EV	DATE	REVISION RECORD	DWN	AUTH
-	04-18-18	Initial Release	BH	

OUTPUT

Frequency
100 MHz

Level
+18 dBm ±2 dB into 50 ohms

STABILITY

Aging
1×10^{-6} per year
after 30 days operating, typical

Phase Noise L(f)

100 Hz	-138 dBc/Hz
1 kHz	-163 dBc/Hz
10 kHz	-183 dBc/Hz
100 kHz	-188 dBc/Hz

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

Harmonics
≤ -30 dBc

Spurious
≤ -90 dBc, excluding power supply line related spurs

MECHANICAL

Dimensions
2 x 2 x 0.7”

Connectors
SMA(f) and solder pins on side

Packaging
Nickel-plated machined aluminum case – CV-1A

POWER REQUIREMENTS

Warm-Up Power
≤ 8 Watts for 5 minutes

Total Power
≤ 4 Watts at +25°C

Supply Voltage
+15 VDC ±5%

ADJUSTMENT

Mechanical Tuning
$\pm 4 \times 10^{-6}$

Electrical Tuning
$\pm 2 \times 10^{-7}$, ±5 VDC
Negative slope

CRYSTAL

Type
100 MHz SC-Cut (low-g)

Acceleration Sensitivity
$<5 \times 10^{-10}$/g per axis, typical

ENVIRONMENTAL

Operating Temperature
0° to +50°C

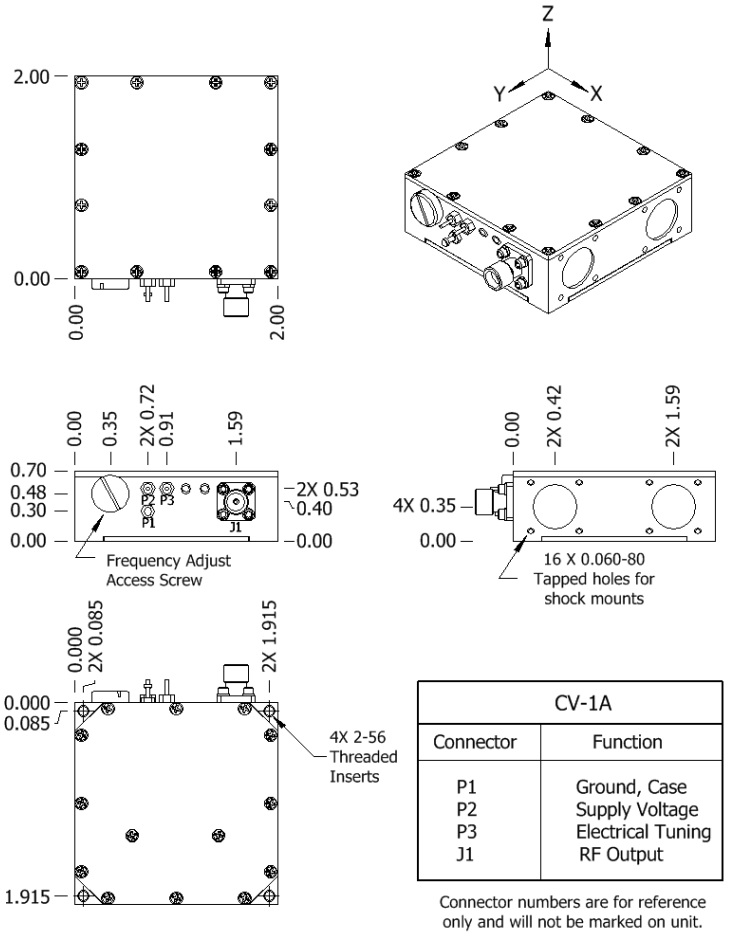
Storage temperature
-40° to +85°C

OTHER

Label
Use conventional label with the following information:
501-31631 (Current Rev.)
Golden Citrine
100 MHz
+15 VDC
Serial # - Date Code

RoHS
This part is RoHS Compliant

Test Data
Output Level
Phase Noise, Static
Temperature Stability
Harmonics, Spurious
Power – Warm-up and Total
Tuning – MT and ET



CV-1A	
Connector	Function
P1	Ground, Case
P2	Supply Voltage
P3	Electrical Tuning
J1	RF Output

Connector numbers are for reference only and will not be marked on unit.

Wenzel Associates, Inc.
Austin, Texas

Title:
100 MHz-SC Golden Citrine Crystal Osc. (RoHS)

P/N:	Rev:	Date:	Drawn:	Ref:
501-31631	**-**	**04-18-18**		**501-25900**

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