

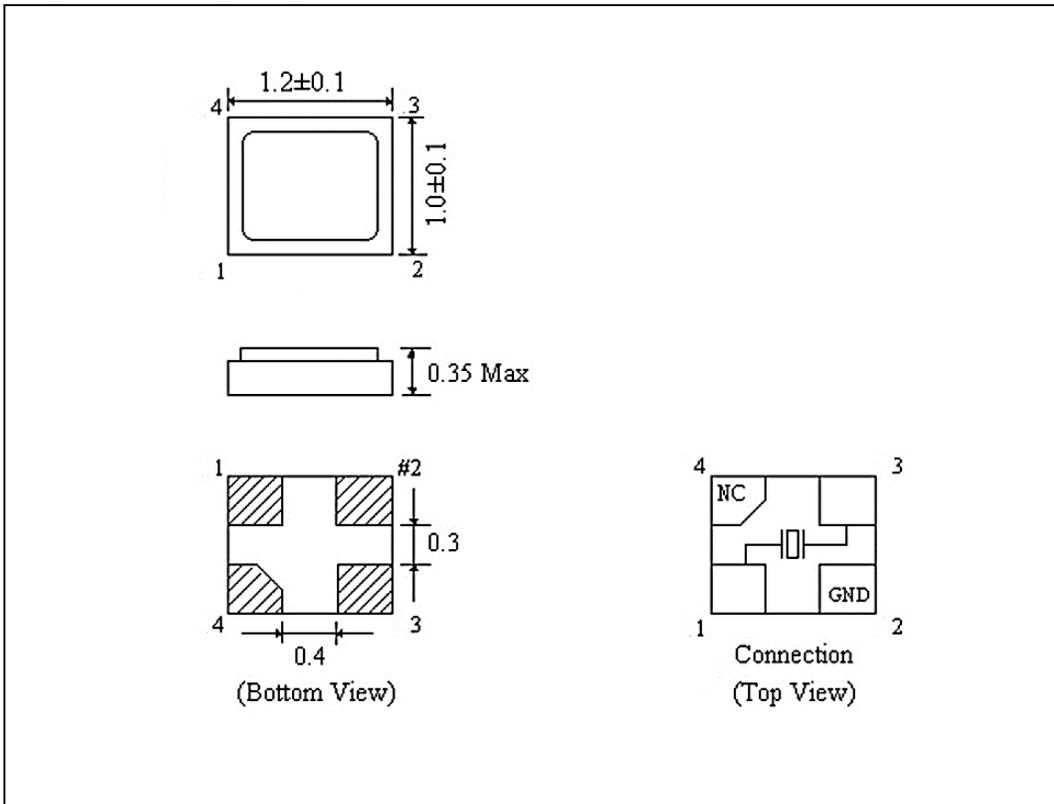
SPECIFICATIONS

PARAMETER	VALUE	
NOMINAL FREQUENCY	48.000 MHz	
MODE OF OSCILLATION	Fundamental	
FREQUENCY TOLERANCE AT 25°C	±10 ppm max	
FREQUENCY STABILITY OVER TEMPERATURE	-30°C to +85°C	±15 ppm max
	-40°C to -30°C	±20 ppm max
OPERATING TEMPERATURE RANGE	-40°C to +85°C	
STORAGE TEMPERATURE RANGE	-40°C to +85°C	
AGING	±2 ppm 1st year max	
LOAD CAPACITANCE	8 pF	
EQUIVALENT SERIES RESISTANCE	100 Ω max	
SHUNT CAPACITANCE	3.0 pF max	
DRIVE LEVEL	50 μW max	
INSULATION RESISTANCE	500 MΩ min	

