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Manuscript Submission: "The Implicit Relational Assessment Procedure demonstrates poor internal consistency and test-retest reliability: A meta-analysis"

Dear Prof Levin,

Please find attached our manuscript "The Implicit Relational Assessment Procedure demonstrates poor internal consistency and test-retest reliability: A meta-analysis".

The IRAP is of clear interest to CBS. Its psychometric properties have been studied in two previous meta analyses (Golijani-Moghaddam, Hart & Dawson, 2013; Greenwald & Lai, 2020), but both of these suffer from three issues: small sample size, potential publication bias in the studies they consider, and less than gold standard statistical methods.

In this manuscript, we address all three of these by combining all IRAP data we have collected over the past ten years in our two separate labs to conduct a file-drawer individual-participant-data meta analysis. Our sample size is roughly double that *N* of the entire published IRAP literature to date. Furthermore, this data and all code is completely open source for others to check or use for their own novel purposes.

Our method is both comprehensive and informative. We include multiple robustness tests, as well as multiple metrics of reliability in order both compare our result to estimates in previous articles, and give our best estimate of the true effect.

We explore multiple constructive ways in which the IRAP's reliability could be improve. These are tested using the available data using multilevel moderator meta analyses.

Whereas Vahey et al.'s (2015) meta-analysis of the IRAP's criterion validity concluded that the task has "potential for clinical assessment", we find that the IRAP's internal consistency is poor (α = .51) and its test-retest reliability is unacceptably low (ICC = .21). Our results therefore have implications for both the interpretation of published research and the planning of future studies using the IRAP.



We hope that this manuscript will be of great interest to your readers given CBS's close ties to the IRAP.

Kind regards,

Ian Hussey &

Chad Drake