

**EFEKTIVITAS *DYNAMIC NEUROMUSCULAR STABILIZATION*  
EXERCISE TERHADAP PENURUNAN NYERI PADA LANSIA DENGAN  
OSTEOARTHRITIS GENU DI RS PKU MUHAMMADIYAH JATINOM  
KLATEN**

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**ABSTRACT**

**Background:** *A pattern of muscle imbalance is seen clinically in osteoarthritis. Quadriceps weakness has been identified as a cause of osteoarthritis in the genu, a finding that links muscle imbalance and osteoarthritis. The DNS approach aims to exploit brain plasticity and reactivate the patient's dormant natural motor patterns thus stimulating global motor reactions minimizing muscle imbalance.*

**Objective:** *To determine the effectiveness of dynamic neuromuscular stabilization exercise on pain reduction in elderly with genu osteoarthritis.* **Methods:** *This type of research is quantitative research, a Quasy Experimental Pre-Post Test With Control Group Design with a sample of 50 subjects divided into 2 groups, namely 25 experimental groups and 25 control groups. The research instrument used questionnaires, interviews, and pain measurements with NRS. Dynamic Neuromuscular Stabilization Exercise intervention was carried out 2x a week for 4 weeks.* **Results:** *The results of this study showed that there was an effect on the experimental group between before and after the intervention, in the experimental group the NRS value ( $p=0.025$ ), while in the control group the NRS value ( $p=0.083$ ).* **Conclusion:** *There is an effect on the experimental group and there is a difference in the effect on the experimental group with the control group.*

**Keywords:** *osteoarthritis, pain, dynamic neuromuscular stabilization exercise.*