Original article

MATERNAL HEALTH PROMOTION BASED ON THE BIRTH EXPERIENCE OF WOMEN WITH HEART DISEASE*

Thaís Vasconselos Amorim[1], Ívis Emília de Oliveira Souza[2], Anna Maria de Oliveira Salimena[1], Ana Luiza de Oliveira Carvalho[2], Lúcia de Fátima da Silva[3], Tassiane Ferreira Langendorf[4]

ABSTRACT: The aim of this study was to understand the meanings of the birth process based on the experiences of high-risk pregnancies of women with heart disease. A qualitative study with a phenomenological approach, with data collection happening between July and December 2014, was developed at a high-risk pregnancy hospital in the Southeastern region of Brazil. Seventeen participants were interviewed and the expressed meanings were analyzed with the theoretical-methodological approach of Martin Heidegger. Women mentioned fearing death during birth; and worries about their infants' survival, asking physicians to prioritize their lives. The display of concerns facing the expressed fears stood out, involving vulnerabilities which patients with heart disease experience when pregnant. That is because, in addition to possible complications stemming from heart disease, there are subjective issues that are ignored during the healthcare process, especially related to lack of communication and one-sided decision making regarding the type, time and route of delivery.
DESCRIPTORS: Maternal health; Heart diseases; High-risk pregnancy; Delivery; Nursing.

PROMOÇÃO DA SAÚDE MATERNA A PARTIR DO VIVIDO DO PARTO DE MULHERES CARDIOPATAS

RESUMO: Objetivou compreender os significados do processo parturitivo a partir da vivência do risco gestacional da mulher portadora de cardiopatia. Estudo qualitativo de abordagem fenomenológica, com coleta de dados entre julho e dezembro de 2014, em hospital para alto risco materno na Região Sudeste do Brasil. Dezessete participantes foram entrevistadas e os significados expressos analisados na perspectiva teórico-metodológica de Martin Heidegger. As mulheres significaram o medo de morrer no parto; e a preocupação com a sobrevivência do bebê, pedindo ao médico para dar prioridade em salvá-lo. Evidenciou-se o desvelamento do temor frente ao medo expresso, implicando em vulnerabilidade que cardiopatas vivenciam ao engravidarem. Isto porque, para além das possíveis complicações advindas da doença cardíaca, residem subjetividades que são apartadas do processo de cuidado em saúde, especialmente no que diz respeito à falta de diálogo e tomada de decisão unilateral acerca do tipo, momento e via de parto.
DESCRITORES: Saúde materna; Cardiopatias; Gravidez de alto risco; Parto; Enfermagem.

PROMOCIÓN DE SALUD MATERNA A PARTIR DE VIVENCIA DEL PARTO DE MUJERES CON CARDIOPATÍA

RESUMEN: Se objetivó comprender los significados del proceso de parición partiendo de la vivencia del riesgo gestacional de mujeres con cardiopatía. Estudio cualitativo de abordaje fenomenológico. Datos recolectados de julio a diciembre de 2014 en hospital de alto riesgo materno de Región Sudeste de Brasil. Fueron entrevistadas diecisiete participantes. Los significados manifestados fueron analizados según perspectiva teórico-metodológica de Martin Heidegger. Las mujeres significaron el miedo a morir en el parto; y su preocupación por la supervivencia del bebé, pidiendo al médico priorizar su salvación. Se evidenció el desvelo del temor ante el miedo expresado, implicando en la vulnerabilidad que experimentan las mujeres con cardiopatía al quedar embarazadas. Más allá de las posibles complicaciones devenidas de la enfermedad cardíaca, residen subjetividades aparte del proceso de cuidado en salud, particularmente en lo que respecta a la falta de diálogo y toma unilateral de decisiones sobre el tipo, momento y vía de parto.
DESCRIPTORES: Salud Materna; Cardiopatías; Embarazo de Alto Riesgo; Parto; Enfermería.

*Article extracted from the thesis titled: "Gestar Sendo-portadora-de-cardiopatia: contribuições para o cuidado em Saúde da Mulher" Federal University of Rio de Janeiro, 2015.

