Correction to "Influence of dust and black carbon on the snow albedo in the NASA Goddard Earth Observing System version 5 land surface model"

Correspondence: Teppei J. Yasunari (teppei.j.yasunari@nasa.gov)

The website information describing the forcing meteorological data used for the land surface model (LSM) simulation, which were observed at an Automated Meteorological Station (AWS) at the Sapporo District Meteorological Observatory maintained by the Japan Meteorological Agency (JMA), was missing from the text. The 1-hourly data were obtained from the website of Kisyoutoukeijouhou (Information for available JMA-observed meteorological data in the past) on the website of JMA (in Japanese) (available at: http://www.jma.go.jp/jma/menu/report.html). The measurement height information of 59.5 m for the anemometer at the Sapporo Observatory was also obtained from **JMA** the website of (in Japanese) (available at: http://www.jma.go.jp/jma/kishou/know/amedas/ame_master.pdf). In addition. converted 10-m wind speed, based on the AWS/JMA data, was further converted to a 2-m wind speed prior to its use with the land model as a usual treatment of off-line

 ¹, ²Teppei J. Yasunari, ¹Randal D. Koster, ¹K.-M. Lau, ³Teruo Aoki, ¹Yogesh C. Sud,
⁴Takeshi Yamazaki, ⁵Hiroki Motoyoshi, and ⁶Yuji Kodama

¹NASA Goddard Space Flight Center, Greenbelt, MD 20771 USA

² Goddard Earth Sciences and Technology and Research, Universities Space Research Association, Columbia, MD 10211, USA

³ Meteorological Research Institute, Tsukuba, 305-0052 Japan

⁴ Department of Geophysics, Graduate School of Science, Tohoku University, Sendai, 980-8578 Japan

⁵ Snow and Ice Research Center, National Research Institute for Earth Science and Disaster Prevention, Nagaoka, 940-0821 Japan

⁶ National Institute of Polar Research, Tachikawa, 190-8518, Japan

Catchment simulation. Please ignore the ice absorption data on the website mentioned in paragraph [15] which was not used for our calculations (but the data on the website was mostly the same as the estimated ice absorption coefficients by the following method because they partially used the same data by Warren [1984]). We calculated the ice absorption coefficients with the method mentioned in the same paragraph, for which some of the refractive index data by Warren [1984] were used and then interpolated between wavelengths, and also mentioned in paragraph [20] for the visible (VIS) and near-infrared (NIR) ranges. The optical data we used were interpolated between wavelengths as necessary.

Reference

Warren, S. G. (1984), Optical constants of ice from the ultraviolet to the microwave, *Appl. Opt.*, 23, 1206-1225.