

Factors affecting the maternal-fetal Attachment during pregnancy

Keithellakpam Memchoubi

Ph. D Scholar, Asst. Professor, Obstetric and Gynaecological Nursing, Bharati Vidyapeeth
(Deemed to be University) College of Nursing, Pune
keithellakpammemchoubi@gmail.com

Dr. Suresh Ray

HOD, Asso. Professor, Community Health Nursing Department, Bharati Vidyapeeth
(Deemed to be University) College of Nursing, Pune
raysureshkumar@gmail.com

Abstract: Maternal-fetal attachment is an imperceptible connection and maintain a bond between mother and baby in her womb which is considered an important part of fetal development and this attachment can be affected by different factors. In India, in which the mortality rate for women is 130 per 100,000 live births and the neonatal mortality rate at 25.4 deaths per 1,000 live births that makes it 12th worst among the 52 lower-middle-income countries. Healthy Maternal-fetal attachment may serve to allow women to adopt optimal health practices earlier, thereby on a larger scale contribute toward reduction of obstetric maternal and child morbidity and mortality. The objective of the study: To identify the factors affecting the maternal fetal attachment during pregnancy. Material & Method: Qualitative approach was used and the research design adopted was hermeneutic phenomenology. Data was collected from 25 samples. Sampling technique used was non probability purposive sampling technique. The tool consisted of demographic profile and a guiding questionnaire. The data was collected through one to one in-depth interview and field notes. To ensure the trustworthiness of the data credibility, transferability and dependability was done. The data collected was analyzed using descriptive statistics i.e. frequency and percentage for demographic variables and thematic analysis for determining essential codes, sub-themes and themes through content analysis and derived the factors affecting the maternal-fetal attachment. Results: Out of 25 women, 92% of women are in 18-25 years of age group, 60% did education upto secondary education, 56% are home maker, 48% monthly family income is rs. 18,983 to 31589/- , 96% of women doesn't have any history of significant illness, no history of surgery in all of them, 80% were between 36weeks 1 day to 40 weeks period of gestation, all of them get information regarding antenatal care, from health personal, 12% get information from magazine also, 48% from television and all of them either from internets, friends and relatives. 88% of them had a history of either nausea or vomiting, 4% heart burn, 16% backache, 8% breathing difficulty and 8% oedema. Total 10 themes and 40 sub themes are identified from which 10 factors are identified which affects the maternal-fetal attachment during pregnancy.

Keywords: maternal-fetal attachment, primigravida women, factors.

Background :

Muller believed that pregnant mother's experience of attachment with her own mother during childhood, would affect her attachment to the family, spouse and friends and this process may have an

effect on accepting the pregnancy and attachment to the fetus. Or it may say that current living condition of people is rooted in their past and attachment as a unique process is affected by personal factors, individual's beliefs and past, environment and cultural factors; attachment can also be affected by different issues like mental condition, social support, mother's age, gravida etc. which vary among different cultures.

The prenatal period is the most appropriate time for evaluating maternal-fetal attachment as this is the sensitive period of growth. Since all of the mother's behaviour, actions and thoughts during pregnancy could have more permanent effects on the fetus than any other period of child's life and pregnancy is considered as critical period in the development, therefore it is necessary to evaluate's different factors that may affect the maternal-fetal attachment during pregnancy by exploring various aspectthe primigravida women experiences during pregnancy as this is the first time they are experiencing pregnancy.

Purpose :

Maternal-fetal attachment is an imperceptible connection and maintain a bond between mother and baby in her womb which is considered an important part of fetal development and this attachment can be affected by different factors. In India, in which the mortality rate for women is 130 per 100,000 live births and the neonatal mortality rate at 25.4 deaths per 1,000 live births that makes it 12th worst among the 52 lower-middle-income countries. Healthy Maternal-fetal attachment may serve to allow women to adopt optimal health practices earlier, thereby on a larger scale contribute toward reduction of obstetric maternal and child morbidity and mortality.