[1]Nurse. PhD in Nursing. Nursing professor at the Federal University of Juiz de Fora. Juiz de Fora, MG, Brazil.
[2]Nurse. PhD in Nursing. Nursing professor at the Federal University of Rio de Janeiro. Rio de Janeiro, RJ, Brasil.
[3]Nurse. PhD in Nursing. Nursing professor at the Federal University of Ceará. Fortaleza, Ceará, Brazil.
[4]Nurse. Postdoctoral Nursing Researcher. Federal University of Santa Maria. Santa Maria, Rio Grande do Sul, Brazil.

Corresponding author:
Thaís Vasconselos Amorim
Universidade Federal de Juiz de Fora
R. Paulo de Souza Freire, 56 - 36025-350 - Juiz de Fora, MG, Brasil
E-mail: thaisamorim80@gmail.com

Received: 07/04/2017
Finalized: 26/10/2017

INTRODUCTION

Maternal health is promoted by care actions such as family planning and prenatal care, both aiming to promote women empowerment and protagonism during the planning of pregnancy and birth, as recommended by current programs and policies[1-2]. It is known that quality of prenatal care is directly proportional to maternal and fetal health, with crucial importance being placed on access, basic structural conditions, and professionals who were adequately trained in the variety of clinical and obstetrical situations that can happen during pregnancy, delivery, birth, and puerperium.

In the current context, it is crucial to observe the goal established by the third Sustainable Development Objective for the reduction of global maternal mortality ratio (MMR) to 70 deaths for every 100,000 live births, for the next 15 years. Brazil aims to reduce MMR to 20 until 2030[3], which is a challenge considering the growth in chronic degenerative diseases such as heart disease[4].

The clinical handling of previous heart diseases or heart diseases during pregnancy must include the planning of interventions during the whole pregnancy-puerperium cycle, with a special focus on the prevention of complications that result in avoidable maternal deaths. It is known that high-risk pregnancies are associated with unfavorable maternal and neonatal results, which demands more attention for and the need for health promotion of mothers and infants during the pregnancy-puerperium cycle. The prevalence of death in the intrapartum and postpartum periods is noteworthy, considering the relation between clinical events during the immediate birth period and those during the birth process[5-6].

It is recommended that the route of delivery be assessed disregarding the heart disease, since cardiac overload is similar both for vaginal and C-section deliveries. However, risks inherent to C-sections, such as infections and other complications, make assisted vaginal delivery the safest option. In both cases, mothers and infants must be carefully monitored, with close control of the volume of liquids infused and great attention for stipulated hemodynamic changes, such as increase in preload, mean blood pressure, and blood loss[4-7].

In tandem with physiological and objective issues inherent to birth in women with heart disease, there are subjective issues which, if kept away from care, can contribute to increasing mortality, since anxiety can increase cardiac output by 60%, occurring even during uterine contractions[7]. In addition to anxiety, feelings like fear, stress, impotence, and guilt are frequently related to women during high-risk pregnancy-puerperium periods because of the unfavorable effects heart disease can have on the health of mothers and infants, announcing the vulnerabilities to which they are exposed[8-10].

This paradigm is a paradox, because although medical practices and protocols are already well established, considering factors ranging from the classification of pregnancy risk until birth and post-birth monitoring, women still feel insecure, fearful, and impotent, which shows the gap between science and the subjective dimension[11].

Listening to women and understanding how they experienced birth in a high-risk pregnancy makes it possible for the health team, to which nurses are part when analyzing *beings*† individually and socially in vulnerable situations, to conduct a critical and problem-solving analysis of their adherence to practice, in response to government policies and programs.

Nursing research that guides professional practice has no consideration for specific features of heart disease in high-risk pregnancies, with incipient scientific production that mostly employs quantitative points-of-view. Facing this gap and because of the relevance of health care beyond biological aspects, not looking to contemplate comprehensiveness as a guiding principle of care, the authors' goal was to understand the meanings of the parturition process from the experience of high-risk pregnancies of women with heart disease.

METHOD

† Words in italics refer to those used in Martin Heidegger's work.

http://dx.doi.org/10.5380/ce.v22i4.51641

This was a qualitative study based on Martin Heidegger's phenomenological approach[12]. In order to achieve the proposed objective, Heideggerian phenomenology proved to be an appropriate method for enabling objectivity in subjectivities, with the scientific rigor of presupposition reduction, so that meaning could be unveiled.

