

ISSUE 10; May 2024

### Description

- Industry standard SMD package with 5.5mm lead spacing. Suitable for real time clock applications. Plastic encapsulated.

### Frequency Parameters

- Frequency 32.768kHz
- Frequency Tolerance  $\pm 20.00\text{ppm}$
- Ageing  $\pm 5\text{ppm max per year @ } 25^\circ\text{C}$

### Electrical Parameters

- Load Capacitance (CL) 6.0pF to 12.5pF
- Shunt Capacitance (C0) 1pF typ
- Drive Level 1.0 $\mu\text{W max}$

### Operating Temperature Ranges

- 40 to 85°C

### Environmental Parameters

- Storage Temperature Range: -55 to 125°C
- Drop: 75cm drop (3 times) onto hard wooden board
- Vibration: 1.5mm amplitude, 10Hz-60Hz, 2-3mins in 3 mutually perpendicular planes, duration 2hrs each plane

### Manufacturing Details

- Not suitable for use with ultrasonic cleaning techniques
- RoHS Terminations Matte Sn
- RoHS Reflow 260degC 10s

### Ordering Information

- Frequency\*  
Model\*  
Frequency Tolerance (@25°C)\*  
Load Capacitance\*
- Example  
32.768kHz 85SMX  
20/-/12.5

### Compliance

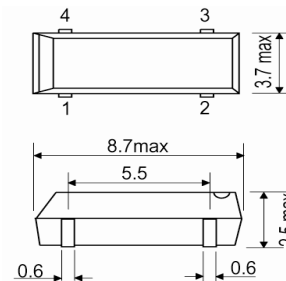
- RoHS Status (2015/863/EU) Compliant
- REACH Status Compliant
- MSL Rating (JDEC-STD-033): Not Applicable

### Packaging Details

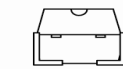
- Tape & reel in accordance with EIA-481  
Quantities below the standard reel size to be supplied on cut tape.  
Standard Pack Quantity: 3,000



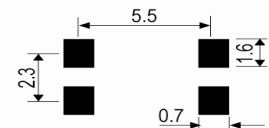
### Outline (mm)



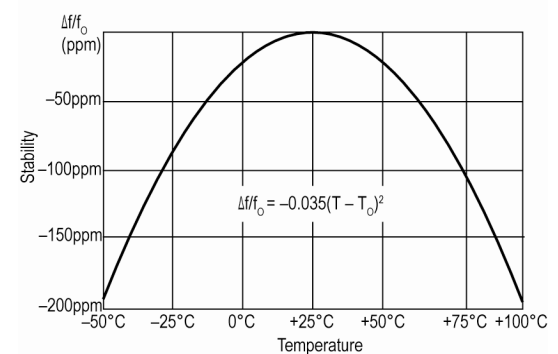
- Pad Connection
- Crystal
  - N/C
  - N/C
  - Crystal



### Solder Pad Layout



### Typical Frequency Stability Characteristics



### Sales Office Contact Details:

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Electrical Specification - maximum limiting values

Frequency	Temperature Range	Stability	Over Tone Order	ESR
	°C	ppm		Ω
32.768000kHz	-40 to 85	-	Fundamental	50,000

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