Controlling Pre-operative Anxiety with Self Relaxound Therapy

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ABSTRACT

The impact of anxiety before surgery can affect the operation, so it must be postponed. Action is needed to overcome the anxiety experienced by the patient. One that can be done by giving self relaxound therapy is by providing a combination of relaxation interventions, maybe, and natural sounds developed by researchers, which is done by perception and self-suggestion while listening to natural sounds and deep breathing exercises. This research aims to determine the effect of relaxation self relaxound on patient anxiety before laparotomy surgery. This type of research uses quantitative research by designing a quasi-experiment using a nonplan equivalent without a control group. This research was carried out in the surgical inpatient room on 32 respondents. Anxiety measurement uses a questionnaire called the Zung Self Rating Scale. Data analysis was done using a paired sample T-test with a significance limit 0.05. The analysis results obtained a p-value=0.000 ($\alpha<0.05$), which shows a significant effect between therapy self relaxound and patient anxiety. Psychological problems are closely related to surgery; for this, the researchers suggest self relaxound therapy can be considered as a nursing procedure for every pre-operative patient.

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INTRODUCTION

Patients who will undergo surgery are at risk of experiencing anxiety. Patient anxiety during the pre-operative period can include worrying about pain after surgery, physical changes (becoming ugly and not functioning normally), malignancy (if the diagnosis is uncertain), operation failure, failure during anesthesia, and facing space operations and surgical equipment (Rismawan, 2019).

The anxiety experienced by pre-operative patients is a normal response, but when the anxiety response is excessive, it will become an abnormal response. High anxiety can affect the body's physiological functions is characterized by an increase in blood pressure, an increase in pulse rate, and an increase in breathing frequency. Because of these signs, the doctor will usually postpone the operation, thereby preventing the client from healing the disease.

Based on the results of a preliminary study at Dr. Soediran Mangun Sumarso Regional Hospital in 2019, there was a relationship between the patient's waiting time from the time elective surgery was decided and it was scheduled in the operating room until the operation was carried out with an average of two days. Based on the results of this research, it was found that the cause of delayed surgery was anxiety experienced by pre-operative patients (Jumiran, 2019). Delays in operating time due to anxiety experienced by pre-operative patients are a problem that must be resolved.

The phenomenon obtained from research conducted in Canada, Saudi Arabia, and Sri Lanka regarding the level of pre-operative anxiety shows that the overall prevalence of pre-operative anxiety is 89%, 55%, and 76.7%, respectively. Similarly, a study conducted in Austria reported that overall pre-operative anxiety was 45.3% among treated surgical patients. Additionally, the results of a study conducted in a tertiary hospital in Nigeria and a pilot study in Nigeria showed that 51.0% and 90% of surgical patients experienced significant pre-operative anxiety, respectively (Bouka & Widani, 2020). In Indonesia, research at RSUD dr. Soekardjo Tasikmalaya showed that pre-operative anxiety in patients was found to be 71.4% (Tamara et al., 2021).

Based on interviews and surveys at RSUD Dr. H Abdul Moeloek, Lampung Province, in January-December 2022, there were 630 laparotomy surgery patients, with 426 ob-gyn

surgery patients and 204 digestive patients. Personal experience as a patient's family and experience as a student during fieldwork practice at RSUD Dr. H. Abdul Moeloek the incidence of anxiety in pre-operative patients is still widespread, and not many non-pharmacological interventions have been carried out.

Nurses are essential in intervening with patients from pre- to post-surgery. Based on the description above, there is a problem between anxiety and the implementation process for pre-operative patients, so it is essential to treat patients who will undergo surgery, especially during the pre-operative period, so that anxiety levels can be reduced in the case of pre-operative patients. In this study, researchers chose to carry out non-pharmacological therapy. Non-pharmacological interventions are currently developing towards complementary therapies, which must be selected based on low side effects (safe), through rigorous scientific investigation, and have benefits for improving health. Nurmaguphita et al. (2022) stated that the WHO (World Health Organization) in the 2002-2005 traditional medicine strategy explained that there is an increase in the use of non-conventional medicine, which means that there is an increase in the use of complementary therapies in various countries in the world.

One of the non-pharmacological therapies that will be used as an intervention to overcome anxiety is relaxation *autogenous*, which originates from oneself in the form of short words that help individuals to be able to control several body functions such as breathing, blood pressure, heart frequency, blood flow so that a relaxed state is achieved. This non-pharmacological intervention is strengthened by research (Rosida et al., 2019). In this study, there are differences significant differences between the decrease in anxiety levels and the difference in the average anxiety value of 43.55 before the intervention to 36.67 after the intervention.

