

# Ops 1/29

The weather today was almost exactly the same as the past few days, i.e. cold, clear, and calm. The morning data check showed no issues and no HRXL problems, which means the script that Gary wrote to automatically reset the usb seems to be working. Thanks for that Gary!

Since there were no issues to attend to, we decided to spend the day visiting a few of the sites I had not yet been to so that we could take Leica measurements and soil samples. We started at SP, where we successfully measured the boom angle, but could not take a soil sample. The ground was very frozen and we may have hit a rock when driving in the corer, as its cutting edge bent. We will try to fix it as best we can, but at least we have the corer from the other soil kit. We were able to take a soil sample at the next site we visited, MW, as well as measure the boom angle there.

In the afternoon we took a trip to DC to troubleshoot the increased battery drain we've been noticing. We swapped batteries and reseated the thermocouple wire because it had not been reporting. We were not able to pinpoint why the site keeps draining batteries so quickly. In comparing the load between all sites, I am curious as to why some sites show an increase in load during the day (DC, MW, UP), while others show an increase over the night (CC, LC, MH, PC, SH, SP). I would expect the increase overnight if heaters are turning on, but am not sure what would cause the opposite behavior at certain sites.

On our way back to the base we drove past CC and LC so that Liz could show me where to find them. After the daily sounding we walked to DCS to troubleshoot the soil sensor that stopped reporting. We tried reconnecting the cables, as Isabel and Liz previously had restored them at DCS in this way, which fixed the problem.

We also saw a "change engine oil soon" message in the ISFS truck today.