

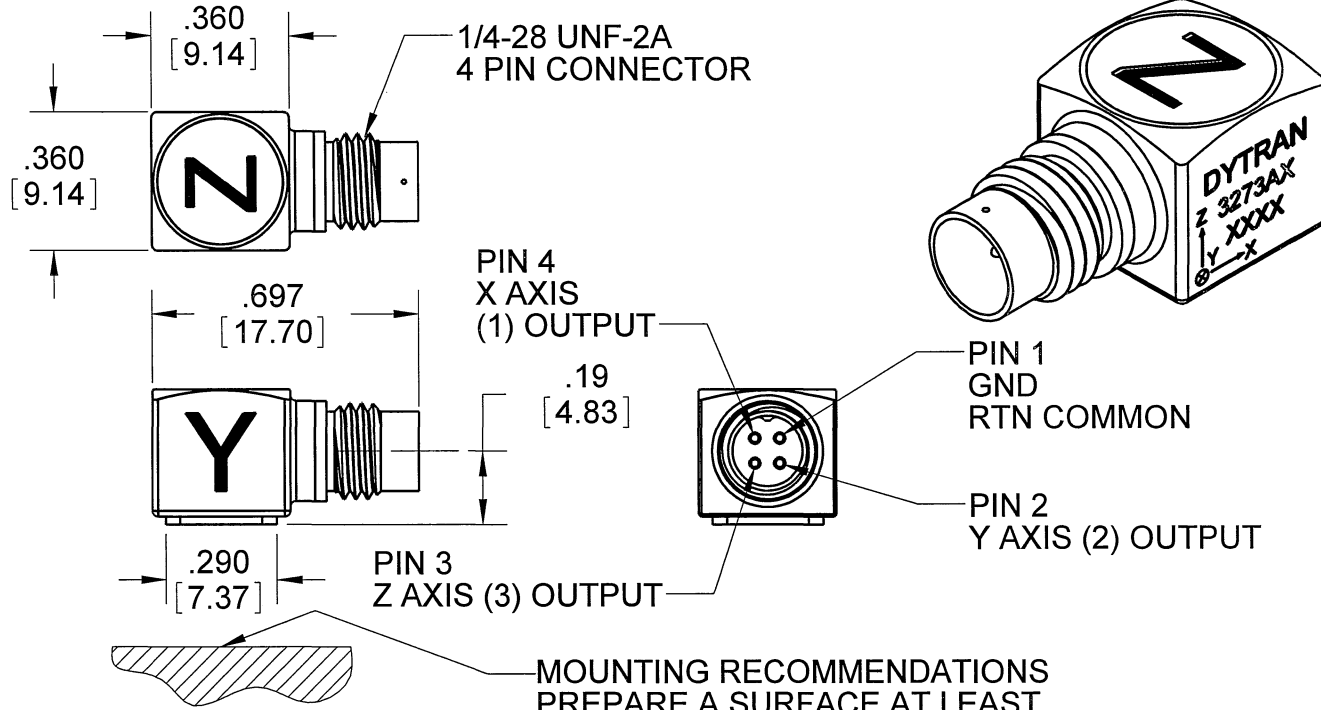
PROPRIETARY AND CONFIDENTIAL

THE INFORMATION CONTAINED IN THIS DRAWING IS THE SOLE PROPERTY OF DYTRAN INSTRUMENTS INC. ANY REPRODUCTION IN PART OR AS A WHOLE WITHOUT THE WRITTEN PERMISSION OF DYTRAN INSTRUMENTS, INC. IS PROHIBITED

REVISIONS

REV	ECN	DESCRIPTION	BY/DATE	CHK	APPR
D	7027	ADDED NOTE 4	JS 08/18/10	RA	JS

MODEL	SENSITIVITY
3273A1	10mV/G
3273A2	100mV/G
3273A4	50mV/G



4. TO MATE CABLE TO CONNECTOR INSERT PLUG AND ENGAGE KEYWAY BEFORE TURNING COUPLING NUT.
 3. HOUSING/CONNECTOR MATERIAL: TITANIUM
 2. ARROWS INDICATE DIRECTIONS OF ACCELERATION FOR POSITIVE OUTPUT.
 1. WEIGHT: 3.0 GRAMS
- NOTES: UNLESS OTHERWISE SPECIFIED.

