EAS Journal of Nursing and Midwifery

Abbreviated Key Title: EAS J Nurs Midwifery ISSN: 2663-0966 (Print) & ISSN: 2663-6735 (Online) Published By East African Scholars Publisher, Kenya



Volume-3 | Issue-5 | Sept-Oct -2021 |

DOI: 10.36349/easjnm.2021.v03i05.001

Original Research Article

Analysis of Factors Related to the Skills of Midwives in Carrying Out Resuscitation and Stabilization in Neonates with Respiratory Emergency in the Delivery Room of the Kupang Regional Health Center

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Article History

Received: 06.08.2021 Accepted: 11.09.2021 Published: 21.09.2021

Journal homepage: https://www.easpublisher.com



Abstract: Background: Kupang Regency and Kupang City are two areas with a high number of infant mortality cases (including AKN) and contribute quite significantly to the number of infant and neonatal deaths at provincial and national levels and make both regions one of the regions with the number of infant and neonatal deaths is higher than other regions in Indonesia. Method: This research is a non-experimental study with a cross sectional approach. The research sample was 73 midwives in all puskesmas in Kupa City and Kupang Regency which were determined by total sampling. **Result:** The results showed that (a) the knowledge factor did not have a relationship with the skills of the midwife in carrying out resuscitation and stabilization in neonates who experienced respiratory distress in the delivery room of the Kupang area health center. (b) The training factor has a relationship with the skills of the midwife in carrying out resuscitation and stabilization in neonates who experience respiratory distress in the delivery room of the Kupang area health center. (c) The length of service factor has a relationship with the skills of the midwife in carrying out resuscitation and stabilization in neonates who experience respiratory distress in the delivery room of the Kupang area health center. (d) The work status factor does not have a relationship with the skills of the midwife in carrying out resuscitation and stabilization in neonates who experience respiratory distress in the delivery room of the Kupang area health center. (e) The factor of tenure is the factor that has the most dominant relationship with the skills of the midwife.

Keywords: Midwife Skills, Knowledge, Training, Working Period, Employment Status

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INTRODUCTION

Efforts to maintain children's health are aimed at preparing the next generation to be healthy, intelligent, and of high quality and to reduce child mortality. Efforts to maintain children's health are carried out since the fetus is still in the womb, born, after birth, and until the age of eighteen years. Child health efforts are expected to reduce child mortality. The indicators of child-related mortality are the Neonatal Mortality Rate (AKN), the Infant Mortality Rate (IMR), and the Toddler Mortality Rate (AKABA). Attention to efforts to reduce neonatal mortality (0-28 days) is important because neonatal mortality contributes to 59% of infant deaths (Ministry of Health, RI, 2016: 124).

Based on data reported to the Directorate of Family Health in 2019, out of 29,322 under-five deaths in Indonesia, 69% (20,244 deaths) of them occurred in the neonatal period. Of all reported neonatal deaths, 80% (16,156 deaths) occurred during the first six days of life. Meanwhile, 21% (6,151 deaths) occurred at the age of 29 days-11 months and 10% (2,927 deaths) occurred at the age of 12-59 months, and the second most common cause of neonatal death was Asphyxia, which was 27.0% (5,464 deaths) (Ministry of Health RI, 2020).

In East Nusa Tenggara Province, based on data released by the NTT Provincial Health Office in the Health Profile, in 2018 there were 834 cases of neonatal deaths with a composition of 476 male neonatal deaths

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and 333 female neonatal deaths. If the Neonatal Mortality Rate (AKN) is converted in units per 1000 live births, it will be obtained that in 2018, the NTT in NTT Province was 8.7 Neonatal deaths per 1000 live births with a composition of 9.8 Male Neonatal deaths per 1000 births life and 7.0 female Neonatal deaths per 1000 live births (Dikes NTT, 2018).

This data is specifically the Neonatal Mortality Rate (AKN) in East Nusa Tenggara Province. For data on the number of infant mortality cases (including AKN) in the province, it is even higher. In 2018, the number of infant deaths (including AKN) in NTT Province was 912 with a conversion of 10.13 per 1000 live births (NTT Health Office, 2018). Meanwhile, in 2019, there were 823 infant deaths (including AKN) with a conversion rate of 9.14 per 1000 live births (East Nusa Tenggara Health Office, 2019).

There are several districts in East Nusa Tenggara Province with the highest number of AKN cases, namely Kupang City and Kupang Regency. Based on data released by the NTT Provincial Health Office, in 2018, there were 35 cases of infant mortality (including neonatal deaths) with a conversion rate of 4.23 per 1000 live births. Meanwhile, in 2019, there were 18 infant deaths (including neonatal deaths) with a conversion rate of 2.17 per 1000 live births (East Nusa Tenggara Health Office, 2019).

In Kabupaten Kupang, the number of infant deaths (including AKN) is much higher than the number of infant deaths (including AKN) in Kota Kupang. Based on data released by the NTT Provincial Health Office, in 2018 there were 86 cases of infant mortality (including AKN) with a conversion rate of 16.35 per 1000 live births. Meanwhile, in 2019, there were 96 infant deaths (including AKN) with a conversion rate of 18.25 per 1000 live births (NTT Health Office, 2019).

