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Utilization of Maternal Care Services among Health Facilitites in Impasugong, Bukidnon

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ABSTRACT

The study aimed at determining the current status of utilization of maternal care services among Barangay Health Stations in Impasugong, Bukidnon. The study utilized the random sampling technique in the selection of the respondents in this study. The multiple regression analysis revealed that there is a significant association between some of independent variables (preferred delivery attendant, complications experienced during childbirth and preferred place of delivery) and maternal health care services used in Impasugong. Further, the simple relationship between maternal health care utilization and its factors (social, economic and demographic) showed significant relationship of the use of prenatal care, place of delivery and assistance during delivery. Although delivery is mostly normal and some experienced complications during pregnancy, yet some suffered complications during childbirth. Most of the respondents utilized the barangay health facilities for prenatal but low in the utilization of Barangay Health Facilities during the stage of labor. The variables with significant relations are total family income, occupation, place of residence and civil status. That education was found to have an important impact on the use of maternal health services suggests that improving educational opportunity for women may have a large impact on improving utilization of such services. Women at higher parity levels were found to be less likely to have deliveries assisted by modern professionals implies

that parity should be one of the criteria for targeting education campaigns in the benefits of safe motherhood programs. Highly recommended measures to improve services are: quality of health workers, development of basic health care facilities and building intervention programs such as better maternal health care, delivery by skilled birth attendant identification of high risk pregnancies and complications, and provision of a good referral system.

Keywords - Maternal Care Services, Barangay Health Station, Skilled Birth Attendant, Place of Delivery, Assistance during Delivery

INTRODUCTION

The utilization of maternal health care is one of the important factors to reduce the incidence of maternal mortality. Maternal health has been recognized to be of great importance since the satisfaction of the basic needs of children at every phase of their life is closely linked to the well-being of the mother. The dependence being greatest during pregnancy and continues during infancy. In this context, the primary health care is seen as means to bring "health without wealth" to the people. Thus, during the last decade or so, many developing countries have been able to put new knowledge into action by improving education and health services in isolated communities.

The dangers of childbearing can be greatly reduced if a woman is healthy and well-nourished before becoming pregnant, if she has a health check up by a trained health worker during her pregnancy, and if a skilled birth attendant assists the birth. The woman should also be checked during the 24 hours after delivery until seven days after giving birth (Rogan and Olvena, 2004).

The government has a particular responsibility to make prenatal and postnatal services available, to train health workers to assist at birth and to provide special care and referral services for woman who have serious problems during pregnancy and child birth. Maternity care aims to ensure that every expectant and nursing mother maintain good health, learns the art of child care, has normal delivery and bears healthy children. Maternal health care begins from the time of conception of the child, therefore, the pre and post natal care of the expectant mother is included in the health care system. The prenatal care ensures. that the health of expectant mothers more especially their nutritional status is safe guarded and avoidable complications of pregnancy are prevented or treated. The natal care also includes the care for expectant mothers during childbirth, preferably by a

skilled birth attendant. The post natal care covers maternal health care services after delivery (Rogan and Olvena 2004).

The World Health Organization (WHO) has summarized three crucial factors underlying maternal deaths. First is lack of access and utilization of essential obstetric services. Secondly, is the low social status of women? The low status of women can limit their access to economic resources and basic education, the impact is that they have limited ability to make decisions including a decision related to their health and nutrition. Thirdly, too much physical work together with poor diet also contributes to poor maternal health outcomes. The utilization of maternal health care is one of the important factors to reduce the incidence of maternal mortality. Impasugong reported recent data of maternal health care as follows: the number of pregnant women who received at least one antenatal care is approximately 36 percent in 2012 data; 40 percent of deliveries took place in health facilities and skilled health personnel assist 49 percent of births in 2012. Obviously, the data indicate that the government's commitment to maternal health care has not reached the levels required to make strong impact on mortality rates. Many existing interventions have been found to be ineffective in preventing maternal death. To cite an example, the Hilot ordinance was not fully implemented because political will was not fully attained.

