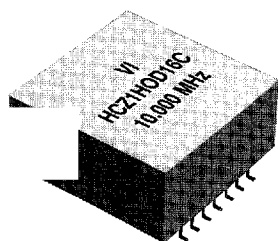


Precision Surface Mount TCXOs

Z1/Z2 Series

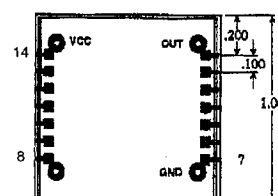
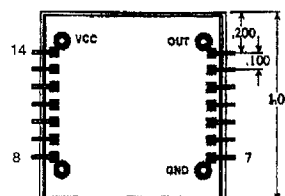
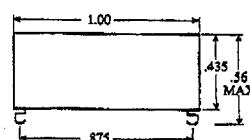
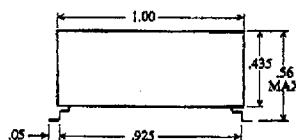


Z1 and Z2 Packages:

Pin 1 = Out
Pin 7 = Gnd
Pin 8 = Tune
Pin 14 = Vcc

Features

- Gull or J-Lead surface mount
- Reflowable
- Low cost
- Voltage tune
- Low aging
- Low phase noise
- 10 MHz standard frequency



Z1 Gull leads

Z2 J-leads

Note: dimensions in inches

SPECIFICATIONS

Frequency range: .01 to 125 MHz

Output Options:

TC = LS TTL = .01 MHz to 30 MHz
HC = HCMOS = .01 MHz to 125 MHz
RC = +7dBm 50Ω = 4 MHz to 40 MHz

Input:

+5.0 V
+5.0 V
+12.0 V

Stability Options:

A27 = ±0.2 ppm = 0°C to +50°C .01 to 16 MHz
B57 = ±0.5 ppm = 0°C to +70°C .01 to 125 MHz
D16 = ±1.0 ppm = -40°C to +85°C .01 to 125 MHz

Many other options available

Typical P/N: HC Z1 HO B57 C 10.00 MHz

HO is predetermined

Voltage Tune= ±3.0 ppm min. 0.5 to 4.5 Vdc

Screening Options: C=Commercial

Aging: to 125 MHz: <1ppm 1st year at 10 MHz: <0.2ppm 1st year
< 5ppm 10 year < 1ppm 10 year
For better than 1ppm per year at other than 10 MHz, contact factory.

The standard 10 MHz part uses a crystal that will age <0.2ppm during the first year. This performance has been verified by sample testing the crystal under continuous operation at 85°C. These curves consistently show that if projected out to one year the part will have aged less than 0.2ppm and typically closer to 0.1ppm.

For our 10 MHz, 1.0ppm all inclusive for 10 years option we compensate the TCXO to better than 0.5ppm vs temperature and 100% dynamically age the TCXO until the oscillator establishes a curve that is consistent with aging <0.5ppm for 10 years.

The Z1/Z2 type is available in other frequencies and options that use a different crystal technology. Please consult with VI for the aging rates of those TCXO's.

10 MHz ± 1.0 ppm ten years all inclusive option