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Interactive comment on "Results from the DAMOCLES ice-buoy campaigns in the transpolar drift stream 2007–2009" *by* M. Haller et al.

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We thank the referee for the review and his constructive comments. We agree with the suggestions made and included them in the revised version of the paper. In detail: (1) We think that it was not necessary to calculate ourselves a new long-term climatology. But instead we refer to existing long-term analyses of Rampal et al. (2009) and Kwok et al. (2013) and relate our results to these statistics. (2) We deepen the discussion on the relation between U/Ug and the ice properties. In the new first paragraph of Sect. 4, we give general background information to the reader how wind factor and deviation angle vary with varying Coriolis force and internal ice stress and, thus, with varying ice properties, i.e. ice thickness and concentration. (3) The case study on the summer storm of 13 August 2007 has been expanded. Now, we hint at the mesoscale

differences in the deformation rate, both in Sect. 6 (case study) and Sect. 5 (composite study) and relate our findings to the results of Rampal et al. (2008) and Hutchings et al. (2011). (4) For a better integration of our results to earlier studies and in order to deepen the discussion, we have included the recommended literature. (5) The title has been specified. (6) Where necessary, the vorticity units have been harmonized. (7) In Table 3 the positions of the D07 buoy array have been added. Furthermore, for a better separation between seasonal and regional changes, we refer to the analysis of the annual cycle of drift speed in the Arctic given in Rampal et al. (2009). (8) "Double amplitude" has been replaced by "maximum-minimum difference". (9) We prefer to keep Fig. 1 because it underlines, in addition to the pure text, the huge experimental effort which we made to obtain the data for our study. (10) We made re-wordings where necessary.

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