Women who were pregnant while at risk of heart disease were researched. Data collection took place between July and December, 2014, at a reference hospital for high maternal risk in the Southeastern region of Brazil.

Data was sourced from prenatal medical records of pregnant women who were treated at the study setting and that met the inclusion criteria of having heart disease and having experienced high-risk pregnancies, receiving prenatal care at that institution. Exclusion criteria were being over 18 and having mental disorders.

After the search for records and confirmation of possible inclusion to the study, researchers called the women by telephone to explain the research and its objectives. Seventeen participants consented to the study by signing free and informed consent forms. The chosen data collection technique was carrying out open interviews at the institution, with only one interview being performed at a household. Through an interview guide, women received guiding questions that addressed the study's object.

Interviews lasted 32 minutes in average and were recorded with an MP3 device. A field diary was used to record non-verbal content expressed by participants, such as gestures, crying, and silence. After transcribing the interviews, data analysis was conducted.

Martin Heidegger's[12] references are based on the hermeneutic analytical movement in two methodical stages that begin with careful listening and reading of interviews, seeking essential structures that respond to the objective being researched. The approximation of these structures or excerpts that make up the content of the interviews made it possible to reach the significance units as analysis categories.

The first analytical moment, called vague or average understanding, unfolded from the ontic understanding or from the facts for women who went through pregnancy while suffering from heart disease. This first comprehension enabled the interpretation/hermeneutic of the meanings of the ontological or phenomenal instance, according to the Heideggerian thinking. It should be noted that the discussion of this article presents the reached hermeneutic in coordination with results from research on the investigated theme.

Participant anonymity was guaranteed by using alphanumeric codes employing the letter "P" and followed by the number that corresponded to the order of interviews (P1, P2, P3...P17).

The research proposal was approved by the Human Research Ethics Committee of the Anna Nery School of Nursing, under rulings 1.103.165 and 1.139.507, in June 2015.

RESULTS

Mean age for the 17 participants was 30 years and heart disease diagnoses made before pregnancy were distributed as follows: four ischemic heart disease (23%), one congenital (6%), six rheumatic (36%), two disorders related to the electrical conduction system of the heart (12%), four valvular lesions (23%).

The total number of pregnancies was 40 among the participants, of whom 13 (76%) did not plan the most recent pregnancy, four women (23%) had one previous pregnancy, six (36%) had two pregnancies, four (23%) had three pregnancies and three (17%) had had four pregnancies. As for the number of births, five women went through one birth, eight had two births and four had three births. Of the 17 participants, six had abortions in previous pregnancies. Delivery routes were distributed during their reproductive histories as 19 (58%) C-section and 14 (42%) vaginal deliveries.

The hermeneutic analytical movement enabled the construction of two significance units. Thus, for women who participated in this study, the experience of birth meant: Fearing death during birth; and Asking physicians to prioritize their baby's lives due to concern with them.

On fearing death, participants mentioned fearing death because of their heart disease, listing reasons for that feeling: fear of suffering a cardiac arrest; hemorrhaging; having heard someone saying that blood pressure increases; and for knowing they were under risk of undergoing a C-section, as showed by the following excerpts:

[...] because of the problem I have, that I am a cardiac person, I was afraid of having a heart attack during the procedure, a cardiac arrest [...] because they say your blood pressure increases, and mine did. (P1)

[...] I was afraid, I am there, pushing, my heart races, I have no strength at all, how are they going to get the child? (P2)

[...] real fear is of dying during delivery. I am afraid of hemorrhaging during the procedure, my heart not taking it, stopping beating [...]. (P3)

[...] during her delivery I was very afraid of dying; I feared my pressure increasing, of having a hemorrhage. (P4)

They also expressed their fears related to route of delivery and that, by having gone through previous births with a heart disease, they thought worse things could happen, as demonstrated by the highlighted excerpts:

[...] I already have this problem, it is going to be my first C-section. As I never had a C-section, I am very worried because of what people say, I fear anesthesia. (P5)

