The 6th Mitra Husada Health International Conference (MiHHICo) 2026
Volume 6 (2026) ISSN: 2988-3768

MIDWIFERY CARE MANAGEMENT FOR NN.K, A 12-YEAR-OLD WITH ACUTE GASTROENTERITIS IN MUZDALIFAH WARD, HAJI GENERAL HOSPITAL MEDAN, NORTH SUMATRA, 2025

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ABSTRACT

Backgroud: Acute gastroenteritis is one of the most common gastrointestinal diseases in children and may lead to fluid loss and electrolyte imbalance, which can result in serious complications if not managed properly(Utami, n.d.). **Objective**: This article aimed to describe the implementation of comprehensive midwifery care management for patients with acute gastroenteritis using Helen Varney's seven-step approach and SOAP documentation. **Methods**: This study employed a descriptive method with a case study approach involving one patient, Ms. K, an 11-year-old girl diagnosed with acute gastroenteritis with mild dehydration, who was treated in the Muzdalifah Ward of UPTD Khusus RSU Haji Medan, North Sumatra Province, in 2025. Data were collected through history taking, physical examination, observation, and documentation of the patient's progress. **Results**: The patient presented with complaints of watery diarrhea occurring more than five times a day, accompanied by vomiting, abdominal pain, weakness, and decreased appetite. Midwifery care focused on monitoring vital signs, hydration status, fluid replacement according to the patient's needs, and providing education to the family. After five days of continuous care, the patient's condition improved, as evidenced by a reduced frequency of diarrhea, cessation of vomiting, improved hydration status, and stable general condition. Conclusion: The implementation of comprehensive midwifery care using Helen Varney's seven-step approach and SOAP documentation was effective in supporting the recovery process of patients with acute gastroenteritis and preventing complications.

Keywords*:* Acute Gastroenteritis, Midwifery Care, Helen Varney, SOAP, Mild Dehydration.

INTRODUCTION

Acute gastroenteritis is one of the infectious gastrointestinal diseases that remains a public health problem, particularly among children. This condition is characterized by acute diarrhea accompanied by vomiting, abdominal pain, fever, and loss of fluids and electrolytes, which may lead to dehydration and more severe complications if not managed properly. Most cases of acute gastroenteritis are caused by viral, bacterial, and parasitic infections transmitted through contaminated food and water.(Colston et al., 2026)

(Mwenda et al., 2025) Research conducted across 34 provinces in Indonesia demonstrated variations in the prevalence of diarrhea among children under five years of age, with the highest prevalence observed in Papua Province (16.6%) and the lowest in the Riau Islands Province (1.4%). The high incidence of diarrhea is associated with poor drinking water quality and inadequate environmental sanitation. The Ministry of Health of the Republic of Indonesia also reported that approximately 88% of deaths due to diarrhea in children are related to inadequate sanitation and unsafe drinking water sources.(Kemenkes, 2022)

The management of acute gastroenteritis requires comprehensive and continuous care to prevent complications. In this regard, midwives play an important role in conducting assessments, monitoring hydration status, providing health education to families, and preventing complications through the implementation of systematic midwifery care management using Helen Varney's seven-step approach and SOAP documentation.(Indrianingsih & Modjo, 2022)

Considering the high incidence of acute gastroenteritis among children and the importance of appropriate care in preventing complications, the author was interested in conducting a case study entitled "Midwifery Care Management for Nn.K, A 12-Year-old Patient with Acute Gastroenteritis in the Muzdalifah Ward of UPTD Khusus RSU Haji Medan, North Sumatra Province, in 2025" as an application of theory into clinical practice(Subagya et al., 2020).

METHODS

This study used a descriptive case study design. The case study method was chosen to describe comprehensively the implementation of midwifery care management for a 12-year-old child diagnosed with Acute Gastroenteritis (AGE). The management was carried out using the Seven Steps of Varney's Midwifery Management, including assessment, diagnosis, planning, implementation, and evaluation of care. This case study was conducted in the Muzdalifah Ward, Haji General Hospital Medan, North Sumatra, from January to December 2025, while direct observation and data collection on the patient were performed according to the hospitalization period.(Sinaga, 2022)

