K1613 Series

14 pin DIP, 3.3 Volt, Sinewave, TCXO



- Applications: Phase Locked Loops Clocking "Sync" to NTSC Video Standards; Reference Signal; Signal Tracking
- ±10ppm Stability
- -40°C to 85°C Op. Temperature
- "Clipped" Sine Wave Output
- Non Hermetic Package

	ELECTRICAL SPEC	CIFICATIONS
Model	K1613	
Frequency Range (MHz)	1 to 25	
Input Current (mA)	< 2	
Frequency Control Function	(For Custom Deviation Range, Vc Range, etc Consult Factory)	
Voltage Control	Included	
Minimum Deviation (ppm)	±28	
Minimum Deviation Sensitivity (ppm/V)	+14	
Linearity (%)	<10	
Modulation Bandwidth (3dB)	> 20KHz	
Nominal Control Voltage (V)	2.5	
Control Voltage Range (V)	0.3 to 3.0	
Manual Adjustment (ppm)	±5 min.	
Transfer Function	Positive	
Input Impedance	> 50KΩ @ 10KHz	
Frequency Stability (ppm)		
Overall	±10ppm (Inclusive of Calibration, Temperature, Voltage, Load and 10 yr.Aging)	
25 ^o C Calibration	±1ppm	
Over Operating Temperature	±3ppm	
Aging 1st Year	±1ppm	
Temperature Range (^O C)		
Operating	-40°C to +85°C	
Storage	-40°C to +85°C	
Supply Voltage (V)	+3.3V ±5%	
Output ("Clipped" Sine Wave)	1.0V p-p min.	, 10KΩ/10pF
Start Up Time (ms)	<1	0
Typical SSB Phase Noise (dBC/Hz)	10Hz	-70
Offset From Carrier	100Hz	-95
	1KHz	-120
	10KHz	-140
	100KHz	-150

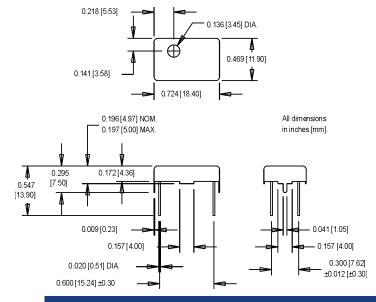
PART NUMBERING GUIDE

K1613 - Specify Frequency

MtronPTI reserves the right to make changes to the product(s) and service(s) described herein without notice. No liability is assumed as a result of their use or application.

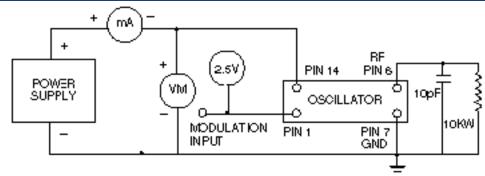
K1613 Series 14 pin DIP, 3.3 Volt, Sinewave, TCXO





PIN	FUNCTION
1	Voltage Control
7	Gnd/ & Case Gnd
8	Output
14	+ VCC

TEST CIRCUIT DIAGRAM



MECHANICAL AND ENVIRONMENTAL SPECIFICATIONS			
TEST METHODS	REFERENCE PROCEDURES	DESCRIPTION	
Temperature Cycle	MIL-STD-833, Mtd 1010, Cond. B	-55°C to +125°C; Air-to-Air; 100 cycles; 10 min. dwell	
Mechanical Shock	MIL-STD-883, Mtd 2002, Cond. B	1500 g's	
Vibration	MIL-STD 883, Mtd 2007, Cond. B	20-2000 Hz; 0.06 inch; 15g's; 3 planes	
Humidity Steady State	MIL-STD-202, Mtd 103	40°C; 90%-95% R.H.; 56 days	
Thermal Shock	MIL-STD-883, Mtd 1011.7 Cond. B	100°C to 0°C; Water-to-Water; 15 cycles	
Electrostatic Discharge	MIL-STD-883, Mtd 3015 Class II	2 KV to 4 KV Threshold	
Solderability	MIL-STD-883, Mtd 2022.2	Solder dip; Meniscograph Criteria	
Hermeticity	MIL-STD-883, Mtd 1014.8, Cond. A1	Mass spectro. 2 x 10-8 atmos. CC/sec He	
Resistance to Soldering	MIL-STD-202, Mtd 210A, Cond. C	260°C; 10 seconds: 1 inch/sec.	
Lead Integrity	MIL-STD-883, Mtd 2004.5, Cond. A, B1	Lead tension & bend stress	
Marking Permanence	MIL-STD-883, Mtd 2015.8	Resistance to solvents	
Life Test	MIL-STD-883, Mtd 1005.6	125°C, powered, 1000 hours minimum	

MtronPTI reserves the right to make changes to the product(s) and service(s) described herein without notice. No liability is assumed as a result of their use or application.