

Thies Precipitation Sensor

Order-No: P 6362H - heatable

P 6363H - Mountain regions

- The instrument is designed to measure the height, quantity and the intensity of the precipitation striking the surface of the earth.
- Principle according to "Guide to Meteorological Instruments No 8" of WMO (World Meteorological Organization).
- The precipitation, collected by the collecting surface of 200 sq.cm, is conducted through a inflow-sieve into a tipping-bucket. After having collected the precipitation amount of 2 sq.cm = 0.1mm, the bucket tips over. A Reed switch detects this tipping procedure and induces an output pulse for 0.1 mm of precipitation in combination with the connected electronics. As the number of tipping procedures is not linear to the precipitation intensity, an intensity-dependent linearisation is carried out in the connected electronics. The linearisation procedure is based on a precipitation-intensity-dependent pulse-number-correction for the precipitation intensity range of approx. 0.5...7 mm/min. Each instrument is calibrated in the intensity range 0... 7 mm/min with a precipitation quantity of 200 sq.cm (= 10 mm precipitation height).



Specification:

Catchment Area:	200 sq.cm
Resolution:	0.1 mm per tip
Measuring Range:	max. 11mm/min.
Measuring Principle:	tipping-bucket
Electrical Output:	pulses
Ambient Temperature:	-0+60°C (without heating) -25+60°C (with heating) -35+60°C (with additional heating)
Heating:	24 V AC/DC
Supply Electronics:	524V DC (2-lead circuit)
Housing:	Stainless steel, non-corrosive
Montage:	onto mast tube Ø 50 mm
Dimensions:	Ø 186 x 445 mm
Weight:	3.3 kg
Manufacturer:	Thies

Type P6363H:

The Sensor is suitable for high mountain regions or other cold climate areas, with an additional heating integrated in the casing.