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257 PREDICTION INCIDENCE OF LOW BIRTH WEIGHT BABIES BASED ON MATERNAL RISK FACTORS Hery Sumasto, Subagyo, Nurlailis Saadah, Mamik Magetan Midwifery Study Program. Health Polytechnic Kemenkes Surabaya Jl. S Parman No 1, Magetan 63318 Email: herysumasto@yahoo.co.id ABSTRACT Background. Infant Low Birth Weight (LBW) is one of the factors contributing to high infant mortality rate. Based on the Central Statistics Agency (BPS), the IMR in East Java in 2010 was 29.99 per 1,000 live births. In dr. Sayidiman Magetan in 2014, amounting to 19.67% of infant deaths due to low birth weight. This study aims to predict LBW by analyzing the maternal age factor, paritansi, spacing pregnancies and nutritional status and the incidence of LBW. Methodology. This type of research is analytic survey, cross-sectional approach. The population is a record of all infants weighing less than 2500 grams of 185 respondents. Sampling with simple random sampling technique. Result. The results showed LBW accordance Pregnancy as much as 34.6%, Small LBW Pregnancy (KMK) as much as 65.4%. Age, parity, spacing of pregnancy does not affect LBW. Nutritional status has an influence on LBW with $p = 0.000$. The regression equation to predict [the incidence of low birth weight](#) are as follows $\text{Logit } Y (\text{LBW}) = 4.846 + 2.943 (\text{nutritional status})$. Conclusion: There was no effect of age, parity, spacing of pregnancy [on the incidence of low birth weight](#). No effect [of nutritional status on the incidence of low birth weight](#). It is suggested that [the](#) medical workers to improve maternal health care efforts to provide a standard of service that can be prevented LBW Keywords: maternal age, parity, gestational age, the incidence of low birth weight. INTRODUCTION The main cause of death of infants is because asfiksia neonatorum, infection, BBLR, the trauma of birth and built-in disability (Pramono 2009). BBLR (infant low birth weight) is body weight is lower than the weight of course is less than 2500 grams (Manuaba Ida Bagus Gede 2010). Low birth weight babies (BBLR) is still a problem in Indonesia, because it is the main cause of death in the neonatal (Suryati 2014). According to a survey of demography and Health Indonesia (SDKI) 2007 neonatal mortality in Indonesia by 19 death/1000 live births (Suryati 2014). BBLR could be due to the age of the mother when conceived. The age

of which are mentioned in Genesis BBLR is <20 years or >35 years. Another cause is the mother, Genesis BBLR parity can occur on parity >1. So the distance of birth was also influential in the Genesis BBLR. The distance delivery <2 years can increase the risk of Genesis BBLR. Age, price parity and distance of pregnancy can cause to the status of nutrition, so low nutritional status can result in Genesis BBLR (Syahir 2016). In RSUD dr Sayidiman Magetan, there are 39,87% baby born with low weight. The BBLR at age <20 years or >35 years, 47,03%. Numbers and grandemultipara multipara BBLR on as many as 49,3%, while the distance that <2 years as much as 31,89%. On the risk factors of KPD found of 21,08%. The nutritional status in Indonesia shows that 41 percent of pregnant women experience less nutritional status. So have a greater risk of giving birth to a baby with BBLR. To cause the other BBLR: pregnancy twins of 0,022%, pre eclampsia of 0,119 percent while the other causes of 0,005% (Medical Record RSUD dr Sayidiman Magetan, 2011). Because of the multitude of factors that can cause BBLR, so this research is restricted to the influence of the age, parity, distance pregnancy, age pregnancy and nutritional status.

RESEARCH METHOD The type of this research is analytically survey. This research is to know the influence: age, parity, distance pregnancy, the nutritional status of the BBLR. This research uses the design of the cross sectional, where the risk factors and the effects of observation done at the same time (point time approach) (Sukijo Notoatmodjo 2010). The study was conducted in June to September 2016, location research in RSUD dr Sayidiman Magetan. The population of this research is all data BBLR, with samples is done by sampling probability is simple random sampling. Independent variables: age, parity, distance pregnancy, nutritional status. Dependent variables: Genesis BBLR. After the data is collected then re-data examination, include completeness and compliance data. Then done coding so that data can be entered into the table. Univariate analysis done by using frequency distribution. Bivariate analysis that is used to know the dependent variables of BBLR, is test chi-square. The conclusion is done based on the hypothesis that has been determined. H₀ rejected when the value of p<0.05, while H₀ accepted if p>0.05. Multivariate analysis done with logistic regression equation (Lukman 2015).

