

Midwifery Care for Newborn Babies with Low Birth Weight (BBLR) at the Mawasangka Health Center, Central Buton Regency.

Ninda Armita Sari¹, Dahniar Dahlan², Sudirman Pabokori³
^{1,2,3}Baubau Polytechnic, Indonesia

ARTICLE INFORMATION

Received: 5 December 2025
 Revised : 7 January 2026
 Accepted: 2 February 2026
 DOI:

KEYWORDS

Baby, BCB, BBLR, Kangaroo Method

Baby, FTI, LBW, Kangaroo Method,

CORRESPONDING AUTHOR

Name : Dahniar Dahlan

Address : Jalan Latsitarda, RT 004, RW 004,
 Kel.Tanganapada, Kec.Murhum,
 Kota Baubau

Email : dahniardahlan11@gmail.com

A B S T R A C T

Background: Babies born with Low Birth Weight (BBLR), i.e. weighing less than 2,500 grams, are at high risk of health complications that require intensive medical attention. **Objective:** This study aims to explore obstetric care provided to newborns with 2-day-old BBLR at Mawasangka Health Center, Central Buton Regency. The approach used includes the 7 Varney steps and documentation using the SOAP method to ensure systematic, effective, and optimal obstetric care. **Method** A case study report using Varney's 7-step obstetric approach and SOAP documentation method. **The implementation** of midwifery care includes explaining the baby's condition to the mother and family, observation of vital signs (TTV), as well as actions such as: exclusive breastfeeding, maintaining the baby's body temperature with the kangaroo method, covering the baby with clean clothes, maintaining the cleanliness of the umbilical cord, and documenting all actions taken. **Evaluation:** The evaluation shows that the mother and the family understand the instructions given. The baby's vital signs show normal results, the mother is willing to give exclusive breastfeeding, as well as perform the kangaroo method. The baby's weight increased from 2,350 grams to better after treatment. All actions have been fully documented. **Conclusion:** the obstetric care given to Baby Mrs. "I" at the age of 2 days with Low Birth Weight was carried out in accordance with the standards of obstetric services, which resulted in a positive weight gain.

Background, Infants with Low Birth Weight (LBW) is a condition of newborns with a baby weighing below 2,500. **The purpose** of this study was to provide midwifery care for Newborns with Low Birth Weight at 2 days of age at the Mawasangka Health Center, Central Buton Regency using the 7 steps of Varney and SOAP documentation. **Methods** Case study report using Varney's 7-step midwifery approach and SOAP documentation method. **Implementation** Midwifery care included explaining the baby's condition to the mother and family, monitoring vital signs (TTV), and taking actions such as: encouraging exclusive breastfeeding, maintaining body temperature through the kangaroo method, covering the baby with clean clothes, maintaining umbilical cord hygiene, and documenting all actions taken. **Evaluation** Evaluation showed that the mother and family understood the instructions. The baby's vital signs were within the normal range., the mother was willing to provide exclusive breastfeeding, and the kangaroo method was implemented. The baby's weight increased from 2,350 grams, and all actions were properly documented. **Conclusion** the midwifery care provided to Baby Mrs. "I" at 2 days of age with Low Birth Weight was conducted in accordance with established midwifery standards, resulting in positive weight gain.

INTRODUCTION

Newborns refer to babies who have just been born, either through normal labor or other methods, with a body weight in the normal range between 2,500 to 4,000 grams. In this early stage of life, babies undergo a number of physiological changes that are essential for adjusting to the environment outside the womb. Proper care is essential to support health and ensure optimal baby development (Sigh) *et al.*, 2022). Marmi and Raharjo (2015) explains that newborns, also known as neonates, are babies who have undergone the birth process, either with the help of tools or without tools, and are generally between 0 and 28 days old. During this period, the baby needs a physiological adaptation process that includes maturation of the body's organs and adjustments to be able to function properly outside the womb. This process is crucial for babies to live a healthy and optimal life (Suherlin) *et al.*, 2024). After birth, babies

must make adjustments from living conditions in the womb to life outside the womb, and good tolerance is needed for them to develop properly (Raskita & Ristica, 2022).

