## PROPRIETARY AND CONFIDENTIAL

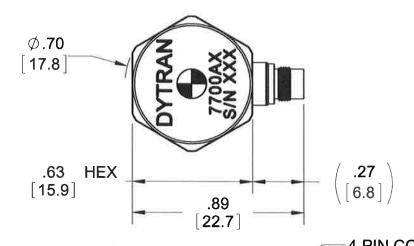
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MODEL	RANGE
7700A1	±5G
7700A2	±10G
7700A3	±25G
7700A4	±50G
7700A5	±100G
7700A6	±200G

		REVISIONS			
REV	ECN	DESCRIPTION	BY/DATE	CHK	APPR
С	9942	SHT 244 [11] WAS: .50 [12.7]	LN 05/20/13	JS	DV
D	11120	NOTE 5: TEMPERATURE RANGE -40 TO 248 °F [-40 TO 120 °C] WAS -40 TO 176 °F [-40 TO 80 °C]	EC 07/07/14	91	*







WEIGHT: 8 GRAMS MAX

OPERATING TEMPERATURE RANGE: -40 TO 248 °F [-40 TO 120°C]

HOUSING/CONNECTOR MATERIAL: TITANIUM ALLOY

MOUNT USING DYTRAN 6200 MODEL (SUPPLIED)



ARROW INDICATES DIRECTION OF ACCELERATION FOR POSITIVE OUTPUT

UNLESS OTHERWISE SPECIFIED:

COUNTERSINK INTERNAL THDS

CHAM EXT THDS 45° TO MINOR DIA.

THD LENGTHS AND DEPTHS ARE FOR

INTERPRET DIM & TOL PER

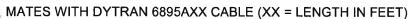
ASME Y14.5M - 1994

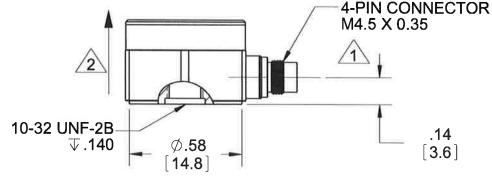
REMOVE BURRS.

MIN FULL THDS.

THDS PER MIL-S-7742

90° TO MAJOR DIA.





# NOTES: UNLESS OTHERWISE SPECIFIED

USED ON NEXT ASSY **APPLICATION** 

THIRD ANGLE PROJECTION

DIMENSIONS APPLY AFTER FINISHING. ALL MACHINED SURFACES. V 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

UNLESS OTHERWISE SPECIFIED: DIMENSIONS ARE IN INCHES. DIMENSIONS IN BRACKETS [] ARE IN MILLIMETERS **TOLERANCES ARE:** 

METRIC ANGLES INCHES .XX ± ..03 X ± 0.8 ± 1° XXX ± .010 XX ±0.25

**APPROVALS** DATE MATERIAL ORIG DV 02/23/11 FINISH CHK LN 08/14/12 APP 08/21/12 DV DO NOT SCALE DRAWING APP

CONTRACT NO.

Chatsworth, CA

TITLE:

OUTLINE/INSTALLATION DRAWING, 7700 SERIES

SIZE CAGE CODE 2W033

DWG. NO. 127-7700A

REV D

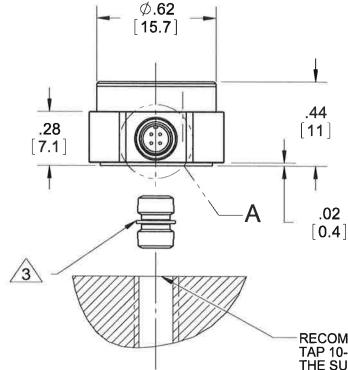
SCALE: NONE

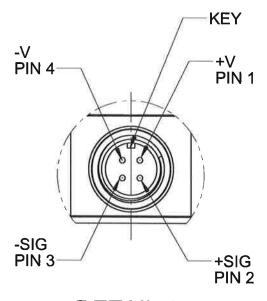
**SOLIDWORKS** 

SHEET 1 OF 2

## PROPRIETARY AND CONFIDENTIAL

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DETAIL A SCALE 4 : 1

RECOMMENDED MOUNTING PREPARATION: TAP 10-32 UNF-2B X.160 MIN DEEP. ASSURE THE SURFACE FLATNESS BETTER THAN .001 TIR. MOUNTING TORQUE: 6-8 LB-IN.

CONTRACT NO.

