

# HS-150 Premium Accelerometer

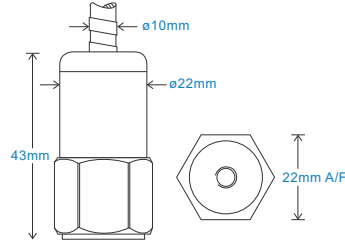
## AC acceleration output via FEP Cable with Protective Conduit

### Key Features

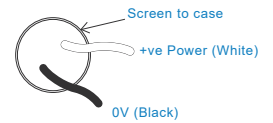
- Resistant to oil
- Protective Conduit
- Premium design

### Industries

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



### Connection Details



### Technical Performance

Mounted Base Resonance	see 'How To Order' table (nominal)
Sensitivity	see: 'How To Order' table ±10% Nominal 80Hz at 22°C
Frequency Response	1.5Hz (90cpm) to 10kHz (600kcpm) ± 5% 0.5Hz (30cpm) to 12kHz (720kcpm) ± 10% 0.2Hz (12cpm) to 15kHz (900kcpm) ± 3dB
Isolation	Base isolated
Range	see: 'How To Order' table
Transverse Sensitivity	Less than 5%

### Mechanical

Case Material	Stainless Steel
Sensing Element/Construction	PZT/Shear
Mounting Torque	8Nm
Weight	106gms (nominal) body only
Screened Cable Assembly	see: <a href="http://www.hansfordsensors.com">www.hansfordsensors.com</a> for options
Maximum Cable Length	1000 metres
Standard Cable Length	5 metres
Mounting Threads	see: 'How To Order' table
Conduit Material	304 Stainless Steel
Conduit Length	Conduit Length is approx. 0.5m shorter than the cable Maximum Conduit Length:30m

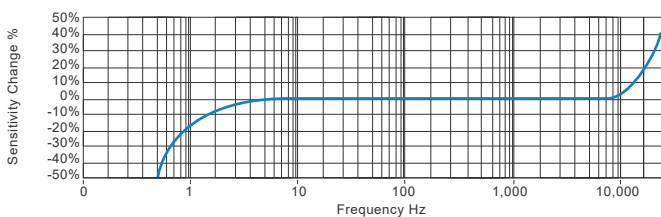
### Electrical

Excitation Voltage:	18-30Volts DC
Electrical Noise	0.1mg max
Current Range	0.5mA to 8mA
Bias Voltage	10 - 12 Volts DC
Settling Time	2 seconds
Output Impedance	200 Ohms max.
Case Isolation	>10 <sup>8</sup> Ohms at 500 Volts

### Environmental

Operating Temperature Range	-55 to 150°C
Sealing	IP65
Maximum Shock	5000g
EMC	EN61326-1:2013

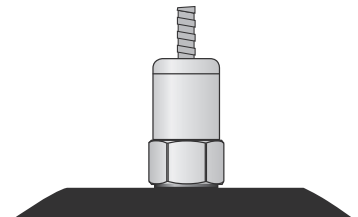
### Typical Frequency Response (at 100mV/g)



### 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	Cable Length (if integral cable)
HS - Hansford Sensors	150 - Premium Industrial Vibration Sensor	QXX - length specified in metres
<b>H</b>	<b>S</b>	<b>X</b>
<b>1</b>	<b>5</b>	<b>X</b>
<b>0</b>	<b>S</b>	<b>X</b>
<b>X</b>	<b>X</b>	<b>X</b>
<b>X</b>	<b>X</b>	<b>X</b>
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Extra Options (if required)	Sensitivity	Range	Resonant Frequency	Cable/Connector	Mounting Threads
F - Filtered	010 - 10mV/g	±800g	34kHz (2,040kcpm)	30C - FEP with Protective Conduit	01 - ¼-28" UNF Female
L - 316L Stainless Steel	030 - 30mV/g	±250g	33kHz (1,980kcpm)		02 - ¼-28" UNF Male
RT - Temperature Output PT100	050 - 50mV/g	±160g	32kHz (1,920kcpm)		05 - Quick Fit Female
S - 90° Side Exit	100 - 100mV/g	±80g	30kHz (1,800kcpm)		06 - M6 x 1mm Male
T - Temperature Output	250 - 250mV/g	±32g	28kHz (1,680kcpm)		08 - M8 x 1.25mm Male
Y - 5% tolerance on sensitivity	500 - 500mV/g	±16g	26kHz (1,560kcpm)		10 - M10 x 1.5mm Male



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We reserve the right to alter the specification of this product without prior notice

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