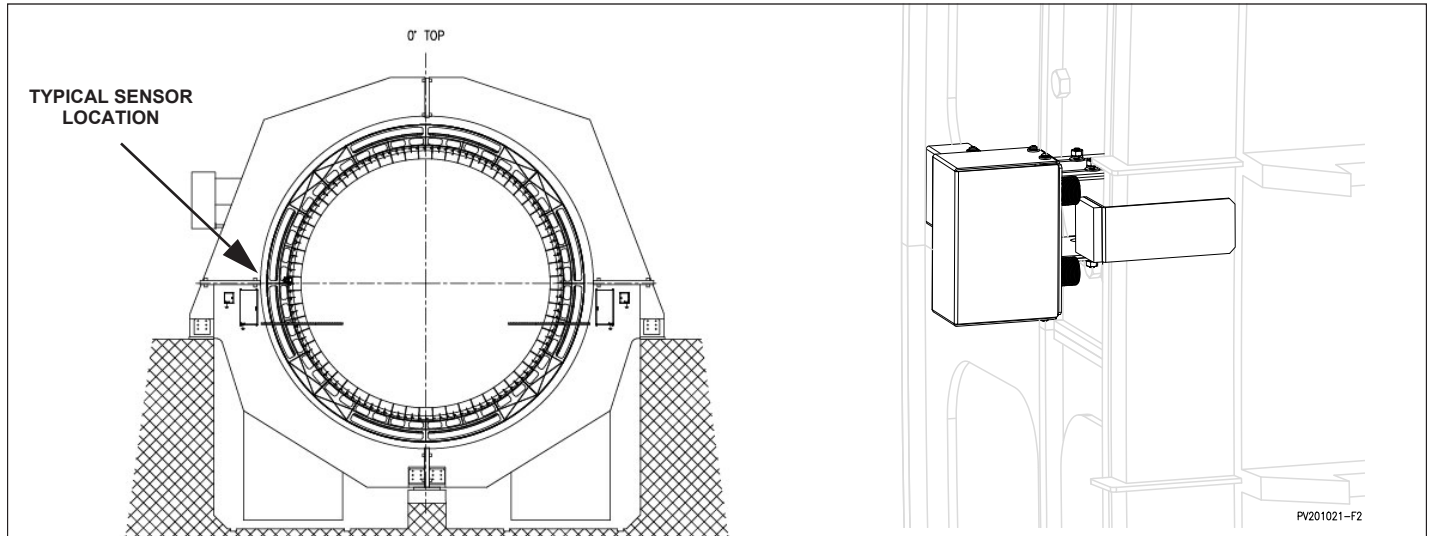




SYNCHRONIZATION SENSORS FOR THE MINING INDUSTRY

USING 0 TO 20 MM EDDY CURRENT PROXIMITY SENSORS

A synchronization sensor assembly for the mining industry includes a universal mount for eddy current proximity sensors, a mounting bracket for the synchronization target, and a synchronization target. Two sensors are installed on the same universal mount on machines that can rotate in both directions.



GENERAL SPECIFICATIONS

Sensor

Operation

• Measurement type	Non-contact proximity, eddy current
• Measuring range	0 to 20 mm [0 to 788 mils]
• Voltage output	0 to 10 V
• Sensitivity	0.5 V/mm [12.7 mV/mil]
• Repeatability	± 5%
• Bandwidth	DC to 200 Hz (-3dB)
• Load at voltage output	10 kΩ min.
• Temperature drift	< 10%
• Short-circuit protection	Built-in

Power Requirements

• Voltage	15 to 30 Vdc
• Consumption	30 mA max.
• Voltage reversal protection	Built-in

Connection

• Connector type	4-pin M12 male
• Maximum cable length (voltage output)	100 m [328 ft]

Environment

• Temperature range	
Operating	0 to 70 °C [32 to 158 °F]
Storage	-25 to 70 °C [-13 to 158 °F]
• Protection rating	IP67

