# SMX-1CL

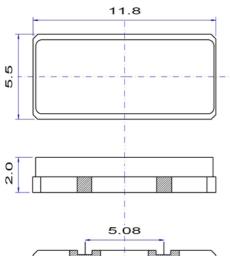


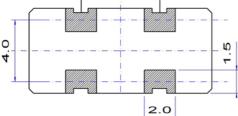
### Full ceramic SMD Crystal

## **Features**

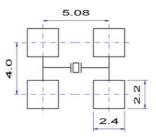
Applications: telecommunications, audio, automotive, instruments Low package height of 2.0 mm Max. Reliable, low cost crystal Reflow soldering @ 260 °C **Parameter Specification** 

Frequency range	3.2 ~ 36 MHz 40 ~ 70 MHz	fundamental 3 <sup>rd</sup> overtone
Mode of oscillation	AT-cut	
Standard frequencies	3.579545, 3.6864, 9.216	6, 13.824, 16.00 & 16.384 MHz
Frequency tolerance	±25 ~ ±50 ppm	@ +25 °C
Frequency stability	±10 ~ ±50 ppm	vs. operating temperature range
Aging	±3 ppm	1 <sup>st</sup> year
Load capacitance	series or parallel resonance (CL = $8 \sim 32 \text{ pF}$ )	
Equivalent series resistance (ESR)	< 75 Ω	@ 3.6864 MHz
	< 25 Ω	@ 16.00 MHz
Drive level	10 ~ 100 μW	
Operating temperature range	-20 ~ +70 °C	commercial application
	-40 ~ +85 °C	industrial application
	-40 ~ +125 °C	automotive application
Storage temperature range	-55 ~ +125 °C	
Packaging unit	tape & reel	1'000 pieces
Customer specifications on request		

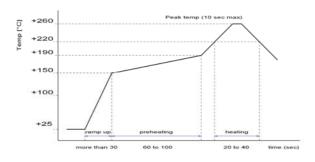




#### Example for soldering pattern



Do not design any conductive path between the pattern Example for IR reflow soldering temperature



#### 2002/95/EC RoHS compliant

03 May. 10

