

**FACTORS ASSOCIATED WITH WEANING AT FOUR MONTHS IN BABIES OF ADOLESCENT MOTHERS****FATORES ASSOCIADOS AO DESMAME AOS QUATRO MESES EM BEBÊS DE MÃES ADOLESCENTES****FACTORES ASOCIADOS AL DESMAME A LOS CUATRO MESES EN BEBÉS DE MADRE ADOLESCENTES**Edficher Margotti<sup>1</sup>, Willian Margotti<sup>2</sup>**ABSTRACT**

**Objective:** To present the exclusive breastfeeding indexes and to verify factors associated with weaning at four months in adolescent mothers. **Method:** A cross-sectional study with a sample composed of adolescents aged 13 to 18 years and their infants; births were in baby-friendly hospitals in the capital city of Belém, Pará. The study was carried out with a sample of 92 adolescents. The pre-selection of the adolescents was done in the maternity ward. The second stage was in the fourth month postpartum, staying in contact with the adolescents by telephone and verified the type of feeding the baby was receiving. The descriptive analysis was presented by simple frequency, percentage and odds ratio. The relationship between the outcome and the type of feed was assessed by logistic regression. The Wald test was used to test the significance of the variables. The differences were significant when  $p < 0.05$ . The characteristics of the mothers and the children were compared by the Pearson test and were significant if  $p < 5\%$ . **Results:** Mixed breastfeeding at four months was 22.82%, weaning from 17.40% and 59.78% from exclusive breastfeeding. The factors schooling, marital status, work away from home, companion does not encourage breastfeeding are significantly related negatively to exclusive breastfeeding. **Conclusion:** Exclusive breastfeeding in the fourth month of life of infants was low; factors associated with exclusive breastfeeding were low schooling, marital status without a partner, mother working away from home, and companion who did not encourage breastfeeding.

**Descriptors:** Breast Feeding; Weaning; Measures of Association.

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## RESUMO

**Objetivo:** Apresentar os índices de aleitamento materno exclusivo e verificar os fatores associados ao desmame aos quatro meses, em mães adolescentes. **Método:** Estudo transversal com amostra composta por adolescentes de 13 à 18 anos e seus bebês; os nascimentos foram em hospitais amigo da criança, na capital Belém do Pará. O trabalho foi realizado com uma amostra de 92 adolescentes. A pré-seleção das adolescentes era feita na maternidade. A segunda etapa foi no quarto mês pós-parto, mantendo-se contato com as adolescentes, por telefone e verificado o tipo de alimentação que se encontrava o bebê. A análise descritiva foi apresentada mediante frequência simples, percentual e razão de chance. A relação entre o desfecho e o tipo de alimentação foi avaliada por regressão logística. O teste de Wald foi utilizado para testar a significância das variáveis. As diferenças foram significativas quando  $p < 0,05$ . As características das mães e das crianças foram comparadas pelo teste de Pearson e foram significativos se  $p < 5\%$ . **Resultados:** O aleitamento materno misto aos quatro meses foi de 22,82%, desmame de 17,40% e 59,78 % foi de aleitamento materno exclusivo. Os fatores escolaridade, estado civil, trabalha fora, companheiro não incentiva o aleitamento estão significativamente relacionados negativamente ao aleitamento materno exclusivo. **Conclusão:** O índice de aleitamento materno exclusivo no quarto mês de vida dos bebês foi baixo, os fatores associados ao aleitamento materno exclusivo foram: baixa escolaridade, estado civil sem companheiro, mãe que trabalha fora de casa e o companheiro que não incentiva o aleitamento.

