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**RESPONSE TO LETTER** 

# Grit Scores: A Predictor of Medical School Success? [Response to Letter]

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## **Dear editor**

I thank Sharma et al for their interest in my work and putting efforts into writing an informative letter. In my study "Effects of Grit on the Academic Performance of Medical Students A Cross-Sectional Study at Majmaah University", it was observed that the mean grit score between students who repeated a year or more and non-repeaters had a statistical significance; however, this difference does not necessarily prove that grit score can be used for predicting whether a medical student will repeat a year or not, and no significant difference in mean grit scores was found between those who repeated 1 year only (n= 53, Mean grit score= 3.16, SD = 0.56) and those who repeated more than 1 year (n= 25, Mean grit score= 3.02) (p value= 0.87). Acknowledging the fact that academic performance depends on multiple factors, unlike other studies,<sup>1,2</sup> my study did not make any generalized claim, it just reports a significant difference in grit between repeaters and nonrepeaters. The fact that there is no significant difference in grit scores between one-year repeaters and multi-year repeaters could reflect that grit score has a cut off value of 3, below which it loses its predictive value; however, this study makes no claim about the predictive power of grit score, a different study design is needed to make such assertion. My study also did not suggest that grit score is specific to medical students or to academic performance. Grit is a "psychological construct" which reflects an individual's tendency for putting persistent efforts. It can be applied to different fields and domains. As is the case with other psychological constructs,<sup>3</sup> grit score of an individual can change with time; therefore, the study is indeed in agreement with the point mentioned by Sharma et al, as it was stated in the future prospective section of my study, longitudinal study design is needed to assess whether and how grit score changes along the years. Sharma et al also indicated the possible effect of differences in social support between local students and students from outside the city. Though such a point has its merit, in today's context when academic institutions are getting more and more global and diverse, I do not feel students' mobility is necessarily related to social status and will impact the academic performance adversely.<sup>4-6</sup> However, I agree that predictors of academic performance are multifactorial and it is important to address all confounding effects, including the ones mentioned by Sharma et al in their letter, before using grit as a predictive and selective tool. Most importantly, more studies from different

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## Disclosure

The author reports no conflicts of interest in this communication.

# References

- 1. Miller-Matero LR, Martinez S, MacLean L, Yaremchuk K, Ko AB. Grit: a predictor of medical student performance. *Educ Health* (*Abingdon*). 2018;31(2):109–113. doi:10.4103/efh.EfH\_152\_16
- Terry D, Peck B. Academic and clinical performance among nursing students: what's grit go to do with it? *Nurse Educ Today*. 2020;88:104371. doi:10.1016/j.nedt.2020.104371

- Alzahrani AM, Hakami A, AlHadi A, Batais MA, Alrasheed AA, Almigbal TH. The interplay between mindfulness, depression, stress and academic performance in medical students: a Saudi perspective. *PLoS One.* 2020;15(4):e0231088. doi:10.1371/journal.pone.0231088
- Rienties B, Beausaert S, Grohnert T, Niemantsverdriet S, Kommers P. Understanding academic performance of international students: the role of ethnicity, academic and social integration. *High Educ*. 2012;63(6):685–700. doi:10.1007/s10734-011-9468-1
- Faisal R, Shinwari L, Mateen H. Evaluation of the academic achievement of rural versus urban undergraduate medical students in pharmacology examinations. *Asian Pac J Reprod.* 2016;5(4):317–320. doi:10.1016/j.apjr.2016.06.002
- Bianchi F, Stobbe K, Eva K. Comparing academic performance of medical students in distributed learning sites: the McMaster experience. *Med Teach*. 2008;30:67–71. doi:10.1080/0142159070 1754144

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