Management of Preoperative Anxiety Patients with Progressive Muscle Relaxation Therapy Interventions

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ABSTRACT

Objective: This case study aims to determine nursing care for anxiety in patients with pre-operative kidney stones (uretroscopy) with progressive muscle relaxation therapy intervention in the Wijaya Kusuma room below the Kardinah Hospital, Tegal City.

Method: The method used is a descriptive case study design where the case study sample is pre-operative kidney stone patients. The instrument used was the DASS 42 questionnaire (Depression Anxiety Stress Scale 42).

Result: The results of the case study on the third day showed the patient looked calm with vital signs blood pressure 120/70 mmHg, pulse 97x/minute, RR 21x/minute, temperature 36.1°C, a decrease in the results of the DASS questionnaire from before the action 18 to 11.

Conclusion: The results of the case study showed a decrease in anxiety in patients with preoperative kidney stones.

Keywords: anxiety, preoperative, progressive muscle relaxation

Introduction

Preoperative nursing is the initial stage of the perioperative nursing series. The preoperative phase begins when the decision is made to carry out surgical intervention (Lestari & Yuswiyanti, 2015). Surgery is a unique experience that causes planned changes in the human body, which consists of three phases: preoperative, intraoperative, and postoperative (Kozier, 2011). During the preoperative phase, the client experiences various kinds of stressors that can cause fear and anxiety (Rihiantoro, Handayani, Wahyuningrat, & Suratmiah, 2018). Surgery or surgery in general causes fear in the patient. Whatever the type of surgery, both major and minor surgery, is a stressor that can cause a stress reaction, followed by symptoms of anxiety, anxiety, or depression (Mansjoer, 2007 in Rihiantoro et al., 2018).

Anxiety in preoperative patients can include concerns about pain after surgery, physical changes (become ugly and not functioning normally), malignancy (if the diagnosis made is uncertain), the operation will fail, die during anesthesia, experience the same conditions as other people who have the same disease as themselves, facing the operating room, surgical equipment and officers (Potter and Perry, 2010 in Gea, 2018).

The level of anxiety in each patient depends on the experience which is influenced by several factors. Some level of anxiety arises as a natural reaction that cannot be predicted, especially in preoperative patients, especially in patients undergoing surgery for the first time. Excessive preoperative anxiety can cause pathophysiological responses that include tachycardia, hypertension, arrhythmias, and severe pain that can persist until the postoperative period (Pardede & Zahro, 2017).

According to Taufan (2017) that anxiety in preoperative patients who do not receive proper treatment will cause delayed surgery, length of recovery, increased postoperative pain, reduced immunity to infection, increased use of analgesics after surgery, and increased time for patients. undergoing hospitalization.

There are several ways to reduce anxiety in preoperative patients including; pharmacology, supportive approach and psychotherapy. The main technique of psychotherapy is to deal with anxiety with relaxation and bio feed back. One of the relaxation techniques used in anxiety is the progressive muscle relaxation technique (Smeltzer & Bare, 2002 in Arbani, 2015). To reduce this anxiety, it can be overcome by using relaxation techniques, one of which is by progressive muscle relaxation, because this relaxation can suppress the sympathetic nerves which can emphasize the tension experienced by the individual reciprocally, resulting in counter conditioning (elimination) (Sitralita, 2012 in Lestari & Yuswiyanti, 2015). This relaxation was created after studying the human nervous system, which consists of the central nervous system and the autonomic nervous system.

The autonomic nervous system consists of two subsystems, namely the sympathetic nervous system and the parasympathetic nervous system, which work opposite each other. The sympathetic nervous system is more active when the human body needs energy, for example when surprised, feeling afraid, anxious or in a state of tension. In conditions like this, the nervous system will stimulate more blood flow to the skeletal muscles, increasing heart rate, sugar levels and tension causing muscle fibers to contract, shrink and shrink. In contrast, muscle relaxation goes hand in hand with an autonomic response from the parasympathetic nervous system. The parasympathetic nervous system controls activities that take place during relaxation of the body's muscles, such as decreasing heart rate after the tension phase and increasing blood flow to the gastrointestinal system (Ramadani & Putra, 2009 in Rihiantoro et al., 2018).

Research conducted by Lestari & Yuswiyanti (2015) showed that the results of the Marginal Homogeneity test obtained a p value of 0.000 (<0.05) so it was concluded that there was an effect of progressive muscle relaxation on reducing anxiety levels in preoperative patients in the Wijaya Kusuma Room RSUD Dr. R Soeprapto Cepu. In line with research conducted by Rahayu (2014) which showed that from 40 respondents prior to progressive muscle therapy, the number of respondents who experienced severe anxiety was 25 (62.5%), and none did not suffer from anxiety. After progressive muscle therapy, the number of clients who experienced moderate anxiety was 12 (30%), and the number of clients who experienced severe anxiety was 6 (15%).