**Descritores:** Aleitamento Materno; Desmame; Medidas de Associação.

## RESUMEN

**Objetivo:** Presentar los índices de lactancia materna exclusiva y verificar los factores asociados al destete a los cuatro meses, en madres adolescentes. **Metodo:** Estudio transversal con muestra compuesta por adolescentes de 13 a 18 años y sus bebés, los nacimientos fueron en hospitales amigo del niño, en la capital Belém do Pará. El trabajo fue realizado con una muestra de 92 adolescentes. La pre-selección de las adolescentes era hecha en la maternidad. La segunda etapa fue en el cuarto mes post parto, se mantuvo contacto con las adolescentes, por teléfono y verificado el tipo de alimentación que se encontraba el bebé. El análisis descriptivo fue presentado mediante frecuencia simple, porcentual y razón de probabilidad. La relación entre el desenlace y el tipo de alimentación fue evaluada por regresión logística. La prueba de Wald fue utilizada para probar la significancia de las variables. Las diferencias fueron significativas cuando  $p < 0,05$ . Las características de las madres y de los niños fueron comparadas por el test de Pearson y fueron significativos si  $p < 5\%$ . **Resultados:** La lactancia materna mixta a los cuatro meses fue del 22,82%, el destete del 17,40% y el 59,78% fue de lactancia materna exclusiva. Los factores de escolaridad, estado civil, trabajo fuera, compañero no incentiva la lactancia están significativamente relacionados negativamente con la lactancia materna exclusiva. **Conclusión:** El índice de lactancia materna exclusiva en el cuarto mes de vida de los bebés fue bajo, los factores asociados a la lactancia materna exclusiva fueron: baja escolaridad, estado civil sin compañero, madre que trabaja fuera de casa y el compañero que no incentiva la lactancia.

**Descriptorios:** Lactancia materna; Destete; Medidas de Asociación.

## INTRODUCTION

Breastfeeding (BF) is highly nutritious, provides back all food infant needs during the 4-6 first months of life. Thereafter, it remains as a valuable protein supplement to infant diet. In addition to these elements, breast milk contains sugar, fats, minerals and vitamins essential for the proper growth and development of the child.<sup>1</sup>

In all the state capitals, the median duration of exclusive breastfeeding (EBF) increased by one month, from 23.4 days to 54.1 days. In the evolution of the EBF practice in infants under 4 months, according to region and capital, the northern region had a prevalence of 57.4% and the capital Belém showed a prevalence of 65.9%, being the highest among the other capitals of the North region.<sup>2</sup>

Some changes in population characteristics may influence it, favoring or hindering the advancement of BF indicators. Among the maternal factors that can contribute positively to a lower proportion of breastfeeding are the adolescent mothers. Studies show that there is a positive association between younger age and lower EBF index.<sup>3</sup> A cross-sectional study with 275 children under 6 months of age, living in the city of Serrana, showed that adolescent mothers

have more chance to wean their children prematurely.<sup>4</sup>

Among the studies conducted on exclusive breastfeeding in populations of adolescents a study showed that only 48.8% exclusively breastfed their babies at the moment of hospital discharge<sup>5</sup>. Another study found that 16% of adolescent mothers left the EBF before the babies reaching on month of age<sup>6</sup>. Among adolescent mothers who exclusively breastfed to the fourth month of the babies, a study showed 74.40%<sup>7</sup> and another indicated 59.78%<sup>8</sup>, relating to exclusive breastfeeding to six months of babies' lives, a study expressed 13.8%<sup>9</sup> and another showed 62.9%.<sup>10</sup>

Protective factors for breastfeeding at 60 days of baby's life, were: mother's schooling time over eight years, the birth in a baby-friendly hospital and mother who does not work away from home and at 120 days were just maternal age over 20 years.<sup>11</sup> A study showed that in the fourth month the variables were: lower maternal education, have gone back to work, have not received guidance on breastfeeding in postpartum and not receive help from the fellow with the child were predictive for weaning.<sup>12</sup> Factors associated with weaning practice before six months of age were maternal work away from home and primiparity. In less than twelve months, factors associated with breastfeeding were:

women aged more than 35 years, university degree, more than one child and in maternity leave.<sup>13</sup> Studies also show that adolescent mothers with previous children and higher education level have higher prevalence of EBF.<sup>9</sup>

The capital Belém do Pará was the capital with better rate of breastfeeding in the North region, research conducted by the Ministry of Health in 2009<sup>2</sup>. This research did not mention breastfeeding rates in adolescent mothers in the capital, since there are numerous factors that are involved directly in lack of knowledge concerning breastfeeding, knowledge which directly influence the implementation of this practice among adolescent girls.