RESEARCH RESULTS The results of research on the weight of the baby born from 128 baby, obtained BBLR according to pregnancy as much as 34.4%, small pregnancy as much as 65,6%. The BBLR based on maternal age factor is the average age of 30.75 years, most many mothers age 24 years. The average born with parity 2 as much as 35.6%, parity 1 most, namely 35.9%. Based on the distance of the pregnancy, the average born with the distance 3.56 years. Based on the nutritional status of factors, BBLR was born by the mother of underweight as much as 47.7%, normal as much as 48.4% and moderate obesity as much as 3.9 percent. Analysis of the influence of the age of the BBLR, shows the level of the significance is 0,774. So H₀ accepted it means that the age of the mothers did not affect the BBLR. Analysis of parity against the BBLR, shows the level of the significance of 0,312 so H₀ accepted, means parity does not affect the BBLR. Remote analysis of pregnancy on the BBLR, shows the level of the significance is 0,436 H₀ accepted it means that the distance of pregnancy does not affect the BBLR. The results of the analysis of the influence of nutritional status shows the level of the significance of 0,000. So H₀ rejected, means there is the influence of the nutritional status of the BBLR. Test results binary logistic regression with stepwise method simultaneously against one variables related to the BBLR variable. In accordance with the level of the significance of the obtained, then nutrition status variables have contribution to the regression equation. $\text{Logit } Y (\text{BBLR}) = 2,165 - 2,941(\text{Nutrition status})$

DISCUSSION. The results of the study showed about the BBLR is in accordance with the opinion of Sagung Adi, 2015, that BBLR frequency in developing countries between

10-43 %, being in developed countries ranged between 3.6 - 10.8 %. The number of BBLR in Indonesia, more on dismatur compared with premature (Sagung Adi, et al., 2015). BBLR in Indonesia, more on dismaturitas than premature (Yulistini 2015) Baby with BBLR has 4 times more likely to die during 28 the first day compared with the baby with the weight of the 3000-3499 grams (Mochamad Setyo Pramono 2011). Many efforts to resolve the BBLR can be done some prevention efforts, among others: check pregnancy orderly, improved nutritional status before and during pregnancy and planning pregnancy with good (Jajah K Husaini, Mahdin A Husaini 2007). The results of the statistical tests showed no influence of the age of the mother against the BBLR. This is different with the research Yulistini, that age < 20 years have the risk of 14.5% and age > 35 years at risk of 13.5% (Yulistini 2015). There is no cause of the relationship between the age of the mother with the BBLR due to population that less. In addition this research took only secondary data. At the age of less than 20 years, the development of the reproductive organs is not Optimal yet. So also the function of the physiological characteristics by has not been achieved with good. Perhaps also at the age of <20 years, has not been achieving the maturity of the soul that can affect the fetus in her womb. While in pregnant women of old age, will have much influence on the development of the fetus in her womb. This is because the deterioration of the function of physiology and reproduction in general (Pramono 2009). The results of the analysis shows that there is no parity against the BBLR influence. This is different from other research, where women multipara more at risk compared with women primipara (Shiddiq & Lipoeto 2014). The son of more than 4 (grandemultipara) can cause disturbance in the growth of the fetus that has a baby with low birth weight and bleeding during childbirth because of the condition of the uterus is weak (Ernawati et al. 2014). Generally primipara has a baby who is smaller than the multipara, but the mother with multipara and grande multipara more risk of experiencing complications during pregnancy, so it can affect to the fetus. Among other things has a baby with low birth weight (Manuaba Ida Bagus Gede 2010). Syahrir research (2016) shows that the pregnancy can be risky BBLR on multigravida women. The majority of the mother at risk bare BBLR with multigravida category as much as 62.8% and the category of primigravida owns 37.2% (Syahir 2016) Test results Statistics indicate that there is no remote influence of pregnancy on the BBLR. The distance of pregnancy is more than 2 years. This is important to note that the physical condition of the mother is ready for pregnant again, especially the adequacy of backup file Fe. When the distance of pregnancy is less than 2 years will be at risk of suffering from anemia, bleeding on trimester 3, KPD, endometriosis all of which can cause terjaninya BBLR (Manuaba Ida Bagus Gede 2010). The results of this research in accordance with the results of research Pramono, examines the relationship between characteristics of the mother with the genesis BBLR in RSUD Banjarnegara 2005, which stated that there is no relationship between the distance of pregnancy with genesis BBLR (Pramono 2011). From the many variables affect the BBLR, only the nutritional status that affect BBLR, with p value 0,000 less than 0.05. The value of the wald 23,562 this means that nutritional status has the opportunity 23,562 times cause BBLR. Research Results Jajah, dkk (2007) shows that the greatness of LILA has a significant relationship with the BBLR. Body weight before pregnancy is closely related with the weight of the baby born. LILA will also closely related with the weight of the baby born (Jajah K Husaini, Mahdin A Husaini 2007) The entire independent variables suspected of affecting the BBLR there is one subvariabel nutritional status (BMI) the most influential against 0,000 BBLR with p value less than 0.05. The value of the largest wald obtained namely 23,562 means the nutritional status had the opportunity 23,562 times cause BBLR. Research Results Jajah, dkk (2007) shows that the

