

## Performance of Midwives In Integrated Antenatal Services In Early Detecting High Risk Pregnancy in Kupang City

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### ABSTRACT

The maternal mortality rate in Kupang City has increased by the proportion of 92 / 100,000 KH in 2018 compared to 2017 49 / 100,000 KH. The coverage of high-risk early detection by health workers (midwives) is 17% and by the community 13% is still below the Kupang City Strategic Plan target, the handling of high-risk pregnant women in 2019 is 45.9%, decreasing compared to 2018 of 56.8%. This study aims to explore the performance of midwives in integrated antenatal care in early detection of high-risk pregnancies in Kupang City. The research method used an exploratory study design. The number of informants was 13 people who were selected by purposive sampling method. Data were collected using in-depth interviews and direct observation. The research data were analyzed using thematic methods. The performance of midwives, seen from the input aspect, is lacking, where there is an additional workload for midwives, most of the midwives have not attended training, and there is a lack of examination room infrastructure. From the process aspect, there is lacking of supervision that more focus on early detection of high-risk pregnancies. The output aspect, the midwife's performance achievement was lacking in the two sample Puskesmas as seen from the coverage of each program indicator that had not yet reached the SPM target and the Kupang City Strategic Plan. It is necessary to increase the competence of midwives through integrated antenatal training and early detection of high-risk pregnancies that will support their performance achievement in ANC services.

**Keywords:** Performance of Midwives, Integrated Antenatal, Early Detection of High-Risk Pregnancy

Received December 12, 2020; Revised December 22, 2020; Accepted January 31, 2021



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## BACKGROUND

The maternal mortality rate (MMR) is still high either in the world or in Indonesia. MMR in the world has reportedly not reached the target of Sustainable Development Goals (SDGs), which is below 70/100,000 live births (KH) until 2030, while MMR in developing countries is 239/100,000 KH<sup>1</sup>. Indonesia is one of the developing countries that has a fairly high number of MMR. In every six hours daily, there is one or four mothers in Indonesia who die due to childbirth<sup>2</sup>. In 2017, the Ministry of Health of the Republic of Indonesia has released the data of the Indonesia's MMR was 305/100,000 KH<sup>3</sup>. One of the provinces that contributed to high MMR is NTT Province with an MMR of 161/100,000 KH or there were 155 cases of maternal mortality in 2018<sup>4</sup>. Kupang City is an area in NTT with a maternal mortality rate of 92/100,000 KH or 8 cases of death mothers in 2018. Approximately 67% of the majority of maternal deaths occur during the gestational period of seven months and over, during childbirth and postpartum caused, among others, by bleeding and hypertension<sup>5</sup>.

Efforts made in the prevention of high-risk pregnancies in Kota Kupang, through the 7H7 center program, involves all government sectors and the community in monitoring the health condition of pregnant women and postpartum mothers in the 7 days before and 7 days after delivery, including delivery in health facilities. The 7H7 center program is an implication of the MCH Revolution program in NTT Province as an effort to accelerate the decline of MMR. 7H7 center activities with the installation of the KIBBLA flag through a community health monitoring system for pregnant women<sup>5</sup>. However, the results obtained were only 17% out of 20% target of early detection of high-risk pregnancy by midwives and 13% out of 80% target of early detection of high-risk pregnancies by the community, which were still below or even far below the target of Kupang City Strategic Plan, and handling complications was 56.8%<sup>6</sup>.

Referring to the background and the gap between the coverage of maternal and child health care programs and the targets that have been set, the researchers are interested in examining the performance of midwives in integrated antenatal services in early detection of high-risk pregnancies in Kupang City in terms of the input, process and output description.

## METHODS

This study utilized a qualitative exploratory study design with a qualitative approach. The sampling technique was purposive sampling. The research sample was 13 people. Research location was conducted at UPTD Puskesmas Alak and UPTD Puskesmas Oesapa. The research period was June - July 2020. The data used in this study were primary data, attained through in-depth interviews and direct observation on research subjects and secondary data, attained via documents or other related data to research.

Data collecting through in-depth interviews conducted with key informants, namely midwives implementing and coordinating midwives, while supporting informants were independent practice midwives, head of Puskesmas, head of Kupang City Health Office, high risk pregnant women and low risk pregnant women.

Data analysis is processed according to characteristics with thematic analysis, namely data collection, data reduction, coding, categorization, theme arrangement, verification is presented in descriptive form, then drawing conclusions and presenting data from the analysis and synthesis results based on the themes obtained. This research has received approval from the health research ethics commission of the Health Polytechnic of the Ministry of Health, Kupang No: LB.02.03/1/0034/2020.