FRAMEWORK

The study was anchored on Henderson's Theory on Health which states that health is based on an individual's ability to function independently as outlined in the 14 components namely: 1. breathe normally, 2. eat and drink adequately, 3. Eliminate body wastes, 4. Move and maintain desirable postures, 5. Sleep and rest, 6. Select suitable clothes-dress and undress. 7. Maintain body temperature within normal range by adjusting clothing and modifying environment, 8. Keep the body clean and well groomed and protect the integument 9. Avoid dangers in the environment and avoid injuring others, 10. Communicate with others in expressing emotions, needs, fears or opinions, 11. Worship according to one's faith, 12. Work in such a way that there is a sense of accomplishment, 13. Play or participate in various forms of recreation, 14. Learn, discovers or satisfy the curiosity that leads to normal development and health and use the available health facilities. Stress promotion of health and prevention and cure of disease, good health is a challenge, affected by age, cultural background, physical and intellectual capacities and emotional balance and on the individual's ability to

meet the needs independently. Theories can interrelate concepts in such a way as to create a different way of looking at a particular phenomenon. Theories can be the basis for hypothesis that can be tested. Theories contribute to and assist in increasing the general knowledge within the discipline through the research implemented to validate them. Theories can be utilized by practitioners to guide and improve their practice. Theories must be consistent with other validated theories, laws and principles but will leave upon unanswered questions that need to be investigated.

World Health Organization (WHO) estimated suggests that 88 to 98 percent of pregnancy-related deaths are avoidable if all women would have access to effective reproductive health care services (Kunst&Houweling 2001). Second, is the low social status of women? The low status can limit their access to economic resources and basic education, the impact is that they have limited ability to make decisions including a decisions related to their health and nutrition. Third, too much physical work together with poor diet also contributes to poor maternal health outcomes. The utilization of maternal health care is one of the important factors to reduce the incidence of maternalmortality. Recent data in Impasugong showed that maternal mortality ratio (MMR) in this municipality is 20.8 deaths per 1,000 live births. Under such circumstances, it became vital to identify the factors responsible for non-use of maternal health facilities.

The Philippine Pre-Natal Care & the Four Stages of Labor maternal health's program also recommends at least four visits: at least one visit in the first trimester, at least one visit in the second trimester and at least two visits in the third trimester. The same data show that only 21 percent of mother meet there commended schedule (four visits). In the area of maternity care, women who received antenatal care are relatively low, official data shows that the utilization of delivery services at modern health care is still low: 47 percent of births were delivered in a facility and 53 percent of births at home. A professional delivery is a key to reduce maternal mortality (Lerberghe& De Brouwere 2001). In Impasugong, most of maternal deaths occur because the delivery is not assisted by skilled health personnel (DEPKES 2008). Traditional birth attendants (TBAs) continue to have a significant role in assisting deliveries. Considering all the maternal health problems experienced by Impasugong, the government has made several efforts in order to improve maternal health utilization.

The pattern of association between individual (women)'s background characteristics and utilization of maternal health care services, however, depends on the social context of a community. Of the structural characteristics, distance

from the available maternal health services and the cost of these services were often mentioned as obstacles to utilization (Anson 2004). One of the research conducted by Beegle, Frankenberg and Thomas (2001) to see of prenatal and delivery care. In Impasugong, 93 percent of ever married women attended antenatal care yet only 47 percent of births were subsequently delivered in health facilities. This result shows the trend that many more women attend antenatal care than delivered at a health facility.

OBJECTIVES OF THE STUDY

The study aimed to (1) determine the socio-demographic profile of the respondents in terms of: Age, Marital status, Educational Attainment, Occupation, Total Family Income, Number of Children, Ethnicity, and Place of Residence, (2) to describe the profile of the respondents in motherhood related factors in terms of: Age during the latest Pregnancy, Parity, Preferred Place of Delivery, Preferred Delivery Attendant, Outcome of Delivery, Complications experienced during Pregnancy, Complications experience after Childbirth and Age of Gestation, (3) to determine the maternal care services among health facilities in Impasugong in terms of: Prenatal Care and the Four Stages of Labor, (4) to find out which of the independent variables singly or in combination, significantly relate utilization of maternal care services among health facilities in Impasugong, and (5) determine the socio-demographic variables significantly intervene to the relationship between the independent variables and the utilization of maternal care services among health facilities in Impasugong.

