

Nursing Care for Mrs. W with Dyspepsia Diagnosis

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Abstract

Dyspepsia is a clinical condition that can cause limb pain, such as flatulence, fullness, nausea, and vomiting. Dyspepsia is one of the non-communicable diseases and not only occurs in Indonesia but also in other parts of the world. This study aims to provide an overview of the implementation of Nursing Care in patients with dyspepsia diagnoses in the Old Jimbaran Room, Sumber Kasih Hospital, Cirebon City. The method used is a case study approach. The subject in this case study was one patient with a medical diagnosis of dyspepsia in the inpatient room. The results of the study showed that the management of nursing care in patients with a medical diagnosis of dyspepsia in fulfilling basic needs with dyspeptic nursing problems carried out the intervention of deep breath relaxation techniques with a frequency of 15 times with a time of approximately 10--15 minutes, the intervention was carried out when the patient felt pain, the results of the patient's pain level were reduced from pain scale 6 (moderate) to pain scale 3 (mild). From the results of nursing care that has been made and interventions that have been carried out, it can be concluded that deep breath relaxation techniques are effective in reducing the pain scale from 6 (moderate) to a pain scale of 3 (mild). These non-pharmacological techniques can be used as a companion to pharmacological therapy.

Keywords: Dyspepsia, Deep Breath Relaxation Technique.

INTRODUCTION

Dyspepsia is a clinical condition that can result in limb pain, such as bloating, rapid satiety, nausea, and vomiting (Saito et al., 2023). Several diseases can arise as a result of eating unhealthy foods because they cause imbalances in the body. Chemicals can increase the production of stomach acid, some of which are alcohol, general painkillers, and vinegar. Spicy foods, acidic foods and drinks, can also cause disorders in the digestive system (Manik et al., 2024a).

Dyspepsia is one of the non-communicable diseases and does not only occur in Indonesia but also in other parts of the world. WHO predicts that the death rate from non-communicable diseases will increase to 73% and the morbidity rate to 60% in the world, while in SEARO (South East Asian Regional Office) countries, the mortality rate and morbidity from non-communicable diseases are predicted to increase to 50% and 42% (Asri & Lely Octaviana, 2021). Worldwide, about 15--40% of people suffer from dyspepsia. Every year, 25% of the world's population is affected by this disease. The prevalence of dyspepsia in Asia is around 8--30%, while in Indonesia, dyspepsia ranks 5th out of the 10 most common diseases in inpatients and 6th in outpatients (Pebriani et al., 2024).

Dyspepsia can be dangerous if not treated immediately, and it will lead to more

dangerous conditions such as gastric inflammation or gastritis. GERD or gastroesophageal reflux disease, is caused by weak valves in the lower esophagus, gastric infection, and can eventually become gastric cancer. In general, the level of knowledge about the prevention and treatment of dyspepsia in the community is still low, so it is easy to trigger the occurrence of the disease (Permana & Nugraha, 2020).

Previous research has explored the role of nurses in managing dyspepsia patients, particularly focusing on non-pharmacological interventions. Manik et al. (2024b) highlighted the effectiveness of deep breath relaxation techniques in managing abdominal pain, a common symptom of dyspepsia. Another study by Muti (2019) emphasized the importance of educating patients about the causes of indigestion and dyspepsia, as well as identifying foods that can exacerbate these conditions. Muti's research also discussed the role of nurses in guiding patients to avoid certain consumables, such as alcohol and coffee, which can trigger stress symptoms and worsen dyspepsia.

While previous studies have primarily focused on individual aspects of non-pharmacological management and patient education, this research aims to provide a comprehensive approach by integrating these elements into a cohesive nursing intervention strategy. This study not only reinforces the importance of deep breath relaxation techniques and dietary education but also examines their combined effect on patient outcomes. By offering a more holistic view of nursing practices in dyspepsia management, this research fills a gap in the existing literature and provides a novel framework for enhancing patient care.

Based on the above background, the incidence rate of dyspepsia patients is still high because the level of knowledge about the prevention and treatment of dyspepsia disease in the community is still low, so dyspepsia cases require handling and supervision from health workers. Based on this data, the author is interested in conducting a case study on nursing care for patients who experience dyspepsia cases in the Jimbaran Lama room at Sumber Kasih Hospital, Cirebon City. This can be used to educate people about actions to prevent and handle dyspepsia cases.

The purpose of this study is to provide an overview of the implementation of nursing care in patients with dyspepsia diagnosed in the Jimbaran Lama room at Sumber Kasih Hospital, Cirebon City.

