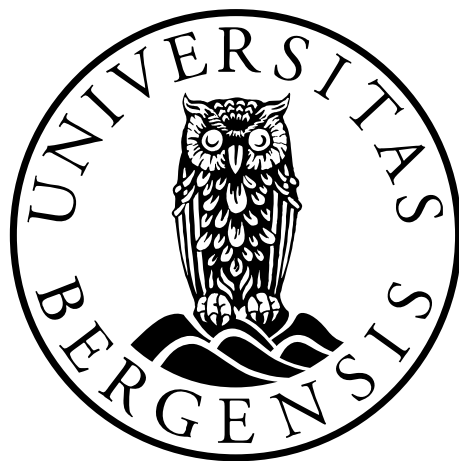


# **Women's Empowerment and Family Planning:**

*A Quantitative study from the Ghana Demographic and  
Health Survey 2008*

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## **ACRONYMS**

DHS	Demographic and Health Surveys
GDHS	Ghana Demographic and Health Survey
GHS	Ghana Health Service
GSS	Ghana Statistical Service
UNDP	United Nations Development Programme
WHO	World Health Organization

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## **ABSTRACT**

*Introduction* This study analyses the impact of empowerment on women's health and contraceptive use. Empowerment is a process which enables one to exercise choice. In this study, choice is the present and/or planned use of contraception and its effect on women's health. According to Kabeer's (1999) model of empowerment, the ability to exercise choice is enhanced by access to resources (material, human and social assets) and by agency (decision) latitude. Resources, agency and choice together constitute empowerment. This distinction between empowerment, as an instrument and as a process, is crucial to this thesis because it cannot be measured as a single independent variable.

*Method* This research is a secondary analysis of survey data that were collected as part of a broad research programme on maternal and child health. 4,916 women participants were drawn from the 11,778 households selected from Ghana's ten regions as part of the 2008 Ghana Demographic and Health Survey (GDHS). Three dimensions of empowerment were operationalized using the best existing variables in the GDHS data set. Resources were measured using literacy, education level and occupation (maternal and paternal), household wealth index and ownership of insurance as variables. Agency comprised of the variables which measured the decision latitude about personal medical care, household expenditures, respondent's and partner's knowledge of contraception methods and sources, attitudes towards domestic violence, and views on family planning. Achievement was a single variable measured by the respondent's present use and/intended future use of contraceptives (use or intend to use, or not). Contextual/background variables included respondent's and partner's age, marital status, ethnicity and religion, fertility preferences, administrative region lived in, and urban/rural setting. Achievement was treated as a dependent variable, while resources and agency were independent variables and context/background were treated as control variables. Bivariate analyses and logistic regression were used in sequence to produce a multivariate model of only statistically significant predictors which maximised the variance accounted for in the achievement variable.

*Results* In the multivariate model that accounted for all significant correlates of achievement and that maximised the variance in achievement accounted for ( $r^2$  estimates

for the final model were between 0.06 and 0.08), the only contextual/background variables were respondent's age and religion. Compared to respondents ages 15-19, older women were significantly less likely to report not using/planning to use contraception (O.R.'s for ages 20-24, 25-29 and 30-34 were 0.48, 0.62 and 0.69, respectively). Compared to Christians, non-Christian respondents were significantly more likely to report not using/planning to use contraception (O.R. = 1.50).

Among the resources variables, only the respondent's education level and occupation were significant correlates of achievement. Compared to women with secondary or higher education, women with primary education (O.R. = 1.44) and women with no education (O.R. = 1.92) were more likely to report not using/planning to use contraception. Also, compared to women in white collar jobs, unemployed women (but not women agriculture and labour) were more likely to report not using/planning to use contraception (O.R. = 1.65).

Among the agency variables, compared to women whose partners expressed attitudes supportive of family planning, women with less supportive partners were slightly but statistically significantly more likely to report not using/planning to use contraception (O.R. = 1.13). Further, compared to women whose partners expressed attitudes against man-on-woman domestic violence, women with partners who did approve domestic violence were slightly but statistically significantly more likely to report not using/planning to use contraception (O.R. = 1.09).

*Discussion* Ghanaian women most likely to report using/planning to use contraception were younger, were Christians, had achieved higher education and had white-collar occupations, and had partners who approved of family planning and did not approve of man-on-women domestic violence. This constellation of factors is interpreted as representing reproductive empowerment. This implies women should gain easy access to education, employment in Ghana to empower women generally, and to use contraceptives to the extent that is compatible to their well-being. The findings also suggest that women's empowerment is valuable to interventions which enhances men's tendency to develop positive opinions about family planning and non-violent domestic relations. All significant correlates of achievement except age and religion are amenable to intervention, therefore, suggesting social and public health priorities. Limitations of

the study include inability to collect data to address the study question and to design the research framework. This study suggests that men be more actively involved in women's empowerment and in family planning.

**Keywords:** women's empowerment, contraceptive use, Ghana, Demographic and Health Survey



## **INTRODUCTION**

### **Background**

The Ghanaian society is predominantly male and women seem to have limited power when it comes to decision-making of any kind in the home (Tawiah, 1997). Lack of recognition of women's role in decision-making tends to limit their power to decide on issues regarding the home and family planning practices (Do & Kurimoto, 2012). This tends to have an impact on their health, and sometimes, that of their children (Tawiah, 1997). This study explores the link between women's empowerment and the use of or intention to use contraceptives among women in Ghana.

According to Stoebenau and Malhotra "empowering women is creating conditions that build their confidence, self-reliance and ability to make strategic life choices" (Stoebenau & Malhotra, 2011: p. 1). Contraception is defined as "the use of various devices, drugs, agents, sexual practices, or surgical procedures to prevent conception or impregnation (pregnancy)" (Nordqvist, 2009). This enables women to plan and decide when they want to have children or not.

The levels of fertility in Ghana and most Sub-Saharan African countries continues to rise and this can be attributed to several factors, including relatively low use of contraceptives (Ghana Statistical Service, Ghana Health Service, & ICF Macro, 2009). The Ghana Demographic and Health Surveys (DHS, 2008) reports that just 24 per cent of married women currently use a contraceptive method (Ghana Statistical Service et al., 2009). Women in Ghana, who have been educated, at least up to high school, are more than twice likely to use contraceptive than women with no education (Ghana Statistical Service et al., 2009). According to the DHS (2008), only 14 per cent of married women in the lowest wealth quintile currently use a contraceptive method, compared to 31 per cent of their counterparts in the highest wealth quintile (Ghana Statistical Service et al., 2009). Schuler and Hashemi (1994) observed that 59% of women who belonged to financial credit programmes used contraceptives against 43% who were not part of the programme (Schuler & Hashemi, 1994).

Over the years, maternal mortality has been one of the major causes of deaths in Sub-Saharan African, with Ghana recording about 350 deaths out of every 100, 000 live

births in 2010 (The World Bank, 2014). The statistics calls for immediate measures to reduce the deaths to the minimum, if not prevent them completely. Contraceptive use or family planning is one of the effective ways to reduce maternal mortality and improve women's health. This study seeks to identify how empowerment can influence contraceptive use, increase accessibility to health benefits to women and reduce mortality at birth.

There is a dearth of research information on empowerment and contraceptive use as a tool for health promotion in Ghana. This study seeks to fill this gap and encourage more studies in this subject. The study explores empowerment as a critical element for promoting good health for women in Ghana.

Ghana's social, economic and health trends make the subject of women's empowerment, contraceptive use (current/planned use) and the extent to which these factors influence their health choices worthy of investigation.

## **Conceptual Framework**

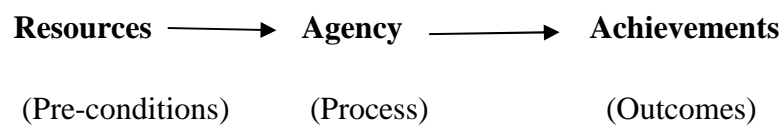
### **Conceptualizing Empowerment: Resources, Agency and Achievements**

The concept of empowerment is very broad and does not have any particular definition which cuts across disciplines. Researchers have usually operationalized it to suit their area of research interest. Empowerment is defined as "a multi-dimensional social process that helps people gain control over their own lives" (Page & Czuba, 1999; P. 1). It is also expressed as a multi-dimensional, social process, measured as enabling power (the capacity to implement) in people, for acting on issues important to them at different levels of their lives and society (Page & Czuba, 1999). Empowerment is a means of attaining positive health, and also an end-point (synonym) of good health (Green & Tones, 2010). Empowerment is measured here in the material, psycho-social and political contexts with emphasis on the structural factors needed for empowerment (Green & Tones, 2010). Women's empowerment (Longwe) framework has been widely used to describe the phenomenon. The Longwe framework describes the concept of empowerment as having control and participating effectively in development and stipulates five hierarchical levels of empowerment (March, Smyth, & Mukhopadhyay,

1999). In spite of several concepts on women's empowerment, I focused on the framework proposed by Naila Kabeer.

Naila Kabeer discusses empowerment as “a process of change” and “the ability to make choices” (Kabeer, 1999, pp. 436-437). She described disempowerment to mean “to be denied choice” (Kabeer, 1999, p. 436). This concept focuses on empowerment as a process of moving towards change, building on resources (assets) and agency (decision latitude) and for achievements (outcome behaviour).

The main components of this framework of empowerment are resources (assets), agency (decision latitude) and achievements (outcome behaviour). These components are interrelated dimensions which influence the ability to make strategic choices. This is illustrated as follows:



(Kabeer, 1999)

The first component, resources (pre-conditions) includes the material resources (assets) like money as well as the human and social resources which are available to individuals and serve as tools to enhance the process of making strategic choices (Kabeer, 1999). Aside the material resources like money, shelter and clothing, resources can be described in a broader sense to include the social support gained from the various social relationships we develop in our daily interactions with different human and social domains like the family, school, community and market among others (Kabeer, 1999). Access to these resources, whether readily available or of future claims and expectations, tend to guide the rules and norms of authority and the ability to set priorities and implement claims (Kabeer, 1999). Thus, these resources set the conditions for making strategic choices. It can, therefore, be said that people with less access to these resources are not likely to be as empowered as those who have access to them (Hashemi, Schuler, & Riley, 1996).

The second component of this framework is the agency (decision). This refers to “the ability to define one's goals and act upon them” (Kabeer, 1999, p. 438). Agency here

includes observable actions and the total “sense” of agency which is the meaning, motivation or purpose attached to an action. Thus, being able to negotiate, bargain or have a reflective analysis of one’s actions and decisions (Kabeer, 1999). It is good to note that agency could be used positively or negatively when it comes to power. In the positive sense, it empowers one to take charge of one’s life choices and goals while in the negative sense one tries to dominate the sense of agency of others thus, disempowering them (Kabeer, 1999). Hashemi et al. (1996) for instance showed the positive aspect of agency as well as the connection between resources and agency. Results of their study showed that women’s access to credit contributed significantly to their purchasing power, asset owning, political and legal awareness as well as general mobility and decision making in organizations among others (Hashemi et al., 1996).

Achievements (outcomes) in this framework basically refer to the resultant behaviours or choices. This looks at the functional achievements of one’s decisions made and highlights on the possible inequalities that may exist in people’s ability to make choices rather than the difference in the choices made (Kabeer, 1999). It measures the “basic fundamentals of survival and well-being, regardless of context” (Kabeer, 1999, p. 439). Measurement of achievements could also focus broadly on other complex functioning achievements which are of value in most contexts like political representations among others as used in the United Nations Development Programme (UNDP) strategies on measuring empowerment (UNDP, 1995).

Based on this concept of empowerment, this study explored the data available from the Ghana DHS, 2008 to find out if women’s empowerment is associated with the present and/or planned use of contraception. Since the three components of this concept are described as “indivisible” and one cannot refer to one and neglect the other (Kabeer, 1999). This study therefore investigated how resources (assets) like education and occupation among others influence the agency (decision latitude) of Ghanaian women in relation to their present and/or planned use of contraception and highlights how readily available resources (assets) are to women in Ghana since those are the pre-conditions of empowerment according to the framework (Kabeer, 1999). The extent to which agency (decision latitude) influences the home or a husband’s control among others and impacts on the achievements (outcome behaviour) of contraception is also explored. It

tried to compare women in the rural and urban areas as well as the wealth index groups to see if that influences their agency and consequently, their achievements.

### **Literature Review**

**Empowerment:** Women's empowerment has earlier been described as a process enabling one to exercise choice, where choice here means the present and/or planned use of contraception. The financial status of the women determines the extent of empowerment (Schuler & Hashemi, 1994). Education is the main indicator of women's empowerment and suggested that female education, at least to the secondary level should be given priority, as should have information delivery on family planning in the rural areas of the country (Tawiah, 1997). Very few studies have looked at the other possible dimensions of women's empowerment like husband or mother in-law control, or general family control and accessibility of contraceptives. Based on these observations, this study explores male partner's control on contraception. This will help to address the issue of contraception among Ghanaian women in a more holistic manner.

Do and Kurimoto (2012) used a six-dimensional measure of empowerment (economic, socio-cultural activities, health-seeking behaviour, agreement on fertility preference, sexual activity negotiation and domestic violence attitudes) in their study in four African countries: Namibia, Zambia, Ghana and Uganda. They found out that women who were more empowered used more contraceptives than those who were less empowered (Do & Kurimoto, 2012). It is interesting to note that in this particular study, women's empowerment in health-seeking behaviour was not linked to their contraceptive use (Do & Kurimoto, 2012). This is quite surprising as one would expect that health-seeking behaviour should somehow empower women to use contraceptives since they will draw from knowledge they have acquired. This necessitated for further studies on this subject.