Based on data from the Wijaya Kusuma Bawah Pria Room at Kardinah Hospital, Tegal City, the number of patients who will undergo surgery in the last 1 month in November 2021 is 75 patients. Patients treated at Wijaya Kusuma Bawah had various types of anxiety, namely 7 very severe anxiety, 25 patients with severe anxiety, 10 patients with moderate anxiety, 28 patients with mild anxiety, and 5 patients who did not experience anxiety. The results of the interview with nurse Wijaya Kusuma Bawah for handling anxiety in the Wijaya Kusuma Bawah inpatient room by recommending regulating breathing patterns and diverting thoughts to positive things, for example by watching TV or listening to music according to the patient's preferences.

Based on this phenomenon, the authors are interested in providing nursing care regarding the management of anxiety by providing progressive muscle relaxation therapy to Mr. W who experienced anxiety before surgery on the grounds that there were supporting journals about giving progressive muscle relaxation therapy could reduce anxiety levels in preoperative patients.

Objective

The purpose of this case study on the management of anxiety in preoperative patients with progressive muscle relaxation therapy is to find out nursing care for anxiety starting from assessment, diagnosis, intervention, implementation, evaluation in patients with preoperative kidney stones (uretroscopy) with progressive muscle relaxation therapy intervention.

Method

This type of research uses a descriptive design with a case study approach through the provision of nursing care starting from assessment, preparation of diagnoses, preparation of interventions, provision of implementation and evaluation. This case study was conducted on December 13 – December 15, 2021 in the Wijaya Kusuma Room at Kardinah Hospital, Tegal City.

According to research conducted by Gitanjali and Sreehari (2014), found that patients who underwent progressive muscle relaxation gradually for 3 days and performed 25-30 minutes could help reduce anxiety and relax more. Based on the results of these studies, it can be concluded that progressive muscle relaxation therapy can be used as therapy in overcoming anxiety problems.

Implementation of nursing in this case study is planned with the aim of overcoming anxiety. The purpose of doing progressive muscle relaxation is to know the difference in feeling when the muscles are tensed and when they are relaxed. The way to do this is by tensing each muscle group for ± 10-15 seconds until you feel the muscles vibrate, then take a short breath towards the end of the tension, then relax the tension by exhaling. The act of giving the Progressive Muscle Relaxation technique to Mr. W is carried out for 25-30 minutes in the morning or evening for 3x 24 hours.

Progressive muscle relaxation therapy is carried out through planned movements or trained in advance. Progressive muscle relaxation therapy procedures position the patient in a semi-Fowler position, recommending the patient to position his body as comfortably as possible, this therapy begins with the hand muscles first, then the facial muscles, head, and muscles foot.

In this study, the sample used was preoperative kidney stone (uretroscopy) patients in the Wijaya Kusuma Bawah room at Kardinah Hospital, Tegal City on December 13-15, 2021. The data collection tool used in this case study was the DASS 42 (Depression Anxiety Stress Scale) to determine the patient's level of anxiety before and after progressive muscle relaxation therapy.

Results

Case Presentation

Nursing care was carried out on patients with preoperative kidney stones (uretroscopy) in the Wijaya Kusuma Bawah room at Kardinah Hospital, Tegal City. Pre-operation is the first stage of perioperative care which begins when the patient is received and enters the operating room and ends when the patient is transferred to the operating table for surgery (Maryunani, 2014). Patients who will undergo surgery usually experience anxiety which is caused by fears of failure during surgery. Management of this anxiety is done by using progressive muscle relaxation therapy which aims to reduce anxiety that focuses on the muscles of the body. The care that aims to analyze the results of the implementation of nursing care with progressive muscle relaxation therapy interventions for 3 times a week shows a decrease in anxiety after being given progressive muscle relaxation therapy with the results of the DASS 42 questionnaire before the action is 18 to 11 on the third day with vital signs of pressure blood 120/70 mmHg, pulse 97x/minute, RR 21x/minute, temperature 36.1°C.

Discussion

Anxiety is a vague uneasy feeling due to discomfort or fear accompanied by a response (the cause is not specific or is unknown to the individual). This feeling of fear and uncertainty is a signal that realizes that a warning about danger is coming and strengthens individuals to take action to face the threat (Yusuf, 2015).