The present study aims to explore the experience of women during pregnancy to identify the factors affecting the Maternal-fetal attachment during pregnancy. This also provide evidence-based data to direct and create policies in reproductive healthcare specific to maternity care. In India, very few studies have conducted to identify the factors affecting the maternal-fetal attachment which is the quantitative study, but researcher felt that Qualitative study can provide detail description of human understanding, explanation and occurrences from individual viewpoint irrespective of their demographics. Therefore, qualitative approach was thought to be appropriate for identifying the factors affecting maternal-fetal attachment among primigravida women for in-depth understanding of phenomenon of interest.

Objective :

- To identify the factors affecting the maternal fetal attachment during pregnancy among primigravida women.

Material and methods :

Design :

The research design or method of inquiry adopted for the present study was hermeneutic phenomenological research design.

Setting :

The study was conducted at selected districts of Western Maharashtra.

Target population:

The target population of the study comprised of all primigravida mother from selected districts of Western Maharashtra.

Data Collection Tool And Technique:

The present study aimed at identifying the factors affecting the maternal-fetal attachment during pregnancy, therefore the researcher developed a tool which was used as a guiding questionnaire for the study.

The tool consisted of two sections, Section I- Demographic data and Section –II Semi Structured interview schedule / guiding questionnaire.

Section I

Consists of structured questionnaire to assess the demographic variables of primigravida mothers which includes age of the mother, education status, occupational status, monthly family income, any history of medical illness, history of surgery, gestational period in weeks, information regarding antenatal care, and minor ailments.

Section II

This section had open ended questions to identify the factors affecting the maternal-fetal attachment during pregnancy among primigravida women.

Questions are focused on various aspects like planning of pregnancy, life style changes, gathering of information regarding antenatal care, involvement of family in care etc.

Findings:

Section I:

Out of 25 women, 92% of women are in 18-25 years of age group, 60% did education upto secondary education, 56% are home maker, 48% monthly family income is rs. 18,983 to 31589/- , 96% of women doesn't have any history of significant illness, no history of surgery in all of them, 80% were between 36weeks 1 day to 40 weeks period of gestation, all of them get information regarding antenatal care, from health personal, 12% get information from magazine also, 48% from television and all of them either from internets, friends and relatives. 88% of them had a history of either nausea or vomiting, 4% heart burn, 16% backache, 8% breathing difficulty and 8% oedema.

Section II: 10 factors are identified which affects the maternal-fetal attachment during pregnancy

1. Knowledge regarding pregnancy
2. Planning for pregnancy
3. Investigation during course of pregnancy
4. Perception of fetal movement
5. Cultural belief and practices
6. Family support
7. Developmental stage of pregnancy
8. Psychological well being
9. Literacy level
10. Type of family

Description of factors with verbatim:

1. Knowledge regarding pregnancy

In this study, shows that women who are more exposed to the knowledge about the pregnancy and care are more concerned towards the care of themselves during pregnancy. With the knowledge they adopt healthy practices and change their behaviour, as women described whatever good things she is doing are for the betterment of their baby.

“ I registered myself in Anganwadi, from their I received call regularly. That is how I came to know about how to take care of myself regarding diet, hygiene, regular check up. They even teach me how to feel the movement of my baby which is a very special moment.”

“ I get knowledge about how to take care of myself, its important because my baby is growing inside me”

2. Planning for pregnancy

Most of the women who planned their pregnancy have better attachment and adjustment from the day they diagnose with pregnancy / from early days of pregnancy than those mothers who didn't plan their pregnancy, even though later on as the pregnancy continues their attachment increased. As they share their feelings of eagerness to become mother / waiting for the moment.

Verbatim supporting for positive feeling, “it was a different kind of feeling, till then I was a girl, but now I am a mother, I felt very happy we were wanting a baby since some years.”

Verbatim supporting for negative feeling, “ I didn't want to get pregnant so soon, I wanted to do a job first. I was bit nervous in the beginning but later on as the pregnancy progresses I started feeling good.”

3. Investigation during course of pregnancy

As described by women, when they hear the heart beats of their baby, they feel really nice. Even when USG are performed and seeing movements of the baby, their small body parts make them more affection towards their baby. It is described as “beautiful moment” by some mother. Seeing their baby growing each time when USG is performed, their happiness and eagerness to hold their baby increases. Therefore, investigations specially listening to heart beats and USG affects the level of attachment during pregnancy.