Osemwenkha (2004) studied empowerment in direct relations to freedom of movement and decision-making power of Nigerian women. She discovered that women who were in the highest level of empowerment used more contraceptives than those in the lowest level of empowerment (Osemwenkha, 2004). However, knowledge about the contraceptive pills was the same for all the different empowerment level groups in this

study (Osemwenkha, 2004). This is an interesting discovery but it can be said that Osemwenkha's limit of empowerment measured just two dimensions (freedom of movement and decision-making power) which may have been a limitation to the findings of the study.

Saleem and Bobak (2005) investigated the link between autonomy, education and contraception among women in Pakistan (Saleem & Bobak, 2005). Autonomy in their study was synonymous to empowerment. They found that high autonomy in both decision and movement was more associated with contraceptive use (Saleem & Bobak, 2005). However, Saleem and Bobak (2005) discovered that even though autonomy is linked with contraceptive use, it did not have any mediating effect between education and contraceptive use in Pakistan (Saleem & Bobak, 2005). Crissman et al. (2012) recently found that in Ghana, women's sexual empowerment, which is having the power to decide on sexual actions in their relationships, was strongly associated with contraceptive use (Crissman, Adanu, & Harlow, 2012). There is, therefore, the need to explore other aspects of empowerment since it is a very broad concept.

**Household decision-making:** In relation to decision-making in the home and control from the husband or other family members, studies have shown that women have relatively limited decision-making power (Jan & Akhtar, 2008). Married women had more power to decide and use contraceptives than the unmarried, even though their decisions were influenced by their husbands (Jan & Akhtar, 2008). Women who had more children were more empowered to make decisions on the home and the older women could make decisions on their own about their personal health care and daily household purchases, including their use of contraceptives (Kishor & Lekha, 2008). However, women who lived with the extended family, for instance mother, father or siblings of the husband in their matrimonial home, were less empowered (Kishor & Lekha, 2008).

Men in highly gender-stratified societies tend to control their wives' use of contraceptives, even though this is to a minimal level, given other factors (Mason & Smith, 2000). In Honduras a significant number of women agreed that decisions about fertility and contraceptive use should be taken solely by the men (Speizer, Whittle, & Carter, 2005). The expectations and control of mothers-in-law can also limit

contraceptive use (Feldman, Zaslavsky, Ezzati, Peterson, & Mitchell, 2009). This raises the question of the extent to which other significant family members like husbands and mothers-in-law, for instance in the African setting, can also control women's decisions on contraceptive use.

**Education:** Crissman et al. (2012) observed that women who had any form of formal education were more “sexually empowered” to use contraceptives than those who did not have any (Crissman et al., 2012). However, Crissman et al. (2012) did not show whether the differences in levels of education was relevant to the extent to which women are empowered (Crissman et al., 2012). Kishor and Lekha (2008) found education to be an important indicator of empowerment and suggested that a higher level of education empowered women more than does primary level education (Kishor & Lekha, 2008).

In Oman, an Arab state, empowerment (decision-making and free movement) was associated with more contraceptive use (Al Riyami, Afifi, & Mabry, 2004). Education and employment were not measured as indicators of empowerment but as separate variables: education by itself is significantly associated with high contraceptive use than empowerment (Ahmed, Creanga, Gillespie, & Tsui, 2010; Al Riyami et al., 2004). This means that empowerment without formal education is not enough to increase contraceptive use but education in general is very necessary (Hogan, Berhanu, & Hailemariam, 1999).

Darkwah (2010) advocates that education and job security are strong indicator of empowerment (Darkwah, 2010). There is, therefore, the need to provide jobs to make the empowerment process more fulfilling (Darkwah, 2010). Thus, this study will explore the associations between education and other significant factors that can influence women's empowerment and influence the present and/or planned use of contraception in Ghana, Africa.

**Rural/Urban:** In Ethiopia and other countries across the world, women in the urban setting had more knowledge and power to make decisions and used contraceptives more than those in the rural settings (Bogale, Wondafrash, Tilahun, & Girma, 2011; Kishor & Lekha, 2008; Mekonnen & Worku, 2011). These results could to be linked to the fact

that those in the urban settings are more exposed to knowledge about modern contraceptives, gender equitable attitude and better chance of involvement in decision-making among other favourable conditions (Bogale et al., 2011). Education and age on the other hand, did not have any much impact in this study (Bogale et al., 2011).

**Wealth/financial status:** Studies indicate a positive relationship between financial status and the use of contraceptives (Elfstrom & Stephenson, 2012; Kishor & Lekha, 2008). This confirms observations in earlier studies by Schuler and Hashemi (1994) in Bangladesh where they found that women who belonged to groups that received micro-finance support were more empowered and more prone to contraceptive use than their counterparts who did not receive that support (Schuler & Hashemi, 1994). On the contrary, quantitative measures of a study in Ghana disclosed that being part of a micro-finance group neither influenced women's status nor their decision to use contraceptives but qualitative measures revealed otherwise (Norwood, 2005). Further research is needed in this area to clear these contradictions.

In view of these various findings, this study seeks to identify other factors that are relevant to women's empowerment (exercising choice) and the present and/or planned use of contraception among women in Ghana.

### **Research question**

Is women's empowerment associated with the present and/or planned use of contraception among women in Ghana?



## **METHODS**

### **Design**

A quantitative research design was selected. The study used secondary data from the Ghana Demographic and Health Surveys 2008 (GDHS 2008). There was, therefore, no need to collect primary data from the field. The availability of high quality data from the GDHS 2008 provided a wide sample size and an advantage for conducting a quantitative study. The Statistical Packages for Social Science (SPSS) version 21 was used to run various analyses.

This helped to explore the issue of women's empowerment and present/future use of contraception in a different light which the qualitative approach may not have covered. The sample size also makes the findings more plausible to be generalised. Logistic Regression analysis was the main means of exploring the relationships between variables in the study.

### **Data**

The Ghana Demographic and Health Survey (GDHS) 2008 is the fifth nation-wide population and health survey conducted in Ghana as part of the global Demographic and Health Surveys (DHS) programme. Since 1988, the DHS has been conducted in Ghana every five years and it provides information on the trends of population and health in the country. The 2008 survey was carried out by the Ghana Statistical Service (GSS) in collaboration with the Ghana Health Service (GHS) and technical support from ICF Macro. The Demographic and Health Surveys (DHS) helps countries worldwide in the gathering and usage of data to monitor and assess population, health and nutrition programmes. The main goals of the DHS project are to provide decision-makers in survey countries with valuable information needed for making educated policy choices. This will help to increase the international population and health database, improve survey methodology and develop the skills and resources essential to conduct high-quality demographic and health surveys in participating countries (Ghana Statistical Service et al., 2009).

The survey gathered information on demographics as well as fertility, marriage, sexual activity, fertility preferences, awareness and use of family planning methods, breastfeeding practices, nutritional status of women and young children, childhood

mortality, maternal and child health, awareness and behaviour regarding HIV/AIDS, and other sexually transmitted infections (STIs). In addition, the 2008 GDHS collected information on domestic violence, malaria and use of mosquito nets, and carried out anaemia testing and anthropometric measurements for women and children (Ghana Statistical Service et al., 2009).

#### *Data quality*

The GDHS data used for the study provided very high quality data on health issues in Ghana over the years. The data collection, analyses and reports are of a high standard and generally accepted worldwide. The field officers were trained to collect the data (Ghana Statistical Service et al., 2009). The questionnaires used for the survey were developed based on information from previous DHS (Ghana Statistical Service et al., 2009). They were translated into three Ghanaian languages and pre-tested before they were used for the actual data collection (Ghana Statistical Service et al., 2009). The actual data collection on the field was also done with supervision from the senior staff of the Ghana Statistical Services (GSS) (Ghana Statistical Service et al., 2009).

The data entry and processing was done right after the fieldwork ended and data entry was done twice to ensure 100% verification of all information entered (Ghana Statistical Service et al., 2009). The synchronized processing of the data was a discrete benefit for the GDHS data quality. This is because due to the supervisory nature of the fieldwork, GSS had the chance to advise field workers of problems detected during data entry (Ghana Statistical Service et al., 2009). There was a 99% response rate from participants for the whole survey while there was 97% and 96% response rate for female and male respondents, respectively (Ghana Statistical Service et al., 2009). The reason for the non-response being continuous or frequent absence from home (Ghana Statistical Service et al., 2009).

#### **Data collection**

The field workers used a household questionnaire and separate interview questionnaires for male and female, respectively. The interviews took about 10 to 20 minutes each. The data was collected all over the country within a period of three months, from the beginning of September to the end of November, 2008 (Ghana Statistical Service et al., 2009). There was a 99% response rate which makes the quality of the data very strong.

## **Sample**

The GDHS made use of a two-stage sample based on the 2000 population and housing census to produce separate estimates for key indicators for each of the ten regions in Ghana. A sample size of 12,000 households was selected across the country but a total of 11,778 households were interviewed, with 4,916 being women and 6,141 being men. About half of the people interviewed were between the ages of 15 to 49 for women and 15 to 59 for men (Ghana Statistical Service et al., 2009).

The main sample for this study was the 4916 women. This was to help narrow down to the best sample that would help to best answer the research question. The focus was on the women who answered questions on household, domestic violence and the female question. The sample was also characterised by women between the ages of 15 and 49. Even though the data provided information for men, less emphasis was placed on that.

## **Measures**

The measures needed to answer the research question were described in line with the conceptual framework mentioned earlier in this study. Some contextual/background variables were drawn from the variables available in the data. These were analysed and described by descriptive statistics to show their frequency distributions.

In applicable cases some of the variables were put together to form scales of relevant concepts. Three scales were formed based on theoretical consideration and the fact that a group of items closely describe the same construct. Based on these, five main scales were constructed. These were scales for respondent's approval of domestic violence (husband beating wife), respondent's approval of family planning, partner's (husband/co-habitant) approval of domestic violence, partner's approval of family planning and for decision on household expenditure, respectively.

## **Achievements**

*Contraceptive use:* The outcome variable for this study was respondent's present/future use of contraception and it was measured by the participant's achievements (outcome behaviour) of currently using or planning to use contraception in future. These included questions:

“Are you currently using a contraceptive method or do you intend to use one in future?”

“Have you ever used anything or tried in any way to delay or avoid getting pregnant?”

“Are you currently doing something or using any method to delay or avoid getting pregnant?”

“Do you think you will use a contraceptive method to delay or avoid pregnancy anytime in the future?”

These questions all assessed the respondent’s contraception (use or intend to use, or not) but the first question was more appropriate because it captured the all the possible responses in one variable (use or intend to use, or not). The variable was labelled “Respondent’s contraceptive use and intention to use in future” and it had 100% response rate.

The partners were also asked about their contraception. They answered these questions:

“Have you ever used any contraceptive method?”

“Are you currently using any contraceptive method?”

### **Agency**

*Empowerment:* This was referred to as the agency (decision latitude) of respondents and it was measured by their ability to make choices on contraception without control from anyone, their contribution in all household decision-making and their ability to make future choices on child birth. Questions that covered this concept included:

“Would you like to have (a/another) child or you would prefer not to have any (more)?”

“How long would you like to wait from now before the birth of (a/another) child?”

“Who usually makes decisions about making major household purchases?”

The respondent’s approval of domestic violence and partner’s approval of domestic violence (husband beating wife) referred to respondent and partner’s attitudes towards domestic violence and each was measured as a scale. The response ranged between “not justified” “justified in an instance” “justified in 2 instances” “justified in 3 instances” “justified in 4 instances” and “justified in 5 or more instances”. The scale included five questions:

“Is wife beating justified if she goes out without telling him?”

“Is wife beating justified if she neglects the children?”

“Is wife beating justified if she argues with him?”

“Is wife beating justified if she refuses to have sex with him?”

“Is wife beating justified if she burns the food?”

Scales for respondent’s and partner’s approval of family planning measured the respondent and the partner’s views on family planning and its benefits, respectively. The response to the scales ranged between “strongly agree”, “agree”, “somewhat agree”, “disagree” and “strongly disagree”. The questions in the scale were:

“Having too many children may be dangerous for a woman.”

“Better not to have more children than can be afforded.”

“Children from smaller families are more likely to succeed.”

“Childbearing is a woman's concern.”

The scale for decision on household expenditure was used to measure the extent to which respondents controlled/contributed to daily and bulk purchases of their families’ needs. On a scale of 0 to 15 respondents rated if it was “respondent and partner control” or “partner only control” on household expenditure. The scale included these questions:

“Who has the final say on making household purchases for daily need?”

“Who has the final say on making large household purchases?”

“Who has final say on deciding what to do with money wife earns?”

“Who decides how to spend money?”

Respondents were also asked the question “Do you need permission to get medical care for yourself?” This was to measure their freedom to make choices about their health.

The partner's opinion about discussion of family planning with respondent was measured. The response to this question was "yes" or "no" and it assessed the partner's interest in contraception.

The desire for more children was measured as "Want no more/ unable to have more", "Unsure about time/ Undecided" or "Within 2 year/ After 2 years". This was measured for respondents and partners respectively.

Dyad variables were formulated for fertility preference, ever used any contraceptive method and Literacy. These were to measure the extent to which respondents and partners agree on factor that influence the present/planned use of contraceptives. Respondent-partner dyad fertility preference was measured as "both don't want more children", "only respondent wants more children", "only partner wants more children" and "both want more children". Respondent-partner dyad ever used any contraceptive method was measured as "Both ever used", "respondent only ever used", "partner only ever used" and "both never used". Respondent-partner dyad literacy was measured as "both literate", "only respondent literate", "only partner literate" and "both not literate".

## **Resources**

*Education:* The level of education was considered as a resource (asset). This was measured by the "highest level of education" "educational attainment" "ever attended school" and "highest year of education completed". These were measures for both respondents and the partners. The "highest level of education" (Secondary/higher, primary, no education) was selected as the most appropriate variable education because it captured the different levels of the education system in Ghana very well.

