



BM47Sx SERIES

CLIPPED SINE WAVE (TCXO/VCTCXO)



FEATURES:

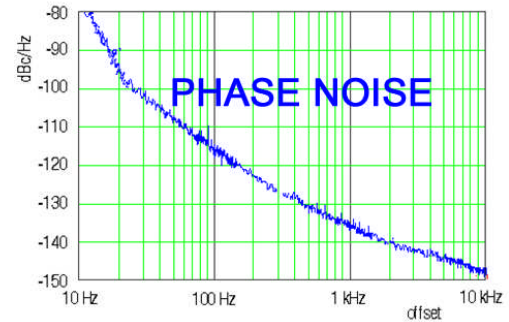
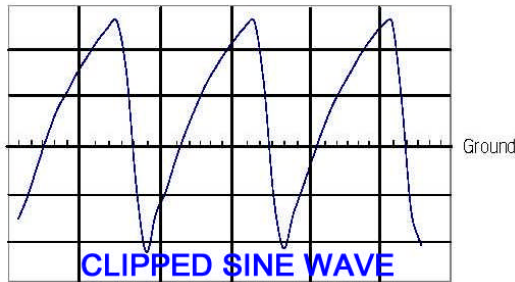
- Gull Wing SMD Package (21.3x11.7x4.7mm)
- MECHANICAL TRIMMER Available(± 3.0 ppm)
- WIDE FREQUENCY RANGE: 9.6 MHz ~ 40.0 MHz
- -40 TO +85°C TEMPERATURE RANGE AVAILABLE
- CLIPPED SINEWAVE OUTPUT

BM47Sx TCXO/VCTCXO SERIES SPECIFICATIONS							
Model #		BM47S3			BM47S5		
Supply Voltage(V _{CC})		+3.0VDC			+5.0VDC		
Frequency Range		9.6MHz to 26.0MHz					
Output Wave form		Clipped Sinewave					
Initial Calibration Tolerance (@25°C \pm 2°C)		Models with Mechanical Trimmer: Adjustable to Nominal Frequency For Models Without Mechanical Trimmer: \pm 3ppm					
Frequency Stability		\pm 1.0 ppm	\pm 1.5 ppm	\pm 2.0 ppm	\pm 2.5ppm	\pm 4.0 ppm	\pm 5.0 ppm
TEMPERATURE RANGE	0°C to +60°C	AVAILABLE	AVAILABLE	AVAILABLE	AVAILABLE	AVAILABLE	AVAILABLE
	0°C to +70°C	AVAILABLE	AVAILABLE	AVAILABLE	AVAILABLE	AVAILABLE	AVAILABLE
	-10°C to +60°C	Contact Us	Contact Us	AVAILABLE	AVAILABLE	AVAILABLE	AVAILABLE
	-20°C to +70°C	Contact Us	Contact Us	AVAILABLE	AVAILABLE	AVAILABLE	AVAILABLE
	-30°C to +60°C	Contact Us	Contact Us	Contact Us	AVAILABLE	AVAILABLE	AVAILABLE
	-30°C to +75°C	Contact Us	Contact Us	Contact Us	AVAILABLE	AVAILABLE	AVAILABLE
	-30°C to +85°C	Contact Us	Contact Us	Contact Us	AVAILABLE	AVAILABLE	AVAILABLE
FREQUENCY STABILITY	Vs. AGING	\pm 1.0 ppm max. first year at +25°C					
	Vs. VOLTAGE CHANGE	\pm 0.2ppm max. for a \pm 5% input voltage change					
	Vs. LOAD CHANGE	\pm 0.2ppm max. for a \pm 10% loading condition change					
	Vs. REFLOW	\pm 1ppm max. 1 reflow and measured 24 hours afterwards					
Output Voltage Level(peak to peak)		0.8 V p-p (min.)			1.0 V p-p (min.)		
Current Consumption (max)		1.3 mA (9.6 ~ 13 MHz) 1.5 mA (13.01~20.0 MHz) 2.0 mA (20.01~26.0 MHz)			2.0 mA (9.6 ~ 13 MHz) 2.2 mA (13.01~20.0 MHz) 2.5 mA (20.01~26.0 MHz)		
Mechanical Frequency Tuning		\pm 3.0ppm (from built in trimmer capacitor)					
Start-Up Time.		2.0 m sec. (typ.) , 5.0 m sec. (max.) (reach 90% amplitude and at +25°C \pm 2°C)					
Output Load		10 K Ω // 10 pF \pm 10%					
Input Impedance		1 meg Ω (min.)					
Harmonics Distortion		- 7 dBc (max.)					
Output Format		DC block, AC Coupled					
SSB Phase Noise @25°C	Offset	10 Hz	100 Hz	1 kHz	10 kHz		
	3.0V-13.000MHZ	-85dBc/Hz	-110dBc/Hz	-130dBc/Hz	-140dBc/Hz		
Green Requirement		RoHS Compliant, Pb Lead Free					
VCTCXO ONLY	Electrical Frequency tuning	\pm 5.0 - 12ppm (Custom Ranges Available)			\pm 6.0 - 12ppm (Custom Ranges Available)		
	Slope Polarity	Positive Increase Control Voltage Increases Output Frequency(Negative Available)					
	Linearity	10% Max					
Storage temperature range		-40 to +85°C					

