

CASE STUDY

INTERVENTION OF WARM COMPRESSES OF GINGER DECOCTION ON CHRONIC PAIN OF RHEMATOID ARTHRITIS PATIENTS IN THE WORK AREA OF THE HEALTH CENTER

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ABSTRACT

Rheumatoid Arthritis is a symmetrical autoimmune disease in the joints of the hands and feet that experience inflammation causing swelling, pain and can cause damage to the joints causing pain. Pain is an unpleasant sensory and emotional experience that increases due to tissue damage. Non-pharmacological therapy can be in the form of warm compresses with ginger to reduce pain intensity. Rheumatoid arthritis causes joint damage and thus often causes considerable morbidity and death. The most common problems or complaints experienced by clients with rheumatoid arthritis include pain, stiffness and weakness. Until Mrs. A nursing problem that arises is chronic pain. The purpose of this study was to assess the effectiveness of implementing warm compresses with ginger in nursing care for rheumatoid arthritis in Ny. A with chronic pain nursing problems. The design used in this final project is a case report that aims to evaluate rheumatoid arthritis nursing care in Mrs.A with chronic pain nursing problems. Data collection is done by conducting nursing care with interviews, observation, and documentation. Implementation carried out on both clients is to provide warm compress therapy using ginger decoction. The results obtained on the third day of treatment, the pain scale on the client decreased from 7 to 3. From these results it is hoped that the client can apply warm compress therapy using ginger independently and the problems that occur in rheumatoid arthritis clients can be completely resolved.

Keywords: Rheumatoid Arthritis, Pain, Warm Compress

INTRODUCTION

Rheumatoid Arthritis (RA) is a symmetrically autoimmune disease of the joints of the hands and feet that is inflamed so that it causes swelling, pain and can cause damage to the joints (1). Rheumatoid Arthritis is an inflammation of the connective tissue. This type of disorder mostly affects the joints of the hands and feet. Rheumatoid arthritis can affect all age groups. However, this disease affects women more often, almost three times as many as men, especially at the age of 30 - 50 years rheumatoid arthritis is recurrent (2).

Based on the prevalence of Rheumatoid Arthritis in both developed and developing countries and has reached 335 million people, which means that 1 in 6 people on earth experienced Rheumatoid Arthritis in 2019, the incidence of Rheumatoid Arthritis reported by the World Health Organization (WHO), Arthritis affects 20% of the world's population, with 5-10% aged 5-20 years and 20% over 55 years old (3).

In Indonesia, rheumatic diseases are most commonly found in the elderly group, which is estimated to have more than 360,000 sufferers (4). Pain is an unpleasant sensory experience and emotions that increase due to tissue damage, the presence of pain, especially

in the joints, can cause impaired joint movement and consequently can affect the muscles and tissues around the joints due to muscle spasm (5). Management in rheumatic patients to prevent complications is carried out in 2 ways, namely pharmacological and non-pharmacological therapy. Pharmacological therapy is the act of administering drugs to reduce pain (6). Usually by administering analgesic drugs such as nonsteroidal anti-inflammatory drugs (OAINS), Examples: aspirin and ibuprofen.

The use of analgesic drugs is associated with several adverse effects, including gastrointestinal discomfort, unpleasant taste, nausea, diarrhea, gastrointestinal bleeding, renal impairment, and cardiovascular complications. Therefore, non-pharmacological pain management strategies have been widely recommended as complementary or alternative approaches. These interventions include anticipatory guidance, distraction techniques, cutaneous stimulation, cold and heat therapy, hypnosis, relaxation techniques, and compress therapy(7).

One of the treatments and prevention can be done by giving a ginger warm water compress to reduce pain because it can relieve pain, increase muscle relaxation, increase circulation, increase psychological relaxation, and provide a sense of comfort, working as a counterirritant and ginger compress is an action that is often used as a joint pain medicine because of the content of gingerol and the warm feeling it causes makes blood vessels open and facilitates circulation blood, so that the supply of food and oxygen is better and joint pain is reduced (8).

