

ANALYSIS OF FACTORS AFFECTING THE DECREASE OF UTERI FUNDUS ON MOTHER POST PARTUM IN THE HEALTH CENTER LAMONGAN CITY

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ABSTRACT

A decrease in Uterus fundus height (Involution) is a uterine process back before pregnancy weighing about 60 grams. Several factors that affect the decline of the uterine fundus are early initiation of breastfeeding, early mobilization, nutritional status and parity. The purpose of this study is to determine the factors that most influence the decrease level of fundus uteri post partum mothers at Lamongan Public Health Center. This research is quantitative with cross sectional design. The sample of 110 post partum mothers used Random Sampling technique, using primary and secondary data with questionnaire instrument and observation sheet, analysis with Dummy Regression test. Place and time of research at Puskesmas Lamongan City on 15 April to 15 June 2017. Based on research almost all 87 respondents (79.1%) initiation of early breastfeeding experienced a decrease in fundal uteri height. The result of analysis by using Dummy Regression test which is most dominant to the decrease of fundus uteri height is initiation of early breastfeeding with $p = 0,000 < \alpha = 0,05$ which means there is correlation between early breastfeeding with decreasing fundal height of uteri. The overall care of postpartum mothers is necessary to optimize uterine contractions resulting in the process of involution. Early breastfeeding initiation leads to a decrease in the height of the uterine fundus due to the baby's suction on the nipple thus stimulating the smooth muscle in the breast which then stimulates the surrounding nerves and continues the stimulation to the muscles that result in a process of decreasing the height of the uterine fundus.

Keywords: High Fundus Uteri, Mother Post Partum

PRELIMINARY

The process of restoring health during the puerperium period is very important for the mother after childbirth. Because during pregnancy and childbirth there has been physical and psychological changes. Physical changes include soft and sagging ligaments, stretching muscles, enlarged uterus, posture changes to compensate for weight changes during pregnancy, and dams in the lower limbs. At the time of delivery the pelvic wall is always stretched and there may be damage to the birth canal, after the pelvic floor muscles become sagging because it stretches for so long during pregnancy and childbirth. (Sarwono, 2002).

While the Maternal Mortality Rate in Lamongan District in 2014, which amounted to 54 per 100,000 live births. While the number of maternal deaths handled by health workers, according to reports from health centers received by the Health Office of Sub-Dinas Kesehatan Lamongan for 10 people, consist of maternal deaths as much as 1 person, 1 maternal mother and 8 maternal postpartum. (Health Office 2014). AKI in Lamongan city in 2016 reached 63.7 per 100,000 live births. As for the case of bleeding at the time of delivery as many as 7 people at the Puskesmas Lamongan City in 2016.

As per opinion (Roesli in Indriana 2011) with suction baby milk released. The process is when the baby sucks smooth muscle on the aroused nipple, this

nerve stimulation is transmitted to the brain. Then the brain ordered the back hipofise gland to release the hormone oxytocin brought to the smooth muscle of the breast, so that smooth muscle to contract.

Health workers are expected to provide postpartum midwifery services that include maternal needs during the puerperium, so it is important to develop standards for midwifery services to improve the quality of midwifery services. Thorough treatment is needed for postpartum mothers to optimize uterine contractions in assisting the process of uterine involution. So after the mother gives birth immediately start early breastfeeding and early mobilization so that it can accelerate the decrease in high fundus uteri.

A. METHOD

This research is a quantitative research using correlation study with cross sectional approach on all physiological mothers both primipara, multipara and grandemultipara which amounted to 153 people then done Randem Sampling with the number of samples to 110 respondents then conducted data collection using questionnaires and measured using metline then performed Data processing starting from editing coding and tabulation continue to be done by using Dummy regression analysis.

B. RESEARCH RESULT

Based on Table 4.10 shows that of the 110 respondents

who almost entirely initiated Breastfeeding Initiation decreased Fundus Uteri by 87 (79.1%) and based on hypothesis testing for early breastfeeding initiation variables obtained t count 4.081 with significance 0.000, then H0 rejected H1 accepted. which means there is a relationship between early breastfeeding initiation with a decrease in uterine fundus height.

Based on Table 4:11 shows that from 110 respondents almost all who do early mobilization Uteral Fundus lowered the rate of 91 (84.5%) and based on hypothesis testing for early mobilization variables obtained t value of 2.867 with significance 0.005, then H0 rejected. H1 is accepted which means there is a relationship between early mobilization with a decrease in fundus height of uteri.

