

Piezoelectric Rain Gauge

»Product Introduction

The HY-RS3E uses a compact piezoelectric sensor module inside to measure rainfall intensity by detecting the voltage generated when raindrops strike the piezoelectric module.

Compared to traditional mechanical rain gauges, the HY-RS3 piezoelectric rain sensor can detect the start and end of rainfall more sensitively and quickly; there is no need to worry about moving objects such as leaves and branches swaying above the sensor and interfering with rainfall detection. An internal heating element is available as an option to prevent icing.

The detector has no moving parts, is maintenance-free, compact, and energy-efficient.





»Technical Indicators

Project		Parameters
Measurement Type		Rain
Measurement Range		0 - 200 mm/h
Measurement Accuracy		Daily Total ±5%
Particle Size Range (Raindrop Size)		0.5 - 5.0 mm
Rainfall Resolution		0.1 mm
Sampling Frequency		1 Second
Interfaces		RS485、RS232、SDI-12
Protocols		ModBus-RTU、ModBus-ASCII
Power/Power consumption		VDC 7 - 24 /0.16 W @ 12 V (No Heating)
Operating Range		-40 ℃ - 80 ℃; 0 - 100% RH
Size		Ø82 × 90 mm
Material / Weight		ASA / 0.15 kg
Lightning Detection	Range	0 - 40 km
	Accuracy	±2 km
	Resolution	1 km

»Applications

- • Rainfall Monitoring at Weather Stations
- • Urban Meteorological Monitoring System
- • River Flood Monitoring



»Key Features

- ● Detects the start and end of rainfall more sensitively and quickly than mechanical rain gauges
- ● Unaffected by moving objects such as leaves and branches above the sensor
- ● Optional internal heating element to prevent icing
- ● No moving parts, zero wear
- ● Maintenance-free, compact, and energy-efficient



»Product Showcase