Based on some of these data, it can be understood several things. First, East Nusa Tenggara Province is one of the provinces with the highest number of AKN cases in Indonesia. In 2018, cases in NTT were 8.7 Neonatal deaths per 1000 live births. While in DKI Jakarta Province which has the status as the capital city of Indonesia, in 2018 there were 376 AKN with conversions of 2 per 1000 live births (DKI Jakarta Health Office, 2018). Second, the AKN data in Kupang City and Kupang Regency as well as the NTT Province contributed significantly to the data on the number of infant deaths (including AKN) nationally. The United Nations (UN) released data showing that in 2019, the number of infant deaths (including AKN) in Indonesia was 21.12 infant deaths per 1000 live births and in 2018, there were 21.86 infant deaths per 1000 live births (Harismi, 2020). Third, the number of deaths (including AKN) in Indonesia can be said to be still very far from the target of SDGs 3 as well as the target

set by the Indonesian Ministry of Health, which states that by 2030, end preventable deaths in newborns, where each country targets to reduce neonatal mortality to at least 12 per 1000 live births.

Resuscitation is one of the efforts made to prolong the life of the baby and prevent the occurrence of sequelae that may appear. A midwife has an important role in the successful implementation of resuscitation. Neonatal patients are in conditions that require intensive supervision, so that a fast response from the midwife is needed to assess the emergency and make decisions in implementing resuscitation measures according to the procedure. Resuscitation measures are interpreted as helping to provide adequate respiratory circulation. Recommendations effort and resuscitation in resource-limited areas are known as the 'Helping Babies Breathe' (HBB) movement and based on retrospective studies have been shown to improve perinatal outcomes. Delayed rescue breathing increases neonatal morbidity and mortality by 16% every 30 seconds and the secondary effect is bradycardia (Ersdal et al., 2011).

Stabilization is a post-resuscitation condition that reflects the improvement of vital organ function. Respiratory stabilization means reduced distress and patterns, improved breathing cardiovascular stabilization can be confirmed by normal heart rate, skin color and improved organ perfusion. Infants with improved conscious response state signify neurological stabilization. The World Health Organization-United Nations Children's Fund (WHO-UNIICEF) launched several neonatal stabilization assessment programs, including Integrated Management of Neonatal and Childhood Illness (IMNCI), Pregnancy, childbirth, postpartum, and newborn care (A guide for essential Practice), Perinatal Continuing Education Program, Acute Care of at-Risk Newborns (ACoRN) and STABLE (Sugar and Safe Care, Temperature, Airway, Blood Pressure, Laboratory Work, Emotional Support) (Ringer and Aziz, 2012). The team required for referral usually consists of a minimum of trained nurses and paramedics with respiratory therapy skills. Teams consisting of trained nurses or midwives lead to better response times.

The midwife's authority in dealing with newborns with respiratory emergencies is to carry out resuscitation (the initial step) and positive pressure ventilation (Sudarti, 2013). The success of resuscitation is strongly influenced by a health worker, either a doctor, nurse, or midwife as the spearhead in providing midwifery care (Potter & Perry, 2010). Decreasing IMR due to asphyxia requires delivery assistance from health workers who have the ability and skills to handle asphyxiated babies starting from the basic health service level, during the referral process and when the baby's equipment arrives at the referral facility. This is in accordance with the recommendation of the

Indonesian Pediatrician Association (IDAI) Number: 005/Rek/PP IDAI/V/2014 concerning Neonatal Resuscitation and Stabilization, which aims to stabilize newborns within 1 hour of birth.

Midwife competence is knowledge, skills and skills that must be possessed by midwives in carrying out midwifery practice in various health service settings, safely and responsibly according to standards as a condition to be considered capable by the community. The midwife's competence on handling neonatal emergencies is found in the 6th midwife competence, namely midwives providing high-quality, comprehensive care for healthy newborns up to 1 Therefore, midwives must have good competence and work effort (Marlina et al., 2015). The research of Sapari (2020), Yarnita (2020), gives the result that there is a significant relationship between education, marital status, age, and training, length of work, motivation, reward, supervision and performance of midwives. Meilan's research (2016) concludes that job descriptions, job reviews, and knowledge are significantly related to the performance of independent practice midwives.

The results of the performance of midwives in the implementation of maternal and child health services can be seen from the coverage of PWS-KIA Kupang City and Kupang Regency. The coverage of maternal and child health services, the K4 coverage indicator in 2015 was 72.4% and decreased to 70.6% in 2016, where this figure was still below the set target of 95%. Delivery assisted by health workers with midwifery competence in 2015 was 72.4% and decreased to 71.8% in 2016, the coverage of neonatal visits in Kupang City in 2015, KN1 coverage was 99.3% and complete KN was 97.6%, in 2015. In 2016 the coverage of KN 1 in Kupang City was 99.27% and complete KN 97.64%, this figure has reached the minimum service standard target of 90%, but these data show that midwives have not provided complete neonatal services, this is evidenced by the large coverage KN1 compared to complete KN and coverage of infant health services in 2015 was 74.0% and according to be 71.13% in 2016.

The description of PWS MCH coverage above shows that the performance of village midwives in maternal and child health services in the work area for which they are responsible is still not optimal, thus increasing the risk of Neonatal mortality. Therefore, village performance still needs to be improved considering the high neonatal mortality rate in the Kupang City and Kupang District Health Offices, especially increasing health promotion efforts, field monitoring and maximizing the achievements of programs related to neonatal mortality rates.

Based on the above background, the researchers are interested in conducting research on

factor analysis related to the skills of midwives in carrying out resuscitation and stabilization in neonates who experience respiratory distress in the Maternity Room of the Kupang Regional Health Center.

