

An Exploratory Study to Assess Knowledge Regarding Birth Preparedness among Primigravida in a Selected Hospital of a Metropolitan City

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Abstract

Aim: An exploratory study was conducted to assess knowledge regarding birth preparedness among primigravida in a selected hospital of a metropolitan city.

Materials and Methodology: An exploratory research design and qualitative research approach was adopted and non-probability convenient sampling technique was used to select 50 primigravida mothers ($n = 50$). A structured interview technique was performed for collection of data Section A - Demographic variables, Section B Knowledge questionnaire.

Results: The findings showed that majority of the subjects were in the age group of 22–25 years and 26–29 years with a frequency of 36% and 44%, respectively. Minimum of the subjects were in the age group of 18–21 years with a frequency of 20%. Majority of the subjects were Hindu, with a frequency of 64%. About 2% of the subjects were Buddhist. Majority of the subjects were house wives, with a frequency of 74%. Minimum of the subjects were corporate employees, with a frequency of 20%. All the subjects, 100% had yearly income within the range of 10–11 lakhs per annum. Majority of the subjects 38% for graduates whereas 26% had completed secondary education. Maximum of the subject 60%, were of the opinion that birth preparedness encompasses the holistic process of planning for normal birth and anticipating the actions needed in emergency care. Birth preparedness is strategy to promote the timely use of skilled maternal and neonatal care according to 16% of the subjects. About 8% of the subjects opined birth preparedness is the registration of pregnancy and institutional delivery whereas birth preparedness for 8% of subjects is majority of the subjects 98%, opined that exercise and meditation can help the pregnant woman to cope with stress.

Conclusion: The primary objective to assess the knowledge of primigravida mothers regarding birth preparedness was achieved by the analysis of section I and II. Out of all the subjects, majority had good knowledge on whereas.

Keywords: Primigravida mothers, birth preparedness, Metropolitan city

INTRODUCTION

"If you're worried about being a good mother, it means you already are one."

-Anonymous

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"If you ask a dozen of pregnant women who is going to deliver your baby, their answers will likely be the names of their midwives, doctors, or medical group."

It is rare for a woman to say "I am going to deliver." The reality is that while we might say that someone can deliver another person's child, only mother can give birth to their babies. The way we talk about birth can transform the way we think about birth. Naming something is an empowering process, because words carry layers of meaning, of emotion, and of understanding."^[1]

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Birth preparedness includes antenatal care (ANC), intranatal care, and postnatal care. However, more emphasis is given on ANC and postnatal care whereas intranatal care. Labor preparedness will help pregnant women to acquire skills and confidence needed to make birth apposite experience as it dissolves fears and makes pregnancy a time to remember is neglected. Childbirth education can simplify pregnancy and birth and help women navigate the maze of modern obstetrics to have a safe, healthy birth.

Background of the study

Maternal mortality is a substantial burden in many developing countries. Globally, more than 40% of pregnant women may experience acute obstetric problems. The World Health Organization estimates that 300 million women in the developing world suffer from short-term or long-term morbidities brought about by pregnancy and child birth. Most of maternal deaths occur in the developing countries. With 214 maternal deaths per 100,000 live births, it remains a major public-health challenge in India.^[2] Every pregnant woman faces the risk of sudden, unpredictable complications that could end in death or injury to herself or to her infant. Pregnancy-related complications cannot be reliably predicted. Hence, it is necessary to employ strategies to overcome such problems as they arise.

Birth preparedness is a process of preparing for pregnancy complications emergency obstetric care and delivery care in terms of saving money, transportation, and blood arrangement. Birth preparedness is also considered as an intervention for preventive behavior and programmatic approach to other socio-economic and cultural barriers, which limit the requisite to avail the health facility especially the referral pathways, skilled medical practitioner, and adequate equipment and infrastructure, and other requisite over the course of delivery as well as child care. Utilization of birth preparedness kits, community involvement in counseling and physiological support to child bearing, save women from maternal deaths occurred during labor pain, delivery, and within the 24 h of the postpartum and due to the inter-correlated signs of danger.^[3]

