



STEP RECOVERY DIODE COMB (HARMONIC) GENERATORS

0.5 – 50 GHz

FEATURES

- Broadband Output Frequency Spectrum (from second harmonic to 50 GHz)
- No Bias Required
- Input Matched to 50 Ohms
- Very Low Phase Noise
- Hermetically Sealed Module
- Excellent for Multiplier Applications
- Custom Input Frequency Available from 500MHz to 10GHz



APPLICATIONS

- Impulse Generator
- Frequency Multipliers
- Frequency Synthesizers
- Built-In-Self-Test Sources

ENVIRONMENTAL RATINGS

Max Input Power..... 1 Watt
 Operating Temperature..... -55°C to +95°C
 Storage Temperature..... -65°C to +150°C
 Temperature Cycling..... -65°C to +150°C
 Shock..... 1500 G, 0.5 msec; 50 G, 11 msec
 Vibration..... 20 G, 100 to 2,000 Hz
 Acceleration..... 10,000 G

Specifications: (@ +25°C, 0.5 Watt Input)

MODEL	INPUT FREQ. (MHz)	MAX INPUT VSWR	MINIMUM OUTPUT POWER PER PICKET (dBm)				OUTLINE
			UP to 20 GHz	20 - 30 GHz	30 - 40 GHz	40 - 50 GHz	
GC0540A	500	2:1	-25	-40	-55	--	C2
GC1040A	1000	2:1	-15	-30	-45	--	C2
GC1540A	1500	2:1	-10	-25	-40	--	C2
GC2040A	2000	2:1	-5	-15	-30	--	C2
GC1050A	1000	2:1	-15	-30	-45	-50	C2
GC1550A	1500	2:1	-10	-25	-40	-50	C2
GC2050A	2000	2:1	-5	-15	-30	-40	C2

Note 1: Internal DC return included

Note 2: Other input frequencies from 500 MHz to 10 GHz are available. Contact factory for information.

Note 3: All units can respond to a 3% bandwidth of input frequency without noticeable degradation.

Note 4: All models can be modified for use as an impulse generator. Consult factory for information on output amplitude, polarity, and pulse width.

For Package Outlines see Outline Drawings Page