This research needs to be done because these two areas are areas with a higher number of infant and neonatal deaths than other regions in Indonesia. In addition, the urgency of this research is the fact that in East Nusa Tenggara Province which includes Kupang City and Kupang Regency, there is almost no data that shows the existence of Specialist Doctors for Neonatal affairs. In the province, it is only dominated by General Practitioners, Specialist Doctors for other affairs, Dentists. This is very much compared to the number of midwives of 119 per 100,000 population (Dikes NTT, 2019). So that the results of this study can be part of the solution to these problems. In this study, the data collection technique used to assess the skills and knowledge of midwives is by direct interviewing the midwives who are the object of research by referring to the questionnaire sheet and the OSCE sheet. This is done to avoid subjective statements so that the research results obtained can be more real and accountable. This is a differentiator with other studies which mostly use survey techniques with only a questionnaire instrument. In addition, this research was conducted in two areas with a higher number of IMR cases than most regions in Indonesia, so that the output of this study can practically be a reference for solutions to minimize the number of IMR cases in these two areas.

The purpose of this study was to analyze the factors related to the skills of midwives in carrying out resuscitation and stabilization in neonates who experienced respiratory distress in the Maternity Room of the Kupang Regional Health Center.

METHODS

Research Design

This research is a non-experimental study with a cross sectional approach. Researchers want to study the factors related to the skills of midwives in carrying out resuscitation and stabilization in neonates who experience respiratory distress in the delivery room of the Kupang Health Center.

Research Sampling

The sample of this study was 73 midwives who work in the health center in the Kupang City and Kupang Regency areas who carried out delivery assistance which were determined by total sampling.

Research Location and Time

The study was conducted at the Kupang City Health Center (Puskesmas Pasir Panjang, Sikumana, Alak, Bakunase) and the Kupang Regency Health Centers (Puskesmas Baktate, Tarus, Oemasi), which were held from April to June 2021.

Research Variable

Research variables consist of independent and dependent variables. The independent variables in this study were factors related to the skills of midwives in carrying out resuscitation and stabilization in neonates who experienced respiratory distress at the Maternity Home Health Center Kupang Region, namely knowledge, training, years of service, and work status. While the dependent variable is the skill of the midwife.

Research Instrument

The instruments in this study were researchers, questionnaire sheets, and OSCE sheets. The researcher became the key instrument in this study because in the process of collecting research data, especially to obtain data on the skills and knowledge of midwives, researchers conducted direct interviews by using the OSCE sheet and questionnaire sheet as a reference. This was done to avoid subjective answers from the midwives who were asked to answer. This decision was taken by the researcher on the basis of the consideration that when research data is obtained by only providing questionnaires, especially online, it opens up opportunities for subjective answers to emerge so that research results are not real and research outputs are not achieved.

For the questionnaire sheet, the researchers tested the research instrument, namely through validity and reliability tests. This is done to find out whether the questions in the questionnaire are declared valid and reliable or not, because a good and proper questionnaire to use is a questionnaire that is declared valid and reliable.

DATA ANALYSIS

This study uses three data analysis techniques, namely Univariate, Bivariate, and Multivariate. Univariate analysis was conducted to determine the frequency distribution of respondents' characteristics.

Bivariate analysis in this study uses factors that affect skills, namely knowledge, training, years of service, and work status. Statistical test using Chi-Square using SPSS computer program with 95% confidence interval or p \leq 0.05 where H1 is accepted if p value or p value <0.05 and H0 is accepted if p value > a or p value >0.05.

Multivariate analysis was used to determine the effect of the independent variables together with the dependent variable. This study aims to determine the factors related to the skills of midwives in resuscitation and stabilization of neonates who experience respiratory distress in the delivery room of the Kupang Public Health Center.

RESULT

Overview of Research Location

Kupang City and Kupang Regency are part of the area in East Nusa Tenggara Province. Kupang City itself has an area of 180.27 km². The boundaries of Kupang City are South with Kupang Regency, North with Kupang Bay, West with Semau Strait and Kupang Regency, East with Kupang Regency. The city of Kupang has 6 sub-districts and 51 urban villages with heterogeneous population characteristics. The city of Kupang also has 11 health centers spread across the 6 sub-districts, namely Oepoi Health Center, Oesapa Health Center, Oebobo, Pasir Panjang, Kupang City, Bakunase Sikumana, Alak, Penfui, Manutapen, and Naioni, while those who provide delivery assistance in Kupang City are Puskesmas (Alak, Sikumana, Pasir Panjang, Bakunase). While the area in Kupang Regency is 5,298.13 km². The boundaries of Kupang Regency are North with Sabu Sea, Ombai Strait, East with North Central Timor Regency, South Middle East Regency and Timor Leste, South with Rote Ndao Regency, Timor Sea and Indian Ocean, West with Rote Ndao Regency and Sabu Sea. Kupang district has 26 health centers spread over 26 sub-districts.

Respondent Characteristic

Table-1: Respondent Characteristic

Characteristic	Number (n)		
Age			
22-32 years	18		
33-42 years	36		
43-52 years	19		
Total	73		
Last Education			
Diploma	57		
Degree	13		
Master	3		
Total	73		
Public Health Cent	er		
Alak	10		
Bakunase	12		
Pasir Panjang	11		
Sikumana	10		
Oemasi	10		
Baktate	10		
Tarus	10		
Total	73		

Respondents with an age range of 22-32 years were 18 midwives. Respondents with an age range of 33-42 years amounted to 36 midwives. Respondents with an age range of 43-53 years amounted to 19 midwives. Referring to the data, it can be understood that the respondents with the largest number are respondents with an age range of 33-42 years.

