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# The Effect of Knee Osteoarthritis on Lumbar Proprioception

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**Abstract: Background:** Knee osteoarthritis (OA) is a common chronic disease affecting weight bearing joints. It alters kinetics and kinematics of all lower limb joints and lumbar spine.
**Purpose**: The purpose of this study was to study the effect of chronic knee osteoarthritis on lumbar proprioception.
**Methods:** Sixty subjects participated in the study. Their age were ranged between 40 and 60 years. The subjects were assigned into two equal groups; **Study group (A):** It was consisted of 30 chronic unilateral grade II knee osteoarthritic patients. **Control group (B):** It was consisted of 30 healthy subjects matched for age, sex, weight and height to the OA participants. Lumbar proprioception was measured by Biodex system III.
**Results**: There was a significant decrease in lumbar proprioception in the study group compared to control group where the level of significance was ($P<0.001$). he mean of the absolute angular error in the study group was 8.73± 5.31 while the mean of the absolute angular error in the study group was 1.33± 1.24.
**Conclusion:** There was a deficit of lumbar proprioception in chronic knee osteoarthritis.
**Key words:** lumbar proprioception, knee osteoarthritis, isokinetic.

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