

MODEL: CMC-4012-40P | **DESCRIPTION:** ELECTRET CONDENSER MICROPHONE**FEATURES**

- omnidirectional
- low profile
- pin mount

**SPECIFICATIONS**

| parameter | conditions/description | min | typ | max | units |
|---------------------------------|-------------------------------------|-----|-----|--------|-------|
| directivity | omnidirectional | | | | |
| sensitivity (S) | f = 1 kHz, 1 Pa, 0 dB = 1 V/Pa | -43 | -40 | -37 | dB |
| standard operating voltage (Vs) | | | 2 | | Vdc |
| max operating voltage | | | | 10 | Vdc |
| output impedance (Zout) | f = 1 kHz, 1 Pa | | 2.2 | | kΩ |
| sensitivity reduction (ΔS-Vs) | f = 1 kHz, 1 Pa, Vs = 2.0 ~ 1.5 Vdc | | -3 | | dB |
| frequency (f) | | 100 | | 20,000 | Hz |
| current consumption (IDSS) | Vs = 2.0 Vdc, RL = 2.2 kΩ | | | 0.5 | mA |
| signal to noise ratio (S/N) | f = 1 kHz, 1 Pa, A-weighted | | 58 | | dBA |
| dimensions | Ø4.0 x 1.2 | | | | mm |
| material | nickel silver | | | | |
| terminal | pin type | | | | |
| weight | | | | 0.15 | g |
| operating temperature | | -20 | | 70 | °C |
| storage temperature | | -20 | | 70 | °C |
| RoHS | yes | | | | |

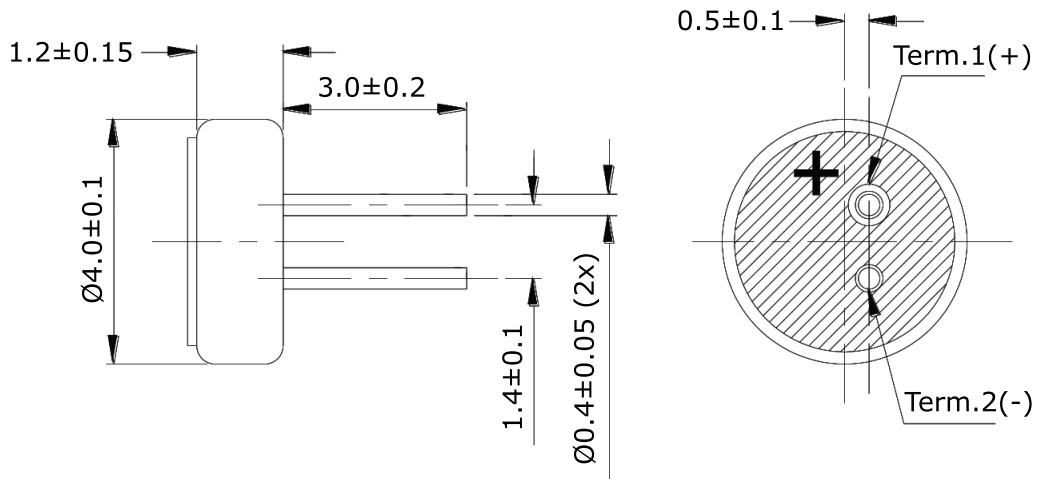
Notes: 1. We use the "Pascal (Pa)" indication of sensitivity as per the recommendation of I.E.C. (International Electrotechnical Commission). The sensitivity of "Pa" will increase 20 dB compared to the "ubar" indication. Example: -60 dB (0 dB = 1 V/ubar) = -40 dB (1V/Pa)
 2. All specifications measured at 5~35°C, humidity at 45~85%, under 86~106 kPa pressure, unless otherwise noted.

SOLDERABILITY

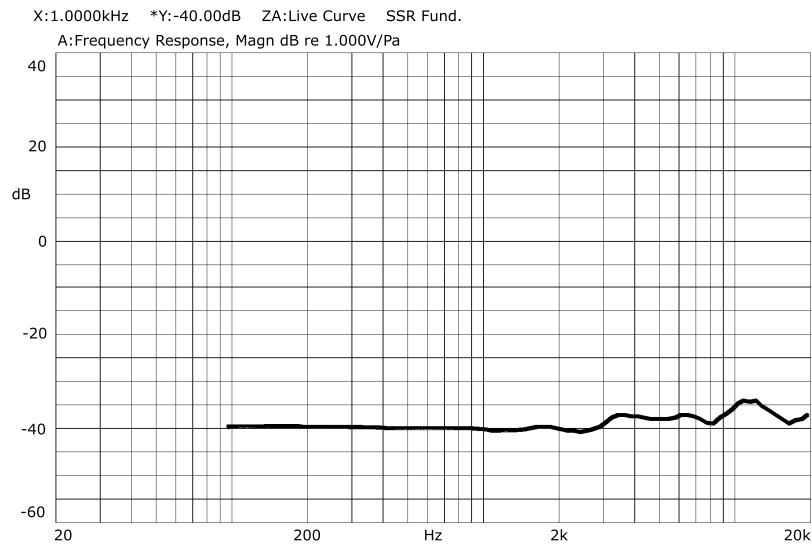
| parameter | conditions/description | min | typ | max | units |
|----------------|------------------------|-----|-----|-----|-------|
| hand soldering | for 2 ± 0.5 seconds | 270 | 280 | 290 | °C |

