Author’s response to reviews

Title: A Logistic Regression Analysis of Risk Factors in ME/CFS Pathogenesis

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RESPONSE TO EDITOR AND REVIEWERS

We would like to thank the editor and reviewers for their suggestions and the opportunity to improve our paper.

To address the queries from the Reviewer 4, we comprehensively revisited our statistical analysis with the enormous help of a colleague biostatistician, and who for this reason is now acknowledged as a co-author.

After re-running the analysis with the statistical approach described, we observed minor changes in the results, which are highlighted in the Tables 4 and 5. One of the risk factors – i.e. prior immunisations, did not show statistical significance in the re-analysis, and we edited the text accordingly. We also removed Figures 1 and 2 from the manuscript, to be coherent with the changes. Furthermore, we now explain the results comparing ME/CFS mild/moderate and severe in the text, as the previous table was not very informative.

Our point-by-point responses to the reviewers’ comments are stated below, and the pages and lines refer to the manuscript where the changes made are highlighted.

Response to Reviewer 2

1. We acknowledge that we have misunderstood the reviewer’s argument about gender differences in seeking medical care, which now is clearer to us, and which we agree with. This point is now briefly considered in page 12, lines 2-7.

2. Inserted clarification on page 10, lines 7-8.

3. Inserted clarification on page 13, lines 22-23, and 26-27.
Response to Reviewer 4

1. We changed the title as suggested.

2. The research question is clarified in page 5, line 4.

3. We now present Table 2, with participants characteristics, by each variable considered within the distinct domains in page 8, lines 11-12.

4. The descriptive Table 2 also addresses the coding of data.

5. Further description of the data analysis is provided in page 7, lines 10-21, and we addressed the additional points in the section Strengths and Limitations, page 16, lines 7–19.

6. We argue that in multivariable analysis is not uncommon to include the variables associated with the outcome at a significance level of 0.10, in the initial model, and from then to proceed the mathematical modelling using the significance level of 0.05.

With kind regards,

Eliana Lacerda, MD, PhD