# CZO Metadata Worksheet

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| Data File Name | Precipitation 10-Minute Raw Data |
| Record Period | 11/02/2009 to Present |
| Descriptive Title | Shale Hills CZO 10-Minute Precipitation, Temperature, Relative Humidity, Wind Speed, and Wind Direction Raw Data |
| Update Frequency | 10-Minutes |
| Abstract | Raw (not quality controlled) precipitation, air temperature, relative humidity, wind speed, and wind direction data streamed daily from the OTT Pluvio2 weighing type rain gauge and other meteorological instruments on the Real-Time Hydrology net station at the ridge top in Shale Hills CZO. |
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| Data Value Descriptions | * COL1: label=Date (m/d/yyyy)
* COL2: label=RecNum
* COL3: label=Battery Voltage Min (V)
* COL4: label=Leaf Wetness 30cm Understory (mV)
* COL5: label=Total Precipitation Amount for Previous 10 Minutes (mm)
* COL6: label=Total Precipitation Amount for Current Day (mm)
* COL7: label=Snow Depth (cm)
* COL8: label=Judd Air Temperature (degC)
* COL9: label=HMP45C Air Temperature (degC)
* COL10: label=Relative Humidity (%)
* COL11: label=Wind Speed Average (m s-1)
* COL12: label=Wind Direction Average (deg)
* COL13: label=Wind Direction Standard Deviation (deg)
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| Keywords | Shale Hills, CZO, precipitation, temperature, relative humidity, wind speed, wind direction |
| Methods | * OTT Pluvio2 Weighing Rain Gauge – <http://www.ott.com/>
* R. M. Young Company Wind Monitor Model 05103 – <http://www.youngusa.com/> - mounted 440cm above ground surface
* Decagon Dielectric Leaf Wetness Sensor – <http://www.decagon.com/>
* Judd Communications Ultrasonic Depth Sensor – <http://juddcom.com/>
* Campbell Scientific HMP45C Temperature and Relative Humidity Probe – <http://www.campbellsci.com/>

**Note:** As of or before 4 February 2016, the Judd Ultrasonic snow depth sensor and the Degacon LWS may be malfunctioning. Use those data at your own risk. |
| Sites | CZO\_RTH1 - latitude 40.6658173, longitude -77.9040146 |
| Citation | The following acknowledgment should accompany any publication or citation of these data: Logistical support and/or data were provided by the NSF-supported Shale Hills Susquehanna Critical Zone Observatory. |
| Publications | none |
| Data Use Notes | The user of Shale Hills Susquehanna CZO data agrees to provide proper acknowledgment with each usage of the data. Citation of the name(s) of the investigator(s) responsible for the data set, in addition to the generic statement above, constitutes proper acknowledgment. Author(s) (including Shale Hills Susquehanna CZO investigators) of published material that makes use of previously unpublished Shale Hills Susquehanna CZO data agree to provide the Shale Hills Susquehanna CZO data manager with four (4) copies (preferably reprints) of that material for binding as soon as it becomes available. The user of Shale Hills Susquehanna CZO data agrees not to resell or redistribute shared data. The user of these data should be aware that, while efforts have been taken to ensure that these data are of the highest quality, there is no guarantee of perfection for the data contained herein and the possibility of errors exists. These data are defined as either public or private, such that a password may be required for access. |