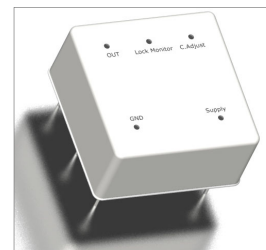


Features

- 10MHz Frequency
- ± 0.3 ppb Frequency Stability
- Sinewave
- Sub Miniature Atomic Clock (SMAC)

Applications

- Military Communication equipment
- Base Stations
- Test Equipment
- Synthesizers
- Digital Switching



Part Numbering Guide

SRO10S - 10.000M

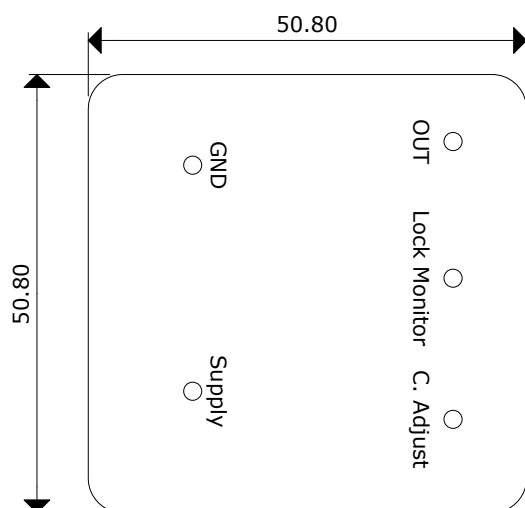


Electrical Parameters		Units	Minimum	Typical	Maximum	Remarks
Frequency		MHz		10.0		
Frequency Tolerance at +25°C		ppb	-0.05		+0.05	
Short Term Stability	1 second	ppb	-0.08		+0.08	
	10 Seconds	ppb	-0.03		+0.03	
	100 Seconds	ppb	-0.008		+0.008	
Aging	Day	ppb	-0.005		+0.005	
	Month	ppb	-0.05		+0.05	
Magnetic Field Sensitivity (Gauss)		ppb	-0.04		+0.04	
Retrace		ppb	-0.02		+0.02	
Operating Temperature		°C	-30		60	
Storage Temperature		°C	-55		85	
Supply Voltage*		V	12.0		18.0	
Input Power		W		6.0		@ 12V @ 25°C 1.2A
Warm-up Time		Minutes		5		@ 25°C
Pulling		ppb	-5.0		+5.0	
Control Voltage		V	0		5.0	
Input Impedance		Ω	10k			
Output Compatibility				Sine		
Drive Capability		Ω		50		
Output Level		dBm	7		13	
Phase Noise	@ 1Hz	dBc/Hz		-67		
	@ 10Hz	dBc/Hz		-95		
	@ 100Hz	dBc/Hz		-127		
	@ 1kHz	dBc/Hz		-140		
Harmonics		dBc			-40	
Spurious		dBc			-100	

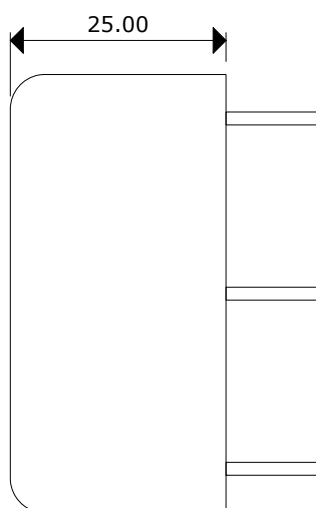
Outline Drawing

All dimensions are in millimeters (mm) unless otherwise noted. Drawings are not to scale.

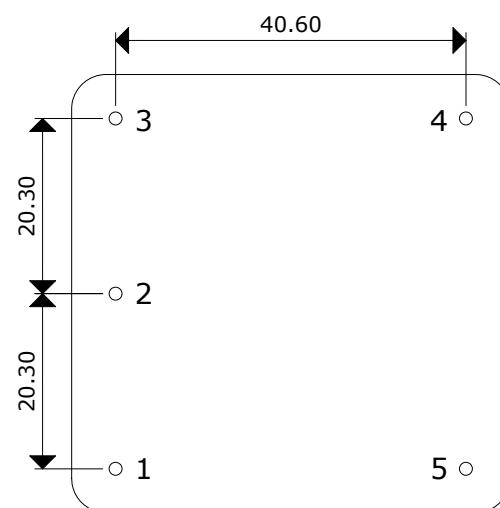
Pin #	Function
1	Input Frequency Control
2	Lock Monitor
3	Output Signal
4	Ground (Signal & Supply)
5	Input Supply (+)



Top View

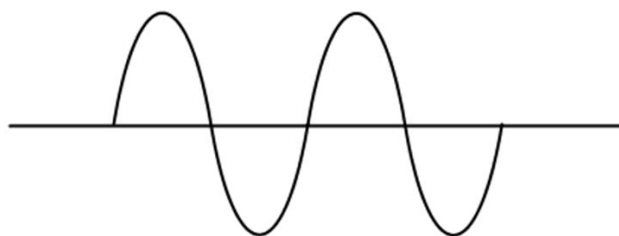


Side View



Bottom View

Waveform (Sinewave)



Sinewave Output, +7dBm min. Into 50Ω

Environmental Specifications

Case Temperature	<45°C (After 1 Hour, Ambient Temp 25°C)	Temp Coefficient (Ambient)	5x10 ⁻¹⁰ (0-50°C)
MTBF	100,000 Hours	Shock / Vibration	GR-CORE-63, 4.5.2/4, Locked to 1.0g
EMI	Compliant to FCC Part 15 Class B	Environmental Health	RoHS