Review

Dine Mamadou

5/8/2018

Review #1:Nate's Final Project

I like how he presented his three hypotheses at the onset of the paper. The table of descriptive stitistics also provides the reader with an overview of the general tendences. In the text, however, the interpretation of the table would have been more complete, had it included the standard deviations of the mean.

I like the comment made about Figure1, it gets to the heart of what is going on. Should there be a mention, in this part, of what the reported numbers means, since they're log transformed? I like the interpretation of the second table (months of the year) as well. I think it would be even more complete if the F-statistics and R^2 were reported. How can we make the mention of the inverse logit less technical, i.e talking about it without having to mention it as it can be a little technical especially in a paper that is destined for an audience of non statisticians.

The interpretation of Figure3 where the >35% threshold was tested shows a deep undertanding by the author, of what seems to be a contradiction between the descriptive stats and Figure3: the scarcity of cases at/above that threshold did seem to have been offset by the larger number of cases below the threshold. The interpretation that lead to the failure to reject the first two hypothese and to reject the third hypothesis were accurate although the third one was not intuitive at all. I suggest creating another plot (geom_point, preferably) of the data to shows the distribution of these cases relative to the >35% threshold in order to support the rejection of the third hypothesis. The experiment is reproducible if the data is provided. An attempt in this direction, however will need to provide more information on how the data was collected by that Korean website. Additionally, a reproduction of this work will need a second (preferably lower) threshold.

Good Job overall!

Review #1:Chris' Lithuanian stress

I'd like to begin by saying that this a deeply thoughful analysis overall with a rigoriously layed out statistical analysis and interpretation. More specifically, i like how you started off presenting the assumptions in the literature that you set out to investigate. Also, your motives for the types of frame sentence you used were clear and left no room for chance. The stimuli were meticulously chosen and motivated as well. All four hypotheses were clearly stated and were formulated in support of the claims in the literature in an attempt to give them all chances of "winning."

As far as the statistics is concerned, the linear mixed effect is indeed the way to go in this case in order to accommodate both main and random effects. My only question in this part is, does the lme model reveal instances of interaction, say between a predictor and a categorial variable included in the model as a random effect variable? Also, is there a rational behind the choice of 0.05 as the alpha level? Are there in the literature, papers on similar studies that can be quoted to support the use of that alpha level? I like how you separated the acoustic correlates of stress in your results presentation. Doing so certainly facilitated exposition (on your side) but most importantly made it possible for the reader to follow more easily. In each case when there is significance, all the statistics are clearly given along with some kind of descriptive stats in the text, which made it very pleasant to read.

In the section dedicated to F1 and F2 values of the [i] and [u], I like how you presented the trends we expect to see in case these potential acoustic correlates turn out to show significance. I also very much liked the assessment of the cumulative reliability of the linear mixed effect models. This is something new for me but it answered one of the questions that i've been struggling to formulate. using this *glmer()* function, did you

have to dummy code your two level categorial criterion? Finally, although I personally prefer having the figures and plots in-text, having them at the end makes it easy to follow and allows for more figures too.

This was a great and thorough work and will make any reproduction so easy to do.