

Nursing Care in Close Fracture of Manus Dextra Digiti V Patients

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ABSTRACT

Objective: This study aims to describe changes in pain in patients with 5 finger hypnotic non-pharmacological therapy.

Method: This research is a case study that was conducted in March 2022 with an assessment guide instrument for data collection. Researchers used the nursing care process from the assessment stage to evaluation.

Result: According to the results of the study, guided relaxation techniques for 3 days can reduce pain, from pain intensity on a scale of 5 to 4.

Conclusion: The most felt and disturbing complaint of fracture patients is pain in the area around the wound/fracture with a scale of 5, pain like stabbing. Pain will be felt when the patient moves the fractured part. Non-pharmacological hypnotic therapy of 5 fingers within a period of 3 days is able to reduce the scale of pain felt in postoperative 5 finger digiti fracture patients.

Keywords: fracture, nursing care, hypnotherapy

Introduction

Road accidents are the main source of death, the accident rate for men is 2.8 times higher than for women, and in the long-term age group it is only a few times higher. The frequency of bone fractures or fractures is currently increasing, this is confirmed by the World Health Association (WHO) 38% of the incidence of bone fractures due to accidents. One of the effects of impact or tension during a car crash or other event is cracking. A fracture is a disturbance of the conformity of the bone design and is characterized by its type and degree. A fracture occurs when a bone is subjected to greater stress than it can withstand. Cracks can be caused by a hard impact, impact, sudden twist development or even extraordinary muscle constriction (Wijayanti, et al., 2021).

Fractures are the third leading cause of death in Indonesia after coronary heart disease and tuberculosis . Fractures are caused by trauma or physical exertion, accidents, both work accidents, and traffic accidents. Fractures are a potential or actual threat to a person's integrity, so that they will experience physiological and psychological disorders that can cause a response in the form of pain. Acute pain is an unpleasant sensory and emotional experience due to such damage. Fracture surgery pain makes it difficult for patients to fulfill their Activity Daily Living. Pain occurs due to injuries caused by bone fractures that injure healthy tissue (Fitri et al., 2021).

Fracture is a term for the loss of continuity of bone, cartilage, either total or partial. In summary and general, a fracture is a fracture caused by trauma or physical activity. The strength and angle of physical exertion, the condition of the bone itself, and the soft tissue around the bone will determine whether the fracture is complete or incomplete. A complete fracture occurs when the entire bone is broken, whereas an incomplete fracture does not involve the entire thickness of the bone. In some cases of musculoskeletal trauma, fracture and dislocation occur together. This occurs when in addition to the loss of the normal relationship between the two bone surfaces, there is also a fracture of the joint (Yunirianita, 2020).

Phalang fracture is a disconnection of the bones of the fingers caused by direct trauma to the fingers. Fingers are usually injured from direct impact, and there may be a lot of swelling or open sores. The phalanges are usually fractured transversely, often with forward angulation that can damage the flexor tendon sheaths. Fractures at the ends of the phalanges can enter the joint and cause stiffness, and if the fracture shifts the fingers can also deform (Yunirianita, 2020).

Manus (Phalang) is a short bone, has a stem with two ends. The stem tapers toward the distal end. There are 14 phalanges formed in 5 parts of the bone that are connected to the metacarpals and between the phalanges. The phalanges are usually fractured transversely, often with forward angulation that can damage the flexor tendon sheaths. A fracture at one end of the phalanx can enter the joint and cause stiffness, and if the fracture is displaced, the finger may also be deformed. The terminal phalanges can be hit by a hammer, or caught in a door and the bone may be crushed. Each finger joint can be injured from a blow (the skin overlying it is often damaged), from angulation or from a finger that is in a straight position tripping over it violently. The affected joint will be swollen, tender, and too painful to move (Yunirianita, 2020).

According to Brunner & Suddarth (2002) trauma and pathological conditions that occur in bones that cause fractures. Fractures cause discontinuity of bone tissue that can make sufferers experience damage to their physical mobility. Discontinuity of bone tissue can affect 3 parts, namely soft tissue, blood vessels and nerves and the bone itself. If the soft tissue eats there will be muscle spasms that press on nerve endings and blood vessels which can cause pain, deformity and compartment syndrome.

Bone is brittle but has sufficient strength and spring force to withstand it. But if the external pressure that comes is greater than that which can be absorbed by the bone, then there is trauma to the bone which results in the destruction or breaking of the continuity of the bone. After fracture, the periosteum and blood vessels and nerves are in the cortex, marrow, and soft tissue covering the ribs. Bleeding occurs due to this damage and a hematoma forms in the medullary cavity of the bone. Bone tissue is immediately adjacent to the part of the fractured bone. This necrotic tissue stimulates an inflammatory response characterized by vasodilation, exudation of plasma and leukocytes, and white blood cell infiltration. This incident is the basis of the bone healing process later (Hidayat, 2013).

