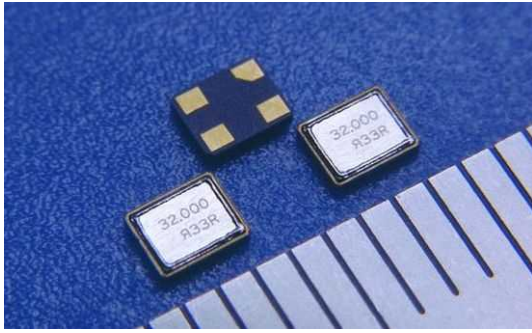


SMD Crystal Unit

FCX-05

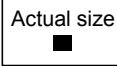


◆ FEATURES

- AT-cut, MHz crystal unit (11 ~ 80 MHz)
- Compact package (2.5 × 2.0 × 0.55 mm Max. / 10 mg)
- Low frequency available from 11 MHz
- High-precision frequency (available from ±7ppm @25°C)
- Automotive temperature range (-40 ~ +125°C)
- High-reliable ceramic/metal package sealed with electron beam
- Long seller (since 2003)
- Specifications in conformity with AEC-Q200 available on request

◆ APPLICATIONS

- In-vehicle units
- Applications that require high pulling-sensitivity



◆ STANDARD SPECIFICATIONS / ORDERING INFORMATION

Ordering Number (Sample): **C5A** — **12000** — **060** — **C Q3** — **150** — **H X ##**
 (1) (2) (3) (4) (5) (6) (7) (8) (9)

(1) Type
C5A

(2) Nominal Frequency
11.000 ~ 80.000 MHz e.g. 12.000 MHz = 12000

(3) Load Capacitance
5.0, 6.0, 7.0 pF*1 e.g. 6.0 pF = 060

*1 Other values available on request

(4) Frequency Tolerance @ 25°C
±7 ppm A
±10 ppm B
±15 ppm C
±20 ppm D
±30 ppm E
±50 ppm F
Other N

(5) Operating Temperature	Frequency versus Temperature Characteristics (Refer to 25°C)				
	±10 ppm	±15 ppm	±20 ppm	±30 ppm	±50 ppm
-20 ~ +70°C	P1	P2	P3	P4	P5
-30 ~ +85°C	Q1	Q2	Q3	Q4	Q5
-40 ~ +85°C	-	R2	R3	R4	R5
-40 ~ +105°C	-	-	-	S4	S5
-40 ~ +125°C	-	-	-	-	T5
Other	NN				

(6) Equivalent Series Resistance
11 ~ 12 MHz: 200Ω Max. 200
12 ~ 13 MHz: 150Ω Max. 150
13 ~ 17 MHz: 100Ω Max. 100
17 ~ 23 MHz: 80Ω Max. 080
23 ~ 30 MHz: 60Ω Max. 060
30 ~ 80 MHz: 50Ω Max. 050
Other NNN

(7) Storage Temperature*2
-40 ~ +85°C G
-40 ~ +105°C H
-55 ~ +125°C J
Other N

*2 Not applicable to packing materials

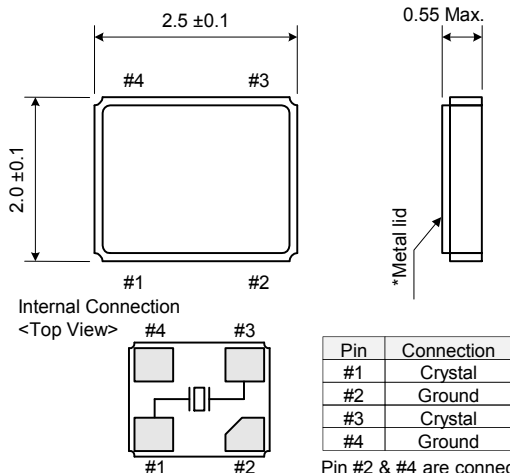
(8) Tape & Reel (φ180 mm)
3000 pcs/reel X
Other N

(9) RIVER Use Only (As needed)

Drive Level
200 μW Max.

- "Ordering Number" codes are indicated in blue, and the corresponding specifications are described in black.
- Not all combinations of options are available as a standard specification.
- For "Overall Frequency-Tolerance" specifications, please select "N" for the "(4) Frequency Tolerance", and let our sales know your requirement.
- For specifications other than those above, please consult our sales or contact us via our website with your requirement.

◆ OUTLINE DIMENSIONS

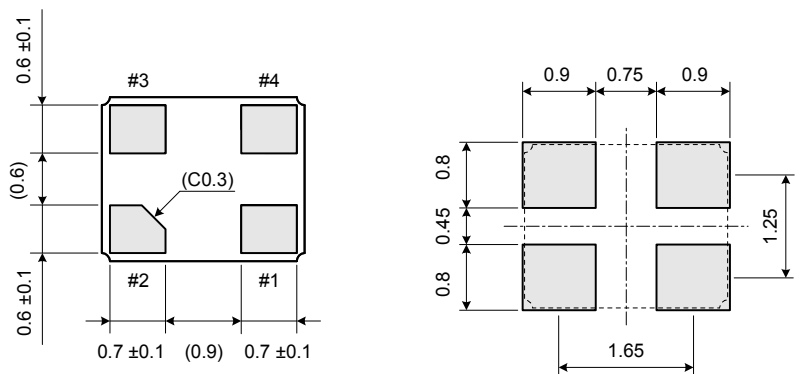


Pin	Connection
#1	Crystal
#2	Ground
#3	Crystal
#4	Ground

Pin #2 & #4 are connected to the lid*

◆ LAND PATTERN

Unit: mm



RIVER RIVER ELETEC CORPORATION

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