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## Interactive comment on "An ocean modelling and assimilation guide to using GOCE geoid products" by K. Haines et al.

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A comment to sect. 4, I.14-16: Actually, it is not necessary to convert the MDT to spherical harmonics. It is sufficient to convert the model-data residuals, which should be close to zero. The residuals on land are defined zero to get a global field before doing the transformation to the spectral domain. This approach seizes the problem with the discontinuity along the coastlines. An improved approach might be, instead of using zeros on land, to fill the land applying a Laplace operator, with the 'coastal' ocean residuals as boundary conditions,...Bests, Frank

Interactive comment on Ocean Sci. Discuss., 7, 1849, 2010.

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