Based on the above terms, and with the issue of adolescent pregnancy and early weaning, the present study aimed to present the EBF indexes and check the factors associated with weaning at four months, in babies of adolescent mothers aged 13 to 18 years, born in baby friendly hospitals, in the capital Belém.

## MATERIAL AND METHODS

This study is part of a broader research entitled "Early weaning and Breastfeeding Self-Efficacy-Short Form scale applied in hospitals Affiliated to the

National Health Service (Sistema Único de Saúde-SUS) from the capital Belém and metropolitan region".

Analytical, cross-sectional study, comprised of a group of adolescent mothers (aged 13 to 18 years) and their respective babies, all births were in hospitals accredited as baby friendly, located in the capital city of Belém do Pará, Brazil, in the period from 2016 to 2017.

The sample calculation had 95.0% as critical value, associated with the degree of the sample confidence, a sampling error of + or -5%, with the formula for the calculation of sample size, for a reliable estimate of the population proportion, with p and q unknown:  $n = Z^2_{x/2} \times p \cdot q / E^2$ , obtaining an estimate sample of 90 adolescents.

The study was carried out in a population with 92 adolescent girls and their babies.

For the establishment of the participants in the study, the selection of puerperal women has been made continuously, simultaneously and randomly, as the deliveries in the obstetric wards of the hospitals. The pre-selection of the puerperal adolescents was made at birth, by a scholarship student, properly trained and qualified by the responsible researcher.

The inclusion criteria used were: children born weighing >2,500 g; born of natural childbirth or caesarean section without pediatric and/or obstetric complications; with over 36 weeks gestational age, children in these conditions usually are put to the breast within the first hours of life and go to the Rooming-in Care (RIC); mothers living in urban areas of the capital, this criterion would facilitate home visits, if needed and they were breast-feeding exclusively to the breast until the time of hospital discharge, as it is the subject of this research.

Exclusion criteria were: twin births, newborns of mothers with HIV for human immunodeficiency virus, babies who for some reason could not be breastfed to maternal breast, with congenital malformations that interfere in breastfeeding, babies for adoption, children in these conditions are usually fed with milk formulas and/or through devices such as gastric or surgical enteral probes; adolescent mothers with some cognitive and mental limitation, because the communication would be difficult and the adolescents whose guardians do not authorize and not sign the informed consent form.

The first step happened in the maternity ward, where they were addressed after the births. And at a time prior to hospital discharge, they answered question

on socio-demographic issues accounted as schooling, income, marital status, if working away from home, if the companion encourages breastfeeding and if living with mom or mother-in-law.

From the medical record data were collected such as the gestational age, the number of prenatal consultations, gender and weight of the newborn and if the baby had been breastfed in the delivery room or within the first six hours of life.

The participants signed the informed consent before any procedure of the study. The minor girls signed the term of assent and the consent form regarding their participation was signed by their parents or guardians.

The second stage was at four months of baby's life, when there was contact with the adolescent mothers, by phone and checking the type of feeding the baby was receiving.

Two questions were made on the phone: first, if she was still only and exclusively breastfeeding; and second, if she had already begun to offer juices, water, tea, any other milk formulas and if she had already given to the baby some food, such as "baby food", either salted or sweet, fruit zest, broth or fruit pulp. The second question eliminated doubts as to answer the first question. If the answer to the second question was yes, that child wouldn't be of exclusive breastfeeding

group, passing on to the breastfeeding group.

Data were analyzed in three study groups: Exclusive Breastfeeding for children who received only breast milk as a source of hydration and nutrition, no other liquid or solid, except for vitamin supplements or medicines; Breastfeeding for children who received, in addition to breast milk, other sources of food and hydration, as teas, juices, broths, infant baby food and other types of milk and Weaning in that exclusive breastfeeding was interrupted before the fourth month of life.

Home visits occurred if there were difficulties in contacting mother by phone.