METHODOLOGY

This study employed descriptive design using stratified sampling to describe the adequacy of this paper in the utilization of Health Facility during Prenatal, Labor and Delivery in the areas. A descriptive study describes occurrence of outcome between the dependent and independent variables (Calderon, 2008). The findings of this study served as the basis to the municipality's maternal care services. The study was conducted in different barangays of Impasugon, Bukidnon namely: Bontongon, Bulonay, Capitan Bayong, Cawayan, Dumalaguing, Guihean, Hagpa, Impalutao, Kalabugao, Kibenton, La Fortuna, Poblacion and Sayawan. Impasugong is located in the central part of Bukidnon wherein the barangays are mountainous and the ground is mostly gravel and earth type. The

researcher applied a quota sampling of 10 respondents in the 12 barangays and 14 respondents in 1 barangay (Poblacion). So, the total samples were 134 in all. A modified set of questionnaires from various sources (DOH, MHO and about. com) was the main research tool in gathering the relevant data. The research tool is divided into three parts. Part 1 gathered data on the respondent's socio-demographic profile in terms of age, marital status, educational attainment, occupation and total family income, number of children, ethnicity and place of residence. These are the inventing variables. Part 2 deals with motherhood related factors which are the independent variables. These consist of age during the latest pregnancy, parity, preferred place of delivery, preferred delivery attendant, outcome of delivery, complications experienced during pregnancy and complications experienced after childbirth. Part 3 as the dependent variables of the study contains questions on the utilization of the Barangay Health Stations facilities. These includes prenatal care and labor. The researcher wrote the Municipal Mayor through the Municipal Health Officer requesting permission to conduct to study. A letter of endorsement from the Dean of Graduate Studies of Liceo de Cagayan University was questionnaire to the respondents and explained the instruction in filling up the tool to be clearly understood by the respondents. The data were organized, analyzed and interpreted through the frequencies and percentage. The null hypotheses were tested through Multiple Regression Analysis at 05 level of confidence.

RESULTS AND DISCUSSION

Objective 1. To determine the socio-demographic profile of the respondent in terms of age, marital status, educational attainment, occupation, total family income, number of children, ethnicity and place of residence

Table 1. Distribution of the Socio-Demographic Profile of the Respondents in Terms of Age

Age	Frequency	Percent
17-20	11	8.21
21-30	46	34.33
31-40	68	50.75
41-46	9	6.72
Total	134	100.00

In terms of age, the majority (68 or 50.75%) were aged 31-40 year old revealed the most age of the respondents and a few (9 or 6.72%) were aged 41-46.

Table 2. Distribution of the Socio-Demographic Profile of the Respondents in terms of Marital Status

Marital Status	Frequency	Percent
Single	8	5.97
Married	113	84.33
Widow	12	8.96
Separated	1	0.75
Total	134	100.00

In terms of marital status, the data receive that the majority of the respondents were married which is (113 or 84.33%) and a few (1 or 0.75%) revealed to be sexually active before they got married. These ages are found in all barangays with low economic status and are out of school youths. Their parents seldom or cannot afford to send their children to school or is not going to school, that is why a number of single women got pregnant at early age. In addition, it also showed that widow women (12 or 8.96%) found another partner.

Table 3. Distribution of the Socio-Demographic Profile of the Respondents in terms of the Educational Attainment

Educational Attainment	Frequency	Percent
Elementary Level	37	27.61
Elementary Graduate	22	16.42
High School Level	37	27.61
High School Graduate	18	13.43
College Level	14	10.45
College Graduate	6	4.48
Total	134	100.00

Data revealed that majority of the respondents (37 or 27.61%) were elementary and high school level. Few (6 or 4.48%) were college graduates. Women's education was categorized into six classes – elementary level, elementary graduate, high school level, high school graduate, college level and college graduate. This could be considered a problem hence the data showed that elementary and high

school level of education for women could affect their behavior in the utilization of health facility.