I thought about it a lot during the delivery, I only thought that suddenly something bad would happen, it is the fear of what I went through before. (P10)

[...] yesterday when I was admitted I was already uneasy, with a racing heart, did not sleep well, I think it is anxiety, so everything is an issue for those with heart disease and they cause these symptoms. (P17)

When worrying about their infants and asking doctors to prioritize them, women began their comprehension signifying fear that something might happen to their infant during birth because of their heart disease. They considered that, if physicians had to choose, they should save their infant's lives. They claimed they had mentioned that to the professionals, although they knew they would be their priority. The following texts express this understanding:

[...] My fear was tachycardia, of my heart racing at some point, lacking oxygen for him and them having to make a choice, like, do we save the mother or the baby, you understand? [...] this doctor told me during exams: the priority here is you. I said: but I don't want to be the priority, I want my baby to be the priority, because I am here for him. (P2)

[...] I told the doctor: if something happens to me during birth, save my daughter, leave me because I already did what I had to do. (P4)

[...] I fear my baby being born and not resisting [...] The moment that scared me the most was when the doctor came to talk to me and my husband saying that he would have to perform the delivery anyway [...] the risk was losing me and my son all at once. (P12)

They also worried about their infants being born preterm and with heart issues because of hereditary aspects. Some reports that demonstrate these meanings:

[...] what if the child decides to be born at seven months? Because the girl that was being monitored with me had just had her baby, my cousin had just had a preterm baby, she is hospitalized, I was very scared, so I did everything early. (P3)

[...] My daughter is preterm. Because I have heart disease, I was very scared of losing her, which was my real fear, and her being born with some issue, which happened, she was born with almost the same issues I did. (P9)

[...] Oh it gets passed on, it does, because we know that there are, how can I say, hereditary issues. Se we worry about that. (P17)

DISCUSSION

In the existential movement of participants in this study, when interpreting the adopted theoretical framework, fear is unveiled in the ontological dimension as *fearfulness*. Possibilities are named in their variations *alarm*, *dread* and *terror*. The distinction in the construction of these types is interpreted according to the proximity of the threat and the sudden way it occurs.

Thus, fear becomes *alarm* because of a situation that is presented as a known or familiar threat that happens suddenly for the *women-being-here*. For the participants, the high-risk pregnancy classification was already familiar, since they had experience from past risk pregnancies. Thus, the life risk became a threat, changing fear to *alarm*.

When getting closer to the time of delivery *women-being-here* understand that their fear increased, supporting the interpretation of life risk brought about by the definition of pregnancy risk, which objective science denotes to increase during delivery because of possible hemodynamic heart complications both for mothers and for infants[7-8]. In parallel, when going back to the fear signified by participants, in its sense of approximation and non-familiarity, it transforms into *dread*, since *women-being-here* do not know how delivery will be through the lens of the current pregnancy and in which conditions their infants will be born.

There can still be the one that threatens having the sudden character and the familiarity of alarm in tandem with the non-familiarity of *dread* and, when revealing itself simultaneously, fear transforms existentially into *terror*[12]. When feeling *alarm* and *dread* at the threat of maternal and fetal lives, fear becomes *terror*, since the *alarming* risk to them and their infants and the lack of knowledge related to the *dreadful* delivery could transform into a *terrorful* death.

Similarly to results found in this study, for pregnant women who were hypertensive or carriers of severe maternal morbidities, anguish and fear of death were associated with the pregnancy-puerperal cycle in the perspective of prematurity, a clinical condition that can also be related to maternal heart disease[8,13-14]. In this case, prevention of preterm birth requires rest and clinical stabilization of patients, especially women in functional classes I and II. Birth must be scheduled according to maternal and fetal conditions, with a possibility of a therapeutic preterm birth in case of clinical resistance to treatment[10].

In parallel, decision on the most adequate time of birth, type of birth, anesthesia and handling of perinatal care in pregnant women with congenital heart disease must be discussed with the active participation of cardiologists, obstetricians, neonatologists, and anesthesiologists. And, regarding the classification of functional heart capacity in III and IV, there is a recommendation for hospitalization in the third trimester of pregnancy, with the goal of planning birth, stabilizing and monitoring mother and infant, in addition to adjusting medication doses[10].