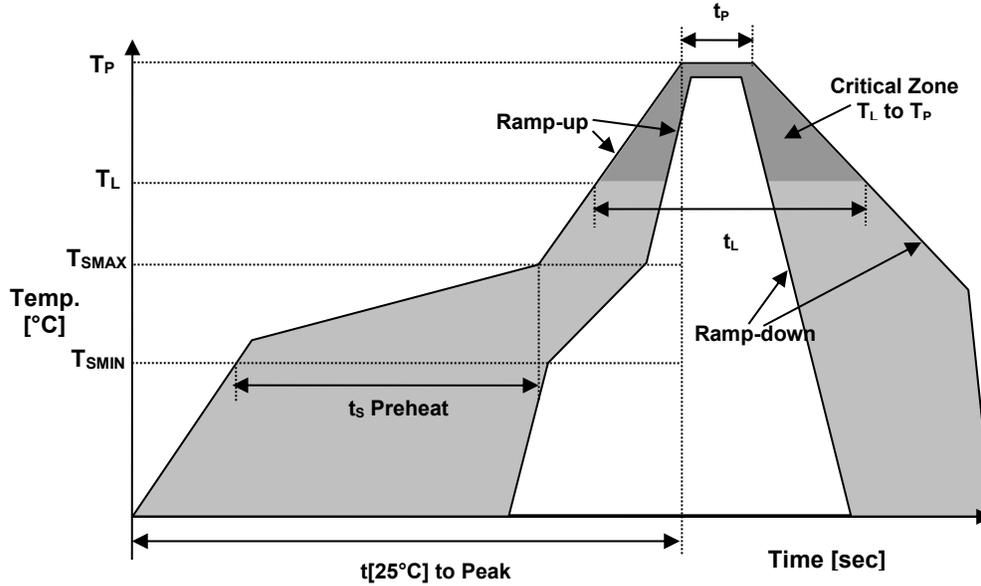


Photo is not actual part

MECHANICAL SPECIFICATION



● REFLOW PROFILE



Reflow profile		
Temperature Min Preheat	T_{SMIN}	150°C
Temperature Max Preheat	T_{SMAX}	200°C
Time (T_{SMIN} to T_{SMAX})	t_s	60-180 sec.
Temperature	T_L	217°C
Peak Temperature	T_P	260°C
Ramp-up rate	R_{UP}	3°C/sec max.
Ramp-down rate	R_{DOWN}	6°C/sec max.
Time within 5°C of Peak Temperature	t_p	10 sec.
Time $t[25^\circ\text{C}]$ to Peak Temperature	$t[25^\circ\text{C}]$ to Peak	480 sec.
Time	t_L	60-150 sec.

● ENVIRONMENTAL

PARAMETER	VALUE
MOISTURE SENSITIVITY LEVEL	1
RoHS	Compliant
REACH SVHC	Compliant
HALOGEN-FREE	Compliant
ESD CLASSIFICATION LEVEL	N/A
TERMINATION FINISH	Au





A **RAMI TECHNOLOGY** Company

SURFACE MOUNT CRYSTAL

Page 3 of 3

R1210-48.000-8-F-1015-EXT-TR

● **APPROVAL**

DRAWN BY	CP, July 12, 2019
APPROVED BY	Jl, July 12, 2019
REVISION	A, Initial Release

Raltron Electronics / RAMI Technology USA, LLC, including its affiliates, employees, agents and other persons acting on its behalf (collectively Raltron/RAMI Tech), disclaim any and all liability for any errors or inaccuracies contained in this data sheet. While Raltron/RAMI Tech has made every reasonable effort ensure the accuracy of all product information, specifications and data contained herein, Raltron/RAMI Tech does not guarantee that the information is accurate, reliable or current. The product information is provided only for reference purposes only and is subject to change, correction or revision, at any time without notice. Raltron/RAMI Tech does not assume any liability arising out of an application or use of any product described herein and disclaims any warranties expressed or implied. The user of products in such applications shall assume all risks of such use and will agree to hold Raltron/RAMI Tech, harmless against all damages.

Copyright © 2016, Raltron Electronics / RAMI Technology USA, LLC. All rights reserved. No part of this document may be reproduced in any form without the prior written permission of Raltron Electronics / RAMI Technology USA, LLC.