



TAI-SAW TECHNOLOGY CO., LTD.

No. 3, Industrial 2nd Rd., Ping-Chen Industrial District,
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Approval Sheet For Product Specification

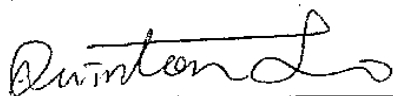
Issued Date: 10/24/2008 (REV. NO.: 2)

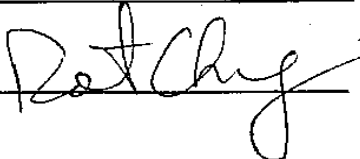
Product Name: SMD 5x3.2 20.000MHz TCXO

TST Parts No.: TX0196A

Customer Parts No. : _____

Company: _____
Division: _____
Approved by : _____
Date: _____

Checked by: Quinton Lo 

Approval by: Robert Chang 

Date: 10/24/2008



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SMD 5.0x3.2 20.000MHz TCXO

MODEL NO.: TX0196A

REV. NO.: 2

Features:

- Miniature SMD Package
- Good Frequency Stability
- Good Phase Noise Response

RoHS Compliant
Lead free
Lead-free soldering

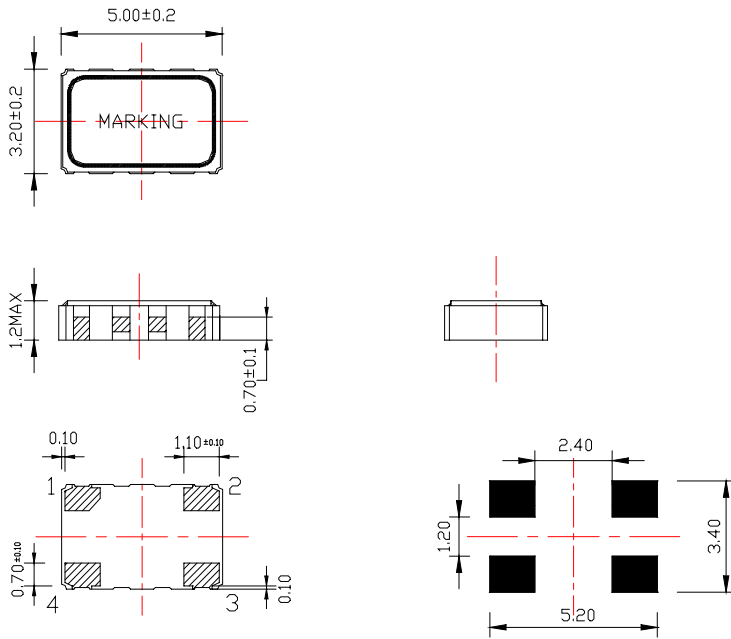
Description and Applications:

Surface mount 5.0mmx3.2mm TCXO for use in wireless communications devices

Electrical Specifications:

TX0196A	Specifications
Nominal Frequency, Fo	20.00000 MHz
Storage Temperature Range	-40°C to +85°C
Operating Temperature Range	-40°C to +85°C
Power Supply Voltage, Vdd	3 V
Output Voltage with Load 10pF//10KΩ, Vout	0.8 Vp-p min
Power Supply Current, Icc	2.0 mA max
Frequency Tolerance	+/- 2.0 ppm max @ 25°C +/- 3°C
Frequency Stability	
a. Vs. Temperature (-40~85°C)	+/- 2.5 ppm
b. Vs. Load varied 10pF//10KΩ+/-10%	+/- 0.2 ppm
c. Vs. Supply Voltage varied 3V+/-5%	+/- 0.2 ppm
Start Up Time (90% of final RF level in Vp-p)	3.0 msec max.
Harmonics	-5.0 dBc max
SSB Phase Noise (@1KHz Carrier Offset)	-130 dBc/Hz max
Marking	Laser marking

Mechanical Dimensions (mm):

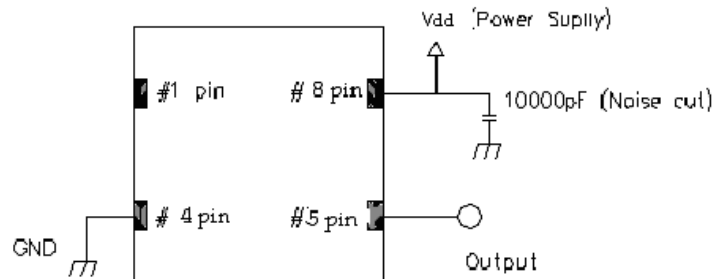


UNIT: mm

PIN	FUNCTION
1	VCON: VCTCXO GND: TCXO Tri-state:XO
2	GND
3	OUT
4	VDD

Recommended Soldering Pattern

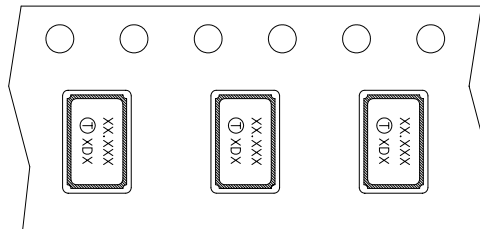
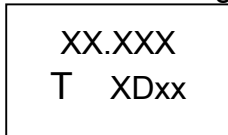
Recommended Circuit



Marking:

Line 1: Customer Frequency (20.000)

