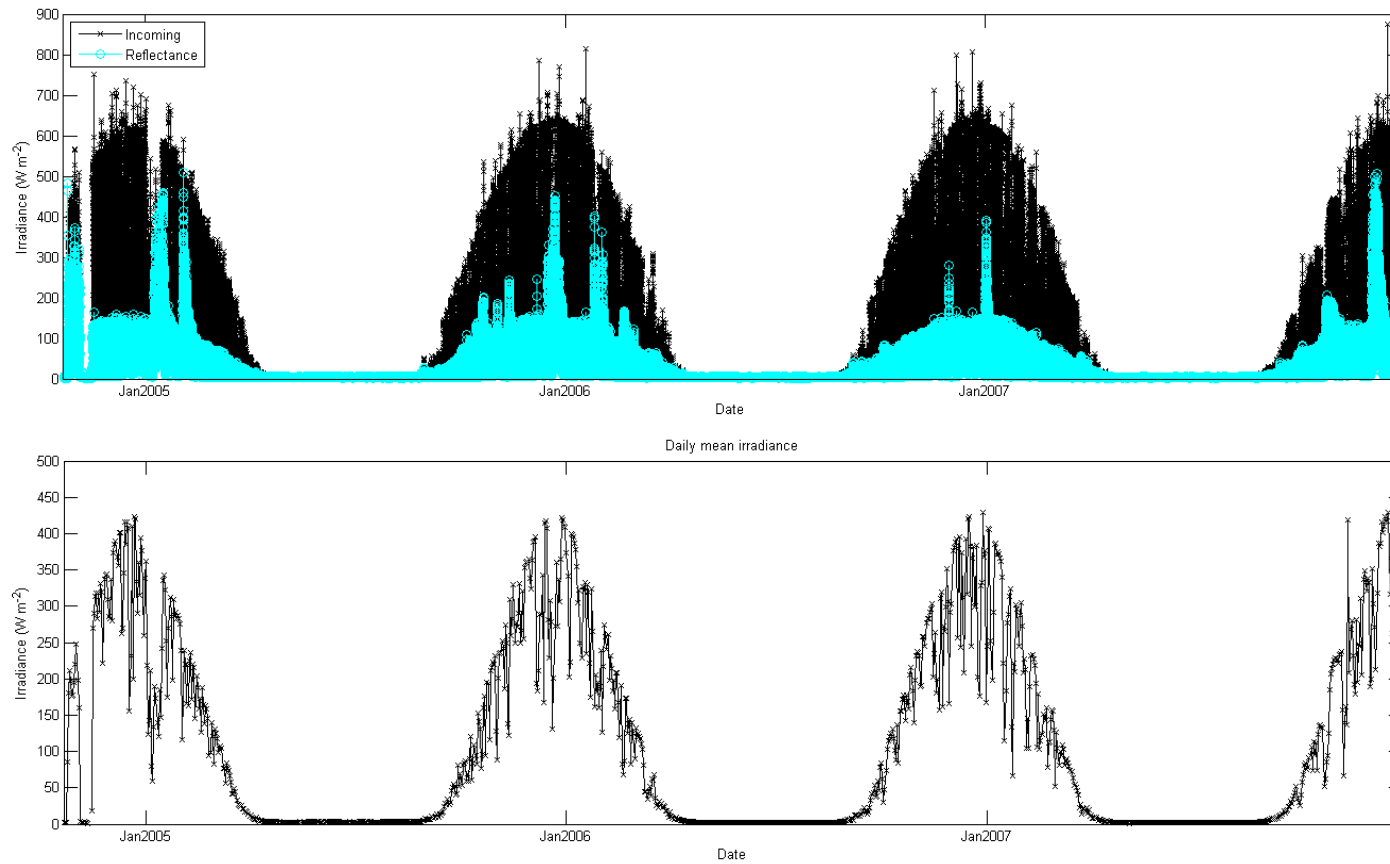


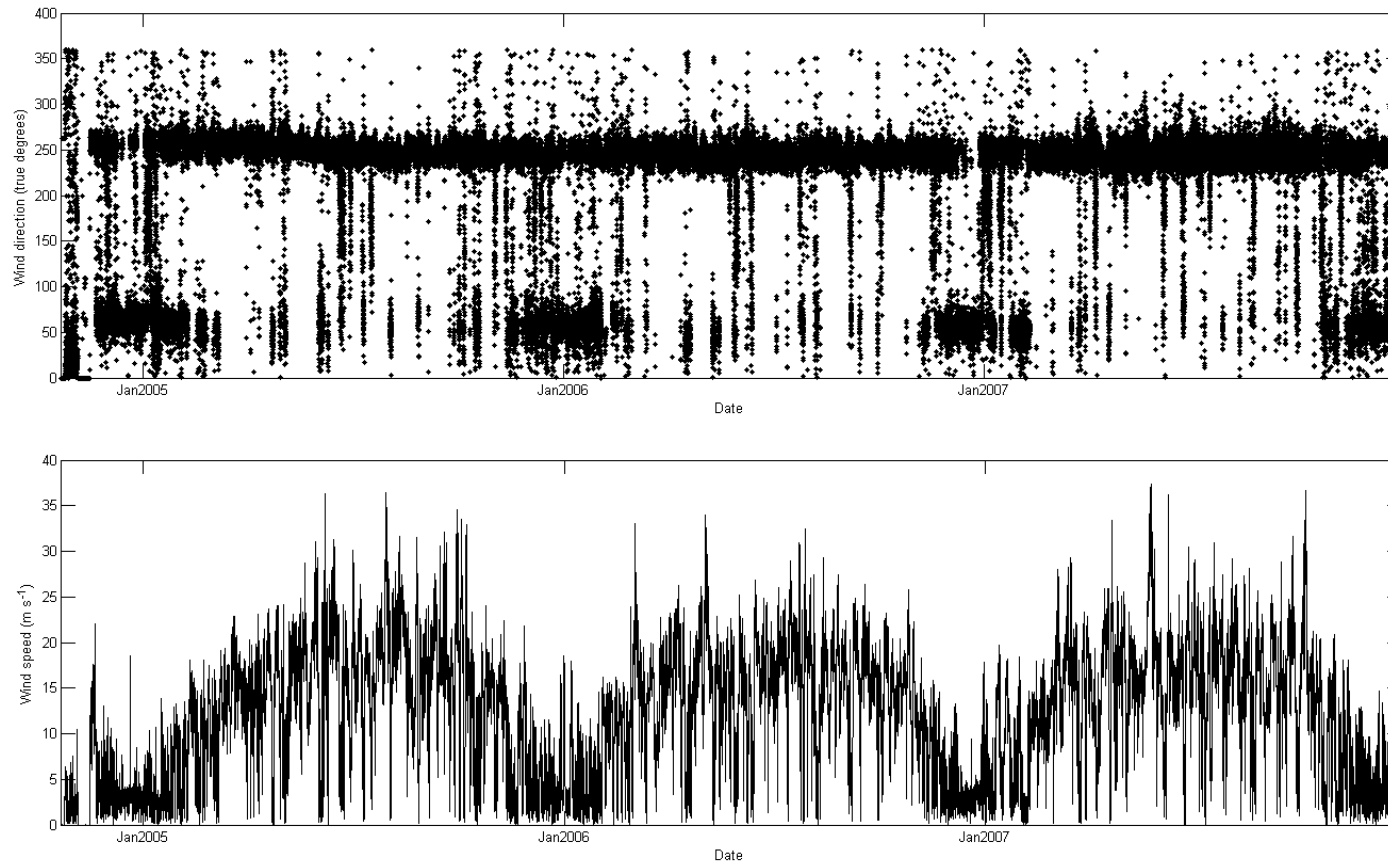
Plots of three years' data from Brown Hills weather station (Darwin Glacier)

