

OUTPUTS

| Output | Frequency | Level (into 50Ω) |
|--------|-----------|------------------|
| A | 162.5 MHz | +10 ±2 dBm |
| B | 325 MHz | +13 ±2 dBm |

STABILITY

Aging

- 1 x 10⁻⁶ first year
- after 30 days operating, typical
- 5 x 10⁻⁷ second year, typical
- 3 x 10⁻⁷ per year thereafter, typical

Phase Noise L(f), dBc/Hz, typical

| | 162.5 MHz | 325 MHz |
|---------|-----------|---------|
| 10 Hz | -96 | -90 |
| 100 Hz | -126 | -120 |
| 1 kHz | -152 | -145 |
| 10 kHz | -171 | -164 |
| 100 kHz | -172 | -166 |
| 1 MHz | -172 | -166 |

Temperature Stability

±5 x 10⁻⁷, 0 to +50°C (Ref. +25°C)

Harmonics

≤ -25 dBc

Sub-Harmonics

≤ -60 dBc

Spurious

≤ -80 dBc, excluding power supply line related spurs

MECHANICAL

Dimensions

4.21 x 4 x 1"

Connectors

RF Outputs: SMA(f)
Power, ET: Feed Thru Terminals
GND: Ground Turret

Packaging

Nickel-plated machined aluminum housing – G2-13

Mounting

Threaded inserts on base, #2-56, 6 places

POWER REQUIREMENTS

Warm-Up Power

≤ 13 Watts for 5 minutes

Total Power

≤ 9 Watts at +25°C

Supply Voltage

+15 VDC ±5%

ADJUSTMENT

Mechanical Tuning

±4 x 10⁻⁶

Electrical Tuning

±5 x 10⁻⁷, ±5 VDC

Negative Slope

CRYSTAL

Type

81.25 MHz SC-cut (x2, x2)

OTHER

Label

Use conventional label with the following information:

501-31543 (Current Rev.)

162.5M/325M GMXO-FR

+15 VDC

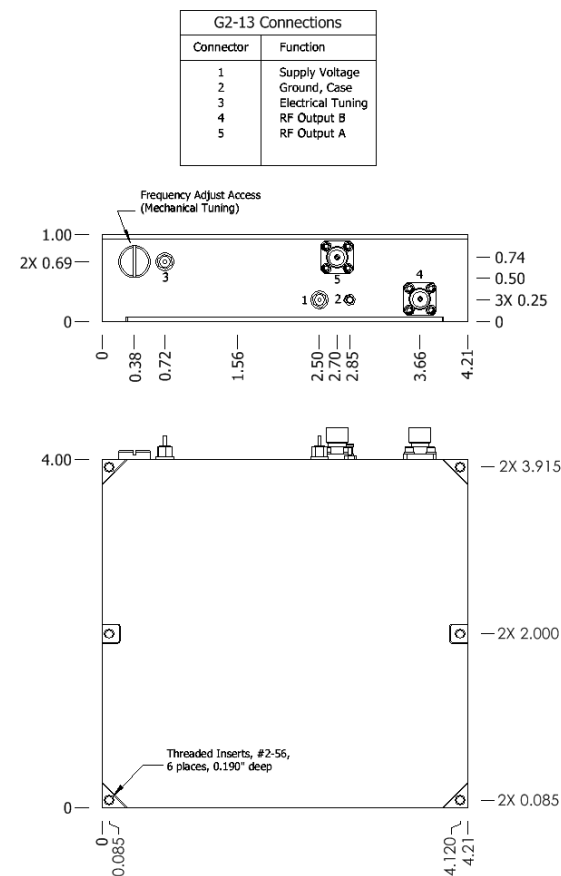
Serial # - Date Code

(Mark connectors with function)

Test Data

- Output Level
- Phase Noise
- Temperature Stability
- Harmonics, Subs, Spurious
- Power – Warm-up and Total

| REV | DATE | REVISION RECORD | DWN | AUTH |
|-----|----------|-----------------|-----|------|
| - | 03-19-18 | Initial Release | CB | |
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Wenzel Associates, Inc.

Austin, Texas

Title:

**162.5 MHz & 325 MHz Golden
Multiplied Crystal Oscillator (GMXO-FR)**

| | | | | |
|--|-----------------------------|------------------------------|-----------------------|-------------|
| P/N: 501-31543 | Rev: - | Date: 03-19-18 | Drawn: | Ref: |
| Tolerances: (except as noted) Dimensions are in inches | 0.XX Dec: ±0.030" | 0.XXX Dec: ±0.010" | FSCM: 62821 | Page 1 of 1 |