

Effects of Chromium Supplementation and Resistive Training on Muscle Strength and Lean Body Mass in Untrained Men

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OBJECTIVES:

Chromium supplementation has been advocated as an aid in the development of muscle strength, lean body mass, and the reduction of body fat. To test its effects, 16 untrained males aged 50-75 years were randomly assigned to receive either a chromium supplement or a placebo during 12 weeks of progressive strength training. The subjects trained 3 times per week, performing 2 sets of 8-10 repetitions on 8 Keiser strength machines.

RESULTS:

Total body strength increased by 27% in the group taking chromium supplements and by 37% in the group taking a placebo. Lean body mass (assessed by HYDRO) and percent body fat, did not change significantly in either group as a result of strength training. The sum of 7 skinfold measurements also did not change significantly.

SUMMARY:

The researchers concluded that 12 weeks of chromium supplementation in conjunction with strength training does not increase lean body mass and muscle strength or decrease percent body fat in young, untrained males.

KEISER PIECES USED:

Leg press, chest press, leg curl, leg extension, lat pull down, shoulder press, upper back, hip abductor, triceps and abdominal machines.