“when I heard my baby's heart beat for first time I felt very good and I realised that a life is growing inside me and I have to take care of it”

“ when I see those tiny hands, legs ...in sonography, it was really good felt like touching with my hands.”

4. Perception of fetal movement

Women says that in early months she doesn't understand much about the baby growth but as the baby starts moving their feeling towards their baby changes. They become more attached to their baby, by touching with their hands-on tummy and even talk to them.

“when baby moves inside my tummy it gives a different kind of feeling, I touch with my hand and ask my baby ...anything he wants.”

“I talk with my baby whenever I am alone at home, my baby moves as if he is listening to me.”

5. Cultural belief and practices

As described by the women, cultural beliefs and practices plays a very important role in developing attachment between the mother and the baby in the womb. Women shares that their mother used to take care of them so well that they also will give better care to their babies which they inherit from their family. Performing cultural practices like baby shower is also one way of realising women to become motherhood. They are much aware about what preparation has to be done to receive their baby according to their culture.

“ My mother takes care of us so well that I would also to care of my baby as my mother does for us.”

“we don’t buy any new things before the arrival of baby, yes but with old clothes mother in law and my mother has prepared some clothes for baby. Which is good for the baby that only I do.”

6. Family support

Family support plays a very important role in bringing the pregnancy more positive. Women both who stays with in laws or who does not stay also getting psychological support, means a lot to them. They can take better care of themselves and their baby when their family members support them in terms of what they should eat, about the activities they should not be doing etc. Positive environment brings positiveness to the relationship between the women and the baby which in turn affects their attachment level.

“my husband takes care of me so well, he take care about my food what to eat , even he prepares Poha for me”

“ my mother in law takes good care of me, she doesn’t allow me to do much work also, everyone takes care of me. I feel good and that makes me happiness.”

7. Developmental stage of pregnancy

As described by mother, as the baby grows their feeling of presence in the life of women become more stronger and deeper. For the first time when they heard the baby’s heart sound, they share it as a very great feeling. And when the baby grows in size and started increasing their tummy size, they become prouder to be mother. Fetal movement is one which they cherish the moment as they spent their time touching their tummy and conversing with their babies.

“In the beginning I didn’t understand much, but as the pregnancy progresses my abdomen started bulging , I started realising that my baby is growing inside me.”

“hearing baby’s heart beat give me a very great feeling”

“ seeing baby tiny tiny part in the sonography make me realise that my baby is growing and I need to take care of my baby well.”

8. Psychological well being

Maternal-fetal attachment is very much affected by the psychological well-being of the women. Support of the family, their relationship with the partner and social support plays a very important role in maintaining psychological well-being of the women. This is shown by the change in the women’s behaviour like adopting healthy practices, performing regular yoga, eating healthy diet, avoiding travelling and others that will be harmful to their baby. Which they described as they do for the welfare of their baby. This shows their increase attachment level with their baby.

“I practice yoga regularly to keep myself calm and it also affects the behaviour of my baby.”

“ I read a book on Garbha-shanskar, it teaches me about bonding with the baby.”

“ I started drinking milk twice a day which I never used to like before thinking about my baby.”

9. Literacy level

Women’s literacy level is one of the factors that are associated with level of attachment. Women with higher education level have better understanding about the concept of maternal-fetal attachment as compare to women with less education level, which ultimately affects the

level of maternal-fetal attachment. Women with higher literacy level, are has prominent health seeking behaviour which ultimately affects their attachment with baby in the womb.

“ I bought books written by Balaji Tambe, it teaches me many thing about the baby growth and all.”

“ I take advices from my doctor and follow which is good for me as well as for my baby.”

“ I don't know much about what to do and all, yes family members tell me something about it.”

10. Type of family

Family type is also one factor which affects the maternal-fetal attachment level. As described by women, in neutral family the relationship between husband and wife becomes more stronger as they help each other a lot, get more space to be with each other which they share together the feeling about their baby. Women when they are alone, they usually talk to their baby even share what is happening around.