Babies with BBLR who weigh less than 2,500 grams have a higher risk of death, which is up to eight times greater than babies born with normal weight (Isnaini *et al.*, 2021). This problem is becoming a serious global health issue, with significant long-term impacts on the physical and mental development of babies. Factors that affect the incidence of BBLR include the quality of nutrients obtained during pregnancy, access to adequate health services, infections that occur during pregnancy, and genetic factors that affect fetal growth. Although the prevalence of infants with BBLR continues to increase, this condition remains a major challenge for the global health system. Babies with BBLR have a higher risk of developing growth and developmental disorders, including potential for suboptimal height problems in the future if they don't get adequate care (Gemilastari *et al.*, 2024). In addition, premature infants with BBLR have a much greater risk of death, which demands serious attention and treatment (Nopitasari *et al.*, 2023).

According to the World Health Organization (WHO), about 15 to 20 percent of births worldwide are babies with BBLR, which translates to more than 20 million births each year. More cases of BBLR are found in developing countries than in developed countries, although data on prevalence are often incomplete, especially since many births occur at home, so BBLR cases are not well recorded. This causes the official numbers recorded to not reflect the actual events. BBLR conditions can have long-term impacts, including an increased risk of coronary heart disease, diabetes, metabolic disorders, and immune system disorders. In addition, babies with BBLR also tend to have lower physical endurance, which can ultimately negatively impact the economic resilience of the family. Data from WHO shows that the prevalence of BBLR in developing countries reaches around 95%, with the largest distribution occurring in East Asia and the Pacific (6%), Sub-Saharan Africa (13%), and South Asia (28%). In Indonesia, in 2020, the number of deaths due to BBLR reached 22,362, which contributed around 1.32 percent of all deaths in the country. This puts Indonesia in 76th place out of 183 countries in the list of the top 50 causes of death related to BBLR.

Indonesia, as a developing country, still faces major challenges in dealing with cases of Low Birth Weight Babies (BBLR), which is largely due to a lack of education and education for pregnant women (Gemilastari *et al.*, 2024). In the Southeast Asian region, Indonesia still records a high BBLR rate. This figure shows a decrease compared to the previous year, which recorded 129,815 babies with BBLR. It is estimated that every year around 350,000 babies are born with BBLR in Indonesia.

The increase in the number of babies with low birth weight is strongly associated with maternal health conditions. In Indonesia, about 30 million women of childbearing age suffer from chronic energy deficiency, and about 50% of pregnant women suffer from anemia due to malnutrition. Based on data reported by the Directorate General of Family Health in 2020, there were 28,158 deaths of toddlers, with 72% (20,266 deaths) occurring during the neonatal period, which is between the ages of 0 and 28 days. This neonatal mortality rate shows how important it is to treat newborns, especially those with BBLR (Laughter *et al.*, 2023).

Data from the Central Statistics Agency of Southeast Sulawesi Province in 2023 shows that in this province there were 1,272 cases of BBLR out of a total of 36,743 births, which means that around 3.46% of babies born in the region experienced BBLR. Some districts, such as Kolaka (3.97%) and North Buton (3.70%), showed a higher percentage of BBLR compared to the provincial average. This shows significant challenges in the maternal and child health sector, as well as the urgent need to improve prenatal health services and nutritional fulfillment during pregnancy in order to reduce the incidence of BBLR in the future (Central Statistics Agency, 2023 Southeast Sulawesi Province).

In Central Buton Regency, in 2020 there were 73 cases of BBLR (3.40%) from 2,146 babies born, which increased in 2021 to 131 cases (5.61%) from 2,333 births (Ningtyas *et al.*, 2024). Based on data published by the Central Statistics Agency of Southeast Sulawesi Province in 2023, Central Buton recorded 84 cases of BBLR from 36,743 births, which is equivalent to 1.74%. This percentage is higher than the provincial average of only 3.27%. This figure shows the need to improve the quality of health services for pregnant women, especially in terms of pregnancy monitoring and nutritional fulfillment during pregnancy to reduce the rate of BBLR in the future (Central Statistics Agency, 2023 Southeast Sulawesi Province).

Data from the Health Profile of Central Buton Regency in 2023 noted that the Mawasangka Health Center reported a number of BBLR cases. Although exact figures are not recorded, the high prevalence of BBLR in this area indicates the need for special attention to the health of pregnant women and newborns. Therefore, improving the quality of antenatal care services, education about maternal

nutritional status, monitoring gestational age, and the use of prenatal health services at the Mawasangka Health Center are very crucial to reduce the incidence of BBLR in the future (Central Statistics Agency, 2023 Southeast Sulawesi Province Central Buton Regency).

