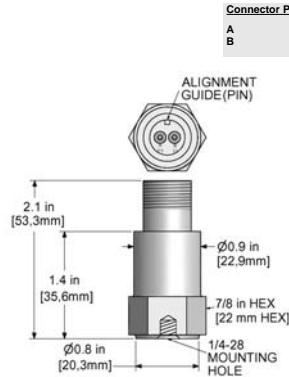


# AC107 Series

## High Temperature Accelerometer, Top Exit Connector / Cable, 100 mV/g

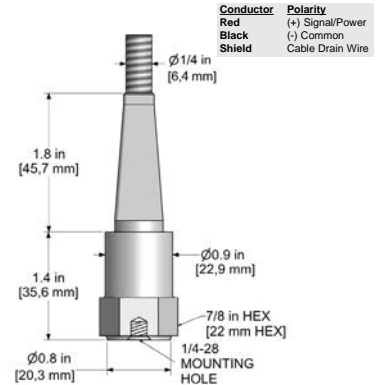


### AC107-1A 2 Pin Connector



Connector Pin	Polarity
A	(+) Signal/Power
B	(-) Common

### AC107-5A Armored Integral Cable



Conductor	Polarity
Red	(+) Signal/Power
Black	(-) Common
Shield	Cable Drain Wire

### Part Numbers & Ordering Information:

When Ordering Metric, add "M" prefix.  
(Example: M/AC107-5A/010-Z)

**AC107-1A** High temperature accelerometer, 100 mV/g, 2 pin top connector

AC107-5A/010-Z	10 ft. (3 m), blunt cut end
AC107-5A/020-Z	20 ft. (6 m), blunt cut end
AC107-5A/030-Z	30 ft. (9 m), blunt cut end
AC107-5A/050-Z	50 ft. (15 m), blunt cut end
AC107-5A/100-Z	100 ft. (30 m), blunt cut end
AC107-5A/010-F	10 ft. (3 m), BNC plug connector
AC107-5A/020-F	20 ft. (6 m), BNC plug connector
AC107-5A/030-F	30 ft. (9 m), BNC plug connector
AC107-5A/050-F	50 ft. (15 m), BNC plug connector
AC107-5A/100-F	100 ft. (30 m), BNC plug connector

\* Custom Lengths Available Upon Request

Performance Specifications	English	Metric
Sensitivity	±10%	100 mV/g
Frequency Response	±3 dB	100 mV/g
	±10%	60-600,000 CPM
		120-360,000 CPM
Dynamic Range		1,0-10000 Hz
		2,0-6000 Hz
	±50 g, peak	±50 g, peak
<b>Electrical</b>		
Settling Time (Turn on Time)		
@ Room Temp (68°F/20°C)	<2.5 Seconds	<2.5 Seconds
Power Requirement		
Voltage Source	18-30 VDC	18-30 VDC
Constant Current Excitation	2-10 mA	2-10 mA
Electrical Noise (Typical)		
Broadband 2.5 Hz to 25 kHz	200 σg, rms	200 σg, rms
Spectral 10 Hz	14 σg/√Hz	14 σg/√Hz
100 Hz	2 σg/√Hz	2 σg/√Hz
1000 Hz	1.4 σg/√Hz	1.4 σg/√Hz
Output Impedance, Max	<100 ohm	<100 ohm
Bias Output Voltage	10-14 VDC	10-14 VDC
Electrical Case Isolation	>10 <sup>8</sup> ohm	>10 <sup>8</sup> ohm

Environmental	English	Metric
Temperature Range	-58 to 302° F	-50 to 150° C
Maximum Shock Protection	5,000 g, peak	5000 g, peak
Electromagnetic Sensitivity	CE	CE
Sealing	Welded, Hermetic	Welded, Hermetic
<b>Physical</b>		
Sensing Element	PZT Ceramic	PZT Ceramic
Sensing Structure	Shear Mode	Shear Mode
Weight	3.2 oz.	90 grams
Case Material	316L Stainless Steel	316L Stainless Steel
Mounting Hole	1/4-28	1/4-28
Connector (AC107-1A)	2 Pin MIL-C-5015	2 Pin MIL-C-5015
Armored Cable (AC107-5A)	CB206, Armor Jacket	CB206, Armor Jacket
<b>Mechanical</b>		
Resonant Frequency	1,380,000 CPM	23000 Hz
Mounting Torque	2 to 5 ft. lbs.	2,7 to 6,8 Nm
<b>Supplied Accessories</b>		
Mounting Hardware	1/4-28 Stud	M6x1 Adapter Stud
Calibration Certificate	CA10	CA10

### Common Applications

#### Industries Served

- Automotive
- Pharmaceutical
- Wastewater Treatment
- Manufacturing
- Power
- Military
- Pulp and Paper
- Mining
- Steel

#### Typical Applications

- Air Compressors
- Cooling Towers
- Gear Boxes
- Pumps
- Turbines <302° F (150° C)
- Air Handlers
- Dryer Sections <302° F (150° C)
- Motors
- Pumps, Underwater
- Compressors
- Fans
- Press Sections
- Roll and Process Equipment
- Conveyors
- Fourdriniers
- Presses and Stamping
- Spindles

#### Measurement Types

- Permanent Mount

For optional accessories, please see the *Sensor Accessory Selection Chart*.