

Interactive comment on “Global and regional trends of aerosol optical depth over land and ocean using SeaWiFS measurements from 1997 to 2010” by N. C. Hsu et al.

Anonymous Referee #1

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This is a well written paper looking at the global and regional trends of aerosol optical depth over the land and ocean using SeaWiFS measurements and I recommend that the paper is accepted as is.

One issue that the author's don't address in a great deal of detail are the differences between the various ocean colour sensors (figure 7), especially as the MODIS Aqua sensor was in terms of ocean colour processing, vicariously calibrated against SeaWiFS, so may not be an independent dataset. The data assimilation (DA) quality version of the Terra sensor may also not be independent of the other data sources. Perhaps more information on the DA (or preparation for getting it "ready") technique would be

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useful to the reader. It should also be noted, especially from figure 7, that the SeaWiFS products in general were compromised after 2008.

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