Variables studied were: gestational age, type of birth, prenatal consultations, primipregnancy, breastfed baby in the delivery room or within the first 6 hours, encouraging breastfeeding by the companion, gender and weight of the newborn, mother's education level, mother who works away from home, income, marital status, living with mother and/or mother-in-law.

For descriptive analysis, data were presented by means of simple frequency, percentage and odds ratio, as the symmetry of the variables. The relationship between the variable outcome type of feeding at the fourth month of child's life and the potential factors associated to Exclusive

Breastfeeding were assessed using logistic regression, both in the bivariate and multivariate analysis. The Wald test was used to test the significance of each variable in the model. For the multivariate model, initially, it considered all covariates that presented values of  $p < 0.10$ . The following procedure was the exclusion of individual way of covariates that present critical values of  $p$  (larger and insignificant values). This procedure was repeated until all the variables in the model present values of  $p < 0.05$ . All tests were bidirectional, and the differences were considered significant with  $p < 0.05$ . The characteristics of mothers and children were compared with the chi-square Pearson test and values of  $p < 5\%$  were adopted as significant.

The research was conducted in accordance with the Helsinki Declaration revised in 2008 and was approved by the Research Ethics Committee of the Universidade Federal do Pará – UFPA, under the opinion No. 1,259,717, on 06 October 2015. The study complied with the formal requirements contained in national standards (Resolution CNS 466, 12 December 2012, National Health Council) and international regulatory bodies of research involving humans.

## RESULTS

The interview consisted of 92 adolescents, aged between 13 and 18 years, with average age of 16.30 years. The range of schooling more represented was the first degree incomplete, referred to by 52.17% of the adolescents, most of them, 54.35%, received up to one minimum wage, lived an informal union with their partners, 55.43% did not work away from home, 91.30%, reported living with mother/mother-in-law, 64.13%, and said

they had the support of the partner to breast-feeding, 68.48%. The chi-square Pearson test ( $p < 0.05$ ) shows that the proportions differ significantly among the groups of each variable. And all the socio demographic variables of the adolescent mothers differed among themselves in the group; education, monthly income, marital status and work away from home with  $p < 0,0001$ , the variable living with mother or mother-in-law was 0,0067 and partner encourages breastfeeding was 0.0004 (table 1).

**Table 1.** Social and demographic profile of adolescent mothers. Belém, Pará, 2016-2017.

<b>Education</b>	<b>N</b>	<b>%</b>	<b>p-value</b>
Complete Primary education	9	9.78	<0,0001*
Incomplete Primary education	48	52.17	
Complete Secondary school	18	19.57	
Incomplete Secondary school	15	16.30	
Graduated	1	1.09	
Incomplete undergraduate degree	1	1.09	
<b>Monthly income</b>			
Up to 1 MW	50	54.35	<0,0001*
1 to 2 MW	24	26.09	
2 to 3 MW	15	16.30	
3 to 5 MW	3	3.26	
<b>Marital Status</b>			
Single	38	41.30	<0,0001*
Married	3	3.26	
Living informal union	51	55.43	
<b>Work away from home</b>			
Yes (autonomous, domestic worker and cleaner)	8	8.70	<0,0001*
No	84	91.30	
<b>Living with mother or mother-in-law</b>			
Yes	59	64.13	0,0067*
No	33	35.87	
<b>Partner encourages breastfeeding</b>			
Yes	63	68.48	0,0004*
No	29	31.52	

Chi-square Pearson test for Proportions ( $p < 0.05$ )

\*Proportions differ significantly.

Most babies were female 55.43%, vaginal childbirth 71.74%, 45.65% had babies with a gestational age at term, with ideal weight at about 97.83%, most of the babies had a good Apgar at 5', about 93.48%, and breastfed in the delivery room or within the first six hours, 93.48%. Adolescents who had their first children were 77.17%. From the adolescents who have already had children, most had only one child 66.67% and had breastfed much their previous children 66.67%. About 63.04% of the adolescents had six or fewer prenatal consultations. The chi square

Pearson test ( $p < 0.05$ ) shows that the proportions differ significantly among each variable groups, and the variable gender of the Newborn has no significant difference between the proportions observed in males and in females. However, obstetric variables that showed greater significant difference between their group were: baby was breastfed in the delivery room or within six hours of birth, type of delivery and number of prenatal consultations, which were  $< 0,0001$ ,  $0,0003$  and  $0,0009$ , respectively (Table 2).