Table 4. Distribution of the Socio-Demographic Profile of the Respondents in terms of Occupation

Occupation	Frequency	p
Barangay Health Worker	3	2.24
Laborer	3	2.24
Farmer	6	4.48
Teacher	2	1.49
BNB Operator	1	0.75
Government Employee	1	0.75
Housekeeper	118	88.06
Total	134	100.00

Women's occupation is considered when the work performed gains for the family in cash or in kind (ILO, 2003). The majority of the respondents (118 or 88.06%) were housekeepers. This showed that a large percentage of women who do not have work is perhaps due to socio-cultural belief that they contributed to the level of employment. Women could just be additional workers. Citing an example as most of the women are Lumads, it is their concept that the male is the one who will work for the family to earn for their living. Very few (1 or 0.75%) were government and Botika Ng Barangay Operators (BNB). Occupation of women could also be a criterion that some seek consultation to private facilities and not at the Barangay health Stations hence they can afford to pay for the cost. Being a Barangay Health Worker and BNB Operator is paid in honorarium basis. Laborer and farmer cultivate a small parcel of land. These four occupations earned a little and involved a least pay work but it can increase their way of living.

Table 5. Distribution of the Socio-Demographic Profile of the Respondents in terms of Total Family Income

Total Family Income	Frequency	Percent
P 3,000 and below	56	41.79
P 3,001 – 5,000	48	35.82
P 5,001 – 6,000	12	8.96
P 6,001 – 8,000	8	5.97
P 8,001 – 10,000	1	0.75
P 10,001 – 15,000	5	3.73
P 15,001 – 25,000	4	2.99
Total	134	100.00

Majority of the respondents (56 or 41.79%) have a total family income of P3, 000.00 and below and very few earning (1 or 0.75%) P8, 001.00 to 10,000.00. Although there are those earnings above (4 or 2.99) P15, 000.00 – 25,000.00, the data still showed that mostly of the respondents are low income earners. Moreover, income has played an important function to the access of quality health care. To this, they will find it hard to seek quality health care since their income cannot suffice their basic need.

Table 6. Distribution of the Socio-Demographic Profile of the Respondents in terms of the Number of Children

Number of Children	Frequency	Percent
1 – 3	85	63.43
4 – 6	41	30.59
7 – 9	7	5.23
10	1	0.75
Total	134	100.00

With respect to number of children, 1 to 3 (85 or 63.43%) revealed to be the majority. In the previous data, on the income category, hence majority of the respondents earned P 3,000 and below, women with four to tem (4 to 10) children would be impossible for the family to give to their basic needs. The more children they will have with the kind income the more the family will be deprived of their daily basic needs.

Table 7. Distribution of the Socio-Demographic Profile of the Respondents in terms of Ethnicity

Ethnicity	Frequency	Percent
Mindanaoan Christian	105	78.36
Mindanaoan Non-Christian	7	5.22
Visayan	22	16.42
Total	134	100.00

As to ethnicity, the majority (105 or 78.36%) were Mindanaoan Christian and a few (7 or 5.22%) from Non-Mindanaoan Christians. Based from the data, it is good to note that the respondents are Mindanaoan Christians hence this could be a basis that they value health and life in particular.

Table 8. Distribution of the Socio-Demographic Profile of the Respondents in terms of Place of Residence

Place of Residence	Frequency	Percent
Lowland	36	26.87
Midland Highland	94	73.13
Total	134	100.00

In terms of place of residence, the majority (98 or 73.13) resided in highland and lowland barangays and almost 30% (36 or 26.87%) live within the Poblacion. This can also be an important factor in the use of modern health care resources.

Objective 2. To describe the profile of the following independent variables namely: age during the latest pregnancy, parity, preferred place of delivery, preferred delivery attendant, outcome of delivery, complications experienced during pregnancy and complications experienced after childbirth.

Table 9. Distribution of the Respondents' Profile Following the Independent Variables According to Age during the Latest Pregnancy

Age during the latest pregnancy	Frequency	Percent
17 – 20	13	9.70
21 – 30	75	55.97
31 – 40	38	28.36

41 – 46	8	5.97
Total	134	100.00

As presented, regarding the age during the latest pregnancy, the majority (75 or 55.97%) are ages 21 – 30 and a few (8 or 5.97%) are ages 41 – 46. The data revealed that the most of the respondents ranging from ages 21 – 30 year old. It is sad to note that women aged 17 who became pregnant at a young age. Women in age group 17 - 20 have the low usage in all forms of maternal health care services and women aged 41 – 46 year old as lowest usage. Teenage women and those aged 40 and over tend to have lower percentage utilizing health facility. Older women, on the other hand, may feel that they have greater experience in pregnancy; consequently they may give less importance to obtain institutional care.