Seeing the high incidence of BBLR and its significant impact on the health and survival of infants, planned and comprehensive handling efforts are very important, especially in areas with high prevalence rates such as Central Buton Regency. The Mawasangka Health Center, as one of the main health facilities in this region, has a strategic role in providing maternal and infant health services, ranging from pregnancy monitoring to newborn care.

The case study on baby Ny'i at the Mawasangka Health Center is expected to provide a clear picture of the implementation of obstetric care for newborns with BBLR, as well as identify risk factors, challenges, and intervention steps that can be applied. The results of this study are expected to not only be evaluation materials for local health workers, but also contribute to the formulation of strategies to improve the quality of midwifery services, so as to be able to reduce the incidence and risk of infant mortality with BBLR in the future

METHOD

This study uses a descriptive observational approach, with the aim of assessing the application of midwifery care management in neonates born with Low Birth Weight (BBLR) at the Mawasangka Health Center. This method was chosen because it allows to describe in detail the process of obstetric care given to neonates with BBLR conditions, based on the data obtained during the implementation of the study. The midwifery care applied in this study follows Varney's seven-step approach, which includes: subjective and objective assessment, identification of actual and potential problems, identification of urgent needs, intervention planning, implementation of care, and final evaluation of the success of the actions carried out on the infant of Mrs. I at the Mawasangka Health Center.

RESULTS AND DISCUSSION

Subjective Data (S)

The results of the interview with Ny'I's baby revealed that this pregnancy was the third pregnancy, and the mother had no history of miscarriage or pregnancy complications in previous pregnancies. The mother gave birth to the baby on February 1, 2025, with the normal method of delivery at 37 weeks and 1 day of gestation, according to the HPL estimate which falls on February 24, 2025. The mother was happy with the birth of her baby, although she complained of a decrease in appetite and fatigue that was quite noticeable in the third trimester. This decrease in appetite has the potential to be a nutritional problem that can affect fetal development, especially the baby's weight at birth. Although the mother did not report any other medical complaints such as hypertension or gestational diabetes, which indicates the mother's medical condition was relatively stable during pregnancy

Objective Data (O)

Baby Ny'I was born with a body weight of 2,350 grams, a body length of 46 cm, a head circumference of 30 cm, and a chest circumference of 29 cm. The baby's weight is classified as BBLR, even though the mother's gestational age is full-term. The baby's vital signs examination showed a body temperature of 36.0°C, a breathing rate of 40x/minute, and a heart rate of 145x/min, all of which were within the normal range. Further physical examination shows that the baby does not have abnormalities in the body system, such as caput succedaneum, abnormalities in the eyes, or breathing problems. The baby's skin looks clean, the face is symmetrical without bumps or edema, and the sucking and swallowing reflexes are good. Examination of the baby's extremities also showed good symmetry, in the absence of fractures. Overall, the baby is in a stable and healthy condition, which suggests that the care the baby receives early on helps reduce the risk of further complications.

Analysis

Baby Ny'I was diagnosed with BBLR, which means the baby has a birth weight of less than 2,500 grams even though the gestational age is full-term. In Ny'I's baby, no signs of complications such as hypothermia or respiratory distress were found, which suggests that with proper treatment, babies with BBLR can still have a good prognosis. The success of the management applied to Ny'I's baby shows that even though the baby's weight is low, with proper monitoring and appropriate management, the baby can grow well and avoid more serious complications.

Penatalaksanaan

The management carried out on Ny'I's baby follows the guidelines that apply to babies with BBLR. Mothers were educated on the importance of maintaining the baby's body temperature with the kangaroo method, which has been shown to be effective in reducing the risk of hypothermia in babies with BBLR (Mumtihan *et al.*, 2023). In addition, mothers are also given information about the importance of exclusive breastfeeding to support the baby's growth. Breastfeeding has been proven to be a major factor in increasing the baby's weight and strengthening the newborn's immune system (Mumtihan *et al.*, 2023). Monitoring of the baby's weight was carried out regularly, and the results showed a significant increase, from 2,350 grams to 2,700 grams at the second visit, which indicates the success of the treatment applied. This confirms that the approach used in the care of babies is in accordance with existing guidelines and gives positive results.

