

SOCIAL FACTORS INVOLVED IN WOMEN AVOIDING EARLY ANTENATAL BOOKING IN ARMY SETUP

Tehreem Yazdani, *Aliya Islam, *Ghazala Nadeem, *Talat Hayat, *Mamoona Mushtaq

Combined Military Hospital Murree, *Military Hospital Rawalpindi

ABSTRACT

Objectives: To study the factors involved in women avoiding early antenatal booking coming to Military Hospital Rawalpindi.

Study Design: Comparative cross sectional study.

Place and duration: Dept of Gynae and Obstetrics, Military Hospital, Rawalpindi. Tertiary care centre from whole of the Pakistan dealing with other ranks of Pak Army, from July to December 2006.

Subjects and Methods: Study was done on 1000 patients at maternity OPD. Patients were divided into two groups of 500 each. Those patients who had early antenatal booking and took regular advice during pregnancy were included in group-I. While group-II included those patients who were late in antenatal booking or remained unbooked till delivery or presented with complications in 3rd trimester for the 1st time. Patients demographic data was entered on questionnaire and factors involved were interpreted. Data was analyzed by using computer software programme SPSS version 11. Chi square test was used to see the significance of difference between group-I and group-II and results were considered significant if P value is less than 0.05.

Results: The study showed that as compared to booked patients factors involved in late booking of pregnant women were fear of invasive treatment (C-Section, Episiotomy) (40%), dai system (26%), education less than middle (19%), not living with husband (18%), far distance from hospital (14%), financial restraints (10%) and self medication (05%), (P value < 0.05). Anemia was significantly lower among women utilizing antenatal care early (3.8%), as compared to those who were late at booking (17.8%), (P value < 0.05). Similarly preterm labour was also statistically significant, with lower rate in group utilizing antenatal care early (1%) as compared to the other group (8.2%) (p value < 0.05).

Conclusion: Women of reproductive age need to recognize the importance of receiving early antenatal care in the army setup. Factors such as fear of invasive treatment, more faith in dai system, husband being away, living at far distance from hospital were hindering in early booking. Similarly lower socio-economic status and literacy rate of women also delays early utilization of this facility. By early booking, we can reduce the number of patients reporting with complications especially anemia and preterm labour and thus reducing the need of hospital admission and cost on many expensive medicines.

Keywords: Antenatal care, components of antenatal care

INTRODUCTION

The overall purpose of antenatal care is to optimize the outcome of pregnancy for the mother, her child and the rest of her family. History taking, examination and the use of

investigations are tailored to each individual pregnancy to assess risk and to screen for potential physical, psychological and social problems [1].

The aims of antenatal care are to prevent, detect and manage those factors that adversely affect the health of mother and baby and to provide advice, reassurance,

Correspondence: Major Tehreem Yazdani, Gynaecologist CMH, Murree Hills
Email: tehreem66@hotmail.com

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education and support for the woman and her family. The initial risk assessment of the pregnancy is vital if more intensive levels of care are to be appropriately targeted to women at higher risk of complications. Risk assessment should be viewed as an ongoing exercise throughout the pregnancy so that the type of care offered to a woman can change if her level of risk changes. If a pregnancy is deemed to be "low risk", a minimum standard of care is still to be expected. Women with risk factors identified at booking may have extra hospital appointments. This improves communication and allows access for all healthcare staff to the same information [1].

The content of care is often neglected in evaluation but should include all items of proven effectiveness for which resources are available. If repeated consultation is required it will also encompass the frequency of visits.

Organization includes both the place of the consultation and the personnel best qualified to offer the care [2].

There is great variation in form, content and amount of education and advice that women receive during pregnancy, both among and within countries. Women receive much information about pregnancy not from medical professionals but from relatives and friends [3]. Specific barriers to free access to prenatal care persist and the number of women who do not seek or receive antenatal care is increasing [4]. The relationship between socioeconomic factors and poor use of prenatal care is well documented [5-7]. Providing financial incentives alone does not overcome these barriers to receiving prenatal care. [5,8,9]. Additional efforts are needed to facilitate enrollment and enhanced social support services for these specific categories of women. [5,10]. For civil setups home visits by prenatal care providers can be beneficial for women of low socioeconomic status, improving their medical knowledge, health habits, support level, and satisfaction [10,11].

