



PIPE MOUNT

Small Pipe/Coil Sensor, Nickel RTD



The ACI Nickel Pipe Mount Series features a 1.1" long Brass sensing enclosure with slight curvature on the bottom that is designed to increase the surface area and improve thermal conductivity between the pipe and sensor. Each sensor has two, 24 inch 22 AWG Etched Teflon colored lead wires to differentiate many different sensor types. The sensors in this series are manufactured using ACI's proven double encapsulation process to eliminate the effects of moisture upon the sensors and to improve the thermal response times using our high quality, thermally conductive epoxy. The Pipe Mount sensor should be used on pipe or coil sizes from 1/2" to 1" in diameter and condensing environments. A 7.5" nylon wire tie is supplied for fastening the sensor to the top of the pipe. For best accuracy and increased thermal

conduction between the pipe and the sensor, we recommend cleaning the pipe and to use thermal grease between the mating surfaces and then to insulate the sensor from the effects of the ambient air. An optional plenum rated cable or NIST Certificates can be ordered as referenced in the ordering grid. Please contact ACI for more information regarding this sensor or to discuss your application in further detail. Other Options may be available upon request.

Applications: Cooling Coils, Heating Coils, Hot Water Systems, Chilled Water Systems, Hydronic Heating Systems, Chillers

The ACI Nickel Pipe Mount Series is covered by ACI's Five (5) Year Limited Warranty. The warranty can be found in the front of ACI's Sensors & Transmitters catalog, as well as on ACI's website, www.workaci.com.

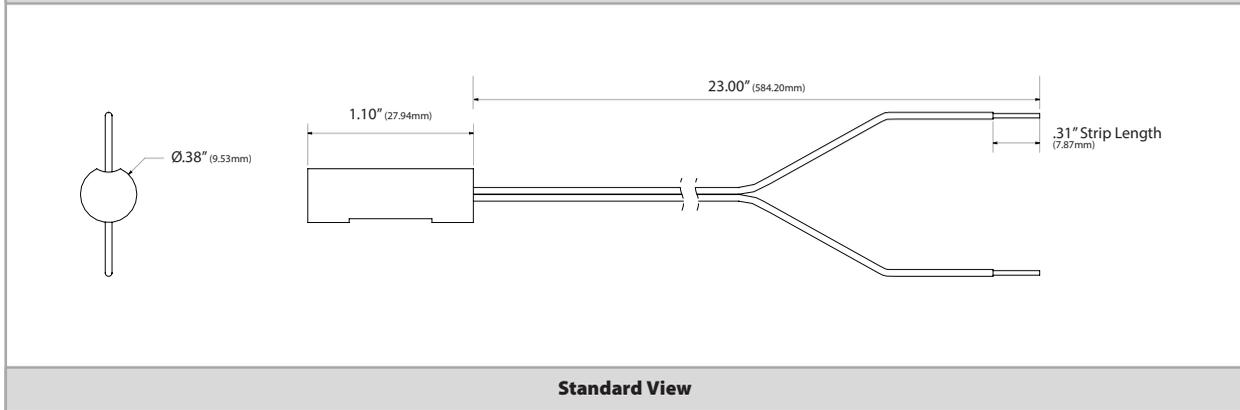
PRODUCT SPECIFICATIONS

Sensor Type Sensor Curve:	Nickel RTD PTC (Positive Temperature Coefficient)
Number Sensing Points:	One
Number Wires:	Two (Non-Polarity Sensitive)
Sensor Output @21.1°C (70°F) Lead Wire Colors:	1000 Ohms nominal Red/Red
Sensor Accuracy:	-40°C (-40°F): +/- 1.52°C (+/- 2.73°F) 0°C (32°F): +/- 0.4°C (+/- 0.72°F) 21.1°C (70°F): +/- 0.17°C (+/- 0.34°F) 54.4°C (130°F): +/- 0.56°C (1.00°F) 121°C (250°F): +/- 1.25°C (+/- 2.25°F)
Din Standard Temperature Coefficient (0-100°C):	Din 43760 6370 ppm/°C
Sensor Stability:	+/- 0.05% after 1000 Hours @ 150°C (302°F)
Response Time (63% Step Change):	15 Seconds nominal
Self-Heating Maximum Operating Current:	0.3°C / mW (Still Air) 5 mA
Pipe Mount Sensor Enclosure Material:	Brass
Pipe Sizes Accepted:	1/2" (12.7mm) to 1" (25.4mm)
Operating Temperature Range:	-40 to 121°C (-40 to 250°F)
Storage Temperature Range:	-40 to 85°C (-40 to 185°F)
Operating Humidity Range:	10 to 95% RH condensing
Lead Length Conductor Size:	24" (61cm) 22 AWG (0.65mm)
Lead Wire Insulation Wire Rating:	Etched Teflon (PTFE) Colored Leads MIL-W-16878/4 (Type E)
Conductor Material:	Silver Plated Copper
Product Dimensions (Length x Diameter):	1.10" (27.9mm) x 0.375" (9.53mm)
Product Weight:	0.05 lbs. (22.68g)
Agency Approvals:	CE, RoHS2, WEEE





DIMENSIONAL DRAWING



Standard View

STANDARD ORDERING

Model # Example: **A/1K-NI-PM -OR- 138656**

Model #	Item #	Description
A/1K-NI-PM	138656	1K Nickel, Pipe Mount, 24" Leads

OPTIONAL SENSOR ORDERING

Model # Example: **A/ 1K-NI PM 20' NIST**
A. B. C. D. E. F.

MODEL #

A. Sensor Series <i>No Selection Required</i>	A/ _____ →	A/
B. Model Series <i>No Selection Required</i>	1K-NI _____ →	1K-NI
C. Configuration <i>No Selection Required</i>	PM = 1.1" Brass Pipe Mount Sensor _____ →	PM
D. Lead Length <i>Select One (1)</i>	---- = Standard (24" Etched Teflon) 10' = 10 Feet (3.05m) 20' = 20 Feet** (6.10m)	
E. Lead Wire Type <i>Select One (1)</i>	---- = Standard (24" Teflon Colored Leads) CL2P = Plenum Rated Cable	
F. NIST <i>Select One (1)</i>	---- = No NIST Certificate NIST = NIST Certificate (3 Points)	

Note*: The 20' Length is not CE Compliant but it is RoHS Compliant

ACCESSORIES ORDERING

Model # Example: **HARDWARE, 2" HOSE CLAMP -OR- 100235**

Model #	Item #	Description
HARDWARE, 2" HOSE CLAMP	100235	Hardware, 2" Hose Clamp, Quick Release Worm Gear, 201/301 Stainless Steel
NSG HEAT TRANSFER PASTE 2OZ	102595	Thermal Grease, 2 oz. Tube, Silicone Free, -40 to 320°F (-40 to 160°C)
NSG HEAT TRANSFER PASTE 16OZ	140574	Thermal Grease, 16 oz. Jar, Silicone Free, -40 to 390°F (-40 to 198°C)

