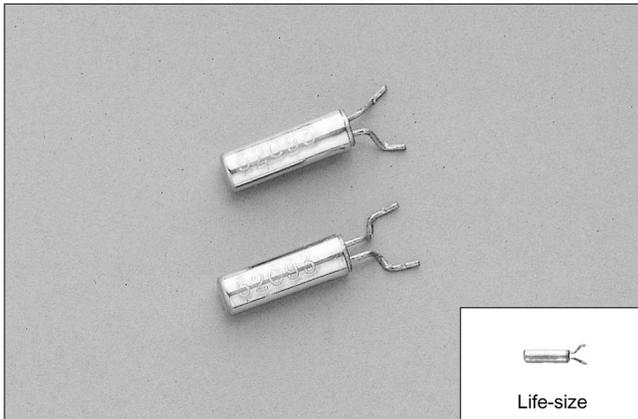


TUNING FORK CRYSTAL UNITS (SMD • Cylinder Type)

RoHS Compliant Optional

CMR200T • CMR250T

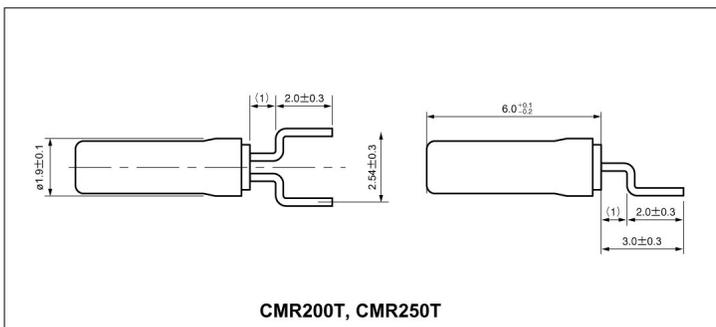
2000pcs/reel



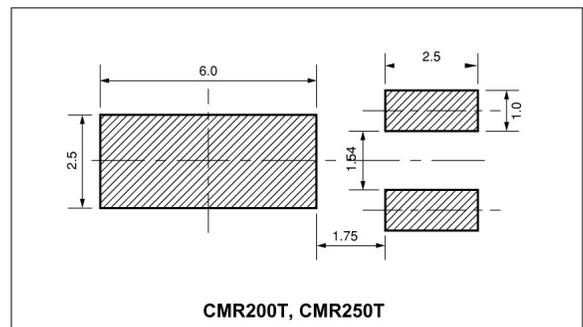
FEATURES

- Lead formed SMD type with embossed tape. Automatic mounting and reflowable Type.
- Most appropriate for clock source for portable and other various equipment with low power consumption.

DIMENSION [mm]



SOLDER PAD LAYOUT [mm]



STANDARD SPECIFICATIONS

Item	Model	CMR200T	CMR250T	Conditions
Nominal Frequency	f_0	32.768kHz	30kHz~100kHz	Need to contact us for the available frequency in CMR250T
Frequency Tolerance	$\Delta f/f_0$	$\pm 20\text{ppm}$	$\pm 30\text{ppm}$	at 25°C
Load capacitance	C_L	12.5pF		Need to specify your requirement
Operating Temperature Range	T_{OPR}	-40°C ~ +85°C		
Storage Temperature Range	T_{STR}	-55°C ~ +125°C		
Turnover Temperature	T_M	25°C \pm 5°C		See figure 2 in P4
Temperature Coefficient	β	-0.034 \pm 0.006ppm/°C ²		
Motional (series) resistance	R_1	50K Ω Max.		at 25°C
Level of drive	DL	1 μ W Max.		
Aging (first year)	$\Delta f/f_0$	$\pm 3\text{ppm}$ Max.	$\pm 5\text{ppm}$ Max.	25°C \pm 3°C
Quality Factor	Q	70000 Typ.	70000 ~ 100000 Typ.	Depend on frequency
Shunt capacitance	C_0	1.35pF Typ.	0.8pF ~ 1.7pF Typ.	Depend on frequency