Table 10. Distribution of Respondents Profile Following the Independent Variables according to Parity

Parity	Frequency	Percent
0	2	1.49
1-3	79	58.96
4-6	37	27.61
7-9	6	4.49
10 and above	10	7.46
Total	134	100.00

Majority of the respondents in terms of number of pregnancy (79 or 58.96%) were with 1-3 and a few (2 or 1.49%). Based on the data, women with primipara and multipara tend to be the least respondents who utilize health facility.

Table 11. Distribution of Respondents Profile Following the Independent Variables according to Preferred Place of Delivery

Preferred place of delivery	Frequency	Percent
Hospital	26	19.40
Barangay Health Station	13	9.70
Lying in Clinic	36	26.87
Home	59	44.03
Total	134	100.00

Majority (59 or 44.03%) rated home as preferred place of delivery of the

respondents compared to utilization of different health facility. Based from the Municipal data from 2008 to the present, 47% of women utilize the home as a preferred place of delivery and 53% in the health facility. A number of home deliveries are high compared to facility-based preference. Based from the result of the survey there are those who preferred to utilize the health facility (Hospital 19.4%, Barangay Health Station 9.7% and Lying in Clinic 26.87%).

Table 12. Distribution of Respondents' Profile Following the Independent Variables According to Preferred Delivery Attendant

Preferred Delivery attendant	Frequency	Percent
Doctor	24	17.91
Nurse	2	1.49
Midwife	49	36.57
Hilot	59	44.03
Total	134	100.00

Majority of the respondents (59 or 44.035) considered *hilots* as preference for their delivery attendant. The Impasugong health data particularly in terms of skilled birth attendant revealed low (47%) compared to unskilled birth attendant (53%). Underutilization of skilled birth attendants during delivery is a matter of concern for policy makers and programs under the Health Sector must be utilized particularly in the Maternal and Newborn Child Health and Nutrition Program.

Table 13. Distribution of the respondent's profile following the independent variables according to outcome of delivery

Outcome of delivery	Frequency	Percent
Normal	116	86.57
Referred	17	12.69
Blank	1	0.75
Total	134	100.00

Majority of the respondents (116 or 86.57%) are delivering normally. Despite of the data gathered, there are those who were referred (17 or 12.69%) due complications. This implies that all deliveries must be at the health facility to prevent late referrals that may cause death to clients.

Table 14. Distribution of the Respondents' Profile Following the Independent Variables According to Complications Experienced During Pregnancy

Complications experienced during pregnancy	Frequency	Percent
Yes	23	17.16
No	110	82.09
No Answer	1	0.75
Total	134	100.00

Majority (110 or 82.09%) do not have complications during pregnancy while a few (23 or 17.16%) had complications. Complications during pregnancy can only be identified by a skilled health personnel. Per data presented, although many claimed to have no complications but still there are other suffer from the complications they experienced.

Table 15. Distribution of the Respondent's Profile Following the Independent Variables According to Complications Experienced After Childbirth

Complications experienced After childbirth	Frequency	Percent
Yes	19	14.18
No	114	85.07
Blank	1	0.75
Total	134	100.00

Complications experienced after childbirth had almost the same pattern as the complications experienced during pregnancy wherein the majority (114 or 85.87%) had no complications and (19 or 14.18%) those who had complications after delivery. Hence cases of complications is present in the study and many claimed that they did not experience complication. This being so, it is good to include in the counseling the possibilities of getting the complications following

delivery.

Table 16. Distribution of the Profile of the Respondents in the Utilization of Maternal Care Services in the Barangay in terms of Age of Gestation

Age of gestation	Frequency	Percent
Less than 84 days	79	58.96
More than 84 days	55	41.04
Total	134	100.00

In terms of age of gestation, the majority (79 or 58.96%) on less than 84 days and almost half (55 or 41.04%) on more than 84 days. The data revealed that most of the respondents have age of gestation of less than 84 days.

