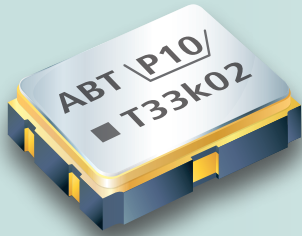


# SMD TCXO

## 3.2 X 2.5 X 1.0 mm

### 7Q Series



#### Features

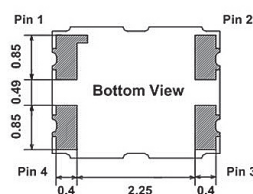
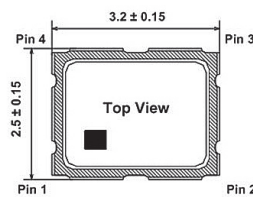
- Temperature Stability:  $\pm 0.5$  ppm ~  $\pm 2.0$  ppm.
- Operating Temperature Range:  $-30$  °C ~  $85$  °C.
- Supply Voltage:  $1.8$  V ~  $3.3$  V.
- Voltage Control Function Available.
- Frequencies:  $16.367667$  MHz,  $16.368$  MHz,  $16.369$  MHz,  $16.8$  MHz,  $19.2$  MHz,  $20$  MHz,  $26$  MHz,  $33.6$  MHz,  $38.4$  MHz,  $40$  MHz.
- Applications: GPS, WiMAX, Cellular and Wireless Communications.
- RoHS Compliant / Pb Free.

#### Electrical Specifications

Item / Type		7Q
Output Type		Clipped Sinewave
Output Load		$10K\Omega // 10$ pF
Oscillation Mode		Fundamental
Supply Voltage		$1.8 \sim 3.3$ V
Frequency Range		$13 \sim 52$ MHz
Clipped Sinewave Output Voltage		$0.8$ Vp-p Min.
Frequency Stability	Vs. Temperature ( $-30 \sim +85$ °C)	$\pm 0.5 / \pm 2.0$ ppm
	Vs. Load (Load varies $\pm 10$ %)	$\pm 0.2$ ppm Max.
	Vs. Supply Voltage ( $V_{cc} = \text{Typical} \pm 0.1$ V)	$\pm 0.2$ ppm Max.
Frequency Tolerance	at $25$ °C after 2 Reflows with Typical Applied to Auto Frequency Control Pin	$\pm 2.5$ ppm Max.
Slope of Frequency Drift		$\pm 0.1$ ppm / °C Typical ; $\pm 0.5$ ppm / °C Max.
Storage Temperature Range		$-40 \sim +85$ °C
Auto Frequency Control (AFC) Range *		$\pm 7 \sim \pm 16$ ppm ( $1.4 \pm 1$ V)
Supply Current		$2.0$ mA Max.
Start-up Time		$5$ ms Max.
Harmonics		$-5$ dBc Max.
Phase Noise at 1 kHz offset		$-130$ dBc / Hz
Aging (at $25$ °C)		$\pm 1$ ppm / year Max.

\* AFC Range is selective and disable is acceptable.

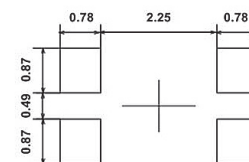
#### Dimensions



#### Pin Connection

Name	Connection
Pin 1	AFC or GND
Pin 2	GND
Pin 3	OUTPUT
Pin 4	VCC

#### Recommended Land Pattern



Units: mm