Line 2: TST Logo + TCXO Product Code + Date Code + Traceability Code



Product Code Table

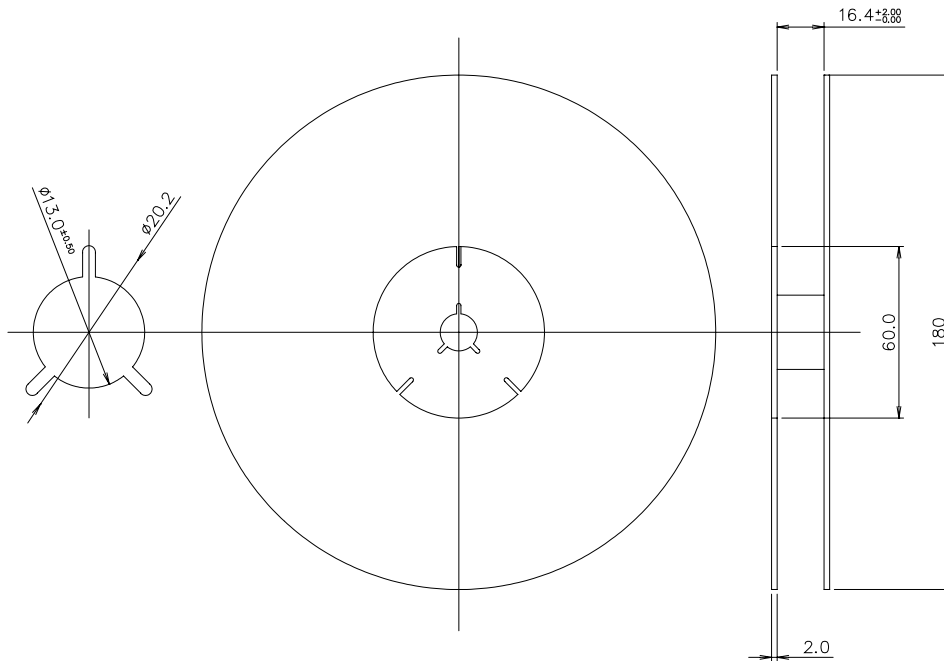
Year	2001 2005	2002 2006	2003 2007	2004 2008
Product Code	X	x	<u>X</u>	<u>x</u>

Date Code Table

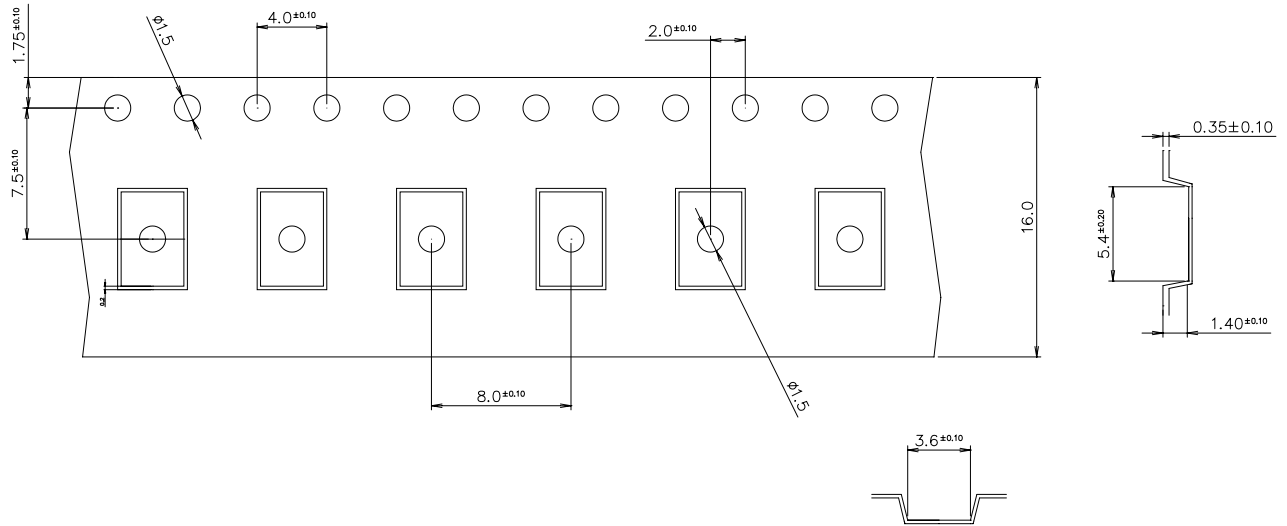
WK01	WK02	WK03	WK04	WK05	WK06	WK07	WK08	WK09	WK10	WK11	WK12	WK13
A	B	C	D	E	F	G	H	I	J	K	L	M
WK14	WK15	WK16	WK17	WK18	WK19	WK20	WK21	WK22	WK23	WK24	WK25	WK26
N	O	P	Q	R	S	T	U	V	W	X	Y	Z
WK27	WK28	WK29	WK30	WK31	WK32	WK33	WK34	WK35	WK36	WK37	WK38	WK39
a	b	c	d	e	f	g	h	i	j	k	l	m
WK40	WK41	WK42	WK43	WK44	WK45	WK46	WK47	WK48	WK49	WK50	WK51	WK52
n	o	p	q	r	s	t	u	v	w	x	y	z

Packing (mm):

1. Reel Dimension



2. Tape Dimension



Reflow Profile:

