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Dr. Kohei Matsuno  
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Re: "Short-term changes of the mesozooplankton community and copepod gut pigment in the Chukchi Sea in autumn: Reflection of strong wind event"

Dear Dr. Matsuno,

Both reviewers pointed out that present study has a worth being published on BG after suitable revision. I agree with reviewers and the authors have successfully addressed minor comments/suggestions from two reviewers.

However, I found problems (minor-moderate) that need to be addressed in a revision before a final (binding) decision regarding publication on BG can be made. Thus, I would like to invite the authors to submit an extended revision. Please check and consider carefully my comments below.

We thank you for choosing the BG for publication of your work. We look forward to receiving the revision for our further consideration.

Sincerely,

Makoto Sampei  
Guest editor

As a reviewer pointed out, English need to be improved.

‘Standing stock’ should be ‘biomass’

The authors need to show more detail about the SWE in methods or discussion section, since Strong Wind Event (SWE) is a key factor for this study. Strong wind event? Based on Nishino et al. (2015), “stronger wind events” in wind speed occurred on 14<sup>th</sup> and 20<sup>th</sup> rather than 18<sup>th</sup>. How strong? Wind speed? Wind direction? Etc... Assumption on periods before SWE (10-18) and after SWE (19-25) is reasonable?

P.4 L.6-8 Describe information about storage duration for specimens under the microscope. How much underestimation on the Chl. *a* in copepod gut could happen due to the storage?

P.4L22 This is a wrong equation, since GRind. is calculated based on total (Chl.*a*+ phaeopigments) pigments (i.e., NOT based on Chl.*a*). Can authors use only Chl. *a* data instead of total pigments data?

P9 L14-28 Authors need to conduct more careful discussion on DVM. Results, itself, only show the difference of vertical distribution between day and night time samplings. These change might be due to changing of the water mass (i.e., effects of horizontal advection, since authors clearly mentioned horizontal advection should be considered on the zooplankton distribution)? To evaluate on actuality of authors’ ‘guess’, need more discussion based on own data and citations.

P9 L16 It is not easy to find only from figure 4. How we can identify the difference between migrated stages and non-migrated stages? Authors need to show a quantitative standards for judging.

P.10 L23 Is this (14.3 mg) low? It is two orders of magnitude higher than grazing rate of *C. glacialis* C5 (4.14/29.9 mg).

P.11L1-5 Total abundance in cell number of dinoflagellates and ciliates are <50% of the diatoms. The contribution in terms of carbon should be much smaller, since cell volumes of dinoflagellates and ciliates could be one-two orders of magnitude lower than those of phytoplankton (diatoms). Moreover, the dinoflagellates might include phytoplankton

species. Thus, microzooplankton (a part of dinoflagellates and ciliates) is less important as a food source for *C. glacialis*???. *C. glacialis* need other food resources to sustain their metabolism in the autumn.

P.11 L6 16-18 'Some zooplankton' should be *Calanus glacialis*. Put 'a' in front of 'benefit'.

Table 1. I would like to see standard deviations for abundance data. Also, show 'n' in the table.

Figure 3 caption 'Temporal changes in the ... gonad maturation of C6F (c) of *Calanus glacialis*...' could be better

Figure 5 caption 'Temporal and diel changes in the gut pigment of *Calanus glacialis* C5 (a) and the relationship between the gut pigment of C5 and chlorophyll *a* biomass (b) at a fixed station.... Dotted and dashed.... The whole regression line is drawn with all data from both day and night in panel b.