

# HS-107 Accelerometer

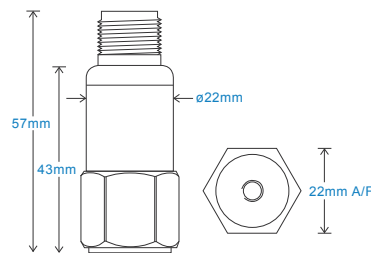
## AC acceleration output via 2 Pin MS Connector

### Key Features

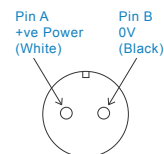
- Line Drive
- For use with data collector
- Customisable features

### Industries

Building services, Pulp and Paper,  
Mining, Metals, Utilities, Automotive,  
Water, Pharmaceutical, Wind



Connection Details



### Technical Performance

Mounted Base Resonance	see 'How To Order' table (nominal)
Sensitivity	see: 'How To Order' table $\pm 10\%$ Nominal 80Hz at 22°C
Frequency Response	2Hz (120cpm) to 10kHz (600kcpm) $\pm 5\%$ 1.5Hz (90cpm) to 12kHz (720kcpm) $\pm 10\%$ 0.8Hz (48cpm) to 15kHz (900kcpm) $\pm 3\text{dB}$
Isolation	Base isolated
Range	see: 'How To Order' table
Transverse Sensitivity	Less than 5%

### Mechanical

Case Material	Stainless Steel
Sensing Element/Construction	PZT/Compression
Mounting Torque	8Nm
Weight	106gms (nominal) body only
Screened Cable Assembly	see: <a href="http://www.hansfordsensors.com">www.hansfordsensors.com</a> for options
Connector	HS-AA004 - non-booted HS-AA053 or HS-AA054 - booted
Mounting Threads	see: 'How To Order' table

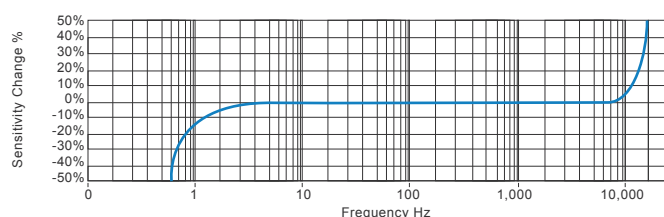
### Electrical

Electrical Noise	0.1mg max
Supply Voltage	7.5 - 24Volts DC
Bias Current	3.5mA
Settling Time	2 seconds
Output Impedance	200 Ohms max.
Case Isolation	$>10^8$ Ohms at 500 Volts

### Environmental

Operating Temperature Range	-55 to 140°C
Sealing	IP68
Maximum Shock	5000g
EMC	EN61326-1:2013

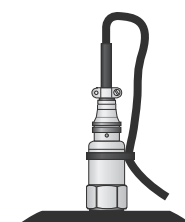
### Typical Frequency Response (at 100mV/g)



### Applications

Fans, Motors, Pumps, Compressors,  
Centrifuges, Conveyors, Air Handlers,  
Gearboxes, Rolls, Dryers, Presses,  
Cooling, VAC, Spindles, Machine Tooling,  
Process Equipment

Vibration sensor should be firmly fixed to a flat surface  
(spot face surface may be needed to be produced and  
cable anchored to sensor body.)



### How To Order

Product Prefix	Product Series										
HS - Hansford Sensors	107 - Industrial Vibration Sensor	H	S	1	0	7	X	X	X	X	X
Extra Options (If required)	Sensitivity	Range	Resonant	Frequency	Cable/Connector	Mounting Threads					
F - Filtered	010 - 10μA/g	±80g	28kHz	(1,680kcpm)	01 - PUR	01 - 1/4-28" UNF Female					
L - 316L Stainless Steel	050 - 50μA/g	±16g	24kHz	(1,440kcpm)	02 - Braided	02 - 1/4-28" UNF Male					
RT - Temperature Output PT100	(other options available on request)					07 - Silicon	05 - Quick Fit Female				
S - 90° Side Exit						08 - Flame Retardant	06 - M6 x 1mm Male				
T - Temperature Output						50 - 2 Pin MS	08 - M8 x 1.25mm Male				
Y - 5% tolerance on sensitivity						54 - M12	10 - M10 x 1.5mm Male				



[www.hansfordsensors.com](http://www.hansfordsensors.com)  
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We reserve the right to alter the specification of this product without prior notice

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