Author's response to reviews

Title: Psychometric properties of Greek versions of the Dental Fear Survey (DFS) and the Modified Corah Dental Anxiety Scale (MDAS)

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Reply to the reviewers

We thank the two reviewers for their careful reading of our manuscript. We appreciate the thoughtful questions and suggestions they have provided. We have made the requested changes to the manuscript. All changes (except in References) are in italics.

One reviewer suggested that we correlate the dentists' ratings with the questionnaire results (rather than use ANOVA). Separately, the reviewer asked us to include the means (rather than the F values) in the text. We agree, and have included this information in the paper. This reviewer also asked for more information about the anxiety and cooperation ratings, including whether one was more highly correlated with the patient scores than the other, and also whether the two ratings were similar with one another. We have added additional information about the ratings, including summary statistics (such as the means) and the correlation coefficient for the two ratings. After the primary analyses between dentists' ratings and patients' questionnaire scores, we examined the possible gender differences on the dentists' ratings. The t-tests revealed that there was a trend for dentists to rate females as being more anxious during treatment, and this seemed to be the reason why the anxiety ratings were more highly correlated with the questionnaire scores than the cooperation ratings were. Although the two ratings were highly correlated with one another, it seems that they may be operating differently in males and females.

This reviewer asked us to include a legend in the tables to help readers understand the summary scores. She also suggested including this information in
the text of the Results section, as well as repeating the means there. We have made these changes.

The second reviewer asked us to rework the last paragraph of the Background section, pointing out that as originally written part of it is not relevant to the hypotheses. Elsewhere, this reviewer also asked us to include some references to cultural differences in dental fear. Third, the reviewer asked if we could provide more information about why we carried out the study, rather than simply stating that it is desirable to study questionnaires in new languages. We agree with these points. We have added a paragraph to the Background section which briefly describes some cross-cultural differences in the numbers of patients with dental fears, as well as the particular stimuli which they find most frightening. Secondly, we have reworked the final paragraph to state that there is a need for Greek dentists and dental researchers to have valid measures of dental fear in Greek.

This reviewer also asked for additional information on the patients seen in the university dental clinics. We have provided some information on the kind of dental treatments they were most likely scheduled for, as well as more information about how they were selected to be appropriate for this part of the study.

Similar to the first reviewer, the second reviewer also requested that the F values be taken out of the second paragraph in the Results section. Further, this reviewer suggested moving them to a Table. In this section of the Results, we are presenting the findings concerning the dentists’ ratings and the patients’ questionnaire scores. The ANOVAs have been replaced by correlations. In keeping with this reviewer’s recommendation, we have also added a new Table which provides the overall correlations between the dentists’ ratings and the two fear questionnaires, as well as the correlations separately for males and females.

The reviewer also pointed out that the Conclusion was weak and followed too closely from the opening sentence in the Discussion. Accordingly, we have rewritten the Conclusion.

This reviewer asked us to avoid beginning a paragraph with a phrase which refers back to an earlier paragraph. We have rewritten these sentences so that they no longer refer to earlier paragraphs.

In the Background section, the reviewer suggested that we leave off the names of the scale developers (Corah, Kleinknecht et al.), and we have done so. He also suggests including the original 1973 paper by Kleinknecht, Klepac and Alexander, as it is the first paper referring to the DFS. This reference (#13) was included in our original manuscript, at the beginning of the paragraph where we described the history, content, and various translations of the scale, and we have not altered this in this revision. We hope that we have clearly referred to this important paper in our manuscript.

We thank the reviewer for catching our varied use of the “0” in front of the
decimal point, and have added a zero where it was missing before.

As requested, we have changed “internal reliability” to “internal consistency”.

We have rounded the statistics about age to one decimal place.

The reviewer pointed out that we had neglected to clarify that a difference was statistically significant, as well as that we are referring to the results with Greek versions of the questionnaires, in a few places, and we have made these corrections.

In the Discussion, the reviewer asked us to provide references for the statement beginning “As other authors have commented…” The references are the same as those referred to in the next sentence. To clarify, we have added the references to the sentence the reviewer commented on.

The new analyses on the dentists’ ratings revealed a trend for the dentists to rate the females as more anxious. However, the new analyses do not indicate that the cooperation ratings were stronger for the males. Thus we have rewritten our thoughts about possible gender differences considerably, and have removed the information suggesting that Greek men are socialized not to display anxiety.

The reviewer also pointed out that the last paragraph in the Discussion appeared to contain information about two topics, test-retest and loss to follow-up. We have rewritten the beginning of this paragraph slightly, to indicate that, although we did have very strong test-retest results with those who completed the questionnaire twice, our high attrition rate is a potential concern.

Finally, this reviewer also found some mistakes in the References, which we have corrected.