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Dr. Marian Turner  
Senior Editor

*Nature Ecology & Evolution*

Dear Dr. Marian Turner,

Thank you for giving us the opportunity to submit a revised version of our ms “Global drivers and vulnerability of coral reef fish functions” (NATECOLEVOL-210212936A). Please, note that we changed the title to “Biological trade-offs underlie coral reef ecosystem functioning”. We are pleased that the reviewers found our paper to be useful and timely, and we have carefully addressed all comments and concerns raised by the three reviewers.

In this revised manuscript, we added a results section, provided the requested details in the methods sections, and reframed the introduction and discussion as suggested by the reviewers. We also reran our models using a multivariate framework, including random effects for localities and sites as recommended by reviewer 1. Furthermore, we removed the analysis using vulnerability scores as suggested by reviewer 2, and we added a note on the management implications of our work in the discussion.

We believe that the revisions greatly improved our manuscript and we believe the paper is now suited for publication in *Nature Ecology & Evolution*. Using a novel, integrative approach across the world’s coral reefs, we provide the first global analysis of multiple functions on reefs (beyond biomass as a proxy). In a time where global human stressors threaten coral reefs, it is urgent to increase our understanding of coral reef functioning in order to improve conservation management. Our paper offers a new perspective on coral reef functioning by revealing striking trade-offs among functions. We believe this study will be of great interest to a wide array of scientists, policy makers, conservation practitioners, and the general public.

Thank you for your consideration. We look forward to your response.

Kind regards,

Nina Schiettekatte, on behalf of all the authors