Based on Table 4.12 shows that of the 110 respondents most of the normal nutritional status of Uterine Fundus decreased by 76 (69.1%) and based on hypothesis testing for nutritional status variables obtained t count 3.289 with significance 0.001, then H0 rejected H1 accepted which means there is the relationship between nutritional status and decreased high fundus uteri.

Based on Table 4:13 shows that from 110 respondents most of the multiparous Parity who experience high Uterus Fundus deviation is 62 (56.4%) and based on hypothesis test for parity variable obtained t count value of 2.536 with a significance

of 0.013, then H0 rejected H1 received meaning there is a relationship between parity with a decrease in the fundus high uteri.

Based on Table 4:14 SPSS calculation obtained F value of 32,800 with a significance of 0,000 indicating a simultaneous relationship between independent variables (Early Breastfeeding Initiation, Early Mobilization, Nutritional Status, and Parity) with a decrease in fundus height of uteri.

The Dummy Regression Analysis results show the following probability values:

$$Y = a + X_1\beta_1 + X_2\beta_2 + X_3\beta_3 + X_4\beta_4 + X_5 + e$$

$$Y = 5.112 + 0.778X_1 + 0.643X_2 + 0.179X_3 + 0.272X_4 + e$$

$a = 5.112$ The constant of 5,112 indicates the magnitude of Uterine Fundus at the time of Early Breastfeeding Initiation, Early Mobilization, Nutrition and Parity Status are zero or constant.

$\beta_1 = 0.778$ means that if the Early Mobilization, Nutrition and Parity variables are equal to zero, then the increase of Early Breastfeeding Initiation will Accelerate Higher Uterus Fundus by 0.778

$\beta_2 = 0,643$ means if variable of Initiation of Early Breastfeeding, Nutritional Status and Parity equal to zero, hence rising variable of Early Mobilization will Accelerate Higher Penetration Fundus Uteri equal to 0,643

$\beta_3 = 0,179$ means that if Initial Initiation of Early Breastfeeding, Early

Mobilization and Parity equal to zero, hence increase of Nutrition Status variable will Accelerate Higher Penetration Fundus Uteri equal to 0,179

$\beta_4 = 0.272$ means that if the Initial Initiation of Early Breastfeeding, Early Mobilization and Nutrition Status are equal to zero, then the increase of Parity variable will Accelerate Higher Uterus Fundus decline by 0.272

From the regression results can be known variables Initiation of Early Breastfeeding more influence on the decrease in High Fundus Uteri with a value of 0.778.

C. DISCUSSION

Influence of Early Breastfeeding Initiation on Higher Uterine Fundus In Postpartum Mother.

Based on the results of data analysis by using Dummy Regression test in table 4.10 obtained p value $0,000 < \alpha = 0.05$ this means there is a relationship between initiation of early breastfeeding with decreasing height of fundus uteri on post partum mother At Lamongan Public Health Center.

The results of research conducted at Puskesmas Lamongan City found that most of the mothers who initiated Early Breastfeeding Initiation experienced a decrease in fundus uteri level of 87 (79.1%) and a small proportion of mothers who initiated Early Breastfeeding Initiation did not experience a decrease in fundus uteri level 0 (0.0 %).

According Widjanarko (2011) Initiation of Early Breastfeeding is one of the factors that support for the occurrence of uterine involution process. Breastfeeding as soon as the baby is born will have a contraction effect on the smooth muscle of the uterus. Baby suction stimulation known as ejection or breastmilk release, where baby sucking is the most important stimulation for breast milk expenditure. At the time of breastfeeding will occur skin contact between mother and baby. When the physical contact between the mother and the baby takes place should be maintained so that it can stimulate the uterine myometrium can contract while oxytocin is a hormone that multiplies the input of calcium ions into the intra-cell so that the presence of oxytocin will strengthen uterine contractions.

Thus the researcher assumes that early breastfeeding initiation is a very important starting point for breastfeeding so it can help speed up the return of the uterus to its former shape and reduce bleeding after delivery, as one of the process of fundus uterine high decrease occurs due to the oxytocin effect naturally. This oxytocin hormone can be obtained directly when the baby feeds on his mother because with the stimulation of baby sucking on the mother's nipple will stimulate the release of the hormone oxytocin. Therefore, early initiation of breastfeeding is very important for both mother and baby.

The Effect of Early Mobilization on the Higher Uterine Fundus Decline in Postpartum Mother

Based on the results of data analysis by using Dummy Regression test in table 4:11 obtained p value $0.005 < \alpha = 0.05$ this means there is a relationship between early mobilization with the decrease of fundus uteri level in post partum mother at Lamongan Public Health Center.

The result of research conducted at Puskesmas Lamongan city found that most of the women who did Early Mobilization experienced a decrease in fundus uteri level of 91 (82.7%) and a small number of mothers who did Early Mobilization did not decrease fundus uteri height 2 (1.8%).