Complementary treatment for Rheumatoid Arthritis in reducing pain by administering ginger because ginger contains analgesic and anti-inflammatory substances. The substance content in ginger that has properties to reduce the inflammatory process is gingerol and shagol. In fact, one of the substances called shagol in addition to reducing inflammation also protects the cartilage of the femur from damage (9).

The role of community nurses is as a service provider to provide nursing care through the assessment of existing nursing problems, planning nursing actions and evaluating the services that have been provided to individuals, families, groups and communities (10). Therefore, researchers conducted a study related to "Giving Ginger Compresses to Reduce Pain in Rheumatoid Arthritis Patients".

METHODS

The design used in this final project is a case report that aims to evaluate the nursing care of rheumatoid arthritis in Mrs. A with chronic pain nursing problems. Data collection was carried out by conducting nursing care with interviews, observations, and documentation. The implementation carried out on both clients was to provide warm compress therapy using ginger decoction in the work area of the Health Center.

RESULT

Assessment

This study was carried out by Mrs. A.'s home researcher. The results of the problem-focus study obtained subjective data, namely the client Mrs.A., 64 years old, said that currently the client's complaints complain of joint pain in the right and left knees, pain

disappears such as punctures and heat, pain arises when walking, but not often, pain has been felt since 1 year, the pain scale is 7. When the patient responds well in the interview, the patient has a friendly type, easy to talk to (wise type). On the review of the client's history said that there were no sleep disturbances, the patient said that he had been sick with gout but had never taken any other medication other than what was given. Regarding the client's medical history, he said that he felt joint pain in his legs so that it could be reduced, so he massaged and took gout medicine. As for daily activities, it is helped because it often experiences pain when used for too many activities. The results of the physical examination found that there was pressure pain in both knees, reddish skin, edema was absent, the client appeared to grimace when asked to move both legs. Looks to avoid bending the knee or moving suddenly. Laboratory test results of uric acid levels in the blood 9.5 mg/dl.

Nursing Diagnosis

Based on data analysis, a list of nursing problems was obtained, namely chronic pain related to chronic conditions due to rheumatoid arthritis with subjective data: clients complained of joint pain in the right and left knees, pain disappeared such as stabbing and heat pain arose when walking, but not often, pain was felt since 1 year. Objective Data: Pressure pain in both knees, reddish skin, appearing grimacing when asked to move both legs. Looks to avoid bending the knee or moving suddenly. Vital signs measurement TD 130/90 mmHg, respiration rate 20 x/mmin and pulse 89x/min, temperature 36.7oC. Laboratory uric acid levels in the blood were 9.5 mg/dl on May 25, 2023.

The primary nursing diagnoses that were intervened were chronic pain associated with chronic conditions due to rheumatoid arthritis (D.0078), Chronic pain nursing care in Mrs. A with rheumatoid arthritis.

Planning

The author made a nursing plan on May 29, 2023 which aims to overcome the nursing problems that arise, namely chronic pain related to chronic conditions due to rheumatoid arthritis with the outcome that the level of pain can be overcome with the criteria for the results of complaints of pain complaints decreasing from the criterion of increasing enough (2) to decreasing criterion (5), the client shows comfort from the criterion of increasing enough (2) to decreasing enough (5).

Actions taken based on the Indonesian Nursing Intervention Standard (SIKI), (2016) include observation actions, namely identification of location, characteristics, duration, frequency, quality, intensity of pain, identification of factors that aggravate and reduce pain; then on therapeutic actions given based on EBN, namely, provide nonpharmacological techniques to reduce pain (warm compresses with ginger), consider the type and source of pain in the selection of pain relief strategies, explain the causes, periods and triggers of pain; Furthermore, for the type of educational activity, namely explaining strategies for relieving pain and recommendations for adherence to taking routine medication, followed by routine health check-ups every month and being born is the action of Klobaorask to reduce pain through medication.

