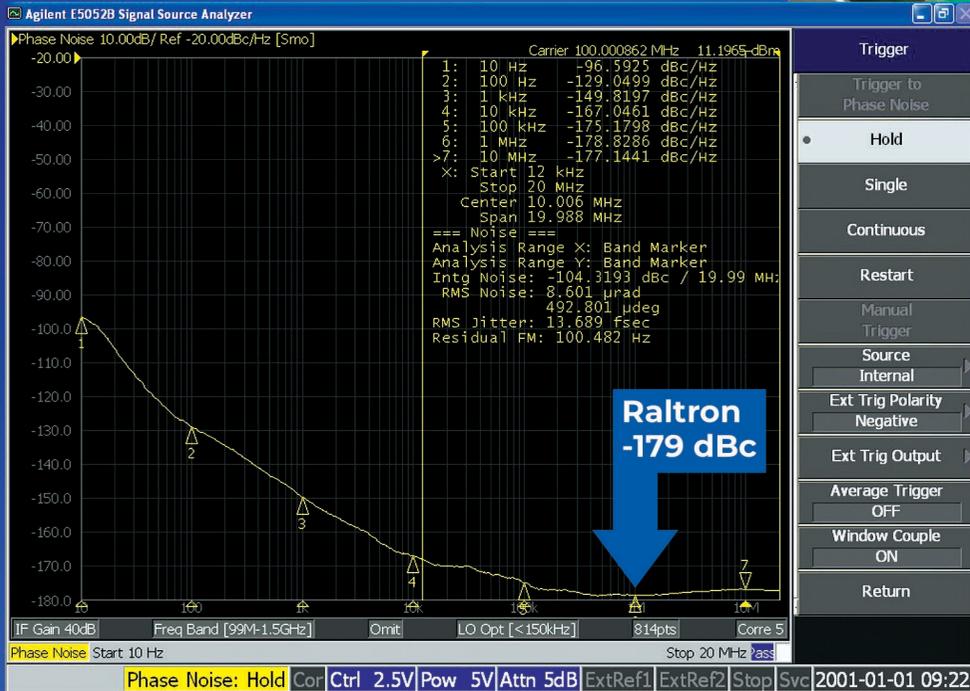


Raltron High Frequency VCXOs

Raltron's VC/VE8 Series VCXOs delivers outstanding frequency stability, low phase noise, and long-term reliability, making it ideal for high-performance timing and RF systems. Designed for demanding environments, it ensures consistent accuracy and seamless integration into modern communications, test, and industrial applications.

APPLICATIONS

-  Satellite
-  Microwave Communications Systems
-  Test & Measurement Systems
-  Radar Systems
-  Synthesizer Reference Clock



Electrical Parameter

- Frequency
- Type Output
- Output Power Level (typ)
- Capacitive Load (typ)
- Load Impedance
- Frequency Control Range
- Frequency Tuning Voltage Range
- Frequency Control Input Impedance
- Frequency Stability over Temp.
- Temperature Range
- Aging (1st year)
- Phase Noise (typ) @10Hz
- Phase Noise (typ) @100Hz
- Phase Noise (typ) @1kHz
- Phase Noise (typ) @10kHz
- Phase Noise (typ) @100kHz
- Phase Noise (typ) @1MHz
- Supply Voltage (5%)
- Current Consumption @Steady State
- Construction (Topology)
- Dimensions

	Raltron VC/VE84 Series	Raltron VC86 Series	Raltron VC86 Series
Frequency	100 MHz	100 MHz	300 MHz
Type Output	HCMOS	Sinewave	Sinewave
Output Power Level (typ)	"0"=10% Vs "1"=90% Vs	6 dBm	7 dBm
Capacitive Load (typ)	15pF	-	-
Load Impedance	-	50 Ω	50 Ω
Frequency Control Range	\pm 20 ppm	\pm 20 ppm	\pm 20 ppm
Frequency Tuning Voltage Range	0 ~ 3.3 VDC	0 ~ 5.0 VDC	0 ~ 5.0 VDC
Frequency Control Input Impedance	50 k Ω	>10 k Ω	>10 k Ω
Frequency Stability over Temp.	\pm 20 ppm	\pm 20 ppm	\pm 30 ppm
Temperature Range	-40 ~ 85C $^{\circ}$	-40 ~ 85C $^{\circ}$	-40 ~ 85C $^{\circ}$
Aging (1st year)	\pm 3.0 ppm	\pm 3.0 ppm	\pm 3.0 ppm
Phase Noise (typ) @10Hz	-98 dBc/Hz	-95 dBc/Hz	-75 dBc/Hz
Phase Noise (typ) @100Hz	-128 dBc/Hz	-129 dBc/Hz	-110 dBc/Hz
Phase Noise (typ) @1kHz	-148 dBc/Hz	-149 dBc/Hz	-135 dBc/Hz
Phase Noise (typ) @10kHz	-160 dBc/Hz	-168 dBc/Hz	-158 dBc/Hz
Phase Noise (typ) @100kHz	-164 dBc/Hz	-176 dBc/Hz	-165 dBc/Hz
Phase Noise (typ) @1MHz	-168 dBc/Hz	-178 dBc/Hz	-165 dBc/Hz
Supply Voltage (5%)	3.3 Vdc	5 Vdc	5 Vdc
Current Consumption @Steady State	20 mA	35 mA	35 mA
Construction (Topology)	FR5	FR5	FR5
Dimensions	9 x 14 mm	9 x 14 mm	9 x 14 mm