



Comment on: sarcopenia and serum biomarkers of oxidative stress after a 6-month physical activity intervention in women with metastatic breast cancer—results from the ABLE feasibility trial

Irem Kirac Utku^{1,2} · Umut Safer¹

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Dear Editor,

We have read with great interest the article by Delrieu et al. reporting the positive effect of 6-month physical activity intervention on sarcopenia and serum biomarkers of oxidative stress in women with metastatic breast cancer [1]. As we know, the development of sarcopenia is accelerated in cancer patients due to metastasis, treatment and the idea of evaluating the improvement in sarcopenia levels and oxidative stress with a physical activity program is quite interesting. However, we would like to focus on some methodological issues of the article by Delrieu et al. Delrieu et al. made the definition of sarcopenia, based on single slice computed tomography (CT) analysis at the third lumbar (L3) vertebra. The cross-sectional area of the seven muscles of the L3 region (psoas, rector spinae, quadratus lumborum, transversus abdominus, external and internal obliques and rectus abdominus) was assessed by measuring the area. This method has been used a lot in studies, but its validity has not been fully approved [2]. It is not recommended in recent update of the Asian Working Group for Sarcopenia consensus, so muscle mass analyze based on single slice computed CT analysis is not the widely accepted methodology [3]. Because sarcopenia is a generalized process, and measurement of the regional muscle mass may not always represent the total body muscle. Moreover, muscle mass measurement single slice CT analysis requires the estimation of tissue Hounsfield unite attenuations which might easily vary between individual CT scanners and can be more

challenging when evaluating the contrast-enhanced images [4, 5]. Thus, to eliminate the factors, all CT analysis must be done in same CT scanners and only noncontrast-enhanced images must be evaluated to determine muscle mass.

We believe that readers of this article should consider these points when discussing current results.

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Declarations

Conflict of interest Irem Kirac Utku, and Umut Safer declare no conflict of interest.

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✉ Irem Kirac Utku
iremkrac@yahoo.com

¹ Department of Geriatric Medicine, Health Sciences University, Sancaktepe Prof. Dr. İlhan Varank Training and Research Hospital, Istanbul, Turkey

² Sancaktepe Şehit Prof. Dr. İlhan Varank Eğitim ve Araştırma Hastanesi, Emek Mahallesi, Namık Kemal Cad. No:54, Feriha Öz Acil Durum Hastanesi F8 Blok Palyatif Bakım Ünitesi Sancaktepe, Istanbul, Turkey

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