2525 Shader Road Orlando Florida 32804 USA
Phone: 407-298-2000 Fax: 407-293-2979
Website: www.mtronpti.com AMEX: LGL

...when timing matters

Specification for a Sinewave Output Thru-Hole
OCXO MtronPTI P/N: XO5085-133R

Electrical Specifications:

Parameter	Symbol	Min.	Typ.	Max.	Units	Conditions
Nominal Frequency	F_O		100.0000		MHz	
Frequency Stabilities						
vs. Temperature	$\Delta F_T/F$	-100		+100	ppb	Over the Operating Temperature Range
vs. Supply voltage variation		-30		+30	ppb	+/-250mV change in supply voltage
Daily Aging		-5		+5	ppb	After 30-days Power On
1 Year Aging		-0.5		+0.5	ppm	
20-Years Aging		-1.2		+1.2	ppm	
RF Output						
Output Type			Sinewave			
Output Level			12		dBm	
Output Load			50		Ω	±10%
Frequency Adjustment						
Adjustment Method			External Voltage			
Adjustment Voltage	V_{TUNE}	0		+10	V_D	
Adjustment Range		±1.5			ppm	Over all conditions
Adjustment Slope			Positive			
Additional Parameters						
Phase Noise (Under Static Conditions)				-97	dBc/Hz	10Hz Offset
				-130	dBc/Hz	100Hz Offset
				-158	dBc/Hz	1kHz Offset
				-167	dBc/Hz	10kHz Offset
				-170	dBc/Hz	100kHz Offset
				-170	dBc/Hz	1MHz Offset
				-170	dBc/Hz	10MHz Offset
Harmonics				-25	dBc	
Spurious				-80	dBc	
Vref			8.1		V	
Warm-up Time				5	minutes	To within ±0.1ppm of the frequency after 1-hour of operation @ 25°C
Temperature, Supply Voltage & Power Consumption						
Operating Temperature	OTR	-40		+80	°C	Full Specification Compliance
Storage Temperature	STR	-55		+85	°C	
Operating Voltage	V_{CC}	+11.4	+12.0	+12.6	V_D	
Power Consumption			1.5		Watts	Steady state @ 25°C, In Still Air
				4.0	Watts	@ Warm-up

2525 Shader Road Orlando Florida 32804 USA
Phone: 407-298-2000 Fax: 407-293-2979
Website: www.mtronpti.com AMEX: LGL

Specification for a Sinewave Output Thru-Hole
OCXO MtronPTI P/N: XO5085-133R

Environmental Conditions:

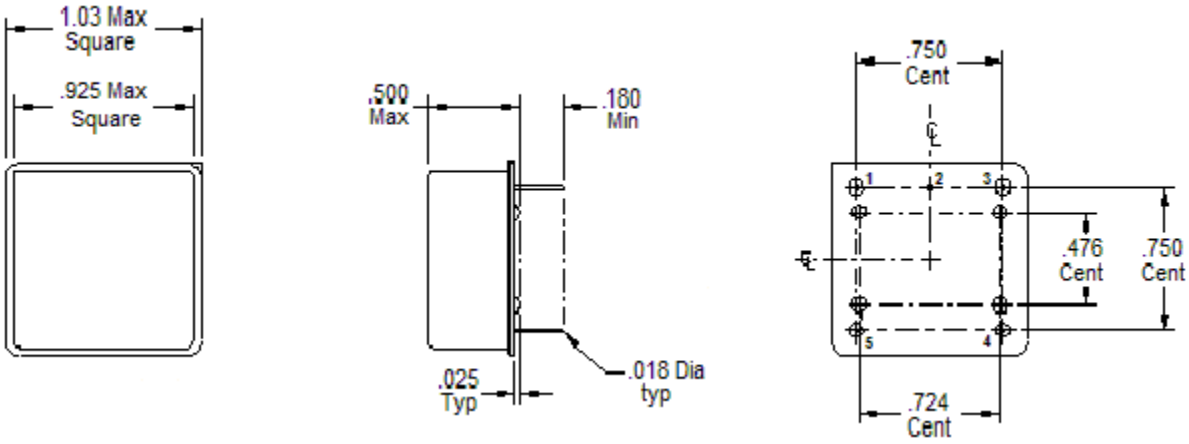
Seal	Hermetic
RoHS	Full RoHS Compliance

Mechanical, Marking and Layout Information:

Part Marking
XO5085-133R
100.0000MHz
Serial Number
Date Code

Legend	
yy	Year
ww	Work Week

Pin	Function
1	RF Output
2	Case Ground
3	V_{TUNE}
4	Vref.
5	Supply Voltage



Data Sheet Revision Table:

Date	Rev.	Orig.	Details of Revision
03-12-21	A	DPD	Same as except as -81R tighter 20-year aging