RESEARCH METHODS

The study employs a case study approach to analyze the effects of non-pharmacological interventions on dyspepsia patients. The subject of this case study is a single patient diagnosed with dyspepsia who was admitted to the inpatient room at Sumber Kasih Hospital, Cirebon City. The intervention procedure involves the administration of non-pharmacological deep breathing techniques aimed at alleviating acute pain associated with dyspepsia. Specifically, deep breathing relaxation techniques are implemented with a frequency of 15 sessions, each lasting approximately 10--15 minutes. The intervention is repeated as needed based on the patient's pain levels. Data analysis focuses on evaluating changes in pain levels before and after the intervention, assessing the effectiveness of the deep breathing technique in managing acute dyspepsia-related pain.

RESULTS AND DISCUSSION

Assessment

Dyspepsia can be classified into two, namely organic (structural) dyspepsia and functional (non-organic) dyspepsia. In organic dyspepsia, symptoms in the form of organic disorders will be found that are the causative factors (Thapar et al., 2020). Organic dyspepsia has abnormalities in the organs of the body, for example, ulcers (peptic ulcers),

gastritis, stomach cancer, gastroesophageal reflux disease (GERD), and hyperacidity. Functional or non-organic dyspepsia: in this dyspepsia, there are no abnormalities or abnormalities in physical examination and also endoscopy; other symptoms are in the form of chronic or recurrent pain or discomfort in the upper abdomen (Budiman et al., 2021).

Some of the risk factors that play a role in dyspepsia are fast food, burnt foods, spicy, fatty foods, coffee and tea, and lifestyle such as alcohol, smoking, lack of exercise, NSAID/aspirin drugs, etc.) are believed to contribute to dyspepsia. Cigarettes can reduce the protective effect on the gastric mucosa, while anti-inflammatory drugs and alcohol play a role in increasing acid production in the stomach (Talley, 2017). Typically, dyspepsia sufferers experience symptoms of the upper gastrointestinal tract, which include pain or discomfort in the gastro-duodenum area (epigastrium), fullness, burning, nausea or vomiting, and a feeling of fullness quickly (Talley, 2017). Based on the findings in the case, the assessment was carried out on Mrs. W, 30 years old, who was being treated in the old Jimbaran room of Sumber Kasih Hospital. The results of the assessment by interviews and observations, the author found that complaints of pain in heartburn, with a pain scale of 6, pain like being stabbed, pain disappearing, patients appear to be grimacing, patients complain of nausea, vomiting, decreased appetite, occasionally holding their stomachs, with the results of the PQRST assessment as follows: P = the patient says pain during activities, Q = pain like being stabbed, R = in the heartburn S = pain scale 6, T= pain that occurs and disappears, TD=110/80mmHg, N=86x/min, RR=20x/min, S=36.8°C.

Diagnosis

In this case study, the diagnosis taken, namely acute pain related to the physiological agent of the injury, is an initial diagnosis indicated by complaints of epigastrium pain, grimacing, and sometimes abdominal repression. Acute pain is defined by SDKI (2018) as an emotional word sensory experience associated with actual or functional tissue damage, with sudden or gradual onset and mild to severe intensity for less than three months. The reason why the author upheld the diagnosis was that at the time of the study, the subjective data complained of pain in the epigastrium, while the objective data appeared to be occasionally grimacing, holding the abdomen, with the results of the PQRST assessment as follows: P = the patient said pain during activity, Q = pain like being stabbed, R = in the epigastrium, S = pain scale 6 T = pain felt disappeared. The author establishes this diagnosis as the main diagnosis based on the importance of treatment that must be prioritized.

Nursing interventions

Any type of movement intervention is an action carried out by the nurse, the patient, the family, and others who are close to the patient to overcome the problem and improve his or her health condition (Segalita et al., 2019).

The interventions prepared by the authors are tailored to the diagnosis and patient needs, which include expectations, interventions, and rationale for action. The nursing intervention that the author raises in real cases is adjusted to the needs of the patient, namely by focusing on self-action, therapeutic, educational, and collaborative actions. This is also in accordance with the Indonesia Nursing Diagnosis Standards (SDKI), Indonesia Nursing Intervention Standards (SIKI), and Indonesia Nursing Output Standards (SLKI).