*Literacy:* Literacy referred to the respondent's capacity to read and write. It was considered as resource (asset) and was measured as one variable which respondents had to answer if they "can read" or "cannot read at all". The partner's literacy was also measured by the same criteria.

*Knowledge of contraception:* knowledge about methods of contraception and knowledge about sources (where to buy) of contraceptives were also considered as measures of resources (assets). Respondents answered "Yes" and "No" to having knowledge about methods of contraception and knowledge about sources of

contraceptives. The partner's knowledge of contraceptive methods and sources was also measured.

*Occupation:* Information on the type of employment respondents and the partners engaged in was also provided in the data and this helped to measure socio-economic status of respondents. This was measured as having "white collar" or "Agriculture and labour" or being "unemployed".

*Wealth index:* The data also provided information on the measures of the wealth index of respondents. This was a computed variable based on the various household properties and earnings. This was represented as "Richest", "richer", "middle", "poorer" and "poorest".

*Health Insurance coverage:* Information about respondent's subscription to a health insurance system is provided in the data. Respondents answered "yes" or "no" to this question. This was intended to be a measure of accessibility to contraceptives.

### **Contextual/background variables**

The data provided information on the contextual/background factors like sex, age, marital status, religion, administrative region lived in, type of residence of respondents, ethnicity, fertility preference and partner's age. These served as control variables.

The sex of the respondents was female for the entire sample included in this study.

The age was measured in years. Women from 15 to 49 years were included in the sample. The age of the partners of respondents was also measured in years (15-59).

Marital status was measured as "never married", "currently married" and "formerly married" (divorced). The respondent's marital status and the partner's marital status were obtained respectively.

The religion of respondents was measured as being Christian or non-Christian (Muslim and other religions).

The ethnicity of respondents was measured "Akan" and "other" (all other ethnic groups in Ghana).

Fertility preference referred to the respondent's desire to have another child in the near future or not. Respondents answered "unable to/don't want another child" and "want another child" to this question. The fertility preference of the partner was also measured in the same way.

The ideal number children respondents and partners wanted were recorded respectively. The answers to this question ranged between "0-3", "4" and "5 or more".

The administrative regions lived (region) in were grouped into four main sections based on nearness and the number of valid respondents available in each region even though there are originally ten regions in Ghana. These included "Southern" (Volta, Eastern, Western and Central regions); "Greater" (Greater Accra region); "Middle" (Ashanti and Brong Ahafo regions) and "Northern" (Northern, Upper East and Upper West regions).

The type of residence was measured as "urban" and "rural" according to the description given by the Ghana Statistical Services (Ghana Statistical Service, 2012).

### **Data Analyses**

The statistical analyses for this study were computed using the Statistical Packages for Social Science (SPSS) version 21. A step-by-step process was used to sort and analyse data and these steps included:

1. Sample was selected.
2. Variables with missing data that was above 10% of the whole sample were not included in the analyses.
3. The main variables considered in the study were screened for outliers. There were no outliers that were very much out of logical range.
4. Reverse coding was done for some variables where required.
5. Scales were made where found necessary and possible to do.
6. Frequency distributions and graphs were used to show descriptive statistics of the variable in the study.



7. Bivariate and correlation analyses were also used to assess the relationships between the variables.

After these preliminary analyses, the main analysis was conducted using logistic regression to assess the extent to which the predictor variables predict the outcome variable. This also followed a step by step process which included:

1. The predictor variables were put in one after the other to assess how each variable affects the other predictor variables in the regression model and also predict the outcome variable.
2. Predictor variables with weaker predictions of the outcome variable were removed from the model.
3. Two goodness fit models were arrived at as the final models for the analyses. The models each had six predictor variables in it.
4. The oldest respondent's age group was filtered out in one of the final models to increase the strength of the model.

### **Ethical consideration**

Since data used from the GDHS has already been collected and ethically approved for research work, there was no need for me to fulfil any ethical obligations for collecting research data on the field. The GDHS is a highly recognised pool of data which fulfils all the main ethical issues in research (Ghana Statistical Service et al., 2009). Informed consent was gained from all participants of the survey and they all remain anonymous. The data is internationally approved for research and academic purposes.

## RESULTS

### Descriptive

Descriptive statistical analyses were run for all the variables considered in this study. The results are presented here with the conceptual framework of empowerment considered in this study serving as the structure for presenting the results. This conceptual framework of empowerment developed by Naila Kabeer (1999) describes empowerment as a process of change building on one's resources (assets) and agency (decision) to get achievements (outcomes) of empowerment. This concept explains these three components of empowerment as interrelated components that enable individuals to make strategic and empowered choices (Kabeer, 1999). Thus, an individual with available resources (assets) and a good agency (decision) should be able to take an empowered choice to use contraception or not.

#### *Contextual/background variables*

Contextual/background variables refer to the social and demographic basics that are part of an individual's life. More of the respondents (34.3%) live in the Southern region and the fewest respondents (14.1%) live in the Greater Accra region which is the capital of Ghana, as shown in Table 1. With regards to age, Table 2 shows that most of the respondents (31.7%) were 35 years and older, while 21.1% were in the youngest age group (15-19 years). A little over half of the respondents (56%) live in the rural area as shown on Table 3. From Table 4 it is observed that more than half of the sample (60%) was currently married and 31.4% had never been married. From this table it is also seen that less of the respondents were divorced, that is about 8.5%.

Most of the respondents' partners were found in the oldest and youngest age groups; with 39.1% being 35 years and older and 20.6% being between the ages 15 and 19 as shown on Table 5. Less of the respondents' partners were currently married (53.1%) as compared to the respondents who were married and also fewer (4.5%) of the partners were currently divorced as compared to the respondents who were divorced. Majority of the respondents were Christians. 26.2% were non-Christians and belonged to other religions. Majority of the respondents (43.5%) belonged to the Akan ethnic group. In relation to fertility preference, more of the respondents wanted to have another child soon while 33.8% said they did not want to have any more children, this is shown on

Table 22. Next in line was fertility preference of the partners of the respondents and most of them said they did not want or could not have any more children.

### *Resources*

Resources (assets) for empowerment refer to the material resources like money as well as the human and social resources which are available to individuals and serve as tools to enhance the process of making strategic choices (Kabeer, 1999). The literacy level is low for respondents, with 47.4% of the sample being literate. The household wealth index of the sample is also represented on Table 8. The poor population is poorly represented in this sample with greater of the sample being found in the richer (19.5%) and richest (26.9%) wealth index groups. It is interesting to note from Table 9 that few of the respondents (12.1%) know of sources to get contraceptives.

From Table 10 it is seen that a great number of the respondents have attended school before. About 74.7% of the respondents answered that they have ever attended school. Similarly, respondents were asked about educational attainment and 25.3% said they had no education. Only about 3.7% had higher education while majority of the respondents (41.4%) had incomplete secondary education. Table 12 also gives information about respondent's health insurance subscription. About 41.8% of the respondents said they were covered by health insurance. With regards to respondents' occupation, more of the respondents had white collar jobs than those we had agriculture and labour jobs as shown on Table 15. A good number of the respondents (54.3%) had secondary or higher education when asked about their highest education as shown on Table 16.

The highest educational level of respondents' partners is also represented on Table 17 as a resource of empowerment for the respondents. Majority of the partners (66.8%) had secondary or higher education while a good number (15.9%) also had primary education. More than half of the respondents' partners (65.9%) responded that they were literate which is higher than the number of respondents who were literate. It is good to note from Table 20 that 98.5% of the partners had knowledge of a source of contraceptive which is higher than the number of respondents who don't know any source for contraceptive. Also, unlike respondent's occupation, more of the partners worked in the agriculture and labour sector, while 24.8% had white collar jobs. The

respondent-partner dyad literacy is shown on Table 21 and it shows that a good number of households (35.4%) have both the respondents and the partners being literate.

### *Agency*

The agency (decision) refers to being able to negotiate, bargain or have a reflective analysis of one's actions and decisions (Kabeer, 1999). The next table shows respondent's ideal number of children. There was not much difference in the number of respondents who want to have three or less children and those who wanted four children as well as those who wanted five or more children. In relation to respondents' desire for more children, close to half of respondents said they wanted to have more children after two years or more. It is interesting to note that most respondents (91.6%) said it was not a big problem for them to get permission from their partner to get medical care for themselves. Table 26 shows that more than half of the respondents (60.9%) said it was not justified in any instance for their partner to beat them.

In relation to partners' ideal number of children, it is shown on Table 28 that almost equal percentages of the partners wanted between one and three children, and four children like that of the respondents ideal number of children. However, more of the partners (38.2%) wanted five or more children. It is interesting to note that most of the partners said they do not discuss family planning issues with their partners as shown on Table 29. The respondent-partner dyad fertility preference on the next table, shows that majority of the sample came from households where only the respondent wanted more children.

The partner's approval of family planning shows that 11% of the partners strongly agreed that there is the need for family planning while few strongly disagreed with the need for family planning. However, majority of the partners agreed that there is the need for family planning. The partner's approval of domestic violence (husband beating wife) and shows that most of the partners (77.5%) said it was not justifiable in any instance for them to beat their partners. The scale for decisions on household expenditure shows that most of the respondents (690) said that it was both the respondent and the partner's decision on their household expenditure while 174 said it was only the partner who decided on their household expenditure.

### *Achievements*

Achievements (outcomes) basically refer to the resultant behaviour or choice made by an individual. It examines the functional achievements of decisions one makes (Kabeer, 1999). Table 34 show the frequency distribution of the respondents' use of contraceptive and intention to use in future. It is the main achievement variable measured in this study. More than half of the respondents were using a contraceptive or intended to use in the future. A small number of the respondents responded that they have ever terminated a pregnancy. It is interesting to note that little over half of the respondents answered that they have never used any contraceptive method. This also reflects in the pattern of contraceptive use, with a little over half of the respondents saying they were not using any contraceptive at all. When asked about the current type of contraceptive method being used, more respondents (81.3%) said they were not using any method of contraceptive.

Most of the respondents' partners (53.8%) said they had ever used a contraceptive. With regards to the partners' current type of contraceptive being used, more than half of them (76%) said they were not using any method and this is represented on Table 40. Respondent-partner dyad ever used any contraceptive method showed that more respondents belong to households where both the respondent and the partner have ever used a contraceptive method.

### **Correlations**

Correlations were computed between the outcome variable and all the potential predictor variables considered. The variables in the correlation analyses were also grouped in relation to the conceptual framework of empowerment as discussed earlier.

### *Contextual/background variables*

Table 42 shows that there is a significantly positive correlation between use of contraceptives and intention to use in future and the respondents' contextual/background variables. However there is no significant correlation between respondent's contraceptive use and intention to use in future and the type of residence of the respondent. There are no significant correlations between respondent's age and region as well as ethnicity. The next table also shows that there is no significant

correlation between the respondents' use of contraceptives and intention to use in future and the partners' age and marital status. There is, however, a significant positive correlation between partners' age and marital status ( $r = .75$ ). Respondents' fertility preference has a negative correlation with the outcome variable (-0.084).

### *Resources*

It is interesting to note on Table 44 that respondents' educational attainment has negative correlations with the respondents' use of contraceptives and intention to use in future as well as all the other resource variables. The next table shows that there is no correlation between being covered by health insurance and contraceptive use or intention to use contraceptives in future. In addition, Table 46 shows there is no significant correlation between respondents' use of contraceptives and intention to use in future and partners' knowledge of any contraceptive method and occupation.

### *Agency*

There respondents' contraceptive use and intention to use in future, is negatively influenced by respondents' desire for children ( $r = -.09$ ). As respondents' desire for more children increased the respondents' ideal number of children decreased, and as respondents' ideal number of children increases fertility preference decreases as shown on Table 47.

Respondents' use of contraceptives and intention to use in future is not significantly influenced by the partners' fertility preference and probability of discussing family planning with spouse. From the next table, respondents' use of contraceptives and intention to use in future is not significantly influenced by respondents' view on justified beating and scale for decision on household expenditure. From Table 50 it can be seen that respondent-partner dyad fertility preference does not have a significant influence on respondents' contraceptive use and intention to use in future.

### *Achievements*

Table 51 shows that ever terminated a pregnancy does not have a significant influence on respondents' contraceptive use and intention to use in future even though it has significant correlations with the other achievement variables. The next table also shows correlations between respondents' contraceptive use and intention to use in future and achievement variables from respondents' partners. It is interesting to note that there is no significant relationship between respondents' contraceptive use and intention to use in future and partner ever using any contraceptive method as well as partners' current type of contraceptive method being used.

### **Regression Analyses**

Logistic regression analysis was conducted to assess the extent to which each of the potential predictor variable predict the outcome variable, respondents' contraceptive use and intention to use in future. Preliminary logistic regression analysis was initially computed with all the potential predictor variables considered for the study. Then, the analysis was narrowed down to only the potential predictor variables that significantly predicted the outcome variable to arrive at a good fit regression model for the study. The tables presented represent the final models that were computed.

The first two variables in the model were respondents' age and region. These two variables, even though significant, are not part of the main model but they were analysed to serve as control variables for the model. With these two variables being constant, I checked how the other variables impact the outcome behaviour I am looking out for. The next independent variables added on to the model were respondents' highest education and ever attended school. Respondents' highest education had a significant (sig.) value of 0.012 and thus, contributes significantly to the outcome variable. Ever attended school, on the other hand, had a sig. value of 0.329 and does not make any significant contribution to the outcome variable. Thus, respondents' highest education is maintained in the model while ever attended school is taken out.

