptions of husbands' opposition; and fear of side-effects and health concerns.

The NR tend to share similar causes of low use of FP coupled with other factors like poverty, low education among women and religious/cultural beliefs (Akpanjar, Poozaa, & Quartey, 2018).

**Table 2.** Percentage of married Women 15-49 currently using any contraceptive methods in Ghana by Region

REGION	PERCENTAGE
Western	19.1
Central	22.9
Greater Accra	32.6
Volta	28.6
Eastern	24.2
Ashanti	27.0
Brong-Ahafo	29.0
Northern	<b>5.9</b>
Upper West	14.7
Upper East	21.7

Adapted from ICF Macro 2010

The population Council is supporting Government of Ghana in reaching its Millennium Development Goals (MDG) 5, which is to improve maternal health by 2015, with much focus on reducing maternal morbidity and mortality due to unsafe abortion by improving access to contraceptive services (Novignon, Djossou, & Enemark, 2019). Unsafe abortions account for around 15% of maternal deaths in Ghana (Prinsloo, 2011). The FP coverage decreased from 24.3% in 2010 to 21% 201 in the region and was attributed to cost of contraceptives (Kebede, Goujon, & Lutz, 2019).

The eight MDGs developed in 2000 by world leaders in UN were to help the international community eradicate poverty, hunger, and fundamental health and gender inequities. The eight MDGs set to be achieved by 2015 present a blueprint for global development agreed upon by all the world countries and all the leading development institutions (USAID, 2017). Women's access to FP plays an essential and incontrovertible role in meeting each of the MDGs. FP leads to reduction of poverty, In Ghana and other developing countries the major challenge to the achievement of these goals is the continued rapid population growth. FP is an important component to population reduction and therefore forms an essential link to achieving all eight MDGs.

The main factors used in the analysis are based on the determinant of unmet needs of FP in the region. These factors are explained within following sections.

### 3.1. Determinant factors of unmet needs of FP

#### 3.1.1. Accessibility and Availability

Inaccessibility of modern contraceptives to women is one of the barriers to the use and subsequently high level of fertility in Ghana (Ariho & Nzabona, 2019). In the region, both public and private sectors are strategically used in the distribution of FP product.

The country has a social marketing programmes that network pharmacies, chemical sellers, private clinics, maternity homes as well as major NGOs, such as PPAG and Marie Stopes International (Kodzi, 2012), but most of these networks are not in rural places (Yusuf, 2014). NR which has 73% of the population in the rural place is at a disadvantage because most do not have access to these services (USAID, 2017).

Availability of all types of contraception is more in hospitals, health centers and most private institution which is mostly found in urban places (Kwode, 2010). Some community health centers and most chemical stores in rural areas do not have all the method of FP limiting the choice of contraception for these groups of people (Johnson and Madise, 2011). Methods that may require minor surgeries are mostly not common in the rural places due to limited health facilities and personnel (HRAC, 2011). The most commonly preferred method in the region is the injectable depo-provera which requires a trained health worker. Short term methods are mostly preferred due to high desire to give birth.

Increased poverty and lower education rates decrease the ability of Northern women to access the information on FP in rural place despite the efforts of the Government in spreading the information via the media. The percentage of demand satisfied is lowest in the NR.

#### 3.1.2. Religion, Traditional and Cultural Belief

A study reveal that religion had a more significant influence on the use of maternal health services (Al-Mujtaba et al., 2016). This region being predominantly Muslim has a direct impact on FP use greatly. A study done in Ghana in 2006 showed that Christian women tend to want fewer children compared with traditional and Muslim women (Yusuf, 2014). It went further to conclude that religion in Ghana had a link to the use of maternal health services in the country. NR is predominantly Muslims and traditional believers with some percentage of Christians.

Traditional African culture on FP as it has also sustained high fertility by equating fertility with virtue and spiritual approval and associating reproductive failure or cessation with sin. The ancestral disapproval is feared by most women especially in rural areas and this has been the major constraints in regards to promotion of FP in this region. Ancestral worship contributes to high fertility motives and view high fertility as life's greatest achievement. Studies has shown that women who have stopped practicing traditional religion are likely to have higher knowledge levels of modern-method of contraception and more likely to prefer to limit birth. Lineage building tends to be an important part of socio-cultural norm and thus see FP as a way of shortening family lineage. Maintaining these family lineages tends to promote high fertility (Elmusharaf, Byrne, & O'Donovan, 2017). Polygamy also contributes to high fertility levels (Johnson and Madise, 2010). The NR, due to its religious profile and high percentage rural inhabitants, has high levels of polygamy. Women in polygamous marriages

have more children since that makes them more important and respected in the family (Baschieri et al., 2013).

