

# ICECAPS-ACE Weekly Report

November 5 – November 11, 2018

Gus Allen



*Troy Nave does his best to hold a radiosonde balloon still for the camera*

## General:

A quiet week at the MSF saw only a couple of minor maintenance issues with the PAERI and the OPC.

## Significant Weather Observations:

Date	Time (Z)	Wind	Weather	Sky	Temp(C)	Notes
11-05	1200Z	17 from 094	BR	SCT000 BKN045	-24	
11-06	1210	18 from 110	BR	FEW000 BKN030	-28	
11-07	1210Z	22 from 126	DRSN FZFG	OVC005	-30	
11-08	1210	26 from 145	BLSN	BKN000 BKN030	-23	
11-09	1215	19 from 143	BLSN	BKN000	-27	
11-10	1210	7 from 212		SCT 010 SCT100	-32	
11-11	1300	14 from 166	FZFG	FEW000 FEW100	-36	Rime icing

**ICECAPS-ACE Data Management:**

- 11-5: Data transfer complete at 1043Z.
- 11-6: Data transfer complete at 0958Z.
- 11-7: Data transfer complete at 0950Z.
- 11-8: Data transfer complete at 1003Z.
- 11-9: Data transfer complete at 1004Z.
- 11-10: Data transfer complete at 1032Z
- 11-11: Data transfer complete at 1230Z

**MWR:**

- Operating normally.

**SODAR:**

- 11-9: Data indicate possibly accumulated snow in dishes.
- Operating normally.

**POSS:**

- Operating normally.

**MMCR:**

- Operating normally.

**CAPABL:**

- Assessment of issue resulting in malformed beam image from laser 1 is ongoing.
- Instrument currently operating normally using laser 2

**MPL:**

- Operating normally.

**VCEIL:**

- Operating normally.

**IceCAM:**

- 11-6: Removed snow from lens at 1200Z
- 11-7: Removed snow from lens at 1230Z
- Operating normally.

**PAERI:**

- 11-07: Red flags thrown for LW and SW Responsivity at approximately 1600Z. I cleaned the scene mirror at 1620Z, and the flags returned to green at 1628Z.
- 11-10: Daily checks revealed enclosure fan stopped. I unmounted the enclosure, and found the fan (#4) seized. I replaced it with fan #8, replaced the blown fuse, and remounted the enclosure at 1720Z. Several hours later I found the fan stopped again. Assessing, I found the new fuse

blown, but the fan free/not seized. After consulting with Von, I determined that I had used the smallest available fuse, rated at 250mA. I replaced it with a 750mA fuse, and remounted the enclosure. The incident appears to be resolved as the new fan is running as of 2018-11-12 14Z.

- Operating normally.

**TSI:**

- Offline for winter season.

**IcePIC:**

- No images captured this week.

**Radiosonde:**

- Twice daily launches.

**MASC:**

- Instrument offsite for repair, will not return until summer 2019.

**OPC:**

- 11-9: At daily check, OPC intake was found to be at least partially occluded with snow.
- 11-10 1313Z: OPC powered down per ACE protocol and removed from tower to dry out and remove snow from intake.
- 11-10 1830Z: Instrument replaced on tower and supplied power. I was unable to complete the Power Up procedure because of ambiguity or possibly omission in the protocol. I contacted Heather for a resolution.
- 11-12 1230Z: Heather restarted data collection remotely.

**CLASP:**

- Instrument off site.

**CPC:**

- Instrument off site.