The next relaxation is relaxing with natural sounds (nature sound), which has a slow melodic and rhythmic structure, making it very comfortable to listen to and helping patients manage their anxiety and achieve relaxation. Based on research conducted by (Imawati, 2019) shows that providing pre-operative natural sounds has a significant effect on reducing the anxiety level of patients at RSI Sultan Agung Semarang starting from panic, namely 5 people (23.8%), anxiety to 7 people (33.3%), moderate anxiety 5 people (22.8%), mild anxiety 1 person (4.8%), no anxiety 3 people (14.3%). After the therapeutic intervention, the natural sounds experienced increase and decrease. At the level of panic, namely 0 people (0%), severe anxiety 7 people (33.3%), moderate anxiety 2 people (9.5%), mild anxiety 8 people (34.1%), no anxiety 4 people (19.0%).

Researchers believe that complementary therapies can reduce anxiety. In this study, researchers provide relaxation, called self-relaxound, a combination of autogenous relaxation therapy with natural sounds. Relaxation is autogenous, which originates from oneself based on passive concentration and relaxation. It can also control several body functions such as breathing, blood pressure, heart rate, and blood flow. Practice something can train a person to carry out self-suggestion, the aim being that a person can relax his muscles and be able to control or reduce the emotional reactions that are fluctuating in him both in the central nervous system and the autonomic nervous system (Rosida et al., 2019). When someone is relaxed and comfortable, emotional reactions such as anxiety will decrease. After being taught this technique, a person is no longer dependent on the therapist but can do it themselves through self-suggestion techniques. Some of these autogenic relaxation exercises are exercises to feel the heaviness and heat in the limbs and will be more focused when done while listening to natural sounds or natural sounds because it can block sounds around the room, especially if done in a hospital. Listening to music also affects the pituitary gland and releases endorphins, which cause calmness, reduce pain, and improve sleep quality. In addition, listening to music will cause relaxation in a person by creating positive and pleasant feelings. So that self relaxound can be more effective in reducing anxiety. Compared to a previous study, the update in this research is that researchers combine relaxation with the accompaniment of natural sounds and positive affirmations, called Relaxound (relaxation sound).

METHOD

The research type applied is quasi-experimental with a nonequivalent plan and without a control group. The research sample will undergo treatment (experiment) in the form of a self-relaxound combination with natural sound. The research sample was pre-operative laparotomy patients who experienced anxiety responses as many as 32 respondents. The research was carried out after obtaining a certificate of ethical suitability from the Health Research Ethics Committee of the Poltekkes Kemenkes Tanjung Karang with number 150/KEPK-TJK/II/2023. The research was carried out in the surgical treatment room. Data collection

begins with measuring anxiety using measuring instruments Zung Self Rating Scale. Then intervention is carried outself relaxound therapy by listening to the sounds of nature in the form of the sound of a waterfall from Curug Wira Garden Bandar Lampung combined with the sound of birds flying on the beach.

Measurements were carried out twice during the pre-test and post-test. After the first measurement (pre-test), respondents will be given self-relaxation therapy three times, namely when they wake up after taking a nap and before going to bed at night, carrying out therapy for 10 minutes in each session. The second anxiety measurement (post-test) was carried out in the morning. The collected data was analyzed using the dependent t-test to compare anxiety before and after the intervention relaxound therapy and compare the reduction in anxiety before and after the intervention.

RESULTS

Table 1. Respondent characteristics

Respondent Characteristics	n	%
Age	7	21.88
Late Teenagers (17 - 25 Years)		
Early Adulthood (26 - 35 Years)	11	34.38
Late Adulthood (36 - 45 Years)	8	25.00
Early Elderly (46 - 55 Years)	6	18.75
Gender	13	40.63
Man		
Woman	19	59.38
Education	5	15.63
SD		
Junior high school	7	21.88
High School	15	46.88
Bachelor	5	15.63
Never	27	84.38
Once	5	15.63

Description of the characteristics of the respondents in this study is that the largest age group was early adulthood (26-35 years) in a group of 11 people (34.38%), and the largest gender was female, namely 19 people (59.38%). Most people had a high school education, namely 15 people (46.88%). The majority of surgical history was never, namely 27 people (84.38%).

