

Virtual Climate Network (VCSN): Details

The VCSN datatype is included in the datatype class "Special Datasets" (in the Datatype Selection" page. Note that only one of these special datatypes can be active on the database Query form at the same time.

This datatype has two choices:

- Selected stations over a date range (maximum of 10 stations per query)
- All 11491 VCSN stations for one day (uses the start date). *Note if the "File Download Option" is "HTML Table" then output is forced to be "Excel File" (to accomodate the number of rows).*

Field Descriptions:

- **VCSN Station Identifier:** This is always the agent number of the station i.e. the "station identifier" in the Database Query Form is ignored. See also the note below.
- **Date:** This is the local day. The date always includes the hour/minute "00:00" and refers to the day **starting** at the date indicated. Note carefully the time range of the data in the following fields e.g. "at 9am", "from 9am", "to 9am", etc, especially when comparing with datatypes from other sources. (*See note on time range change below.*)
- **MSLPRESS(hPa):** Pressure reduced to Mean Sea Level in hPa **at** 9am local day.
- **PET(mm):** 24 hour Penman Potential Evapotranspiration total in mm **from** 9am local day.
- **Rain(mm):** Total amount of rain in mm **from** 9am local day
- **RH(%):** Relative humidity in percent **at** 9am local day.
- **SoilM(mm):** Soil moisture in mm **from** 9am local day calculated from rainfall and evapotranspiration. The base value is -150mm ("permanent wilting point") based on "soil store capacity". A value of "0" indicates the soil is at "field capacity" (amount of water held in the soil after the excess has drained away). A value greater than "0" indicates runoff. See the note below "Note on Soil Moisture Calculation" below for more information.
- **TempEarth10cm(C):** The 10cm earth temperature in degC **at** 9am local day.
- **Radn(MJ/m2):** Amount of accumulated global solar radiation in MJ/m2 (Mega Joules per square metre) **from** midnight local day.
- **Tmax(C):** Maximum temperature in degC **from** 9am local day.
- **Tmin(C):** Minimum temperature in DegC **to** 9am local day. *Note take care when comparing this with the daily combined "Form 301" minimum temperature - this will be one day earlier.*
- **VapPress(hPa):** Vapour pressure in hPa **at** 9am local day.
- **WindSpeed(mps):** Mean wind speed in m/s at 10m above ground level over 24 hours **from** midnight local day.