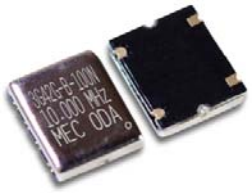
VCXO [Voltage Controlled Crystal Oscillators] *GF42 series* *3.3 V*

SMD CMOS output
11.4 x 9.6 x 2.5 mm
Phase Jitter < 1.0 ps [50.1 ~ 640.0 MHz]



RoHS Compliance

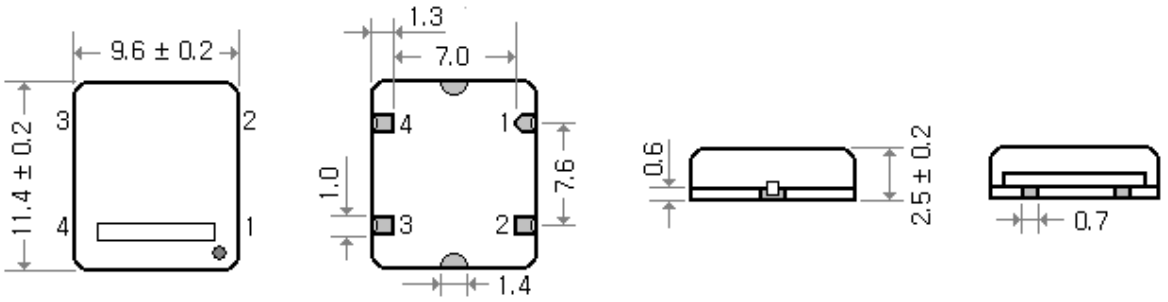
Applications :

- Best performance among the three. Phase jitter is less than 0.5 ps.

General Specifications

Paramenters		Electrical Spec.							
Input Voltage (V_{DD})		3.3 V ± 5 %							
Frequency Range		50.1 ~ 640.0 MHz							
Output Wave Form		CMOS output							
Initial Freq. Accuracy (at 25 °C)		To tune to the nomial frequency with Vc = 1.65V ± 0.15V							
Output Logic High " 1 "		90% V_{DD} (min.)							
Output Logic Low " 0 "		10% V_{DD} (max.)							
Frequency Deviation Range		Standard : ± 80 ppm (min.)							
Control Voltage Center / Control Voltage Range		1.65 VDC / 0.3 V to 3.0 V							
Integrated Phase Jitter (12 KHz to 20 MHz) .		0.4 ps (typical) ; 0.5 ps (max.) for 156.250 MHz							
Output Load		15 pF							
Rise Time (Tr) / Fall Time (Tf)		0.7 nSec. (typical) . Measured between 0.3V to 3.0V (15pF load)							
Duty Cycle		50% ± 10% [50% ± 5% is also available]							
Current Consumption		< 100 MHz : 30 mA (max.)			100 ~ 320 MHz : 40 mA (max.)				
Start - Up Time (Ts)		10 m sec. (max.) ; 5 m sec.(typical)							
Input Impedance		60 KΩ (min.)							
Storage Temperature		- 50°C to 100°C							
Aging		± 3 ppm per year (max.)							
Frequency Stability [1] Codes	Frequency Stability over Operating Temperature Range	± 25 ppm	± 50 ppm	± 100 ppm	If non-standard , please enter the desired stability after the " C " or " I " For example : " C20 " ±20 ppm over -10°C to +70°C ; " I20 " ± 20 ppm over -40°C to +85°C				
	Commercial (*-10°C to +70°C*)	*A*	*B*	*C*					
	Industrial (*-40°C to +85°C*)	*D*	*E*	*F*					
Phase Noise (typical) [156.250 MHz]		Offset	10 Hz	100 Hz	1K Hz	10 KHz	100KHz	1 MHz	10 MHz
		dBc / Hz	-62	-92	-120	-132	-128	-140	-150

General Specifications (Unit : mm)



Pad Connections :
Pad 1 : Voltgae Control
Pad 2 : Ground
Pad 3 : Output
Pad 4 : Supply Voltage

Mercury www .mercury-crystal.com

■Taiwan : (886)-2-2406-2779 / sales-tw@mercury-crystal.com ■U.S.A: (1)-909-466-0427 / sales-us@mercury-crystal.com ■China : (86)-512-5763-8100 / sales-cn@mecxtal.com