In developed countries, these barriers play an even greater role in the low use of prenatal care. The major barriers identified are economic, cultural, and those related to

women's perception of their condition [12,13]. Reduction of poverty and economic empowerment of rural women are prerequisites for tangible improvement in the use of antenatal and obstetric delivery services in developing countries. 13 There may be an even greater need to create awareness about obstetric complications through targeted community-based health education interventions to promote early recognition of obstetric emergencies [13]. There is no sound evidence that removing user fees alone increases the use of prenatal care in developing countries [14]. Another major constraint experienced by women seeking health services is lack of satisfaction with the quality of care (e.g, long waiting lists in health centers, no combined maternal-child care, inappropriate communication, lack of transportation) [15-17].

Recent studies have allowed for the planning of antenatal care more rationally than before and to ensure that all screening education and procedures are fully justified. Teamwork between midwives, Gps and obstetricians will continue to be necessary [2].

It is worth making the obvious point that although pregnancy outcomes for primigravidae are worse than for multiparae, a large proportion of multiparae can be identified as being at risk of problems [2].

The purpose of this study was to study the factors involved in women avoiding early antenatal booking coming to Military Hospital Rawalpindi.

SUBJECTS AND METHODS

An analytical study was conducted at MH Rawalpindi from 1st July 2006 to 31 December 2006. 1000 patients of reproductive age group were recruited by convenience sampling. These were divided into two groups. Those patients who had early antenatal booking and took regular advice during pregnancy were included in group-I. While group-II included those women who were late in antenatal booking or remained unlooked till delivery or presented with complications. Knowledge, attitude and practices of women booking early and

presenting late for antenatal care facilities were compared.

All women reporting at maternity OPD and Gynae emergency were included in the study regardless of the parity. Women with multiple pregnancy or previous medical or surgical illness were excluded. A detailed history was taken and obstetrical examination performed at the time of antenatal booking or admission. Fetal well being was assessed by fetal heart rate, biophysical profile and fetal biometry. Routine investigations included a blood complete picture and group, urine examination, time tested blood sugar levels and hepatitis B and C screening.

Factors analysed in the study included fear of invasive treatment, which is episiotomy and caesarean section, education less than middle, reliance on Dai system, financial restraints, not living with husband, distance from hospital, social shyness, self medication, living in joint family system, and area traditions. These factors were interpreted by observing the complications between the two groups.

STATISTICAL ANALYSIS

Data had been entered and analyzed using SPSS version 11. Descriptive statistics were used to describe the data frequencies along with percentages for categorical variables and means and standard deviations for numerical variables. Chi-square test was used to compare the groups. P-value < 0.05 was considered significant.

RESULTS

The study showed comparable results between the two groups and describe the socio-demographic factors affecting antenatal care. Women of reproductive age group which is between 15-42 years were included. In this study 81.24% of the women were of 25-35 year of age while 18.76% were teenagers.

In group-I only 15 (3%) were having fear of invasive treatment and in spite of this they regularly visited the hospital. While in group-II 200 (40%) were not coming to hospital due

to fear of invasive treatment and even they were afraid of episiotomy and induction of labour (p-value<0.05).

Regarding education in group-I only 10 (02%) patients were educated less than middle and rest were having a higher education. A few of them were also working as teachers in schools. While in group-II 95 (19%) women were educated less than middle and many of them even could not write their name (P-value<0.05)

One hundred and thirty (26%) women in group-II were not coming to hospital because of more faith in dai system. They were being examined and treated by dais and had full confidence in them. While only 25 (5%) (p value<0.05) women in group-I visited dais.

Another important factor was that patients who had early antenatal booking were mostly living with husband. Ninety (18%) women who had late booking were not living with their husbands while in group-I 25 (5%) women were not living with their husbands (P-value< 0.05).

Joint family system was seen in 40 (8%) women in group-I and 50 (10%) in group-II (P-value > 0.05).