**RESULT****Input Aspect****Availability of competent midwives****a. Number and educational background of midwives**

The human resources of midwives at the research locus of the UPTD Puskesmas Alak and the UPTD Puskesmas Oesapa, have met the requirements, such as having a STR midwife, with the lowest educational background is Diploma III of Midwifery and the highest is Strata 1 Midwifery. In terms of quantity, there are still limited numbers of midwives in supporting Puskesmas which have a wide working area coverage. The lack of midwives has resulted in the achievement of the program indicators for the coverage of the integrated antenatal care program and early detection of high-risk pregnancies is not optimal. Based on the interviews with the Head of the Kupang City Health Office, it was found that the ratio of midwives to the community in Kupang City was still very low, which was 5000 people per 1 midwife. This is not even based on the target number of pregnant women in Kupang City.

**b. Knowledge of midwives on integrated antenatal care and early detection of high-risk pregnancies**

Midwife informants have good knowledge about integrated antenatal care and early detection of high-risk pregnancies. The informants said that they knew the goals and benefits of integrated antenatal care and early detection of high-risk pregnancies. One of the most dominant aspect that boosts the midwife's good performance to handle pregnant women with pregnancy complications is because of the knowledge they have.

**c. Additional workload for midwives**

There are concurrent additional duties of a midwife with other programs, including being a treasurer as well as manager of the Puskesmas Health Information System. According to the informants, this concurrent position or additional workload is not only occurring in both study locus (UPTD Puskesmas Oesapa and UPTD Puskesmas Alak), but also experienced by the midwives at the auxiliary Puskesmas, where besides being responsible for maternal and child health care, they also carry out several additional responsibilities, such as provide service on nursing, nutrition and sanitation activity.

**d. Participation in training**

The training provided by the Kupang City Health Office does not include training on integrated antenatal services and early detection of high-risk pregnancies but only in the form of refresher with the aim that all midwives can be exposed to the knowledge gained, while most of the midwives were not involved in this provided training. The participants were only the coordinating midwife and the midwife who is in charge at Sub-district (Kelurahan).

**Facilities and infrastructure to support services****a. Lack of space in providing services**

Facilities and infrastructure are the main problems in supporting integrated antenatal services as an effort to detect early high-risk pregnancies at the UPTD Puskesmas Alak and UPTD Puskesmas Oesapa, which is by the informants (midwives and Head of Puskesmas) considered to be lacking. This is also acknowledged by pregnant mothers' informants. Medicines and medical devices are available and sufficient. This is supported by expenses on drugs and medical devices in the APBD and APBN budgets. The lack of infrastructure for antenatal care in the two sample Puskesmas is still under the standard of the Ministry of Health and is not fully appropriate for support

comfortable health services; for example, in providing services to mothers and pregnant women.

b. Lack of comfort for pregnant women

Lack of examination room facilities makes it difficult for midwives to find out about the complaints experienced by pregnant women and the patient felt uncomfortable to be being open to expressing their pregnancy condition because that information can be easily discovered by others.

Sources of funds to support services

Sources of funds to support integrated antenatal services and early detection of high-risk pregnancies are known to be available and sufficient at the UPTD Puskesmas Alak and UPTD Puskesmas Oesapa obtained from the Regional Budget and the State Budget.

Implementation of policies and SOP (standar operational procedure)

UPTD Puskesmas Alak and UPTD Puskesmas Oesapa have implemented a 10T integrated antenatal service policy based on the SOP set by the Government and early detection of high-risk pregnancies following the policies of the Kupang City Health Office using the Poedji Rochyati score instrument. The implementation of this service is increasingly motivated by the coverage target set by the Kupang City Health Office for each Puskesmas every year.

Process Aspects

a. An integrated antenatal care program and early detection of high-risk pregnancies Planning.

Action planning in determining the activities of the Puskesmas MCH program is based on the results of last year's coverage evaluation which is used as the basis for this year's activity planning. Determination of coverage targets based on projection data.

b. Quality service delivery

Implementation of integrated antenatal services and early detection of high-risk pregnancies, the reference used is the SOP and by far, it has been running according to the SOP. In the implementation of the service, there is a division of work teams in shortening time and avoiding queues for pregnant women.

c. Guidance to increase the coverage of service indicators

Capacity building is carried out by the Kupang City Health Office in the form of trainings every year and coaching carried out by the coordinating midwife in the form of evaluating the achievement of program indicators.

d. Supervision to assess the performance of midwives as an effort to increase coverage.

Supervision activities are carried out regularly and consistently over a period of time to assess the performance of midwives and their motivation to increase program coverage. At the basic level, this supervision was carried out by the coordinating midwives, and at the advanced level it was carried out by the Kupang City Health Office and the form of coordination varied for each Puskesmas.

Output Aspects

The expected output is the achievement of the midwives' performance results at both the UPTD Puskesmas Alak and UPTD Puskesmas Oesapa in providing 10T integrated antenatal services and early detection of high-risk pregnancies in the form of coverage of K1, K4, PK and early detection of high-risk pregnancies by health workers and by the community, which

is still lacking. There are several obstacles, such as deficiencies in recording and reporting, especially for pregnant women who are not permanently domiciled in the area that making it quite difficult to track pregnant women. The projection data provided in determining the coverage target is felt to be too high, especially for sub-districts with small areas and is exacerbated by the ratio of midwives used by the Kupang City Health Office of 1:5000 inhabitants. The uneven use of the Poedji Rochyati score instrument at supporting Puskesmas, and the difficulty to educate the public about the importance of periodic pregnancy checks for pregnant women health.