Need for the study

A birth plan or emergency preparedness plan include side notification of the following: Knowledge of key danger signs, desired place of birth, preferred birth attendant, location of the closest appropriate healthcare facility, funds for birth related and emergency expenses, a birth companion, transport to a health facility for the birth, transport in the case of an obstetric emergency, and identification of compatible blood donors in case of emergency.^[4]

Maternal mortality rate is seen to be higher in developing countries as compared to the developed countries. This is mainly due to the unavailability of efficient hospital facilities. The main causes contributing include hemorrhage, infections, and other medical disorders. If these causes are detected at an earlier stage, the interventions turn out to be fruitful and further complications can be prevented. To be able to be prepared for birth and possible complications, people need to know birth for the woman and new-born. While originally programs focused

on care seeking for the women, in recent years, programs have recognized the value of discussing care seeking for new born complications as well.^[4]

Increased birth preparedness awareness can definitely help reduce infant and maternal mortality and morbidity rates. It also helps in the physical and psychological development of the child without compromising maternal health. An information booklet on birth preparedness will serve as a guide to all pregnant mothers to cope with pregnancy, childbirth, puerperium, and its challenges.

Problem statement

“An exploratory study to assess knowledge regarding birth preparedness among primigravida mothers in a selected hospital of a metro politan city in view of repairing an information booklet.”

Objectives

The objectives are as follows:

1. Primary: To assess the knowledge regarding birth preparedness in primigravida mothers.
2. Secondary: To prepare information booklet regarding birth preparedness.

Hypothesis

H0: There is no significant knowledge regarding birth preparedness among primigravida mothers.

H1: There is significant knowledge regarding birth preparedness among primigravida mothers.

RESEARCH METHODOLOGY

Research approach

The study investigator was used qualitative approach.

Research design

Exploratory research design.

Setting of the study

Hospitals of metropolitan city.

Population

In this present study, population consists of 50 primigravida mothers of hospitals of metropolitan city.

Sampling technique

Samples were selected using non-probability convenient sampling technique.

Sample size

The sample size was 50 primigravida mothers who fulfilled the inclusion criteria.

Criteria for selecting samples

Inclusion criteria

For selection of patients

1. Primigravida mothers who are willing to participate in this study.

2. Primigravida mothers who understand English, Hindi, or Marathi.
3. Primigravida mothers who visit selected hospital ANCOPD for antenatal check-up and who are admitted in the ANC ward.
4. Primigravida mothers in the age group of 18–35 years.

Exclusion criteria

1. Primigravida mothers with fetal complications.
2. Primigravida mothers with associated medical conditions.
3. Primigravida mothers with high risk pregnancy.

RESULTS

As per the objectives, the data were analyzed by following two sections.

Section A

This section deals with the demographic data of the subjects under study. It is analyzed in frequency and percentage method. Distribution of sample as per relation to demographic variables [Table 1].

Section-B

This section deals with the assessment of knowledge regarding birth preparedness among primigravida mothers. It is analyzed in frequency and percentage method [Tables 2-11].

DISCUSSION

A descriptive cross-sectional study was conducted in an ANC clinic at Kenyatta National Hospital, Nairobi, Kenya, on 394 pregnant women attending ANC to evaluate birth preparedness and complication readiness among ANC clients. Over 60% of the respondents were counseled by health workers on various elements of birth preparedness. About 87.3% of the respondents were aware of their expected date of delivery, 84.3% had set aside funds for transport to hospital during labor, while 62.9% had funds for emergencies 67% of the respondents knew at least one danger sign in pregnancy, while only 6.9% knew of three or more danger signs. Similarly in a cross-sectional study conducted by Anita *et al.* (2012) among 417 antenatal attendee Sata primary health Centre in New Delhi on knowledge regarding birth preparedness and complication readiness. According to the study, general awareness regarding birth preparedness was <1/2 the sample population. These studies help the researcher to conclude on selecting samples from the antenatal outpatient department (OPD) and ward of a hospital in a metropolitan city.^[5]

