

Supplementary Information for Simulating ice thickness and velocity evolution of Upernavik Isstrøm 1849-2012 by forcing prescribed terminus positions in ISSM

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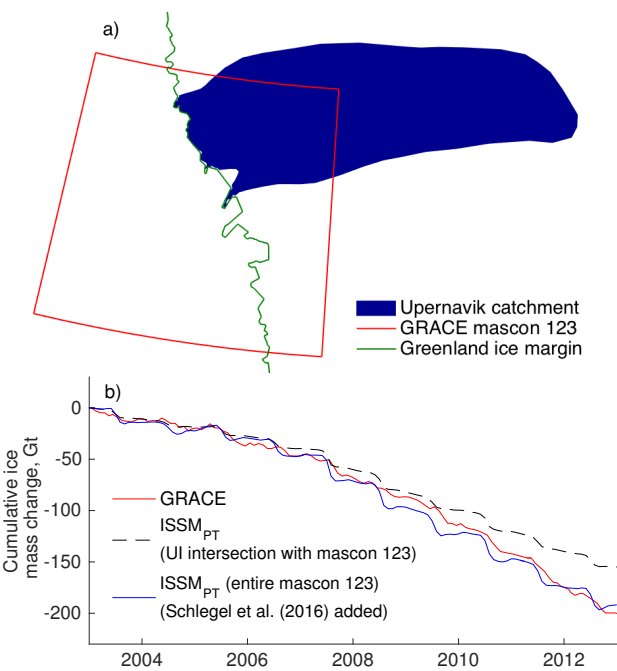


Figure 1. (a) GRACE area overview. UI catchment and model domain (blue polygon), present Greenland ice margin (green line) and the GRACE mascon (red line). (b) Mass change comparison between 2003 and 2012. GRACE (red), simulated mass loss of the intersection area of mascon 123 and model domain (dashed line) and a simulated mass loss (sum of ISSM_{PT} simulated mass loss in mascon 123 and the ISSM SSA model output of Schlegel et al. (2016) to cover the entire domain) (blue line).

References

Schlegel, N.-J., Wiese, D. N., Larour, E. Y., Watkins, M. M., Box, J. E., Fettweis, X., and van den Broeke, M. R.: Application of GRACE to the assessment of model-based estimates of monthly Greenland Ice Sheet mass balance (2003-2012), *The Cryosphere*, 10, 1965–1989, doi:10.5194/tc-10-1965-2016, 2016.