The impact that arises in patients with fractures is that they can experience changes in the injured body part, feel restless due to incessant pain, damage to skin tissue, and various other

things that interfere with other fundamentals. Moreover, clinical mediation to treat cases of fracture is a medical procedure. One of the actions is surgery, usually the patient will experience great discomfort or pain (Nurbah, et al., 2020).

Pain can be overcome by pharmacological treatment and non-pharmacological treatment, namely certain release strategies, music treatment, murti, interruption, and guided imagination. The non-pharmacological strategy is one of the autonomous nursing mediations to reduce the pain felt by the patient. Imagination relaxation procedures give people peace of mind when suffering occurs and can be used on healthy or frail individuals. Non-pharmacological procedures are generally used to treat pain, besides that non-pharmacological treatments do not cause side effects. In this study, researchers wanted to examine non-pharmacological strategies to treat pain in fracture patients (Risnah et al., 2019).

Objective

This study aims to describe changes in pain in patients with 5 finger hypnotic non-pharmacological treatment.

Method

This study uses a contextual investigation plan with a nursing care approach. Until this research is Mr. Y, selected using simple random sampling technique. This research was conducted at RSUD X in March 2022. Researchers completed the process of collecting information by interviewing, observing, and studying documentation. The instrument used is an assessment guide. The nursing system approach is carried out with the underlying stages, namely conducting assessments to obtain and collect information from patients and their families or individuals closest to the patient. The next stage is establishing nursing diagnoses, making nursing interventions, implementing and evaluating.

Results

Case Presentation

The results of the study conducted on Mr. Y found data for complaints, namely right hand pain. At the time of assessment, the patient said, the patient came with complaints of pain in the lower right arm to the fingertips. Pain occurs when moving the quality is like a stabbing with pain intensity 5 and the pain comes and goes.

The first diagnosis appears according to the theory on client data, namely: Acute pain, associated with a physical injury agent with subjective data the patient says pain, pain occurs when moving, pain like being stabbed, pain in the right hand, pain scale 5, when the pain occurs when moved 4-6 minutes. Objective data: the patient grimaced and was in pain when moving the body, seemed to touch the right hand, then radiological data was obtained, it looked like a fracture of the digital manus complaints of pain, grimacing and restlessness decreased. Action plans in reducing pain levels include identifying the characteristics of pain, history of drug allergies, appropriate type of analgesic, monitoring vital signs before and after analgesic administration and monitoring the effectiveness of analgesics.

The implementation of nursing is carried out to overcome pain problems in clients, namely by assessing the pain scale, providing non-pharmacological and providing analgesic therapy. Non-pharmacological therapy used is relaxation and distraction techniques to reduce pain intensity. Therapy is done with 5 finger hypnosis. Patients are advised to imagine what they want while touching the finger according to the nurse's instructions.

The nursing intervention given on March 10, 2022 is to give the patient the opportunity to express his feelings, explain the patient's condition and examination results, monitor vital signs and encourage the patient to rest. After the action the patient said he still felt pain in the hand area, pain occurred when moving the body, pain was like being slashed with moderate intensity and came and went. The patient grimaced when he spoke and occasionally held his hand. The results of the examination of vital signs showed that the blood pressure value was 125/70 mmHg, pulse 98 x/minute, respiratory rate 22x/minute and body temperature 36.60 Celsius. On the day of the first intervention the problem had not been resolved.

The nursing intervention given on the next day on March 11, 2022 is to continue the previous intervention and teach imagination relaxation techniques with 5 finger hypnosis. Prior to the action, the nurse asked for a time contract with the patient. Guided imagination is performed on the patient in a conscious state and in a comfortable position. Imagination is done to reduce pain intensity with an intervention time of approximately 5 to 10 minutes. Imagination is done by giving suggestions to the patient in a soft and gentle tone of speech. Until the patient follows the nurse's directions and prevents the stimulation of painful stimuli in his body. After the action the patient said the pain began to decrease. The objective data found that the patient looked calm, the results of examination of vital signs showed that the blood pressure value was 114/60 mmHg, pulse 85 x/minute, respiratory rate 22x/minute and body temperature 36.60 Celsius. On the second intervention day, the problem was partially resolved with the criteria for grimacing and anxiety decreasing.

Nursing intervention given on the third day on March 12, 2022 was to continue the previous intervention. After the intervention was carried out on the third day the patient said the pain was reduced, the intensity of the pain scale became 4. Objective data found the patient looked calm, the results of the examination of vital signs obtained pressure values blood is 110/63 mmHg, pulse 70 x/minute, respiratory rate 22x/minute and body temperature is 36.0 Celsius. On the second intervention day, the problem was partially resolved with the criteria for grimacing and anxiety decreasing. On the third intervention day, the problem was resolved with the criteria for pain to be quite decreased and restlessness and grimacing decreased.

The evaluation found that after being treated for 3 days on the client, the acute pain problem related to the physical injury agent in the patient was resolved on the third day according to the planning criteria for decreased pain levels. With indicators of pain complaints from moderate to moderate, the value decreased from 3 to 4. Grimace and restlessness from the intensity of the intensity decreased to decreased with a value scale of 5 to 4.

