

WPS 440



Highly Accurate Sensors Can Also Be Adaptive

Key Features

- **Zero recalibration** – sensor adapts automatically to any material (clear, opaque, metallic, nonwoven, mesh)
- **Large sensing range** – 440 mm (17.3 in) for wide web applications
- **Material-agnostic detection** – fiber-optic technology based on light scattering and spatial filtering
- **Temperature immune** – unlike ultrasonic sensors, performance unaffected by temperature changes
- **One sensor, multiple applications** – edge guiding, width measurement, centerline detection

Benefits

- **Stop losing hours** to sensor recalibration when switching between materials
- **Eliminate changeover delays** – no manual sensor adjustments between product runs
- **End quality escapes** caused by undetected sensor drift between changeovers
- **Remove safety risks** from operators accessing sensors in awkward positions
- **Prevent hidden scrap** from temperature-related inaccuracies that plague ultrasonic sensors

*Note: WPS is a legacy product line. For new installations, consider the **ODC 480** with enhanced features.*

Specifications

| | | | |
|-------------------------|-------------------------------------------------------------------------|----------------------------|-------------------------------|
| Sensor Type | Fiber Optic (diffuse-reflective) | Sensing Range | 440 mm (17.3 in) |
| Image Sensor | 1D image sensor | Resolution | 0.127 mm (0.005 in) |
| Repeatability | >99.9% | Working Distance | 15-25 mm (0.6-1.0 in) |
| Response Time | 20 ms standard | Operating Temp | -10°C to 65°C (14°F to 150°F) |
| Protection Class | IP54 | Controller Required | Yes (SCU5 only) |
| Status | Legacy Product – Consider ODC 480 for new installations | | |

Applications

- Edge position sensing on wide web applications
- Web guiding for converting, coating, and laminating lines
- Width measurement for wide materials
- Centerline detection

Compatibility

SUPPORTED LINE SPEEDS

1000+ fpm

SUPPORTED MATERIAL TYPES

Clear Film, Clear Film

SUPPORTED WEB WIDTHS

Wide (48"-72"), Extra Wide (>72")

Available Configurations

| Part Number | Configuration |
|-------------|---------------------------------------------|
| 3-400015 | WPS 440-IR QD |
| 3-400025 | WPS 440-WL QD |
| 3-400115 | WPS 440-IR QD AS |
| 7-020001 | 1" Mounting Bracket for WPS and ODC Sensors |

| Part Number | Configuration |
|-------------|---------------------------------------------------------------------------|
| 7-020004 | 1.5" Mounting Bracket for WPS and ODC Sensors |
| 7-020005 | Mounting Bracket for 1" or 25 mm Extrusion for WPS, ODC and 1DC Sensors |
| 7-020006 | Mounting Bracket for 1.5" or 40 mm Extrusion for WPS, ODC and 1DC Sensors |

Supporting Documentation

Manuals (5)

- ARIS WPS 440 Product Manual (Generic Version)
- ODC and WPS Installation for Center Guiding and Web Width Measurement
- Sensor Installation Recommendations
- Sensor Installation Recommendations: Inspection Applications
- WPS 112/221/440/900 or ODC 96/192/288/384/480/768/960 Sensor Installation for to Reduce the Effect of Twist

2D Drawings (4)

- New Mounting Brackets for WPS, ODC and 1DC sensors - 1.5 in or 40 mm extrusion
- New Mounting Brackets for WPS, ODC and 1DC sensors - 1in or 25 mm extrusion
- WPS 440 xx-QD
- WPS 440-xx QD Pixel Location: 2D Drawing

3D Models (5)

- 1.5in Mounting Bracket for WPS and ODC Sensors
- 1in Mounting Bracket for WPS and ODC Sensors
- Mounting Bracket for 1.5in or 40mm Extrusion for WPS, ODC and 1DC Sensors
- Mounting Bracket for 1in or 25mm Extrusion for WPS, ODC and 1DC Sensors
- WPS 440-xx QD

Wiring Diagrams (4)

- SCU5 C(x)D Wiring with WPS Sensor (Industrial Ethernet)
- SCU5 D Wiring with WPS Sensor (Analog Output)
- SCU5 DD Wiring with WPS Sensor (Digital Output)
- SCU5 DI Wiring with WPS Sensor (Digital Input and Output)



Scan for datasheets, 3D models & full documentation

<https://r2r.tech/products/sensors/wps-440>

Ready to Get Started?

Contact our experts to discuss how this product fits your application.

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