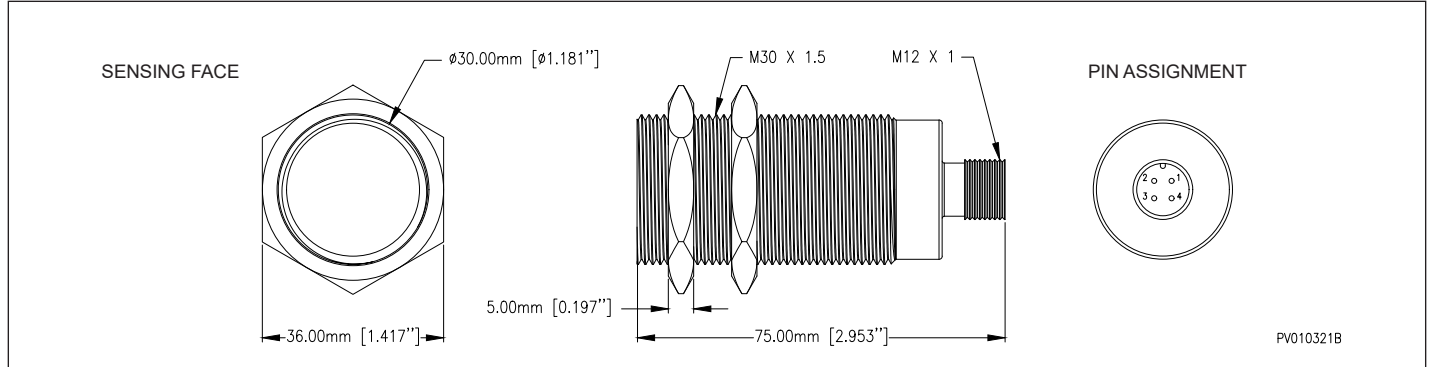


Physical Characteristics

- Body
- Sensing face

Chrome-plated brass
Polybutylene Terephthalate Polymer (PBTP)

DIMENSIONS - EDDY CURRENT PROXIMITY SENSOR



Target

- Material
- Size

AISI 1018 steel, zinc plated
60 x 60 x 9.5 mm [2.4 x 2.4 x 0.375 in]