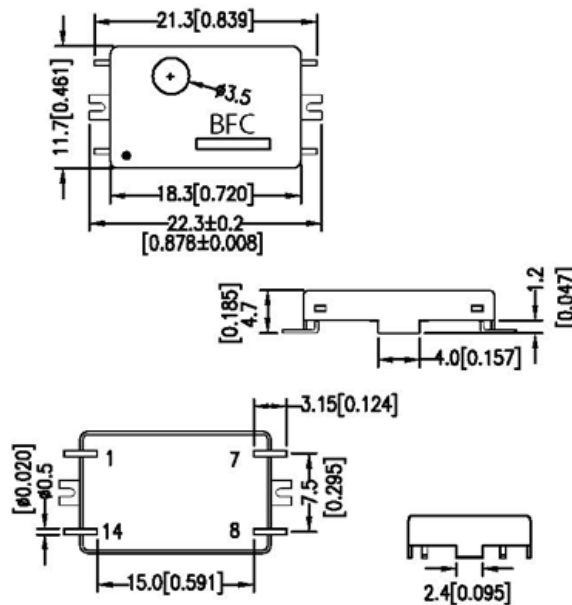
Part Number Guide						
Model	Type	Voltage(VDD)	Stability	Operating Temp. (°C)	Pin 1 Options	Frequency
BM47S	Blank=TCXO	3 = 3.0V	1 = \pm 1 ppm	A = 0°C to 70°C	Blank = No Connection(TCXO only)	In Mhz
	V= VCTCXO	5 = 5.0V	15 = \pm 1.5 ppm	B = -10°C to 60°C	2 = Analog Sensor Output (TCXO only)	
			2 = \pm 2.0 ppm	C = -20°C to 70°C	3 = Digital Sensor Output (TCXO only)	
			25 = \pm 2.5 ppm	D = -30°C to 75°C	N = Negative Slope (VCTCXO only)	
			3 = \pm 3.0 ppm	M = -40°C to 85°C		
			5 = \pm 5.0 ppm	E = 0°C to +60°C		
				F=-30°C to +60°C		
				G =-30°C to +85°C		
BM47S		5	25	D		14.40MHz

BM47S SERIES

CLIPPED SINEWAVE TCXO/VCTCXO



Package: M47S, BM47S



Pin Connections

- Pin 1: Voltage Control for VCTCXO. No Connection for TCXO.
- Pin 7: Ground
- Pin 8: Output
- Pin 14: Supply Voltage

Clipped Sine Wave TCXO (VCTCXO) Test Circuit:

