

## ***Interactive comment on “A conservation palaeobiological approach to assess faunal response of threatened biota under natural and anthropogenic environmental change” by Sabrina van de Velde et al.***

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This is an interesting manuscript describing a palaeoecological study in part of the Danube Delta. It is, like many papers about conservation palaeobiology, basically a detailed palaeoecological study with a brief mention of conservation palaeobiology at the beginning and the end of the manuscript. It seems to be that the manuscript is more suited to a biological or palaeoecological journal such as *Palaeo-3*, *Quaternary International*, or some of the marine, freshwater, or aquatic journals such as *Hydrobiologia*.

C1

Specific comments:

line 104: fresh water or freshwater – please be consistent

line 132: Did the PVC pipes have a piston? Obtaining a reliable 3m long core with an open PVC tube sounds fraught with problems.

line 136: What was 14C dated – bulk sediment, terrestrial macrofossils?

line 137: How was the calibration done – OxCal, Bchron, Bacon?

lines 193-203: Why did you not use ter Braak's canonical correspondence analysis to give you a direct gradient analysis rather than this rather complex two-stage procedure?

line 204: Given you have 3 a priori groups (your evolutionary species groups), why not do a direct multiple discriminant analysis using the 3 groups? This too can be done in ter Braak's Canoco program with the unique advantage that the statistical significance of your a priori groupings can be tested using permutation tests.

line 205: Standardisation (subtracting the mean and dividing by the standard deviation) has the effect of giving all taxa equal weight. Is that what you want here?

line 210: What are 'the most encompassing assemblages'?

lines 230-233: Hardly worth saying as Deep-time sediments usually experience post-depositional compaction.

line 403: Is there a word missing, as the sentence does not make sense?

line 540, advice, not 'advise'.

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