Column Names and Meanings

| Index | Column name | units | Equipment |  |
| --- | --- | --- | --- | --- |
| 0 | TIMESTAMP | time | internal |  |
| 1 | RECORD | # | internal |  |
| 2 | BattV\_Max | Volts | internal |  |
| 3 | PTEMP\_C\_Max | Celcius | Thermal couple | The thermal couple measurement that we were using as a check for the equipment. It is less accurate and it is in the box so it might not reflect the outside temperature |
| 4 | SlrW\_Avg | Watt/meter^2 | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) (Digital Thermopile Pyranometer) | Average calibrated solar radiation over the half-hour |
| 5 | Slr\_Max | Watt/meter^2 | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | ^ same but max |
| 6 | Slr\_Min | Watt/meter^2 | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | ^ same but min |
| 7 | Slr\_Std | Watt/meter^2 | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | ^ same but standard deviation |
| 8 | Raw\_mV\_Avg | milliVolts | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | Raw detector millivolts- I don’t really know how to use this |
| 9 | Raw\_mV\_Max | milliVolts | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | ^ same but max |
| 10 | Raw\_mV\_Min | milliVolts | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | ^ same but min |
| 11 | Raw\_mV\_Std | milliVolts | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | ^ same but standard deviation |
| 12 | CS320\_Temp\_Avg | Celsius | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | Temperature from Digital Thermopile Pyranometer so it is the temp in the sun |
| 13 | CS320\_Temp\_Max | Celsius | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | ^ same but max |
| 14 | CS320\_Temp\_Min | Celsius | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | ^ same but min |
| 15 | CS320\_Temp\_Std | Celsius | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | ^ same but standard deviation |
| 16 | CS320\_X\_Avg | Degrees (in the math sense) | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | The direction sun is coming from in the x direction?????? |
| 17 | CS320\_X\_Max | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 18 | CS320\_X\_Min | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 19 | CS320\_X\_Std | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 20 | CS320\_Y\_Avg | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 21 | CS320\_Y\_Max | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 22 | CS320\_Y\_Min | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 23 | CS320\_Y\_Std | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 24 | CS320\_Z\_Avg | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 25 | CS320\_Z\_Max | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 26 | CS320\_Z\_Min | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 27 | CS320\_Z\_Std | Degrees | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) |  |
| 28 | SlrMJ\_Tot | MegaJoules/meters^2 | [CS320](https://s.campbellsci.com/documents/us/manuals/cs320.pdf) | Total flux density. The software computes it for you using this equation: SolarRad x Scan Rate x 10–6 |
| 29 | AirTC\_Avg | Celsius | Relative humidity | Average air temperature. Probably the most accurate one |
| 30 | AirTC\_Max | Celsius |  | ^ Same but max |
| 31 | AirTC\_Min | Celsius |  | ^ Same but min |
| 32 | AirTC\_Std | Celsius |  | ^ Same but standard deviation |
| 33 | RH\_Max | % |  | Maximum relative humidity |
| 34 | RH\_Min | % |  | ^ Same but minimum |
| 35 | WS\_ms\_Avg | meters/ second | Wind meter | Average wind speed |
| 36 | WS\_ms\_Max | meters/ second |  | ^Same but max |
| 37 | WS\_ms\_Min | meters/ second |  | ^Same but max |
| 38 | WS\_ms\_Std | meters/ second |  | ^Same but standard deviation |
| 39 | WS\_ms\_S\_WVT | Degrees |  |  |
| 40 | WindDir\_SD1\_WVT | Degrees |  |  |
| 41 | Rain\_mm\_Tot | millimeters | Rain Bucket | Total millimeters of rain over the half-hour |
| 42 | VWC\_5cm\_Avg | meters^3/ meters^3 | Soil moisture | Average soil moisture at 5cm |
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Notes: For the data from June 29 to August 2, 2023, the precipitation was working but the pyranometer was not so there is no solar radiation from that time. There is no air temperature for July 2023.