Objective 3. To determine the maternal care services in the barangay during the following stages on: prenatal care and labor (first, second, third, and fourth stages)

Table 17. Distributing of the Profile of the Respondents in the Utilization of Maternal Care Services in the Barangay in terms of Visit of BHS for Prenatal Care

Visit of BHS for prenatal care	Frequency	Percent
Yes	131	97.76
No	2	1.49
Blank	1	0.75
Total	134	100.00

Majority of the respondents (131 or 97.76%) visited the health facility for prenatal check-up, (2 or 1.49%) do not have prenatal check-up and (1 or 0.75%) with blank answer. In Impasugong, data revealed that 72% of women who visited the Health facility for prenatal check-up of the 95% eligible population. Of this, only 22% with quality visits (at least visited the facility 84 days from amenorrhea, once in the first trimester, once in the second trimester and twice in the third trimester) while 50% with non-quality visits (amenorrhea exceeds 84 days and

visited late in the first trimester until the third trimester).

Table 18. Distribution of the Profile of the Respondents in the Utilization of Maternal Care Service in the Barangay in terms of Availment of the BHS Facility during the Stage of Labor

Availment of the BHS facility during the stage of labor	Frequency	Percent
Yes	45	33.58
No	88	65.67
Blank	1	0.75
Total	134	100.00

With regards to the availment of the BHS facility during the stage of labor, the majority (88 or 65.67%) did not avail of the program while only (45 or 33.58) who availed the program. Annual 2013 data of Impasugong in all Barangay Health Stations during the stages of labor regarding availment of health facility during delivery suggests that 57% (553 of 964 births) of the total births were delivered at home, 43% (411 or 42.6%) delivered in the health facility. The data denotes that the availment of Barangay Health Station (BHS) facility during delivery is low compared to those who preferred home delivery. This maybe is because other BHS do not have the facility for delivery, Rural Health Midwives are not residing in their respective areas and the personnel assigned is not trained on the Basic Emergency Obstetric and Newborn Care.

Objective 4: To find out which of the independent variables singly or in combination significantly relate utilization of maternal care services of health facilities during the prenatal care and four stages of labor.

Table 19. Multiple Regression Analysis on the Significant Relation of the Independent Variables to the Utilization of Health Facilities during Prenatal and Stages of Labor

Variables in the Equation				
Variables	Regression Coefficients	F Value	Interpretation	Ho:
Preferred Delivery	0.2479	2.19	Significant	Reject
Complications experienced after childbirth	0.2463	2.17	Significant	Reject

Preferred place of Delivery	0.2268	2.15	Significant	Reject
Overall R Square = 0.8386				

Variables Not in the Equation				
Variables	Regression Coefficient	F Value	Interpretation	Ho:
Outcome of Delivery	0.1503	1.11	Not Significant	Accept
Complication experienced during Pregnancy	0.003523	0.52	Not Significant	Accept
Age During the Latest Pregnancy	0.003312	0.50	Not Significant	Accept
Parity	-0.00396	-0.27	Not Significant	Accept

Three (3) out of seven (7) independent variables (Preferred delivery attendant, complications experienced during pregnancy and preferred place of delivery) and utilization of maternal care services in the Barangay Health Stations (Prenatal Care- 131 or 97.76%, number of prenatal care and stages of labor), turned out to have significant relations. The data indicate that the respondents are concerned of their pregnancy as they are able to plan where they are going to deliver (Midwife -13 or 9.70%), who will attend the delivery (Rural Health Midwife- 49 or 36.57%) and complications arising from the childbirth (19 or 14.18%) rather than conditions experienced during pregnancy (yes- 23 or 17.16%, no- 11 or 82.09%).

The R-Square value of (0.8386) denotes that 84 percent of the variations of the relations between independent and dependent variables can be explained by the three (3) variables mentioned above, while 16 percent can be explained by other factors.