Another factor involved in late or early antenatal booking was distance from hospital. Only 20 (04%) women in group-I were living at far distance from hospital while this was 70 (14%) in group-II (P value<0.05).

Self medication was observed more in group-II patients. These women used home made medicines and herbs for treatment of minor ailments. They took no antianaemic drugs and mostly presented with anaemia. These were 25 (5%) in group-II and 05 (1%) in group-I (P value<0.05).

Ten (2%) patients in group-I and 15 (3%) in group-II had shyness coming to the hospital. These were completely illiterate and showed shyness not only during taking history but also during examination and ultrasound (p-value>0.05).

Lastly area traditions were also seemed to be involved and was pardah and travel

Table-1: Factors analyzed in study

| Cases | Group-I | | Group-II | | P-value |
|--|---------|-------|----------|-------|---------|
| | No. | % age | No. | % age | |
| Fear of invasive treatment (C-Section, Episiotomy) | 15 | 03 | 200 | 40 | <0.05 |
| More faith in Dai System | 25 | 05 | 130 | 26 | <0.05 |
| Education Less than Middle | 10 | 02 | 95 | 19 | <0.05 |
| Not living with husband | 25 | 05 | 90 | 18 | <0.05 |
| Living far distances from Hospital | 20 | 04 | 70 | 14 | <0.05 |
| Financial Restraints | 15 | 03 | 50 | 10 | <0.05 |
| Self Medication | 05 | 01 | 25 | 05 | <0.05 |
| Joint family system | 40 | 08 | 50 | 10 | >0.05 |
| shyness | 10 | 02 | 15 | 03 | >0.05 |
| Area traditions | 10 | 02 | 10 | 02 | >0.05 |

Table-2: Patients presenting with complications

| Cases | Group-I | | Group-II | | P-value |
|---|---------|-------|----------|-------|---------|
| | Number | % age | Number | % age | |
| Anaemia | 19 | 3.8 | 89 | 17.8 | <0.05 |
| Preterm Labour | 05 | 01 | 41 | 8.2 | <0.05 |
| Abruption placenta | 04 | 0.8 | 09 | 1.8 | >0.05 |
| IUGR | 06 | 1.2 | 13 | 2.6 | >0.05 |
| Obstructed labour | NIL | 0 | 07 | 1.4 | >0.05 |
| Foetal anomalies in 3 rd trimester | 03 | 0.6 | 09 | 1.8 | >0.05 |
| Malpresentations | 13 | 2.6 | 31 | 6.2 | >0.05 |
| PPH | 05 | 01 | 24 | 4.8 | >0.05 |
| Cord prolapse | NIL | 0 | 03 | 0.6 | >0.05 |
| IUD | NIL | 0 | 01 | 0.2 | >0.05 |

IUGR = Intra uterine Growth Retardation, PPH = Post Partem haemorrhage, IUD = Intrauterine death.

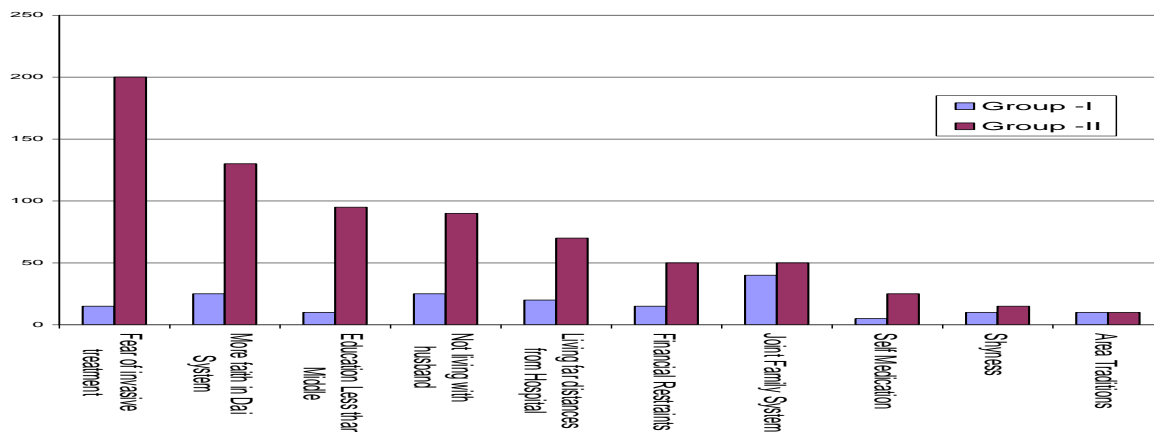


Figure: Factors analyzed in study

during pregnancy. It was (2%) in both groups between the two groups See table-1 and figure.

