Reviewer’s report

Title: A yoga intervention for diabetes risk reduction: A pilot randomized controlled trial

Version: 2 Date: 2 December 2013

Reviewer: Heidemarie Haller

Reviewer’s report:

The authors report on an interesting pilot study of yoga for diabetes risk reduction in India. Although the data were collected in 2004, even in 2013 the topic’s currency remains. The article provides comprehensive laboratory in combination with patients’ self-report data, which are of high interest. However there are some major concerns before it can be recommended for publication.

Major Compulsory Revisions

1. Methods: The authors should state why the study was described as randomized in the manuscript and as non-randomized in the study protocol registered at ClinicalTrials.gov. Also the duration of the intervention period differs between manuscript and study protocol (8 weeks versus 3 months). The authors should also state why so many outcome measures were chosen as primary outcomes, which limits the interpretation of study results. When more than one primary outcome was chosen the adjustment of the alpha-level is required. It would have been better to choose only one primary outcome or because it is a pilot trial to investigate all outcomes exploratory.

2. Results: As FBG was described as a primary outcome, it is not comprehensible why authors excluded 6 participants from analysis whose FBG was normal or elevated after the intervention period. According to ITT, all included and randomized participants should be analyzed. Additionally, the order of reporting between-group-comparisons and within-group-comparisons should be changed, because within-group-comparisons are not of so much interest within an RCT.

3. Discussion: The discussion should be adjusted according to the new statistics.

Minor Essential Revisions

1. Abstract: The authors should restructure the abstract. Information about primary outcomes, which are completely missing, should be placed in the method section as well as secondary outcomes, which should not be part of the background. When there is lack of space, it is also sufficient to describe full randomization procedure only in the main manuscript.

2. Introduction: Detailed description of primary and secondary outcome measures should be removed, because they are also described in the method section.

3. Tables: Baseline Characteristics (Table 2) should be reported of all
randomizes participants (21+20) and of the total sample size (n= 41) in an additional column. In Table 3, it is not statistically correct to present p-values of several alpha-levels for the within group changes. The alpha-level should always be fixed before the statistical test. Results with p-values of p<.05 are not more statistically significant than results with p<.001 or even smaller p-values. Please add 95% CIs for Cohen’s D. In Figure 1, please check the n of the first and second screen, one of this is not correct.

Level of interest: An article of importance in its field

Quality of written English: Acceptable

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

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