

ECS-TXO-3225 (3.3V) HCMOS SMD TCXO and ECS-VTXO-3225 (3.3V) HCMOS SMD VC-TCXO are ideal for portable, wireless applications where stability is critical.

Request a Sample

**OPERATING CONDITIONS / ELECTRICAL CHARACTERISTICS**



- HCMOS TCXO/VC-TCXO
- 3.2 x 2.5 mm Footprint
- PbFree/RoHS Compliant
- Peak solder temp +260°C (10 sec)
- MSL 1
- Lead Finish Au

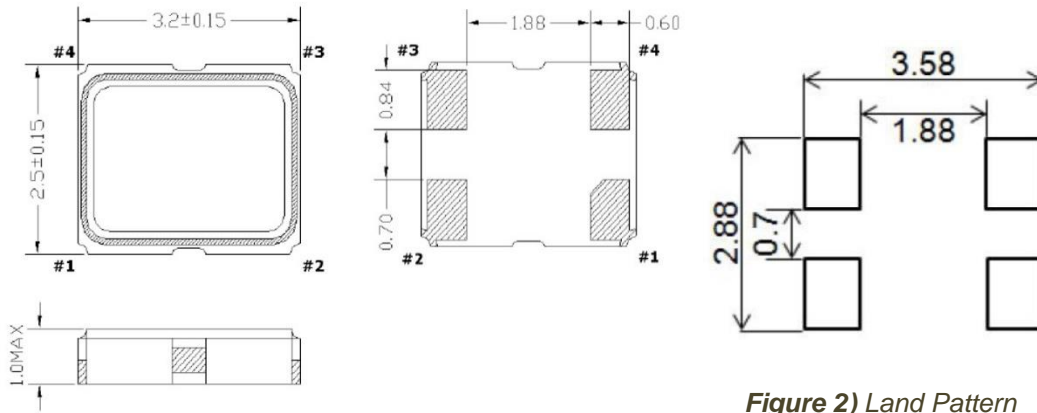
Parameters	Conditions	ECS-TXO-3225			Units
		MIN	TYP	MAX	
Frequency Range		8.192		40.000	MHz
Operating Temperature	* Standard	-30		+85	°C
Storage Temperature		-40		+90	°C
Input Voltage	VDD	+3.135	+3.3	+3.465	VDC
Frequency Stability	Vs. Temp (-30 ~ +85°C)			±2.5	PPM
	Vs. Supply Change (±5%)			±0.3	PPM
	Vs. Load Change (±5%)			±0.3	PPM
	Vs. Aging/Year			±1.0	PPM
Frequency Tolerance	@ +25°C ±2°C			±1.5	PPM
Current Consumption				6.0	mA
"0" Level	VOL			0.5	VDC
"1" Level	VOH	80% VDD			VDC
Output Symmetry	@50% VDD Level			40/60	%
Rise and Fall Times	10% VDD to 90% Level			10	ns
Output Load	CMOS			15	pF
Start-up Time				2.0	mS
Phase Noise	@ 1 KHz Offset			-135	DBc/Hz
ECS-VTXO-3225 Option					
Control Voltage	Pin 1	+0.15	+1.65	+3.15	VDC
Pullability		±5			PPM

**Part Numbering Guide: Example ECS-TXO-3225-250-TR**

ECS	Series	Frequency Abbreviations	Stability Tolerance	Temperature	Packaging
ECS	TXO-3225 = TCXO VTXO-3225 = VC-TCXO	250 = 25.000 MHz	<u>Standard</u> Blank = ±2.5 ppm  <u>Custom Options</u> B = ±1.5 ppm C = ±1.0 ppm	<u>Standard</u> Blank = -30 ~ +85°C  <u>Custom Options</u> * N = -40 ~ +85°C	TR = Tape & Reel

\* Consult Factory for availability of ±1 ppm -40 ~ 85°C

**Package Dimensions (mm)**



**Figure 1) Top, Side, and Bottom views**

**Figure 2) Land Pattern**

Pin Connections	
#1	N/C or V <sub>CONT</sub>
#2	Ground
#3	Output
#4	VDD

Developed Frequencies	
* Abbreviation	Frequency (MHz)
100	10.000
120	12.000
122.8	12.288
147.4	14.7456
160	16.000
200	20.000
250	25.000
270	27.000