



Features and Benefits

- Less than ± 0.2 ppm over -40°C to $+85^{\circ}\text{C}$
- CMOS output
- <1.0 ppm per year aging
- Multiple supply voltage options; 6mA current consumption

Typical Applications

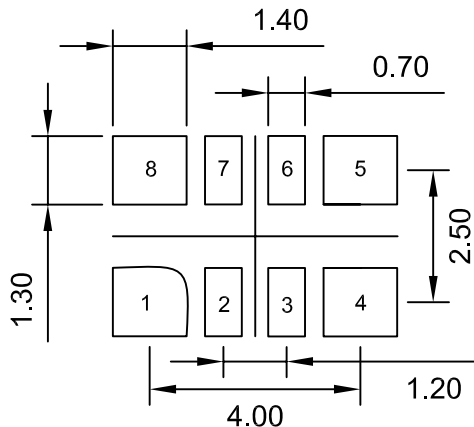
- Reference clock for rugged and harsh environment
- Microwave communication
- Wireless systems
- Portable devices

Description

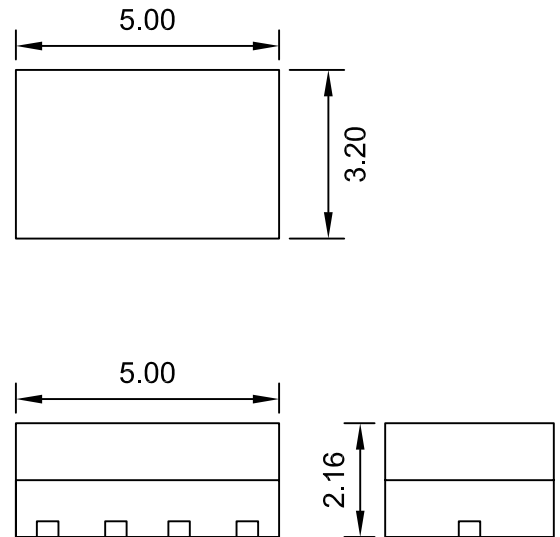
Low G-sensitivity AT-cut resonator technology is combined with advanced IC compensation techniques (6th order compensation) to deliver the best combination of frequency stability and vibration resistance in a reference clock for harsh environment.

Mechanical Drawing & Pin Connections

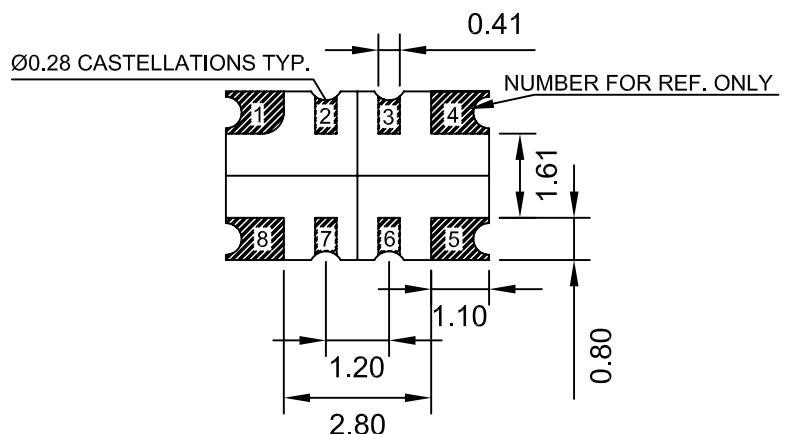
Recommended soldering pattern



Drawing No: MD170031-1



Pin	Function
#1	EFC
#2	N/C
#3	N/C
#4	GND
#5	Output
#6	Tri-State (Enable Hi or Float)
#7	N/C
#8	Supply Voltage



Unit in mm

1mm = 0.0394 inches



Specifications

Oscillator Specification	Sym	Condition	Value			Unit	Note
			Min.	Typ.	Max.		
Frequency Range	F _o			10.0		MHz	
Frequency vs. Reflow		After 24 hours recovery		<1		ppm	
Frequency Adjustment		Via 0 to VCC control V Positive slope		±8		ppm	Available with no adjustment
G-sensitivity				≤7x10 ⁻¹⁰		/g	
Power Supply							
Supply Voltage		±5%		3.3		Vdc	
Supply Current				<6		mA	
Output							
Output Waveform				CMOS			
Symmetry		±10%		50		%	
Output Logic (3.3V)							
- High			+2.8			V	
- Low					+0.2		
Load				15		pF	
Frequency Stability							
Vs. Operating Temperature Range		-40°C to +85°C		±0.2		ppm	
Aging (typical)				<1.0		ppm / year	
Environmental Conditions		Reference Standard					
Operating temperature range		-40°C to +85°C					
Vibration		Per MIL-STD-202G, Method 214, Condition I-F					
Shock		Per MIL-STD-202G, Method 213, Condition D					