The results of this research pointed to a higher number of C-sections, agreeing with data from a cohort study that, although having found no significant statistical differences between obstetrical complications and type of birth, found a 3.44-fold increase in chances of unfavorable neonatal outcomes. Increase in gestational risk, by itself, determined 3.8-fold possibilities for adverse maternal outcomes and 17.5-fold chances for worse neonatal outcomes[6].

Fetal cardiac malformations can or cannot be associated with maternal heart disease. Frequently, augmented risks for developing heart disease in fetuses are related to the presence of congenital heart disease in parents, with a higher incidence if the mother is the carrier. In this situation, genetic counseling should be considered, with exams to diagnose fetal heart disease during prenatal care and instructions on the risk of transmission of maternal disease to the developing fetus[2].

In some cases, the medical interruption of pregnancy is recommended in cases where there are no alternatives to support pregnant women's lives, especially when treating heart diseases with risk for maternal-fetal death between 50 and 70%[7]. In the understanding of the women in this study, independently of the severity of heart disease and gestational risk, they mentioned having asked physicians to prioritize their infants' lives and in specific situations, avoid pregnancy interruption.

Similarly, in an integrative review on the experience of women with preeclampsia, participants believed that infants were not ready to be born and the feeling of guilt increased with the need for

preterm birth and neonatal death. Results also pointed to fear of their own death in association with other negative feelings[15].

Concerning the emotional dimension, it is known that anxiety and stress must be particularly considered in the sphere of high-risk pregnancy, causing complications that result in worse perinatal outcomes, affecting family relationships because of changes in mental health state[16]. Heart disease is also associated with a higher incidence of postpartum depression, especially when there are maternal complications. In this case, depression manifests itself through feelings of fear, panic, and sadness[17].

Interventions during the prenatal period are suggested in order to prevent postpartum depression[18]. For such, it is necessary to consider emotional issues surrounding pregnant women with heart disease through attentive listening during consultations and care sessions for mothers and fetuses[11].

In a prospective study that analyzed quality of life during pregnancy and after birth in women with heart disease, there were lower scores for the domains og general health status and vitality, which, along with the demands of motherhood, can also be associated with heart disease. As in this research, the most prevalent diagnoses in the mentioned study were associated with rheumatic and valvular heart diseases, in addition to similarities in the number of pregnancies, previous abortions, and absence of pregnancy planning for the most recent one. Regarding that last aspect, the negative correlation found between emotional aspects and absence of pregnancy planning after birth stood out[19].

The healthcare professional team, especially nurses, involved in the peripartum period must include in the care plan emotional support, support and assessment of patients' mental well-being when facing their own vulnerability, since these issues will strongly impact the pregnancy-puerperium cycle and family dynamics after birth[20].

In this sense, conceptions about the analysis of individual, social and programmatic vulnerabilities are addressed in parallel. In this plan, it is noted that analysis of individual vulnerability depends on the quality of the guidance transmitted to patients, of the effective knowledge that they absorb regarding their health problems and the capacity that they possess to transform their routines seeking healthier lifestyles[9].

In the social sphere, vulnerability can be understood as a degree of access that people have to good conditions of living, hygiene, leisure, consumer goods, and freedom of speech. Lastly, in the programmatic instance, analysis of vulnerability is carried out based on programs, strategies, and governmental actions that aim to solve populational problems in a multidimensional context[9].

In the personal sphere, although participants in this study exhibited a certain degree of knowledge regarding the risks of birthing due to heart disease, they kept having difficulties to incorporate transmitted knowledge to their routines, given the lack of pregnancy planning and the permanence of doubts, uncertainties, and *fearfulness*. They became even more vulnerable in the perspective of the effective transformation of their reality beginning with themselves.

In the programmatic sense, vulnerability was present when analyzing statistics that reveal elevated rates and increasing maternal-fetal morbidity due to cardiac disease[4,6]. Despite the interface of the action plan to cope with non-communicable chronic diseases, along with the *Rede Cegonha* (Stork Network) in monitoring nutrition, hypertension control, and glycemia in pregnant women[21], these procedures were shown to be technically insufficient, reductionist and limiting, being of little democracy in relation to the resources that women need so they are not exposed to more severe disorders, as well as their infants, who are monitored for only two years after birth[22].