MECHANICAL DRAWING

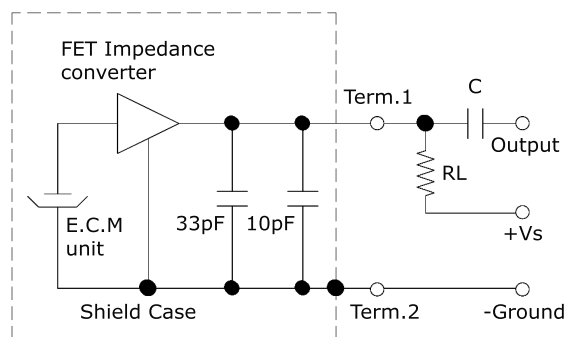
units: mm



FREQUENCY RESPONSE CURVE



MEASUREMENT CIRCUIT

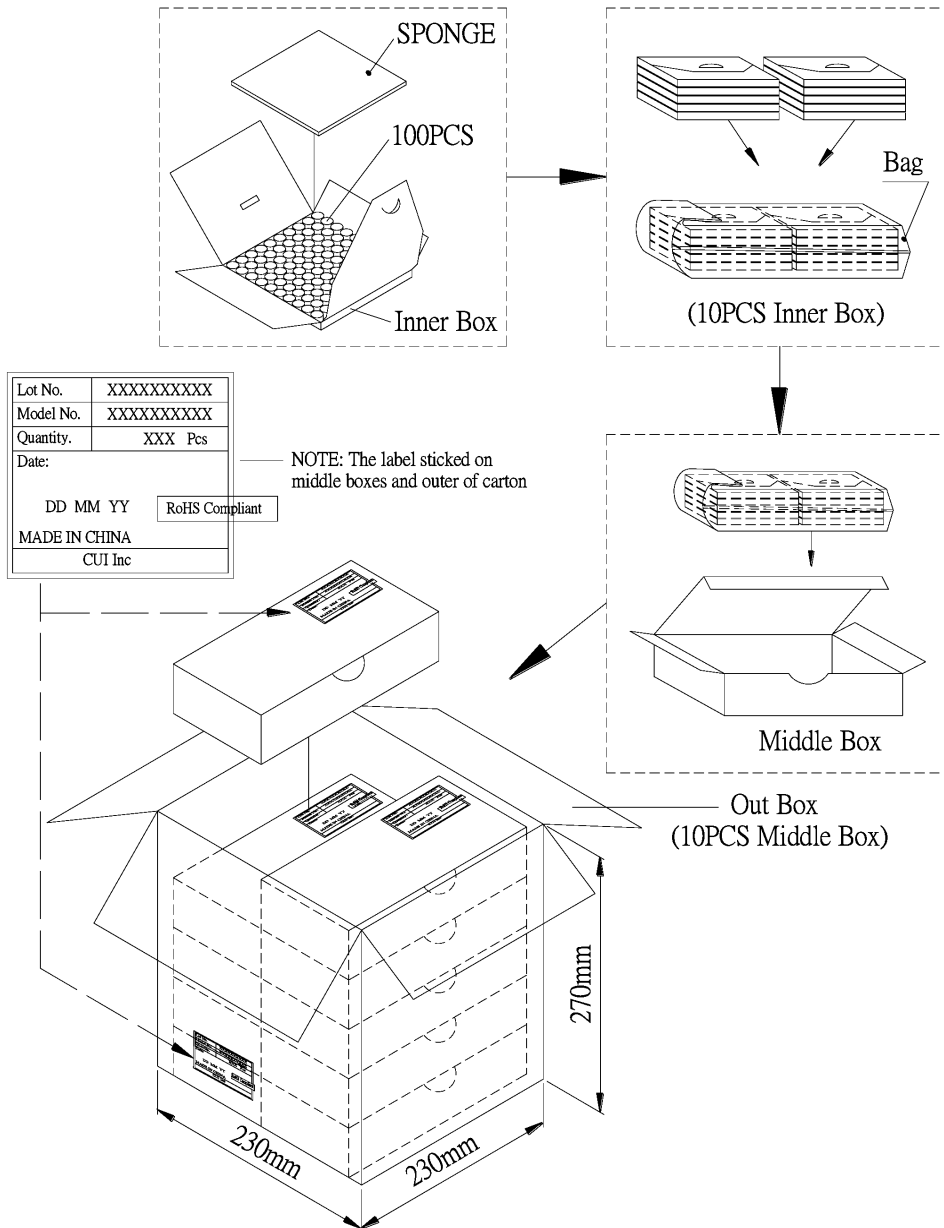


RL = 2.2 kΩ
C = 1 μF

PACKAGING

units: mm

Inner Box Size: 100 x 100 x 8 mm
 Middle Box Size: 205 x 106 x 52 mm
 Outer Box Size: 230 x 230 x 270 mm
 Inner Box QTY: 100 pcs per box
 Middle Box QTY: 1,000 per box
 Outer Box QTY: 10,000 per box



REVISION HISTORY

| rev. | description | date |
|------|-----------------|------------|
| 1.0 | initial release | 11/04/2016 |
| 1.01 | brand update | 01/09/2020 |

The revision history provided is for informational purposes only and is believed to be accurate.

CUI DEVICES

CUI Devices offers a one (1) year limited warranty. Complete warranty information is listed on our website.

CUI Devices reserves the right to make changes to the product at any time without notice. Information provided by CUI Devices is believed to be accurate and reliable. However, no responsibility is assumed by CUI Devices for its use, nor for any infringements of patents or other rights of third parties which may result from its use.

CUI Devices products are not authorized or warranted for use as critical components in equipment that requires an extremely high level of reliability. A critical component is any component of a life support device or system whose failure to perform can be reasonably expected to cause the failure of the life support device or system, or to affect its safety or effectiveness.