Acute pain B.D physiological injury agent D.D appears grimacing. The interventions compiled by the authors were the identification of pain scales, identification of non-verbal responses, identification of factors that aggravate and alleviate pain, and the provision of non-pharmacological techniques to reduce pain, such as deep breath relaxation. Deep breath relaxation is carried out sequentially: 1) Inhaling deep breaths through the nose until the lung cavity is filled with air by slowly counting. 2) Exhale air slowly through the mouth while touching the upper and lower extremities, relaxing and encouraging rhythmic breathing up to three times. 3) Inhale back through the nose and exhale slowly through the

mouth. Feeling the palms and feet feel intense. 4) Maintain concentration by closing your eyes and focusing on the affected area. Novitasari & Aprilia (2023) recommend positioning the body as comfortably as possible and the administration of analgetics. The expected thing is that pain complaints and grimacing decrease.

Implementation

Pharmacological and non-pharmacological management needs to be carried out to achieve the goals of nursing care that have been set (Novitasari & Aprilia, 2023).

The implementation of nursing is carried out based on interventions made to achieve the expected goals. This implementation was carried out for 2 x 24 hours with the cooperation of nurses in the old Jimbaran room. The priority diagnosis of acute pain is related to physiological injury agents. D.D. appears to be grimacing; the second diagnosis is the risk of nutritional deficit characterized by psychological factors (abstinence from eating). For 2 x 24 hours, the author has taken action according to the nursing plan that has been made. The implementation of pain management is by deep breathing, recommending that the procedure be repeated up to 15 times until the pain is reduced, interspersed with short breaks every 5 times with an estimated time of 30--35 per session.

Deep breath relaxation is felt to be very helpful in relieving the pain experienced by patients and eases patients in using it independently (Lindquist et al., 2018). The relaxation of skeletal muscles that originally experienced spasms or tension is triggered by increased production of prostaglandins. This stimulates vasodilation of blood vessels so that, it results in an increase in blood supply to areas experiencing tension and ischemia. In addition, deep breathing will stimulate the secretion of endogenous opiates in the form of endorphins and enkephalins. Another thing is the stimulation of the parasympathetic nervous system, which results in a decrease in the levels of cortisol and adrenaline hormones. The decrease in these two hormones will induce a decrease in a person's stress level so that it is easier to concentrate calmly. The respiratory rhythm becomes regular until the PaCO₂ meter finally increases; the next effect is a decrease in blood pH level until there is an increase in oxygen levels in plasma (Novitasari & Aprilia, 2023).

Evaluation

Evaluation is an assessment of a number of information provided for a predetermined purpose that states intentional and continuous activities involving clients, nurses, and other health team members. In this case, knowledge of health, pathophysiology, and evaluation strategies is required (Potter et al., 2021).

This stage is the final stage of nursing care, which includes determining whether the expected results can be achieved. The results of the evaluation carried out by the author during the nursing process on patients for 2 x 24 hours are as follows:

The first diagnosis is that acute pain is associated with physiologically damaging agents characterized by grimacing. Providing pain management interventions with pharmacological techniques by mediatizing the administration of ondansetron and omeprazole drugs as well as non-pharmacological techniques such as relaxing a deep breath on the patient several times had a positive impact on the pain felt by the client, on the first and last day there was a decrease. Pain complaints improved after the procedure, initially with a pain scale of 6 (moderate) to 3 (mild) pain. There was a decrease in the level of pain complained by patients in this study from moderate to mild. This is in line with previous research on the effect of deep breath relaxation on changes in pain scale. A patient is given assistance to do deep breathing techniques for 10-15 minutes, then rest for 30--35 minutes. Evaluation of the patient obtained that the pain level was reduced from six to three, as evidenced by the observation of comfortable facial expressions and feelings of calm or relaxation (Nardiati et al., 2023).

CONCLUSION

The research findings demonstrate that the deep breathing relaxation technique significantly reduces pain intensity, decreasing the pain scale from 6 (moderate) to 3 (mild). This suggests that non-pharmacological methods can effectively complement pharmacological treatments. Therefore, incorporating deep breathing relaxation into pain management strategies can enhance overall patient care and outcomes.