### 3.1.3. Education

Education has a very great effect on the utilization of RH services (Yusuf, 2014). The region has an illiteracy rate of 78%, among which the female is more (ModernGhana, 2012). Educational status is low in the NR with more preference given to male education than female education. The key factors that influence fertility-limiting behaviors as well as fertility preferences in developing countries thus include increased participation in formal schooling, urbanization and the diffusion of western ideas among others. Little value is placed on female education because it is believed that educating male is beneficial since it is reflected through remittances and other obligations (Radulovi, Šagri, Višnji, Tasi, & Markovi, 2016).

### 3.1.4. Gender and Decision Making

Studies suggest that modern means of controlling fertility has given women some degree of reproductive autonomy which in the past they did not have. Such autonomy no matter how small interferes with the prevailing power relationships between men and women. This threatens to affect deeply ingrained expectation about women's obligations. Men acceptance of FP affects its use in the region. The use of FP in the region is associated with unfaithfulness and this contributes a lot to the reason why men do not approve its use for their wives. Bridewealth (form of dowry) paid to women's family is seen as making women become men's property and bearing children for them, therefore birth limiting tends to be a man's decision and not a woman's (Bawah et al., 2019). Women agree they should be beaten if they refuse their husbands sex or use FP methods without their knowledge (EK, 2018). This has resulted in most women been physically abused when seen using FP.

### 3.1.5. Misconception

A proportion of the population considers some of the modern methods of contraception as ineffective, while side effects of some methods are seen as serious health risk (Radulovi et al., 2016). These side effects lead to a lot of misconceptions (Aryeetey, Kotoh, & Hindin, 2010). A study in Uganda support the fact that substantial proportion of women do not use FP and does not have intention of using in the future due to the side effect and opposition from husbands or partners (Thummalachetty et al., 2017).

### 3.1.6. Poverty

Contraception is generally not free in Ghana but has to be purchased with an amount considered to be small to enable everybody afford it, however, this fees, is perceived as a significant barrier to contraception use in extremely poor communities (May, 2017). Women in this area do not have that economic power to purchase the contraception (Bawah et al., 2019). The public sector prices are mostly lower than private sector, giving more advantage to the rural people since less private clinics are located at rural places.

### 3.1.7. Personal Preference and Fertility

Decisions on childbearing tend to be more in line with male preferences than female. Desire to limit birth is very low in this region indicating high fertility preferences. Studies reveal that in Ghana, 38% of births in the last five years were unplanned (Bawah et al., 2019). Men in this region tend to desire larger families than women, additionally traditional cultures that limit woman's autonomy and shape man's perception of the value of children will influence the adoption of modern contraceptives. Women are empowered and have increased control of their sexual health when they have control of contraception use. Reason in Ghana for not using FP was opposition from husband, religious leaders and others; and women who use FP without the knowledge of the partners are more likely to face a lot of difficulties such as violence from partners or neglect from family members (Machiyama & Cleland, 2014).

### 3.1.8. Age

Older women in Ghana have the highest unmet needs for birth limiting. Unwanted birth tends to increase with age indicating low use of FP among older women resulting in one unwanted birth in four births in women in their 40s. Most older women who marry late tends not to use contraception in the quest of wanting children and this often leads to giving births to more children than expected (Bawah et al., 2019).

### 3.1.9. Parity

The number of children a woman has influences her desire to limit or space her birth. Women with five children and has some form of education turn to want to limit birth but considering the low priority placed on education of females in this region, parity does not indirectly lead to birth limiting (EK, 2018).

## 3.2. Strategies to Improve Family Planning Uptake in Northern Region of Ghana

Table 3 is derived from the conceptual framework explained in chapter two. The factors influencing the unmet needs of FP discussed in chapter three will be addressed with appropriate strategies in reducing the unmet needs and then appraised accordingly.

