January 20, 2018

Dear Professor Anderson,

I have now received reports from three reviewers and Annette Brown regarding your manuscript, "'Should you choose to do so… A replication paradigm," (*Manuscript Number 2345; Discussion Paper Number 2017-79*).

Based on the feedback I have received, I am inviting you to submit a revision. Your revision should address the individual points raised by each of the reviewers. In addition, you should include a separate document that provides a point-by-point response to each of the reviewer's comments. You are not required to do everything the reviewers say, but if you disagree with a recommendation, you should state your reason. A successful revision will include addressing the following:

1) Annette Brown finds that "your long example from your Dewald et al. (1986) work to be distracting." I agree. Either drop this section entirely, or use some of the material sparingly to illustrate the importance of data vintages. Focus on the Payne and Waters (2008) study.

2) Several of the reviewers note that there is confusion/vagueness about what exactly you have in mind when you use the word "replication" (see, for example, Reviewer 2). Your understanding of the type of replication you plan to do requires elaboration. Accordingly, you may find the taxonomy below useful (Reed, W.R., 2017, Replication in labor economics, *IZA World of Labor*, 2017:413, doi: 10.15185/izawol.413). Since you don't have the author's data and code, if all you are trying to do is obtain the same results as PW (2008), then that would make your study a Type (3) replication. On the other hand, you talk about checking for robustness assuming a different structural break point. That is characteristic of a Type (4) replication. A revision should clarify what type of replication you intend to do, and why.

Figure 1. Six different kinds of replications

Measurement and/or analysis	Source of data/population		
	Same data set	Same population	Different population
Same	(1) Reproduction	(3) Repetition	(5) Extension
Different	(2) Robustness analysis —same data set	(4) Robustness analysis —same population	(6) Robustness analysis —different population

Source: Author's own compilation.

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3) Annette Brown raises concerns around your discussion of "reverse engineering." In particular, "reverse engineering" should not be the starting point of a replication. Rather, it is what one does after one is unable to reproduce the results of the original study. It is analogous to debugging a program after one finds that it doesn't work. You should revise your discussion of "reverse engineering" accordingly.

4) More generally, your discussion of a "replication paradigm" suggests a one-size-fits-all approach to replications. Like Reviewer 3, I am uncomfortable with this approach. In your revision, scale back your "replication paradigm" to fit PW (2008). In doing so, be more specific. What parameters would you focus on? For example, in your discussion of "replication paradigm" on pages 9f., parts (1) and (2) list hypotheses and econometric methods. Do the hypotheses map onto specific parameters in the estimation? If so, which ones? How would you determine if your results were different from PW (2008)? Are you mostly concerned with confirming PW (2008), or with determining whether their results are robust? This relates to Comment 2) above.

5) Relatedly, how do you incorporate your following statement into your "replication paradigm?": "failure to replicate in any part of the analysis must call into question all inferences in the analysis" (page 11). So if all the key estimates are exactly reproduced, but the authors report a different constant value than you estimate, then all the inferences in the analysis are suspect? Do you really believe that? And what does one do with that? Conclude that the replication of PW (2008) is "unsuccessful?" This deserves elaboration because it gets at the heart of how one should interpret the results from a replication.

A revision that satisfactorily addresses the points above, as well as responding to the individual reviewers' concerns, is likely to result in a favourable publication decision.

Thank you for submitting your manuscript to *Economics: The Open-Access, Open-Assessment E-Journal.* I look forward to receiving your revision.

Sincerely,

W. Robert Reed
Co-Editor, *Economics E-Journal*