Respondents with a D3 educational background totaled 57 midwives. Respondents with educational background D4/S1 amounted to 13 midwives. Respondents with a master's education background amounted to 3 midwives. Referring to the data, it can be understood that the respondents with the largest number are respondents with a D3 educational background.

Respondents who work at the Alak Health Center is 10 midwives. Respondents who work at the Bakunase Health Center are 12 people. Respondents who work at the Pasir Panjang Public Health Center are 11 midwives. There are 10 respondents who work at the Sikumana Health Center. Respondents who work at the Oemasi Health Center are 10 midwives. Respondents who work at the Baktate Health Center are 10 midwives. There are 10 respondents who work at the Tarus Health Center. Referring to the data, it can be understood that the majority of respondents are respondents who work at the Bakunase Health Center.

Distribution of Midwives Skill Variable

Table-2: Distribution of Midwives Skill

Variable	Category	Number (n)
Midwives Skill	Not Good	22
	Good	51
	Total	73

The table above shows that from 73 midwives, it is known that 22 midwives are stated to have poor skills with a percentage of 30.1%, while 51 field workers are stated to have good skills with a percentage of 69.9%. Referring to these data, it can be understood that most of the midwives who were respondents in this study were midwives with good skills.

Distribution of Knowledge Variable

Table-3: Distribusi Variabel Pengetahuan

Variable	Category	Number (n)
Knowledge	Not Good	28
	Good	45
	Total	73

The table above shows that from 73 midwives, 28 midwives were stated to have sufficient knowledge with a percentage of 38.4%, while 45 midwives were stated to have good knowledge with a percentage of 61.6%. Referring to the data, it can be understood that most of the midwives who were respondents in this study were midwives who had good knowledge.

Distribution of Training Variable

Table-4: Distribution of Training Variable

Variable	Category	Number (n)
Training	Inadequate Training	18
	Supportive Training	55
	Total	73

The table above shows that out of 73 field workers, 18 midwives stated that they had attended unsupportive training with a percentage of 24.7%, and 55 midwives were stated to have attended supportive training with a percentage of 75.3%. Referring to these data, it can be understood that most of the midwives who were respondents in this study were midwives who had attended supportive training.

Distribution of Working Period Variable

Table-5: Distribution of Working Period Variable

Variable	Category	Number (n)
Working Period	0-1 Years	1
	1-2 Years	7
	2-3 Years	20
	3-4 Years	45
	Total	73

The table above shows that out of 73 midwives, 1 midwife with a new working period (0-1 years), 7 midwives with first medium tenure (1-2 years), 20 midwives with a second medium tenure (2-years) 3 years), and 45 midwives with long tenures (3-4 years). Referring to these data, it can be understood that most of the midwives who were respondents in this study were midwives with long tenures.

Distribution of Work Status Variable

Table-6: Distribution of Work Status Variable

Variable	Category	Number (n)
Work Status	Civil Servant	61
	Not a Civil Servant	12
	Total	73

The table above shows that from 73 midwives, 61 midwives are known to have working status as Civil Servants (PNS), and 12 midwives with non-PNS work status. Referring to these data, it can be concluded that most of the midwives who were respondents in the study were midwives with working status as civil servants.

Relationship of Knowledge, Training, Term of Employment, and Employment Status with Midwife Skill

The results of the analysis of the relationship between knowledge, training, years of service, and work status with the skills of the midwife carried out using the chi square test are as follows:

Table-7: Relationship of Knowledge, Training, Term of Employment, and Employment Status with Midwife Skill

Variable	Category	Not Good	Good	p
Knowledge	Not Good	8	20	0.818
	Good	14	31	
Training	Inadequate Training	4	14	0.039
	Supportive Training	18	37	
Working Period	0-1 Years	1	0	0.001
	1-2 Years	2	5	
	2-3 Years	6	14	
	3-4 Years	13	32	
Work Status	Civil Servant	17	44	0.341
	Not a Civil Servant	5	7	

The significance value through the Chi-Square Test for the Knowledge variable with the skill variable is (0.818). The significance value is greater than (0.05), so it can be concluded that knowledge has no relationship with the skills of the midwife.

The significance value through the Chi-Square Test for the Training variable with the skill variable is (0.039). The significance value is smaller than (0.05), so it can be concluded that training has a relationship with the skills of midwives.

The significance value through the Chi-Square Test for the variable period of service with the skill variable is (0.001). The significance value is smaller than (0.05), so it can be concluded that the working period has a relationship with the skills of the midwife.

The significance value through the Chi-Square Test for the Work Status variable with the skill variable is (0.341). The significance value is greater than (0.05), so it can be concluded that Employment Status has no relationship with the skills of the midwife.

Dominant Factors Associated with Midwife Skill

Table-8: Dominant Factor Analysis Result

Variable	p	Exp (b)
Knowledge	.981	.587
Training	.039	.973
Working Period	.041	1.205
Work Status	.325	.506

The table above shows that of the four factors, only training and years of service have a relationship with midwifery skills and have the opportunity to develop midwifery skills. The training factor has a chance of 0.973 times on the formation of midwife skills, while the working period has a chance of 1,205 times on the formation of midwife skills. Referring to the data, it can be concluded that the factor that has a dominant relationship with the skills of the midwife is the tenure factor.

