

Atmosphere Investigation

Water Vapor Data Sheet

* Required Field

School Name: _____ Study Site: _____

Observer names: _____

Date: Year _____ Month _____ Day _____ Universal Time (hour:min): _____

*Sun Photometer Instrument Type (Check One):

Measures Voltage Only (Serial Number): _____

*If known, Satellite overflights on date of measurements:

Satellite/instrument name: _____ Time of overflight (UT): _____ Max elevation angle (deg): _____

Case Temperatures

Before taking measurements (multiply voltage reading by 100) (°C) _____

After taking measurements (multiply voltage by 100) (°C) _____

¹ At least 3 sets of measurements (including IR1 and IR2) are required.

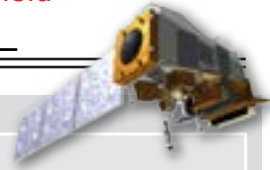
² Always report voltages with 3 digits to the right of the decimal point (e.g., 1.733 rather than 1.77).

Measurement Number ¹	Universal Time (hour:minute:second)	Maximum Voltage in Sunlight ² (volts)	Dark Voltage ² (volts)
1 (IR1)			
1 (IR2)			
2 (IR1)			
2 (IR2)			
3 (IR1)			
3 (IR2)			
4 (IR1)			
4 (IR2)			
5 (IR1)			
5 (IR2)			

Comments: _____

*Sky Conditions (next page):

Study Site: _____ Date: _____ Time (UT): _____



1. What is in Your Sky?

Total Cloud/Contrail Cover:

- Sky is Obscured
- None (Go to box 2)
- Scattered (25-50%)
- Few (<10%)
- Broken (50-90%)
- Isolated (10-25%)
- Overcast (90-100%)

- Fog
- Heavy Rain
- Heavy Snow
- Blowing Snow
- Sand
- Spray
- Smoke
- Dust
- Haze
- Volcanic Ash

Go to box 6

*If you can observe sky color or visibility, complete box 2

2. Sky Color and Visibility

- Color (Look Up): Cannot Observe Deep Blue Blue Light Blue Pale Blue Milky
- Visibility (Look Across): Cannot Observe Unusually Clear Clear Somewhat Hazy Very Hazy Extremely Hazy

3. High Level Clouds

- No High Level Clouds Observed (Go to box 4)

Cloud Type:

- Contrails (number of): _____
- Cirrus
- Cirrocumulus
- Cirrostratus

#		short-lived
#		persistent
#		persistent spreading

Cloud Cover :

- Few (<10%)
- Isolated (10%-25%)
- Scattered (25%-50%)
- Broken (50%-90%)
- Overcast (>90%)

Visual Opacity:

- Opaque
- Translucent
- Transparent

4. Mid Level Clouds

- No Mid Level Clouds Observed (Go to box 5)

Cloud Type:

- Altostratus
- Altocumulus

Cloud Cover :

- Few (<10%)
- Isolated (10%-25%)
- Scattered (25%-50%)
- Broken (50%-90%)
- Overcast (>90%)

Visual Opacity:

- Opaque
- Translucent
- Transparent

5. Low Level Clouds

- No Low Level Clouds Observed (Go to box 6)

Cloud Type:

- Fog
- Nimbostratus
- Cumulonimbus
- Stratus
- Cumulus
- Stratocumulus

Cloud Cover :

- Few (<10%)
- Isolated (10%-25%)
- Scattered (25%-50%)
- Broken (50%-90%)
- Overcast (>90%)

Visual Opacity:

- Opaque
- Translucent
- Transparent

6. Surface Conditions

Mandatory:

- | | | | | | |
|----------------|-----------------------|-----------------------|-----------------|-----------------------|-----------------------|
| | Yes | No | | Yes | No |
| Snow/Ice | <input type="radio"/> | <input type="radio"/> | Dry Ground | <input type="radio"/> | <input type="radio"/> |
| Standing Water | <input type="radio"/> | <input type="radio"/> | Leaves on Trees | <input type="radio"/> | <input type="radio"/> |
| Muddy | <input type="radio"/> | <input type="radio"/> | Raining/Snowing | <input type="radio"/> | <input type="radio"/> |

Optional:

You may submit any or all

- Temperature: ____ °C
- Barometric Pressure: ____ mb
- Relative Humidity: ____ %



* Required Field

Study Site: _____ Date: _____ Time (UT): _____

Comments: _____

Air Temperature

Current Temperature (°C): _____

Comments: _____

Relative Humidity

(Select instrument used):

<input type="checkbox"/> Sling Psychrometer	<input type="checkbox"/> Digital Hygrometer
Dry bulb temperature (°C): _____	Ambient air temperature (°C): _____
Wet bulb temperature (°C): _____	Relative Humidity (%): _____

Comments: _____

***Barometric Pressure**

(Check one): Sea Level Pressure Station Pressure

Pressure (mb): _____

Comments: _____