CUI DEVICES

date 01/13/2020

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MODEL: CMC-6010-42L100 | DESCRIPTION: ELECTRET CONDENSER MICROPHONE

FEATURES

- omnidirectional
- low profile
- 100 mm lead wires





SPECIFICATIONS

parameter	conditions/description	min	typ	max	units
directivity	omnidirectional				
sensitivity (S)	f = 1 kHz, 1 Pa, 0 dB = 1 V/Pa	-45	-42	-39	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)	$f = 1 \text{ kHz}, 1 \text{ Pa, Vs} = 2.0 \sim 1.5 \text{ Vdc}$		-3		dB
frequency (f)		100		20,000	Hz
current consumption (IDSS)	$Vs = 2.0 Vdc$, $RL = 2.2 k\Omega$			0.5	mA
signal to noise ratio (S/N)	f = 1 kHz, 1 Pa, A-weighted		58		dBA
dimensions	Ø6.0 x 1.0				mm
material	nickel silver				
terminal	wire leads				
weight				0.32	g
operating temperature		-20		70	°C
storage temperature		-20		70	°C
RoHS	yes				

Notes:

SOLDERABILITY

parameter	conditions/description	min	typ	max	units
hand soldering	for maximum 2 seconds	310	320	330	°C

^{1.} We use the "Pascal (Pa)" indication of sensitivity as per the recomendation of I.E.C. (International Electrotechnical Commission). The sensitivity of "Pa" will increase

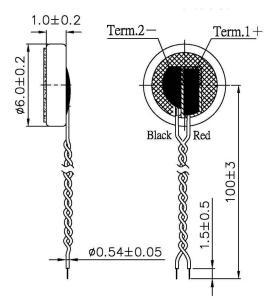
²⁰ dB compared to the "ubar" indication. Example: -60 dB (0 dB = 1 V/ubar) = -40 dB (1 V/Pa) 2. All specifications measured at $5\sim35^{\circ}$ C, humidity at $45\sim85^{\circ}$, under $86\sim106$ kPa pressure, unless otherwise noted.

MECHANICAL DRAWING

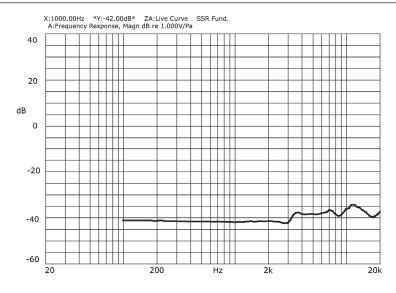
units: mm

tolerance: ±0.3 mm

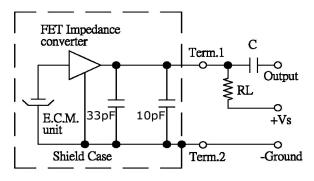
wire: UL1571 LF 32 AWG



FREQUENCY RESPONSE CURVE



MEASUREMENT CIRCUIT

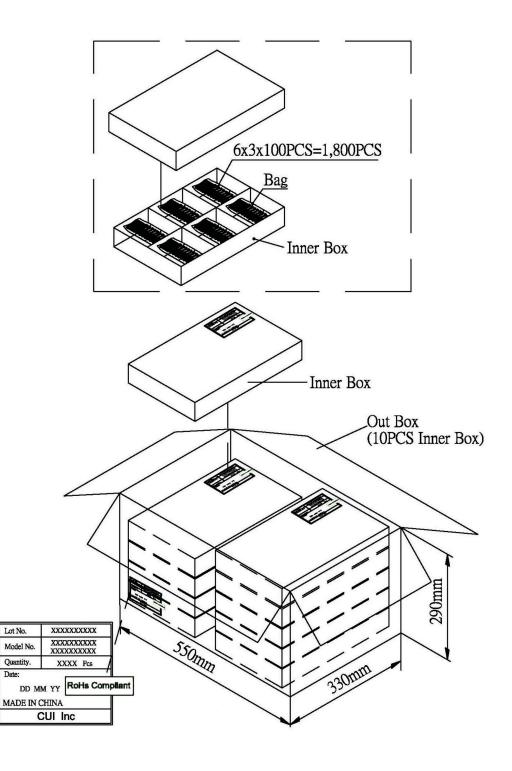


 $RL = 2.2 k\Omega$ $C = 1 \mu F$

PACKAGING

units: mm

Inner Box Size: 310 x 248 x 49 mm Outer Box Size: 550 x 330 x 290 mm Inner Box QTY: 1,800 pcs per box Outer Box QTY: 18,000 pcs per box



Additional Resources: Product Page | 3D Model

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REVISION HISTORY

rev.	description	date
1.0	initial release	11/23/2016
1.01	brand update	01/13/2020

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.

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