After taking ever attended school out of the model, the significance of the other variables left in the model increased. Region of residence went from sig. value of 0.17 to 0.11 and respondents' highest education went from sig. value of 0.12 to 0.000,

indicating strong significance of the values. The next variables added to the model were respondents' marital status, household wealth index and respondents' occupation. When these three variables were added, all the already existing variables in the model remained significant. Respondents' occupation was the only significant variable from the three added. Respondents' marital status and household wealth index were both not significant. After taking these two variables out, the rest of the variables in the model remained significant. Literacy and source known for any method of contraceptive were also added to the model. The variables already in the model before these two were added still remained significant. However the two variables were both not significant in relation to the outcome variable. They did not also have any impact on the other variables in the model in any significant way.

Respondents' fertility preference, respondents' ideal number of children and desire for more children did not have much impact on the other variables in the model. Respondents' ideal number of children had a sig. value of 0.000, thus having a strong impact on the outcome variable. Respondents' fertility preference and desire for more children were both not significant. Partners' highest education, ever used any contraceptive method, ideal number of children, approval of domestic violence and approval of family planning were added. All of these variables except partners' view on justified beating were not significant. Respondents' religion and ethnicity were also added to the model; ethnicity was not significant but religion was. Respondents' ideal number of children was also taken out of the model because in relation to the other variables in the model, it decreased the significance of the model. Table 53 and Table 54 show the final regression models that were produced.

From Table 53, only six independent variables are represented in the regression model (respondents' age, highest education, occupation, religion, partner's view on controlled childbearing and partner's view on justified beating). This model is statistically significant with a p-value of 0.000 and a chi-square of 298.702. The model also explains between 6.8% (Cox and Snell R square) and 9.1% (Nagelkerke R squared) of the variance in respondents' contraceptive use and intention to use in future. From the table, it can be seen all the variables have statistically significant contributions to the model and the outcome variable, even though one of the categories within respondents'



occupation is not significant. Respondents' highest education seems to have a stronger prediction of the respondents' contraceptive use and intention to use in future, with the categories having the highest odds ratio in the model (1.664 and 1.230). The Hosmer-Lemeshow goodness fit test for the model was 0.076 and support the model as being worthwhile.

From Table 54, the six independent variables are still represented in the regression model (respondents' age, highest education, occupation, religion, partner's view on controlled childbearing and partner's view on justified beating). However, the fourth category of the respondents' age is filtered out. This model is still statistically significant with a p-value of 0.000 and a chi-square of 175.784. This model also explains between 5.9% (Cox and Snell R square) and 8.1% (Nagelkerke R squared) of the variance in respondents' contraceptive use and intention to use in future. From Table 54, all the variables still have statistically significant contributions to the model and the outcome variable, even though one of the categories within respondents' occupation is still not significant. Respondents' with higher levels of education seem to have a stronger prediction of contraceptive use and intention to use in future, with the categories having the highest Odds Ratio in the model (1.435 and 1.918). The Hosmer-Lemeshow goodness fit test for this model was increased to 0.707 after the fourth category of the respondents' age was filtered out and this goes to support the model as being worthwhile.

## DISCUSSION

The main research question of the study is women's empowerment associated with the present and/or planned use of contraception among women in Ghana?

The findings of the study revealed that women's empowerment in Ghana to a positive significant level influence their contraceptive use and intention to use in future. It identified respondents' age as having a significant impact on women's decision to use contraceptive or intend to use in the future. There was, generally, a strong positive correlation ( $r = .10$ ) between respondents' age and their contraceptive use or intention to use in future. This shows that as women's age increase so does their desire to use contraceptive. Even though some other study showed that age did not have any significant effect on contraceptive use (Bogale et al., 2011), these findings support an earlier study by Kishor and Lekha (2008) which revealed that the older a woman is at the time of marriage, the more empowered she will be (Kishor & Lekha, 2008). They also found that generally, across most of countries including Ghana, where their study was conducted, older women were more empowered to take decisions on their own about their personal health care and daily household purchases, thus their contraceptive use (Kishor & Lekha, 2008). This may be associated with some cultural factors that exist in most Sub-Saharan African countries that tend to limit the opinions of the younger people in the society. It is assumed that younger people are not able to take well-informed decisions on their own.

As shown on Tables 53 and 54, even though the ages of respondents in generally had a strong positive correlation with contraceptive use and intention to use in future, the age groups between 20 and 34 had negative correlations with contraceptive use and intention to use in the future ( $B = -.72$ ,  $B = -.48$  and  $B = -.37$ ). It is worth noting that the two age groups at the extreme ends (15-19 and 35 and above) had positive correlations with respondents' contraceptive use and intention to use in future ( $B = -.42$ ). This could suggest that among the middle age groups some other factors in relation to age may be preventing them from using or planning to use contraceptives as compared to the youngest and the oldest age groups. This trend is evident in the dramatic change in the goodness fit of the regression model in Table 54 where the oldest age is filtered out. Thus, goodness fit improved with the Hosmer-Lemeshow goodness fit test increasing

from 0.076 to 0.707. This means that the age of women was not enough to empower them to use contraceptive, as it is shown in the final model on Table 54 where the older respondents used less contraceptives. This contradicts earlier findings and there will be the need to further explore to what extent age serves as a resource for empowerment and how it influences contraceptive use among women in Ghana.

Partners' age did not have a significant effect on the respondents' contraceptive use or intention to use in the future when included in the regression model. Even though partners' age had a positive correlation with respondents' contraceptive use or intention to use in the future, in the midst of other potential predictor variables it did not influence the respondents' decision to use a contraceptive or intention to use in future. However, Kishor and Lekha found that women who had a smaller age difference with their husbands were more empowered to take decisions on their own or jointly with their husbands (Kishor & Lekha, 2008). Thus, the husband's age had an influence on the kind of decision a respondent will make with regards to contraceptive use or intention for future use. However, a partner's age may be a relevant factor of empowerment but it does not significantly impact the woman's decision to use a contraceptive or plan to use in the future given other resources and factors.

The findings of this study also revealed that when respondents' have had high levels of education, it had a significant impact on the use of contraceptives or intention to use in the future. This variable shows in the logistic regression model to be the strongest predictor of the outcome variable, with very high correlation values (B-values) within the categories and the highest odds ratios in the entire model. This goes to support several studies like Ahmed et al. (2010), which established strong links between women's education, empowerment and contraceptive use. Higher educational levels predicted higher contraceptive use among women in developing countries (Ahmed et al., 2010). The study by Kishor and Lekha (2008) also revealed that higher levels of education give women greater empowerment and the resource to use contraceptives or plan to use in the future, and it is evident in this study (Kishor & Lekha, 2008). The point made by Hogan, et al. (1999) is also brought to bear here, in that, empowerment from other dimensions is not sufficient to increase contraceptive use. Instead, education goes a long way to make a significant difference (Hogan et al., 1999). This may infer

that education is a strong component of empowerment and on its own it seems to be a better predictor of women's contraceptive use than empowerment or autonomy as a whole (Al Riyami et al., 2004). Thus, Tawiah's emphasis on the need for higher education, at least, up to the Secondary School level for women in Ghana is made relevant here (Tawiah, 1997). There is, therefore, the need to pay more attention to female education in Ghana to help empower more women and give them the resource to have greater control of their health and contraceptive use.

The logistic regression analysis also revealed that even though the partners' level of education had a significant correlation with the respondents' contraceptive use or intention to use in future, it did not make any significant impact on the outcome variable when it occurred in the model. Thus, in the midst of other predictor variables partners' highest educational level is not likely to be a strong resource of empowerment and predictor of respondents' contraceptive use and intention to use in future. This contradicts findings from a study by Clements and Madise (2004) which stated that, the partner' level of education played a significant role in women's contraceptive use and that women whose partners had lower or no education were the least users of contraceptive (Clements & Madise, 2004). These findings do not also support DeRose and Ezeh's study (2005) in Ghana which revealed that a husband's education had a stronger influence on a wife's fertility intentions than did the woman's education (DeRose & Ezeh, 2005). This may mean that the trends are changing with regards to the partners' influence on women's empowerment as well as their contraceptive use.

Respondents' occupation was found to be a good resource of empowerment and had a significant influence on the respondents' decision to use a contraceptive or intention to use in future. Respondents' occupation also recorded high Odds Ratios as compared to the other predictor variables in the regression model. This implies that women's occupation has a high chance of predicting the outcome behaviour than most of the other predictor variables in the regression model. This finding is also evident in previous studies by Al Riyami et al. (2004) who found paid employment in Oman to be one of the strongest component of empowerment and predictor of contraceptive use among women (Al Riyami et al., 2004). This suggests that employment is a vital resource for empowerment since it gives women some level of social status and

economic independence and can influence their decisions to use contraceptives or plan to use in the near future. This study establishes that though a partner's occupation was a significant resource, it was not strong enough to predict the respondent's contraceptive use in the final model. However, Clements and Madise (2004) discovered that a partner's occupation was significant in predicting a wife's use of contraceptives in Tanzania (Clements & Madise, 2004). This difference in findings may be associated with country specific differences that exist in relation to how issues related to socio-economic factors and contraceptive use are addressed.

Respondents' religion had a significantly positive effect on their contraceptive use and intention to use in future. Christian respondents had a higher chance of using a contraceptive or planning to use in future than the non-Christian respondents (OR = 1.30). This result is in line with what was found by Clements and Madise (2004): that in Zimbabwe the Christians were more likely to use modern contraceptives than those belonging to any other religion while in Ghana, women who practised traditional religion were the least users of modern contraceptives (Clements & Madise, 2004). It also confirms findings from another study in Ghana which discovered that women who identified themselves as Muslims were using less contraceptives as compared to those who identified as Christians (Crissman et al., 2012). However, these results negate what Tawiah (1997) said about religion and ethnicity not being significant in influencing contraceptive use in spite of higher education (Tawiah, 1997). This goes to confirm that religion is a good resource of empowerment and impacts on the choices that women in Ghana make on contraceptive use or their intentions to use in the future. Much cannot be done about changing people's religion but it will be a good indicator for improving women's empowerment and contraceptive use in general if good practices are transferred to other religions.

With regards to partners' specific influence on respondents' contraceptive use and intention to use in future, a partner's approval of family planning is one of the two predictor variables that was significant and appeared in the final regression models. This variable was measured by partners' views on five questions about family planning and its benefits for the woman, the child and the family as a whole. It was found to be one agency of empowerment which significantly influences respondents' contraceptive use

and intention to use in future. If the partner has positive views about the need to control childbearing, it gives the woman a better agency to decide to use a contraceptive or plan to use it in the near future. This also means that a partner's view about the benefits of using contraceptives will empower a woman to use a contraceptive in Ghana. It is, therefore, necessary to intensify education for Ghanaian men on the benefits of contraceptive to achieve the outcome of empowered decisions on contraceptive use among women.

The final predictor variable that was significant and appeared in the final models of this study is partners' approval of domestic violence. This variable was also a scale that covered questions about domestic violence and justified reasons for beating respondents by their spouses. This was also identified as an agency of empowerment that significantly affected the respondents' contraceptive use and intention to use in future (OR= 1.10). An earlier study found that women who experienced any physical violence from their husbands were less likely to use any contraceptive (Stephenson, Koenig, Acharya, & Roy, 2008). This confirms that a partner's view on domestic violence is important and for that matter has a significant influence on a woman's decision to use a contraceptive or plans to use in future.

A similar predictor variable is respondents' approval of domestic violence. This variable was not significant and did not appear in the finally models. This suggests that a woman's view about beating and domestic violence at home does not influence her current use or plan to use contraceptives in future as compared to the husband's view. This implies that the male partner's view about beating the woman and for that matter he acting upon it has a significantly positive effect on women's empowerment in Ghana. Thus, to see more women being empowered and choosing to use contraceptives, there is the need to influence the views and actions of Ghanaian men towards domestic violence and beating at home.

The regression analyses showed that household wealth index was not a significant predictor of respondents' contraceptive use and intention to use in future. The analyses showed that contrary to other studies that have shown strong positive correlations between household wealth and women's use of contraception, this study did not find any relationships (Elfstrom & Stephenson, 2012; Ghana Statistical Service et al., 2009;

Kishor & Lekha, 2008; Larsen & Hollos, 2003). This is an interesting and controversial finding because it is generally assumed and supported by a number of studies that, when a woman belongs to a household with a high wealth index, she will be more empowered to use contraceptives (Elfstrom & Stephenson, 2012; Ghana Statistical Service et al., 2009; Kishor & Lekha, 2008; Larsen & Hollos, 2003). This contradictory finding may be as a result of the under-representation of the people with poor household wealth in the sample of this study. It will be necessary to have a more representative sample to find out if the household wealth index will still not influence Ghanaian women's contraceptive use and decision to use in future.

This study did not find the fertility preference of either the respondents or their partners to be significant in predicting outcome behaviour. Mason and Smith (2000) found that the husband's fertility preference had a significantly positive influence on the women's contraceptive use in a gender-stratified society (Mason & Smith, 2000). They found in Pakistan, India, Malaysia, Thailand and the Philippines that the husband's desire for more children had a significant positive effect on the woman's unmet needs of contraceptive use even though there were some exceptions (Mason & Smith, 2000). The final regression models of this study did not find the respondents fertility preference or their partners' fertility preference strong in influencing women's empowerment and impacting their use or intend to use contraceptives. This may suggest that in the midst of other resources and factors, fertility preference does not influence use or intention to use contraceptives. This explanation can even be confirmed by the exceptions to the rule which Mason and Smith (2000) pointed out in their study.

In addition, the findings of this study did not find respondents' knowledge of source of contraceptive method significant in empowering and influencing respondents' use or intention to use contraceptives. Even though this variable has a significantly positive correlation with the outcome variable, when it occurred in the logistic regression model it was not significant. This means that given other predictor variables, knowledge about where to find contraceptives will not influence the use or plan to use contraceptives in the near future. Earlier research shows this to be different: that knowledge of where to find contraceptives and information on contraception, in general, empowers more women to use contraceptives (Lasee & Becker, 1997). This suggests that the knowledge

of contraceptive source is not enough to empower a woman to use a contraceptive in Ghana. There is the need to put other measures in place to improve education and employment situations among others in order to achieve a better outcome of contraceptive use among women in Ghana.

