Author's response to reviews

Title: Changes in the body posture of women occurring with aging

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Version: 4 Date: 21 January 2013

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Dear Sirs,

I would like to offer my manuscript entitled ‘Changes in the body posture of women occurring with aging’ for publication in BMC Geriatrics.

One of the current topics in the field of geriatrics, which still needs a great deal of study, is the issue of changes in the body posture that occurring with aging. The beginning of these symptoms can be observed between the ages of 40 and 50 years, and with the a slow progression initially that increases after 60 years of age. The aim of this study is to evaluate the parameters which characterize the posture of women over the age of 60 years, compared with the control group, and to determine the dynamics of the changes in the body posture in the following decades.

The research study included 260 randomly selected women. The studied group composed consisted of 130 women between the ages of 60-90 years (group I). The control group (group II) consisted of 130 women between the ages of with age of 20-25 years (posture stabilization period).

To evaluate the body posture, the photogrammetric method was used, based on the phenomenon of the projection chamber. The study was conducted according to generally accepted principles.

In the case of the parameters characterizing the individual slope curves, all of them show an increase with age, and the angle ALPHA angle is not of any significant difference between the groups (p = 0.6952). In the case of the BETA angle (p = 0.0033) and GAMMA angle, these differences had statistical significance (p = 0.0000). Also, the angle of the body showed an increase with age (p = 0.0000). The depth of thoracic kyphosis is significantly deepened with age (p = 0.0000), however, the angle of thoracic kyphosis decreased with age (p = 0.0000). Also, then increase in asymmetries was noticed, which was provided by significantly higher KLB (p = 0.0199) and UL (p = 0.0007) measurements in the group of older women. Observing the changes in the parameters describing the posture of the body in the next following decades, there was thean increase in the slope of the upper thoracic spine, the depth of thoracic kyphosis, the angle of lumbar lordosis, and the asymmetry of the shoulder blades. Other parameters did not have regular or significant trends.

All suggested changes has been done. We stated in the Methods section that written informed consent for participation in the study was obtained from participants. In Figure 1 legend, we indicated that we obtained patient consent to publish the image shown in Figure 1. Authors' Contributions section has been placed after Competing interests.

None of the authors declared any conflict of interests.

I look forward to the peer review and publication.

Sincerely,

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