

OCXO SERIES 8000

Rev. B

■ **FEATURES**

Small OCXO in 1" SQ. package
 Frequencies up to 38.880 MHz
 AT and SC-Cut option

■ **ELECTRICAL PERFORMANCE**

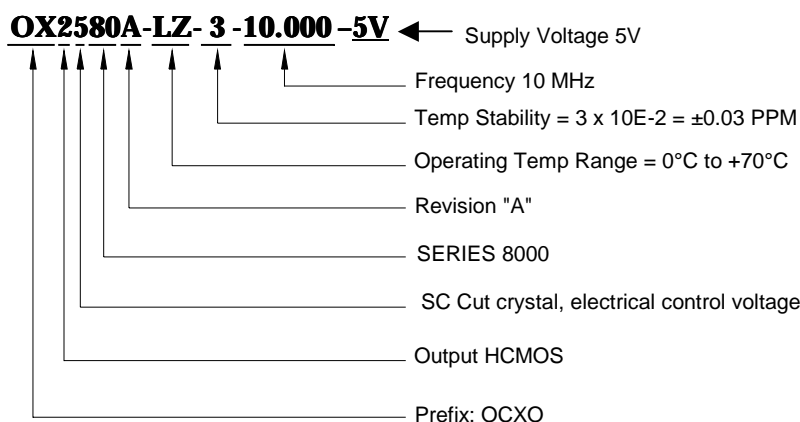
PARAMETER	OCXO SERIES 8000	
	AT CUT CRYSTAL	SC CUT CRYSTAL
Supply voltage, nom.	5V $\pm 5\%$ Standard (3.3V, 12V Optional)	
Power dissipation steady state	1.5 Watt Max.	
Heat up power	3 Watt Max	
Heat up time.	3 min Max	
Frequency range	1 To 38.880 MHz Standard	
Frequency Adjustment	± 10 PPM Min (0 to 5V)	± 0.7 PPM Min (0 to 5V)
Freq. stability vs. temperature LX: 0°C to 60°C FZ: -30°C to 70°C D3: -40°C to 85°	± 0.05 PPM ± 0.1 PPM ± 0.25 PPM	± 0.01 PPM ± 0.02 PPM ± 0.03 PPM
	(Standard, contact factory for different temp ranges and stabilities)	
Freq. stability vs. supply changes	± 0.015 PPM Max for $\pm 5\%$ Change	± 0.010 PPM Max for $\pm 5\%$ Change
Freq. stability vs. load changes	± 0.01 PPM Max for $\pm 5\%$ Change	± 0.005 PPM Max for $\pm 5\%$ Change
Long term stability (Aging)	± 4 PPM Max for 10 Years ± 0.005 PPM/Day Max.	± 1 PPM Max for 10 Years ± 0.002 PPM/Day Max.
Output	HCMOS/TTL/Sine 0 to +7dBm (Low voltage CMOS Available)	
Harmonics, Sub Harmonics	-30dBc(Sine Output)	
Spurious	-75dBc(Sine Output)	
Duty cycle	40/60% to 60/40%(HCMOS)	
Rise / fall time	10nS Max. (HCMOS, 10%~90%Vout, 90%~10%Vout)	
Short term Stability (10MHz)	1 E-10 /Sec	5 E-11 /Sec
Phase Noise typical under static condition (Sine Output 10MHZ)	Offset	Phase Noise
	10Hz	-90 dBc/Hz
	100Hz	-125 dBc/Hz
	1000Hz	-135 dBc/Hz
	10000Hz	-150 dBc/Hz
	Offset	Phase Noise
	10Hz	-110 dBc/Hz
	100Hz	-130 dBc/Hz
	1000Hz	-140 dBc/Hz
	10000Hz	-150 dBc/Hz

Note: All Typical parameters for a 10MHz output and 5V Supply, for different frequencies consult factory

■ HOW TO ORDER (PART NUMBER)

Prefix	Output Type	Cut Type	Series	Revision	Temperature Range	Stability	Frequency	Supply Voltage
OX	2:HCMOS 4:LVC MOS 6:SINE	0:AT (No Vcontrol) 1: SC (No Vcontrol) 4: AT (Elect Vcontrol) 5: SC (Elect Vcontrol)	80:8000	A	First letter Lowest Temperature, Second letter Highest Temperature: From A=-55°C to Z=+70°C, Then: 1=+75°C, 2=+80°C, 3=+85°C... in 5°C steps Example: LZ: +0°C to +70°C LX: +0°C to +60°C FZ: -20°C to +70°C FZ: -30°C to +70°C D3: -40°C to +85°C	Value x 10E-2 in PPM Example 28= 0.28PPM 10= 0.1PPM	In MHZ	12:12V 5: 5V 3.3: 3.3V

Example:



■ MECHANICAL SPECIFICATION