In a qualitative phenomenological study conducted by Mendey *et al.* (2018) at Sukuta and Serekunda Health Centre on 19 pregnant women who received ANC facilities, interview guide of ten open-ended questions was developed by researcher. Out of the 19 only 5 women initiated early ANC registration and almost all indicated that the ideal time to initiate registration and care was before 20 weeks of gestation. Similarly in descriptive

Table 1: Distribution of subjects according to their demographic data $n=50$

SR. No.	Demographic data	No. of subjects	Percentage
1.	Age		
a	18–21 years	0	0
b	22–25 years	18	36
c	26–29 years	22	44
d	30 and above years	10	20
2.	Religion		
a	Hindu	32	64
b	Muslim	9	18
c	Christian	7	14
d	Others	2	4
3.	Occupation		
a	Student	0	0
b	Housewife	37	74
c	Corporate	3	6
d	Others	10	20
4.	Yearly income		
a	10–11 lakhs/annum	50	100
b	11–12 lakhs/annum	0	0
c	12–13 lakhs/annum	0	0
d	13–14 lakhs/annum	0	0
5.	Education		
a	Secondary	13	26
b	Higher secondary	18	36
c	Graduate	19	38
d	Uneducated	0	0
6.	Source of information		
a	Relatives	29	58
b	Friends	0	0
c	Health institute	21	42
d	Mass media	0	0

Table 2: Assessment of knowledge about birth preparedness $n=50$

Sr. No.	Birth preparedness	No. of subjects	Percentage
1.	Meaning		
a	Skilled maternal and neonatal care	8	16
b	Registration of pregnancy and Institutional delivery	6	12
c	Holistic approach towards planning of normal birth as well as emergency management	30	60
d	Registration, institutional delivery, emergency management	6	12

cross-sectional study conducted by Ao *et al.* (2014), on mother's reason for delayed ANC registration in multiple centers in the same pregnancy between June and September, at the University of Port -Harcourt teaching hospital, South Nigeria, using a set of structured Pre-test questionnaire among 231 antenatal mothers who gave the consent. There as on identified for antenatal registration in the multiple centers is the long distance between home and ANC center. These studies helped the investigator to prepare a structured questionnaire to assess the knowledge of primigravida mothers on birth preparedness.^[6]

Samuel Cumber, Nina Monju, *et al.* had conducted a descriptive cross sectional study, by selecting all total of 50 participants by random sampling method. The study aimed at assessing the ANC services of pregnant women and determined their

Table 3: Assessment of knowledge on antenatal registration $n=50$

Sr. No.	Antenatal registration	No. of subjects	Percentage
1.	Meaning		
a	Registration of pregnancy in hospital	23	46
b	Registration of delivery in hospital	23	46
c	Registration for birth certificate	1	2
d	Registration which only considers immunization	3	6
2.	Ideal time		
a	Immediately after confirming pregnancy	9	18
b	In first 3 weeks	11	22
c	Only during labor pain	0	0
d	During 3–6 months of pregnancy	30	60
3.	Benefits		
a	To treat pregnancy related ailments and for safe delivery	50	100
b	For reproductive health counseling only	0	0
c	To get benefits from government	0	0
d	Only for provision of birth certificate	0	0

Table 4: Assessment of knowledge on antenatal check-up $n=50$

Sr. no.	Antenatal checkup	No. of subjects	Percentage
1.	Meaning		
a	Regular medical and NURSING Care	45	90
b	Treat and prevent potential health problem	3	6
c	Promote healthy lifestyle that benefits only mother	0	0
d	Prevent fetal complications	2	4
2.	Number of check-ups recommended		
a	2	0	0
b	3	0	0
c	4	8	16
d	5	42	84
3.	Tests needed to be done		
a	Only confirmation of pregnancy	1	2
b	USG	0	0
c	HIV, hemoglobin, BP, blood sugar, USG, hep. B	49	98
d	Only urine test	0	0

knowledge regarding ANC. A well-structured questionnaire was used to collect data. Findings showed that majority, 92% of these pregnant women had knowledge about the importance of ANC. About 38% of the pregnant woman complained of poverty as their major hindrance. Similarly Yasodha and Vathy had conducted a descriptive study, by selecting 50 primigravida mothers visiting Narayanapuram PHC, by convenient sampling to assess the knowledge of primigravida mothers regarding ANC. Self-prepared structured interview questionnaire was used for data collection. Findings showed that in urban area 54% had moderately adequate knowledge and only 10%

