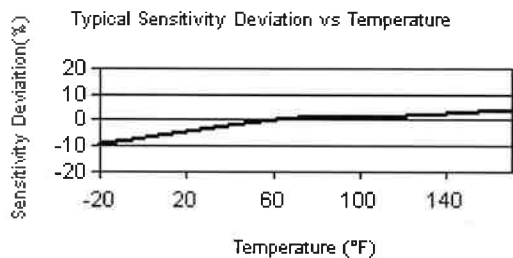


Model Number  
356B18

# TRIAxIAL ICP® ACCELEROMETER

Revision: G  
ECN #: 26468

Performance	ENGLISH	SI	
Sensitivity(± 10 %)	1000 mV/g	102 mV/(m/s <sup>2</sup> )	
Measurement Range	± 5 g pk	± 49 m/s <sup>2</sup> pk	
Frequency Range(± 5 %)	0.5 to 3000 Hz	0.5 to 3000 Hz	
Frequency Range(± 10 %)	0.3 to 5000 Hz	0.3 to 5000 Hz	
Resonant Frequency	≥ 20 kHz	≥ 20 kHz	
Phase Response(± 5 °)(at 70°F [21°C])	2 to 2000 Hz	2 to 2000 Hz	[1]
Broadband Resolution(1 to 10,000 Hz)	0.00005 g rms	0.0005 m/s <sup>2</sup> rms	[2]
Non-Linearity	≤ 1 %	≤ 1 %	
Transverse Sensitivity	≤ 5 %	≤ 5 %	
<b>Environmental</b>			
Overload Limit(Shock)	± 5000 g pk	± 5000 g pk	
Temperature Range(Operating)	-20 to +170 °F	-29 to +77 °C	
Temperature Response	See Graph	See Graph	
Base Strain Sensitivity	0.0007 g/με	0.007 (m/s <sup>2</sup> )/με	[1]
<b>Electrical</b>			
Excitation Voltage	20 to 30 VDC	20 to 30 VDC	
Constant Current Excitation	2 to 20 mA	2 to 20 mA	
Output Impedance	≤ 600 ohm	≤ 600 ohm	
Output Bias Voltage	8 to 12 VDC	8 to 12 VDC	
Discharge Time Constant	0.8 to 3.0 sec	0.8 to 3.0 sec	
Settling Time(within 10% of bias)	<12 sec	<12 sec	
Spectral Noise(1 Hz)	11.4 μg/√Hz	112 (μm/s <sup>2</sup> )/√Hz	[1]
Spectral Noise(10 Hz)	4.0 μg/√Hz	39 (μm/s <sup>2</sup> )/√Hz	[1]
Spectral Noise(100 Hz)	1.2 μg/√Hz	12 (μm/s <sup>2</sup> )/√Hz	[1]
Spectral Noise(1 kHz)	0.4 μg/√Hz	4.4 (μm/s <sup>2</sup> )/√Hz	[1]
<b>Physical</b>			
Sensing Element	Ceramic	Ceramic	
Sensing Geometry	Shear	Shear	
Housing Material	Anodized Aluminum	Anodized Aluminum	
Sealing	Epoxy	Epoxy	
Size (Height x Length x Width)	0.80 in x 1.03 in x 0.80 in	20.3 mm x 26.1 mm x 20.3 mm	
Weight	0.88 oz	25 gm	[1]
Electrical Connector	1/4-28 4-Pin	1/4-28 4-Pin	
Electrical Connection Position	Side	Side	
Mounting Thread	10-32 Female	10-32 Female	



All specifications are at room temperature unless otherwise specified.  
In the interest of constant product improvement, we reserve the right to change specifications without notice.

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## OPTIONAL VERSIONS

Optional versions have identical specifications and accessories as listed for the standard model except where noted below. More than one option may be used.

### A - Adhesive Mount

Mounting Thread: None - Adhesive Mount Only  
 Supplied Accessory: Model 080A109 Petro Wax (1)  
 Supplied Accessory: Model 080A90 Quick Bonding Gel (1)

### J - Ground Isolated

Electrical Isolation(Base): >10<sup>8</sup> ohm  
 Size - Height x Length x Width: 0.85 in x 1.03 in x 0.85 in / 21.6 mm x 26.1 mm x 21.6 mm

T - TEDS Capable of Digital Memory and Communication Compliant with IEEE P1451.4

TLA - TEDS LMS International - Free Format

TLB - TEDS LMS International - Automotive Format

TLC - TEDS LMS International - Aeronautical Format

TLD - TEDS Capable of Digital Memory and Communication Compliant with IEEE 1451.4

Output Bias Voltage: 8.5 to 13 VDC

## NOTES:

- [1] Typical.
- [2] Zero-based, least-squares, straight line method.
- [3] See PCB Declaration of Conformance PS023 for details.

## SUPPLIED ACCESSORIES:

- Model 080A109 Petro Wax (1)
- Model 080A68 Adhesive mounting base (for Models 356B07 and 356B08) (1)
- Model 081B05 Mounting Stud (10-32 to 10-32) (1)
- Model ACS-1T NIST traceable triaxial amplitude response, 10 Hz to upper 5% frequency. (1)
- Model M081B05 Mounting Stud 10-32 to M6 X 0.75 (1)

Entered: BIS	Engineer: JS	Sales: ROZ	Approved: [Signature]	Spec Number:
Date: 5-16-07	Date: 5/16/07	Date: 5/16/07	Date: 5/16/07	11615

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