Table 2. Distribution of anxiety scores before and after intervention

Emergency	Mean	SD	SE	Min	Max
Pre-test	50.66	3.395	0.600	46	59
Post-test	46.59	3.291	0.582	40	53

Table 2 shows that the average anxiety value before the intervention was 50.66 with a value Standard Deviation of 3.395 and a standard error mean of 0.6. The minimum score is 46, and the maximum is 59. Furthermore, after the intervention, the average anxiety score after the intervention was 46.59, with a Standard Deviation of 3.291 and a standard error mean of 0.6. The minimum score is 40, and the maximum is 53.

Anxiety response after relaxound therapy

Based on parametric results using tests paired samples, the T-test value is obtained 0.000 ($\alpha > 0.05$); it can be concluded that there is a difference in the average anxiety value with a mean score of 4.063, Standard Deviation of 4,127, and standard error mean of 0.72, there is an average difference before and after the intervention of 4.07. The analysis results show that there is a significant influence between relaxound therapy on respondents' anxiety.

Table 3. Bivariate test analysis

Emergency	Mean	SD	SE	t	Mean difference	p-value
Pretest-Posttest	4.063	4.127	0.729	5.569	4.07	0.000

DISCUSSION

The results of this research are not in line with research conducted by (Rosida et al., 2019), which found a *p-value* of 0.001, which means there is an effect of providing relaxation *autogenous* and also supported by research (Wijayanti et al., 2018) found that *a p-value* 0.00 which means there is an effect of providing intervention nature sound.

Anxiety itself occurs due to many factors, one of which is experience. Individual experience also influences anxiety responses because experience can be used as a lesson in dealing with stressors or problems. This research shows that the respondents' surgical experience shows that there are more respondents who have never had surgery, namely 13 people in the experimental group and 14 people in the control group so that an anxiety response can be found. There were 3 people in the experimental group and 2 people in the control group who had had surgery. Based on the results of interviews with patients who have had surgery, it is said that respondents are still

afraid of facing the operation they will undergo. This fear is in the form of fear of failure of the operation and fear of surgical scars that will change their appearance, so this does not rule out the possibility of finding an anxiety response in patients who have had surgery and have ever had surgery.

Apart from that, another factor that can cause anxiety in patients is the respondent's knowledge. It is known from the description of the characteristics of respondents that the majority of respondents' education is high school, namely eight people in the experimental group and seven people in the control group. Education is generally helpful in changing thought patterns, behavior patterns, and decision-making patterns. The higher the education, the higher the quality of a person's knowledge so that it is more accessible to receive information, one of which is related to health and will influence a person's behavior.

The intervention used not only distracts the patient's feelings of anxiety using nature sounds but also combines it with deep breathing relaxation. These results are supported by previous research with results of a decrease in pre-operative anxiety after deep breathing exercises (Rokawie et al., 2017).

The research was conducted to overcome the anxiety experienced by respondents when facing surgery. The analysis results show a significant effect of therapy in the form of *self relaxound,* which is therapy by listening to natural sounds given to respondents using a headset. These results are in line with previous theory and research. Nature sound is part of the music that respondents listen to. Music can soothe the soul, being a means to focus on spiritual awareness; it elevates a person to a situation of peace, tranquility, and self-awareness. Therapy using instrumental music is an effective distraction technique. It is believed to reduce physiological pain, stress, and anxiety by diverting a person's attention and pain, but it is still rarely used, especially in the health sector. Instrumental music therapy also fulfills essential requirements as a technique for healing an illness using certain sounds or rhythms, as stated by Solehati T & Cecep EK (Fanratami, 2021)

The results of other studies also report the effectiveness of natural sounds on a person's psychological condition, especially in patients with chronic diseases and surgical cases (Tridiyawati & Wulandari, 2022; Li H et al., 2021; Hilalliyah & Herlinah, 2021; Rahayu et al., 2023; Suraning et al., 2023; Ilmiyah et al., 2022; Wijayanti et al., 2016; Kotera et al.,2021; Wardani & Soesanto, 2022).

CONCLUSION

Based on the results of statistical tests, there is a difference in the anxiety of patients before laparotomy surgery, reducing anxiety after carrying out it*self relaxound.* So researchers strongly recommend doing *relaxound* to reduce anxiety and can increase the duration or frequency of providing relaxation *self relaxound* and by using *a headset* to focus more on implementing interventions. Intervention*self relaxound* can be carried out on patients starting from the polyclinic when they receive a surgery schedule so that stronger coping is formed to overcome anxiety in pre-operative patients.

It can be concluded that there is an influence of relaxound on the anxiety of patients facing surgery. It is hoped that this intervention can be applied to similar cases and can be used as a standard action/operation in nursing care for patient psychology whether facing anxiety or anxiety in other situations.

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