



- Full-Scale range 2 in/S RMS
- Convenient 1/4-28 UNF Mount
- Protect machinery from unwanted vibration
- · Fail-Safe Operation
- Monitor For Multiple Failure Points
- Stainless Steel NEMA 4X Housing



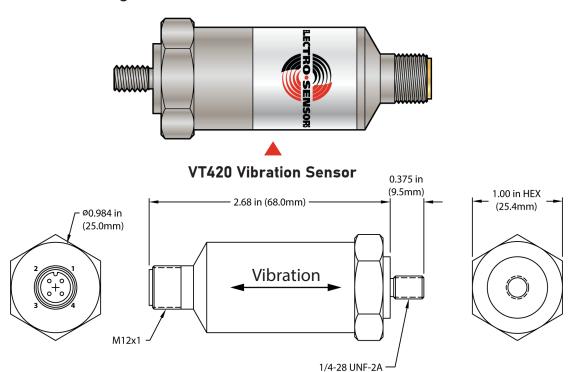
Description

The VT420 is a RMS Vibration Velocity sensor (per ISO 10816) housed in a stainless steel enclosure with a built in 1/4-28 mounting stud. The standard sensor monitors vibration in 2 in/S RMS vibration range. The housing uses a standard M12 connector for power and allows for easy connection/wiring. The VT420 outputs vibration data in a proportional 4-20mA output signal.

Principle Of Operation

The Electro-Sensors VT420 Vibration Monitor confirms normal operation of processes utilizing continuous vibration. The VT420 measures vibration in RMS vibration velocity. The sensor outputs data via a 4-20 mA output that can be used with a PLC or plant control system. It can be mounted directly to machinery or be mounted with a magnetic mounting platform. Electro-Sensors also offers a PM500 display unit to show sensor data at the monitoring point or in the control room.

Dimensional Drawings



Product Specifications

VT420 Specifications		
Dimensions (Sensor Block)	68mm x 25.4mm x 25.4mm	
Mounting Thread	1/4-28 UNF-2A	
Sensor Connection	M12, 4-pin, male, A-code pin 1 (+) pin 2 (-) pin 3 (not connected) pin 4 (not connected)	
Power		
Voltage	6.5 → 30 Vdc (24 Vdc recommended)	
Wiring Method	2-Wire	
Signal Output	4-20 mA	
Cable	2-conductor 16 AWG Unshielded	
Cable Length	8 Ft. Standard	
Sensing		
Full-scale Range	2 in/S RMS	
Accuracy	±5% max error (full scale @ 100Hz)	
Vibration Frequency Range	10 → 1000 Hz (≥ -3db)	
Angle of Vibration Sensing	Horizontally Accross Sensor	

Specifications subject to change without notice.

Ordering

Model Number	Part Number
VT420	VT420-e-02-M12-A0

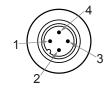
Options

Optional remote vibration sensor data display.

Model Number	Part Number
PM 500, 115 VAC	800-004300
PM500, 230 VAC	991-000020
PM500, With 2 Relays	991-000021
PM500, With Analog Output	991-00023

Typical Wiring Diagram

M12, 4-pin, male A-code	Connect to
Pin 1	Power (+)
Pin 2	Power (-)
Pin 3	Not Connected
Pin 4	Not Connected



Customization

If one of our standard products does not meet your specifications, please call one of our applications specialists. Many of our products can be customized to fit specific needs.

Additional Information

For more information about product, please refer to the VT 420 Installation and Operating Manual

Email: sales@electro-sensors.com

Tel: (800)328-6170 Fax: (952)930-0130

We also have more information online at:

www.electro-sensors.com