

# PHASE LOCKED OSCILLATOR, EXTERNAL REFERENCE

**8520 Series - .75 GHz to 6.0 GHz**  
**8530 Series - 6.0 GHz to 18.0 GHz**

## TECHNICAL FEATURE

### FEATURES

- Low Noise, Dielectric Resonator Oscillator (DRO) or Coaxial Resonator Oscillator (CRO)
- Analog phase-locked loop using a high performance sampling phase detector
- Internal voltage regulator
- High stability, low noise crystal reference oscillator
- Commercial designs for low cost applications

Frequency Coverage	.75 GHz to 18.0 GHz	
Power Output	+10 dBm nominal	
Harmonics	-25 dBc, maximum	
Spurious	-70 dBc, maximum	
Frequency Stability	±15 ppm	
Frequency Accuracy	±1 ppm	
Phase Noise @ 12 GHz (SSB)	Offset	dBc/Hz
	100 Hz	-50
	1 KHz	-80
	10 KHz	-105
	100 KHz	-105
	1 MHz	-133
Mechanical Tuning Range	N/A	
Lock Alarm	TTL or Open Collector	
DC Power	+15 Volts @ 450 mA (max)	
Modulation Bandwidth	DC to 20	
Temperature Range	-20°C to +70°C	
RF Connectors	SMA Female	
Dimensions	8520 Series: 2.75" x 2.75" x 1.50" 8530 Series: 2.25" x 2.25" x 1.25"	

\*Improved performance available – consult your factory representative.