

Review of: "Estimates of Atlantic Goliath Grouper (*Epinephelus Itajara*) Bycatch Mortality in Commercial Fisheries of the Southeastern Us From 2002 to 2022"

Brad E. Erisman¹

¹ National Oceanic and Atmospheric Administration

Potential competing interests: No potential competing interests to declare.

This study makes a significant contribution to the understanding of the impacts of bycatch on Goliath Grouper populations. Given all the threats to their populations, and in light of the opening of a juvenile fishery and what seems to be a rising trend in recreational fishers targeting large adults for sport (see any YouTube fishing video from Florida in recent years), this information is important for management and public awareness.

I have no major comments on the paper. It is well-written and organized, the methods are sound, and the conclusions are straightforward and reasonable. The authors used a practical and rational approach to estimate bycatch mortality to inform regional and federal management.

I have only one minor comment, which is the relationship between capture depth and year (Figure 6) isn't clear. I see there is a significant p-value, but that is a consequence of the very large sample size (13k samples). The effect size (r-squared value) indicates there is no effect, and there is no clear pattern from looking at the data on the graph.