

## AC acceleration output via M12 Connector

## Key Features

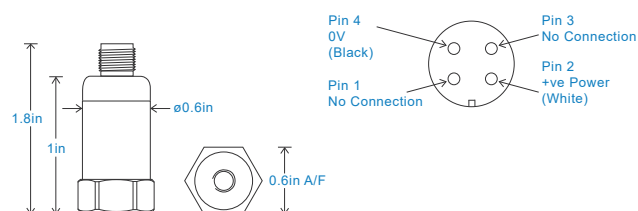
- Compact design
- Premium design
- Customisable features

## Industries

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



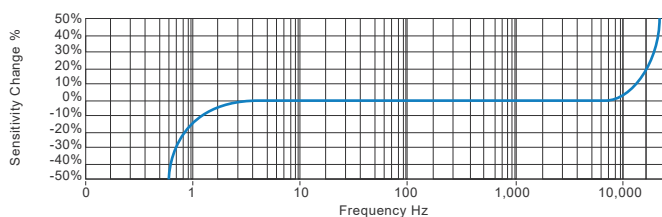
### Connection Details



Technical Performance		Mechanical	
Mounted Base Resonance	see 'How To Order' table (nominal)	Case Material	Stainless Steel
Sensitivity	see: 'How To Order' table $\pm 10\%$	Sensing Element/Construction	PZT/Shear
	Nominal 80Hz at 72°F	Mounting Torque	5.9ft. lbs
Frequency Response	120cpm (2Hz) to 840kcpm (14kHz) $\pm 5\%$	Mounting Bolt Provided	see: 'How To Order' table x 1in long
	90cpm (1.5Hz) to 960kcpm (16kHz) $\pm 10\%$	Weight	1.8 oz. (nominal)
	48cpm (0.8Hz) to 1,140kcpm (19kHz) $\pm 3\text{dB}$	Connector	Use booted connector only
Isolation	Base isolated	Mounting Threads	see: 'How To Order' table
Range	see: 'How To Order' table		
Transverse Sensitivity	Less than 5%		

Electrical		Environmental	
Electrical Noise	0.1mg max	Operating Temperature Range	-67 to 300°F
Current Range	0.5mA to 8mA	Sealing	IP67
Bias Voltage	10 - 12 Volts DC	Maximum Shock	5000g
Settling Time	1 second	EMC	EN61326-1:2013
Output Impedance	200 Ohms max.		
Case Isolation	>10 <sup>8</sup> Ohms at 500 Volts		

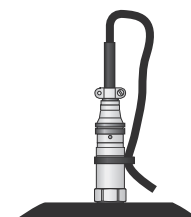
### Typical Frequency Response (at 100mV/g)



## 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 HS - Hansford Sensors		Product Series 170 - Compact Premium Industrial Vibration Sensor						Cable Length (if integral cable) QXX - length specified in metres						
H	S	1	7	0	X	X	X	X	X	X	X	X	X	X
Extra Options (if required) F - Filtered L - 316L Stainless Steel S - 90° Side Exit Y - 5% tolerance on sensitivity		Sensitivity 010 - 10mV/g 030 - 30mV/g 050 - 50mV/g 100 - 100mV/g 250 - 250mV/g 500 - 500mV/g		Range ±800g ±250g ±160g ±80g ±32g ±16g		Resonant Frequency 30kHz (1,800kcpm) 28kHz (1,680kcpm) 26kHz (1,560kcpm) 24kHz (1,440kcpm) 22kHz (1,320kcpm) 20kHz (1,200kcpm)		Cable/Connector 01 - PUR 02 - Braided 07 - Silicon 08 - Flame Retardant 50 - 2 Pin MS 54 - M12		Mounting Threads 01 - ¼-28" UNF Female 02 - ¼-28" UNF Male 06 - M6 x 1mm Male 08 - M8 x 1.25mm Male 10 - M10 x 1.5mm Male				



www.hansfordsensors.com  
sales@hansfordsensors.com

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

TS801U.5

