MODEL 606M1 ACCELEROMETER

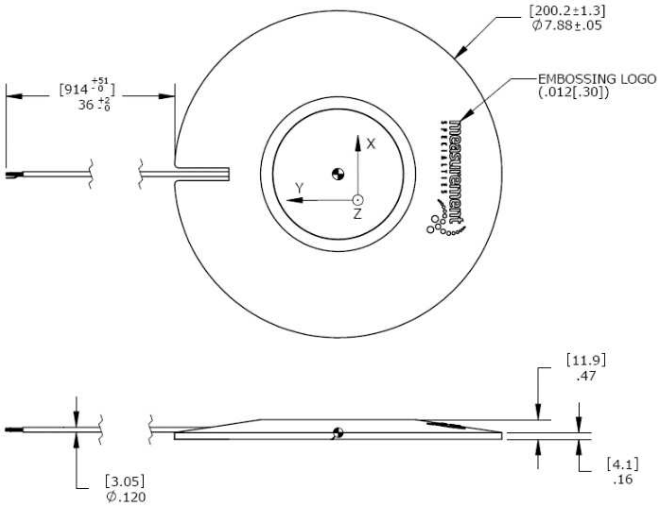
SPECIFICATIONS

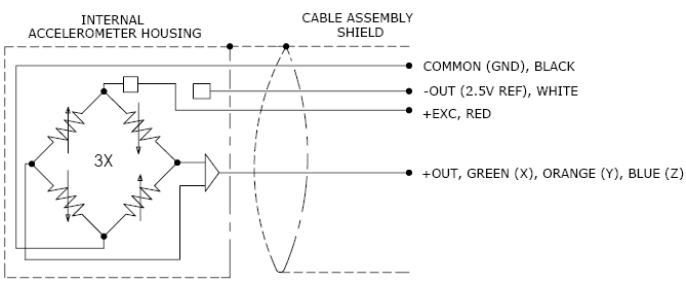
- **Seat Pad Accelerometer**
- **MEMS, Triaxial Sensors**
- **DC Response**
- **Accurate Temp Compensation**
- **ISO 10326-1 Configuration**

The Model 606M1 is a MEMS triaxial seat pad accelerometer with both static and dynamic responses designed specially for characterizing whole body vibration in accordance with ISO 2631-1 and ISO 8041. The DC response of the silicon MEMS sensors is the key to yield accurate velocity and displacement results from the raw acceleration data.

The 606M1 incorporates integral temperature compensation that provides a stable output over a wide operating range. The on-board voltage regulation circuit works with power supply from 8 to 32Vdc.

DIMENSIONS





FEATURES

- Three Independent Circuits
- Low Current Consumption
- Ranges: ±25g
- Gas Damped, DC Response
- High Over-Range Protection
- Low Transverse Sensitivity

APPLICATIONS

- Whole Body Vibration Study
- Vibration/Shock Monitoring
- Helicopter Flight Testing
- Heavy Equipment Testing
- Biodynamic Study

PERFORMANCE SPECIFICATIONS

All values are typical at +24°C, 80Hz and 12Vdc excitation unless otherwise stated. Measurement Specialties reserves the right to update and change the specifications without notice.

Parameters		Notes
DYNAMIC		
Range (g)	±25	
Sensitivity (mV/g)	80	
Frequency Response (Hz)	0-800	±5%
Frequency Response (Hz)	0-1000	±1dB
Natural Frequency (Hz)	4000	
Non-Linearity (%FSO)	±1.0	
Transverse Sensitivity (%)	<3	
Damping Ratio	0.7	
Shock Limit (g)	5000	
ELECTRICAL		
Zero Acceleration Output (mV)	±100	Differential
Excitation Voltage (Vdc)	8 to 36	
Excitation Current (mA)	<15	
Bias Voltage (Vdc)	2.5	
Output Impedance (Ω)	<100	
Insulation Resistance (MΩ)	>100	@100Vdc
Turn On Time (msec)	<100	
Residual Noise (µV RMS)	800	Passband
Ground Isolation	Isolated from Mounting Surface	
ENVIRONMENTAL		
Thermal Zero Shift (%FSO)	±3	Typical
Thermal Sensitivity Shift (%)	±3.5	Typical
Operating Temperature (°C)	-20 to 85	
Compensated Temperature (°C)	-20 to 85	
Storage Temperature (°C)	-20 to 85	
PHYSICAL		
Case Material (Seat Pad)	Nitrile Rubber	
Cable	6x #28 AWG Conductors, PFA Insulated, Braided Shield, TPE Jacket	
Weight (grams)	380	

Calibration supplied: CS-FREQ-0100 NIST Traceable Amplitude Calibration from 20Hz to ±5% Frequency Response Limit

Optional accessories: 121 Three Channel DC Signal Conditioner Amplifier

ORDERING INFORMATION

PART NUMBERING Model Number

606M1

NORTH AMERICA

Measurement Specialties, Inc.,
a TE Connectivity Company
Tel: 800-522-6752
Email: customercare.hmpt@te.com

EUROPE

MEAS France SAS
a TE Connectivity Company
Tel: 800-440-5100
Email: customercare.lcsb@te.com

ASIA

Measurement Specialties (China), Ltd.,
a TE Connectivity Company
Tel: 0400-820-6015
Email: customercare.shzn@te.com

TE.com/sensorsolutions