

Model Number DOC NO PERFORMANCE SPECIFICATION 3091A PS3091A IEPE QUARTZ SHEAR ACCELEROMETER REV C, ECN 14311, 06/26/18



• EXCELLENT LINEARITY

- ELECTRICALLY ISOLATED
- HERMETICALLY SEALED

10	
	DYTRAN .
PHYSICAL	

Type

Mounting Provision, Integral Bracket Material, Accelerometer Element Style

PERFORMANCE

Sensitivity, ±5% [1] Range F.S for ± 5 Volts Output

Frequency Range [4] -15% / +5%

±5% -5% / +15%

Resonant Frequency

Equivalent Electrical Noise Floor [6]

Linearity [2] Maximum Transverse sensitivity Strain Sensitivity @ 250με

ENVIRONMENTAL

Maximum Vibration

Maximum Shock

Temperature Range Seal, Hermetic

ELECTRICAL

Supply Current Range [3] Compliance Voltage Range Output Impedence, Typ Bias Voltage Discharge Time Constant, Nom Acceleration Along Arrow On The

Electrical Isolation, Case Ground To Mounting Surface

ENGLISH	
1.05	oz
3-Pin	
5/16-28 UN-2A	
Ø .312 Thru Hole With 2 Bushings	Inches
300 Series SS	
Quartz Shear	

	-
10	mV/g
±500	g
1 to 10	Hz
10 to 1000	Hz
1000 to 3000	Hz
>26	kHz
0.007	Grms
± 1%	% F.S.

%

g/με

±600	Gpeak
±3000	Gpeak
-60 to+250	°F
Welded/GTM Header	

0.012

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

	_
30	grams
3-Pin	
5/16-28 UN-2A	
Ø 7.924 Thru Hole With 2 Bushings	mm
300 Series SS	
Quartz Shear	

SI

1	mV/m/s ²
±4905	m/s ²
1 to 10	Hz
10 to 1000	Hz
1000 to 3000	Hz
>26	kHz
0.069	m/s ² rms
± 1%	% F.S.
5	%
0.12	m/s²/με

	_
±5886	m/s² pea
±29430	m/s² pea
-54 to 121	°C
Welded/GTM Header	
	-

2 to 20	T mA
+ 18 to +30	Volts
100	Ω
+7 to +9	VDC
0.3 to 1.5	Sec
Positive	1
10	GΩ,min

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

Refer to the performance specifications of the products in this family for detailed description

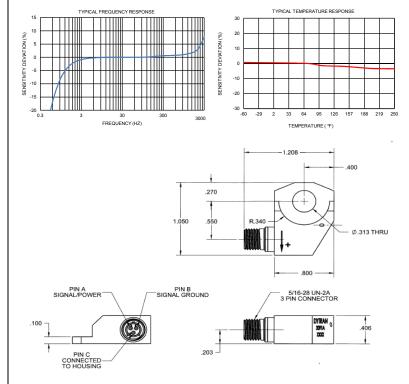
Supplied Accessories:

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

Notes:

- [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] Lock wire holes are included in the base
- [6] Typical. Not to exceed 0.010 Grms [0.10 m/s²].



Units on the line drawing are in inches, units in brackets are in millimeters. Refer to 127-3091A for more information.

