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ELECTRONICS

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Jameco Part Number 1852096

● Part Numbering

CERALOCK® (MHz)

(Global Part Number) 

|    |   |    |      |     |     |     |
|----|---|----|------|-----|-----|-----|
| CS | T | CV | 16M0 | X53 | *** | -R0 |
|----|---|----|------|-----|-----|-----|

① ② ③ ④ ⑤ ⑥ ⑦

① Product ID

| Product ID |                    |
|------------|--------------------|
| <b>CS</b>  | Ceramic Resonators |

② Frequency/Capacitance

| Code     | Frequency/Capacitance       |
|----------|-----------------------------|
| <b>A</b> | MHz No capacitance built-in |
| <b>T</b> | MHz Built-in Capacitance    |

③ Structure/Size

| Code            | Structure/Size             |
|-----------------|----------------------------|
| <b>LA</b>       | Lead Type                  |
| <b>LS</b>       | Round Lead Type            |
| <b>CC</b>       | Cap Chip Type              |
| <b>CR/CE/CG</b> | Small-cap Chip Type        |
| <b>CV</b>       | Monolithic Chip Type       |
| <b>CW</b>       | Small Monolithic Chip Type |

④ Nominal Center Frequency

Expressed by four-digit alphanumerics. The unit is in hertz (MHz).  
Decimal point is expressed by capital letter "M".

⑤ Design

| Code        | Design                                 |
|-------------|--|
| <b>G□□</b>  | Thickness Shear mode                   |
| <b>T/□□</b> | Thickness Expander mode                |
| <b>X□□</b>  | Thickness Expander mode (3rd overtone) |

□□ indicates initial frequency tolerance and load capacity.

CERALOCK® (kHz)

(Global Part Number) 

|    |   |    |      |     |     |     |
|----|---|----|------|-----|-----|-----|
| CS | B | FB | 1M00 | J58 | *** | -R1 |
|----|---|----|------|-----|-----|-----|

① ② ③ ④ ⑤ ⑥ ⑦

① Product ID

| Product ID |                    |
|------------|--------------------|
| <b>CS</b>  | Ceramic Resonators |

② Frequency/Capacitance

| Code     | Frequency/Capacitance       |
|----------|-----------------------------|
| <b>B</b> | kHz No capacitance built-in |

③ Structure/Size

| Code      | Structure/Size         |
|-----------|------------------------|
| <b>LA</b> | Two-Terminal Lead Type |
| <b>FB</b> | SMD Type               |

④ Nominal Center Frequency

Expressed by four-digit alphanumerics. The unit is in hertz (Hz).  
Capital letter "K" following three figures expresses the unit of "kHz".

⑥ Individual Specification

| Code       | Individual Specification                                      |
|------------|---|
| <b>***</b> | Three-digit alphanumerics express "Individual Specification". |

With standard products, "⑥ Individual Specification" is omitted, and "⑦ Package Specification Code" is carried up.

⑦ Packaging

| Code       | Packaging                          |
|------------|------------------------------------|
| <b>-B0</b> | Bulk                               |
| <b>-A0</b> | Radial Taping H <sub>0</sub> =18mm |
| <b>-A1</b> | Radial Taping H <sub>0</sub> =16mm |
| <b>-R0</b> | Plastic Taping ø=180mm             |
| <b>-R1</b> | Plastic Taping ø=330mm             |

Radial taping is applied to lead type and plastic taping to chip type.

⑤ Design

| Code       | Design                            |
|------------|-----------------------------------|
| <b>E□□</b> | Area Expansion mode               |
| <b>J□□</b> | Area Expansion mode (Closed Type) |

□□ indicates initial frequency tolerance and load capacitance.

⑥ Individual Specification

| Code       | Individual Specification                                      |
|------------|---|
| <b>***</b> | Three-digit alphanumerics express "Individual Specification". |

With standard products, "⑥ Individual Specification" is omitted, and "⑦ Package Specification Code" is carried up.