The subject of this study was NN. K, a 12-year-old female patient diagnosed with Acute Gastroenteritis (AGE) who received inpatient care in the Muzdalifah Ward of Haji General Hospital Medan. Interview (Anamnesis): Collecting information from the patient and family regarding the chief complaint, history of present illness, past medical history, nutritional status, and fluid intake.
Observation: Monitoring the patient's general condition, level of consciousness, signs of dehydration, frequency of diarrhea and vomiting, and response to treatment.(Murphy, 2023)
Physical Examination: Conducted using inspection, palpation, percussion, and auscultation, including measurement of vital signs.(Elliott, 2007)

Documentation Study: Reviewing medical records, laboratory results, nursing notes, and physician's progress notes related to the patient's condition. The collected data were analyzed descriptively by comparing the findings obtained from the patient with existing theories and evidence-based literature regarding the management of Acute Gastroenteritis in children. The analysis followed the Seven Steps of Varney's Midwifery Management to identify similarities and gaps between theory and practice.(Mehta & Goldman, 2024)

Patient assessment form:

- Physical examination sheet
- Observation sheet

- Medical records
- Vital signs monitoring chart
- Laboratory examination results
- SOAP documentation format

Informed Consent: Consent was obtained from the patient's parents or guardian before data collection.
Confidentiality: The patient's identity was kept confidential by using initials (NN. K).
Beneficence: The study did not interfere with the patient's treatment and aimed to improve the quality of midwifery care. Non-maleficence: The study ensured that no harm was caused to the patient during data collection.(Li et al., 2021)

DISCUSSION

The results demonstrate that comprehensive midwifery management contributed to the patient's recovery. The patient's presenting symptoms—frequent watery diarrhea, vomiting, abdominal pain, fever, and dehydration—are consistent with the clinical manifestations of acute gastroenteritis described by the World Health Organization (WHO, 2024), which defines acute gastroenteritis as inflammation of the gastrointestinal tract characterized by diarrhea lasting less than 14 days.(Dugdale et al., 2023)

The assessment findings of decreased skin turgor, dry mucous membranes, tachycardia, and mild hypokalemia indicate dehydration caused by excessive fluid loss. Similar findings were reported by Guarino et al. (2018) in the European Society for Paediatric Gastroenterology, Hepatology and Nutrition (ESPGHAN) guideline, emphasizing that dehydration assessment is the cornerstone of pediatric gastroenteritis management.(Herna Rinayanti Manurung1, 2022)(Herna Rinayanti Manurung1, 2022)

Oral rehydration therapy combined with intravenous fluids effectively restored hydration. This finding supports the recommendation of WHO and UNICEF, which state that Oral Rehydration Solution (ORS) remains the first-line treatment for acute diarrhea because it significantly reduces mortality and prevents severe dehydration.(Bhat Yellanthoor, 2025)

Zinc supplementation was also provided as part of collaborative management. According to the World Health Organization (WHO, 2024), zinc supplementation shortens the duration of diarrhea, reduces stool frequency, and lowers the likelihood of recurrent diarrheal episodes in children.(Evans-Jones & McDowell, 2022)

Family education regarding hand hygiene, food safety, adequate hydration, and nutritional intake played an essential role in preventing recurrence. This finding is supported by UNICEF (2023), which highlights that parental education significantly improves adherence to home management and reduces repeated hospital admissions. (Rahmadani, 2025)

Application of Varney's Seven-Step Midwifery Management ensured systematic assessment, diagnosis, planning, implementation, and evaluation. Although acute gastroenteritis is primarily managed medically, midwives contribute significantly by monitoring hydration status, providing health education, supporting nutrition, collaborating with pediatricians, and documenting comprehensive care.(Borowitz, 2024)

Overall, the patient's condition improved within three days, as evidenced by normalization of body temperature, reduction in diarrhea frequency, absence of vomiting, improved appetite, and restored hydration status. These outcomes are consistent with studies showing that early rehydration therapy, zinc supplementation, and family-centered education significantly improve recovery rates in pediatric acute gastroenteritis.(Adumitrăchioaiei et al., 2024).