DISCUSSION

Subjective Data (S)

Mrs. Ny'I gave birth to a baby weighing 2,350 grams, which is classified as BBLR even though the gestational age is at full moon (37 weeks and 1 day). The decrease in appetite experienced by the mother in the third trimester can affect the nutritional status of the mother, which in turn has the potential to affect the baby's weight at birth. A decrease in maternal nutritional intake during pregnancy is an important concern, as it can cause babies to be born with low body weight, as happened to Ny'I's baby.

Some previous studies have shown that decreased appetite in pregnant women, especially in the third trimester, is often associated with nutritional deficits that interfere with fetal development. Mumtihan *et al.*, (2023) revealed that mothers who experience reduced nutritional intake have a higher risk of giving birth to babies with BBLR, which can contribute to long-term health complications in babies. Insufficient nutrition can interfere with fetal development, especially in terms of weight, which impacts the health and growth of the baby after birth.

Although Ny'I's mother did not report more serious medical complaints, such as hypertension or gestational diabetes, which indicated that the mother's medical condition was relatively stable, a decrease in nutritional intake remained a risk factor that should be further considered. This is important for the prevention of more serious BBLR, which can lead to future growth and development problems for babies.

Objective Data (O)

Ny'I's baby was born weighing 2,350 grams, which is in the BBLR category, even though the mother's gestational age is full-term. Physical examination and vital signs of the baby show normal results, without any abnormalities in the baby's body system. The baby's skin looks clean, the face is symmetrical, and the sucking and swallowing reflexes are good. Examination of the extremities shows good symmetry, in the absence of fractures or other problems. All physical examinations show that even though the baby is born with a low body weight, the baby is in a stable and healthy condition.

Research by Ismayanah *et al.* (2020) emphasizes that babies with BBLR, despite being at risk of developing health problems such as hypothermia and nutritional disorders, can survive and develop well provided they receive proper care, especially in terms of vital signs monitoring and exclusive breastfeeding. BBLR is often associated with disruptions in the baby's body temperature regulation, which can be dangerous if not handled properly. However, Ny'I's baby showed good stability at body temperature and other vital signs, which indicates that the management carried out was in accordance with the guidelines and successfully reduced the risk of further complications.

Research Suindri *et al.* (2021) explains that babies with BBLR who receive adequate medical attention, including intensive monitoring and exclusive breastfeeding, have a great chance of developing healthily. This is consistent with the condition of Ny'I's baby, who despite being born with a low body weight, shows stable growth after receiving appropriate care

Analysis

Baby Ny'I was diagnosed with BBLR, which means the baby has a birth weight of less than 2,500 grams even though the gestational age is full-term. BBLR is often associated with a variety of health complications in infants, such as hypothermia, growth disorders, and nutritional problems, if not managed properly. However, in Ny'I's baby, no signs of complications such as hypothermia or respiratory distress were found, suggesting that with proper care, babies with BBLR can have a good prognosis.

Exclusive breastfeeding and the application of the kangaroo method are the two main interventions applied to Ny'I's babies. According to Mumtiahani *et al.*, (2023) explain The application of the kangaroo method can reduce the risk of hypothermia in infants with BBLR, which is highly dependent on external body temperature regulation. In Ny'I's baby, the application of the kangaroo method went well, and the baby showed no signs of hypothermia, which indicates the success of this management step.

Penatalaksanaan

The management given to Ny'i'i infants includes several important interventions that have been shown to be effective in supporting the development of babies with BBLR as well as preventing further complications. Exclusive breastfeeding is a crucial key intervention because breast milk contains all the nutrients the baby needs to support its optimal growth. As evidence, research conducted by Ismayanah *et al.* (2020) shows that exclusive breastfeeding in babies with BBLR accelerates weight gain as well as boosting the baby's immune system, which is very important for the health of newborns. In Ny'i's case, breastfeeding was routinely carried out once every hour and showed positive results, with the baby's weight increasing from 2,350 grams to 2,700 grams within just ten days of birth.

In addition to breastfeeding, the application of the kangaroo method is also an important step in managing babies with BBLR, especially to keep the baby's body temperature stable. Babies with BBLR are particularly susceptible to hypothermia, due to limited body fat reserves, which make it difficult to regulate the baby's body temperature independently. The application of the kangaroo method, which involves skin-to-skin contact between mother and baby, has been shown to be effective in keeping the baby's body temperature within normal limits. Mumtiahani *et al.*, (2023) states that the use of the kangaroo method in infants with BBLR can significantly reduce the risk of hypothermia. In Ny'i's case, this method was well applied, and the baby did not show signs of hypothermia, which indicates that the treatment given went according to the guidelines.

