

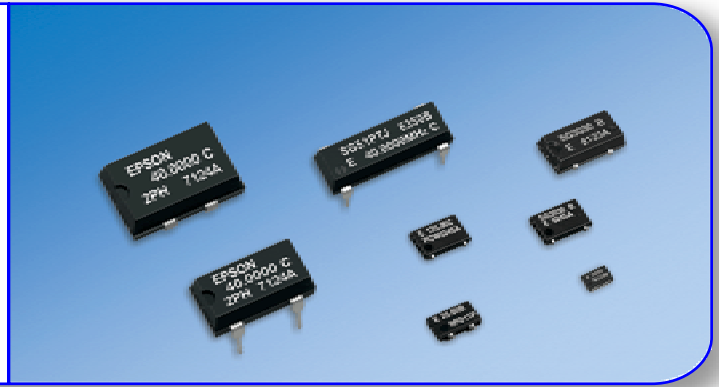


CRYSTAL OSCILLATOR

SPXO (Plastic package type)

•Features

- ▶ Built-in heat resistive crystal unit provides heat resistance equivalent to that of general-purpose ICs.
- ▶ Low current consumption by output enable function (OE) or standby function (\overline{ST}).



■SPXO Plastic package type

Model	Actual size (mm)	Frequency					
		1 Hz	1 MHz	50 MHz	100 MHz	500 MHz	800 MHz
SG-3030JC SG-3040JC	10.5×5.8×2.7 t (Max.)						
SG-3030JF	7.1×5.1×1.5 t (Max.)	● 32.768 kHz					
SG-3030LC SG-3040LC	3.6×2.8×1.2 t (Max.)						
SG-150 series	2.1×1.7×0.75 t (Typ.)	3 MHz		54 MHz			
SG-550 series	5.0×3.2×1.2 t (Max.)	2 MHz		48 MHz			
SG-645 series	7.1×5.1×1.5 t (Max.)	32.001 MHz			135 MHz		
SG-636 series	10.5×5.8×2.7 t (Max.)	2.21675 MHz			135 MHz		
SG-615 series	14.0×9.8×4.7 t (Max.)	1.025 MHz			135 MHz		
SG-531 series	DIP half size						
SG-51 series	DIP full size	1.025 MHz			66.667 MHz		

▶Specifications

Model	Item	Output frequency range	Frequency tolerance (Temperature range)	Operating temperature	Current consumption	Supply voltage	Output load condition	Output control	
SG-3030LC/JF/JC		32.768 kHz	5±23 × 10 ⁻⁶	-40 °C to +85 °C	2 μA Max.	1.5 V to 5.5 V	15 pF	VIO	
SG-3040LC/JC				-40 °C to +85 °C	3.1 μA Max.	0.9 V to 3.6 V		VIO	
SG-150 SEE		3 MHz to 54 MHz	±15 × 10 ⁻⁶ ±20 × 10 ⁻⁶	-20 °C to +70 °C	4.5 mA Max.	1.6 V to 2.2 V	15 pF	\overline{ST}	
SG-150 SDE				-40 °C to +85 °C	5 mA Max.	2.25 V to 2.7 V			
SG-150 SCE				6 mA Max.	2.7 V to 3.6 V				
SG-550 SEF		2 MHz to 48 MHz	±50 × 10 ⁻⁶ ±100 × 10 ⁻⁶	-20 °C to +70 °C	3 mA Max.	1.6 V to 2.2 V	15 pF	\overline{ST}	
SG-550 SDF				-40 °C to +85 °C	3.5 mA Max.	2.2 V to 3.0 V			
SG-550 SCF				4.5 mA Max.	2.7 V to 3.6 V				
SG-645PTW/STW		32.001 MHz to 135 MHz	±50 ±100 × 10 ⁻⁶ (-20 °C to +70 °C) ±100 × 10 ⁻⁶ (-40 °C to +85 °C)	-20 °C to +70 °C	45 mA Max.	4.5 V to 5.5 V	5 TTL	OE/ \overline{ST}	
SG-645PHW/SHW				-40 °C to +85 °C	28 mA Max.	3.0 V to 3.6 V	15 pF		
SG-645PCW/SCW									
SG-636PTF		2.21675 MHz to 41 MHz	±100 × 10 ⁻⁶	-20 °C to +70 °C	17 mA Max.	5.0 V±0.5 V	10 TTL, 50 pF	OE	
SG-636PH		41.001 MHz to 70 MHz			35 mA Max.		15 pF		
SG-636PCE/SCE		2.21675 MHz to 40 MHz			9 mA Max.	3.3 V±0.3 V	30 pF	OE/ \overline{ST}	
SG-636PDE					5 mA Max.	2.5 V±0.25 V	15 pF	OE	
SG-636PTW/STW		32.001 MHz to 135 MHz	±50 × 10 ⁻⁶ ±100 × 10 ⁻⁶	-20 °C to +70 °C	45 mA Max.	5.0 V±0.5 V	5 TTL	OE/ \overline{ST}	
SG-636PHW/SHW					-40 °C to +85 °C		28 mA Max.		3.3 V±0.3 V
SG-636PCW/SCW						25 mA Max.	4.5 V to 5.5 V		25 pF
SG-636PTG/PHG		2.21675 MHz to 33 MHz			12 mA Max.	2.7 V to 3.6 V	25 pF	OE/ \overline{ST}	
SG-636PCG/SCG									
SG-51/531/615P		1.025 MHz to 26 MHz	±50 × 10 ⁻⁶ ±100 × 10 ⁻⁶	-20 °C to +70 °C	23 mA Max.	5.0 V±0.5 V	10TTL, 50 pF	OE	
SG-51/531/615PTJ		26.001 MHz to 66.667 MHz			35 mA Max.		5 TTL		
SG-51/531/615PH							50 pF		
SG-531/615PTW/STW		55.001 MHz to 135 MHz	±50 ±100 × 10 ⁻⁶ (-20 °C to +70 °C) ±100 × 10 ⁻⁶	-20 °C to +70 °C	45 mA Max.	5.0 V±0.5 V	5 TTL	OE/ \overline{ST}	
SG-531/615PHW/SHW							-40 °C to +85 °C		15 pF
SG-531/615PCW/SCW									28 mA Max.
SG-531/615PCG/SCG		1.5 MHz to 26 MHz	±100 × 10 ⁻⁶ (-40 °C to +85 °C) *1		12 mA Max.	2.7 V to 3.6 V	25 pF	OE/ \overline{ST}	
SG-615PCN		26.001 MHz to 66.667 MHz			20 mA Max.		3.0 V to 3.6 V		15 pF

*1 Except : PTW, STW, PHW, SHW