AC153 Series



Low Cost, Low Frequency Accelerometer, Top Exit 2 Pin Connector, 500 mV/g, ±15%



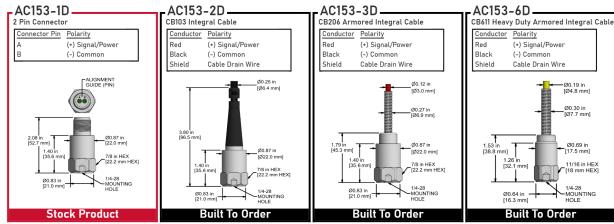


Product Features

Designed for low speed Rotors, Main Bearings, and Gear Box Inputs, but may also be used for High Frequency Detection

Low Cost Accelerometer

- ▶ 500 mV/g Sensitivity
- ▶ 0.1 Hz for Low Frequency Measurements
- ▶ 10 kHz for High Frequency Detection



Specifications	Standard	Metric	Specifications	Standard	Metric
Part Number	AC153	M/ or M8/AC153	Environmental	<u> </u>	
Sensitivity (±15%)	500 mV/g		Operating Temperature Range	-58 to 250 °F	-50 to 121 °C
Frequency Response (±3dB)	6-600,000 CPM	0,1-10000 Hz	Maximum Shock Protection	5,000 g, peak	
Dynamic Range	± 16g, peak	5	Electromagnetic Sensitivity	CE	
	*Vsource ≥ 22V, 12Vbia:		Sealing	Welded, Hermetic	
<u>Electrical</u>			Submersible Depth	200 ft.	60 m
Settling Time	<2 Seconds		SIL Rating	SIL 2	
Voltage Source (IEPE)	18-30 VDC		Physical		
Constant Current Excitation	2-10 mA		Sensing Element	PZT Ceramic	
Spectral Noise @ 10 Hz	1.7 µg/√Hz		Sensing Structure	Shear Mode	
Spectral Noise @ 100 Hz	0.2 μg/√Hz		Weight	3.2 oz	92 grams
Spectral Noise @ 1000 Hz	0.12 μg/√Hz	Case Mate	Case Material	316L Stainless	
Output Impedance	<100 ohm		Case Material	Steel	
Bias Output Voltage	10-14 VDC		Mounting Thread	1/4-28 Blind	
Case Isolation	>10 ⁸ ohm			Tapped Hole	
			Connector (Non-Integral)	2 Pin MIL-C-5015	
			Resonant Frequency	1,080,000 CPM	18000 Hz
			Mounting Torque	2 to 5 ft. lbs.	2,7 to 6,8 Nm
			Mounting Hardware Supplied	1/4-28 Stud	M6x1 or M8x1.25
			mounting rial aware Supplied	1/4-20 3tuu	Adapter Stud
			Calibration Certificate	CA10	

Typical Frequency Response **OdB **