This is supported by Varney's (2012) statement that early mobilization is an important aspect of physiological function because it is essential to maintain independence. Now no longer need to hold the postpartum lying on her bed for 7-14 days after delivery, if her movements are not blocked by the infusion and her vital signs are also satisfactory. So the mother is encouraged to do early mobilization and allowed to take a bath or go to the bathroom assisted, an hour or two after the delivery process normally. Postpartum women who do early mobilization will also feel healthier and stronger, and have a good opportunity to teach care or care for their children.

Thus the researchers assume that early mobilization

well plays an important role to accelerate the decrease in high fundus uteri because the movement is done immediately after giving birth with a span of 2-6 hours the mother has been able to perform activities independently can provide good benefits for the mother. Because these movements are in addition beneficial to other body systems but are most important to accelerate the high reduction of the uterine fundus because with early mobilization of the uterus contracts well and this contraction can speed up uterine involution characterized by a decrease in uterine fundus height.

Early mobilization can facilitate lochea expenditure so as to accelerate the process of return of the uterus as before pregnancy is marked by a decrease in uterine fundus and lochea expenditure. Therefore every post partum mother we must advise to as soon as possible early mobilization to support let the process of fundus uteri high decrease immediately occur and run normally.

Effect of Nutritional Status on Higher Uterine Fundus Decline in Post partum Mother

Based on the results of data analysis by using Regression test Dummy in table 4:12 obtained p value $0.001 < \alpha = 0.05$ this means there is a relationship between nutritional status with decreasing height fundus uteri on post partum mothers At Lamongan Public Health Center.

The results of the research conducted at Puskesmas Lamongan City obtained most of

the nutritional status of mother with LILA 24,5 cm which decrease height of Fundus Uteri that is 65 (59,1%) and a small part of mother with measure 21 cm LILA decrease fundus height of uteri 19%).

According Ambarwati (2010) Nutritional needs are useful for healing because after childbirth and to produce enough milk to nourish the baby. Good nutritional status is very supportive for maternal health and growth and development of newborns.

Thus the researchers assume that the nutritional status is very supportive of the healing process or recovery process for postpartum mothers therefore we as health workers should tetep monitor or advise on post partum mother to eat foods containing balanced nutrition to speed up the recovery process do not get the mother post partum does not want to eat foods that contain balanced nutrition that can aggravate the condition. Although we see from various perspectives or measurement results that if a person or mother post partum good nutritional status will accelerate the process of high reduction fundus uterinya compared to mothers with bad nutritional status or KEK.

Effect of Parity on Higher Uterine Fundus Decline in Postpartum Mother

Based on the results of data analysis using the Dummy Regression test in Table 4:13 obtained p value $0.013 < \alpha = 0.05$ this means there is a relationship

between parity with a decrease in fundus uteri level in post partum mothers At Lamongan Community Health Center.

Result of research conducted at Health Center Lamongan City obtained by most of Paritas Multipara which decreased High Fundus Uteri normally that is 62 (56,4%) and small part of grandemultipara parity mother did not decrease fundus uteri 0 (0,0%).

This is in line with the theory of Hanifa (2012) The involution of the uterus varies in post-saline mothers, usually mothers whose parity is higher in the involution process becomes slower, as more frequent pregnancy of the uterus will often experience strain. Up to the parity of the three uterus the mother may return like before pregnant. Each uterine pregnancy undergoes enlargement, stretching the uterine muscles during 9 months of pregnancy. As a result of such strain the elasticity of the uterine muscles does not return as before pregnancy after childbirth. The more often pregnant women and childbirth, the closer the distance between pregnancy and childbirth, uterine elasticity is more disturbed, consequently the uterus does not contract perfectly and leads to the length of reproductive organs reproduction process of post-saline uterine involution.

Thus the researcher assumes that parity is related to the decrease in the height of the uterine fundus because of the more existing outcomes that have decreased the height of the uterine

fundus in multiparous women this is seen from in addition to the high parity seen also the birth distance. Birth spacing is also crucial because the complete reproductive organs recovery varies greatly in post-saline mothers but the 6-week average has returned to its original state and if a mother's first pregnancy and for subsequent pregnancies <2 years will result in uterine uterine contusions because the uterus often has strain that can menggagu elasticity of the muscles of the uterus.

In accordance with the theory hanifa more and more the number of children to the process of decline is rather long compared to mothers who give birth once because we often get pregnant let alone the distance between the first and second pregnancy is close then the process of penurunanya usually slow unlike the first pregnancy hence to accelerate the process recovery or decrease we should encourage the mother to do early mobilization and gymnastics gymnastics if the condition of the mother allows.

