



## Improving changes in anthropometric indices of older men with hypertension following concomitant consumption of saffron and resistance training

### Poster Presentation

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### Abstract

**Introduction:** Hypertension, especially essential hypertension, predominant over other risk factors such as diabetes as well as improper lifestyle and nutrition, is one of the leading causes of death among patients suffering from cardiovascular diseases, especially among middle-aged and elderly people in the world [1, 2]. The use of natural therapeutic approaches such as physical activity and herbs can be very helpful in treating this disease. The aim of this study was to determine the independent and combined effects of saffron and resistance training on blood pressure (BP) and some anthropometric indices in the elderly with hypertension.

**Methods:** This study was a randomized clinical trial on men aged 50-70 years who were assigned to a control group (CO) and three experimental groups (resistance training group (RT), saffron group (S), resistance training group + saffron (RTS) for 12 weeks. Anthropometric indicators and hemodynamic and biochemical variables were measured in 4 stages at weeks 0, 6, 12, and 18.

**Results:** Repeated measurements analysis of variance (ANOVA) on a significant level of  $P < 0.05$  showed that all blood pressure variables significantly decreased in treatment groups compared to the CO. We observed a significant change between groups for F% ( $p = 0.044$ ) and FM ( $p = 0.031$ ). In comparison to the CO, RT reduced F% and FM. There was only a significant decrease in FM in RTS compared to the CO. We observed a significant difference within groups for all indicators.

**Conclusion:** We suggest that saffron and resistance training independently and preferably in combination with each other may become a part of the non-pharmacological intervention strategy to lower BP in the elderly with hypertension. Also, such interventions can reduce some anthropometric indices associated with cardiovascular risk factors.

### Keywords

saffron; resistance training; hypertension; anthropometric indices; elderly men

### Reference:

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