**Table 2.** Obstetric profile of adolescent mothers. Belém, Pará, 2016- 2017.

Variables	N	%	p-value
<b>NB gender</b>			
Female	51	55.43	0,9654
Male	41	44.57	
<b>Delivery Type</b>			
Normal	66	71.74	0,0003 *
Cesarean	26	28.26	
<b>Baby was breastfed in the delivery room or within six hours of life</b>			
Yes	86	93.48	$< 0,0001$ *
No	6	6.52	
<b>Number of Prenatal Consultations</b>			
Up to 6 consultations	58	63.04	0,0009 *
7 or more consultations	27	29.35	
Did not attend prenatal consultations	7	7.61	

Chi-square test for proportions ( $p < 0.05$ )

\* The proportions differ significantly.

With respect to breastfeeding at four months of a baby's life, 17.40% were at weaning, 22.82% were breastfeeding and 59.78% were in EBF. The Chi Pearson square test ( $p < 0.05$ ) shows that the proportions differ significantly from each

other in the Group of the variable breastfeeding at the 4th month, presenting significant differences between the proportions of exclusive breastfeeding, Maternal breastfeeding and weaning (Table 3).



**Table 3.** Exclusive breastfeeding indicators at the fourth month, on adolescent mothers. Belém, Pará, Brazil, 2016-2017.

Breastfeeding at 4th month	N	%	p-value
Exclusive breastfeeding	55	59.78	<0,0001*
Breastfeeding	21	22.82	
Weaning	16	17.40	

Chi-square Pearson test for Proportions ( $p < 0,05$ )

\*Proportions differ significantly.

The table containing the variables provides the Wald test results for all variables included in the model. Therefore, the factors education, marital status, work away from home and partner does not

encourage breastfeeding significantly contribute to the model's explanation, that is, they are significantly related and negatively influencing the exclusive breastfeeding.

**Table 4.** Association between exclusive breastfeeding and its potential factors that negatively influence on adolescent mothers with babies younger than four months. Belém, Pará, 2016-2017.

Variables	Odds ratio	CI 95%	p-value
Education (Low)	0.981	0.963 to 0.999	0.031 *
Income (1 to 3 minimum wages)	0.961	0.765 to 1.206	0.822
Marital Status (without partner)	0.986	0.973 to 1.000	0.040 *
Working away from home	1,061	1.034 to 1.088	0.000 *
Baby was breastfed in the delivery room or within six hours of life	0.967	0.862 to 1.076	0.544
Type of delivery (C-section)	1,001	0.999 to 1.003	0.246
Did not attend Prenatal consultations	0.987	0.912 to 1.007	0.843
Living with mother or mother-in-law	0.917	0.716 to 1.17	0.455
Partner does not encourage breastfeeding	1.588	1.132 to 2.288	0.010 *

\*  $p < 0.005$ ; CI: confidence interval

## DISCUSSION

In the present study, work away from home contributed negatively to the EBF, what is consistent with findings of other studies, with women of various age groups<sup>14,15,16</sup>, in which the woman staying at home was a positive factor and, thus, facilitator to the success of breastfeeding. However, there is controversy about the

relationship between early weaning and work away from home. Working away from home was associated with breastfeeding at 60 days, but with no significant association with breastfeeding at 120 days.<sup>11</sup>

In the results of this study, the low level education was as a factor negatively correlated to exclusive breastfeeding. On

the contrary, another finding presented adolescents with higher level of education showing a higher prevalence of EBF.<sup>9</sup> Probably, women without education or with little education are unaware of the importance of exclusive breastfeeding until at least six months of life, for they do not know about the high caloric and nutritional value of the milk to the newborn, and neither the nutrients necessary for his/her growth and development. Most of the work carried out with women of all ages demonstrates that breastfeeding is effective in women with higher schooling.<sup>3,13,14,15</sup> However, another report<sup>17</sup> showed higher prevalence of interruption of exclusive breastfeeding among women with higher education.

