

Model Number DOC NO PERFORMANCE SPECIFICATION 3302A PS3302A IEPE QUARTZ SHEAR BI-AXIAL ACCELEROMETER REV B, ECN 9830, 04-10-13



		BI- AXIAL ACCELEROMETER EXCELLENT LINEARITY ELECTRICALLY ISOLATED HERMETICALLY SEALED			
		ENGLISH		SI	
PHYSICAL			•		
Weight, Max		1.05	0Z	30	grams
Size	Length x Width x Height	1.05 x 1.208 x .406	Inches	26.67 x 30.68 x 10.31	mm
Connector	Туре	3-Pin		3-Pin	
	Thread	5/16-28 UN-2A		5/16-28 UN-2A	
Mounting Provision, Integral	Bracket	Ø .31 Thru Hole	Inches	Ø 7.92 Thru Hole	mm
Material	Housing	316 L		316 L	
	Connector	304 L		304 L	
Element Style		Quartz Shear	]	Quartz Shear	
PERFORMANCE					
Sensitivity, ±5% [1]		10	mV/g	1	mV/m/s <sup>2</sup>
Range F.S for ± 5 Volts Out	put	± 500	g	± 4905	m/s <sup>2</sup>
Frequency Range [4]	-15% / +5%	1 to 10	Hz	1 to 10	Hz
	±5%	10 to 1000	Hz	10 to 1000	Hz
	-5% / +15%	1000 to 3000	Hz	1000 to 3000	Hz
Resonant Frequency		> 26	kHz	> 26	kHz
Equivalent Electrical Noise I	Floor	0.007	Grms	0.069	m/s <sup>2</sup> rms
Linearity [2]		± 1%	F.S.	± 1%	F.S.
Maximum Transverse sensit	tivity	5	%	5	%
Strain Sensitivity @ 250με		0.012	g/με	0.12	m/s²/με
ENVIRONMENTAL					
Maximum Vibration		± 600	Gpeak	± 5886	m/s² peak
Maximum Shock		± 3000	Gpeak	± 29430	m/s <sup>2</sup> peak
Temperature Range		-60 to 250	°F	-54 to 121	°C
O al Hamada			1 .		l Š

Maximum Vibration	
Maximum Shock	
Temperature Range	
Seal, Hermetic	

± 600	(
± 3000	(
-60 to 250	
Welded/GTM Header	

± 5886	m/s² peak
± 29430	m/s² peak
-54 to 121	°C
Welded/GTM Header	
	•

## ELECTRICAL

Supply Current Range [3]
Compliance Voltage Range
Output Impedence, Typ
Bias Voltage
Discharge Time Constant, Nom
Output Signal Polarity for Acceleration Along Arrow On The Housing
Electrical Isolation, Case Ground To Mounting Surface

	_
2 to 20	mA
+ 18 to +30	Volts
100	Ω
+7 to +9	VDC
0.3 to 1.5	Sec
Positive	
10	GΩ,min
	-

2 to 20	mA	
+ 18 to +30	Volts	
100	Ω	
+7 to +9	VDC	
0.3 to 1.5	Sec	
Positive		
10	GΩ,min	

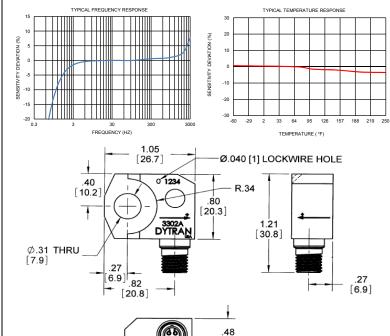
This family also includes:					
Model	Sensitivity	Range F.S ± 5 Volts	Max Vibration/Shock	Resonant Frequency	

Please, refer to the performance specifications of the products in this family for detailed description

## Supplied Accessories:

- 1) Accredited calibration certificate (ISO 17025)
- 2) Adaptor bushing (Ø .250 thru hole), model # 6555A, qty 1
- 3) Adaptor bushing (Ø .188 thru hole), model # 6555A1, qty 1

- [1] Measure at 100Hz, 1 Grms per ISA RP 37.2
- [2] Measure using zero-based straight line method, % of F.S. or any lesser range.
- [3] Do not apply power to this system without current limiting, 20 mA MAX. To do so will destroy the
- IC charge amplifier.
- [4] Frequency response is referenced to nominal sensitivity
- [5] Connector mates with GLENAIR 257-132-3S
- [6] In the interest of constant product improvement, we reserve the right to change specifications without notice



[12.1]

.27 [6.9]

Units on the line drawing are in inches, units in brackets are in millimeters. Refer to 127-3302A for more information.

