

## With Passive Shielding

The Wireless Temperature/Humidity Station measures relative humidity and air temperature. The passive solar radiation shield is made of a proprietary plastic designed for high thermal reflectance and low thermal conductivity. It can be used with any wireless Vantage Pro<sup>TM</sup> weather station as well as all other compatible wireless stations.

The humidity sensor is a thin film capacitor element. A dielectric polymer layer absorbs water molecules from the air through a thin metal electrode, which causes a change in capacitance proportional to relative humidity. The temperature sensor is a precision thermistor that produces a resistance change proportional to temperature. The sensors are mounted next to one another in the sensor interface module (SIM) to ensure a close correlation between relative humidity and temperature readings. Relative humidity and temperature are used to calculate dew point.

The Wireless Temperature/Humidity Station includes temperature and humidity sensors, transmitter, and a passive solar radiation shield. Please refer to the WeatherLink® for Vantage Pro® and Vantage Pro2™ specification sheet for optional data logging and charting capabilities available for this product.

## General

Operating Temperature .....	-40° to +150° F (-40° to +65° C)
Storage Temperature .....	-50° to +158° F (-45° to +70° C)
Current Draw, Sensors & Transmitter only .....	0.14 mA (average), 30 mA (peak) (from external power source)
Battery: Sensors & Transmitter .....	CR-123 3-Volt Lithium cell
Battery Life .....	8 months
Sensor Type:	
Temperature .....	Thermistor
Relative Humidity .....	Film capacitor element
Housing Material .....	UV-resistant PVC plastic
Dimensions (length x width x height) .....	7.50" x 8.50" x 6.00" (190 mm x 216 mm x 153 mm)
Weight .....	3.5 lbs. (1.6 kg)

## Wireless Communications

Transmit/Receive Frequency .....	US Models: 902-928 MHz FHSS, Overseas Models: 868.0 - 868.6 MHz FHSS
ID Codes Available .....	8
Output Power .....	902-928 MHz FHSS: FCC-certified low power, less than 8 mW, no license required 868.0 - 868.6 MHz FHSS: CE-certified, less than 8 mW, no license required
Range	
Line of Sight .....	up to 1000 feet (300 m)
Through Walls .....	200 to 400 feet (75 to 150 m)

## Sensor Output

### Relative Humidity

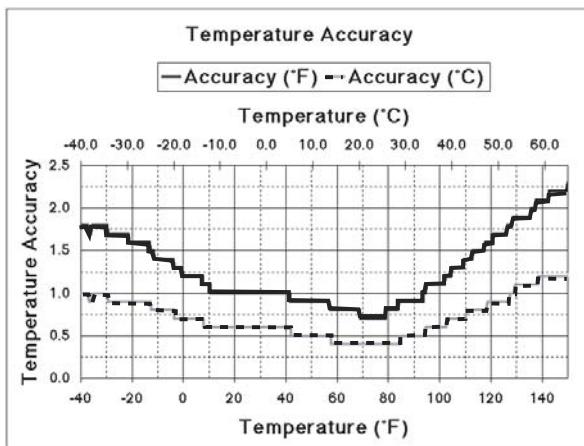
Resolution and Units .....	1%
Range .....	1 to 100% RH
Accuracy .....	±3% (0 to 90% RH), ±4% (90 to 100% RH)
Drift .....	up to ±2% per year
Update Interval .....	50 seconds (depending on ID code)
Alarms .....	High and Low Threshold from Instant Reading

## Vantage Pro2™ Accessories

### Temperature (Air)

- Resolution and Units ..... 1°F or 1°C. Celsius is converted from Fahrenheit and rounded to the nearest 1°C
- Range ..... -40° to +150° F (-40° to +65° C)
- Sensor Accuracy ..... ±1°F (±0.5°C) typical (see chart)
- Radiation Induced Error ..... +2°F (1°C) at solar noon (insolation = 1040 W/m<sup>2</sup>, avg. wind speed 2 mph (1 m/s)) (reference: RM Young Model 43408 Fan-Aspirated Radiation Shield)
- Update Interval ..... 10 seconds (depending on ID code)
- Alarms ..... High and Low Thresholds from Instant Reading

### Temperature Chart



### Package Dimensions

Product #	Package Dimensions (Length x Width x Height)	Package Weight	UPC Codes
6382	8.75" x 7.75" x 5.25" (223 mm x 197 mm x 134 mm)	3.5 lbs. (1.6 kg)	011698 00743 1
6382OV			011698 00744 8