The findings imply that utilization of maternal care services in the barangay is very much significant to every pregnant women who are pregnant in the sense that every pregnancy nowadays is considered to be of risks. Utilization of maternal care services includes pregnancy tracking and birth planning. Pregnancy tracking and birth planning includes prenatal care history (Expected date Confinement, preferred place of delivery and preferred delivery attendant to look up the pregnant women if any complications that will arise after delivery). In addition, utilization of maternal care services in the barangay is also very much important so that complications that will arise, the delivering women can easily be transported to a higher facility of hospital for referral. The choice of place of delivery has consistently been found to be associated with maternal and

neonatal outcomes. Childbirth in a medical institution attended to by trained medical staff has been shown to be associated with lower rates of maternal and neonatal mortality and morbidity than home births. They are strongly attached to their family that they will not leave their families behind. Cultural beliefs and practices is also one of the reasons. They do not want the skilled health worker to touch their external reproductive system (vagina). Previous study implied that the use of modern health facilities in the forms of the formal place of delivery and skilled birth attendants are more likely to be found among women who are housewives. However, giving birth at home and the use of non-skilled assistants during delivery tends to be experienced by those who are working.

On the other hand, four (4) revealed no significance, such as outcome of delivery, complications experienced during pregnancy, age during the latest pregnancy and parity.

The findings revealed are similar to those of numerous studies in developing countries which have shown that demographic factors such as outcome of delivery, complication experienced during pregnancy, age during the latest pregnancy and parity are not significantly relate with the use of maternal health care (Sharma et al., 2007; Wong et al., 1987; Obermeyer, 1993). The findings of the present study support this observation. Younger women might have enhanced their knowledge of modern healthcare services and place more value on modern medicine. However the results in Table 1.1 indicate that women in age group 41-46 have the lowest usage (9 or 6.72%) in all forms of maternal health care services. The women in age group 31-40 (68 or 34.33%) were more likely to utilize all maternal health care services than those in aged 17-20 and 21-30 groups. Teenage women and those aged 40 and over tend to have lower percentage in utilizing maternal care services in the barangay but for different reasons. The higher percentage of younger women did not receive antenatal care perhaps because they have less knowledge and experience relating to the importance of pregnancy care. Older women, on the other hand, may feel that they have greater experience in pregnancy; consequently they may give less importance to obtain institutional care. The negative effect of birth upon the use of maternal care services is illustrated by the consistent decline in the percentage of women who utilize maternal care services with the increase in number of children ever born. woman with a first pregnancy is more likely to seek maternal health care services for primigravids with less antenatal care. Such evidence suggests that women with more children tend to neglect their own health during delivery. This tendency showed in the results although such care is important in avoiding the

risk of pregnancy complications and the risk of dying that may occur during birth delivery. The link between birth and the use of public and private health facilities for labor seems to be negative. Learn, discovers or satisfy the curiosity that leads to normal development and health and use the available health facilities. Stress promotion of health is a challenge, affected by age, cultural background, physical and intellectual capacities and emotional balance and on the individual's ability to meet the needs independently.

Objective 5: To determine the socio demographic variables which significantly intervene to the relationship between the independent variables and the utilization of maternal care services among the health facilities in Impasugong.

Table 20. Multiple Regression Analysis on the Significant Intervention of the Socio-Demographic Variables to the Relationship Between the Independent Variables and Utilization of Maternal Care Service

Variables in the Equation				
Variables	Regression Coefficients	F Value	Interpretation	Ho:
Total Family Income	0.6598	3.14	Significant	Reject
Occupation	0.5254	2.83	Significant	Reject
Residence	0.2575	2.39	Significant	Reject
Marital Status	0.1267	2.18	Significant	Reject
Overall R Square = 0.8589				

Variables Not in the Equation				
Variables	Regression Coefficients	F Value	Interpretation	Ho:
Ethnicity	-0.07296	-1.14	Not Significant	Accept
Age	0.004956	0.63	Not Significant	Accept
Educational Attainment	0.00851	0.26	Not Significant	Accept
Number of Children	-0.02278	-0.076	Not Significant	Accept

Four (4) out of eight (8) socio-demographic variables turned out to have significant relationship. These are total family income, occupation, place of

residence and marital status.

