

Linear Accelerometers

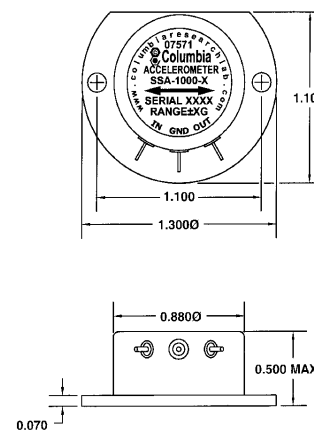
SSA-1000-1, SSA-1000-2

The Columbia Series SSA-1000 Solid State Silicon Accelerometers utilize military-grade assembly line construction techniques with the production controls and inspection associated with a Military Certified Quality System. These sensors offer improved performance, smaller size and added features at comparable prices to existing MEMs competition.

Electrical connections are made directly to solder terminals or via an integral shielded cable. Frequency response is factory pre-set at DC to 100 Hz with wideband response. Military-grade packaging techniques have reduced the size of the rugged, lightweight case design, allowing this sensor to withstand the most demanding environmental conditions. *Consult the factory for customized versions of these sensors.*

Note: Exports of accelerometers from the United States are subject to the licensing requirements of the Export Administration Regulations (EAR) and/or the International Traffic in Arms Regulations (ITAR).

- * Solid State Sensor
- * Wide Range Input Power
- * Choice of Output Configurations
- * Small Size & Low Cost



Specifications

	SSA-1000-1	SSA-1000-2
Operational		
Range	±2 G	±10 G
Standard Bipolar Output Voltage	±5 Volts Into 100K Load	
Optional Unipolar Output Voltage	0 To +5 VDC	
Excitation	+7.5 To +32 VDC 7 mA Max	
Output Impedance	150 Ohms Nominal	
Sensitive Axis Alignment	< ±0.5° Max.	
Scale Factor Tolerance	±1%	
Scale Factor Temp Coefficient	±0.02% /Deg C Typical	
Zero Bias (Standard)	0 Volt ±40mV	0 Volt ±25mV
Zero Bias (Unipolar)	2.500 Volts ±40mV	2.500 Volts ±25mV
Frequency Response	0 To 100 Hz (±0.5 dB)	
Damping	-3dB @ 350 Hz Typical	
Output Noise	< 0.3% F.S.	< 0.1% F.S.
Cross Axis Sensitivity	<1%	
Non-Linearity	±0.12% FR	

Environmental

Temperature, Operating	0 To +70 Deg C
Temperature, Storage	-40 To +85 Deg C
Vibration Survival (2 To 2,000 Hz)	20 G RMS
Shock Survival	1200 G, 1 mSec
Humidity	95% R.H.

Physical

Weight	0.35 Oz (10 Gm)
Size (Excluding Flange)	0.88 In Dia. x 0.500 In H (2.24 cm Dia. x 1.27 cm H)
Case Material	Aluminum / Black Anodize
Sealing	Environmental
Electrical Interface: Standard	3 Terminal Pins
Optional	Integral Cable, 2 Ft. Long

Ordering Information:

SSA - 1000 - 1	U	C2F
SSA - 1000 - 2	U	C2F
Accelerometer		
Standard Output Voltage		
Standard Zero Bias		
Standard Terminal Pins		
Optional Unipolar Output 0 To +5VDC		
Optional Integral Cable, 2 Ft Long		
Custom Length Integral Cable		
Specify Length in Feet: Cx F		
Specify Length in Meters: Cx M		



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