⑦ Packaging

| Code       | Packaging              |
|------------|------------------------|
| <b>-B0</b> | Bulk                   |
| <b>-R1</b> | Plastic Taping ø=330mm |

# Ceramic Resonators (CERALOCK®)



## Chip Type Three-Terminals CSTCC/E/G/R/V/W Series

Chip "CERALOCK" with built-in load capacitance in an extremely small package.

MURATA's package technology expertise has enabled the development of the Chip "CERALOCK" with built-in load capacitors.

High-density mounting can be realized because of the small package and the elimination of the need for an external load capacitor.

### ■ Features

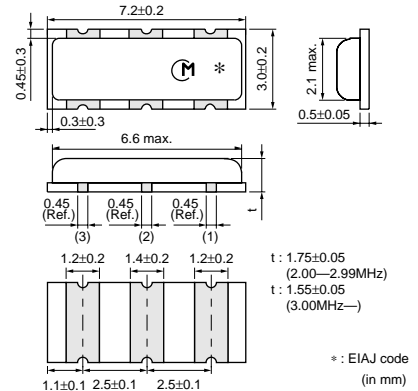
1. Oscillation circuits do not require external load capacitors.
2. The series is available in a wide frequency range.
3. The resonators are extremely small and have a low profile.
4. No adjustment is necessary for oscillation circuits.

### ■ Applicatons

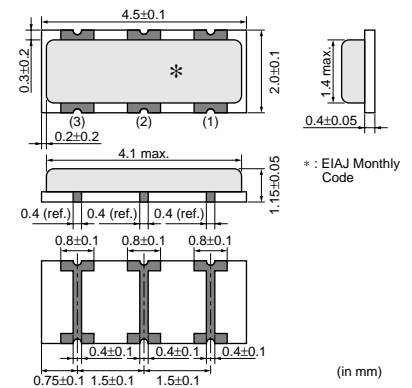
- Clock oscillators for microprocessors.
- Electronic control circuits for small electronic equipment such as hand held movie.
- Audio-visual applications (Camcorder, Remote Controller, etc.)
- Office automation equipments (DVD, CD-ROM, HDD, FDD, etc.)
- Automotive electronics. (CSTCC\_G\_A series, CSTCR\_G\_A series, CSTCE\_G\_A series, CSTCV\_X\_Q series)
- Dual Tone Multi Frequency (DTMF) generator for cordless telephones.



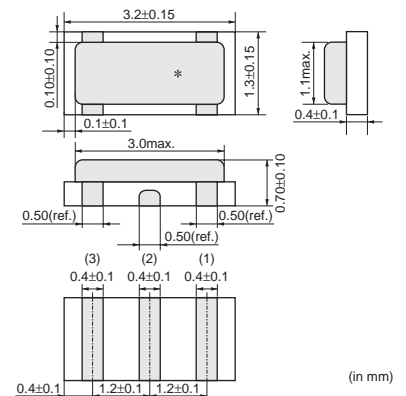
CSTCC\_G(A)  
2.00-3.99MHz



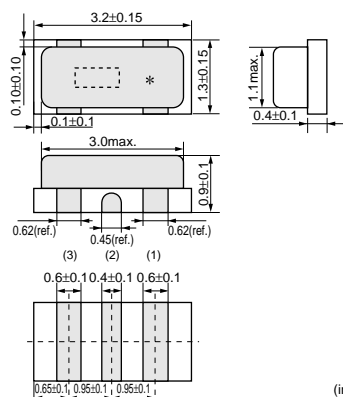
CSTCR\_G(A)  
4.00-7.99MHz



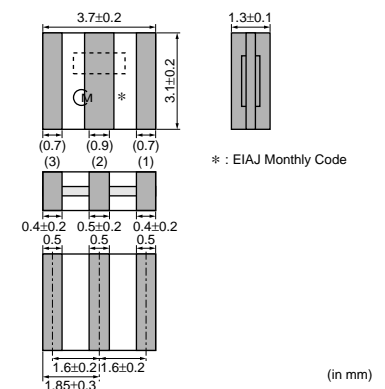
CSTCE\_G(A)  
8.00-12.50MHz



CSTCE\_V  
12.51-19.99MHz



CSTCV\_X\_Q  
14.70-70.00MHz



Continued on the following page. ↗