

VOLTAGE CONTROLLED OSCILLATOR

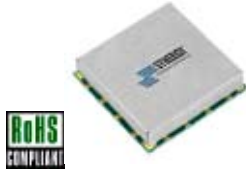
SURFACE MOUNT MODEL: DCRO3946-5

OPTIMIZED BANDWIDTH

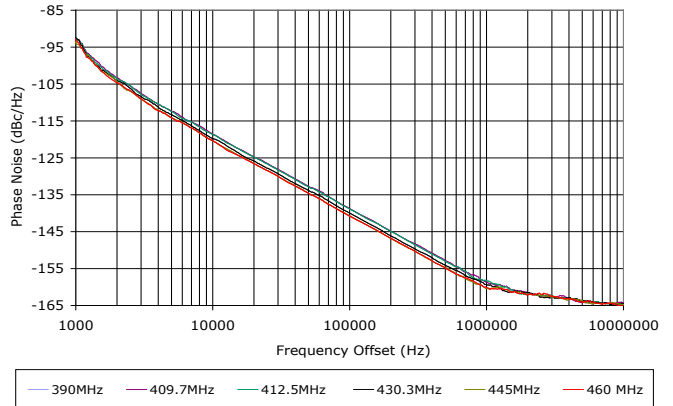
390 - 460 MHz

FEATURES:

- ▶ Exceptional Phase Noise Performance
- ▶ Small Size, Surface Mount
- ▶ Lead Free Patented REL-PRO® Technology
- ▶ Planar Resonator Construction



Phase Noise



SPECIFICATIONS (Rev. A 10/19/08)

Frequency	390 - 460 MHz
Tuning Voltage	See table below.
Bias Voltage	+5 VDC @ 28 mA (Max.)
Output Power	-5 dBm (Min.)
Tuning Sensitivity	14 - 22 MHz/V (Typ.)
Output Impedance	50 Ohms (Nom.)
Harmonic Suppression	12 dB (Typ.)
Frequency Pulling	0.05 MHz (Typ. @ 1.75:1 VSWR)
Frequency Pushing	0.1 MHz/V (Typ.)
Tuning Port Capacitance	100 pF (Typ.)
Phase Noise @ 10 kHz	-118 dBc/Hz (Typ.)
Operating Temperature Range	-40 to +85 °C

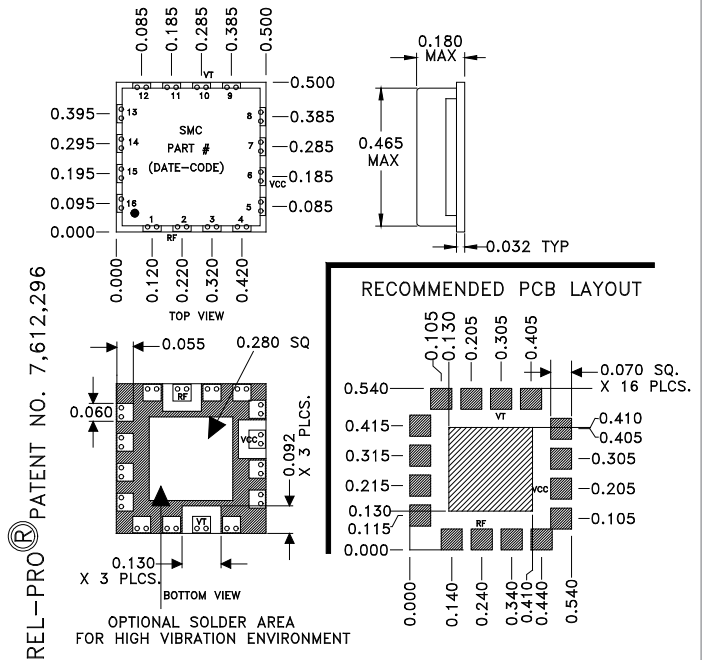
Guaranteed Tuning Specifications

Tuning Voltage (V)	Frequency (MHz)
0.3	390 (Max.)
5.0	460 (Min.)

Absolute Maximum Ratings

Storage Temp. Range	-55 to +125 °C
Bias Voltage	+5.5 V
Tuning Voltage	+7.5 V
DC Voltage Applied to RF Out	±25 V

Package # 278LF



REL-PRO® PATENT NO. 7,612,296

OPTIONAL SOLDER AREA FOR HIGH VIBRATION ENVIRONMENT

TOLERANCES ON THREE DECIMAL PLACES= ± 0.015
 PACKAGE MOUNTING: SEE APPLICATION NOTE AN7200 & AN7300

DIMENSIONS ARE IN INCHES.