1. Irradiance and reflectance



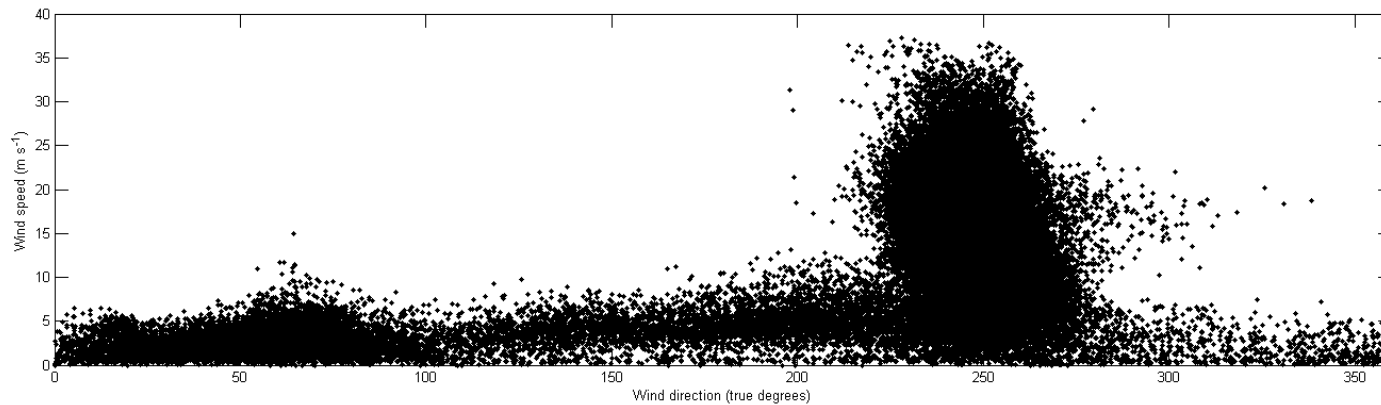
Peaks in reflectance data are associated with snowfall – snowfall is frequent and probably common at all times of the year.

2. Wind direction and speed



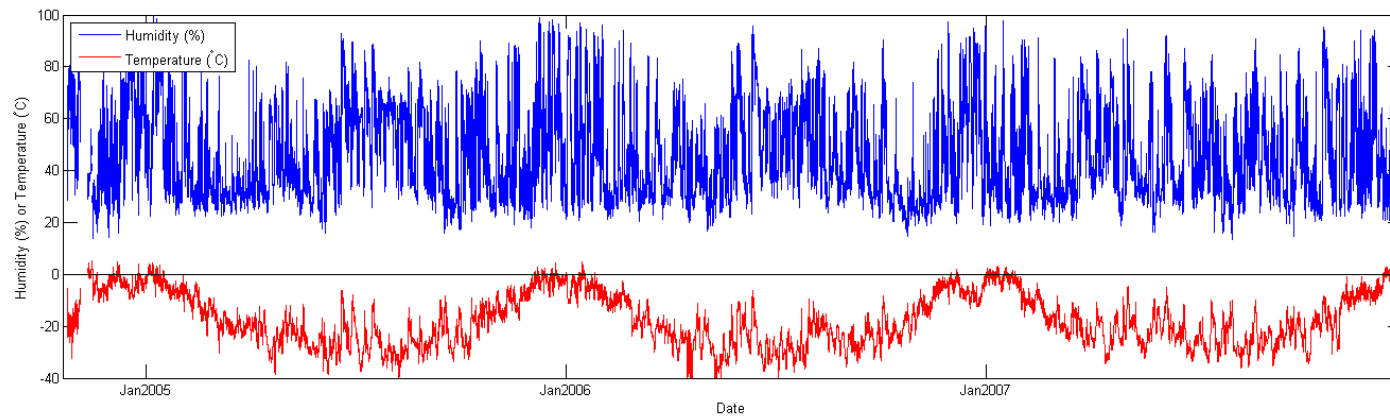
Strong prevailing wind direction WSW up the valley, especially in winter. Consistently strong winds all winter with some extremely high peak velocities associated with frequent and consistent catabatic winds. Winds much lighter and more variable in summer and frequently NE.