DISCUSSION

Relationship between Knowledge and Midwife Skill

In this study, the researchers found that the knowledge factor did not have a relationship with the skill of the midwife in carrying out resuscitation and stabilization in neonates who experienced respiratory distress in the delivery room of the Kupang Regional Public Health Center. This is evidenced by the significance value obtained through the results of the Chi test for the Knowledge variable with the skill variable of (0.818), where the significance value is greater than (0.05). The results of this study reject the hypothesis proposed by the researcher, in which the researcher concludes that there is a relationship between knowledge and skills of midwives in carrying out resuscitation and stabilization in neonates.

Referring to the results of the study, it can be understood that the better a person's knowledge still does not necessarily have a relationship with skills. This is contrary to the theory which says that when someone's knowledge is getting better, it will encourage the formation of good skills as well.

Bloom in Notoatmodjo (2013) explains that knowledge is one of three domains that affect human behavior. Knowledge has a very important role for the formation of one's actions, because from experience and research it turns out that behavior based on knowledge will be more lasting than behavior that is not based on knowledge.

Referring to the theory, the researcher assumes that the thing that makes the knowledge factor not related to skills is because the knowledge possessed by midwives is knowledge that is limited to knowledge, but is not supported by experience in the field so that the process of forming skills is constrained. As it is understood that when knowledge is not supported by experience, it will only make one's knowledge dull.

Notoatmodjo (2012) explains that there are six levels of knowledge achieved in the cognitive domain. First, Know which is defined as remembering a previously agreed upon material. Included in this level of knowledge is recalling something specific from all

the material studied or the stimuli that have been received. Therefore, tofu is the lowest level. Second, Understanding (Comprehension) which is defined as an ability to explain correctly about a known object. Third, Application which is defined as an ability to use the material that has been studied in real (actual) situations or conditions. Fourth, Analysis (Analysis) which is defined as an ability to express material or an object into components but still within an organizational structure and still have a relationship with each other. Fifth, Synthesis which is defined as an ability to carry out or parts in a new whole. Sixth, Evaluation, which is defined as an ability to justify or evaluate a material or object.

Referring to the explanation of the level of knowledge theory, the researcher assumes that the thing that causes the knowledge factor has no relationship with skills because on average the knowledge level of the midwives in the research location only reaches the level of knowing (know), which is only up to the highest level of low knowledge. This level of knowledge that is limited to knowing is the level of knowledge where a person only knows about certain theories of skills but is not supported by applications and other higher levels of knowledge.

Relationship between Training and Midwife Skill

In this study, researchers found that training had a relationship with the skills of midwives in carrying out resuscitation and stabilization in neonates who experienced respiratory distress in the delivery room of the Kupang health center. This is evidenced by the significance value obtained through the Chi test for the Training variable with the skill variable of (0.039), where the significance value is smaller than (0.05). The results of this study are in accordance with the hypothesis proposed by the researcher in which the researcher concludes that there is a relationship between training and the skills of midwives in carrying out resuscitation and stabilization in neonates.

Referring to the results of the study, it can be understood that the training that has been followed by a person will be closely related to skills. This is in accordance with the theory which says that the intensity of a person involved in certain training, will further support or not support one's skills.

Siagian (2018) explains that training can help workers make better decisions, improve their abilities in their field of work so that they can reduce stress and increase self-confidence. The additional information about the program obtained from the training can be used as a process of intellectual growth so that anxiety about facing changes in the future can be reduced.

Referring to the theory, the researcher assumes that the thing that makes the training factor related to the skills of midwives is because the training that has

been attended by the midwives is training that focuses on supporting the desired skills. By frequently attending training, midwives will experience an increase in intellectual and qualified experience as well as confidence in their skills. This makes midwives more proficient in applying their skills.

Handoko (2017) explains that there are two training objectives, namely (a) training and development are carried out to close the gap between employee abilities and job requests, and (b) the program is expected to increase the efficiency and effectiveness of employees' work in achieving the work targets that have been set.

Referring to the theory, the researcher assumes that the thing that makes the training factor has a relationship with skills is that midwives have often attended training for two main reasons, namely to adjust their abilities to the needs of the desired position and because they really want to improve the quality and skills in order to have good performance.

Syafrudin in Pramiadi (2010) explains that Midwives are recognized as responsible and accountable professionals, who work as women's partners to provide support, care, and advice during pregnancy, childbirth, and the postpartum period, lead deliveries on their own responsibility and provide care for newborns and infants. This care includes prevention efforts, promotion of normal delivery, and access to appropriate medical assistance and carrying out emergency measures. Currently, there are two types of midwives, namely midwives who receive special education for three years and nurses who receive one year of midwifery education, who are known as nurse midwives.

Referring to the theory, the researcher assumes that the factor that causes the training factor to have a relationship with the skills of midwives is the possibility that most of the midwives are midwives who have attended training quite often. So that with the training, the midwives will be more skilled in the relevant field.

Relationship between Working Period and Midwife Skill

In this study, the researchers found that the working period had a relationship with the skills of the midwife in carrying out resuscitation and stabilization in neonates experiencing respiratory distress in the delivery room at the Kupang Regional Health Center. This is evidenced by the significance value obtained through the results of the Chi test for the variable period of service with the skill variable of (0.001), where the significance value is smaller than (0.05). The results of this study are in accordance with the hypothesis proposed by the researcher, in which the researcher temporarily concludes that there is a relationship

between tenure and the skills of the midwife in carrying out resuscitation and stabilization in neonates.

