Prevalence of Depression among Oman Medical Specialty Board (OMSB) Residents

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Dear Editor

I read with great interest the paper published by Al-Houqani, et al in-March 2019 issue of the Oman Medical Journal,[1] which investigated the prevalence of depression among Oman Medical specialty Board residents. The results indicated that the prevalence of depression was 28.8% and the correlates were gender, level of residency, sleep duration and exercise.

However, there are a number of scientific and methodological limitations casting suspicions on the validity of the study results and its interpretation. Firstly, the authors stated in the introduction: "there are no studies addressing depression among medical residents in Oman". Al-Ghafri, et al, in 2014, had conducted a study to examine diagnostic validity of the Patient Health Questionnaire (PHQ-9) using an Omani medical resident population in order to establish a cut-off point.[2] Secondly, the cutoff scores for case-ness for depression are not valid on the study. The cut-off score of 12, rather than the employed 10, on the PHQ-9 has a sensitivity of 80.6% and a specificity of 94.0 for detecting the presence of depressive symptoms.[2] Hence, Al-Houqani, et al should have considered using 12 as a cutoff to ensure the diagnostic validity of the PHQ-9 among the current study sample. Thirdly, Fakhriya et al, did not take into account factors associated with

depressive symptoms such as chronic diseases, and stressors. Statistically, and since those factors were not included in the study questionnaire, they cannot be called confounders. They might be called other explanatory variables.[3] In fact, the possible confounders in Fakhriya et al study are one or more of associated factors resulted from the univariate analysis namely, gender, level of residency, sleep duration or exercise. To decipher the true independent variables and to adjust for potential confounding factors, the authors could have performed binary logistic regression analysis. Taking together, one could not make an interpretation of association between exposure and outcome variables depending merely on univariate analysis.[4]

References

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