

DATA SHEET: UVO-201 On-line Monitoring Ozone Sensor

Continuous UV Absorption Monitoring for Precise Ozone Detection

1. PRODUCT OVERVIEW

The **UVO-201** is a high-performance online ozone sensor designed for continuous air quality monitoring. Utilizing advanced UV Absorption technology, it accurately measures ozone concentrations across multiple selectable ranges. The system features automated monitoring logic and a self-zeroing calibration function to ensure long-term measurement precision and stability, making it ideal for pharmaceutical, environmental, and industrial automation applications.

2. KEY FEATURES

- Advanced UV Detection:** Leverages ultraviolet absorption principles for highly stable and reproducible ozone measurements.
- Intelligent Micro-processing:** Built-in high-speed processor for rapid response and superior anti-interference performance.
- Automated Operation:** Features automatic range switching and a self-correcting zero-calibration function to maintain high accuracy.
- Versatile Connectivity:** Supports industry-standard outputs including 4-20mA, 0-5VDC, and RS485 (Modbus) for seamless integration into Facility Monitoring Systems (FMS) or PLC architectures.
- Industrial Durability:** Engineered for long-term service life with minimal maintenance requirements in continuous online operation.

3. TECHNICAL SPECIFICATIONS

Feature	Specification
Measurement Principle	UV Absorption
Measurement Range	0-5, 0-100, 0-300, 0-500 ppm (Optional)
Accuracy	± 2% FS
Display Resolution	0.001 ppm
Sampling Cycle	10 s
Flow Rate	1.5 L/min
Output Signals	4-20mA, 0-5VDC, RS485 (Modbus)
Warm-up Time	≥ 30 min

Feature	Specification
Operating Environment	Temp: 10 ~ 40°C / Humidity: 10 ~ 90% RH
Gas Connection	Φ4 mm Tubing
Power Supply	24V DC ± 10%
Dimensions (LWH)	150 × 90 × 325 mm
Net Weight	1.9 kg

4. APPLICATIONS

- **Cleanroom Monitoring:** Continuous ozone tracking in sterile pharmaceutical and biotech zones.
- **Environmental Safety:** Detecting ozone levels in chemical processing and disinfection areas.
- **System Integration:** Serving as a core sensor for automated Facility Monitoring Systems (FMS).
- **Research & Lab:** High-precision ozone analysis for experimental and validation studies.

5. STANDARD ACCESSORIES

- UVO-201 Sensor Unit
- Power & Signal Connection Kit
- **Factory Calibration Report**
- User Manual

Manufactured by:
Honri Airclean Technology (Suzhou) Co., Ltd.