Contrary to earlier findings in other studies, this study did not find strong correlations between the type of residence (rural/urban) and contraceptive use among women in Ghana. The results of regression analysis in the study revealed that there was no significant association between rural-urban residence and use or intention to use contraceptives in future. This finding is in line with Tawiah's findings (1997) that rural-urban residence as a socio-demographic factor, did not have any significant effect on the use of contraceptives in Ghana. This is quite interesting to note because a number of earlier studies have revealed that women in the urban areas have better conditions that make them more empowered to use or plan to use contraception than woman in the rural areas (Bogale et al., 2011; Mekonnen & Worku, 2011). This contradictory finding may be explained as a result of cultural and country differences. Most of the other studies that found associations between type of residence and contraceptive use were conducted in different countries. Thus, it can be concluded that the type of residence does not influence the decision to use contraceptive in the midst of other resources and factors of empowerment in Ghana.

The conceptual framework used in this study is reflected in the results obtained in this study. The framework by Naila Kabeer (1999) suggests that if one is exposed to resources of empowerment and has a good sense of agency then one will be able to arrive at an intelligent achievement or outcome (Kabeer, 1999). These inter-related components are reflected in the results of this study. This study observed that with resources (assets) of education and occupation, coupled with agency (decision latitude) of partners' approval of family planning and domestic violence, and contextual/background variables of age and religion, women in Ghana are empowered to use or plan to use contraceptives. This confirms that this framework is very practical in explaining the concept of empowerment in relation to family planning among women in Ghana.



It is important to note from this study that the predictor variables were significant in relation to the outcome variable and predicted good relationships between women's empowerment and contraceptive use in Ghana. However, these relationships are weak when compared to the results of other similar studies and this tends to limit the strength of the study. This limitation may be as a result of the sampling method and method of analyses. In future studies, different sampling and analyses methods may be employed to explore stronger relationships.

The data available for this study was very poor in predicting which respondents were planning not to use any contraceptives. It seems that GDHS data cannot give any justifiable response to this question. The views of non-users were poor or not represented at all in this study. This is due to the nature of the GDHS questions, as they focused more on finding the patterns of use. A better way will be to conduct qualitative studies which will focus on these non-users to shed more light on the issue and explore it in view of the subject of study.

It is worth noting that the study is also limited with regards to selection bias: the respondents who were found in the lowest or poorest categories of the various variables considered were poorly represented in the total sample of the study. This is evident in the percentage of missing data recorded for categories like youngest age group, no education, unemployed and non-Christian. This means that respondents found in these categories did not participate in this study by not giving responses to variables considered in the study.

## **CONCLUSION**

This study explored empowerment of Ghanaian women and their present use and/intended use of contraceptives in Ghana. The study revealed that education is a strong resource (asset) for empowerment and it has a strong positive association with contraceptive use among women in Ghana. It was also found that age is one contextual/background factor that influences the present use and/intended use of contraceptives among women in Ghana and for women between the age of 15 and 34, the younger are the more likely to use contraceptives. The occupation of women was also revealed to be a strong resource and has a significantly positive impact on the present use and/intended use of contraceptives. The effect of religion on the present use and/intended use of contraceptives in the study was also a positive one: Christians use and planned to use contraceptives. With regards to male partner influence on women's empowerment and contraceptive use, it was discovered that a partner's approval of family planning and approval of domestic violence served as good agency tools for women to make empowered choices on using or planning to use contraceptives in future.

These findings go to point to the fact that empowerment has a strong positive association with contraceptive use or intention to use among women in Ghana. Looking at the level of development in the country, the levels of fertility and the increasing populations, it is important to encourage more women to use contraceptives since low contraceptive use has been identified to contribute to high fertility levels in the country. The findings of this study, therefore identify the areas where individuals, health promoters, organizations, government and policy makers need to pay attention to in order to increase women's empowerment and in effect increase contraceptive use. When more women are educated, have good employment and receive positive attitudes from their partners on family planning as well as domestic violence they will be empowered to use more contraceptives. Positive religious actions towards contraception should also be encouraged. These will together help increase contraceptive use, improve maternal health, reduce fertility levels and contribute to the development of Ghana. Further research, especially qualitative research should be done in this area to establish stronger associations between women's empowerment and contraceptive use in Ghana.

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## **TABLES**

### **Descriptive statistics**

**Table 1: Region of residence**

	<b>Frequency</b>	<b>Per cent</b>	<b>Valid per cent</b>	<b>Cumulative per cent</b>
0 Southern	<b>1684</b>	<b>34.3</b>	<b>34.3</b>	<b>34.3</b>
1 Greater Accra	<b>692</b>	<b>14.1</b>	<b>14.1</b>	<b>48.3</b>
2 Middle	<b>1218</b>	<b>24.8</b>	<b>24.8</b>	<b>73.1</b>
3 Northern	<b>1322</b>	<b>26.9</b>	<b>26.9</b>	<b>100.0</b>
Total	<b>4916</b>	<b>100.0</b>	<b>100.0</b>	

**Table 2: Respondent's age**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 15-19	<b>1032</b>	<b>21.1</b>	<b>21.1</b>	<b>21.1</b>
1 20-24	<b>862</b>	<b>17.6</b>	<b>17.6</b>	<b>38.7</b>
2 25-29	<b>812</b>	<b>16.6</b>	<b>16.6</b>	<b>55.3</b>
3 30-34	<b>635</b>	<b>13.0</b>	<b>13.0</b>	<b>68.3</b>
4 35 and Above	<b>1553</b>	<b>31.7</b>	<b>31.7</b>	<b>100.0</b>
Total	<b>4894</b>	<b>100.0</b>	<b>100.0</b>	



**Table 3: Type of residence**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Urban	<b>2162</b>	<b>44.0</b>	<b>44.0</b>	<b>44.0</b>
1 Rural	<b>2754</b>	<b>56.0</b>	<b>56.0</b>	<b>100.0</b>
Total	<b>4916</b>	<b>100.0</b>	<b>100.0</b>	

**Table 4: Respondent's marital status**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Never married	<b>1546</b>	<b>31.4</b>	<b>31.4</b>	<b>31.4</b>
1 Currently married	<b>2950</b>	<b>60.0</b>	<b>60.0</b>	<b>91.5</b>
2 Formerly married	<b>420</b>	<b>8.5</b>	<b>8.5</b>	<b>100.0</b>
Total	<b>4916</b>	<b>100.0</b>	<b>100.0</b>	

**Table 5: Partner's age**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 15-19	<b>942</b>	<b>19.2</b>	<b>20.6</b>	<b>20.6</b>
1 20-24	<b>706</b>	<b>14.4</b>	<b>15.5</b>	<b>36.1</b>
2 25-29	<b>608</b>	<b>12.4</b>	<b>13.3</b>	<b>49.4</b>
3 30-34	<b>524</b>	<b>10.7</b>	<b>11.5</b>	<b>60.9</b>
4 35 and Above	<b>1788</b>	<b>36.4</b>	<b>39.1</b>	<b>100.0</b>
Total	<b>4568</b>	<b>92.9</b>	<b>100.0</b>	
Missing System	<b>348</b>	<b>7.1</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 6: Partner's marital status**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Never married	<b>1940</b>	<b>39.5</b>	<b>42.5</b>	<b>42.5</b>
1 Currently married	<b>2424</b>	<b>49.3</b>	<b>53.1</b>	<b>95.5</b>
2 Formerly married	<b>204</b>	<b>4.1</b>	<b>4.5</b>	<b>100.0</b>
Total	<b>4568</b>	<b>92.9</b>	<b>100.0</b>	
Missing System	<b>348</b>	<b>7.1</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 7: Literacy**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Can read	<b>2329</b>	<b>47.4</b>	<b>47.4</b>	<b>47.4</b>
1 Cannot read at all	<b>2562</b>	<b>52.1</b>	<b>52.2</b>	<b>99.6</b>
2 Missing	<b>18</b>	<b>.4</b>	<b>.4</b>	<b>100.0</b>
Total	<b>4909</b>	<b>99.9</b>	<b>100.0</b>	
Missing System	<b>7</b>	<b>.1</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 8: Household wealth index**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Richest	<b>1323</b>	<b>26.9</b>	<b>26.9</b>	<b>26.9</b>
1 Richer	<b>958</b>	<b>19.5</b>	<b>19.5</b>	<b>46.4</b>
2 Middle	<b>903</b>	<b>18.4</b>	<b>18.4</b>	<b>64.8</b>
3 Poorer	<b>883</b>	<b>18.0</b>	<b>18.0</b>	<b>82.7</b>
4 Poorest	<b>849</b>	<b>17.3</b>	<b>17.3</b>	<b>100.0</b>
Total	<b>4916</b>	<b>100.0</b>	<b>100.0</b>	

**Table 9: Source known for any contraceptive method**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Yes	<b>586</b>	<b>11.9</b>	<b>12.1</b>	<b>12.1</b>
1 No	<b>4271</b>	<b>86.9</b>	<b>87.9</b>	<b>100.0</b>
Total	<b>4857</b>	<b>98.8</b>	<b>100.0</b>	
Missing System	<b>59</b>	<b>1.2</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 10: Respondent ever attended school**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Yes	<b>3673</b>	<b>74.7</b>	<b>74.7</b>	<b>74.7</b>
1 No	<b>1243</b>	<b>25.3</b>	<b>25.3</b>	<b>100.0</b>
Total	<b>4916</b>	<b>100.0</b>	<b>100.0</b>	



**Table 11: Respondent's educational attainment**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 No education	<b>1243</b>	<b>25.3</b>	<b>25.3</b>	<b>25.3</b>
1 Incomplete primary	<b>738</b>	<b>15.0</b>	<b>15.0</b>	<b>40.3</b>
2 Complete primary	<b>261</b>	<b>5.3</b>	<b>5.3</b>	<b>45.6</b>
3 Incomplete secondary	<b>2033</b>	<b>41.4</b>	<b>41.4</b>	<b>87.0</b>
4 Complete secondary	<b>456</b>	<b>9.3</b>	<b>9.3</b>	<b>96.3</b>
5 Higher	<b>181</b>	<b>3.7</b>	<b>3.7</b>	<b>100.0</b>
Total	<b>4912</b>	<b>99.9</b>	<b>100.0</b>	
Missing System	<b>4</b>	<b>.1</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 12: Covered by health insurance**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Yes	<b>2050</b>	<b>41.7</b>	<b>41.8</b>	<b>41.8</b>
1 No	<b>2860</b>	<b>58.2</b>	<b>58.2</b>	<b>100.0</b>
Total	<b>4910</b>	<b>99.9</b>	<b>100.0</b>	
Missing	System	<b>6</b>	<b>.1</b>	
Total	<b>4916</b>	<b>100.0</b>		

**Table 13: Respondent's ethnicity**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Akan	<b>2136</b>	<b>43.4</b>	<b>43.5</b>	<b>43.5</b>
1 Other	<b>2778</b>	<b>56.5</b>	<b>56.5</b>	<b>100.0</b>
Total	<b>4914</b>	<b>100.0</b>	<b>100.0</b>	
Missing System	<b>2</b>	<b>.0</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 14: Religion**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Christian	<b>3610</b>	<b>73.8</b>	<b>73.8</b>	<b>73.8</b>
1 Non-Christian	<b>1281</b>	<b>26.2</b>	<b>26.2</b>	<b>100.0</b>
Total	<b>4891</b>	<b>99.9</b>	<b>100.0</b>	
Missing System	<b>3</b>	<b>.1</b>		
Total	<b>4894</b>	<b>100.0</b>		

**Table 15: Respondent's occupation**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 White collar	<b>2013</b>	<b>41.1</b>	<b>41.6</b>	<b>41.6</b>
1 Agriculture and Labour	<b>1730</b>	<b>35.3</b>	<b>35.7</b>	<b>77.3</b>
2 Unemployed	<b>1101</b>	<b>22.5</b>	<b>22.7</b>	<b>100.0</b>
Total	<b>4844</b>	<b>99.0</b>	<b>100.0</b>	
Missing System	<b>50</b>	<b>1.0</b>		
Total	<b>4894</b>	<b>100.0</b>		

**Table 16: Respondent's highest education**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Secondary and Higher Level	<b>2655</b>	<b>54.3</b>	<b>54.3</b>	<b>54.3</b>
1 Primary	<b>994</b>	<b>20.3</b>	<b>20.3</b>	<b>74.6</b>
2 No Education	<b>1241</b>	<b>25.4</b>	<b>25.4</b>	<b>100.0</b>
Total	<b>4890</b>	<b>99.9</b>	<b>100.0</b>	
Missing System	<b>4</b>	<b>.1</b>		
Total	<b>4894</b>	<b>100.0</b>		

**Table 17: Partner's highest education**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Secondary/Higher	<b>3042</b>	<b>61.9</b>	<b>66.8</b>	<b>66.8</b>
1 Primary	<b>723</b>	<b>14.7</b>	<b>15.9</b>	<b>82.6</b>
2 No education	<b>792</b>	<b>16.1</b>	<b>17.4</b>	<b>100.0</b>
Total	<b>4557</b>	<b>92.7</b>	<b>100.0</b>	
Missing System	<b>359</b>	<b>7.3</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 18: Partner's Literacy**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Can read	<b>3000</b>	<b>61.0</b>	<b>65.9</b>	<b>65.9</b>
1 Cannot read at all	<b>1532</b>	<b>31.2</b>	<b>33.7</b>	<b>99.6</b>
2 Missing	<b>17</b>	<b>.3</b>	<b>.4</b>	<b>100.0</b>
Total	<b>4549</b>	<b>92.5</b>	<b>100.0</b>	
Missing System	<b>367</b>	<b>7.5</b>		
Total	<b>4916</b>	<b>100.0</b>		