The result calls attention, since the lack of support from the partner related to breastfeeding has positive statistics relationship in weaning the baby and consequently undermines the maintenance and duration of BF by the adolescent. Coinciding with the results found in other works<sup>14,16,18,19</sup>, where the reflection of this increase in paternal support to breastfeeding, over the years will proportionally break the traditional model of fatherhood, since he exerts positive influence for the decision on breastfeeding and the duration of it.

In the present study, the prevalence of exclusive breastfeeding, EBF, among

babies aged four months old, of adolescent mothers from 13 to 18 years of age was 59.78%, with 100.0% being in EBF at the time of hospital discharge. The finding of our study goes against the data from other researches with adolescents, as the one carried out in the city of Dois Córregos, SP, where 74.40% of adolescent girls, 14 to 19 years of age, breastfed exclusively up to the fourth month of babies' lives<sup>7</sup> and the one carried out in Quito, in Ecuador, where the adolescents showed a prevalence of 62.9% of EBF at the sixth month.<sup>10</sup> This makes it apparent that it's not the fact of being an adolescent, underage, that the woman cannot be responsible for her child care and conscious about the act and the importance of breastfeeding their children under the age of 4 months.

Our result is also contrary to the nationwide studies, with mothers of all ages, where the prevalence of exclusive breastfeeding among the four months was 49.8%<sup>20</sup>, 53.7%<sup>13</sup> and 65.9%.<sup>2</sup>

Other works with mothers under twenty years of age showed different results from ours, with respect to EBF at four months, with a prevalence of 20.0%<sup>2</sup>, 31.4% of EBF<sup>9</sup> and 40.0%.<sup>20</sup> The incidence of EBF abandonment in the fourth month, in our findings, was 17.4%. Contrary results were also obtained in children of adolescents aged 13-19 years, who had an incidence of weaning at the

fourth month of 69.6%.<sup>12</sup> This enables us to urgently examine the profiles of adolescents in each region, as data are shown conflicting regarding breastfeeding in adolescence, it is unknown if this is related to the culture and customs of each region.

This study provides significant contributions to health and nursing, given that promotion activities to health of adolescent and child directly influence the EBF rates, an unquestionable method for the child's health. This study presents relevant results to be assessed by the government in order to reduce early weaning rates among adolescent mothers, not only in the northern region, but throughout Brazil.

## CONCLUSION

The study concluded that the factors negatively associated with exclusive breastfeeding were: low educational level, marital status without a partner, mother working away from home and the partner who does not encourage breastfeeding.

The study also revealed that the exclusive breastfeeding rate, in the fourth month of babies' life was considered low, remembering that our adolescent population had as inclusion criteria the exclusive breastfeeding at discharge from hospital.

The findings of this research may contribute to the debate in other similar situations, since the common methodology to other studies was used here. Such reflections can indicate ways to overcome the difficulties faced by professionals of health services in supporting the adolescent breastfeeding and her family.

Some limitations to the development of the study are highlighted: information on the outcome, that is, on changes in the feeding pattern of the child at four months of life; it may at some point have been distorted by the adolescent mother, and promoted the classification into altered exposure categories. This may happen even if clear rules have been set for the classification of exposure and outcome. Memory bias that adolescents may have presented with regard to weaning period; the false response bias or non-acceptance of the situation, where teenagers cannot report they are unable to breastfeed, as it can bring personal constraint and generate embarrassment.

## REFERENCES

1. Rezende fundamental J. Obstetrics. 12ed. Rio de Janeiro: Guanabara Koogan; 2012.
2. Ministério da Saúde (Brasil), Secretaria de Atenção à Saúde, Departamento de Ações Programáticas e Estratégicas. II Pesquisa de prevalência de aleitamento materno nas capitais brasileiras e Distrito