“ Only we both stay together, so he help me a lot in my work. When he goes for work, I am alone at home that time I talk with my baby, I ask what he is doing and how is he?”

“Everyone in my family takes care of me, they doesn't allow me to do any work. I feel good getting lots of love from everyone.”

Discussion:

In this study it shows that, Knowledge regarding pregnancy, Planning for pregnancy, Investigation during course of pregnancy, Perception of fetal movement, Cultural belief and practices, Family support, Developmental stage of pregnancy, Psychological well-being, Literacy level and Type of family have positive effects on maternal-fetal attachment even though in “planning for pregnancy” it shows better attachment and adjustment from the day they diagnose with pregnancy / from early days of pregnancy than those mothers who didn't plan their pregnancy, even though later on as the pregnancy continues their attachment increased.

The above finding is supported by a study on “maternal-fetal attachment and its associated factors” Findings showed that the mothers had good attachment toward their fetuses ($M=84.72$). The race, higher maternal age, higher education, gestational age, planned pregnancy, sex of fetus, and assessing health of fetus had positive effects on prenatal attachment ($P<0.05$). Tobacco use, multiparity, and high risk pregnancy had negative effects on attachment. There were no relationships between attachment and previous marriage, infertility, abortion, number/type of ultrasound, participation in prenatal classes and healthy baby ($P>0.05$)

References

1. Akankshi Srivastava, Pallavi Bhatnagar” Maternal foetal attachment and perceived stress during pregnancy” vol 8, 2019, <http://dx.doi.org/10.18203/2320-1770.ijrcog20193810>
2. Mansoureh Jamshidimanesh¹, Ladan Astaraki², Zahra Behboodi Moghadam³, Ziba Taghizadeh⁴, Hamid Haghani⁵” **Maternal-Fetal Attachment and its Associated Factors” Vol 18, 2013**, <http://hayat.tums.ac.ir/article-1-4-en.pdf>
3. Karakoç H, Ozkanb H. The Relationship with prenatal attachment of psychosocial health status of pregnant women. *Int J Health Sci.* 2017;5(10).
4. Vijayaselvi R, Beck MM, Abraham A, Kurian S, Regi A, Rebekah G. Risk factors for stress during antenatal period among pregnant women in tertiary care hospital of Southern India. *J Clin Diagno Res.* 2015;9(10):QC01-QC5.
5. Knowledge Regarding Care During Intra-Natal Period Among Antenatal Mothers SB K.Memchoubi, MayuriDurgade, PragatiChavan, VaishaliAhire, Swati Bhalerao

- journal of emerging technologies and innovative research 6 (6), 114-121
6. A study to assess the knowledge of postnatal mothers regarding self-care after childbirth in Bharati hospital and research centre, Pune
K Memchoubi, A Kudale, L Lilileima, L Koshy, S Londhe IJAR 3 (6), 1115-1117
 7. Noha Mohamed, Fawzia Mohamed, Predictors of Maternal Fetal Attachment among Pregnant Women, 2320–1959.p- ISSN: 2320–1940 Volume 6, Issue 1 Ver. VI (Jan. - Feb. 2017), PP 95-106 www.iosrjournals.org DOI: 10.9790/1959-06010695106 www.iosrjournals.org 95 | Page
 8. Pisoni C, Garofoli F, Tzialla C, Orcesi S, Spinillo A, Politi P, Balottin U, Manzoni P, Stronati M, Risk and protective factors in maternal-fetal attachment development. Early Hum Dev. 2014 Sep;90 Suppl2:S45-6. doi: 10.1016/S0378-3782(14)50012-6.
 9. Ray PS. Impact of Infertility treatment. Journal of Emerging technology and innovative research. 2019(April); 6(4): 1834-1839
 10. Ray S. Knowledge of Mothers regarding worm infestation in selected slums. Asian Academic Research Journal Of Multidisciplinary .2015 (October); 2(5): 80-85
 11. Ray S. Knowledge regarding PPTCT of HIV among antenatal mothers. The Pharma Innovation – International Journal. 2019(June); 8(6): 136-138