In this scenario, even if the reference institution for maternal risk receives and monitors pregnant women, ensures consultations with various professionals and in some cases embraces the women and their infants in a *continuum* of care after the pregnancy-puerperium cycle, it cannot guarantee that women and infants will be under the same surveillance and protection, which implicates considering the social vulnerability to which they are exposed.

Qualitative methodologies are limited regarding the non-generalization of results, however, the theoretical-methodological framework is relevant in the possibility to point directions that can be included in clinical practice, so as to consider ontic and ontological aspects, overcoming models centered on pathologies and rather than *beings* in a situation of disease.

FINAL CONSIDERATIONS

The analysis of the existential movement of women with heart disease when experiencing birth pointed to the unveiling of fearfulness when facing the expressed fear of dying during birth. It was possible to discuss the vulnerability that heart disease women experience while pregnant. This is because in addition to possible complications resulting from heart disease that cause fear, anxiety, and stress in participants, there are subjectivities that are kept away during the healthcare process, especially concerning the lack of dialog and one-sided decision making on type, time, and route of delivery.

Broadening this discussion is believed to contribute to the reflection of nurses and other health professionals regarding comprehensiveness, which must be the guiding principle behind embracement care practices that are individualized and intersubjective for women with high-risk pregnancies.

In this sphere, one must pay attention to active, attentive listening and a perspective of communication that favors understanding and coping with negative feelings in women, which enables better maternal and neonatal outcomes.

REFERENCES

1. da Silva RM, de Araújo KNC, Bastos LAC, Moura ERJ. Planejamento familiar: significado para mulheres em idade reprodutiva. Ciênc. saúde coletiva. [Internet] 2011;16(5) [acesso em 18 out 2016]. Disponível: http://dx.doi.org/10.1590/S1413-81232011000500010.

2. Jorge HMF, Hipólito MCV, Masson VA, da Silva RM. Prenatal care and public policies for women's health: integrative review. Rev Bras Promoç Saúde. [Internet] 2015;28(1) [acesso em 18 out 2016]. Disponível: http://dx.doi.org/10.5020/18061230.2015.p140.

3. Souza JP. A mortalidade materna e os novos objetivos do desenvolvimento sustentável (2016-2030). Rev. Bras. Ginecol. Obstet. [Internet] 2015;37(12) [acesso em 05 nov 2016]. Disponível: http://dx.doi.org/10.1590/SO100-720320150005526.

4. Lage EM, Barbosa AS. Cardiopatias e gravidez. Femina. 2012;40(1):43-50.

5. Kassebaum NJ, Bertozzi-Villa A, Coggeshall MS, Shackelford KA, Steiner C, Heuton KR, et al. Global, regional and national levels and causes of maternal mortality during 1990-2013: a systematic analysis for the Global Burden of Disease Study 2013. The Lancet. [Internet] 2014;384(9947) [acesso em 05 nov 2016]. Disponível: http://dx.doi.org/10.1016/S0140-6736(14)60696-6.

6. Reis ZSN, Lage EM, Aguiar RALP, Gaspar JS, Vitral GLN, Machado EG. Associação entre risco gestacional e tipo de parto com as repercussões maternas e neonatais. Rev. Bras. Ginecol. Obstet. [Internet] 2014;36(2) [acesso em 05 nov 2016]. Disponível: http://www.scielo.br/pdf/rbgo/v36n2/0100-7203-rbgo-36-02-00065.pdf.

7. Ministério da Saúde (BR). Departamento de Ações Programáticas e Estratégicas. Gestação de Alto Risco: manual técnico. Brasília: Ministério da Saúde; 2012.

8. de Souza NL, de Araújo ACPF, Costa ICC. Representações sociais de puérperas sobre as síndromes hipertensivas da gravidez e nascimento prematuro. Rev. Latino-Am. Enfermagem. [Internet] 2013;21(3) [acesso em 12 nov 2016]. Disponível: http://dx.doi.org/10.1590/S0104-11692013000300011.