USED ON NEXT ASSY
APPLICATION
THIRD ANGLE PROJECTION

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.
63
ALL MACHINED SURFACES.
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.

UNLESS OTHERWISE SPECIFIED:

INTERPRET DIM & TOL PER

ASME Y14.5M - 1994.

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±.010 .XX ±0.25

 MATERIAL
 APPROVALS
 DATE

 ORIG
 DV
 02/23/11

 FINISH
 CHK
 LN
 08/14/12

 APP
 DV
 08/21/12

 DO NOT SCALE DRAWING
 APP
 V



MASTER

Chatsworth CW IF IN RED

TITLE:

SCALE: NONE

OUTLINE/INSTALLATION DRAWING, 7700 SERIES

**SOLIDWORKS** 

SIZE CAGE CODE DWG. NO. A 2W033

127-7700A

SHEET 2 OF 2

**REV** 

D

Model Number
7700A1

PERFORMANCE SPECIFICATION
PS7700A1

VARIABLE CAPACITANCE ACCELEROMETER

DOC NO
PS7700A1

REV D, ECN 14673, 11/06/18



- POWER SUPPLY IDENTICAL TO STRAIN GAGE SENSORS
- VARIABLE CAPACITANCE ACCELEROMETER
- DIFFERENTIAL MODE
- HERMETICALLY SEALED
- DC RESPONSE

		ENGLISH		SI	
PHYSICAL					
Weight, Max		0.28	oz	8.0	grams
Connector	Type	4-PIN, M4.5 x 0.35 THD		4-PIN, M4.5 x 0.35 THD	
Mounting	Tapped Hole	10-32 UNF-2B		10-32 UNF-2B	
Material		Ti-6Al-4V		Ti-6Al-4V	
PERFORMANCE			_		
Input Range		±5	g	±49	m/s <sup>2</sup>
Frequency Response	(±5%)	0-200	Hz	0-200	Hz
	(±3dB)	0-500	Hz	0-500	Hz
Sensitivity Differential, ±5% [	1]	100	mV/g	10.2	mV/m/s <sup>2</sup>
Output Noise, Differential ,Typ		12	μ g rms/√ Hz	118	$\mu$ m/s $^2$ /V Hz
Non-Linearity, Max [2]		0.5	% F.S	0.5	% F.S
Sensitivity Change with Excitation Voltage (6-22 Volts)		0.3	%	0.3	%
Cross Axis Sensitivity		< 3	%	< 3	%
ENVIRONMENTAL					
Maximum Mechanical Shock (0.1 ms)		±2000	gpk	±19620	m/s² peak
Bias Temperature Shift ,Max [3]		111	(ppm of span)/°F	200	(ppm of span)/°(
Sensitivity Temperature Shif	t	-139 to +139	ppm/°F	-250 to +250	ppm/°C
Operating Temperature Range		-67 to 257	°F	-55 to 125	°C
Seal		Hermetic	]	Hermetic	
ELECTRICAL			_		
Output Common Mode Volta	age ± VDC	[4]		[4]	
Output Impedence,Nom		1225	Ω	1225	Ω
Operating Voltage		±3 to ±11	VDC	±3 to ±11	VDC
Operating Current, Max		13	mA Dc	13	mA Dc
Change in Operating Curren	t to Excitation Voltage	0.25	mA/V	0.25	mA/V

Sensitivity		
Differential, ±5% (mV/g)	Max.Shock (0.1ms)	Noise Differential (μg/VHz)
50	5000	18
20	5000	25
10	5000	50
5	5000	100
2.5	5000	200
	10	10 5000 5 5000

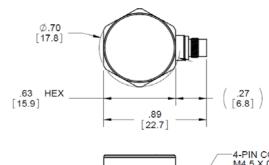
Refer to the performance specifications of the products in this family for detailed description

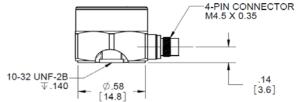
### Supplied Accessories:

- 1) Accredited calibration certificate (ISO 17025)
- 2) Mounting stud model # 6200

### Notes:

- [1] Single ended sensitivity is half of values shown
- [2] -90% to +90% of Full Scale
- [3] Over the rated temperature range
- [4] Bias voltage equal to (+ v (-v)) / 2
- [5] Mating cable 6895A
- [6] In the interest of constant product improvement, we reserve the right to change specifications without notice.





Units on the line drawing are in inches. Refer to 127-7700A for more information.

