

## TCXO(温补晶振)

**10MHz~60MHz LT-CR series temperature-compensated voltage controlled crystal oscillator**

### Quick Detail:

- low phase noise, low power consumption, good stability, SMD miniaturization design, extremely low G sensitivity, wide temperature work
- Adapt to the bomb-loaded and arrow-loaded environment

### Description:

The LT-CR is the newest addition to ZR's line of TCXOs. The standard part offers an ultra-tight stability of  $\pm 0.3$  ppm to  $\pm 2$  ppm over  $-55^{\circ}\text{C}$  to  $+85^{\circ}\text{C}$  across a supply voltage range of 3.3V to 5V. The LT-CR uses a high refresh rate, or frequency calibration rate, to maintain a linear frequency output during temperature compensation. The 14.3×9.3×4.5 mm package make these components ideal for the bomb-loaded and arrow-loaded environment.

### Specifications:

#### Electrical / Optical Characteristics (Ta=25°C±3°C)

Items	Specification	Conditions
Part Number	LT-CR-TC-50M-1409	
Frequency Range	50M, 10MHz~60MHz	
Operating voltage	+ 3.3V~ + 5V	
Operating current	≤60mA	
Working temperature range	-55°C~85°C	
Frequency Stability vs. Temperature	±0.3ppm~±2ppm	Frequency relative to 25°C
Initial accuracy of reference temperature	≤±1ppm	@25°C±5°C
Output Waveform	CMOS	
Output Load	50 Ω	
Output power	8dBm~10dBm	
Harmonic wave	≤-30dBc	

Stray	≤-75dBc	
Voltage-controlled voltage range(VC)	0V~5V or 0V~3.3V	
Voltage-controlled frequency range	≥±5ppm	
Voltage-controlled slope	positive	
Voltage-controlled linearity	≤10%	
Phase noise(typical)	-145dBc/Hz@1kHz; -155dBc/Hz@10kHz; -155dBc/Hz@100kHz	Typical frequency:50MHz
Acceleration sensitivity	0.05ppb/g(customizable)	20Hz~2KHz 18g
Dimension	14.3×9.3×4.5mm	
Note: For specifications beyond the above table, please contact us for customization.		

### Outline Drawing (Unit: mm):