## DISCUSSION

According to the WHO, the ratio of midwives to population is 1:1000 people, and it is said to be effective if there is a midwife in comparison to 1000 residents<sup>7,8</sup>. Permenkes Number 75 Year 2014, states that the types and numbers of health and non-health personnel are calculated based on workload analysis, considering the number of services provided, the population and distribution, the characteristics of the work area, the area of the work area, the availability of other first level health service facilities in the work area and the division of labor time<sup>9</sup>. Provision and delivery of health services requires adequate resource support to fulfill services properly<sup>10</sup>. Human resources are the most important element in achieving goals where the use of other resources depends on how to exploration of human resources<sup>11</sup>. In line with Wulandari (2017), the study found that factors related to the coverage of antenatal services by midwives are; lacking of the number of human resources, lack of funds, and lack of infrastructure<sup>12</sup>.

Workload is the amount of work that must be carried by a person and is the product of work volume and normal time, the distribution of workload that is appropriate and according to one's abilities is very important to note because it can affect performance and program achievement<sup>13</sup>. Research by Nisa, *et al.*, (2019) shows a relationship between workload and performance of midwives in antenatal care<sup>14</sup>. In improving the quality of midwife services and advancing the competence of midwives, it is necessary to have training that is useful to increase knowledge, competence, self-confidence, and quality of care for pregnant women so as to minimize high-risk pregnancies<sup>15</sup>. Research by Lumbanraja, *et al.*, (2016) found that there was a relationship between education and training for midwives on the quality of IEC in antenatal care<sup>16</sup>.

Infrastructure is the main problem in supporting integrated antenatal services as an effort to detect early high-risk pregnancies<sup>17</sup>. According to WHO (2016), health center facilities must be able to accommodate a large number of pregnant women. Adequate facilities are needed to support the services provided, including access to a large room with a good ventilation system, a good room with adequate seating and beds and a private room available for the process of examination and personal consultation for pregnant women<sup>18</sup>.

Funding is the most important element in supporting the sustainability of an activity to achieve goals. If funds are lacking, staff work motivation will decrease, ultimately affecting staff performance so that program targets and objectives will not be achieved<sup>14</sup>.

Policies and SOP for integrated antenatal services and early detection of high-risk pregnancies have been implemented because they become a reference for midwives in providing comprehensive services according to mandatory standards as well as a legal basis in case of service irregularities<sup>19</sup>.

Program action planning plays a vital role because in planning it is necessary to consider various aspects that affect the implementation process of antenatal care and early detection of high-risk pregnancies. The process of integrating program activities is well

structured and formulates complete activities, then the intervention activities are in accordance with the data and problems that are actually<sup>20</sup>.

The implementation of integrated antenatal services has a crucial role as an effort to prevent, monitor, early detection and treat maternal health problems, increase maternal satisfaction, and utilize health services as well as early identification of risk factors, regular ANC and appropriate therapy is the right way to prevent maternal and child deaths<sup>21,22</sup>. The competence and experience of midwives using the Poedji Rochyati score instrument is very helpful in conducting initial screening of any pregnant women with high risk factors for pregnancy<sup>23</sup>.

Coaching raises the motivation of officers in implementing the program to be optimal with the aim of stimulating, supporting, and encouraging one's abilities so that there is a desire to work together optimally in achieving goals<sup>10</sup>. In producing employees with an effective and competitive quality, must be carried out systematically according to institutional interests<sup>11</sup>.

Supervision is carried out regularly and consistently for every 3 months based on reports that are received from each Pustu and other health service centers with aiming to ensure the implementation of planning and activities is effective and efficient<sup>24</sup>. A study by Aminah (2018) shows that the supervision of the coordinating midwife and work motivation has a positive influence and impact on the quality standards of ANC services by midwives<sup>25</sup>.

The referred output on this research is a follow-up to the output in the form of the end result of quality, effective program activities and in the form of indicators of success<sup>26</sup>. The higher the coverage achievement, the better the performance someone will do<sup>27</sup>.

## CONCLUSION

The performance of midwives in integrated antenatal services in early detection of high-risk pregnancies is still lacking, influenced by the additional workload of midwives, the lack of participation of midwives in training, lack of examination room infrastructure and supervision that has not focused on early detection of high-risk pregnancies. It is recommended for the Kupang City Health Office to develop efforts to increase the competence of midwives through focused training for all midwives at the Puskesmas simultaneously and continuously, accommodate the needs of health human resources for midwives and management personnel at the Puskesmas, provide a complete infrastructure, especially the addition of building infrastructure proposed in the Puskesmas Budget Planning, optimization the function of mentoring, guidance and supervision in supporting the achievement of coverage of Maternal and Child Health programs.

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