

Commentary: “Responsible Research Assessment: Implementing DORA for hiring and promotion in psychology”

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A commentary on: Gärtner et al., 2022; Schönbrodt et al., 2022

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In the second paper, Gärtner et al. (2022) provide a specific ready-to-use evaluation scheme for publications, data sets and research software in which they also propose a scoring system for empirical papers. Generally speaking, I endorse this kind of evaluation because it covers important aspects that need to be promoted such as adhering to open science practices and preregistration. Besides, making the candidates responsible of providing assessment details means that it can be easily adopted by committees.

My main concerns are, however, related to the evaluation of the publications that are not empirical. First, I think that this scoring system might as well apply to the paper type “Meta-Analysis” (which I suggest re-naming it to “Systematic Review/Meta-analysis”), since many items do apply for these publications. For example, a systematic review with or without meta-analysis can be preregistered and can have open reproducible data as well as open reproducible scripts (López-Nicolás et al., 2022; Polanin et al., 2020). Besides, for these publications, I suggest adding an item for the Phase I algorithm regarding the adherence to the PRISMA guidelines. Following the well-established PRISMA guidelines should be rewarded because it guarantees the transparency of the review and it contains many items that, if performed, improve the quality of the systematic review/meta-analysis (e.g., assessing publication bias, risk of bias of primary studies, strength of the evidence, or the robustness of the results). Alternatively, because a review might comply with some but not all the aspects from the PRISMA guidelines, we could include the PRISMA items separately in the actual scheme. Lastly, I also think that simulation studies could be evaluated using some of these scoring items, such as preregistration (Crüwell and Evans, 2021; Ioannidis, 2022) and open reproducible scripts. Extending the scoring system beyond empirical publications may help overcome some problems that I detail in the next paragraph.

Another concern is that it is not clear how you would evaluate researchers with different types of research,

and I think it will be especially problematic in situations where applicants’ best papers are not empirical (which, in my opinion, will not be uncommon). For example, imagine a situation in which you want to hire an ‘early career researcher’. Applicant 1 has 3 first-authored papers, 2 of them empirical works and the other one being a meta-analysis, theoretical paper, or a simulation study (articles that cannot be scored). Besides, there are 5 applicants more, each one with at least 3 first-authored empirical papers. Considering that the meta-analysis/theoretical study/simulation study is of equal or greater quality, how would we evaluate Applicant 1? How could we ensure that Applicant 1 passes the threshold and is considered for Phase 2? I acknowledge that using this evaluation scheme is better than current practices and it serves to illustrate the methodological practices of the researchers, however, I think that a scheme that only uses the scores of empirical publications to pass a certain threshold could be misleading and unfair.

Lastly, regarding item 19 of the evaluation scheme for publications, I also want to note that an in-depth discussion of the citation of an article can be very challenging even if we only consider a short period of time. For example, what does it mean that a paper from 2019 has 15 citations? Is that a relevant number for a publication that is 3 years old or is it just average? Besides, we have to be careful because citations can be influenced by factors such as the author’s prominence or the journal where the work is being published — where papers published in high IF journals might attract more attention and citations. Therefore, if we are willing to discuss citations, to make sense of the citation count we should, at least, have some reference such as the median of citations of a publication in a particular field, considering the year of publication (e.g., articles published in 2019 in psychology had a median citation of 6). Another option could be examining a normalized citation count such as the citation percentile of an article, which can be calculated taking into account the year and field it was published (Bornmann and Marx, 2013, 2014). This in-

formation is currently provided by the Clarivate InCites product, which calculates the percentile of each article considering the year, field, and the type of document (Clarivate, 2022). Additionally, their Essential Science Indicators (Clarivate, 2021) provide “Field Baselines” that show percentiles for each field and year, which can also guide the interpretation of citations. However, to my knowledge, there is no alternative method to get this information easily and I see why authors could be reluctant to use any proprietary tool that is not fully transparent. Nonetheless, even if percentiles are not discussed, I think that this potential problem should be, at least, explicitly addressed and considered when assessing the citation of an article.

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Open Science Practices

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