**Table 19: Partner's knowledge of any contraceptive method**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Yes	<b>4499</b>	<b>91.5</b>	<b>98.5</b>	<b>98.5</b>
1 No	<b>69</b>	<b>1.4</b>	<b>1.5</b>	<b>100.0</b>
Total	<b>4568</b>	<b>92.9</b>	<b>100.0</b>	
Missing	System	<b>348</b>	<b>7.1</b>	
Total	<b>4916</b>	<b>100.0</b>		

**Table 20: Partner ever used any contraceptive method**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Yes	<b>2459</b>	<b>50.0</b>	<b>53.8</b>	<b>53.8</b>
1 No	<b>2109</b>	<b>42.9</b>	<b>46.2</b>	<b>100.0</b>
Total	<b>4568</b>	<b>92.9</b>	<b>100.0</b>	
Missing	System	<b>348</b>	<b>7.1</b>	
Total		<b>4916</b>	<b>100.0</b>	

**Table 21: Respondent-partner dyad literacy**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Both literate	<b>1595</b>	<b>32.4</b>	<b>35.4</b>	<b>35.4</b>
1 Only respondent literate	<b>1386</b>	<b>28.2</b>	<b>30.7</b>	<b>66.1</b>
2 Only partner literate	<b>616</b>	<b>12.5</b>	<b>13.7</b>	<b>79.7</b>
3 Both not literate	<b>914</b>	<b>18.6</b>	<b>20.3</b>	<b>100.0</b>
Total	<b>4511</b>	<b>91.8</b>	<b>100.0</b>	
Missing System	<b>405</b>	<b>8.2</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 22: Respondent's fertility preference**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Unable to have/don't want another child	<b>1656</b>	<b>33.7</b>	<b>33.8</b>	<b>33.8</b>
1 Have another child	<b>3249</b>	<b>66.1</b>	<b>66.2</b>	<b>100.0</b>
Total	<b>4905</b>	<b>99.8</b>	<b>100.0</b>	
Missing System	<b>11</b>	<b>.2</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 23: Respondent's ideal number of children**

		Frequency	Per cent	Valid Per cent	Cumulative Per cent
0	0-3 or non-numeric	<b>1589</b>	<b>32.3</b>	<b>32.3</b>	<b>32.3</b>
1	4	<b>1686</b>	<b>34.3</b>	<b>34.3</b>	<b>66.6</b>
2	5 or more	<b>1641</b>	<b>33.4</b>	<b>33.4</b>	<b>100.0</b>
Total		<b>4916</b>	<b>100.0</b>	<b>100.0</b>	

**Table 24: Respondent's desire for more children**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Want no more/ unable to have more	<b>1328</b>	<b>27.0</b>	<b>27.1</b>	<b>27.1</b>
1 Unsure about time/ Undecided	<b>1286</b>	<b>26.2</b>	<b>26.2</b>	<b>53.3</b>
2 Within 2 year/ After 2 years	<b>2291</b>	<b>46.6</b>	<b>46.7</b>	<b>100.0</b>
Total	<b>4905</b>	<b>99.8</b>	<b>100.0</b>	
Missing System	<b>11</b>	<b>.2</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 25: Permission needed to get medical care for self**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Not a big problem	<b>4494</b>	<b>91.4</b>	<b>91.6</b>	<b>91.6</b>
1 Big problem	<b>411</b>	<b>8.4</b>	<b>8.4</b>	<b>100.0</b>
Total	<b>4905</b>	<b>99.8</b>	<b>100.0</b>	
Missing System	<b>11</b>	<b>.2</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 26: Respondent's approval of domestic violence**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Not justified	<b>2875</b>	<b>58.5</b>	<b>60.9</b>	<b>60.9</b>
1 Justified in one instance	<b>517</b>	<b>10.5</b>	<b>11.0</b>	<b>71.9</b>
2 Justified in two instances	<b>455</b>	<b>9.3</b>	<b>9.6</b>	<b>81.6</b>
3 Justified in three instances	<b>424</b>	<b>8.6</b>	<b>9.0</b>	<b>90.5</b>
4 Justified in four instances	<b>239</b>	<b>4.9</b>	<b>5.1</b>	<b>95.6</b>
5 Justified in all Instances	<b>207</b>	<b>4.2</b>	<b>4.4</b>	<b>100.0</b>
Total	<b>4717</b>	<b>96.0</b>	<b>100.0</b>	
Missing System	<b>199</b>	<b>4.0</b>		
Total	<b>4916</b>	<b>100.0</b>		



**Table 27: Partner's fertility preference**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Unable to have/don't want another child	<b>3125</b>	<b>63.6</b>	<b>68.5</b>	<b>68.5</b>
1 Have another child	<b>1437</b>	<b>29.2</b>	<b>31.5</b>	<b>100.0</b>
Total	<b>4562</b>	<b>92.8</b>	<b>100.0</b>	
Missing System	<b>354</b>	<b>7.2</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 28: Partner's ideal number of children**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 0-3 or non-numeric	<b>1469</b>	<b>29.9</b>	<b>32.2</b>	<b>32.2</b>
1 4	<b>1356</b>	<b>27.6</b>	<b>29.7</b>	<b>61.8</b>
2 5 or more	<b>1743</b>	<b>35.5</b>	<b>38.2</b>	<b>100.0</b>
Total	<b>4568</b>	<b>92.9</b>	<b>100.0</b>	
Missing System	<b>348</b>	<b>7.1</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 29: Partner discusses family planning with wife/Partner**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Yes	<b>1054</b>	<b>21.4</b>	<b>23.2</b>	<b>23.2</b>
1 No	<b>3493</b>	<b>71.1</b>	<b>76.8</b>	<b>100.0</b>
Total	<b>4547</b>	<b>92.5</b>	<b>100.0</b>	
Missing System	<b>369</b>	<b>7.5</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 30: Respondent-partner dyad fertility preference**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Both Don't want more children	<b>1046</b>	<b>21.3</b>	<b>23.0</b>	<b>23.0</b>
1 Only respondent wants more children	<b>2072</b>	<b>42.1</b>	<b>45.5</b>	<b>68.5</b>
2 Only partner wants more children	<b>513</b>	<b>10.4</b>	<b>11.3</b>	<b>79.8</b>
3 Both want more children	<b>921</b>	<b>18.7</b>	<b>20.2</b>	<b>100.0</b>
Total	<b>4552</b>	<b>92.6</b>	<b>100.0</b>	
Missing System	<b>364</b>	<b>7.4</b>		
Total	<b>4916</b>	<b>100.0</b>		

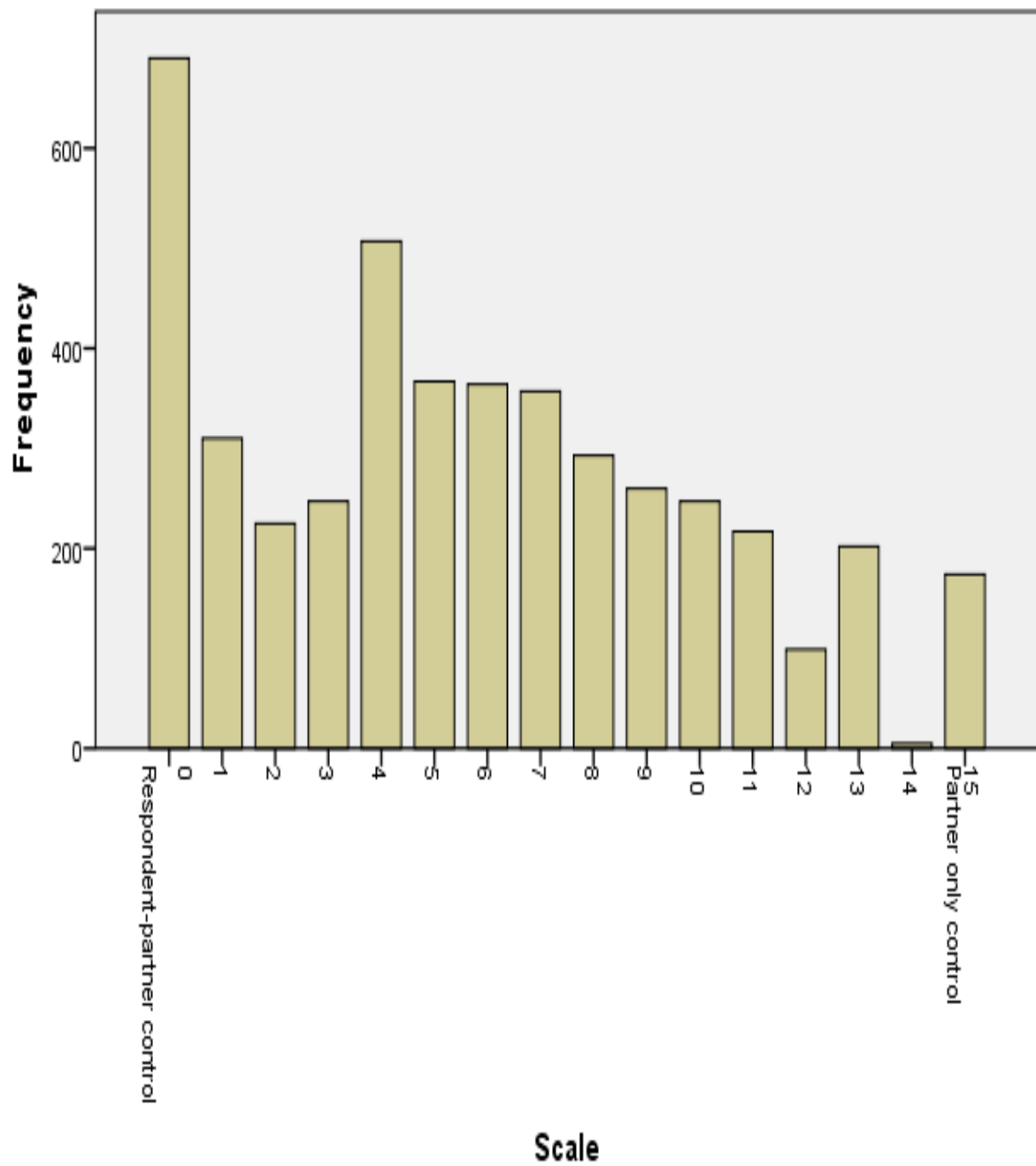
**Table 31: Partner's approval of family planning**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Strongly agree	<b>483</b>	<b>9.8</b>	<b>11.0</b>	<b>11.0</b>
1 Agree	<b>3016</b>	<b>61.4</b>	<b>68.9</b>	<b>79.9</b>
2 Agree somewhat	<b>621</b>	<b>12.6</b>	<b>14.2</b>	<b>94.1</b>
3 Disagree	<b>178</b>	<b>3.6</b>	<b>4.1</b>	<b>98.2</b>
4 Strongly disagree	<b>81</b>	<b>1.6</b>	<b>1.8</b>	<b>100.0</b>
Total	<b>4379</b>	<b>89.1</b>	<b>100.0</b>	
Missing System	<b>537</b>	<b>10.9</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 32: Partner's approval of domestic violence**

	Frequency	Percent	Valid Percent	Cumulative Percent
0 Not justified	<b>3474</b>	<b>70.7</b>	<b>77.5</b>	<b>77.5</b>
1 Justified in an instance	<b>401</b>	<b>8.2</b>	<b>8.9</b>	<b>86.5</b>
2 Justified in two instances	<b>277</b>	<b>5.6</b>	<b>6.2</b>	<b>92.7</b>
3 Justified in three instances	<b>166</b>	<b>3.4</b>	<b>3.7</b>	<b>96.4</b>
4 Justified in four instances	<b>76</b>	<b>1.5</b>	<b>1.7</b>	<b>98.1</b>
5 Justified in five or more instances	<b>87</b>	<b>1.8</b>	<b>1.9</b>	<b>100.0</b>
Total	<b>4481</b>	<b>91.2</b>	<b>100.0</b>	
Missing System	<b>435</b>	<b>8.8</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 33: Scale for decisions on household expenditure**



**Table 34: Respondent's contraceptive use and intention to use in future**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Using a method now or Intention to use later	<b>2829</b>	<b>57.5</b>	<b>57.5</b>	<b>57.5</b>
1 Does not intend to use	<b>2087</b>	<b>42.5</b>	<b>42.5</b>	<b>100.0</b>
Total	<b>4916</b>	<b>100.0</b>	<b>100.0</b>	



**Table 35: Respondent ever terminated a pregnancy**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Yes	<b>791</b>	<b>16.1</b>	<b>16.1</b>	<b>16.1</b>
1 No	<b>4122</b>	<b>83.8</b>	<b>83.9</b>	<b>100.0</b>
Total	<b>4913</b>	<b>99.9</b>	<b>100.0</b>	
Missing System	<b>3</b>	<b>.1</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 36: Respondent ever used any contraceptive method**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Yes	<b>2409</b>	<b>49.0</b>	<b>49.0</b>	<b>49.0</b>
1 No	<b>2507</b>	<b>51.0</b>	<b>51.0</b>	<b>100.0</b>
Total	<b>4916</b>	<b>100.0</b>	<b>100.0</b>	

**Table 37: Respondent's pattern of use of contraceptive**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Currently using	921	18.7	18.7	18.7
1 Used since last birth	573	11.7	11.7	30.4
2 Used before last birth	918	18.7	18.7	49.1
3 Never used	2504	50.9	50.9	100.0
Total	4916	100.0	100.0	

