

Comment on the paper

"Storm Britta in 2006: offshore damage and large waves in the North Sea"

by A.J.Kettle

I am not used to review papers for NHESS and to write on this journal, so I lack the sensitivity to judge a proposed paper for it. So I will provide a general comment, a recommendation and let the editor judge for it. However, I wish to point out that some basic physical principles of the matter discussed should be taken into consideration, and this does not seem to be the case in this paper.

Britta was certainly a remarkable storm, and a number of papers have been written about it. In practice the present paper is a short summary of the event, the reported damages, some (certainly remarkable, but debatable) measured data here reported without a criticism, a mention of the papers where the meteorological and oceanographic aspects have been analysed.

While for someone not in the field the whole looks impressive, for a professional reader of the field the natural comment is "so what? Thanks for the summary, but which is the information? All this was already known. Everything is simply mentioned, not discussed". Then, while looking at Figure 5 the first comment is "Wow!", this stops when reading the caption. If I am reading correctly, we are told that in 20 m depth (see caption) they recorded a >40 m high wave with a 20 m trough. Please note that this should have exposed the bare bottom. This requires some physical explanation. Panel b, a different episode, indicates a -22 m trough. I assume that in panels a and b the horizontal dotted line shows the bottom line. Does not this ring a bell? Similarly we are told (panel c) that in 30 m depth we had a group with a likely amplitude (not height) of 25 m, two consecutive waves exceeded 40 m height, with possible troughs at -25.

I am not discussing here how these data were recorded (I do not have the material at hand), but I do not see how they can be physically true. In any case it is not acceptable to report data, although by other persons, that look absurd without a correspondingly suitable discussion and explanation. Therefore, mainly for this, but also for the lack of good and new information, I do not consider this paper suitable for publication.