

Vibration Monitoring and Machine Protection Systems

1010 East Main Street, League City, TX 77573 Phone:281.334.0766 Fax: 281.334.4255 www.stiweb.com / www.stiwebstore.com

CMCP786A-I General Purpose Top Exit Accelerometer, Integral Armored Cable





Features:

- · General Purpose Top Exit Accelerometer
- 100mV/g ±10% (Standard, Others Available)
- 5 Meter (16') Braided Armor Integral Cable
- Class 1 Division 2 Approved
- Class 1 Division 1 Approved with IS Barrier or Isolator
- -67 to +284°F (-55 to +140°C) Extended Temperature Range
- ±80g Range
- ¼"-28 UNF Quick Fit Adapter (Adapters Available)
- Sealed to IP65

Typical Applications

Fans, Motors, Pumps, Compressors, Centrifuges, Conveyors, Air Handlers, Gearboxes, Rolls, Dryers, Presses, Cooling, HVAC, Spindles, Machine Tooling, Process Equipment and many more.

Technical Performance

Mounted Base Resonance: 22 kHz (nominal)

Sensitivity: $100 \text{mV/g} \pm 10\% \text{ Nominal 80Hz at } 22^{\circ}\text{C}$ Frequency Response: $2 \text{ Hz to } 10 \text{ kHz} \pm 5\% \text{ (} 120 \text{ cpm to } 600 \text{k cpm}\text{)}$ $1.5 \text{ Hz to } 12 \text{ kHz} \pm 10\% \text{ (} 90 \text{ cpm to } 720 \text{k cpm}\text{)}$ $0.8 \text{ Hz to } 15 \text{ kHz} \pm 3 \text{dB} \text{ (} 48 \text{ cpm to } 900 \text{k cpm}\text{)}$

Isolation: Base Isolated

Measurement Range: ±80 g

Transverse Sensitivity: Less than 5%

Electrical

Electrical Noise: 0.1mg max
Current Range: 0.5mA to 8mA
Bias Voltage: 10-12 Vdc
Settling Time: 1 Second
Output Impedance: 200 Ohms max.

Case Isolation: >108 Ohms at 500 Volts

Environmental

Operating Temperature Range: -67 to 284°F (-55 to 140°C)

Sealing: IP65
Maximum Shock: 5000 g
Approvals: CE Approved

CSA/UL Class 1 Division 2, Groups B, C and D

Mechanical

Case Material: Stainless Steel
Sensing Element: PZT/Shear
Mounting Torque: 5.9ft. lbs (8Nm)
Weight: 4.9 Oz (139 grams)

Mounting: 1/4"-28 UNF Quick Fit (Supplied with Sensor)

Adapters Available, See CMCP237 (Metric) and CMCP238 (Imperial) Series

Mating Connector: 5 Meter (16') Braided Armor Cable, 2 Wire with Drain/Shield

Hazardous Location Ratings

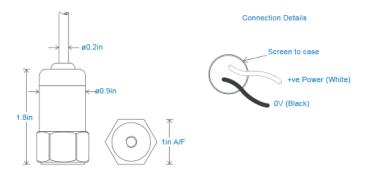
Class I, II, III, Division 1 and 2, Groups A-G, T4, -55°C to + 110°C IP65 Class 1, Zone 0, AEx, ia, IIC, T4, Ga, -55°C to + 110°C Zone 20, AEx, ia, IIIC, T130°C, IP65, Da, -55°C to + 110°C Class I, II, III, Division 1, 2, Groups A-G, T6, -55°C to + 110°C Zone 20, AEx, ia, IIIX, T80°C, IP65, DA, -55°C to + 110°C

Optional Modifications

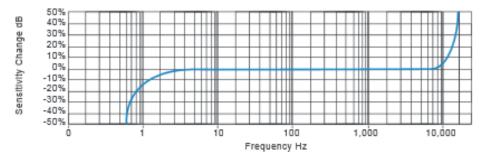
Non-Stocked Sensitivities: 50mV/g (-050), 250mV/g (-250) and 500mV/g (-500)

Sensitivity specified after base part number (ex. CMCP786A-I-500)

Dimensions



Typical Frequency Response (at 100mV/g)



Ordering Information:

CMCP786Ā-I General Purpose Accelerometer, Top Exit, 100mV/g with Braided Armor Integral Cable

Alternative Sensitivity Ordering Information:

CMCP786A-I-XXX Specify Sensitivity in Place of -XXX

50mV/g (-050), 250mV/g (-250) and 500mV/g (-500)

Similar Products:



CMCP786A-M12 4 Pin M12 Eurofast Connector



CMCP786A2 Pin MS 5015 Connector