

Introduction: Osteoarthritis is the most common disease in the elderly, and its prevalence can be considered even higher than heart disease, blood pressure, and diabetes. Currently, osteoarthritis has no definitive treatment. And The aim of joint treatments is to relieve pain, maintain and improve joint function, reduce disability and patient dependence, reduce disease progression and accelerate joint recovery. This study was conducted with the aim of comparing the effect of rosemary and ginger ointment on pain and .physical performance of elderly people with osteoarthritis

Materials and methods: The research population in this study was elderly people with osteoarthritis who referred to the orthopedic clinic affiliated to Lorestan University of Medical Sciences in 2019-1400, among them there were 111 people with osteoarthritis degree 1 to 2 (based on Kellegren-Lawrence (K-L) grading scale and diagnosis of an orthopedic specialist) and inclusion and exclusion criteria were selected, and 37 people were considered in each group by random allocation. One group received ginger ointment and another group received rosemary ointment, 2 times a day, morning and evening for 14 days. control group received NSAID drug treatments. Pain and physical function of the elderly before and after the intervention was evaluated using visual pain scale VAS and WOMAC physical performance scale. Data analysis was done by paired t-tests, analysis of covariance and Tukey's test.

Findings: The research results showed that there is a significant difference between the average pain and physical performance score, before and after the intervention in the intervention groups ($p < 0.001$). Also, there is a significant difference between the average pain and physical performance score after the intervention in the intervention groups and control group ($p < 0.001$), but this difference between the two intervention groups (ginger and rosemary) was not significant ($p > 0.001$).

Discussion and conclusion: The findings of the present study showed that both ginger ointment and rosemary ointment can improve physical performance and reduce pain in the elderly with osteoarthritis.