CTS WIRELESS COMPONENTS

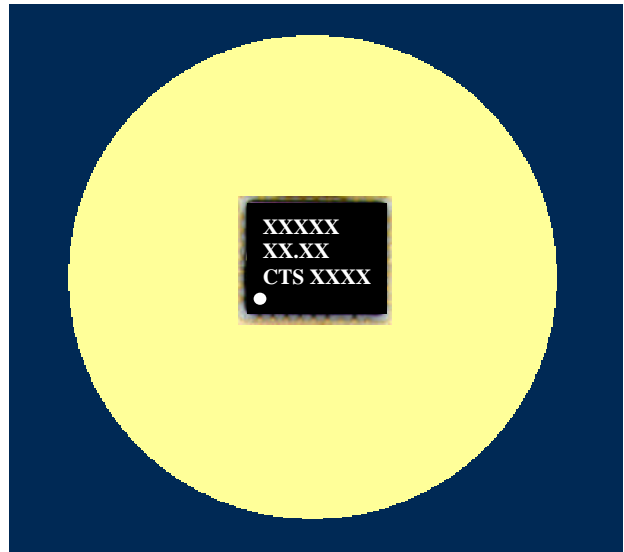## Features:
- Stable frequency over temperature
- Good SSBN Noise performance
- Customer Programmable Features
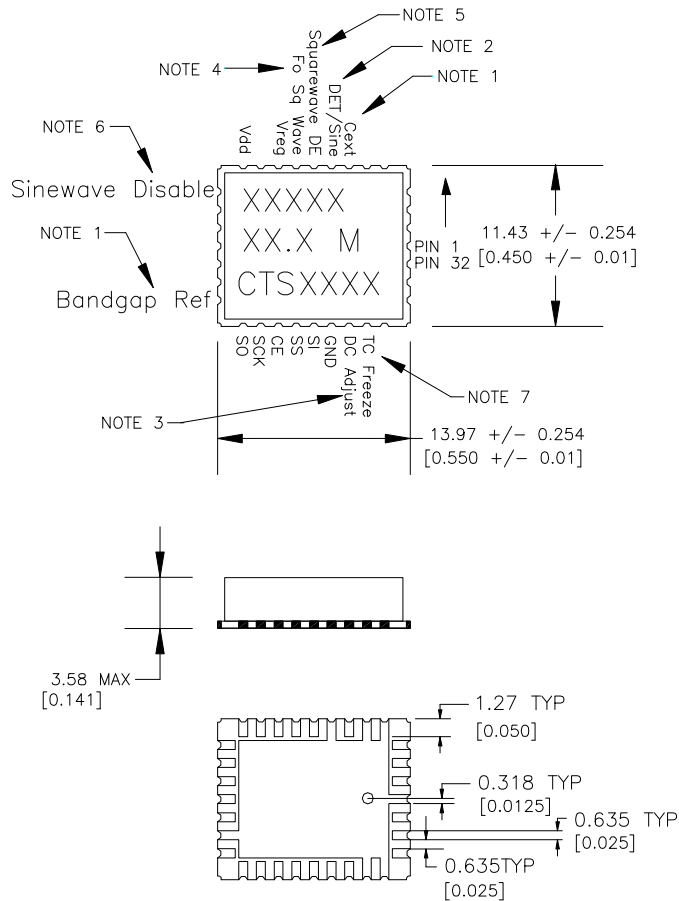- Surface Mount Package

Description and Applications:
Surface mount 11x14 mm Temperature Compensated Crystal Oscillator (TCXO) for use in 3G, GSM, TDMA, CDMA, PDAs, Satellite handsets, 2-way radios, Pagers, Analog applications, and other portable electronics requiring a stable frequency source.

Electrical Specifications:

OSC1200A, C, E, G	Specification
Nominal Frequency	12.8 MHz
Supply Voltage (Vdd)	A and C: 3V $\pm$ 10% E and G: 5V $\pm$ 5%
Frequency Stability over Temperature	$\pm$ 1.0 PPM (-30C to 85C)
RF output (DC Coupled)	A and E: 0.8 Vpp minimum, True Sinewave C and G: Vdd-0.5 minimum, Squarewave
Current Drain	A and E: <2 mA maximum (Sinewave) C and G: 3 mA maximum (Squarewave)
Frequency Adjust Method	External DC Voltage
Frequency Adjust Center Voltage (Vcc)	A and C: 1.5 VDC E and G: 2.5 VDC
Frequency Adjust Range	$\pm$ 10 PPM minimum
SSBN at 10 kHz offset	- 140 dBc/Hz maximum
Aging	$\pm$ 1 PPM/Yr @25C

Model: OSC1200A, C, E, G   **Rev 021401**

Mechanical Dimensions (mm):

NOTES

1. FOR IMPROVED PHASE NOISE PERFORMANCE CONNECT A BYPASS CAPACITOR FROM THIS PIN TO GROUND (0.1 TO 1.0uF).

2. FACTORY PROGRAMMED FOR EITHER BUFFERED SINEWAVE OUTPUT OR PULLED TO GROUND. CAN BE GROUNDED IF SINE BUFFER IS NOT PROGRAMMED ON.

3. FACTORY PROGRAMMED TO PROVIDE DC VOLTAGE CONTROLLED FREQUENCY ADJUSTMENT OR NO CONNECTION. CAN BE GROUNDED IF DC V.C. IS DISABLED AT THE FACTORY.

4. FACTORY PROGRAMMED TO PROVIDE VDD-0.4V NOM. SQUAREWAVE OUTPUT OR TRISTATED. CAN BE CONNECTED TO GROUND IF SQUAREWAVE OUTPUT IS NOT PROGRAMMED ON. SQUAREWAVE OUTPUT MUST BE USED IF OUTPUT DIVIDER IS USED.

5. SQUAREWAVE OUTPUT CAN BE DISABLED BY PULLING DEVICE ENABLE PIN TO GROUND. (TO SAVE CURRENT "SLEEP" MODE).

6. SINEWAVE OUTPUT CAN BE DISABLED BY PULLING DISABLE PIN TO LOGIC 1. (TO SAVE CURRENT "SLEEP" MODE).

7. TC UPDATES CAN BE INHIBITED BY PULLING TC FREEZE PIN TO LOGIC 1.

8. NON-LABELED PINS MAY HAVE INTERNAL CONNECTIONS USED IN THE MANUFACTURING PROCESS. DO NOT MAKE CONNECTIONS TO NON-LABLED PINS

DIMENSIONS: MM [INCHES]