UNLESS OTHERWISE SPECIFIED: INTERPRET DIM & TOL PER ASME Y14.5M - 1994. REMOVE BURRS. COUNTERSINK INTERNAL THDS 90° TO MAJOR DIA. CHAM EXT THDS 45° TO MINOR DIA. THD LENGTHS AND DEPTHS ARE FOR MIN FULL THDS. THDS PER MIL-S-7742. DIMENSIONS APPLY AFTER FINISHING.	
SERIES	UNLESS OTHERWISE SPECIFIED: DIMENSIONS ARE IN INCHES. DIMENSIONS IN BRACKETS [] ARE IN MILLIMETERS TOLERANCES ARE: INCHES METRIC ANGLES .XX ± .03 .X ± 0.8 ± 1° .XXX ± 0.10 .XX ± 0.25
USED ON	NEXT ASSY
APPLICATION	
THIRD ANGLE PROJECTION USA	
ALL MACHINED SURFACES. ⁶³ TOTAL RUNOUT WITHIN .005. BREAK SHARP EDGES .005 TO .010. MACHINED FILLET RADII .005 TO .015. WELDING SYMBOLS PER AWS A2.4. ABBREVIATIONS PER MIL-STD-12.	

CONTRACT NO.	
APPROVALS	
ORIG	DATE
CHK	9/30/08
APP	DV
APP	ANS
APP	10/17/08
MATERIAL	
FINISH	
DO NOT SCALE DRAWING	

DYTRAN INSTRUMENTS, INC. Chatsworth, CA

MASTER ONLY IF IN RED

TITLE: **OUTLINE/INSTALLATION DRAWING, 3273A SERIES**

SIZE	CAGE CODE	DWG. NO.	REV
A	2W033	127-3273A	D

SCALE: 4:1 SOLIDWORKS SHEET 1 OF 1

3273A1

PERFORMANCE SPECIFICATION

REV L, ECN 15610, 02/25/20

Accelerometer, Triaxial, IEPE



- **ULTRA LOW FREQUENCY RESPONSE**
- **ULTRA LOW NOISE LEVEL**
- **WEIGHT ONLY 2.7 GRAMS**

ENGLISH		SI	
Weight	0.096 oz	2.7	grams
Mounting	Adhesive	Adhesive	
Connector [1]	4-pin	4-pin	
Housing	Material	Ti-6 AL-4V	Ti-6 AL-4V
	Material	Ti-6 AL-4V	Ti-6 AL-4V
Sensing Element	Isolation	Case ground	Case ground
	Material	Ceramic	Ceramic
	Mode	Shear	Shear

PERFORMANCE

Sensitivity, ±10% [2]	10	mV/g	1.02	mV/m/s ²	
Acceleration Range	+/-500	Gpeak	+/- 4905	m/s ² peak	
Frequency Range, ±15%	.3-10,000	Hz	.3-10,000	Hz	
Frequency Range, ± 5%	.5 - 3000	Hz	.5 - 3000	Hz	
Resonance Frequency	>24	kHz	>24	kHz	
Linearity [3]	1	%F.S.	1	%F.S.	
Phase Response, ± 5°	2.3 to 3000	Hz	2.3 to 3000	Hz	
Transverse Sensitivity Max	5	%	5	%	
Noise floor, Max	0.003	Grms	0.029	m/s ² rms	
Spectral Noise	1Hz	629	μGrms/sqr(Hz)	6166	μm/s ² rms/sqr(Hz)
	10Hz	110	μGrms/sqr(Hz)	1074	μm/s ² rms/sqr(Hz)
	100Hz	67	μGrms/sqr(Hz)	657	μm/s ² rms/sqr(Hz)
	1000Hz	31	μGrms/sqr(Hz)	304	μm/s ² rms/sqr(Hz)
	10000Hz	16	μGrms/sqr(Hz)	157	μm/s ² rms/sqr(Hz)

ELECTRICAL

Supply Current Range [4]	2 to 20	mA	2 to 20	mA
Compliance Voltage Range	+18 to +30	VDC	+18 to +30	VDC
Output Impedance, Typ.	100	Ω	100	Ω
Output Bias Voltage	11 to 13	VDC	11 to 13	VDC
Discharge Time Constant	0.5 to 1.5	sec	0.5 to 1.5	sec

ENVIRONMENTAL

Shock Max	5000	g pk	49050	m/s ²
Vibration Max	3000	g pk	29430	m/s ²
Operating Temperature	-60 to +225	°F	-51 to +107	°C
Seal	Hermetic		Hermetic	
Magnetic Sensitivity at 100 Gauss	0.00007	g/Gauss	0.00069	m/s ² /Gauss
Base Strain Sensitivity	0.02	g/με	0.1962	m/s ² /με

This family also includes:

Model	Sensitivity (mV/g)	Range (Gpeak)	Resolution (Grms)	Oper. Temp(°F)	TC
3273A2	100	50	0.00095	-60 to +165	0.5 - 1.5
3273A4	50	100	0.002	-60 to +185	0.5 - 1.5

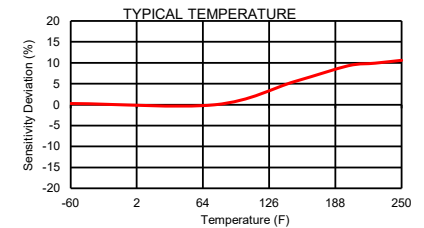
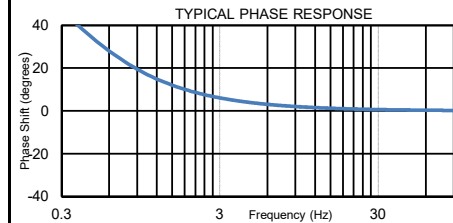
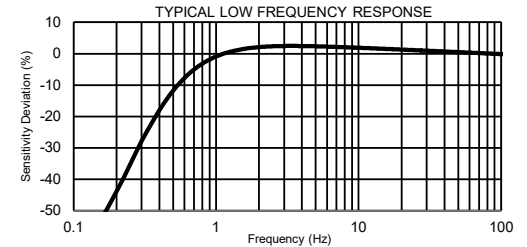
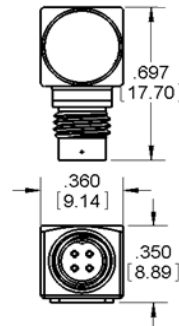
Please, refer to the performance specifications of the products in this family for detailed description

Supplied Accessories:

- 1) Accredited calibration certificate (ISO 17025)

Notes:

- [1] Glass to metal Seal connector. Mates with Dytran cable model 6811AXX or 6824AXX (XX=length in feet)
- [2] Measured at 100 Hz, 1 Grms per ISA RP 37.2
- [3] Linearity is % of specified full scale (or any less full-scale range), zero-based best fit straight line method.
- [4] Do not apply power to this device without current limiting, 20mA Max, to do so will destroy the integral IC amplifier
- [5] In the interest of constant product improvement, we reserve the right to change specifications without notice. It is the customer's responsibility to validate that a particular product with the properties described in the product specification is suitable for use in a particular application. Parameters provided in datasheets and / or specifications may vary in different applications and performance may vary overtime. All operating parameters, including typical parameters, must be validated for each customer application by the customer's technical experts.



Units on the line drawing are in inches, units in brackets are in millimeters. Refer to 127-3273A for more information.



21592 Marilla Street, Chatsworth, California 91311 Phone: 818.700.7818 Fax:818.700.7880 www.dytran.com For permission to reprint this content, please contact info@dytran.com