**Table 38: Respondent's current type of contraceptive method being used**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Using a method	<b>921</b>	<b>18.7</b>	<b>18.7</b>	<b>18.7</b>
1 No method	<b>3995</b>	<b>81.3</b>	<b>81.3</b>	<b>100.0</b>
Total	<b>4916</b>	<b>100.0</b>	<b>100.0</b>	

**Table 39: Partner ever used any contraceptive method**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Yes	<b>2459</b>	<b>50.0</b>	<b>53.8</b>	<b>53.8</b>
1 No	<b>2109</b>	<b>42.9</b>	<b>46.2</b>	<b>100.0</b>
Total	<b>4568</b>	<b>92.9</b>	<b>100.0</b>	
Missing System	<b>348</b>	<b>7.1</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 40: Partner's current type of contraceptive method being used**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Using a method	<b>1098</b>	<b>22.3</b>	<b>24.0</b>	<b>24.0</b>
1 No method	<b>3470</b>	<b>70.6</b>	<b>76.0</b>	<b>100.0</b>
Total	<b>4568</b>	<b>92.9</b>	<b>100.0</b>	
Missing System	<b>348</b>	<b>7.1</b>		
Total	<b>4916</b>	<b>100.0</b>		

**Table 41: Respondent-partner dyad ever used any contraceptive method**

	Frequency	Per cent	Valid Per cent	Cumulative Per cent
0 Both ever used	<b>1290</b>	<b>26.2</b>	<b>28.2</b>	<b>28.2</b>
1 Only respondent ever used	<b>1169</b>	<b>23.8</b>	<b>25.6</b>	<b>53.8</b>
2 Only partner ever used	<b>991</b>	<b>20.2</b>	<b>21.7</b>	<b>75.5</b>
3 Both never used	<b>1118</b>	<b>22.7</b>	<b>24.5</b>	<b>100.0</b>
Total	<b>4568</b>	<b>92.9</b>	<b>100.0</b>	
Missing System	<b>348</b>	<b>7.1</b>		
Total	<b>4916</b>	<b>100.0</b>		

## Correlations

### Pearson Product-moment Correlations among all variables considered in the study.

(Arranged in relation to the theoretical framework for empowerment)

**Table 42: Correlations between the outcome variable and sociodemographic characteristic variables for respondent.**

		Respondent's contraceptive use and intention to use in future	Respondent's age	Respondent's marital status	Region of residence	Type of residence	Ethnicity
Respondent's contraceptive use and intention to use in future	Pearson Correlation	<b>1</b>	<b>.096**</b>	<b>.060**</b>	<b>.048**</b>	<b>.009</b>	<b>.042**</b>
	Sig. (2-tailed)		<b>.000</b>	<b>.000</b>	<b>.001</b>	<b>.529</b>	<b>.003</b>
	N	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4914</b>
Respondent's age	Pearson Correlation	<b>.096**</b>	<b>1</b>	<b>.645**</b>	<b>-.015</b>	<b>.032*</b>	<b>-.012</b>
	Sig. (2-tailed)	<b>.000</b>		<b>.000</b>	<b>.278</b>	<b>.023</b>	<b>.385</b>
	N	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4914</b>
Respondent's marital status	Pearson Correlation	<b>.060**</b>	<b>.645**</b>	<b>1</b>	<b>.022</b>	<b>.099**</b>	<b>.005</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.000</b>		<b>.116</b>	<b>.000</b>	<b>.749</b>
	N	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4914</b>
Region of residence	Pearson Correlation	<b>.048**</b>	<b>-.015</b>	<b>.022</b>	<b>1</b>	<b>.107**</b>	<b>.299**</b>
	Sig. (2-tailed)	<b>.001</b>	<b>.278</b>	<b>.116</b>		<b>.000</b>	<b>.000</b>
	N	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4914</b>
Type of residence	Pearson Correlation	<b>.009</b>	<b>.032*</b>	<b>.099**</b>	<b>.107**</b>	<b>1</b>	<b>.161**</b>
	Sig. (2-tailed)	<b>.529</b>	<b>.023</b>	<b>.000</b>	<b>.000</b>		<b>.000</b>
	N	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>	<b>4914</b>
Ethnicity	Pearson Correlation	<b>.042**</b>	<b>-.012</b>	<b>.005</b>	<b>.299**</b>	<b>.161**</b>	<b>1</b>
	Sig. (2-tailed)	<b>.003</b>	<b>.385</b>	<b>.749</b>	<b>.000</b>	<b>.000</b>	
	N	<b>4914</b>	<b>4914</b>	<b>4914</b>	<b>4914</b>	<b>4914</b>	<b>4914</b>

Correlation is significant at the 0.05 level (2-tailed).\*

Correlation is significant at the 0.01 level (2-tailed).\*\*



**Table 43: Correlations between outcome variable and partner's sociodemographic characteristic variables**

		Respondent's contraceptive use and intention to use in future	Partner's age	Partner's marital status
Respondent's contraceptive use and intention to use in future	Pearson Correlation	<b>1</b>	<b>.006</b>	<b>.015</b>
	Sig. (2-tailed)		<b>.675</b>	<b>.310</b>
	N	<b>4916</b>	<b>4568</b>	<b>4568</b>
Partner's age	Pearson Correlation	<b>.006</b>	<b>1</b>	<b>.747**</b>
	Sig. (2-tailed)	<b>.675</b>		<b>.000</b>
	N	<b>4568</b>	<b>4568</b>	<b>4568</b>
Partner's marital status	Pearson Correlation	<b>.015</b>	<b>.747**</b>	<b>1</b>
	Sig. (2-tailed)	<b>.310</b>	<b>.000</b>	
	N	<b>4568</b>	<b>4568</b>	<b>4568</b>

Correlation is significant at the 0.01 level (2-tailed).\*\*

**Table 44: Correlations between outcome variable and respondent's resource variables**

		Respondent's contraceptive use and intention to use in future	Respondent's highest education	Literacy	Source Known for any contraceptive method	Ever Attended School	Educational Attainment
Respondent's contraceptive use and intention to use in future	Pearson Correlation	<b>1</b>	<b>.117**</b>	<b>.077**</b>	<b>.321**</b>	<b>.113**</b>	<b>-.122**</b>
	Sig. (2-tailed)		<b>.000</b>	<b>.000</b>	<b>.000</b>	<b>.000</b>	<b>.000</b>
	N	<b>4916</b>	<b>4912</b>	<b>4909</b>	<b>4857</b>	<b>4916</b>	<b>4912</b>
Respondent's highest education level	Pearson Correlation	<b>.117**</b>	<b>1</b>	<b>.680**</b>	<b>.038**</b>	<b>.890**</b>	<b>-.943**</b>
	Sig. (2-tailed)	<b>.000</b>		<b>.000</b>	<b>.008</b>	<b>.000</b>	<b>.000</b>
	N	<b>4912</b>	<b>4912</b>	<b>4906</b>	<b>4853</b>	<b>4912</b>	<b>4912</b>
Literacy	Pearson Correlation	<b>.077**</b>	<b>.680**</b>	<b>1</b>	<b>-.003</b>	<b>.531**</b>	<b>-.714**</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.000</b>		<b>.836</b>	<b>.000</b>	<b>.000</b>
	N	<b>4909</b>	<b>4906</b>	<b>4909</b>	<b>4850</b>	<b>4909</b>	<b>4906</b>
Source known for any contraceptive Method	Pearson Correlation	<b>.321**</b>	<b>.038**</b>	<b>-.003</b>	<b>1</b>	<b>.040**</b>	<b>-.036*</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.008</b>	<b>.836</b>		<b>.006</b>	<b>.012</b>
	N	<b>4857</b>	<b>4853</b>	<b>4850</b>	<b>4857</b>	<b>4857</b>	<b>4853</b>
Ever attended school	Pearson Correlation	<b>.113**</b>	<b>.890**</b>	<b>.531**</b>	<b>.040**</b>	<b>1</b>	<b>-.792**</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.000</b>	<b>.000</b>	<b>.006</b>		<b>.000</b>
	N	<b>4916</b>	<b>4912</b>	<b>4909</b>	<b>4857</b>	<b>4916</b>	<b>4912</b>
Educational attainment	Pearson Correlation	<b>-.122**</b>	<b>-.943**</b>	<b>-.714**</b>	<b>-.036*</b>	<b>-.792**</b>	<b>1</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.000</b>	<b>.000</b>	<b>.012</b>	<b>.000</b>	
	N	<b>4912</b>	<b>4912</b>	<b>4906</b>	<b>4853</b>	<b>4912</b>	<b>4912</b>

Correlation is significant at the 0.05 level (2-tailed).\*

Correlation is significant at the 0.01 level (2-tailed).\*\*

**Table 45: Correlations between outcome variable and respondent's resource variables**

		Respondent's contraceptive use and intention to use in future	Respondent's occupation	Covered by health insurance	Religion
Respondent's contraceptive use and intention to use in future	Pearson Correlation	<b>1</b>	<b>.053**</b>	<b>-.010</b>	<b>.085**</b>
	Sig. (2-tailed)		<b>.000</b>	<b>.480</b>	<b>.000</b>
	N	<b>4916</b>	<b>4866</b>	<b>4910</b>	<b>4913</b>
Respondent's occupation	Pearson Correlation	<b>.053**</b>	<b>1</b>	<b>.037**</b>	<b>.056**</b>
	Sig. (2-tailed)	<b>.000</b>		<b>.010</b>	<b>.000</b>
	N	<b>4866</b>	<b>4866</b>	<b>4860</b>	<b>4863</b>
Covered by health insurance	Pearson Correlation	<b>-.010</b>	<b>.037**</b>	<b>1</b>	<b>.056**</b>
	Sig. (2-tailed)	<b>.480</b>	<b>.010</b>		<b>.000</b>
	N	<b>4910</b>	<b>4860</b>	<b>4910</b>	<b>4907</b>
Religion	Pearson Correlation	<b>.085**</b>	<b>.056**</b>	<b>.056**</b>	<b>1</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.000</b>	<b>.000</b>	
	N	<b>4913</b>	<b>4863</b>	<b>4907</b>	<b>4913</b>

Correlation is significant at the 0.01 level (2-tailed).\*\*

**Table 46: Correlations between outcome variable and partner's resource variables**

		Respondent's contraceptive use and intention to use in future	Partner's literacy	Partner's knowledge of any contraceptive method	Partner's highest education	Partner's occupation
Respondent's contraceptive use and intention to use in future	Pearson Correlation	<b>1</b>	<b>.058**</b>	<b>.023</b>	<b>.064**</b>	<b>.014</b>
	Sig. (2-tailed)		<b>.000</b>	<b>.114</b>	<b>.000</b>	<b>.343</b>
	N	<b>4916</b>	<b>4549</b>	<b>4568</b>	<b>4557</b>	<b>4420</b>
Partner's literacy	Pearson Correlation	<b>.058**</b>	<b>1</b>	<b>.088**</b>	<b>.733**</b>	<b>.045**</b>
	Sig. (2-tailed)	<b>.000</b>		<b>.000</b>	<b>.000</b>	<b>.003</b>
	N	<b>4549</b>	<b>4549</b>	<b>4549</b>	<b>4542</b>	<b>4401</b>
Partner's knowledge of any contraceptive method	Pearson Correlation	<b>.023</b>	<b>.088**</b>	<b>1</b>	<b>.119**</b>	<b>.050**</b>
	Sig. (2-tailed)	<b>.114</b>	<b>.000</b>		<b>.000</b>	<b>.001</b>
	N	<b>4568</b>	<b>4549</b>	<b>4568</b>	<b>4557</b>	<b>4420</b>
Partner's highest education	Pearson Correlation	<b>.064**</b>	<b>.733**</b>	<b>.119**</b>	<b>1</b>	<b>.074**</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.000</b>	<b>.000</b>		<b>.000</b>
	N	<b>4557</b>	<b>4542</b>	<b>4557</b>	<b>4557</b>	<b>4409</b>
Partner's occupation	Pearson Correlation	<b>.014</b>	<b>.045**</b>	<b>.050**</b>	<b>.074**</b>	<b>1</b>
	Sig. (2-tailed)	<b>.343</b>	<b>.003</b>	<b>.001</b>	<b>.000</b>	
	N	<b>4420</b>	<b>4401</b>	<b>4420</b>	<b>4409</b>	<b>4420</b>

Correlation is significant at the 0.01 level (2-tailed).\*\*

**Table 47: Correlations between outcome variable and respondent's sense of agency variables**

		Respondent's contraceptive use and intention to use in future	Permission needed to get medical care for self	Respondent's desire for more children	Respondent's ideal number of children	Respondent's fertility preference
Respondent's contraceptive use and intention to use in future	Pearson Correlation	1	.042**	-.078**	.088**	-.084**
	Sig. (2-tailed)		.003	.000	.000	.000
	N	4916	4905	4905	4916	4905
Permission needed to get medical care for self	Pearson Correlation	.042**	1	.067**	.054**	.072**
	Sig. (2-tailed)	.003		.000	.000	.000
	N	4905	4905	4894	4905	4894
Respondent's desire for more children	Pearson Correlation	-.078**	.067**	1	-.017	.852**
	Sig. (2-tailed)	.000	.000		.223	.000
	N	4905	4894	4905	4905	4905
Respondent's ideal number of children	Pearson Correlation	.088**	.054**	-.017	1	-.091**
	Sig. (2-tailed)	.000	.000	.223		.000
	N	4916	4905	4905	4916	4905
Respondent's fertility preference	Pearson Correlation	-.084**	.072**	.852**	-.091**	1
	Sig. (2-tailed)	.000	.000	.000	.000	
	N	4905	4894	4905	4905	4905

