

Interactive comment on “Detailed quantification of delta subsidence, compaction and interaction with man-made structures: the case of the NCA airport, France” by O. Cavalié et al.

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Received and published: 11 August 2015

Dear Pr. Teatini,

Thank you for the positive review. We modified the manuscript accordingly to yours comments and answered your questions below.

- “how ascending and descending LOS displacements are combined to get the vertical and easting movements? Pixels and acquisition times are different with the two orbits” Indeed, acquisition times are different for the ascending and descending images. Therefore, we only combined the averaged velocity maps that encompass roughly the

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same period of time (i.e 2003-2011) to get the vertical and east components of the deformation.

- “quantitative geotechnical / geomechanical information would make more robust the research conclusions. In the present version, only qualitative arguments are provided to support the outcome interpretation”

- We added a paragraph (p15) to give some informations about oedometer tests carried out by dan et al. (2007) on NCA platform sediment samples and their interpretations in term of compaction rates.

- We change the vertical axis of figures 3c,d,f to make easier the comparison between the three subsiding areas.

- Figure 4 is meant to be displayed on a full page. However, we increased the font of the legend.

O. Cavalié

Interactive comment on Nat. Hazards Earth Syst. Sci. Discuss., 3, 3761, 2015.