Referring to the results of the study, it can be understood that the short or long working period of a person will affect the good or lack of skills of a person in a particular field. This is in accordance with the theory which says that the longer or shorter the working period of a person will definitely affect the good or lack of a person's skills.

Suma'mur in Nisak (2014), explains that the period of service is also the period of time for someone who has worked from the first start to work. The period of work can be interpreted as a rather long piece of time in which a worker enters the area of the place of business to a certain extent.

Referring to the theory, the researcher assumes that the factor that causes the length of service to have a relationship with the skills of the midwife is that the midwives who work are midwives who actually work for a certain period of time. Legally, these midwives are midwives who work according to a clear legal basis. When the legal basis is clear, it will affect the motivation and enthusiasm of the midwives to be highly dedicated, one of the things that midwives always want to improve is skills in certain fields.

Handoko (2012), explained that the length of work can be categorized into 4, namely, the length of work in the new category (0 - 1 year), the length of work in the first medium category (1 - 2 years), the length of work in the second medium category (3 - 4 years), and length of service in the old category (> 4 years).

Referring to the theory, the researcher assumes that the factor that causes the length of service to have a relationship with the skills of midwives is that on average, midwives have worked for a long time, which is categorized as second or long working time. The longer a person works, the experience is very qualified so that his skills are already reliable.

Relationship between Work Status and Midwife Skill

In this study, the researchers found that the work status factor did not have a relationship with the skills of midwives in carrying out resuscitation and stabilization in neonates experiencing respiratory emergencies in the delivery room of the Kupang Regional Health Center. This is evidenced by the significance value obtained through the Chi test results for the work status variable with the skill variable of (0.341), where the significance value is greater than (0.05). The results of this study reject the hypothesis proposed by the researcher in which the researcher temporarily concludes that there is a relationship

between work status and the skills of midwives in carrying out resuscitation and stabilization in neonates.

Referring to the results of the study, it can be understood that a person's work status does not necessarily have a relationship with the skills of the midwife. This is contrary to the theory which says that whether or not a person's working status will be closely related to that person's skills. In the current reform era where everyone wants a government free from corruption, it is appropriate for civil servants to have 6 work ethos, namely hard work, discipline, independence, honesty, diligence, and most importantly must have thick faith.

Based on this explanation, the researcher understands that employees with the status of Civil Servants in an agency, including Puskesmas, have various duties and functions as regulated in the Law regarding the duties, functions, and roles of civil servants. The duties and functions are solely to provide services to the community to the maximum, fairly, and equitably. In addition, the researcher also understands that as a servant of the state, it is expected to have various abilities and skills that support implementation of the task. These state servants are expected to be more creative and innovative in formulating and implementing ideas. The servants of the state are also expected to be more proactive in carrying out and participating in activities oriented towards self-development and strengthening their qualities and skills. Likewise, midwives with working status as Civil Servants are expected to become Civil Servants who are aware of themselves as state servants who are tasked with providing maximum, fair, and equitable public services to the community, more and innovative in formulating creative implementing ideas, as well as being more proactive in self-development, quality improvement and self-skills.

The results of this study support the research of Dwiyanti (2013) that there is no relationship between employment status and the skills of midwives. Midwife employment status is the position of the midwife in relation to the environment or workplace (Widyastuti et al, 2008). If it is seen that the employment status relationship is not meaningful, this is because one of the challenges in understanding and applying Herzberg's theory is to take into account exactly which factors have a more strong influence on a person's life, whether intrinsic or extrinsic (Mirza 2012). Given the importance of resuscitation and stabilization for the safety of the neonate, all midwives, whether civil servants or non-permanent employees, are expected to be able to carry out resuscitation and stabilization regardless of work status.

Factors that vave a Dominant Relationship with Midwife Skilla

In this study, the factor that has the most dominant relationship with the skills of the midwife is the tenure factor. This is evidenced by the results of the Multivariate test through the Logistics Regression test which shows that the employment period variable has a chance of 1,205 times and is greater than the opportunity for the training variable of 0.973 times on the formation of midwife skills.

According to the researcher, the thing that makes the period of service the factor that has the most dominant relationship with the skills of the midwife is that the tenure is identical to how long a person has served, worked, and how much experience. When someone has worked for a long time, of course the experience that that person has is quite a lot, so that it allows that person to have the skills. This is different from the training factor. A person who undergoes training to support skills still does not necessarily make that person really have the skills. Because training that is not supported by a long period of work only allows someone who is not necessarily experienced and has skills in a particular field.

Suma'mur in Nisak (2014), explains that the period of service is also the period of time for someone who has worked from the first start to work. The period of work can be interpreted as a rather long piece of time in which a worker enters the area of the place of business to a certain extent.

Referring to the theory, the researcher assumes that the factor that causes the length of service to have a relationship with the skills of the midwife is that the midwives who work are midwives who actually work for a certain period of time. Legally, these midwives are midwives who work according to a clear legal basis. When the legal basis is clear, it will affect the motivation and enthusiasm of the midwives to be highly dedicated, one of the things that midwives always want to improve is skills in certain fields.

Handoko (2012), explained that the length of work can be categorized into 4, namely, the length of work in the new category (0 - 1 year), the length of work in the first medium category (1 - 2 years), the length of work in the second medium category (3 - 4 years), and length of service in the old category (> 4 years).