Wind speed vs direction:



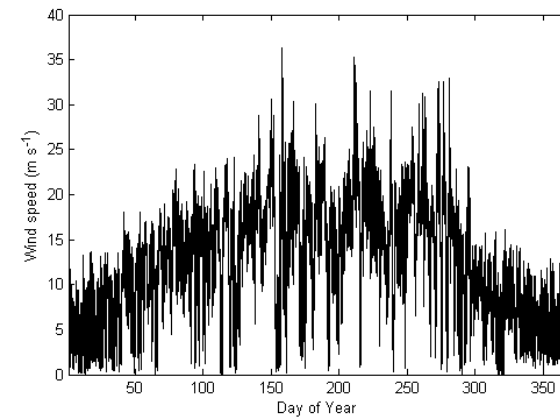
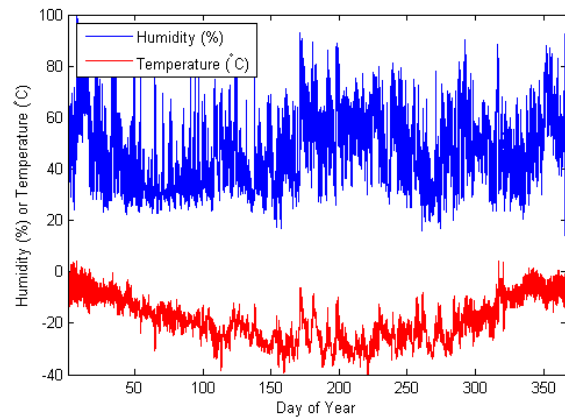
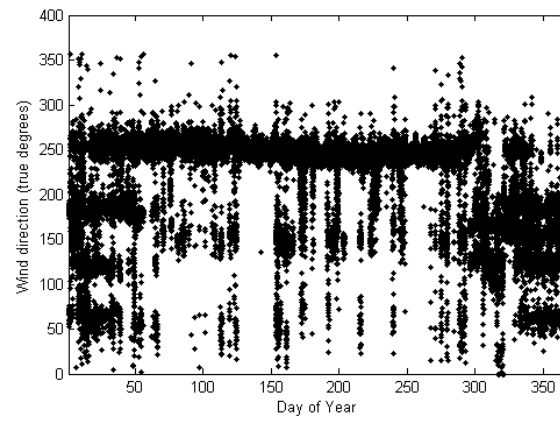
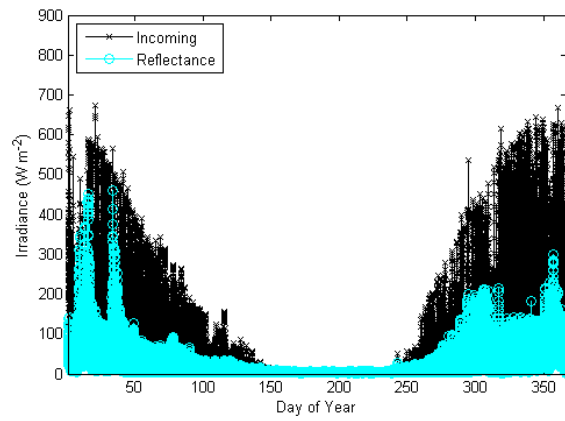
Emphasising the strong prevailing WSW wind and that the high wind speeds are all in this direction.

3. Humidity and temperature



Note mild peaks in winter (catabatic winds) and overall not especially cold relative to more northern latitudes. May explain why pond and lake ice has not been as thick or as permanent (ponds) as we expected.

4. Data combined across all years:



Statistics:

Mean annual temperature: -19°C

Mean annual humidity: 48%RH

Mean annual irradiance: 100 W m^{-2}

Mean annual reflectance: 30 W m^{-2}

Mean wind direction: 240°

Mean annual wind speed: 13 m s^{-1}