شبكة المعلومات الجامعية

بسم الله الرحمن الرحيم

شبكة المعلومـــــات الجامعية

التوثيق الالكتروني والميكروفيلم

شبكة المعلومات الجامعية

جامعة عين شمس

التوثيق الالكتروني والميكروفيلم

قسم

نقسم بالله العظيم أن المادة التي تم توثيقها وتسجيلها
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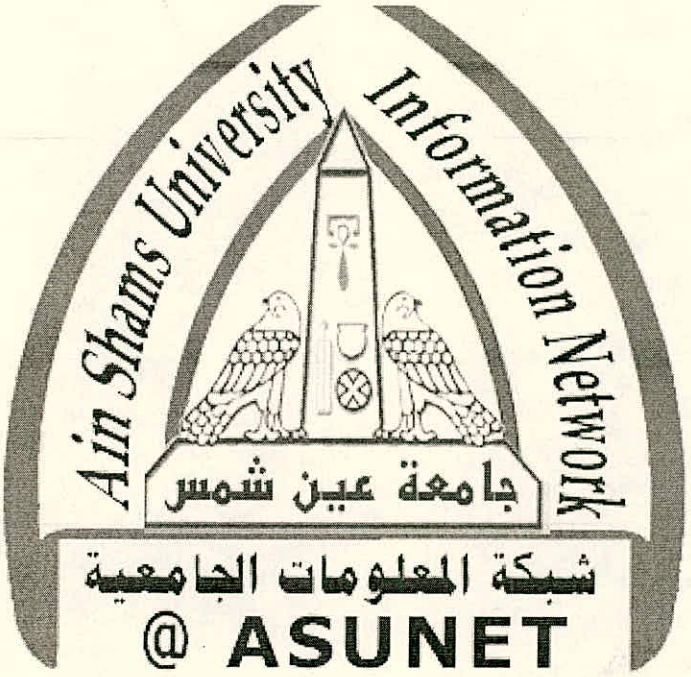

بعض الوثائق الأصلية تالفة

بالرسالة صفحات

لم ترد بالأصـــل

Randomized Double-Blind Clinical Trial for Assessment of The Efficacy of Low Level Laser Therapy in Patients with Knee Osteoarthritis

Thesis submitted to the Faculty of Medicine-Suez Canal university for the partial fulfillment of Master degree in

Rheumatology and Rehabilitation

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ABSTRACT

Introduction:

Osteoarthritis (OA) is one of the most common form of arthritis and a universal problem of human. Low level laser therapy (LLLT) was introduced as noninvasive treatment for OA several years ago, however its effectiveness is still controversial.

Objectives:

To evaluate the clinical efficacy of LLLT for OA of the knee in relieving pain, increasing range of motion, decreasing stiffness, and improving functional status.

Methods:

Randomized double blind clinical trial was used for evaluation. 62 subjects of both sexes with Knee OA were included in the study and were divide in two groups. 31 patients randomized to laser and 31 to placebo laser. In addition to laser all patients received health education to reduce weight, strengthening quadriceps exercise and paracetamol. Treatment duration was 4 weeks. Sum of function, pain, and stiffness subscores of Western Ontario Mc Master Universities Osteoarthritis Index (WOMAC), knee examination and body mass index (BMI) was done at initial visit, 2weeks, 4 weeks, and 8weeks after treatment. Results: LLLT had reduced pain by 75%, morning stiffness by 69%, and physical impairment by 65% compared to placebo. Outcomes of quadriceps muscles status, joint swelling and tenderness and joint stability did not show any difference between the two groups.

Conclusion:

LLLT yields functional benefits for pain, stiffness, and physical impairment for patients with Knee OA and may reduce the need for non-steroidal anti-inflammatory drugs with its side effects.

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