- Federal. Brasília, DF: Ministério da Saúde; 2009.
3. Vieira GO, Reis MR, Vieira TO, Oliveira NF, Silva LR, Giugliani ER. Trends in breastfeeding indicators in a city of northeastern Brazil. *J. Pediatri (Rio J)*. 2015; 91(3):270-77.
  4. Queluz MC, Pereira MJB, Santos CB, Leite AM, Ricco RG. Prevalência e determinantes do aleitamento materno exclusivo no município de Serrana, São Paulo, Brasil. *Rev Esc Enferm USP*. 2012; 46(3):537-43.
  5. Leclair E, Robert N, Sprague AE, Fleming N. Factors associated with breastfeeding initiation in adolescent pregnancies: a cohort study. *J Pediatr Adolesc Gynecol*. Dec 2015; 28(6):516-21.
  6. LY Gómez, Díaz EC Manrique R. factors asociados con exclusive maternal lactancia sixth hasta el mes en wombs adolescents. Medellin, 2010. *Rev Salud Pública*. 2013; 15 (3): 374-85.
  7. Filamingo BO, Lisbon BCF, Basso NAS. The practice of breastfeeding among teenage mothers in the city of Two Streams, state of São Paulo. *Med Sci* 2012.; 22 (2): 81-85.
  8. Margotti And Margotti W. Teen Pregnancy and breastfeeding up to four months. *Inova Health* 2017.; 6 (2): 73- 87.
  9. Gusmao AM, Beria JU Giant LP, Leal AF, Schermann LB. Prevalence of exclusive breastfeeding and associated factors: a cross-sectional study with teenage mothers from 14 to 16 years Porto Alegre, RS, Brazil. *Ciênc Health Colet*. 2013; 18 (11): 3357-68.
  10. MA-Jara Castle, Cornejo AC Peláez GA, J Verdesoto, Galvis AA. Prevalence and determinants of exclusive breastfeeding among adolescent mothers from Chito, Ecuador: a cross-sectional study. *Int Breastfeed J* 2015; 10:33.
  11. Margotti And Epifanio M. Exclusive breastfeeding and Self-Efficacy Scale on Breastfeeding. *Rene. Sept / Oct* 2014; 15 (5): 771-9.
  12. Ax MCM Assisi KF FCC Oliveira, Ribeiro AQ, Araujo RMA Cury AF, et al. Determinants of abandonment of exclusive breastfeeding: psychosocial factors. *Rev Public Health*. 2014; 48 (6): 985-94.
  13. Souza SNDH, Migoto MT, Rossetto EG, Mello DF. Prevalence of breastfeeding and associated factors in the municipality of Londrina (PR, Brazil). *Acta Paul Enferm*. 2012; 25 (1): 29-35.
  14. Margotti And Margotti W. 2017. Factors associated with exclusive breastfeeding in infants born in friendly hospital in a northern Brazilian capital. *Debate Health*. July / September 2017; 41 (114): 860-71.
  15. Asemahagn MA. Determinants of exclusive breastfeeding practices among mothers in azezo district, northwest Ethiopia. *Int Breastfeed J* 2016; 11:22.
  16. Tewabe T, Mandesh A, Gualu T, G addition, Mekuria G, H. Zeleke Exclusive breastfeeding practice and associated factors among mothers in Motta town, East Gojjam zone, Amhara Regional State, Ethiopia, 2015: a cross-sectional study. *Int Breastfeed J* 2017; 12:12.
  17. AMS fields, Chaoul CO, Carmona EV, Higa R, IN Valley. Exclusive breast-feeding mother and informed by the supply of lichid to their children. *Rev Latinoam Enferm*. 2015; 23 (2): 283-90.
  18. Silva BT, Santiago LB, Lamonier JA. paternal support of breastfeeding: an integrative review. *Rev Paul Pediatr*. 2012; 30 (1): 122-30.
  19. JP Salvador, Ximenes VL, ICM Silva, Silva MFP. Companion participation in the promotion of exclusive breastfeeding in child-friendly hospital. *Rev Interdisciplin Faculdade Novafapi*. Jan / Feb / Mar 2012; 5 (1): 30-36.
  20. Sadeck LSR Leoni CR. Evaluation of breastfeeding in children under one year of age in São Paulo, Brazil, in 2008. *Cad Public Health*. 2013; 29 (2): 397-402.

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