9. Ayres JRCM. O conceito de vulnerabilidade e as práticas de saúde: novas perspectivas e desafios. In: Czeresnia D, Freitas CM, organizadores. Promoção da saúde: conceitos, reflexões, tendências. Rio de Janeiro: Fiocruz; 2003. p.117-39.

10. Avila WS, de Figueiredo MR, Bortolotto L. Gestação em cardiopatias congênitas: visão do cardiologista e do obstetra. Rev Soc Cardiol Estado de São Paulo. 2015;25(3):147-55.

11. Amorim TV, Souza IEO, Salimena AMO, de Melo MCSC, Paiva ACPC, Moura MAV. The everyday of a heart disease high-risk pregnancy: phenomenological study of care relationships. Esc. Anna Nery. [Internet] 2016;20(4)

[acesso em 05 nov 2016]. Disponível: http://dx.doi.org/10.5935/1414-8145.20160091.

12. Heidegger M. Ser e Tempo. Vozes: Petrópolis; 2011.

13. Carvalheira APP, Tonete VLP, Parada CMGL. Sentimentos e percepções de mulheres no ciclo gravídico puerperal que sobreviveram à morbidade materna grave. Rev. Latino-Am. Enfermagem. [Internet] 2010;18(6) [acesso em 12 nov 2016]. Disponível: http://dx.doi.org/10.1590/S0104-11692010000600020.

14. Tedesco RP, Passini Junior R, Cecatti JG, Pacagnella RC, Sousa MH. Estimations of preterm birth rate, associated factors and maternal morbidity from a demographic and health survey in Brazil. Matern Child Health J. [Internet] 2013;17(9) [acesso em 12 out 2016]. Disponível: http://dx.doi.org/10.1007/s10995-012-1177-6.

15. Vaerland IE, Vevatne K, Brinchmann BS. An integrative review of mother's experiences of pre-eclampsia. J Obstet Gynecol Neonatal Nurs. [Internet] 2016;45(3) [acesso em 12 nov 2016]. Disponível: http://dx.doi.org/10.1016/j.jogn.2016.02.006.

16. Fairbrother N, Young AH, Janssen P, Antony MM, Tucker E. Depression and anxiety during the perinatal period. BMC Psychiatry. [Internet] 2015;15(206) [acesso em 12 out 2016]. Disponível: http://dx.doi.org/10.1186/s12888-015-0526-6.

17. Burgut FT, Bener A, Ghuloum S, Sheikh J. A study of postpartum depression and maternal risk factors in Qatar. J Psychosom Obstet Gynaecol. [Internet] 2013;34(2) [acesso em 12 nov 2016]. Disponível: http://dx.doi.org/10.3109/0167482X.2013.786036.

18. Clatworthy J. The effectiveness of antenatal intervention to prevent postnatal depression in high-risk women. J Affect Disord. [Internet] 2012;137(1-3) [acesso em 12 nov 2016]. Disponível: http://dx.doi.org/10.1016/j.jad.2011.02.029.

19. Meneguin S, Xavier CL, de Santana DG. Quality of life of cardiac patients during pregnancy and after birth. Acta paul. enferm. [Internet] 2016;29(2) [acesso em 12 nov 2016]. Disponível: http://dx.doi.org/10.1590/1982-0194201600032.

20. Doyle CS. When delivery expectations change: the role nurses play in reducing parental stress. Nurs Womens Health [Internet] 2011;15(6) [acesso em 12 nov 2016]. Disponível: http://dx.doi.org/10.1111/j.1751-486X.2011.01680.x.

21. Brasil. Ministério da Saúde (MS). Departamento de Análise de situação de saúde. Plano de ações estratégicas para o enfrentamento das doenças crônicas não transmissíveis (DCNT) no Brasil 2011-2022. Brasília: Ministério da Saúde; 2011.

22. Ministério da saúde (BR). Portaria n. 1.459, de 24 de junho de 2011: Institui, no âmbito do Sistema Único de Saúde - SUS - a Rede Cegonha. Diário Oficial da União, [Internet] 24 jun 2011 [acesso em 22 dez 2016]. Disponível: http://bvsms.saude.gov.br/bvs/saudelegis/gm/2011/prt1459_24_06_2011.html.