Comments to the Author

Review of the preregistration "Are the more flexible great-tailed grackles also better at inhibition?"

This is an interesting proposal which has the potential to answer very important questions about a topic critical to behavioral ecology – the role that inhibition may (or may not) play in the evolution of behavioral flexibility.

The authors provide a brief introduction to the project, focused hypotheses/ predictions, and great detail about their project timeline and methods. My comments for each section are below:

- Abstract.
    - The background makes it seem like the goal of this project will be to test if our test-based measures of behavioral flexibility can reliably predict realized behavioral flexibility (i.e. answering the question – can we use tests of behavioral flexibility in order to predict a species' ability to move into a new environment)? However, the goal of this project is to test whether or not behavioral flexibility predicts inhibition and the consistency of relevant tests. I suggest restructuring the abstract to reflect the goals of this project – they need to explicitly address why linking behavioral flexibility to inhibition is interesting and important to their overall question.
- Predictions.
    - P1 is well structured, as are the alternatives. However, if the hypothesis is that "flexibility requires inhibition", then they should test whether or not inhibition predicts flexibility (rather than the other way around).
    - P2 does not follow from the hypothesis – I suggest switching P2 with its alternative to maintain a consistent structure.
    - The authors should explain why the go-no go test is being validated against the delayed gratification test (rather than against the detour test or vice versa).
    - P3 needs to be restructured to follow that of P1 – include P3 and alternatives separately.
- Methods.
    - As written, the methods and analysis plan are difficult to follow. I suggest organizing the methods per prediction (i.e. listing the dependent/independent variables under each section).