BROCHURE

AF4 (AIRFLOW MEASUREMENT SYSTEM)

POWERED BY WING TECHNOLOGY

CRC™

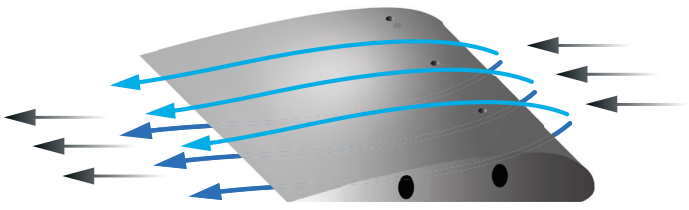
Measure What Matters.

PRODUCT OVERVIEW

AF4 TRANSMITTER

The AF4 Airflow Measurement System provides stable airflow measurement using CRC's patented WING technology. Designed for HVAC and critical environment applications, the AF4 combines aerodynamic airfoil probes with passive indirect sensing to deliver repeatable airflow feedback without the limitations of thermal and pitot-based devices.

Each system is managed by the AF4 Transmitter, which supports up to four independent airflow measurement stations. The built-in touchscreen interface provides configuration, commissioning, diagnostics, and real-time monitoring without requiring external software. With analog output and BACnet® MS/TP communication options, the AF4 supports both standalone measurement applications and integration with building automation systems.



KEY FEATURES

AF4 TRANSMITTER

- **Multi-Station Support –** Connect and manage up to four AF4 Airflow Measurement Stations from a single transmitter, minimizing hardware footprint and network load.
- **Fast Commissioning –** Touchscreen-based workflow simplifies setup, balancing, and verification without laptops or software utilities.
- **Integrated Diagnostics –** Onboard I/O status, BACnet® MS/TP counters, and live airflow data provide clear insight into device performance and network health.
- **Flexible Communication –** Supports analog outputs and BACnet® MS/TP with configurable scaling, network settings, and station assignments.

PATENTED WING TECHNOLOGY

- **Patented WING Design:** Aerodynamically shaped airfoil probes generate a stable pressure differential for airflow measurement across a wide operating range.
- **Maintenance-free Sensing:** Passive indirect sensing eliminates exposure of the sensing element to the air stream, minimizing common maintenance concerns associated with direct-exposure airflow technologies.
- **Contaminant-Resistant Operation:** The WING design reduces susceptibility to debris buildup compared to pitot tube or thermal airflow measurement methods.
- **Repeatable Field Performance:** Provides stable airflow feedback when installed in accordance with CRC placement guidelines and verified during commissioning.

APPLICATIONS

- Outside Air Intakes
- Exhaust Air Systems
- Return Air Paths
- Fan Inlets and Plenums
- Small and Medium Ducts
- Large Distribution Ducts
- Variable and Constant Volume Systems
- Applications requiring stable, low-maintenance airflow measurement