The R-square value of (0.8589) denotes that 86 percent of the variations of the interventions of the socio-demographic variables to the relationship between independent and dependent variables and the utilization of health facilities can be explained by the four (4) variables mentioned above, while 14 percent can be explained by other factors.

The findings imply that family income is a significant factor because it can influence the choice for better and affordable medical attention. Occupation denotes fringe benefits attached to occupational background such as insurances that are implied to their benefit package. Citing a best practice that Impasugong had is the presence of halfway house wherein pregnant women who had history of complications after delivery in all forms are required to stay a week before their expected delivery for early referral. But sad to note that only a few availed the facility. Maybe because if we also would like to consider the financial capability of the respondents, most of them are low earners. Therefore, access to better hospitalization for seeking higher facility delivery is impossible.

On the other hand, four (4) revealed no significance, such as ethnicity, age (in years), educational attainment and number of children.

The findings revealed that other socio-demographic variable are not factors in the utilization of health facilities. In rural cultural settings, no tribal rules of beliefs influence the process in which how one will conceive their children. Regardless of ethnic or tribal background, survival of their lineage will depend on the medical services available in their community. Sociologically speaking, ethnicity and modern medicine are not separate matters; Filipinos embrace the modern way, and are adapted to the beliefs and customs of the community. Age is not significant, as there are no age restrictions that are enforced as to the availability of health services. That some respondents did not finish/schooling, is not a hindrance to the utilization of health services since updates and mothers classes are provided by barangay health midwives. As to the number of children's relation to utilization, social norms dictate that few or more children, respondents tend to avail or utilize health service within their vicinity for the health of their family members. For the family, there is no selective choice since as to who shall avail, as care and attention are concerns of all at an equal footing.

CONCLUSIONS

In general, the behavioral model of health service use (Andersen 1995) suggests that personal health practices and people's use of health services are functions of the following categories: First is the predisposing characteristic in which factors that present preceding the ill health and need for care, such as demographic factors, social structures and health beliefs. Demographic factors such as age gender represent biological urges the likelihood that people will need health services. Social structure is measured by a broad array of factors that determine the status of a person in the community, his or her ability to cope with and command the resources to deal with these problems, and how healthy and unhealthy the physical environment is likely to be (education, occupation, ethnicity, and others). Health beliefs and attitudes, values and knowledge that people have about health and health care services that might influence their subsequent perceptions of need and use of these services. Secondly, the enabling resources which provides patients with the means to make use of the services. Community and personal enabling resources must be available to use in anytime needed. For example, health personnel and facilities must be available and people must have the means to know how to get to those services and make use of them. Income, health insurance, a regular source of care and travel and waiting time are some of the measures that can be important in this respect. Thirdly, the need which refers to health status, perceived by the individual or functional state, as well as how they experience the symptoms of illness, pain and worries about their health and whether or not they judge their problems to be of sufficient importance and magnitude to seek professional health care.

RECOMMENDATIONS

1. That education was found to have an important impact on the use of maternal health services suggests that improving educational opportunity for women may have a large impact on improving utilization of such services. This is, however, a long-term investment. As an alternative, in the short term, health programs need to focus on attracting women with little or no education.
2. That women at higher parity levels were found to be less likely should be one of the criteria for targeting education campaigns in the benefits of safe motherhood programs.

3. That highlander and midlander women were less likely to use the services means that maternal health care programs should be expanded and intensified in those areas along with culturally appropriate education campaigns.
4. Since there are women who are not married or in union are less likely to use the services, it is imperative to also target this group during education campaigns. Last, the negative impact of traditional religion on the use of maternal health services points to the need for research into aspects of traditional religion that discourage the use of such health services.
5. Provision of information to women in young age groups. The information is needed to increase teenage mother's awareness in particular and community in general of the benefits of using modern health care facilities and trained professional personnel for delivery purpose.
6. Access to trained prenatal care providers and delivery care is much greater among women with elementary education than among those with higher education. The choice of attendant during labor and delivery is associated with the mother's characteristics particularly the age and parity. Place of residence, total family income, occupation and civil status are the most significant factors affecting the utilization of maternal care services.
7. Future research on similar topic may be replicated by any concerned researcher or group utilizing of responding and additional variables of inter-est.

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