ALL UNLABELED PINS TO BE GROUNDED.

This product is manufactured under one or more of the following patents. Approved: 5,160,810; 5,122,621; 5,390,349; 5,416,449; 5,650,754; 5,805,431; 6,525,623; 6,850,575; 7,088,189; 7,180,381; 7,196,591; 7,262,670; 7,265,642; 7,292,113; 7,365,612; 7,495,525; 2,548,311; 2,548,317; 7,545,229; 7,580,693; 7,886,381; 7,605,670; 7,536,021; 2,533,623
 Pending: 60/493075; 60/501371 & 60/501790; 60/527957 & 60/528670; 60/563481; 60/564173; 60/588090; 60/601823; 60/605791; EV31369834; 11/259766; 60/622485 & 60/710310; 10/937525/60/736901; 60/732787; 7,495,525; 2,548,311; 2,548,317; 7,545,229; 2,963,174; 7,580,693; 7,612,296; 2,524,751

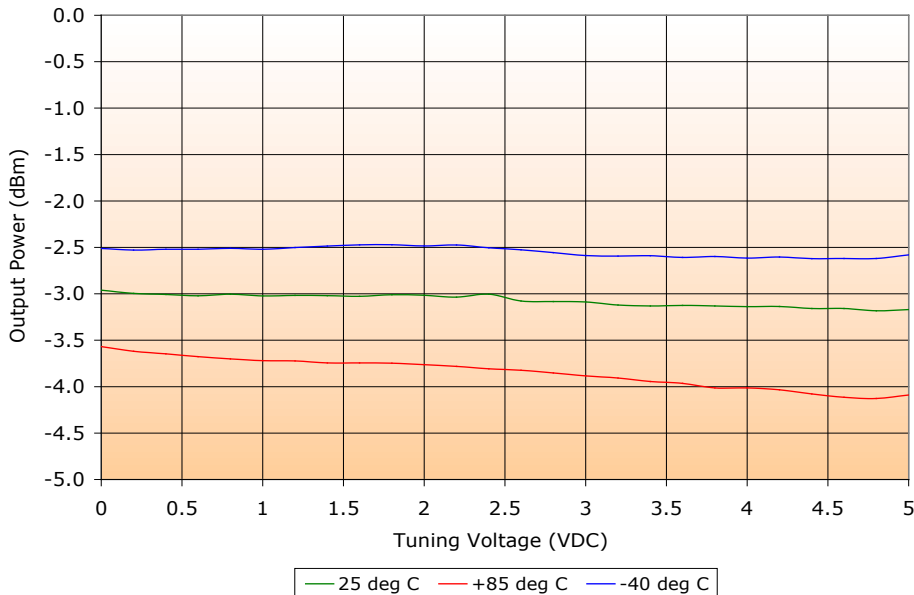
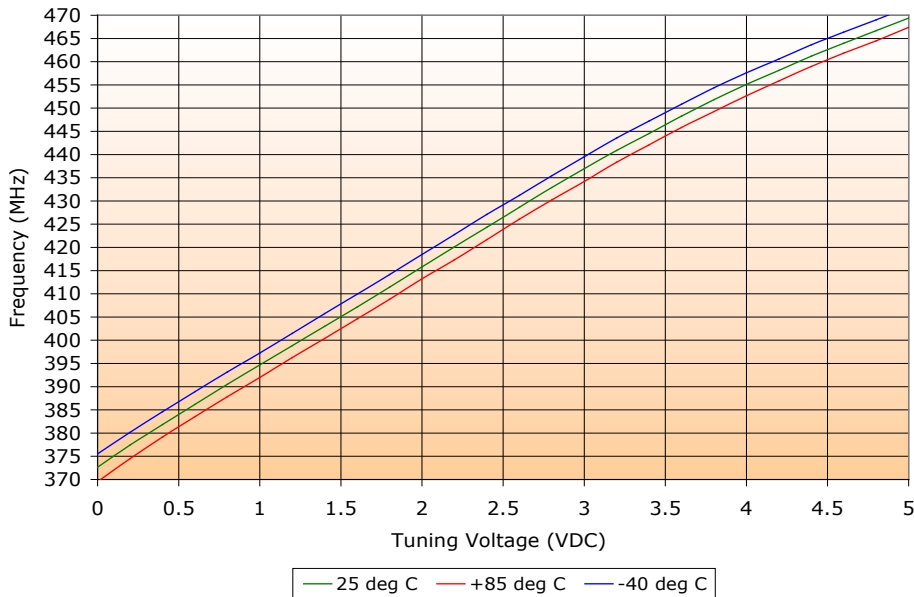