Monitoring of the baby's weight was carried out regularly, and the results showed a significant increase, from 2,350 grams to 2,700 grams at the second visit. This weight gain illustrates the success of the treatment the baby receives. In addition, collaboration with nutrition officers also ensures that mothers get adequate nutritional intake, which not only supports the baby's health but also prevents complications in the mother. Based on proper management, babies with BBLR like Ny'i show good development and avoid further health problems. This is in line with the findings Suindri *et al.* (2021) which states that babies with BBLR who receive good care have a greater chance of developing healthily and without significant complications.

COVER

Based on the implementation of obstetric care for newborns with Low Birth Weight (BBLR), the care provided has been implemented effectively. A study of Baby Ny'I's case showed that the baby weighed 2,350 grams, which was included in the BBLR category. Despite the potential for hypothermia, these babies do not require immediate action or further collaboration, as the condition can be managed with appropriate care.

Interventions included the kangaroo method and exclusive breastfeeding once every hour. The implementation of all planned midwifery measures went well and did not encounter obstacles. Evaluations carried out after ten days of treatment showed positive results, with the baby's weight increased to 2,700 grams and the baby's condition within normal limits. The baby's vital signs are also stable, with a heart rate of 140x/minute, a breathing rate of 45x/minute, and a body temperature of 37.0°C. All findings and actions taken during the treatment period are recorded completely according to obstetric standards.

These results indicate that management carried out in accordance with existing obstetric guidelines, gives good results and can prevent further complications. Significant weight gain indicates the success of the intervention given. Therefore, it is important for the Mawasangka Health Center to continue to improve obstetric services and routine monitoring for pregnant women and newborns to reduce the rate of BBLR and related complications in the future.

THANKS

I would like to express my deep gratitude to supervisor I, Bdn. Dahniar Dahlan, S.ST., M.Keb, and supervisor II, Mr. Sudirman P, S.KM., M.Si, for the guidance, support, and direction that has been

given during the process of preparing this final project. Their help and guidance was invaluable, allowing me to complete this task well.

I am so grateful to both of my parents, who have always provided me with invaluable affection, support, and prayers throughout my life. May health and happiness always accompany them.

Not to forget, I would like to thank all my family, friends, and all parties who have provided moral and material assistance and support, which is very meaningful in completing my education at Baubau Polytechnic.