greatness of LILA has a significant relationship with the BBLR. Body weight before pregnancy is closely related with the weight of the baby born. LILA will also closely related with the weight of the baby born (Jajah K Husaini, Mahdin A Husaini 2007) To avoid malnourished during pregnancy, need improvement of nutrition before pregnancy. With the way the gift of vitamins and Fe during menses to replace the lost red blood cells, does not perform the wrong diet, regardless of the proportion of food needed by the body. Currently many teenagers who do diet is one that is not concerned about the nutritional needs for the body. They do not know what food is reduced and that should be consumed. How a good diet is to reduce the food which contains high calories and maintain the balance of calories that go in and out of the body. The burning of calories can be done with how to do sports or increase other activities (Yulistini 2015). The nutritional status is an important factor because it is directly related to the baby blood circulation. This is in accordance with the opinion of Sulistyawati (2012), stated that the mother that the status of malnourished can cause blood volume decreases, so that rainfall heart not adequate. This may impact on the blood supply to the placenta, consequently decrease the size of the placenta. So the nutrients to the fetus is reduced and cause fetal growth retardation (Manuaba Ida Bagus Gede 2010).

CONCLUSION AND SUGGESTIONS

CONCLUSION. There is no influence of the age of the mother, distance pregnancy, price parity with BBLR in RSUD dr Sayidiman Magetan. There is a relationship between the nutritional status with BBLR. Common regression line to predict the BBLR is as follows $\text{Logit } Y (\text{BBLR}) = 2,165 - 2,941(\text{nutritional status})$. The value of the largest wald obtained namely 23,562 means the nutritional status had the opportunity 23,562 times cause BBLR.

SUGGESTIONS. Health Professionals are expected to increase health services to pregnant women, especially midwives must provide standard services. The pregnant mother is expected to inspect the pregnancy progresses regularly and improve nutrition during pregnancy. Hopefully this research can be a reference for the next research. To produce better research again, should perform the analysis of the cause of the BBLR using the primary data and expand the scope of research variable.

REFERENCES

Ernawati, F. et al., 2014. Hubungan panjang badan lahir terhadap perkembangan anak usia 12 Bulan. *Penel Gizi Makan*, 37(2), pp.109–118. Jajah K Husaini, Mahdin A Husaini, M.S.M., 2007. Keterbatasan Penggunaan Lingkaran Lengan Atas Dalam Memonitor Status Gizi Wanita Hamil Berisiko Tinggi Melahirkan Bayi Lahir Rendah. *Buletin Penelitian Kesehatan*, 35(4), pp.177–186. Lukman, D., 2015. Kurikulum dan Modul Pelatihan Metodologi Penelitian Bagi Tenaga Pendidik, Jakarta: Ousat Pendidikan dan Pelatihan Tenaga Kesehatan Badan PPSDM Kesehatan Kemenkes RI. Manuaba Ida Bagus Gede, 2010. Ilmu Kebidanan, Penyakit Kandungan dan Keluarga Berencana Untuk Pendidikan Bidan, Jakarta: EGC. Mochamad Setyo Pramono, U.M., 2011. Pola Kejadian Bayi Berat Lahir Rendah dan Faktor Yang Mempengaruhinya di Indonesia tahun 2010. *Buletin Penelitian Sistem Kesehatan*, 14(3), pp.209–217. Pramono, M.S., 2009. Determinan Sosial, Ekonomi dan Demografi di Indonesia. *Buletin Penelitian Sistem Kesehatan*, 12(No 2), pp.127–132. Shiddiq, A. & Lipoeto, N.I., 2014. Artikel Penelitian Hubungan Pertambahan Berat Badan Ibu Hamil terhadap Berat Bayi Lahir di Kota Pariaman. *Jurnal Kesehatan Andalas*, 3(1), pp.472–477. Sukijo Notoatmodjo, 2010. *Metodologi Penelitian Kesehatan*, Jakarta: PT Rineka Cipta. Suryati, 2014. Faktor-faktor yang mempengaruhi kejadian BBLR diWilayah Kerja Puskesmas Air Dingin Tahun 2013. *Jurnal Kesehatan Masyarakat Andalas*, 8(2), pp.71–77. Syahir, A., 2016. Gambaran Umur Ibu, Usia Kandungan, dan Tinggi Ibu terhadap Kejadian Bayi Berat Lahir Rendah (BBLR) di Wilayah Puskesmas Gianyar 1 Bali Tahun 2015 Ahmad. *Intisari Sain Medis*, 6(1), pp.1–7. Yulistini, S.A.S.M.E.C., 2015. Faktor Risiko yang Berpengaruh terhadap Kejadian Berat Badan Lahir Rendah di RSUP Dr M.

