

Parameters in file SeaState_2015_met_sfc_SEB_5min_2015_275_309

File name shows that values are 5-minute averages (or interpolations for wave parameters) for Days 275 (Oct 2) through 309 (Nov 5).

jd - day of year
hrdec - decimal hour
lat,lon - latitude, longitude (deg)
zpsd_bw_top - height (m) of bow mast sonic above mean water level
zpsd_brdg - height (m) of PSD bridge-roof data (e.g., pressure)
slp - sea level pressure (mb) estimated from bridge-roof pressure
psd_ta15 - PSD Air temperature (deg C) at top of bow mast (15 m)
psd_q15 - PSD air specific humidity at 15 m (g/kg)
psd_rhw - PSD heated relative humidity wrt water (%) at 15-m top of bow mast
psd_wst - true wind speed (m/s) from PSD top bow-mast sonic
psd_wdt - true wind direction (deg true) from PSD top bow-mast sonic
wst_bst - best estimate of true wind speed (m/s): psd_wst for -5 deg <
relative wind dir <+5 deg; max(psd_wst mast_port) for relative wind
dir < -5 deg; max(psd_wst mast_starboard) for relative wind dir >
+5 deg;
wdt_bst - best estimate of true wind direction (deg). Corresponds to sensor
data chosen for wst_bst
psd_tsea_ed - sea snake temperature (deg C) recorded whenever sea snake was
deployed(either in water or on ice)
Tsfc_KT151_med - manually edited forward facing KT15 skin temperature (deg C)
Tsfc_KT152_med - manually edited rearward facing KT15 skin temperature(deg C)
TsIR_shp_mn - manually edited CT15 skin temperature (deg C)
IRT_best - best estimate of radiometric skin temperature (deg C): when ship
underway(SOG>1 m/s) , radiometric skin temperature furthest from
psd_ta15 air temperature (assumes that riming will give value close
to air T); when ship stationary, mean of the three radiometric skin
temperatures that passed manual editing (assumes that differences
due to true spatial differences on surface)
frzpt - freezing point of seawater (deg C) at observed salinity shp_thsal_sal
shp_thsal_sal - observed salinity (PSU) at ship intake (6.5 m depth)
hs_wave - significant wave height (m) from bow mast 1D lidar (CF estimate)
hs_wind_wave - significant wave height for wind waves (m) determined by given
frequency cutoff
Tp_wave - spectral peak wave period (s)
Tp_wave_mom - wave period (s) computed from spectral moments
Tp_wv_cutoff - wave period (s) corresponding to wind wave frequency cutoff
wave_miss - number of missing wave points of the 6000 possible points during
the 10-min wave estimate
psd_lwd_med - manually edited downwelling longwave radiation (W/m2) (no
filling of data)
psd_lwd_bst - missing data in psd_lwd_med filled with linear interpolated
values from good data (W/m2)
psd_swd_med - manually edited downwelling shortwave radiation (W/m2) (no
filling of data)
psd_swd_bst- missing data in psd_swd_med filled with linear interpolated
values from good data (W/m2); all negative values assumed = 0
W/m2
hs_blk - bulk sensible heat flux (W/m2); calculated with slp,psd_ta15,
psd_q15, wst_bst,IRT_best, no cool skin, COARE/SHEBA algorithm
hl_blk - bulk latent heat flux
ust_blk - bulk ustar;