

Interactive comment on "Lagged effects dominate the inter-annual variability of the 2010–2015 tropical carbon balance" by A. Anthony Bloom et al.

Andreas Ibrom (Editor)

anib@env.dtu.dk

Received and published: 11 March 2020

Dear Reviewer and Authors, thank you very much for your thoughtful contribution to the interactive discussion.

I have two comments, one for you and one for the Authors.

- 1. Could you please specify, where the manuscripts contains too much material or suggesting parts that could be omitted without substantial loss, if I understand you correctly?
- 2. I'd like to support your critical point that the studied period of only five years is

C₁

short, maybe too short, to study interannual variability and lagged effects. It is possibly also too short to show that the concept is valid and the approach robust. You suggest demonstrating the usefulness of the concept for the case of the 2010 Amazon drought, which would certainly strengthen the work. In addition, I would like to ask for a case study, maybe at a site scale, where the concept of separating concurrent from lagged effects is demonstrated for a longer time period. Meanwhile there are many long-term flux data sets available. Couldn't those be used for the illustration and corroboration of the concept?

Kind regards, Andreas Ibrom

Interactive comment on Biogeosciences Discuss., https://doi.org/10.5194/bg-2019-459, 2020.