Referring to the theory, the researcher assumes that the factor that causes the length of service to have a relationship with the skills of midwives is that on average, midwives have worked for a long time, which is categorized as second or long working time. The longer a person works, the experience is very qualified so that his skills are already reliable.

CONCLUSION

The knowledge factor has no relationship with the skills of the midwife in carrying out resuscitation and stabilization in neonates who experience respiratory distress in the delivery room at the Kupang area health center. This is evidenced by the significance value obtained through the results of the Chi test for the Knowledge variable with the skill variable of (0.818), where the significance value is greater than (0.05).

The training factor has a relationship with the skills of midwives in carrying out resuscitation and stabilization in neonates who experience respiratory distress in the delivery room at the Kupang area health center. This is evidenced by the significance value obtained through the results of the Chi test for the Training variable with the skill variable of (0.039), where the significance value is smaller than (0.05).

The working period factor has a relationship with the skills of the midwife in carrying out resuscitation and stabilization in neonates who experience respiratory distress in the delivery room at the Kupang area health center. This is evidenced by the significance value obtained through the results of the Chi test for the variable period of service with the skill variable of (0.001), where the significance value is smaller than (0.05).

The work status factor did not have a relationship with the skills of the midwife in carrying out resuscitation and stabilization in neonates who experienced respiratory distress in the delivery room of the Kupang area health center. This is evidenced by the significance value obtained through the Chi test results for the work status variable with the skill variable of (0.341), where the significance value is greater than (0.05).

The tenure factor is the factor that has the most dominant relationship with the skills of the midwife. This is evidenced by the results of the Multivariate test through the Logistics Regression test which shows that the employment period variable has a chance of 1,205 times and is greater than the opportunity for the training variable of 0.973 times on the formation of midwife skills.

ACKNOWLEDGMENT

We would like to express our deepest gratitude to the supervising lecturers and examiners of the Faculty of Medicine, Brawijaya University and the research participants whose commitment deserves thumbs up. The author also expresses his gratitude to the entire academic community of the midwifery master's study program, Faculty of Medicine, Brawijaya University. The author would also like to thank her beloved family who have provided moral and material support in this research.

REFERENCE

- Amirullah. (2013). *Metodologi Penelitian Manajemen*. Malang: Bayumedia
- Andini, F. (2015). Risk Factory Of Low Back Pain In Workers. J Majority, 4(1).
- Anne. (2019). Https://Jurnal.Umsb.Ac.Id/Index.Php/Menarailmu/ Article/Download/1185/1037, Diakses pada tanggal 13 Januari 2021.
- Chamberlain, G., & Steer, P. (1999). Operative Delivery (Clinical Review). British Medical Journal, 318, 1260-1264.
- Cunningham, F. G. (2012). *Obstetri Williams*. Cetakan 23, Egc, Jakarta.
- Depkes, R. I. (2016). *Profil Kesehatan Indonesia*. 2016. Diambil dari: Http://www.depkes.go.id
- Dessler, G. (2017). *Manajemen Personalia*. *Terjemahan Agus Darma*. Jakarta: Erlangga.
- Dinas Kesehatan Kabupaten Kupang. (2020). Profil Kesehatan Kabupaten Kupang 2019. Https://doi.org/10.24912/jmts.v3i4.9976.
- Dinas-Kesehatan, K. K. (2018). Profil Kesehatan Kota Kupang Tahun 2018. In *Profil Kesehatan* Kota Kupang Tahun 2018. Https://dinkeskotakupang.web.id/bank-data/category/1-profilkesehatan.html?download=36:profil-kesehatantahun-2018.
- Dinas-Kesehatan, N. T. T. (2019). Profil Kesehatan Provinsi Nusa Tenggara Timur Tahun 2018. In Profil Kesehatan Provinsi Nusa Tenggara Timur.
- Ersdal, H. l., & Singhal, N. (2013). Resuscitation in Resource-Limited Settings Seminars in Fetal & Neonatal Medicine, 30, 1–6.
- Meberg, A., & Hansen, T. (2011). Neonatal Transports—Risks and Opportunities. *Ojped*, 1, 45-50.
- Estiwidani, D. (2008). *Konsep Asuhan Kebidanan*. Yogyakarta: Fitramaya.
- Ghofar, A. (2012). *Pedoman Lengkap Keterampilan Perawatan Klinik*. Yogyakarta: Mitra Buku.
- Hamalik, O. (2011). Proses Belajar Mengajar. Jakarta: Bumi Aksara.
- Handoko. (2017). Manajemen Sumber Daya Manusia. Edisi Revisi Jakarta Bumi Aksara. Metodelogi Penelitian Untuk Skripsi Dan Tesisi Bisnis. Jakarta: Gramedia Pustaka.
- Handoko, T. H. (2012). *Manajemen Personalia dan Sumber Daya Manusia*. Yogyakarta. BPFE.
- Nightengale, M. M. R., Ringer, S., Simon, W. M., Weiner, G. M., Wyckoff, M., & Zaichkin, J. (2010). Special Report—Neonatal Resuscitation: 2010 American Heart Association Guidelines for Cardiopulmonary Resuscitation and Emergency Cardiovascular Care. Circulation, 122, S909-S919.
- Kemenkes, R. I. (2013). Riset Kesehatan Dasar: Riskesdas. Jakarta: Balitbang Kemenkes RI.