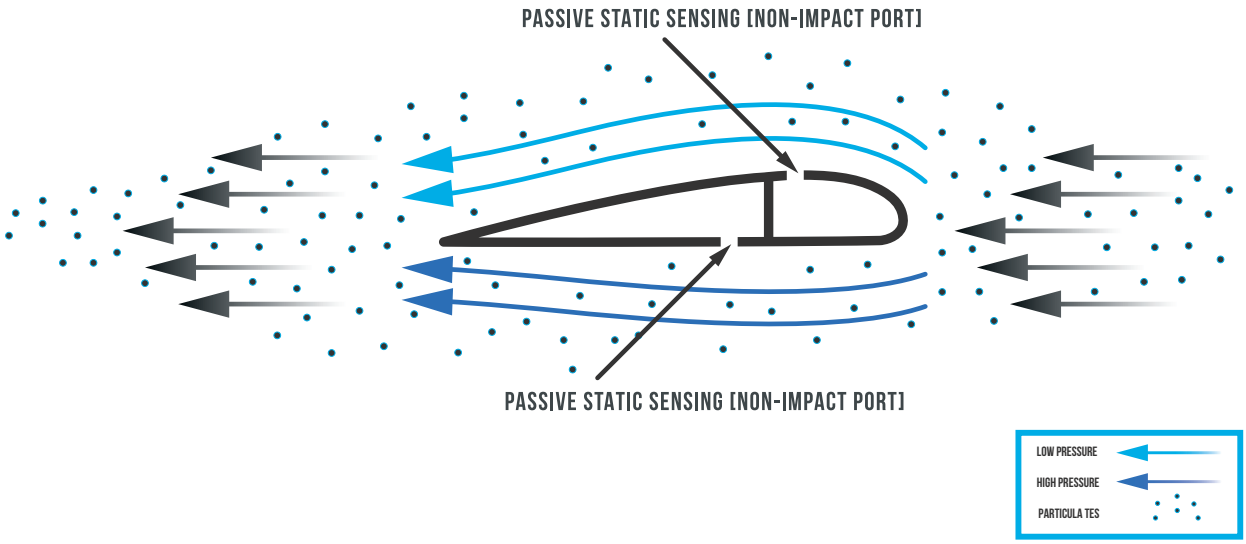
PRODUCT TECHNOLOGY

CRC's patented WING technology provides reliable airflow measurement for demanding HVAC applications, including outside air intakes, exhaust air streams, fan arrays, ducts, hoods, and plenums.

The aerodynamic WING profile creates a measurable pressure differential as air moves across the sensing element. Based on Bernoulli's principle, this pressure differential correlates to airflow velocity and provides a stable signal for airflow monitoring and control.

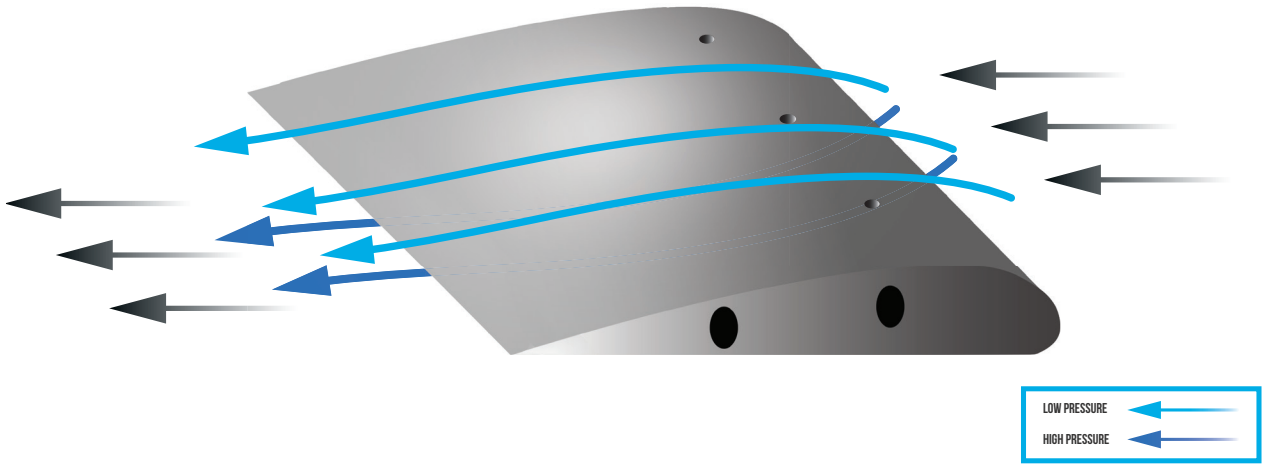
PASSIVE INDIRECT SENSING

CRC's passive indirect sensing design captures pressure through static, non-impact sensing ports perpendicular to airflow rather than direct exposed impact openings. This prevents exposure to lint, dust, dirt, and moisture, helping maintain stable airflow feedback in real-world air streams.



AIRFLOW WING DESIGN

WING technology uses precisely oriented sensing ports on the airfoil profile to detect high- and low-pressure regions created by moving air. This passive design supports repeatable airflow measurement while reducing common maintenance concerns associated with thermal sensors and traditional pressure probes.



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