Table 5: Assessment of knowledge on TT injection $n=50$

Sr. No.	TT injection	No. of subjects	Percentage
1.	Need		
a	To protect child from tetanus	0	0
b	To protect mother from tetanus	1	2
c	To protect both child and mother from tetanus	49	98
d	To prevent obesity	0	0
2.	Number of doses		
a	4	0	0
b	3	25	50
c	2	24	48
d	1	1	2

Table 6: Assessment of knowledge on antenatal diet $n=50$

Sr. no.	Antenatal diet	No. of subjects	Percentage
1	Meaning		
a	Dietary planning undertaken after conception	35	70
b	Related to dietary allowance	5	10
c	Related to dietary intake before and after pregnancy	10	20
d	Only related to dietary restrictions	0	0
2	Kilos gained normally in pregnancy		
a	4–6 kg	0	0
b	8–12 kg	43	86
c	12–16 kg	6	12
d	16–20 kg	1	2

Table 7: Assessment of knowledge on psychological preparedness $n=50$

Sr. no	Psychological preparedness	No. of subjects	Percentage
1.	Coping strategies for stress		
a	Do nothing about it	1	2
b	Exercise, meditation	49	98
c	Share with your spouse	0	0
d	Talk to your parents	0	0
2.	Coping strategies for disturbed body image		
a	Maintaining positive attitude	50	100
b	Try to maintain physical fitness	0	0
c	Yoga and meditation	0	0
d	No planned coping strategies are necessary	0	0

Table 8: Assessment of knowledge on changing health needs in pregnancy $n=50$

Sr. no	Changing health needs	No. of subjects	Percentage
1.	Nutritional supplement needed		
a	Iron and folic acid	0	0
b	Iron, folic acid, calcium	50	100
c	Only vitamin supplements	0	0
d	Iron supplements	0	0

had adequate knowledge of ANC. These studies help there searcher to select a sample of 50 primigravida mothers by

Table 9: Assessment of knowledge on labor $n=50$

Sr. no	Labor	No. of subjects	Percentage
1.	Meaning		
a	Time when labor pain starts	32	64
b	From uterine contractions to delivery	16	32
c	Process of giving birth	2	4
d	Another name for delivery	0	0
2.	True signs		
a	Accelerating cramps and increasing back pain	48	96
b	Generalized weak contractions	2	4
c	Nausea and vomiting	0	0
d	Fatigue and giddiness	0	0
3.	Maximum duration in primigravida		
a	6 h	10	20
b	8 h	8	16
c	10 h	17	34
d	12 h	15	30

Table 10: Assessment of knowledge on child bearing and rearing practices $n=50$

Sr. No.	Child bearing and rearing practices	No. of subjects	Percentage
1	New born vaccines		
a	BCG, hepatitis B, OPV	50	100
b	BCG, rotavirus	0	0
c	OPV, pentavalent	0	0
d	OPV, MMR	0	0
2	Period of exclusive breast feeding recommended		
a	6 months	26	52
b	12 months	20	40
c	18 months	4	8
d	Till breast feed production stops	0	0
3	Hours expressed breast milk can be kept at room temperature		
a	0–2 h	37	74
b	2–4 h	10	20
c	4–6 h	3	6
d	6–8 h	0	0

Table 11: Assessment of knowledge on pregnancy delivery bag $n=50$

Sr. No.	Pregnancy- delivery bag	No of subjects	Percentage
1.	Meaning		
a	Allinonekart containing everything needed to help in clean and safe delivery	29	58
b	A kit containing essential things to be used for baby and mother after delivery	16	32
c	A kit with instruments for delivery	0	0
d	A kit with clothes for the mother and new-born baby	5	10
2.	Things to be included		
a	Toiletries, comfortable clothes for baby and mother, water, snacks, necessary medications, and some cash	49	98
b	Toiletries, diapers, clothes, food	0	0
c	Towel, diapers, clothes	1	2
d	Feeding bottle, diaper, clothes	0	0