Preoperative anxiety in addition to increasing the incidence of death also increases the risk of repeated operations, requires intensive care, and increased postoperative complications, besides that it will waste time and resources that have been prepared which have an impact on reducing efficiency in operating room use, resulting in home losses. sick. Delays and cancellations of surgery also have an impact on increasing patient costs and ultimately canceling surgery will reduce patient satisfaction (Mertosono, 2015).

To reduce anxiety, it can be overcome by using relaxation techniques, one of which is progressive muscle relaxation. Progressive muscle relaxation is an activity to stretch physical tension which will have an impact on reducing mental tension. The resulting effect is a feeling of pleasure, relaxation began to be used to reduce tension, especially psychological tension (Purwanto, 2008).

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Based on the results of the study of patient characteristics, it can be seen that Mr. W is 38 years old experiencing anxiety or anxiety nursing problems where the patient will have surgery. The data from the assessment are classified into major data and minor data. Major data are data that must be available to formulate nursing diagnoses, while minor data are data that may or may not be available to formulate nursing diagnoses. Major data in the case of Mr. W is sourced from subjective data and objective data. Major data include pain when urinating, a feeling of not being released when urinating, urine that comes out little by little. Minor data include moist lip mucosa, presence of cavities.

Based on the data obtained on Mr. W it can be concluded that the nursing diagnoses in accordance with the existing theory review are urinary elimination disorders and anxiety. The priority nursing diagnosis is anxiety related to the fear of failure. The nursing action plan determined by the author to deal with the problems experienced by Mr. W is with progressive muscle therapy management.

Implementation of nursing actions on Mr. W according to a predetermined plan by involving the patient's family and working with the room nurse. Management of this anxiety is done by using progressive muscle relaxation therapy which aims to reduce anxiety that focuses on the muscles of the body. Care that aims to analyze the results of the implementation of nursing care with progressive muscle relaxation therapy interventions for 3 times a week. The evaluation consists of two types, namely summative and formative evaluations to determine whether or not the actions that have been taken have been achieved in accordance with the goals that have been determined in the nursing plan, problems that occur in patients can be resolved on the 3rd day and which is marked by a decrease in anxiety. after being given progressive muscle relaxation therapy on the third day with the results of the DASS 42 questionnaire before the action was 18 to 11 vital signs blood pressure 120/70 mmHg, pulse 97x/minute, RR 21x/minute, temperature 36.1°C. It is concluded that progressive muscle relaxation therapy has an effect on reducing anxiety in preoperative patients.

Based on research conducted by Astuti (2015) says that PMR (Progressive Muscle Relaxation) is an effective method to reduce preoperative patient anxiety, mild anxiety as many as 13 people (65%) to 14 people (70%), and moderate anxiety as many as 7 people. people (35%) to 6 people (30%). In line with research conducted by Triwijaya (2014) showed the level of anxiety of most respondents before getting treatment who experienced mild anxiety as many as 4 people (8.7%), moderate anxiety as many as 40 people (87.0%), severe anxiety as many as 2 people (4.3%) . Meanwhile, after treatment, 34 people (73.9%), moderate anxiety (26.1%), experienced mild anxiety, and none experienced severe anxiety.

Another study conducted by Neno, Kristiyawati, & Purnomo (2014) showed the anxiety level of 32 respondents before receiving treatment who experienced mild anxiety 4 people (12.5%), moderate anxiety as many as 17 people (53.1%), severe anxiety as many as 10 people (33.1%), and panicked as many as 1 person (3.1%). The results of this study are in line with previous research, namely the Uskenat study (2012) which showed that there were differences in anxiety levels in preoperative patients with general anesthesia before and after being given progressive muscle relaxation, this study showed very significant results with p = 0.000 or <0.05 so that progressive relaxation therapy is proven to reduce anxiety levels.

Based on the results of research by Rihiantoro et al (2018), it can be concluded that there has been a decrease in the value of anxiety from the average value before therapy of 54.17 to 50.33 after being given progressive muscle relaxation therapy. The results of further analysis showed that there was a difference between anxiety scores before and after progressive muscle relaxation therapy (nilai value = 0.000). It is concluded that progressive muscle relaxation therapy has an effect on reducing anxiety in preoperative patients.

Conclusion

Nursing care has been carried out on preoperative patients with a diagnosis of anxiety on Mr. W in the Wijaya Kusuma room at Kardinah Hospital, Tegal City for 3x 24 hours. It can be concluded that the provision of progressive muscle relaxation therapy can significantly reduce

anxiety in patients who experience preoperative anxiety. This progressive muscle relaxation therapy can be a non-pharmacological therapy to reduce anxiety in pre-operative patients in the inpatient room.

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