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Letter to the Editor

## Letter to the editor: Comment on "Body mass index and mini nutritional assessment-short form as predictors of in-geriatric hospital mortality in older adults with COVID-19"



Dear Editor.

I read with great interest the article by Kananen and colleagues that contributed greatly to our understanding of the relationship between body mass index (BMI), nutrition status, and in-hospital mortality among older adults hospitalized for coronavirus disease 2019 (COVID-19) [1]. The authors found that being underweight (BMI <18.5) and malnutrition increased the risk of in-hospital mortality after adjusting for some potential confounding factors, but being overweight and obese were not found to be associated with an increased risk of mortality in COVID-19 patients. Although there are studies examining the relationship between BMI and COVID-19 related mortality in the literature, this study is of paramount importance regarding the study population which consists of very old and people living with frailty. However, there may be some residual confounding factors to consider when interpreting the results of the study.

First, the authors didn't provide the detailed information about the nutrition therapy of the patients during the hospitalization. In a randomized multicenter study in which the majority of the study population consisted of older adults aged 75 years and older when compared to standard hospital meal alone, to reach protein and caloric goals in medical inpatients at nutritional risk early use of individualized nutritional support decreased the risk of mortality within 30 days (OR: 0.65, (0.47–0.91); p < 0.011) [2].

Second, among hospitalized older adults living with frailty, the co-existence of malnutrition and delirium could be high [3]. It is well-known that delirium is a frequent condition in older adults admitted for COVID-19 [4]. In a recent study, among patients aged 70 years older hospitalized for COVID-19, according to the regression analysis adjusted for age, gender, number of chronic

disease, frailty, and arterial blood oxygen saturation at admission, it was found that patients with delirium were four times more likely to die during the hospital stay compared to those without delirium [4].

In sum, this is a fascinating report, and it provides excellent insight into the prognostic value of BMI and malnutrition regarding in-hospital COVID-19 related mortality among older adults living with frailty. However, clarifying the above-mentioned points will help the readers to interpret the study findings accurately.

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