OUTPUT

Frequency

100 MHz

Level

+10 ±2 dBm min. into 50 ohms

STABILITY

Aging

$\pm 1 \times 10^{-6}$ per year

after 30 days operating, typical

Phase Noise L(f), typical, Static

	100 MHz	
10 Hz	-90	dBc/Hz *typical
100 Hz	-126	dBc/Hz
1 kHz	-146	dBc/Hz
10 kHz	-166	dBc/Hz
100 kHz	-170	dBc/Hz

Temperature Stability

$\leq \pm 2 \times 10^{-7}$, 0° to +50°C (Ref +25°C)

$\leq \pm 5 \times 10^{-7}$, -20° to +70°C (Ref +25°C)

$\leq \pm 1.5 \times 10^{-6}$, -40° to +85°C (Ref +25°C)

Harmonics

≤ -30 dBc

Spurious

≤ -80 dBc

MECHANICAL

Dimensions

≤ 1.03" x 1.03" x 0.515"

Connectors

Solder pins on base, glass stand-offs

Packaging

Solder sealed steel can

POWER REQUIREMENTS

Warm-Up Power

< 3W for 2.5 min

Total Power

1.1W at +25°C steady state, typical

Supply Voltage

+12 VDC, ±1 VDC

ADJUSTMENT

Electrical Tuning

$\pm 7 \times 10^{-6}$, 0 - 10 VDC

Positive slope

CRYSTAL

Type

SC-cut

-01 3e-10/g per axis, guaranteed

-02 2e-10/g per axis, guaranteed

ENVIRONMENTAL

Temperature-Altitude

40,000 feet at -40°C, operating

Storage

-54° to +85°C

Vibration

10 to 1000 Hz, 0.06 g^2 /Hz

1000 Hz to 2000 Hz, -6dB/Octave

10 gs RMS

Shock

12 gs for 11 msec, three axes

Secure when mounting using MIL-Grade epoxy

Humidity

95 to 100 percent relative humidity, +28° to +85°C

OTHER

Label

Label as follows:

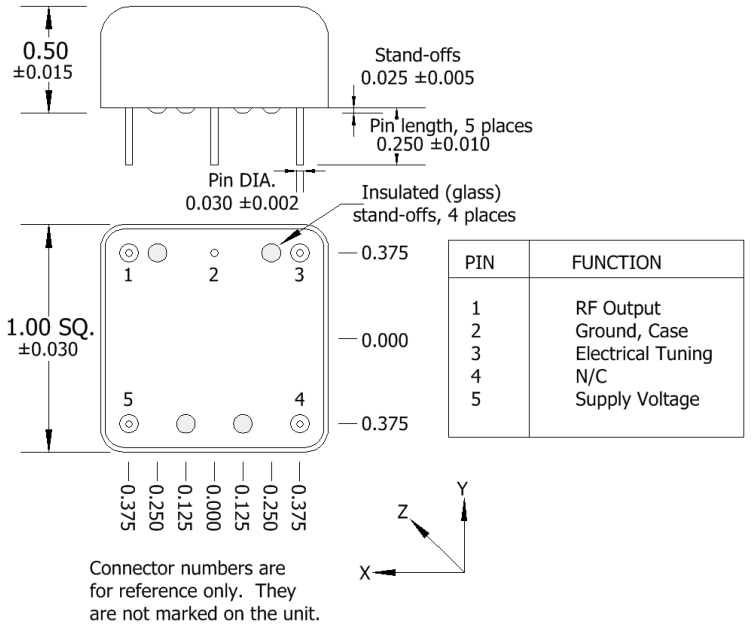
501-33925-XX

100MHz

VDC

SN – Date Code

REV	DATE	REVISION RECORD	DWN	AUTH
-	04-28-21	Initial Release	BH	LR



PIN	FUNCTION
1	RF Output
2	Ground, Case
3	Electrical Tuning
4	N/C
5	Supply Voltage

Connector numbers are for reference only. They are not marked on the unit.

Wenzel Associates, Inc.
Austin, Texas

Title:
100 MHz-SC Rugged ONYX IV Crystal Oscillator

P/N:	Rev:	Date:	Drawn:	Ref:
501-33925-XX	**-**	**04-28-21**		**24762**

Tolerances: (except as noted) Dimensions are in inches	0.XX Dec:	0.XXX Dec:	FSCM:	
	±0.030"	±0.010"	62821	Page 1 of 1