**Table 3.** Strategies to reduce unmet needs of FP in Northern Ghana

CATEGORIES	FACTORS	STRATEGIES
Programme Factors	Accessibility and Availability	Provision of FP Services Facility Based FP Services Community Based FP Services Domiciliary FP Services
Socio cultural Factors	Religion, traditional and cultural belief Education Misconception Gender and Decision making Poverty	FP Health Education Campaign Outreach health education campaign Couple Peer Education Religious based FP Education
Individual Factors	Age Parity Personal Preference	Community based health education

### 3.2.1. Provision of FP Services

Availability and accessibility of FP services encourage individuals to use FP methods. A study in Enugu state Nigeria show that availability and accessibility of FP in health facilities and other factors increase FP use by 87.1% (Pinter et al, 2016) The FP services can be delivered through the routine health facility based approach; the community based approach and domiciliary FP services.

#### 3.2.2.1. Facility Based FP Service

This is the delivery of FP services by health workers in health facilities such as maternity homes, health centers and hospitals (WHO, 2018). All forms of FP services including female and male sterilization, injectables and oral contraceptives, intrauterine devices, diaphragms, spermicides and condoms are delivered in the health facilities since there are professional health staff and equipment. FP services is usually integrated into other services such as the STI clinics, antenatal and post natal clinics, adolescents health clinic and HIV/AIDS clinics using existing facilities and health personnel especially nurses (Aliyu, 2018). In sub saharan countries, the service was integrated into primary health care delivery system and this could have been responsible for increased accessibility and acceptability even in the rural areas (Ahmed et al., 2019). Additional cost is minimal and the services are more sustainable over a long period of time making it cost effective (Kanyangarara, Sakyi, & Laar, 2019).

### 3.2.2.2. Community Based FP Service

Community based interventions are those interventions that use the people in the community through the process of planning to the implementation stage (WHO, 2018). In rural Pakistan where women are poor and have limited access to services, community based FP services using community health workers and volunteers were used to increase FP use from 12% to 39% in less than two years in six selected project area (Asif & Pervaiz, 2019). A pilot study in Uganda showed that the use of community members such as community health workers, opinion leaders, satisfied FP users, community based reproductive agents and traditional birth attendants provided with various types of FP training on educating the community, counseling and referral of potential clients, provision of short term modern methods, yielded a great success in FP use (Aliyu., 2018). It has been successfully used in Upper East Region of Ghana to improve utilization of FP services and subsequently reduce fertility rate from 6 to 4. The involvement of chiefs and other traditional political leaders had a great impact on the success of the programme by increasing percentage of currently married women using contraception from 11.9% in 2003 to 21.7% in 2008 (Kwode, 2010). This type of strategy encourages community participation leading to community ownership and acceptability (Thummalachetty et al., 2017).

### 3.2.2.3. Domiciliary FP Services

This involves the provision of FP services to clients in their homes. It's different from community-based as it involves door to door services and distribution of pills and condoms usually free to users (WHO, 2018). The service is limited only to condoms and oral contraceptive pills (OCP). It was very successful in Bangladesh leading to a 56% CPR and reduced total fertility in Sirajganj (one of the towns in Bangladesh) from 6.4 in 1983–1985 to 3.8 in 1990–1992 (WHO, 2013). A community based contraceptive distribution programme targeted rural population in Tanzania, Mali and Zimbabwe and demonstrated great success in reaching the rural areas and increased FP use in these areas (May, 2017). In the Bangladesh case above, 35,500 field workers and 7,500 supervisors were employed to distribute condom and OCP to patients in their homes. The approach required a lot of funding which was provided mainly by donors and the concern for the sustainability of the services led to the shift to facility based FP service delivery in Bangladesh. This strategy is not cost effective (WHO, 2013).

## 3.2.2. FP Health Education Campaign

Health education can be used to increase peoples' knowledge about FP and motivate them to use FP methods (Agyei-Mensah & Owoo, 2015). Acquiring knowledge on contraceptive methods is an essential step in gaining access to FP services (WHO, 2018).

