## Handling Editor Comments to the author:

We need the identical Zenodo link (e.g. from line 820) also at end of abstract (e.g. at line 31). We need to avoid any sense of divergent sources or versions.

We have revised the sentences to make sure they point to the single Zenodo link.

Manuscript contains many (too many?) residual spelling, typographical and labelling errors. E.g. if NSIDC provides the Arctic projections, who provides the Antarctic projections?

We were correct in calling the projections, i.e. there is "NSIDC" in front of Arctic projections while there is nothing to add to the Antarctic counterpart.

Or, in Figure 6, careful reader can discern which color represents autoRIFT and which ampcor but legend does not provide this information. (Reader finds better examples in Fig 8, Fig 9.)

Both titles of Fig. 6's subfigures have been revised to remove the confusion.

Line 582, velocity of Jakobshavn: statement about speed assumes we know accurate velocities for all other (major?) glaciers? At line 646 reader encounters another 'fastest' (Pine Island) glacier, thinning in this case? (I think I would have a bit more caution.)

Two citations have been added to justify Jakobshavn as the fastest glacier in the world. We removed the word "fastest thinning" for Pine Island (although it can also be justified by the newly added citations), and call it "one of the fastest glaciers and rapid thinning", where two other citations have been added to justify it.

Furthermore, we added one more citation to Malaspina glacier regarding the Editor's concern.

Need better labelling in legend for Figure 12?

All of the legends in the figures that are spatial maps have been revised to have better labeling.

Most remaining errors should get identified and fixed during type-setting and proof-reading. Please can I suggest that authors recruit a colleague familiar with satellite SAR processing to serve as additional reader of proof copy? You (and we) really want highest quality description to accompany this important product.

We have asked one of our colleagues who is a radar expert to double check the radar terminology use and made sure the statements are appropriate and correct. We also made several minor fixes in the final proofreading.

Finally, thanks to the Editor for the constructive advices for improving and advertising the work, as well as the favorable consideration.

Yang Lei

On behalf of the authors