VOLTAGE CONTROLLED OSCILLATOR SURFACE MOUNT MODEL: DCRO3946-5

OPTIMIZED BANDWIDTH

390 - 460 MHz

PERFORMANCE PLOTS



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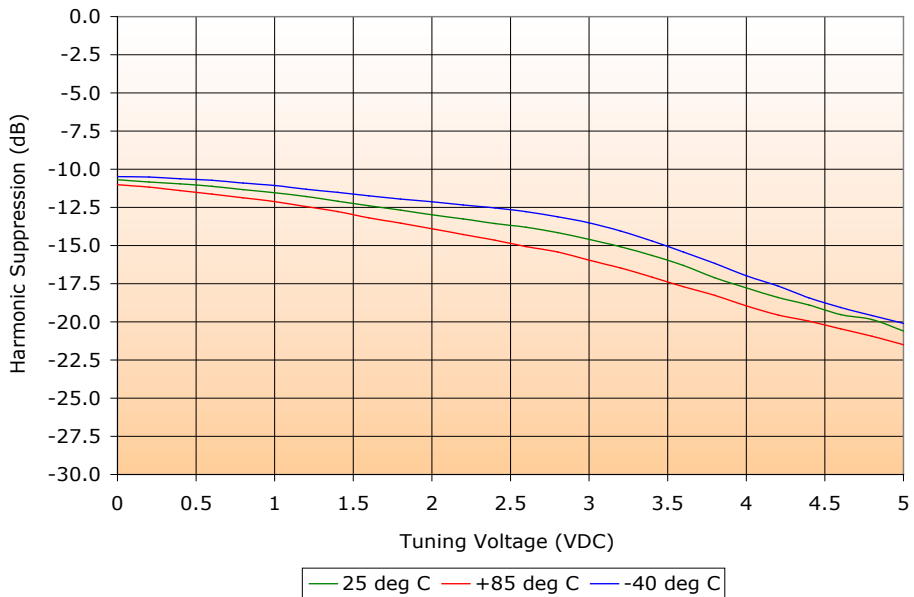
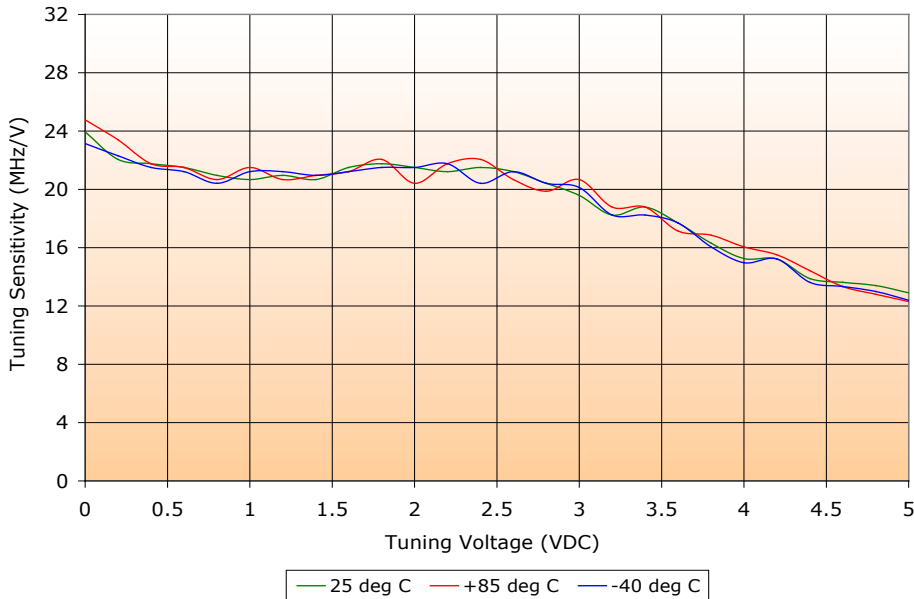
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