convenient sampling method from the antenatal OPD and ward of a hospital in a metropolitan city.^[7] According to a descriptive study, cross-sectional, conducted by Shah *et al.* in Narayana sub regional hospital in Parsa district, Nepal, using random sampling technique. 96 pregnant women interviewed using semi-structured questionnaire through face to face interview. About 45.8% of pregnant women, still have to wrong perception regarding consumption of green vegetables Quareshi *et al.*^[8] Similarly, in across-sectional study conducted by Demilew *et al.* in West Gojjam zone, northwest Ethiopia from May to August 2018 among 712 pregnant women regarding dietary practices and associated factors in pregnant women, only 19.9% have correct dietary approaches during pregnancy. In the light of these studies, the researcher was able to conclude that majority of the pregnant women did not have complete knowledge about the dietary practices to be followed during pregnancy.^[9]

In a qualitative study conducted by Russo *et al.* in 38 Afghan born women living in Australia. Participants consistently discussed experiencing emotional challenges following birth, identifying symptoms commonly associated with post-natal depression. Religion, strong relationship with the child, forming relationships, education, and utilizing child care was identified as positive influences on the emotional well-being of women.^[10] Similarly, in a cross-sectional study conducted by Schetter *et al.* on 5271 pregnant women of 20–26 weeks of gestation in Montreal, Canada. Multivariate analyses indicates a close association between anxiety and unintended pregnancy, first birth, higher medical risk and higher perceived risk of complications, early income adversity and those who did not speak French as their primary language. These studies reflect that psychological state of the mother may be affected by various interpersonal, socio cultural as well as socio-economic factors which, in turn, affects the fetus and pre disposes to complications in pregnancy.^[11]

CONCLUSION

The primary objective to assess the knowledge of primigravida mothers regarding birth preparedness was achieved by the analysis of sections I and II. Out of all the subjects, 56% had good knowledge on whereas 38% and 6% of the subjects had average and poor knowledge, respectively.

REFERENCES

- Oslon J. Deliver vs Give Birth. Plumtree Baby; 2015. Available from: <https://www.plumtreebaby.com/blogs/news/17956548-deliver-vs-givebirth>. [Last accessed on 2015 Mar 31].
- Anita SA, Ranveet K, Nazish R. Making pregnancy safer-birth preparedness and complication readiness study among women attendees of a primary healthcentre, Delhi. Indian J Community Med 2015;40:134-7.
- World Bank Data Team. Over 99% of Maternal Deaths Occur in Developing Countries. Data Blog; 2012 Available from: <https://blogs.worldbank.org/opendata/over-99-percent-maternal-deaths-occur-developing-countries>. [Last accessed on 2020 Feb 25].
- World Health Organization. WHO Recommendation on Birth Preparedness and Complication Readiness. Geneva: World Health

- Organization; 2015.
5. Yasodha V, Hevamavathy V. The knowledge of primigravida mothers regarding antenatal care in selected rural and urban areas. *Int J Innov Res Sci Eng Technol* 2014;3:17251-48.
 6. Vijayalakshmi S. Comfort measures during labour. *J Obstetr Gynaecol* 2013;1:23.
 7. Sunita S, Radha CA, Mangai S. Effectiveness of early suckling on third stage of labour among parturient women. *Nurs J India* 2019;7:10-4.
 8. Qureshi Z, Sekadde-Kiggundu C, Mutiso SM. Rapid assessment of partograph utilization in selected maternity clinics in Kenya. *East Afr Med J* 2010;87:235-41.
 9. Demilew T. Dietary practices and associated factors among pregnant women in West Gojjam Zone, North West Ethiopia. *BMC Pregnancy Childbirth* 2020;20:18.
 10. Russo A, Lewis B, Luchters S. A qualitative exploration of emotional well-being and support needs of new mothers from Afghanistan living in the Melbourne, Australia. *BMC Pregnancy Childbirth* 2015;15:197.
 11. Malachi A, Anders E, Benedict OS. Effectiveness of antenatal care services in reducing neonatal mortality in Kenya: Analysis of national survey data. *J Global Health Action* 2017;10:1328796.

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