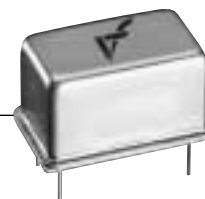
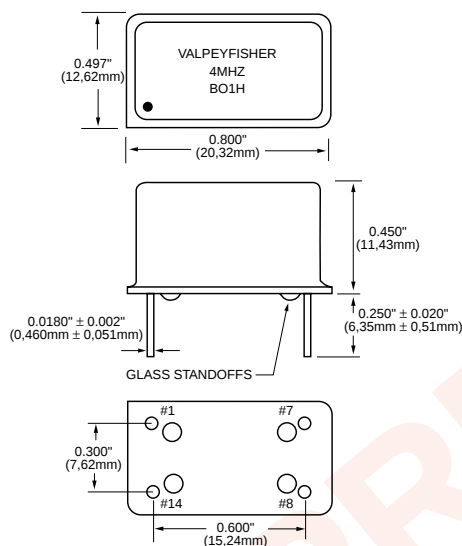


OC140

Low Power Miniature OCXO
in 14 Pin DIP Package

FEATURES

- Very Low Power Consumption
- Moderate Warm-Up Time
- Smallest Size
- Good Frequency Stability
- Vacuum Sealed Enclosure
- Low Cost



All dimensions are typical unless otherwise specified.

Notes:

1. Specific values available, consult factory for details.
2. Relative to 25°C measurement.
3. Standard load, @25°C.
4. Vcc=5.0V, @25°C.
5. Value reached after power applied, relative to value after 30 minutes of power applied.

All specifications subject to change without notice.

Parameter	Symb	Condition	Min	Typ	Max	Unit	Note
Input Break Down Voltage	Vcc		-0.5		6.0	V	
Storage Temp.	Ts		-40		85	°C	
Control Voltage	Vc		-1.0		7.0	V	
Frequency Range	F		10		20	MHz	1
Frequency Stability	ΔF/F	vs. Operating Temp. Range		±0.08	±0.1	ppm	2
		vs. Supply		±0.05		ppm/V	3
		vs. Load		±0.01		ppm/pF	2
Aging		per day per year 10 years		1E-8	1E-6 4E-6		after 30 days
Short Term	σ	0.1s gate time			2E-9		
SSB Phase Noise		100 Hz 1 KHz 10 KHz		-105 -130 -140		dBc/ Hz	
Input Voltage	Vcc		4.75	5.0	5.25	V	
Input Current	Icc	steady state, 25°C steady state, -10°C startup current		20 90 160	35 200	mA	4
Load		3 HCMOS gates or 15pF max.					
Output Waveform		TTL Compatible Squarewave					
Duty Cycle		@ 0.5 Vcc	60/40	50/50	40/60	%	3
Output Low		"0"			0.5	V	3
Output High		"1"	2.4			V	3
Warm-up Time	τ	±0.5ppm@25°C ±0.2ppm@25°C ±0.2ppm@-5°C		30 45 90		s	5
Control Voltage	Vc		0.0		3.6	V	
Input Impedance		Pin #1, Vc	20			KOhm	
Pull Range		from nominal F	±1.5			ppm	4
Deviation / Slope		Monotonic/ positive			1.0	ppm/V	4
Frequency adjust method		By means of low impedance, temperature stable voltage source connected to Pin #1.					
Operating Temperature Range		-10°C to +60°C					
Vibration		Per MIL-STD-202, 5G, 10 to 2000 Hz					
Soldering Conditions		Lead Temperature 260°C, for 10s, Max.					
Hermetic Seal		Leak rate < 1E-8 atm. cc/s of helium					
Pin Out		Pin #1 - Vc Pin #7 - Case / GND Pin #8 - Output (F) Pin #14 - Vcc					