
Integration of feedbacks among global change drivers, biodiversity measurements and ecosystem services through meta-analysis.

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Abstract

Global change drivers comprise climate change, habitat change, pollution and over-exploitation, among others. Biodiversity plays an important role in the maintenance and resilience of ecosystems to global change. While there are numerous studies reporting the effects of these drivers in changes in biodiversity levels and disruption of ecosystem services, data is reported in heterogeneous ways and remains largely scattered. Moreover, there are synergistic effects of global change drivers for which is necessary to also look at feedbacks and interactions as opposed to studying them in isolation. In this short communication, I will show progress towards understanding the feedback effects at different scales between land use change, species richness and net primary productivity. With a preliminary meta-analysis at global scales, I integrate data on the effects among these variables between the years 2000-2016 in order to report a net effect and highlight global patterns hard to appreciate with non-quantitative, non-integrative reviews.

Keywords: global change, biodiversity, ES, meta, analysis, integration, data sharing

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