



A/120/VTI Piezo-Tronic IEPE Accelerometer Case Isolated

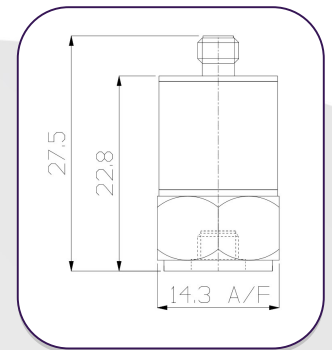
10mV/g up to 1V/g $\pm 10\%$ 26.6gm Std temp 125°C

The A/120 range of general purpose Konic shear IEPE vibration transducers offer a wide range of mounting, connectors and sensitivities all using DJB's unique and technically superior Konic shear design of piezoelectric ceramic sensor. Offering anything from 10mV/g up to 1V/g output within the same size accelerometer body it is perfectly suited to applications from vibration shaker control and delicate testing through to industrial machine monitoring.

The A/120/VTI offers a case isolated construction with a top entry 10/32 microdot connector

Using a wide range of IEPE signal conditioning levels the A/120 can interface directly to a wide range of commercially available vibration spectrum analyzers and data acquisition systems as well as in our own VB/01 & VB/02 and CV9 signal conditioners which offer a range of amplification options.

A/120/VTI



Note:

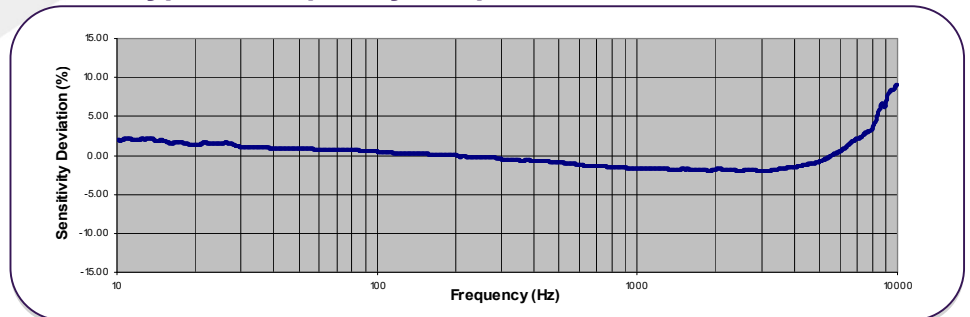
Voltage sensitivities shown are standard. We offer a wide range of sensitivities on request and recommend that applications are evaluated to determine the requisite sensitivity.

Options:

Cable assemblies available to any length and with any terminating connector.

- A/120/CR – Side entry
- A/120/V – Side entry
- A/120/VI – Side entry
- A/120/VT – Top entry
- A/120/VTC – Top entry
- A/120/VTI – Top entry

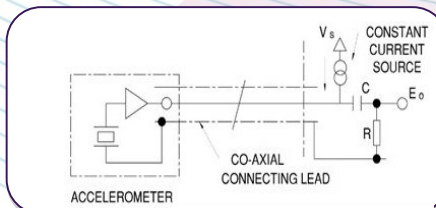
Typical Frequency Response



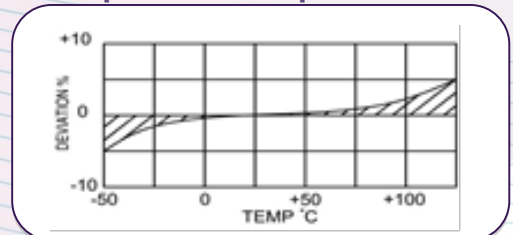
Typical Spectral Noise (100mV/g)

1Hz	732 $\mu\text{g}/\sqrt{\text{Hz}}$
10Hz	28.7 $\mu\text{g}/\sqrt{\text{Hz}}$
100Hz	8.9 $\mu\text{g}/\sqrt{\text{Hz}}$
1kHz	4.75 $\mu\text{g}/\sqrt{\text{Hz}}$
10kHz	3.99 $\mu\text{g}/\sqrt{\text{Hz}}$

Accelerometer Connection



Temperature Response



Please note: For information and reference only. Data should not be used as pass / fail criteria for calibration purposes

DJB Instruments (UK) Ltd

Finchley Avenue,
Mildenhall, Suffolk IP28 7BG

Tel +44 (0)1638 712 288
Email sales@djbinstruments.com
Web www.djbinstruments.com

DJB Iss.7 2020

A UK company with UK-based manufacturing, assembly and calibration in-house.



ISO 9001 – 00025363



A/120/VTI Piezo-Tronic IEPE Accelerometer Case Isolated

10mV/g up to 1V/g $\pm 10\%$ 26.6gm Std temp 125°C

	Metric		Imperial	
	1.0mV/(m/s ²)	10.2mV/(m/s ²)	10mV/g	100mV/g
Resonant frequency	28 kHz			
Typical Frequency Response	1Hz – 7kHz 0.7Hz – 8kHz			
Cross Axis error	$\leq 5\%$			
Insulation Resistance	$10^{10}\Omega$ at 250V			
Temperature Range	-50/+125°C		-58/+257°F	
Voltage sensitivity deviation (20°C/68°F)	-5% @ -50°C +5% @ +125°C		-5% @ -58°F +5% @ +257°F	
Supply voltage	15/35 V DC			
Supply current	2/20mA			
Bias voltage	10/14 VDC			
Output Impedance	$\leq 100\Omega$			
Broadband resolution (grms)	0.005	0.003	0.005	0.003
Amplitude linearity (%FS)	$\leq 1\%$			
Settling time within 10% bias	<5 secs			
Shock Limit	49,033m/s ²		5000g	
Saturation Limit, equiv .g	4903m/s ²	490m/s ²	500g	50g
Base Strain Sensitivity	$\leq 0.001\text{g}/\mu$ strain			
Case material	Stainless Steel 303			
Mounting	Base tapped hole, 10-32 UNF x 4mm deep		Base tapped hole, 10-32 UNF x 0.16 deep	
Weight	26.6g		0.94oz	
Case seal	Welded hermetic connector		Welded hermetic connector	
Connector	10-32 UNF Microdot top entry			
Size	14.3 (A/F) x 27.5mm		0.562in (A/F) x 1.084in	

Please note: For information and reference only. Data should not be used as pass / fail criteria for calibration purposes

DJB Instruments (UK) Ltd

Finchley Avenue,
Mildenhall, Suffolk IP28 7BG

Tel +44 (0)1638 712 288
Email sales@djbinstruments.com
Web www.djbinstruments.com

DJB Iss.7 2020

A UK company with UK-based manufacturing, assembly and calibration in-house.



ISO 9001 – 00025363