The complications observed in this study between the two groups were anemia, abruption placentae, preterm labour, Intra uterine growth retardation (IUGR), obstructed labour, foetal anomalies in third trimester, malpresentations, Post partum

haemorrhage (PPH), cord prolapse and intra uterine death (IUD). Anemia was significantly lower among women utilizing antenatal care early (3.8%), as compared to those who were late at booking (17.8%), (P value < 0.05). Similarly preterm labour was also statistically significant, with lower rate in group utilizing antenatal care early (1%) as compared to the other group 8.2% (p-value < 0.05) (table-2).

DISCUSSION

Different measures are used to quantify the use of prenatal care (e.g. percentage of women receiving care, timing of the first visit, percentage of women receiving late or no care, frequency of visits, and indices of adequacy of prenatal care) [5]. Data on the use of prenatal care show distinct socioeconomic, ethnic, and geographic differences [5,18]. These differences, also present within western countries, such as the UK. Good quality antenatal cares have led to important differences in perinatal and maternal mortality. For example, it is estimated that the perinatal mortality rate in Pakistan-born mothers in the UK is twice the national average [19]. In both developed and developing countries, there is great variation in the provision and content of prenatal care. However, there is little evidence to justify the different methods of providing prenatal care.

In a study by Adamu YM in a rural community in Kano State, Northern Nigeria the major barriers identified in women not attending maternity OPD were economic, cultural and those related to the women's perception of their condition. The study recommends that poverty reduction and economic empowerment of rural women are prerequisites for any tangible improvement in the utilisation of antenatal care and obstetric delivery services [20].

Our women are more reluctant for visit to hospital and being a developing country we have many antenatal, intrapartum and postpartum complications. Most hazardous factor responsible for all this is fear of invasive treatment and women do not understand that episiotomy and elective caesarean section carry less morbidity as compared to perineal tears and obstructed labour.

Local studies conducted in rural and urban setup show similar factors hindering provision of antenatal care. In a study conducted at Hayatabad medical complex Peshawar concluded that women living near the hospital used the facility of antenatal care [21].

Another study conducted at Aga Khan University, Karachi recommended uplifting the socio-economic status and literacy rate of women and to provide community based education. It further showed that there is a potential need to increase nutritional education, highlighting the importance of iron supplementation, appropriate food during pregnancy and recognition of signs and symptoms and danger signs in pregnancy [22].

Similarly a study at Shifa College of Medicine, Islamabad showed that utilization of antenatal care facilities is associated with educational status of women and their husbands [23].

This study in army setup depicts similar trends in women avoiding antenatal care. Moreover anemia and preterm labour were two main factors with lower frequency in patients booked early, and this can reduce both maternal and perinatal mortality.

CONCLUSION

Factors such as fear of invasive treatment more faith in dai system, husband being away, living at far distance from hospital were hindering in early booking. Similarly lower socio-economic status and literacy rate of women also delays early utilization of this facility.

By early booking, we can reduce the number of patients reporting with complications especially anemia and preterm labour and thus reducing the need of hospital admission and cost on many expensive medicines.

RECOMMENDATIONS

- Every body should join hands to uplift the literacy rate and economic status of this country.
- To highlight the importance of antenatal care, regular lectures of the soldier's wives should be arranged so as to allay their fears.
- OPD waiting time should be reduced.
- Doctor to patient ratio should be increased to ensure patient satisfaction and compliance.

- More senior doctors should be involved in OPDs.
- To avoid self medication, medicines should be a controlled item and proper files of soldier's families should be kept.
- All tertiary care hospitals (Class A) should have separate Gynae M.R.C to facilitate patients coming from far flung areas and with domestic problems after working hours.

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