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STAND STRONG: CYCLIC YOGA FOR MUSCULOSKELTAL HEALTH

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Objective: This study examined the effects of 5 years continuous Cyclic Yoga training on bone density, bone formation marker, muscle mass, muscular strength, gait speed and SARC-F scale in postmenopausal women.
Methods: The style of Yoga used was Cyclic Yoga that is a new style in Hatta Yoga. In a case control study 36 postmenopausal women recruited in two groups that included 17 women in Yoga and 19 controls. The Yoga group participated in Cyclic Yoga training classes for > 5 years, 60 min per week and the age matched control group did not participate in any regular exercise programs.
Any chronic illness like auto immune disorders, cancers, neurological diseases and any conditions that under treatment with corticosteroids were excluded. A whole body dual energy X-ray absorptiometry scan was performed. The appendicular skeletal mass (ASM) was calculated and skeletal muscle index (SMI) was obtained as ASM/height^2. Grip strength using a hand dynamometer and 6-meter gait speed evaluated. Also, the SARC-F scale translated to Persian was applied to evaluate sarcopenia.
Results: There was not significant group difference in age (56±3.8 vs 56.6±4.7), BMI and SMI. BMD of all sites in Yoga group was higher than controls, although the differences did not reach statistical significance. Handgrip strength in Yoga group was significantly higher than controls. (23.3 ± 2.8 kg vs 20.4 ± 3.3 kg, p = 0.01). Likewise, gait speed in Yoga was faster than controls and PINP in Yoga was higher than controls. SARC-F scale in Yoga was significantly lower than controls. In multivariate analysis of variance after adjustment for age and BMI, Cyclic Yoga training directly associated with muscular strength (p=0.003), speed gait (p=0.001) and SARC-F scale (p=0.006).
Conclusions: Cyclic Yoga is a new style in Hatta Yoga that has been providing harmony of streaming cycle of poses to fortify the positive effects of each asana on muscular strength and flexibility. The results showed that regular long-term Cyclic Yoga program improved muscular strength, gait speed and SARC-F scale as well as bone formation marker. Cyclic yoga may recommend for the prevention of age related sarcopenia and osteoporosis in postmenopausal women.