

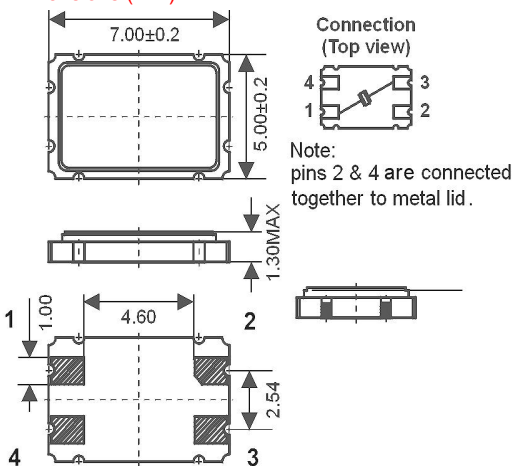


# Quartz Crystal

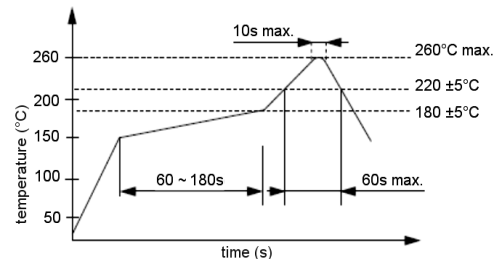
SMD-version

model	KX - 13		
frequency range	6,0 ~ 160,0 MHz		
mode	fundamental, 3 <sup>rd</sup> overtone, 5 <sup>th</sup> overtone		
operating temperature	standard -20° ~ + 70°C available -40° ~ + 85°C (= KX-13T) available -40° ~ + 105°C (= KX-13E)		
frequency tolerance at +25°C	standard ± 30 ppm available ± 10 ~ ± 50 ppm		
temperature tolerance at -20° ~ + 70°C -40° ~ + 85°C -40° ~ +105°C	standard ± 50 ppm, available ± 10 ~ ± 30 ppm, standard ± 100 ppm, available ± 20 ~ ± 50 ppm standard ± 120 ppm, available ± 30 ~ ± 80 ppm		
load capacitance C <sub>L</sub>	standard 16 pF available 12 ~ 20 pF		
series resonance R1 max.	fundamental	6,0 ~ 7,00 MHz	120 Ohm
		7,1 ~ 10,99 MHz	100 Ohm
		11,0 ~ 13,99 MHz	50 Ohm
		14,0 ~ 15,99 MHz	40 Ohm
		16,0 ~ 40,50 MHz	30 Ohm
	3 <sup>rd</sup> overtone	35,0 ~ 39,99 MHz	100 Ohm
		40,0 ~ 49,99 MHz	80 Ohm
		50,0 ~ 90,00 MHz	50 Ohm
	5 <sup>th</sup> overtone	90,0 ~ 260,00 MHz	100 Ohm
aging at +25°C (first year) max.	± 2 ppm		
shunt capacitance C <sub>0</sub> max.	7,0 pF		
drive level max.	0,05 mW		
contents of reel	1000 pcs.		
part no.	12.xxxxx		

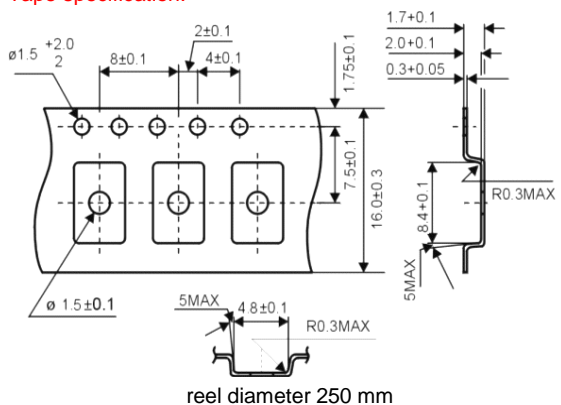
**Dimensions (mm):**



**Reflow soldering condition:**



**Tape specification:**



**Suggested soldering pad:**