The most felt and painful complaint for fracture patients is the torment around the wound/crack generally on a scale of 5, torment like being stabbed. Pain will be felt when the patient moves the fractured part. Non-pharmacological treatment of 5 fingers within 3 days can reduce the pain felt by postoperative patients.

Discussion

Assessment

According to Rizal (2019) nursing assessment is a basic stage of the entire existing nursing process, where at this stage a nurse will collect patient data information that is focused on client responses regarding abnormal health problems related to basic human needs, in order to identify problems, health needs (physical, mental and environmental) and nursing plans to be provided.

The patient's name is Mr. Y, who is 18 years old and was admitted to the Kardinah Hospital on Tuesday, March 7, 2022. Currently, Mr. Y complained of pain in his right hand, the pain would

be more pronounced when Mr. Y moved his body. Pain like stabbing pain with a pain scale of 5. Mr. Y said the feeling of pain in his hands made it difficult for him to carry out activities. All activities are assisted by his parents. At this time, an assessment of vital signs was carried out, it was found that the general condition looked sick, composmentis consciousness, blood pressure 125/70 mmHg, pulse 85 x / minute, respiration 22 x / minute and temperature 36.5°C.

Analysis

Data analysis is carried out to identify a pattern or classify the data that has been collected. The data will be grouped based on related symptoms or data can also be grouped based on the biopsychosocial and spiritual needs of the patient. With this, it will make it easier for nurses to determine information that is in harmony and make it easier to analyze the problems that occur (Aditya et al., 2020).

In this study obtained subjective data and objective data. On the subjective data of Mr. Y said pain in his right hand, when the assessment was carried out Mr. Y stated that the cause of the pain was increased pain when moving the body, the pain felt like a stabbing, the pain was currently felt on a scale of 5 (moderate pain) and the duration of the pain was 4-6 minutes when moved. While the objective data obtained were that the patient was grimacing in pain, radiological data appeared to be a 5th manus fracture. This is in line with previous research by Ernawati (2021) which states that subjective data itself is information obtained based on information or complaints of a person or patient. Subjective data obtained are usually written with the patient saying, the patient complaining or the patient stating.

Nursing Diagnosis

The nursing diagnosis in the case that occurred in this study was acute pain associated with a physiological injury agent (D.0077) PPNI (2017) while the objective data is that the patient looks grimacing, radiological data shows a fracture of the digiti 5.

Nursing Intervention

The action plan carried out by the researcher refers to previous research conducted by (Astuti & Respati, 2018) which states that guided imagery therapy or guided imagination therapy can reduce pain in post-op patients with a medical diagnosis of manus fracture. From this study, the results of the Mann Whitney test obtained the results of Asymp. Sig. (2-tailed) = 0.000 where $0.000 < 0.05$, then H_1 is accepted, H_0 is rejected, so it can be concluded that there is an effect of guided imagery therapy on pain in postoperative fracture patients.

Based on this, the researchers tried to prove by providing guided imagination therapy, especially to Mr. Y for 3 days in a row. Before being given therapy, the researcher will make a time contract first, then conduct a pain assessment, after that the researcher will briefly explain about guided imagination therapy starting from the definition, benefits and actions to be taken. After explaining guided imagination therapy, the researcher put the therapy together with Mr. Y then the researcher will carry out evaluation actions and time contracts to carry out follow-up interventions.

Implementation

In providing implementation, a previous nurse needs to briefly re-validate the action plan whether it is still appropriate and needed by the patient based on the current condition. Not only

that, nurses are also required to assess themselves, whether they have interpersonal, intellectual and technical skills in accordance with the actions to be carried out (Supratti & Ashriady, 2018).

Therapy was given from 9 – 11 March 2022 at the time the therapy was carried out in the Lower Lavender Room with Mr. Y, in doing therapy the researcher positioned the patient to a comfortable position and gave directions to the patient to follow the directions given. After that, the researchers also evaluated the results of the guided imagination therapy given related to the outcomes of nursing interventions such as facial expressions, current feelings, other complaints and conducted a pain assessment again on Mr. Y.

Evaluation

After being treated for 3 days on the client, the acute pain problem related to the physical injury agent in the patient was resolved on the third day according to the planning criteria for decreased pain levels. With indicators of pain complaints from moderate to moderate, the value decreased from 3 to 4. Grimace and restlessness from the intensity of the intensity decreased to decreased with a value scale of 5 to 4.

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Conclusion

Nursing care for Mr. Y found priority problem of acute pain related to physical injury. Nursing care is carried out for 4 days starting from assessment, data analysis, determination of diagnosis, making intervention plans, implementation to evaluation. Researchers apply pain management management such as explaining and teaching how to handle pain, guided imagination relaxation to deal with pain. This action shows that there is a change in the perceived pain scale. Nurses are expected to be able to apply and modify alternative uses of other non-pharmacological therapies in reducing pain in addition to guided imagination relaxation techniques.

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