

Universal Testing Type Accelerometer

DETAILS

CXXB01 series charge uniaxial acceleration sensor, using piezoelectric ceramic shear structure, with wide band frequency response, low sensitivity temperature response characteristics, high quality piezoelectric ceramics with long-term stability can ensure years of accurate measurement. The housing is laser welded stainless steel for high sealing grade and strength, with M5 mounting threads on the bottom.

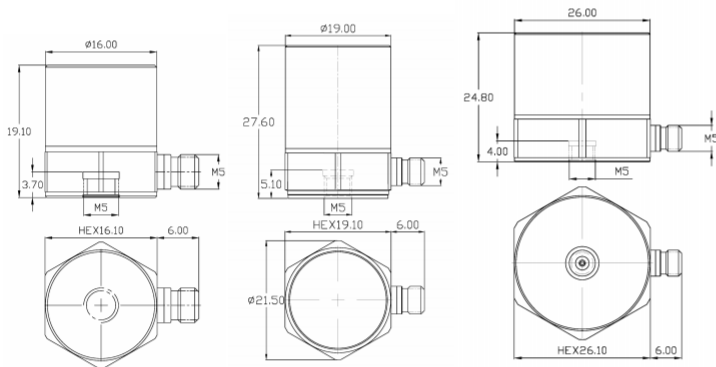
FEATURES

- Charge-type Universal Acceleration Sensor
- Standard series with multiple range options
- Shear structure
- Broadband response

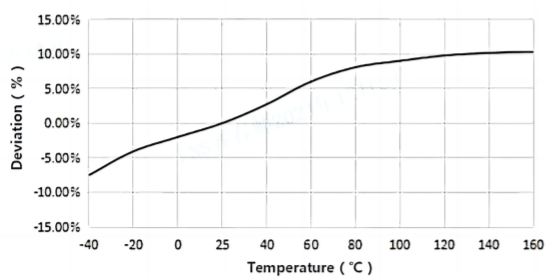
TYPICAL APPLICATIONS

- Modal analysis
- Vibration control
- Universal vibration monitoring

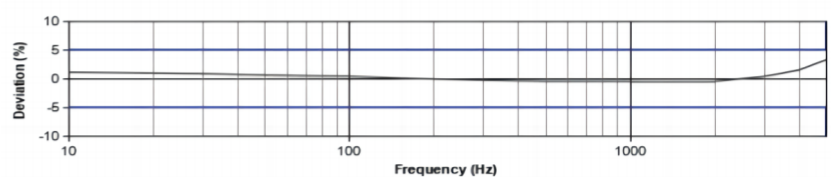
Fig_1 Dimensions of CXXB01



Fig_2 Typical Temperature Response



Fig_3 Typical Frequency Response



Specifications-CXXB01

MODEL NUMBER		UNIT	C06B01	C08B01	C10B00
PERFORMANCE					
Sensitivity ¹		pC/g	100	300	1000
		pC/(m/s²)	10	30	100
Measurement Range		g	±500	±200	±50
Non-Linearity ³		%	1		
Frequency Range	± 5%	Hz	0.5-5k	0.5-3k	0.5-1.5k
	±10%		0.3-6k	0.3-4k	0.3-2k
Resonance Frequency ²		Hz	≥22k	≥16k	≥8k
Discharge Time Constant ²		s	-		
Transverse Sensitivity		%	≤5		
ELECTRICAL					
Capacitance		PF	2400	-	2300
Resistance		Ω	≥1×10 ¹¹	≥1×10 ¹¹	≥1×10 ¹¹
Electrical Isolation		Ω	-	≥1×10 ⁸	-
ENVIRONMENTAL					
Sinusoidal Vibration Limit ⁴		g	800	500	200
Shock Limit ⁴		g	1500	800	600
Temperature Range		°C	-40~160		
		°F	-40~320		
Temperature Response ²		%/°C	0.08		
PHYSICAL					
Sealing		-	Laser welding IP68		
Sensing Element		-	Piezoelectric ceramics		
Housing Material		-	Stainless steel		
Size	mm	HEX 16.1×19.1	HEX 19.1×27.6	HEX 26.1×24.8	
	in	HEX 0.634×0.752	HEX 0.752×1.087	HEX 1.028×0.976	
Electrical Connector		-	M5 Side (Opt. 10-32)		
Mounting Thread		-	M5 (Opt. 10-32)		
Weight ²	g	27	54	130	
	oz	0.952	1.905	4.586	

Additional Information

Note:

1. @ 160Hz, 1g
2. Typical values
3. JBT 6822-2018 7.12.1 Vibration Testing Method
4. References the mechanical structure of the sensor not being damaged in a non powered state, rather than in a working state

CXXB01

Supplied Accessories:

- Product Verification Report
- Install Screws

OPTIONAL VERSIONS

- A: 10-32 Output Connector
- E: 10-32 Mounting Threads

COMPLIANCE WITH STANDARDS



LNS Intelligent Technology Co., Ltd

NO.3 Building
Qilu High-Tech District, Qihe,Dezhou
Shandong Province, China 251100
+86-0534-2150417

International:

9620 NE Tanasbourne Dr Ste 300
Hillsboro, OR, USA 97124
+1-503-208-5512
info@lnsdynamics.com