

90SMX(N) CRYSTALS 8.7mm x 3.8mm

DESCRIPTION

90SMX (N) crystals are miniature surface-mount crystals specifically designed to provide a low cost crystal for mass-market applications. The crystals have a low-profile and are manufactured in epoxy resin.

FEATURES

- Frequency 32.7680kHz
- · Industry-standard package
- Compact and low-profile: 8.7mm x 3.8mm x 2.5 mm
- Supplied in standard EIA 16mm tape and reel

GENERAL SPECIFICATION

| Nominal Frequency: | 32.7680kHz |
|--------------------------------------|--------------------------------------|
| Calibration Tolerance at 25°C*: | ±20ppm |
| Load Capacitance (CL): | 12.5pF* |
| Equivalent Series Resistance: | 50kW |
| Drive Level: | 1.0μW maximum |
| Quality Factor (Q): | 50,000 minimum |
| Turnover Temperature: | +25°C (X-Cut) |
| Temperature Coefficient: | -0.035ppm/°C ² ±10% |
| Shunt Capacitance (C0): | 1.35pF typical |
| Capacitance Ratio: | 450 typical |
| Ageing at 25°C: | ±3ppm maximum, first year |
| Insulation Resistance: | 500 M Ω minimum @ 100 VDC |
| Crystal Cut: | X-Cut |
| Operating Temperature Range: | -40° to 85°C |
| Storage Temperature Range: | -55° to +125°C |
| Shock: | ±5ppm |
| Vibration: | ±5ppm |
| Reflow Soldering: | 10s maximum @+235°C±5°C |
| Packaging: | Supplied on standard EIA 16mm |
| | tape, 3000 pieces per reel. |

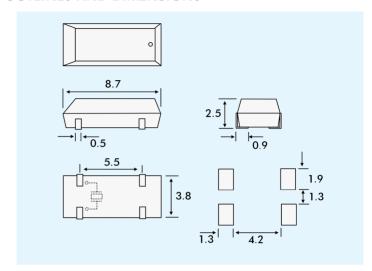
Notes:

PART NUMBER

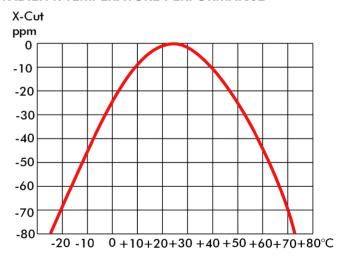
For a standard 90SMX(N) crystal at 32.7680kHz there is a standard stock part available:

Euroquartz Stock Number: PH32768X

OUTLINES AND DIMENSIONS



STABILITY/TEMPERATURE PERFORMANCE



^{*} Other CL (i.e. CL = 6pF) is available, check with Euroquartz sales.