Influence of Early Breastfeeding Initiation, Mobilization, Nutritional Status and Parity to High Uterus Fundus decline

Based on the results of the analysis using the Dummy Regression test in Table 4:14 obtained F count 32.800 p value $0,000 < \alpha = 0.05$ this means there is simultaneous influence between variables initiation of early breastfeeding, early mobilization,

nutritional status and parity to the decrease in fundus height of uteri.

According to Katsar (2011) Early Breastfeeding Initiation is a psychic stimulus and also a reflex from the mother's eye to the brain which results in the expulsion of oxytocin, so the uterus will contract better and the lochea expenditure more smoothly, therefore the mothers who breastfeed the uterine involution faster than those who do not breastfeeding. Early mobilization is the ability to move freely in the environment. Early mobilization facilitates lochea expenditure so as to accelerate uterine involution. Nutritional status, poor nutritional status in post-saline mothers, the basic defense of the ligamentum consists of infiltrates of round cells in addition to defense of germplasm as well as for the elimination of nerkotic tissue. In post-saline mothers with good nutritional status avoid infection and accelerate uterine involution. Parity (Number of Children), uterine involution varies in post-saline mothers, usually mothers whose parity is higher in the involution process become slower, as more frequent pregnancies of the uterus will often experience strain.

Based on the results of this study we as health workers should be able to maintain actions in accordance with existing procedures or theories so that postpartum mothers can pass through the puerperal period smoothly and normally without any fatal complications.

The dominant factor influences the high decrease of Uterine Fundus

Based on the results of data analysis using Dummy Regression test in Table 4:14 it is found that the most dominant value of the decrease of fundus uteri level in post partum mother at Lamongan Public Health Center is Early Breastfeeding Initiation with value of β 0,778 with significance value 0.000. Result result from 110 responden almost entirely post mother

According Ambarwati (2010) contraction and uterine retraction will reduce bleeding. During 1-2 hours postpartum the intensity of uterine contractions can be reduced and become regular, since it is essential to maintain and maintain uterine contractions during this time. Breastfeeding as soon as the baby is born will stimulate the release of oxytocin due to the baby's suction on the breast. In a mother who performs an IMD, the baby's suction on the mother's nipple stimulates the release of oxytocin and this helps the uterus return to its normal shape and stimulates breast milk expenditure.

From the results of the most dominant research terhadap decline is the initiation of early breastfeeding for early initiation of breastfeeding is a government program that is running or being encouraged. Post partum mother is also enthusiastic or happy with the initiation of breastfeeding early because the mother can immediately see or embrace the

baby. For mobilization usually post partum mothers are afraid to do the movement because of fear of the condition especially if the mother of post partum is done heating or stitches on periniumnya mother increasingly afraid to move on all things that have no effect. So of the four most dominant factors in this study is the initiation of early breastfeeding.

D. CONCLUSIONS and RECOMMENDATIONS

Conclusions :

1. There is influence of Initiation of Early Breastfeeding to Decrease High fundus Uteri mother of post partum at Puskesmas of Town of Lamongan obtained p value $0,000 < \alpha = 0,05$
2. There is influence of mobilization to decrease High Fundus Uteri in post partum mother at Puskesmas of Town of Lamongan obtained value p value $0,005 < \alpha = 0,05$
3. There is influence of nutritional status to the high decrease of Uterus Fundus on post partum mother at Puskesmas of Lamongan City obtained p value $0,001 < \alpha = 0,05$
4. There is influence of Parity to decrease High Fundus Uteri at post partum mother at Puskesmas of Town of Lamongan obtained p value $0,013 < \alpha = 0,05$
5. There is simultaneous influence between variation of early breastfeeding initiation, early mobilization, nutritional

status and parity to decrease of fundal uteri height obtained F count 32,800 p value $0,000 < \alpha = 0,05$

6. The most influential factor on the high decrease of Uterine Fundus is Early Breastfeeding Initiation with value β 0.778 with a significance value of 0.000.

Recommendations :

1. For Respondents
After delivery post partum mother is required to initiate early breastfeeding so that the process of decreasing the height of fundus uteri and avoid the occurrence of puerperalis puerperal infection or infection.
2. For Health Institutions
All officers are required to apply SOPs on early breastfeeding initiation established by the government so that early breastfeeding initiation processes that affect the reduction of fundal uterine height may proceed according to standards.
3. For Educational Institutions
In this study factors - factors that have not been done by researchers is about postnatal gymnastics so that researchers hope for researchers can further research that has not been done by researchers now.

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