### 3.2.2.1. Mass Media FP Campaign

Mass media campaigns utilize mediums like billboards, newspaper, magazine, radio, TV to provide information to a large number of people (Hubley and Tilford, 2010). In India, Pakistan and Bangladesh, media campaigns were used for raising awareness of FP. The use of radio in broadcasting FP programmes made a great impact in rural areas in these countries and this led to increased FP awareness and subsequent increase in its use (Ajaero, Odimegwu, Ajaero, & Nwachukwu, 2016). Mass media has also shown result in many African countries especially Kenya, on reproductive health behaviours and has provided a means of communication leading to contraceptive use. The use of radio, television and print media resulted in an increase of 50% use in FP in Kenya (Babalola, Figueroa, & Krenn, 2017).

### 3.2.2.2. Outreach FP Education Campaign

Outreach FP education campaign is an arrangement in which trained individuals go into a society to educate the members of the community on FP. In India, outreach programmes were organized in low socioeconomic rural area using community leaders, rural formal and informal health service providers, young couples and in-laws and given them training on FP services. These people then educated the communities through outreach programmes targeting different group including

the general public through street theatre performances and wall paintings, unmarried adolescents through workshops, young married men and women through group meetings and young married couples through home counseling. This yielded increase in contraceptive demand from 25% to 40% (Aryeetey et al., 2010; Thummalachetty et al., 2017). In Uganda used community based volunteers in outreach programmes to improve awareness of FP through the given of information; and this resulted in an increased use contraceptive and reduced pregnancy rates (Ariho & Nzabona, 2019). Generally community outreach is more cost effective compared to other means of interventions (Yusuf, 2014).

### 3.2.2.3. Couple Peer Education

Peer education involves the “sharing of health information or provision of further educational activities and counseling between members of similar age, interest, or status groups” (Hubley and Tilford, 2010). Peer education has the benefit of encouraging participation of both the educator and the one being educated as well (Fikree, Abshiro, Mai, Hagos, & Asnake, 2018). Peer education was used in many developing countries on HIV/AIDS programmes intervention and resulted in great success in reference to the knowledge, attitudes and practices (Wawrzynski, LoConte, & Straker, 2011). The Philippines adopted the couple peer educator delivery strategy in one of their coastal areas to help improve FP usage (USAID, 2017).

A study conducted using staff of the family health units of public health facilities in Tabriz, the capital city of East Azerbaijan province of Iran, showed that the use of peer education on FP awareness creation and behavior change was more effective than provider provided intervention (Charandabi et al., 2010). Misconception on the use of FP and improve informed choice for contraceptives can best be tackled using peer education (Fikree et al., 2018).

### 3.2.2.4. Religion based FP campaign

Religious leaders are used as agents of change to educate their congregation on FP (Sundararajan et al., 2019). There has been evidence of successful FP programmes in different Islamic countries which had made great success with FP programmes (Hordern, 2016). The programmes used high Muslim clergy to disseminate FP messages to the general public; prioritizing smaller healthy families as against larger poor and suffering families using teachings from the Quran. The mosque was also used greatly in conducting male and female group meetings on FP separately. Various men and women health volunteers were also used in passing FP messages. The community health and FP programme in the Upper East region of Ghana used leaders of African Traditional Religion in the discussion and implementation of FP programmes since traditional belief system also had an effect on FP use (Pinter et al., 2016).

## 4. Conclusion

The unmet needs of FP in the region result from a number of factors including inaccessibility to FP services and non-availability of some type of contraceptive methods in the communities. Also some religious beliefs contradict the use of FP. Traditional and cultural belief system shapes the mind of individuals on high fertility preferences making the use of FP undesirable. High illiteracy level in the region also affects the use of FP services. Decision making in the region is a man’s responsibility; and since men do not approve the use of contraception, this contributes to high unmet needs of FP. Misconception about the use of contraception and high poverty in the region do not also encourage the uptake of FP methods.

The possible strategies which can be used in tackling the programme factors include strategies such as Facility Based FP Services, Community Based FP Services, and Domiciliary FP Services. The strategies tackling the socio-cultural and individual factors included strategies such as Mass Media, Outreach health education campaign, Couple Peer Education, Religious based FP Education and Community based health education. Out of these strategies, community-based FP services, FP health education outreach, peer education and religious-based education are considerably effective, feasible and sustainable. This chapter will make appropriate recommendations, based on these findings, to the various stakeholders addressing FP issues in the NR of Ghana.



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