

- Frequency range 3.5MHz to 70.0MHz
- Fully RoHS compliant
- Industry-standard package
- Standard EIA tape and reel supply



DESCRIPTION

86SMX crystals were among the first surface mount crystal designs available in the industry. As a result the package is widely used. Supply on 24mm EIA tape and reel is standard.

SPECIFICATION

Frequency Range

AT-Cut Fundamental: 3.5MHz to 30.0MHz

AT-Cut 3rd Overtone: 30.1MHz to 70.0MHz

BT-Cut Fundamental: 25.0MHz to 40.0MHz

Calibration Tolerance at 25°C*: ±50ppm at 25°C

Frequency Stability over Temperature*

AT-Cut: ±50ppm over -10° to +60°C

BT-Cut: ±100ppm over -10° to +60°C

Storage Temperature: -40°~+85°C

Equivalent Series Resistance: See table

Shunt Capacitance (C0): 7pF maximum

Load Capacitance (CL): Series or from 8pF to 32pF (Customer specified CL)

Ageing: ±3ppm per year at +25°C

Drive Level: 100µW maximum

Reflow Soldering: 10s maximum at 260°C twice or 180s at 230°C, once.

Crystal Holder: Moulded plastic

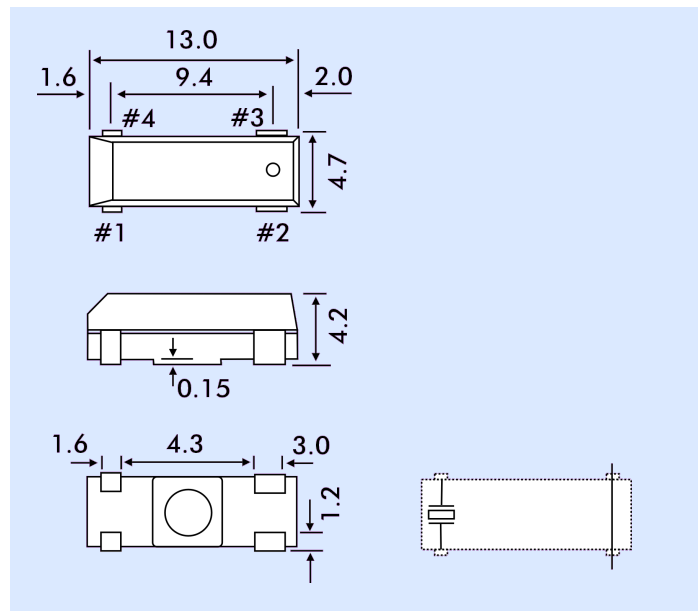
Packaging: 24mm EIA tape and reel, 1k per reel.

Note: Tighter calibration tolerance and operating temperature range parts may be available, check with Euroquartz sales.

EQUIVALENT SERIES RESISTANCE / OSCILLATION MODE

Frequency Range MHz	Crystal Cut/ Osc. Mode	ESR (Ω) Max.
3.5 ~ 3.99	AT Fund	200
4.0 ~ 4.99	AT Fund	150
5.0 ~ 5.99	AT Fund	120
6.0 ~ 6.99	AT Fund	100
7.0 ~ 7.99	AT Fund	80
8.0 ~ 12.9	AT Fund	60
13.0 ~ 30.0	AT Fund	40
25.1 ~ 45.0	BT Fund	40
30.0 ~ 70.0	AT 3rd OT	100

OUTLINE & DIMENSIONS



PART NUMBER GENERATION

Part numbers for 86SMX crystals are generated as follows:

