Author's response to reviews

Title: A Framework and a Measurement Instrument for Sustainability of Work Practices in Long-term Care

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Version: 4 Date: 15 July 2011

Author's response to reviews: see over
July 15, 2011

Subject: revision MS 1057825001384705

Dear dr. Marshall,

We hereby send you our revised manuscript ‘A Framework and a Measurement Instrument for Sustainability of Work Practices in Long-term Care’.

Thank you for the opportunity for a third revision, we feel that the manuscript really improved. Below you find a point-by-point response to the reviews.

Sincerely,

Sarah-Sue Slaghuis M.Sc.

**Reviewer’s report**

**Title:** A Framework and a Measurement Instrument for Sustainability of Work Practices in Long-term Care  
**Version:** 2  
**Date:** 5 April 2011  
**Reviewer:** Greta Cummings  
**Reviewer’s report:**  
MS: 1057825001384705

Re-review  
The authors have attempted to address all of the recommendations of the reviewers, which is appropriate. However, in some cases this has made the manuscript unwieldy and actually more confusing. For example, now the authors report a large number of fit indices for their analyses, yet do so uncritically. I suggest that the authors be clear on the indices that they use to assess the SEM models particularly. See Hayduk et al (2007) in Personality and Individual Differences. I also suggest that the authors work through the manuscript to shorten and tighten each section.
We agree with your advice to shorten and tighten the manuscript. We have cut down the number of fit indices to only four commonly reported indices, recommended by Kline (2005): the -2 log likelihood, RMSEA, CFI and the SRMR. In Appendix III, we also report TLI/NNFI values that strongly resemble the already reported CFI, as requested previously by one of the reviewers. Concerning the interpretation of the fit indices, we provided brief descriptions in each phase of the analyses.

The authors have responded to my query about the unit of analysis and indicated that ICCs were completed and provided. The authors decided to continue to analyze at the individual level. I was unable to find the ICCs in the tables and additional files provided. Without this, I am still suspicious that the data may be more highly correlated within teams than unadjusted between individuals from multiple disciplines across the organization.

We computed intra class coefficients for the two dimensions, routinization and institutionalization (these are reported in the methods section) and for the subscales (these are listed in a file attached to the review). The results show no significant correlations on the level of teams. In connection with this issue, we emphasize that on average only 1.6 persons per team participated. Therefore, we are not surprised not to find a significant correlation. Finally, we note that in a multilevel model the standard errors will be lower than in the individual model but the factor loadings will be similar in value. Since team sizes in our sample are small, the bias in parameter estimates and fit statistics will be small (Muthen 1994). This means that item selection can be considered robust even in light of potential team level variance. We can therefore reassure you that high correlations are not only very unlikely; also, they are not a threat to our results on the psychometric level.

Results and Table 3: The results do not contain testing information for model 3 (short version). It’s not clear why this was not added since it is offered as an option. Providing shorter versions that are psychometrically sound for use in busy healthcare work places is important to reduce respondent burden.

We agree that more information on the short version is needed given its potential importance. The results for the short version were added.
Discussion: It is not clear what the authors mean by the results being "productive". Nor how the authors distinguish the optimal version from the short version. Which is preferred and in what setting?

Thank you for pointing this out. We feel that the names of the versions may have created some confusion (perhaps using the word ‘optimal’ was unclear: we meant ‘optimal selection of items’). We have renamed the versions to:
1) Long version- derived from the original set of items
2) Short version
The short version is indeed important, since in many settings it might be preferable to use 30 items instead of 40 items. We have also added the correlation coefficients between the long and the short version for each subscale. The correlation coefficients indicate that the short version is equally suited. This is also described in the discussion/conclusion.

Some of the discussion points actually speak against the validity and reliability of the tool and would be better in the limitations. For example, the first paragraph on page 25 speaks to issues with reliability.

Thank you for pointing this out. The discussion was revised.

English - sample size is "small", not low.

The error has been corrected.

Table 1: The subtitles for average work week, number of years in the organization, and position should reflect frequency and %, rather than mean and SD.

The table has been corrected.

Also the % for Gender does not add up to 100%.
The table has been corrected.

Additional file 1 - also not clear why short version is not shown.

The short version has been included.

**Level of interest:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Needs some language corrections before being published

**Statistical review:** Yes, and I have assessed the statistics in my report.

**Declaration of competing interests:**
I declare that I have no competing interests

**Reviewer's report**

**Title:** A Framework and a Measurement Instrument for Sustainability of Work Practices in Long-term Care

**Version:** 2 Date: 30 March 2011

**Reviewer:** Michel D¿ckers

**Reviewer's report:**
The authors have responded sufficiently to my earlier comments. Additional information on the analyses is given and limitations can be found in the manuscript. I think this measurement instrument provides a basis for further testing.

One minor essential revision: the authors should mention explicitly that several fit-measures (CFI, NNFI/TLI) are fairly low. Readers not familiar with this type of analysis need to be well-informed.

*In line with the request in the other review, we have added descriptions of the interpretations of the fit indices for each modeling phase and in the discussion/conclusion we further assess the model fit in relation to future testing of the measurement instrument.*
**Level of interest:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Acceptable

**Statistical review:** No, the manuscript does not need to be seen by a statistician.

**Declaration of competing interests:**
I declare that I have no competing interests