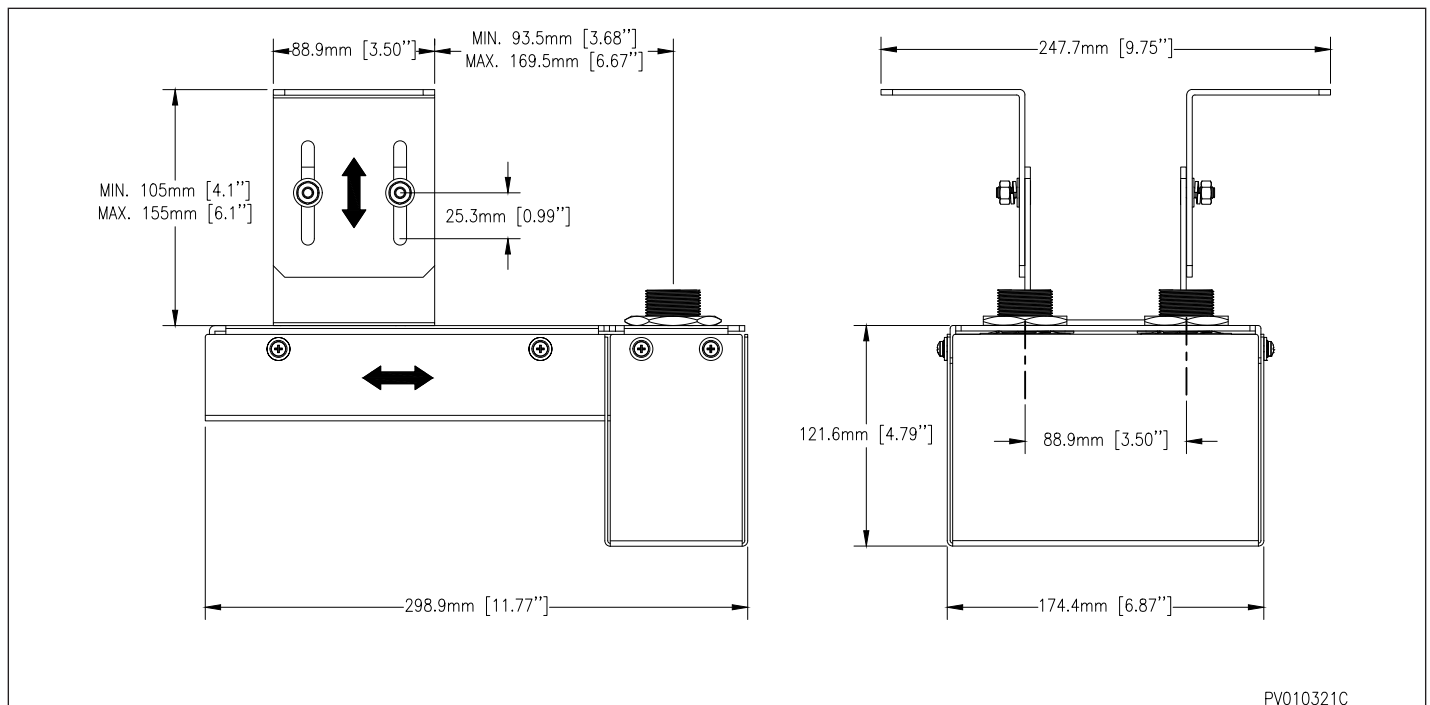
Mounting Bracket

Physical Characteristics

- Material
- Thickness
 - Frame
 - Covers

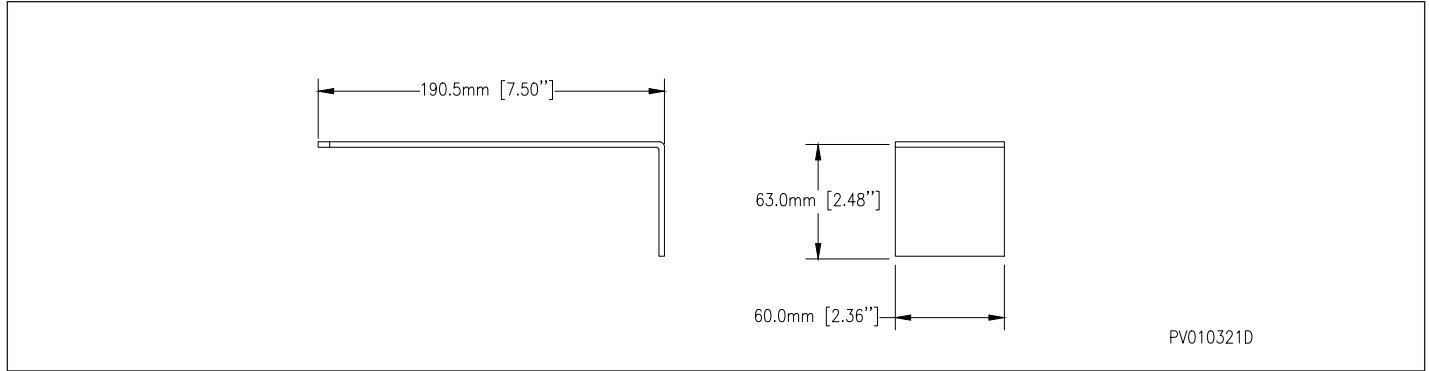
304 stainless steel
11 gauge (3.175 mm [0.125 in])
16 gauge (1.587 mm [0.0625 in])

DIMENSIONS - MOUNTING BRACKET





DIMENSIONS - TARGET HOLDER



PRODUCT IDENTIFICATION

Product Number	Description
VSM-INSTK-SYNCRHRO/M	Universal Installation Hardware for Synchronization Sensor (0-20mm)
VSM-SYNCHRO/M	Synchronization sensor for mining industries