- Kemenkes, R. I. (2020). Profil Kesehatan Indonesia Tahun 2019. Jakarta: Kementrian Kesehatan Repoblik Indonesia.
- Kementerian-Kesehatan, R. I. (2016). *Infodatin* Pusat Data Dan Informasi Kementerian Kesehatan RI Situasi Balita Pendek. Jakarta Selatan.
- Koesindratmono, F., & Septarini, B. G. (2011).
 Hubungan masa kerja dengan perbedaan psikologis pada karyawan PT. Perkebunan Nusantara X (persero). Jurnal Ilmiah] Jurnal Psikologi, Universitas Airlangga.
- Kurniawan, W., Purnami, C. T., & Wulan, L. R. K. (2013). Faktor-Faktor Yang Berhubungan Dengan Kinerja Bidan Desa Dalam Pelembagaan Pemantauan Wilayah Setempat Kesehatan Ibu Dan Anak (Pws-Kia) DiWilayah Kabupaten Majalengka Provinsi Jawa Barat. Jurnal Manajemen Kesehatan Indonesia.
- Lestari. (2017). Http://repository.unmuha.ac.id, Diakses pada tanggal 13 Januari 2021.
- Marlina, I., Triyono, S., & Tusi, A. (2015). Pengaruh Media Tanam Granul Dari Tanah Liat Terhadap Pertumbuhan Sayuran Hidroponik Sistem Sumbu. *Jurnal Teknik Pertanian Lampung*, 2(4), 143-150.
- Mathis, R. L., & Jackson, J. H. (2006). Human Resource Management: Manajemen Sumber Daya Manusia. Terjemahan Dian Angelia. Jakarta: Salemba Empat.
- Meberg, A., & Hansen, T. (2011). Neonatal Transports—Risks and Opportunities. Open Journal Of Pediatrics, 1, 45-50.
- Nisak, K. (2014). Hubungan Masa Kerja Tenaga Pembuatan Mebel Dengan Terjadinya Gangguan Saluran Pernapasan Pada Pekerja Home Industry Mebel Di Kecamatan Turen Kabupaten Malang. Malang: University Of Muhammadiyah.
- Notoatmodjo, S. (2012). Promosi Kesehatan Dan Perilaku Kesehatan. Jakarta: Rineka Cipta.
- Notoatmodjo, S. (2013) Pendidikan dan Perilaku Kesehatan. Jakarta: Rineka Cipta
- Perlman, D. M., Salomons, T. V., Davidson, R. J., & Lutz, A. (2010). Differential Effects on Pain Intensity and Unpleasantness of Two Meditation Practices. Emotion 10:65-71.
- Potter, P. (2010). Fundamental Of Nursing: Consep, Proses and Practice. Edisi 7. Vol. 3. Jakarta: EGC.
- Ppibi. (2016). Buku Acuan Midwifery Update 2016. Jakarta.
- Ringer SA, Aziz K. (2012). Neonatal Stabilization and Postresuscitation Care. Clin Perinatol 2012: 39.
- Rohan, H. H., & Siyoto, H. S. (2013). *Buku Ajar Kesehatan Reproduksi*. 1st Ed. Yoyakarta: Nuha Medika; 1-367P.
- Saifuddin, A. B. (2019). Panduan Praktis Pelayanan Kesehatan Maternal Dan Neonatal. Jakarta: Egc. 2009.

- Sapari. (2020). Https://www.researchgate.net/publication/3396221 22_faktor-faktor_yang_berhubungan_dengan_kinerja_bidan_dalam_pelayanan_antenatal_di_kabupaten_padan g_pariaman_tahun_2016, Diakses pada tanggal 13 Januari 2021.
- Simanjuntak, P. J. (2015). Manajemen dan Evaluasi Kinerja. Jakarta: Lembaga Penerbit Fakultas Ekonomi Universitas Indonesia.
- Sudarti, D. (2013). Asuhan Kebidanan Neonatus Risiko Tinggi dan Kegawatan. Yogyakarta.
- Usman, H. (2013). Manajemen Teori, Praktik, Dan Riset Pendidikan. Edisi Keempat. Jakarta Timur: Bumi Aksara.
- Widiastuti, S., & Muktiani, N. R. (2010).
 Peningkatan Motivasi dan Keterampilan
 Menggiring Bola Dalam Pembelajaran Sepakbola

- Melalui Kucing Tikus Pada Siswa Kelas 4 SD Glagahombo 2 Tempel. *Jurnal Pendidikan Jasmani Indonesia*, 7(1), 47-59.
- World Health Organization. (2012). *The Pursuit of Responsible Use Of Medicines: Sharing And Learning From Country Experiences*. Diunduh dari Http://www.who.int/iris/bitstream/10665/75828/1/who_emp_mar_2012.3_eng.pdf?ua=1 21.
- Yarnati. (2020).
 http://ejournal.helvetia.ac.id/index.php/jkg/article/d ownload/4676/370, Diakses pada tanggal 13 Desember 2020
- Zurnali, C. (2014). Pengaruh Pelatihan Dan Motivasi Terhadap Perilaku Produktif Karyawan Pada Divisi Long Distance Pt Telkom Indonesia, Tbk", Tesis Program Pascasarjana UNPAD, 2014. Hal. 35.

Cite This Article: Endah Dwi Pratiwi (2021). Analysis of Factors Related to the Skills of Midwives in Carrying Out Resuscitation and Stabilization in Neonates with Respiratory Emergency in the Delivery Room of the Kupang Regional Health Center. *EAS J Nurs Midwifery*, *3*(5), 201-211.