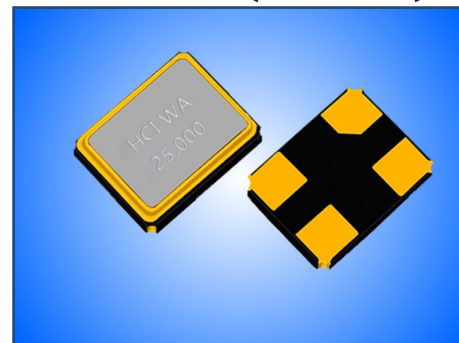


**QUARTZ CRYSTAL UNIT IN SMD 2.0x1.6mm CERAMIC SEAM SEAL PACKAGE.**
**PRODUCT FEATURES**

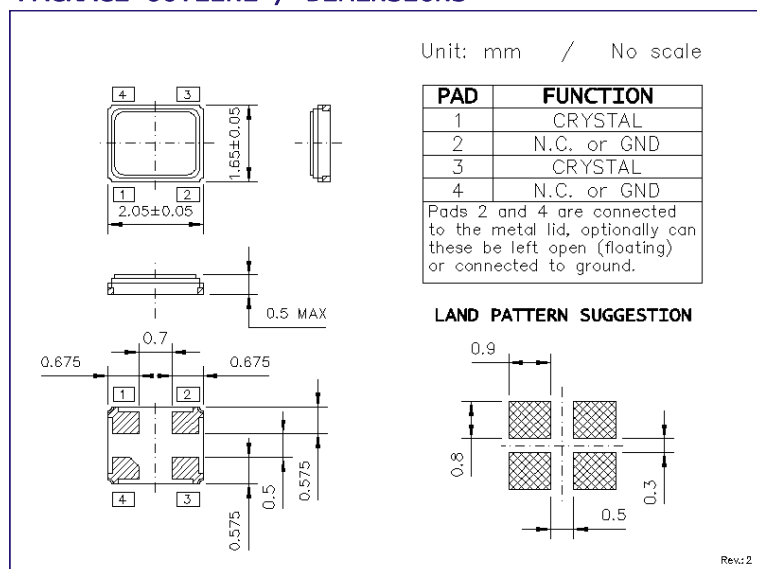
- Ultra-miniature unit dimensions 2.0x1.6x0.45 with 4 pads.
- Highly reliable vacuum seam sealed ceramic package.
- Tight tolerances and stabilities over temperature range.
- Automotive compliance to AEC-Q200 available.
- RoHS compliant, LEAD-FREE and HALOGEN-FREE.

**PRODUCT PHOTO (NOT IN SCALE)**

**APPLICATIONS**

- Wireless LAN
- Bluetooth
- Mobil communication
- Handheld equipment

**PRODUCT SPECIFICATIONS**

| PARAMETER                    | 0121M4                  |              | CONDITIONS / REMARKS     |
|------------------------------|-------------------------|--------------|--------------------------|
| Nominal frequency range      | 20.000 ~ 60.000MHz      |              | --                       |
| Crystal cut and mode         | AT-cut / Fundamental    |              | --                       |
| Frequency tolerance          | ±10pm / ±20ppm / ±30ppm |              | Other options available. |
| Frequency stability          | ±15ppm                  | ±20ppm       | Other options available. |
| Operating temperature range  | -20 to +70°C            | -30 to +85°C | Other options available. |
| Equivalent series resistance | <125Ω                   |              | 20.000 to 23.999MHz      |
|                              | <100Ω                   |              | 24.000 to 29.999MHz      |
|                              | <80Ω                    |              | 30.000 to 39.999MHz      |
|                              | <60Ω                    |              | 40.000 to 60.000MHz      |
| Load capacitance             | 6 ~ 32pF or SERIES      |              | Please specify.          |
| Shunt capacitance            | <3.0pF                  |              | --                       |
| Drive level                  | 10μW TYP / 100μW MAX    |              | --                       |
| Storage temperature range    | -55 to +125°C           |              | --                       |

**PACKAGE OUTLINE / DIMENSIONS**

**PACKAGING INFORMATION**

- Tape & Reel compliant to EIA-481.
- Embossed carrier width 8mm.
- Component pitch in carrier 4mm.
- Reel diameter 180mm.
- QTY per reel: 3,000pcs MAX.

**RECOMMENDED REFLOW PROFILE**
