

ELECTROSTATIC MEASUREMENT SOLUTIONS

BENEFITS

- User selectable sensitivity, range, and smoothing settings
- Real-time bipolar measurement
- No artificially high voltage source
- Measures current
- No maintenance or spare parts required

ADVANTAGES

- Compact
- Custom-designed sensor for easy low-cost installation
- Intrinsically safe design



Correflow 5430

Real-time inline catalyst detection

The Correflow™ 5430 electrostatic sensor monitors conditions within gas phase catalyst feed lines. It can monitor catalyst pulses and feeder changes, allowing plant operators to take appropriate action to avoid problems. With the real-time feedback from these electrostatic charge measurements, process continuity can be improved and shutdowns prevented. The Correflow ring sensor is installed directly in the

catalyst feed line. The sensor ID can be customized to fit existing lines. The Correflow is typically provided in a remote configuration to allow for a variety of process and mounting requirements.

LexMar Global
Analyze with Integrity®

CONTINUOUS CATALYST FEED MEASUREMENT

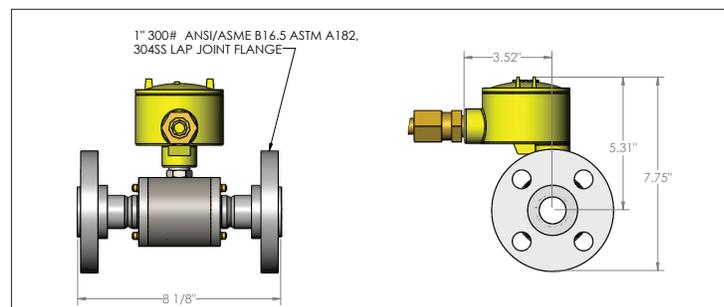
The Correflow 5430 sensor directly measures catalyst as it is feeding into a reaction process.

The system provides a robust, non-contact measurement of catalyst conveyed by gas or solvent. Polymer manufactures have substantially improved reaction control using the Correflow for instant detection of catalyst blockages or blow-by to ensure polymer production efficiency and shut avoidance.

TECHNICAL SPECIFICATIONS

MECHANICAL

- Standard line ID: 8 mm, 10 mm typical (others available)
- Swagelok or flange mounting (150 or 300 lb. typical)
- All metals exposed to reactor are stainless steel
- Pressure tested up to at least 750 psi (higher pressure systems available)



ENVIRONMENTAL

- IECEx Ex db ia IIC T4 Gb
- Ring sensor ambient to 60°C
- Electronics: ambient
- Consult LexMar Global for high temperature applications

ELECTRONICS ENCLOSURE

- Two 3/4" NPT hubs for power and analog output signal
- Cylindrical enclosure is 5.6" (14.3 cm) in diameter, 7.6" (19.4 cm) long
- Designed NEMA 4/7/9

ELECTRICAL

- 120/230 VAC 50/60 Hz or 24 VDC
- Frequency response: 0 - 100Hz
- Intrinsically safe sensor
- 4 - 20mA bipolar output
- Full scale output selectable in 9 steps from ± 0.1 to ± 1000 nA of electrostatic current
- Signal damping selectable at 0, 1, 10, or 100 seconds

DISPLAY

- 20 segment LED bar graph to indicate real time bipolar signal
- (10 negative, 10 positive segments) with green LED power indicator in the center
- 5 position full scale current range adjustment switch with an additional X100 switch
- 4 position signal smoothing switch
- All controls and indicators viewable through window in enclosure