Implementation

Nursing implementation based on the results of the study found that there was pressure pain in both knees, reddish skin, and grimacing when asked to move both legs. It is seen to avoid bending the knee or moving suddenly so that the nurse will manage non-pharmacological therapy with complementary therapy of ginger warm compress with the following steps

So, interaxis

Filled with activities to assess the patient's condition, the need for complementary therapy to be carried out and the preparation of tools and materials

Orientation

Greetings and explanation of the procedure

Stages of Work

The steps of the process of giving the implementation of warm compresses in accordance with SPO and EBN are carried out for 10-15 minutes repeatedly for 4 times every 1x meeting (60 minutes)

Termination

Evaluation related to the results of activities, namely negative positive responses and feedback from clients followed by subsequent meeting appointments if necessary

Evaluation

Based on the actions carried out during 3 days of meetings with the intervention of the author and from the client's independence to practice, the author conducted a final evaluation (summative evaluation) with the results of chronic pain problems. Evaluation of the first treatment found that the client said that the pain in both lutures decreased after being compressed, the legs felt warm and the pain was reduced on a pain scale of 5, the client said that it was comfortable after treatment, the area around the luture was still red, edema was not present.

On the 2nd day of chronic pain treatment, nursing evaluation data was obtained, namely the client said he felt more comfortable, the client said that the pain sensation had begun to decrease when both knees were moved, did not complain of pain in the area around the knee when pressed, pain scale 3, did not oedem.

Evaluation of the 3rd day of treatment of chronic pain in the client data said that the pain was reduced from the previous day, the sensation of pain was reduced when both knees were moved with a pain scale of 1, oedema was not present. Continue to monitor vital signs, perform compress treatments, collaborate on medication compliance, and risk of injury control.

Table I Evaluation of Patient Development Based on the Results of Nrs Conservation in Respondents with Ginger Compress Treatment for 3 Days

What is observed	Evaluation of day I		Evaluation of day I		Evaluation of day I	
	Before	After	Before	After	Before	After
Provocate	When it is moved suddenly	Pain such as stabbing and heat, pain, arising when the leg is bent	Moderate pain, Pain with ginger	Mild pain decreases Pain scale 3	Mild pain, Squeezing with ginger Pain scale 3	Mild pain decreases Pain scale 1
Qualit	Pain in the stab wound in both knees when moved suddenly	Know how to get rid of wrinkles when it comes to moving	Pain of a puncture When there is a lot of movement	Pain has reduced a lot, it's good to be active and painful	Pain of a puncture When there is a lot of movement	Pain has reduced a lot, it's good to be active and painful
Region	Both knees right leg send	Both knees of the right leg left	Both knees of the right leg left	Both knees of the right leg left	Both knees of the right leg left	Both knees of the right leg left
Severe	When the bait moves, the scale is 7	When there is a lot of movement, the pain scale is 5	If there is a lot of activity, Pain Scale 5If there is a lot of activity, Pain Scale 5	When the legs are forced to move serta saat banyak bergerak ,Skala nyeri 4	If there is a lot of activity, Pain Scale 3	When the legs are forced to move and the legs move a lot, scale 1
Time	Every move	Night or when it's cold	Night	Night	Night	Night

DISCUSSION

Based on the results of the study, it was found that the focus of the problem was obtained subjective data, namely Mrs. A, a 64-year-old elderly woman, said that currently the client's complaint complains of joint pain in the right and left knees, pain disappears such as punctures and heat, pain arises when walking, but not often, pain has been felt since 1 year this pain scale 7. Sejalan dengan Budiari et al., (2021) found a similar thing where the results of the client's study with the main complaint of chronic pain due to inflammation in gout arthritis of the elderly Mrs. A in Kalimantanong Village, Kec. Brang Ene, when the client was assessed said that his right leg was painful, the client said that the pain was accompanied by tingling, the client said the pain was felt like being stabbed, the client said that pain sometimes arises if you eat the wrong food, the client said that the pain disappears and, the client said it interferes with daily activities, the client said that he always rubs the balm on the pain area. The uric acid test when studied on November 16, 2020 was 8.2 mg/dl(12).