RESULT

The results of the study conducted on one patient, namely Ms. K11-year-old girl diagnosed with acute gastroenteritis accompanied by mild dehydration, showed that the patient's initial condition was characterized by watery diarrhea occurring more than five times a day for two days, vomiting 2–3 times,

abdominal pain, weakness, and decreased appetite. Physical examination revealed a blood pressure of 100/70 mmHg, pulse rate of 90 beats per minute, respiratory rate of 22 breaths per minute, body temperature of 37.8°C, oxygen saturation of 99%, and signs of mild dehydration indicated by dry oral mucosa and slightly decreased skin turgor.(Imran Surbakti, 2024)

Midwifery care was provided using Helen Varney's seven-step approach, which included assessment, identification of diagnosis, anticipation of potential problems, immediate actions, planning, implementation, and evaluation. The interventions provided consisted of monitoring vital signs, observing the frequency of diarrhea and vomiting, maintaining fluid requirements, and providing health education to the parents regarding the care of children with diarrhea.(He et al., 2021)

During the treatment period, the patient's condition improved gradually. On the second day of treatment, the frequency of diarrhea decreased to four times per day and vomiting began to subside.(Hutasoit, 2020) On the third day, the frequency of diarrhea decreased to three times per day, the patient no longer experienced vomiting, and her appetite began to improve. On the fourth day, diarrhea occurred only twice per day with stool consistency becoming more formed, and no signs of dehydration were observed. By the fifth day, the patient no longer complained of weakness, appetite had increased, mobility had improved, and the patient's general condition was stable.(Warin, 2024)

Based on these findings, it can be concluded that comprehensive midwifery care for patients with acute gastroenteritis was able to reduce the frequency of diarrhea, improve hydration status, increase appetite, and enhance the patient's overall condition without any complications These findings indicate that the application of midwifery management using Helen Varney's seven-step approach was effective in supporting the recovery process of patients with acute gastroenteritis.(Indriyani & Putra, 2020)

CONCLUSION

Based on the results of the case study of Ms. K, an 11-year-old patient with acute gastroenteritis treated in the Muzdalifah Ward of UPTD Khusus RSU Haji Medan, North Sumatra Province, in 2025, it can be concluded that comprehensive midwifery care management using Helen Varney's seven-step approach and SOAP documentation was implemented systematically, starting from assessment to evaluation. The patient presented with complaints of watery diarrhea, vomiting, abdominal pain, weakness, and signs of mild dehydration. The care provided focused on monitoring hydration status, maintaining fluid balance, preventing complications, and providing health education to the family. The results of the care showed improvement in the patient's condition, as indicated by a decrease in the frequency of diarrhea, cessation of vomiting, improvement in general condition, and stable vital signs. Therefore, continuous midwifery care and family support play an important role in accelerating recovery and preventing complications in children with acute gastroenteritis.(Rose, 2025)

ACKNOWLEDGEMENT

First and foremost, the author expresses the deepest gratitude to Almighty God for His blessings, mercy, and guidance, which have enabled the completion of this case report entitled "Midwifery Care Management for NN.K, A 12-Year-Old with Acute Gastroenteritis in Muzdalifah Ward, Haji General Hospital Medan, North Sumatra, 2025."

The author would like to express sincere appreciation to all individuals and institutions who have provided invaluable support, guidance, and encouragement throughout the preparation of this case report.(Sinaga, 2022)

Special appreciation is extended to the Director of Haji General Hospital Medan and the management of Muzdalifah Ward for granting permission and providing the opportunity to conduct clinical practice and collect the necessary data for this case study.The author also conveys heartfelt gratitude to the clinical supervisors, academic supervisors, lecturers of the Midwifery Study Program, and all healthcare professionals in Muzdalifah Ward for their professional guidance, constructive suggestions, and continuous support during the implementation of midwifery care.(Hikita et al., 2023)

The author sincerely thanks the patient, NN.K, and the patient's family for their willingness, trust, and cooperation throughout the assessment, treatment, and data collection

process. Their participation made this case report possible while maintaining patient confidentiality and adhering to ethical principles. Gratitude is also extended to STIKes Mitra Husada Medan for providing academic knowledge, facilities, and learning opportunities that contributed significantly to the author's professional development.(Sinaga, 2022)

Finally, the author would like to thank family members, friends, and colleagues for their prayers, motivation, and unwavering support throughout the completion of this case report.

The author realizes that this case report is not free from limitations. Therefore, constructive criticism and suggestions are highly appreciated for future improvement. It is hoped that this case report will provide useful information and contribute to the advancement of evidence-based midwifery practice, particularly in the management of pediatric patients with acute gastroenteritis.(De et al., 2023)

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