BIBLIOGRAPHY

- Dahlan, D., & Sudirman, P. (2024). Midwifery Care For Newborns In Baby" R" With Low Birth Weight (Lbw). *International Journal of Multidisciplinary Learners*, 1(2), 16-22.
- Gemilastari, R., Zeffira, L., Malik, R., & Septiana, V. (2024). Characteristics of Babies with Low Birth Weight (BBLR). *Scientific Journal*, 3, 16–26. <https://doi.org/10.56260/sciena.v3i1.125>
- Herawati, I., & Anggraini, N. (2020). The effect of kangaroo method treatment on weight gain in low-birth weight babies. *Journal of Obstetrics and Traditional Health*, 5(1), 23–28.
- Ismayanah, I., Nurfaizah, N., & Syatirah, S. (2020). Management of Midwifery Care for Newborn Babies with Low Birth Weight (Bblr) at Syekh Yusuf Hospital, Gowa Regency on July 23-July 25, 2019. *Journal of Midwifery*, 2(2).
- Isnaini, Y. S., Ida, S., & Pihahay, P. (2021). Factors related to the incidence of low birth weight. *Nursing Arts*, 15(2).
- Khozaimah, P. I., Munir, Z., & Tauriana, S. (2024). Application of Kangaroo Mother Care (KMC) Method Therapy in Baby V with BBLR Cases in Hypothermia Diagnosis in the Infant Emergency Room of Sidoarjo Hospital. *TRILOGY: Journal of Technology, Health, and Humanities*, 5(1), 56–65.
- Kumalasari, I., Tjekyan, R. M. S., & Zulkarnain, M. (2018). Risk Factors and Incidence of Low Birth Weight (BBLT) at Dr. Mohammad Hoesin Hospital Palembang in 2014. *Journal of Public Health Sciences*, 9(1), 41–52.
- Mumtihan, N. F., Thamrin, H., & Sharief, S. A. (2023). Normal Newborn Obstetric Care for Mrs. N. Babies. *Window of Midwifery Journal*, 53–59.
- Nasution, N., Endriyani, A., Wulandari, D. T., Mukhoiratin, M., Aswan, Y., Rangkuti, N. A., Nasution, E. M., Argaheni, N. B., Dahlan, D., & Maharani, O. (2023). *Midwifery Care for Infants, Toddlers, and Children*. Our Writing Foundation.
- Ningtyas, R. A., Ampa, A. T., Ihwal, M., Salam, A., & Afiani, N. (2024). A Low Birth Weight (LBW) In Central Buton Regency Models Using Logistics Regrecion: Low birth weight (bblr) modeling in Central Buton Regency uses logistics regression. *Diophantine Journal of Mathematics and Its Applications*, 71–80.
- Nopitasari, N., Lestari, I., & Nurvinanda, R. (2023). The Effect of Education on the Implementation of Kangaroo Method Care on the Knowledge Level of BBLR Baby Mothers. *Journal of Professional Nurse Research*, 5(4), 1695–1702.
- Novidha, B. D. H., Manik, R., Keb, M., Wijayanti, I. T., Christiana, I., & Rahmawati, D. (2023). *Textbook for Midwifery and Physiological and Pathological BBL SI Midwifery*. Masterpiece Citra Utama Group.
- Nurhaini, N., & Sutarmo, M. (2025). The Effect of Early Breastfeeding Initiation on the Prevention of Hypothermia, Newborns in Sectio Caesarea Delivery at Permata Bekasi Hospital. *MAHESA: Malahayati Health Student Journal*, 5(3), 1299–1307.
- Podungge, Y. (2020). Asuhan Kebidanan Komprehensif. *Jambura Health and Sport Journal*, 2(2), 68–77.
- Putri, Y., Yulianti, S., Hilinti, Y., Umami, D. A., Rossita, T., Sulastri, M., Sari, L. Y., Situmorang, R. B., & Nurjanah, N. A. L. (2022). *Textbooks on the physiology of pregnancy, childbirth, postpartum and newborns*. NEM Publishers.
- Raskita, R. Y., & Ristica, O. D. (2022). Midwifery Care for Newborns with Neonatal-III Visits at the Pratama Arrabih Clinic, Pekanbaru City 2022. *Current Midwifery Journal*, 2(2), 280–287.
- Ratnasari, R., Fitriani, I. S., & Arianti, A. (2022). Implementation of home care for newborns aged 0-28 days after the COVID-19 pandemic. *Journal of Midwifery*, 12(2), 175–185.
- Rivanica, R., & Oxyandi, M. (2024). *Textbook for Early Detection of Growth and Development and Newborn Examination 2nd Edition*. Salemba Publishers.
- Sartima, S., Andriyani, A., & Jingsung, J. (2023). The effect of gravity on the incidence of low birth

- weight at the Kendari City Regional General Hospital. *Journal of Health Sciences*, 3(3), 50–58.
- Seri Wahyuni, S. S. T. M. K. (2022). *Obstetrics and Physiology*. Wineka Media.
- Siantar, R. L., Rostianingsih, D., Ismiati, T., & Bunga, R. (2022). *Textbook for maternal and neonatal emergency midwifery care*. Rena Cipta Mandiri.
- Simon, L. V, Hashmi, M. F., & Bragg, B. N. (2017). *APGAR score*.
- Suherlin, I., Yulianingsih, E., & Porouw, H. S. (2024). *Textbook for Neonatal, Infant and Toddler Care*. Deepublish.
- Suindri, S., & Mulyati, M. (2021). Management of Newborns with Low Birth Weight (BBLR) at Puskesmas. *Journal of Public Health*, 8(1), 67-74.
- Suradi, R., & Yanuarso, P. B. (2022). The Kangaroo method as a substitute for incubators for low-birth weight babies. *Pediatrics*, 2(1), 29–35.
- Suryaningsih, Ss., Keb, M., Wulan, R., Yulianti, N. T., SiT, S., Keb, M., & Hayati, B. E. (2022). *Newborn Infant Textbook DIII Midwifery Volume I*. Masterpiece Citra Utama Group.
- Heroes1, M. D. (2019). *Risk Factors for Low Birth Weight Babies at PKU Muhammadiyah Hospital Yogyakarta*.
- Yulianti, M., & Hasanah, P. N. (2024). *Basic Concepts and Nursing Care of Low Birth Weight Babies*. NEM Publishers.