

Regional climate model simulations (CCLM 15km) of profiles for the MOSAiC period

Data description

Coordinates of the nearest CCLM grid point (1h data)

File name: C15_Lat_Lon.txt

File description

DATE month day hour	LAT Latitude north degrees
JUL Julian day starting on 1 October 2019	LON Longitude east degrees
DOY Julian day starting on 1 January	

CCLM profiles (1h)

File names: C15_profiles.zip (sea ice from AMSR data) and C15MOD0_profiles_winter.zip (sea ice from MODIS data)

Data of quantities on model levels for each month: CCLM_1h_quer_startdate-enddate
Startdate/enddate =YYYYMMDD, YYYY=year, MM=month, DD=day

File description

Jul Julian day starting on 1 October 2019	TKE turbulent kinetic energy in m^2/s^2
Height height above sea level in m	Jul1 Julian day starting on 1 January
T temperature in $^{\circ}C$	Zeitd day of the month
Theta potential temperature in $^{\circ}C$	QCI sum of cloud ice and cloud liquid water content in $10^{-3} g/kg$
P pressure in hPa	QC cloud liquid water content in $10^{-3} g/kg$
U west-east component of the wind in m/s	QI cloud ice content in $10^{-3} g/kg$
V south-north component of the wind in m/s	W vertical wind in m/s
DD1 wind direction in deg (0-360 $^{\circ}$)	FFG geostrophic wind speed in m/s
DD wind direction in deg (-90-270 $^{\circ}$)	DDG geostrophic wind direction in deg (0-360 $^{\circ}$)
FF wind speed in m/s	
QV specific humidity in g/kg	

CCLM Integrated humidity and temperature data (1h data)

File names: C15_integrated_summer/winter.txt (sea ice from AMSR2 data) and C15MOD0_integrated_winter.txt (sea ice from MODIS data)

File description

Jul Julian day starting on 1 October 2019	TCGS mean temperature 0-2km in $^{\circ}C$
DOY Julian day starting on 1 January	QVGS mean specific humidity 0-2km in g/kg
IWV Integrated water vapour in kg/m^2	