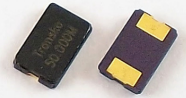


MINIATURE CERAMIC SMD CRYSTAL (5.0 x 3.2 x 1.2mm)

FEATURES:

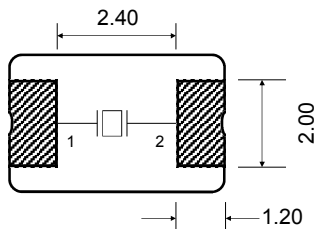
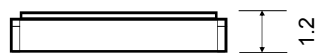
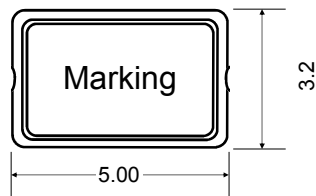
- HIGH FREQUENCY RANGE
- LOW COST SMD PACKAGE
- LOW PROFILE / SUITABLE FOR REFLOW



■ SPECIFICATION

| | |
|------------------------------|--|
| FREQUENCY RANGE | 7.3728MHz ~ 156.25MHz |
| FREQUENCY TOLERANCE @ 25°C | ±10ppm ~ ±50ppm (See P/N guide for other options) |
| FREQUENCY STABILITY | ±10ppm ~ ±50ppm (See P/N guide for other options) |
| OPERATING TEMPERATURE RANGE | STD: 0°C ~ 70°C, Option: -40°C ~ 85°C (See P/N guide for other options) |
| STORAGE TEMPERATURE RANGE | -55°C ~ 125°C |
| LOAD CAPACITANCE | STD: 18pF (See P/N guide for other options) |
| SHUNT CAPACITANCE | 5.0pF max. |
| INSULATION RESISTANCE | 500MΩ min. @ 100V _{DC} ± 15V _{DC} |
| DRIVE LEVEL | 300μW max. |
| AGING @ 25°C ± 3°C | ±3.0ppm / 1 st year max. |
| EQUIVALENT SERIES RESISTANCE | Fundamental: 7.000MHz ~ 12.000MHz: 100Ω max. 12.001MHz ~ 14.000MHz: 60Ω max. Fundamental: 14.001MHz ~ 20.000MHz: 50Ω max. 20.000MHz ~ 54.000MHz: 40Ω max. 3rd overtone: 40.000MHz ~ 60.000MHz: 70Ω max. 5th overtone: 60.001MHz ~ 156.25MHz: 60Ω max. |
| OPERATION MODE | Fundamental, 3 rd Overtone, 5 th Overtone |

■ PACKAGE DIMENSIONS

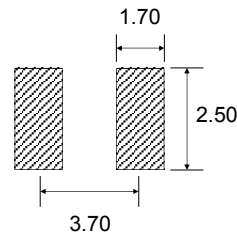


Unit : mm

Pin Configuration

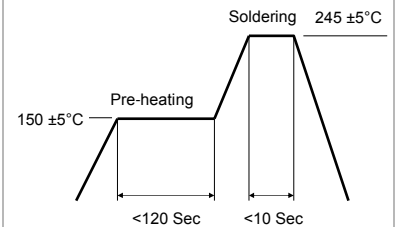
| | |
|---|------|
| 1 | Xtal |
| 2 | Xtal |

■ SOLDER PATTERN



Unit :mm

■ REFLOW PROFILE



Note: Consult factory for detail

■ PART NUMBERING GUIDE

CS53B - F - 00 - 00 - HM - 08 - 40.000M - TR

| | | | |
|--|--|---|---|
| Mode F: Fundamental T: 3 rd overtone B: 5 th overtone | Stability 00: ± 100ppm 50: ± 50ppm 25: ± 25ppm 15: ± 15ppm 10: ± 10ppm XX: Two digit for Stability | Load Capacitance 08: 8pF 20: 20pF 10: 10pF 22: 22pF 12: 12pF 24: 24pF 16: 16pF 28: 28pF 18: 18pF 32: 32pF S: Series | Other Options TR: Tape and reel |
| Tolerance @ 25°C 00: ± 100ppm 50: ± 50ppm(standard) 30: ± 30ppm 25: ± 25ppm 10: ± 10ppm XX: Two digit for Tolerance | Operating Temperature A: -55 F: -20 M: 70 S: 100 B: -50 G: -10 N: 75 T: 105 C: -40 H: 0 P: 80 U: 125 D: -35 J: 50 Q: 85 X: custom E: -30 K: 60 R: 90 | Frequency M: MHz | |