BIBLIOGRAPHY

- Asri, N., & Lely Octaviana, E. S. (2021). Aktivitas Olahraga Di Masa Pandemi COVID-19 Terhadap Tingkat Stres Mahasiswa Pendidikan Olahraga Universitas Islam Kalimantan Muhammad Arsyad Al Banjari Banjarmasin. *Halaman Olahraga Nusantara (Jurnal Ilmu Keolahragaan)*, 4(1), 53. <https://doi.org/10.31851/hon.v4i1.5213>
- Budiman, G. T. S., Bestari, M. B., & Suryanti, S. (2021). Clinical and Endoscopic Features in Helicobacter Pylori Infection: Literature Review. *The Indonesian Journal of Gastroenterology, Hepatology, and Digestive Endoscopy*, 22(1), 66–72. <https://doi.org/10.24871/221202166-72>
- Herardi, R., Theresa, R. M., Susetyo, R. R., Khaldun, M. I., Aryandi, B. B., Yuliana, S. D., Muti, A. F., Rahmi, E. P., Prasetya, I. B., & Budiyan, L. (2019). The impact of dyspepsia on quality of life among medical students in Indonesia. *JOURNAL OF GASTROENTEROLOGY AND HEPATOLOGY*, 34, 322.
- Lindquist, R., Tracy, M. F., & Snyder, M. (2018). *Complementary and alternative therapies in nursing*. Springer Publishing Company.
- Manik, Y. P., Khairani, A. I., Dewi, R. S., Suharto, S., & Simamora, E. R. (2024a). Asuhan Keperawatan pada Pasien Dispepsia di Rumah Sakit Tk. II Putri Hijau. *PubHealth Jurnal Kesehatan Masyarakat*, 2(4), 145–155. <https://doi.org/10.56211/pubhealth.v2i4.506>
- Manik, Y. P., Khairani, A. I., Dewi, R. S., Suharto, S., & Simamora, E. R. (2024b). Asuhan Keperawatan pada Pasien Dispepsia di Rumah Sakit Tk. II Putri Hijau. *PubHealth Jurnal Kesehatan Masyarakat*, 2(4), 145–155. <https://doi.org/10.56211/pubhealth.v2i4.506>
- Nardiati, S., Hardaniwati, M., Murdowo, D. A., & Winarti, S. (2023). Javanese Flowers Concoction Lexicon and Their Functions for Healing in Javanese Language: An Ethnolinguistic Study. *Eurasian Journal of Applied Linguistics*, 9(3), 185–195.
- Novitasari, D., & Aprilia, E. (2023). TERAPI RELAKSASI NAFAS DALAM UNTUK PENATALAKSANAAN NYERI AKUT PASIEN GASTRITIS. *Jurnal Keperawatan Dirgahayu (JKD)*, 5(1), 40–48. <https://doi.org/10.52841/jkd.v5i1.339>
- Pebriani, M., Sumarny, R., Arozal, W., Eviarini, P., & Ismaya, N. A. (2024). Potentially Inappropriate Medication (PIM) Prescribing According to Beers Criteria among Elderly Outpatients at Pasar Minggu Hospital, Jakarta. *Jurnal Kefarmasian Indonesia*, 107–125.
- Permana, S., & Nugraha, N. D. (2020). Perancangan Media Edukasi Dispepsia Untuk Kesehatan Lambung Terhadap Remaja Di Kota Bandung. *EProceedings of Art & Design*, 7(2).
- Potter, P. A., Perry, A. G., Stockert, P. A., & Hall, A. (2021). *Fundamentals of nursing-e-book*. Elsevier health sciences.
- Saito, A., Nowak, T., & Wo, J. (2023). Understanding symptoms of gastric dysmotility: Nausea, vomiting, abdominal pain, postprandial fullness, and early satiety. In *Handbook of Gastrointestinal Motility and Disorders of Gut-Brain Interactions* (pp. 87–97). Elsevier. <https://doi.org/10.1016/B978-0-443-13911-6.00011-6>
- Segalita, C., Nindya, T. S., Rachmah, Q., & Mahmudiono, T. (2019). Nutrition education using my plate media to improve self-efficacy and parental support towards children in <https://ajhsjournal.ph/index.php/gp>

full-day primary school and non-full-day primary school. *Indian Journal of Public Health Research and Development*, 10(8), 2296–2301.

Talley, N. J. (2017). Functional Dyspepsia: Advances in Diagnosis and Therapy. *Gut and Liver*, 11(3), 349–357. <https://doi.org/10.5009/gnl16055>

Thapar, N., Benninga, M. A., Crowell, M. D., Di Lorenzo, C., Mack, I., Nurko, S., Saps, M., Shulman, R. J., Szajewska, H., van Tilburg, M. A. L., & Enck, P. (2020). Pediatric functional abdominal pain disorders. *Nature Reviews Disease Primers*, 6(1), 89. <https://doi.org/10.1038/s41572-020-00222-5>

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(2024)**

First publication right:

AJHS - Asian Journal of Healthy and Science



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