The incidence of gout increases in adult men aged ≥ 30 years and women after menopause or ≥ 50 years old who belong to the productive age group(13). So it was concluded that the results of the study were in line with the previous research theory to provide non-pharmacological techniques to reduce pain (warm compresses with ginger). Furthermore, the administration of warm water compresses is a nursing intervention applied by nurses. Another alternative inhibition phenomenon in carrying out treatment, one of

which is that complementary therapy with warm water compresses is recommended to reduce pain because it can relieve pain, increase muscle relaxation, increase circulation, increase psychological relaxation, and provide a sense of comfort.

The results of this study were found that after the implementation of the ginger warm compress, patients felt comfortable with pain that gradually decreased after being given a warm compress with a pain scale of 3. In line with Arisandy et al., (2023) The results of the evaluation in their study on patients 1 and 2 with chronic pain problems related to musculoskeletal disorders in the joints showed significant changes after the action of warm compresses of red ginger in patients 1 and 2, the pain was reduced and the patient felt comfortable and relieved, and his knees became easy to move. Results of Nurhasanah's research, (2021) through a *paired T test* statistical test showed an effect of reducing pain intensity before and after giving ginger compresses with $p\text{ value} = 0.000 < 0$ so that there was an effect between ginger compresses on reducing the pain intensity of rheumatoid arthritis in the elderly(14).

The results of data analysis by Gusman & Sopianto, (2019) showed that ginger was effective in reducing RA pain marked by an average RA pain scale before being given a mean ginger compress of 6.77 and after being given a mean ginger compress of 2.93 with an RA pain scale ($p\text{-value} = 0.000 < \hat{I} \pm = 0.05$) meaning that there was an effect of ginger compress on pain reduction in Mrs. A patients in Kalimantanong Village, Brang Ene District, PKM Brang Ene and advised health workers at the Health Center to provide input to Mrs. A's patients so that they can use ginger compresses as herbal medicine to reduce pain in RA patients(13). So in this case, the selection of interventions using ginger warm compresses is in line with the theory. Thus, ginger warm compress therapy is very helpful in the process of reducing pain and providing comfort to clients, so it is hoped that this therapy can be used as an alternative treatment to reduce morbidity.

CONCLUSION

After discussing the nursing care of gout arthritis in Mrs. A with chronic pain nursing problems, it was found that the results of the nursing care study in Mrs. A, an elderly person who experienced gout arthritis, all the data on the client obtained were in accordance with the theory. Mrs. A is known to have gout arthritis through signs and symptoms, namely sudden pain in the joints, disappearing with age. In nursing diagnosis, the results of the study were obtained from the client, namely several diagnoses with the priority of chronic pain nursing diagnosis The characteristic limitations that arise from pain appear 1 year, a pain scale of 7, pain in both knees, face grimace, the client is seen to protect the painful joint area, the client minimizes movement so that it does not hurt and regularly takes medication. Chronic pain nursing diagnosis is associated with chronic conditions due to rheumatoid arthritis

The nursing interventions carried out on the client were pain management and the administration of warm compresses using ginger boiled water. A warm compress intervention using ginger boiled water is a technique to reduce the symptoms of pain experienced by clients where the pain felt appears as a sign of gout arthritis. In the implementation of nursing carried out on clients with gout arthritis with chronic pain nursing

problems in accordance with existing interventions. Warm compresses on Mrs. A are carried out every day for 3 days. Warm compresses on Mrs. S were carried out every day for 2 days.

In nursing evaluation, it refers to the criteria for the results to be achieved. The criteria to be achieved for both clients are pain reduction or pain disappears (resolved). The results of the evaluation on the client with the achievement criteria of 3 criteria to be achieved, one of which is pain reduction on a different scale before and after implementation. The scale to be achieved in the client is in the range of 1-3. In Ny A shows a scale before implementation of 7 and after showing a pain scale of 3 and the client feels comfortable. So it is hoped that clinicians can carry out interventions independently if there are symptoms that appear in order to reduce the pain felt by using warm compresses, ginger soaking water can reduce the pain felt using ginger, which is an ingredient that is easy to get from the surrounding environment.

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