Correlation is significant at the 0.01 level (2-tailed).\*\*

**Table 48: Correlations between outcome variable and partner’s sense of agency variables**

		Respondent's contraceptive use and intention to use in future	Partner's fertility preference	Partner's ideal number of children	Discuss family planning with wife/partner
Respondent's contraceptive use and intention to use in future	Pearson	<b>1</b>	<b>.027</b>	<b>.047**</b>	<b>.014</b>
	Correlation		<b>.063</b>	<b>.001</b>	<b>.336</b>
	Sig. (2-tailed)				
	N	<b>4916</b>	<b>4562</b>	<b>4568</b>	<b>4547</b>
Partner's fertility preference	Pearson	<b>.027</b>	<b>1</b>	<b>.203**</b>	<b>-.225**</b>
	Correlation			<b>.000</b>	<b>.000</b>
	Sig. (2-tailed)	<b>.063</b>			
	N	<b>4562</b>	<b>4562</b>	<b>4562</b>	<b>4541</b>
Partner's ideal number of children	Pearson	<b>.047**</b>	<b>.203**</b>	<b>1</b>	<b>-.030*</b>
	Correlation				<b>.040</b>
	Sig. (2-tailed)	<b>.001</b>	<b>.000</b>		
	N	<b>4568</b>	<b>4562</b>	<b>4568</b>	<b>4547</b>
Discuss family planning with wife/partner	Pearson	<b>.014</b>	<b>-.225**</b>	<b>-.030*</b>	<b>1</b>
	Correlation				
	Sig. (2-tailed)	<b>.336</b>	<b>.000</b>	<b>.040</b>	
	N	<b>4547</b>	<b>4541</b>	<b>4547</b>	<b>4547</b>

Correlation is significant at the 0.05 level (2-tailed).\*

Correlation is significant at the 0.01 level (2-tailed).\*\*

**Table 49: Correlations between outcome variable and respondent's sense of agency variables from the partner's point of view**

		Partner's contraceptive use and intention to use in future	Partner's view on childbearing	Partner's view on justified beating	Partner's view on justified beating	Scale for decisions on household expenditure
Respondent's contraceptive use and intention to use in future	Pearson Correlation	<b>1</b>	<b>.034*</b>	<b>.055**</b>	<b>.004</b>	<b>-.019</b>
	Sig. (2-tailed)		<b>.023</b>	<b>.000</b>	<b>.763</b>	<b>.189</b>
	N	<b>4916</b>	<b>4379</b>	<b>4481</b>	<b>4717</b>	<b>4564</b>
Partner's approval of family planning	Pearson Correlation	<b>.034*</b>	<b>1</b>	<b>-.039*</b>	<b>-.032*</b>	<b>-.035*</b>
	Sig. (2-tailed)	<b>.023</b>		<b>.011</b>	<b>.037</b>	<b>.020</b>
	N	<b>4379</b>	<b>4379</b>	<b>4322</b>	<b>4221</b>	<b>4376</b>
Partner's approval of domestic violence	Pearson Correlation	<b>.055**</b>	<b>-.039*</b>	<b>1</b>	<b>.002</b>	<b>.095**</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.011</b>		<b>.913</b>	<b>.000</b>
	N	<b>4481</b>	<b>4322</b>	<b>4481</b>	<b>4318</b>	<b>4478</b>
Respondent's approval of domestic violence	Pearson Correlation	<b>.004</b>	<b>-.032*</b>	<b>.002</b>	<b>1</b>	<b>.035*</b>
	Sig. (2-tailed)	<b>.763</b>	<b>.037</b>	<b>.913</b>		<b>.020</b>
	N	<b>4717</b>	<b>4221</b>	<b>4318</b>	<b>4717</b>	<b>4397</b>
Scale for decisions on household expenditure	Pearson Correlation	<b>-.019</b>	<b>-.035*</b>	<b>.095**</b>	<b>.035*</b>	<b>1</b>
	Sig. (2-tailed)	<b>.189</b>	<b>.020</b>	<b>.000</b>	<b>.020</b>	
	N	<b>4564</b>	<b>4376</b>	<b>4478</b>	<b>4397</b>	<b>4564</b>

Correlation is significant at the 0.05 level (2-tailed).\*

Correlation is significant at the 0.01 level (2-tailed).\*\*

**Table 50: Correlations between outcome variable and dyad variables**

		Respondent's contraceptive use and intention to use in future	Respondent- partner dyad literacy	Respondent- partner dyad ever used any contraceptive method	Respondent- partner dyad fertility preference
Respondent's contraceptive use and intention to use in future	Pearson Correlation	<b>1</b>	<b>.093**</b>	<b>.186**</b>	<b>-.010</b>
	Sig. (2-tailed)		<b>.000</b>	<b>.000</b>	<b>.518</b>
	N	<b>4916</b>	<b>4511</b>	<b>4568</b>	<b>4552</b>
Respondent-partner dyad literacy	Pearson Correlation	<b>.093**</b>	<b>1</b>	<b>.186**</b>	<b>.122**</b>
	Sig. (2-tailed)	<b>.000</b>		<b>.000</b>	<b>.000</b>
	N	<b>4511</b>	<b>4511</b>	<b>4511</b>	<b>4495</b>
Respondent-partner dyad ever used any contraceptive method	Pearson Correlation	<b>.186**</b>	<b>.186**</b>	<b>1</b>	<b>-.079**</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.000</b>		<b>.000</b>
	N	<b>4568</b>	<b>4511</b>	<b>4568</b>	<b>4552</b>
Respondent-partner dyad fertility preference	Pearson Correlation	<b>-.010</b>	<b>.122**</b>	<b>-.079**</b>	<b>1</b>
	Sig. (2-tailed)	<b>.518</b>	<b>.000</b>	<b>.000</b>	
	N	<b>4552</b>	<b>4495</b>	<b>4552</b>	<b>4552</b>

Correlation is significant at the 0.01 level (2-tailed).\*\*



**Table 51: Correlations between outcome variable and respondent's achievement variables**

		Respondent's contraceptive use and intention to use in future	Ever terminated a pregnancy	Ever used any contraceptive method	Respondent's pattern of use of contraceptive	Respondent's current type of contraceptive method being used
Respondent's contraceptive use and intention to use in future	Pearson Correlation	<b>1</b>	<b>-.002</b>	<b>.360**</b>	<b>.442**</b>	<b>.412**</b>
	Sig. (2-tailed)		<b>.866</b>	<b>.000</b>	<b>.000</b>	<b>.000</b>
	N	<b>4916</b>	<b>4913</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>
Ever terminated a Pregnancy	Pearson Correlation	<b>-.002</b>	<b>1</b>	<b>.180**</b>	<b>.136**</b>	<b>.049**</b>
	Sig. (2-tailed)	<b>.866</b>		<b>.000</b>	<b>.000</b>	<b>.001</b>
	N	<b>4913</b>	<b>4913</b>	<b>4913</b>	<b>4913</b>	<b>4913</b>
Ever used any contraceptive method	Pearson Correlation	<b>.360**</b>	<b>.180**</b>	<b>1</b>	<b>.851**</b>	<b>.488**</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.000</b>		<b>.000</b>	<b>.000</b>
	N	<b>4916</b>	<b>4913</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>
Respondent's pattern of use of contraceptive	Pearson Correlation	<b>.442**</b>	<b>.136**</b>	<b>.851**</b>	<b>1</b>	<b>.826**</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.000</b>	<b>.000</b>		<b>.000</b>
	N	<b>4916</b>	<b>4913</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>
Respondent's Current type of contraceptive method being used	Pearson Correlation	<b>.412**</b>	<b>.049**</b>	<b>.488**</b>	<b>.826**</b>	<b>1</b>
	Sig. (2-tailed)	<b>.000</b>	<b>.001</b>	<b>.000</b>	<b>.000</b>	
	N	<b>4916</b>	<b>4913</b>	<b>4916</b>	<b>4916</b>	<b>4916</b>

Correlation is significant at the 0.01 level (2-tailed).\*\*

**Table 52: Correlations between outcome variable and partner's achievement variables**

		Respondent's contraceptive use and intention to use in future	Partner's pattern of use of contraceptive	Partner ever used any contraceptive method	Partner's current type of contraceptive method being used
Respondent's contraceptive use and intention to use in future	Pearson Correlation	<b>1</b>	<b>.361**</b>	<b>.028</b>	<b>.013</b>
	Sig. (2-tailed)		<b>.000</b>	<b>.055</b>	<b>.395</b>
	N	<b>4916</b>	<b>4916</b>	<b>4568</b>	<b>4568</b>
Partner's pattern of use of contraceptive	Pearson Correlation	<b>.361**</b>	<b>1</b>	<b>.054**</b>	<b>.036*</b>
	Sig. (2-tailed)	<b>.000</b>		<b>.000</b>	<b>.015</b>
	N	<b>4916</b>	<b>4916</b>	<b>4568</b>	<b>4568</b>
Partner ever used any contraceptive method	Pearson Correlation	<b>.028</b>	<b>.054**</b>	<b>1</b>	<b>.449**</b>
	Sig. (2-tailed)	<b>.055</b>	<b>.000</b>		<b>.000</b>
	N	<b>4568</b>	<b>4568</b>	<b>4568</b>	<b>4568</b>
Partner's current type of contraceptive method being used	Pearson Correlation	<b>.013</b>	<b>.036*</b>	<b>.449**</b>	<b>1</b>
	Sig. (2-tailed)	<b>.395</b>	<b>.015</b>	<b>.000</b>	
	N	<b>4568</b>	<b>4568</b>	<b>4568</b>	<b>4568</b>

Correlation is significant at the 0.05 level (2-tailed).\*

Correlation is significant at the 0.01 level (2-tailed).\*\*

## Regression analyses

**Table 53: Logistic Regression analysis with respondent's contraceptive use and intention to use in the future as the dependent variable.**

	B	S.E.	Wald	df	Sig.	Odds Ratio	95% C.I. for Odds Ratio	
							Lower	Upper
Respondent's Age								
15-19 years (Reference)			178.812	4	.000			
20-24 years	-.732	.113	41.819	1	.000	.481	.385	.601
25-29 years	-.494	.118	17.382	1	.000	.610	.484	.770
30-34 years	-.364	.127	8.220	1	.004	.695	.542	.891
35 and above	.421	.107	15.524	1	.000	1.524	1.236	1.879
Respondent's highest education								
Secondary and Higher level (Reference)			31.836	2	.000			
Primary	.207	.085	5.959	1	.015	1.230	1.042	1.453
No Education	.509	.091	31.479	1	.000	1.664	1.393	1.989
Respondent's Occupation								
White collar (Reference)			18.251	2	.000			
Agriculture and labour	-.015	.078	.040	1	.842	.985	.846	1.147
Unemployed	.397	.100	15.889	1	.000	1.487	1.223	1.807
Religion								
Christian	.260	.080	10.468	1	.001	1.297	1.108	1.518
Partner's approval of family planning								
Strongly agree	.097	.044	4.882	1	.027	1.101	1.011	1.200
Partner's approval of domestic violence								
Not justified in any instant	.099	.030	11.189	1	.001	1.104	1.042	1.171
Constant	-.675	.115	34.200	1	.000	.509		

**Table 54: Logistic Regression analysis with respondent's contraceptive use and intention to use in the future as the dependent variable.**  
(Older Age group of respondent filtered out)

	B	S.E.	Wald	df	Sig.	Odds Ratio	95% C.I. for Odds Ratio	
							Lower	Upper
Respondent's age								
15-19 years (Reference)			<b>40.540</b>	<b>3</b>	<b>.000</b>			
20-24 years	<b>-.719</b>	<b>.115</b>	<b>39.237</b>	<b>1</b>	<b>.000</b>	<b>.487</b>	<b>.389</b>	<b>.610</b>
25-29 years	<b>-.482</b>	<b>.121</b>	<b>15.845</b>	<b>1</b>	<b>.000</b>	<b>.618</b>	<b>.487</b>	<b>.783</b>
30-34 years	<b>-.372</b>	<b>.130</b>	<b>8.135</b>	<b>1</b>	<b>.004</b>	<b>.689</b>	<b>.534</b>	<b>.890</b>
Respondent's highest education								
Secondary and higher level (Reference)			<b>33.910</b>	<b>2</b>	<b>.000</b>			
Primary	<b>.361</b>	<b>.103</b>	<b>12.404</b>	<b>1</b>	<b>.000</b>	<b>1.435</b>	<b>1.174</b>	<b>1.755</b>
No education	<b>.651</b>	<b>.119</b>	<b>30.089</b>	<b>1</b>	<b>.000</b>	<b>1.918</b>	<b>1.520</b>	<b>2.420</b>
Respondent's occupation								
White collar (Reference)			<b>21.614</b>	<b>2</b>	<b>.000</b>			
Agriculture and labour	<b>.084</b>	<b>.103</b>	<b>.672</b>	<b>1</b>	<b>.412</b>	<b>1.088</b>	<b>.890</b>	<b>1.330</b>
Unemployed	<b>.500</b>	<b>.110</b>	<b>20.600</b>	<b>1</b>	<b>.000</b>	<b>1.648</b>	<b>1.328</b>	<b>2.045</b>
Religion								
Christian	<b>.402</b>	<b>.098</b>	<b>16.732</b>	<b>1</b>	<b>.000</b>	<b>1.494</b>	<b>1.233</b>	<b>1.811</b>
Partner's approval of family planning								
Strongly agree	<b>.126</b>	<b>.054</b>	<b>5.446</b>	<b>1</b>	<b>.020</b>	<b>1.134</b>	<b>1.020</b>	<b>1.260</b>
Partner's approval of domestic violence								
Not justified in any instant	<b>.084</b>	<b>.036</b>	<b>5.300</b>	<b>1</b>	<b>.021</b>	<b>1.087</b>	<b>1.013</b>	<b>1.167</b>
Constant	<b>-.862</b>	<b>.130</b>	<b>43.894</b>	<b>1</b>	<b>.000</b>	<b>.422</b>		