



PUI audio



Data Sheet

AT-2429-TWT-R

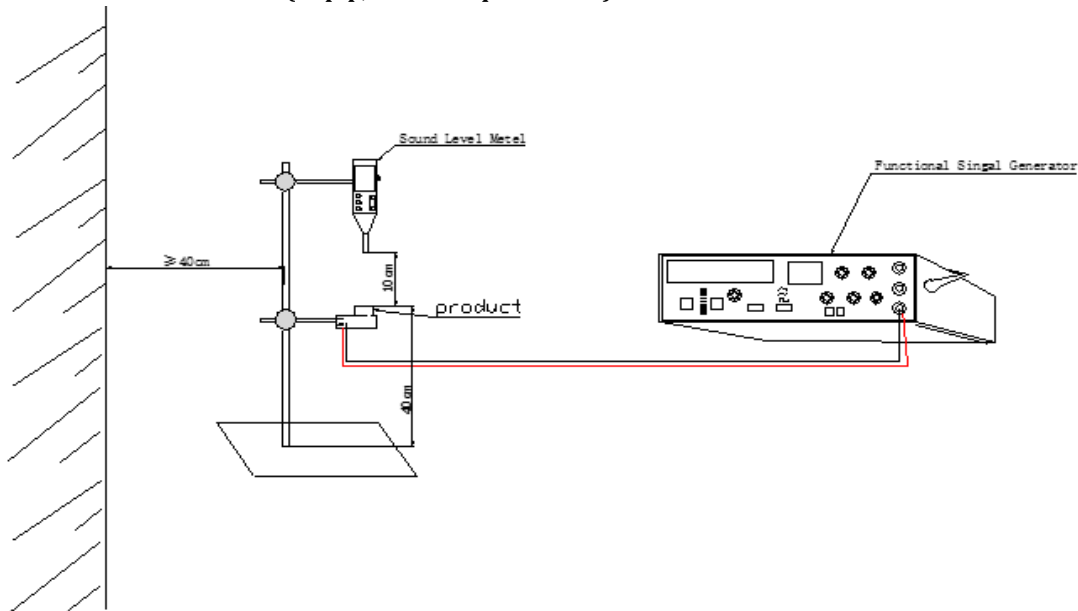
Features:

- Piezo Transducer
- 12Vp-p rated, 2900Hz
- Wash Solder and Washing Allowed

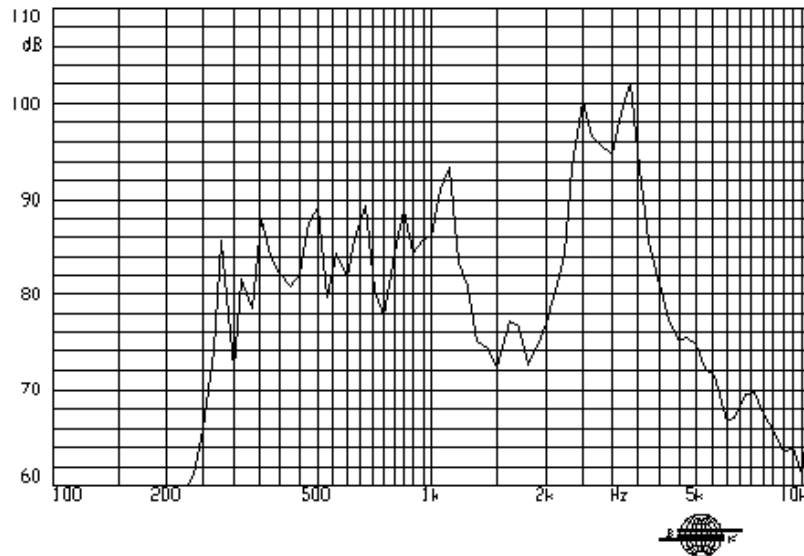
Specifications

Parameters	Values	Units
Rated Voltage	12	Vp-p
Operating Voltage Range	2 ~ 30	Vp-p
Current Draw at Rated Voltage	8(Max.)	mA
Capacitance at 120Hz	70,000 ± 30%	pF
Minimum SPL @ 10cm	90	dBA
Resonant Frequency	2,900 ± 500	Hz
Housing Material	PPS	-
Terminal Material	Sn Plated Red Copper	-
Weight	5	Grams
Acceptable Soldering Methods	Hand Solder	-
Environmental Compliances	ROHS/REACH	Exemption 7c-1
Storage Temperature	-40 ~ +105	°C
Operating Temperature	-30 ~ +105	°C

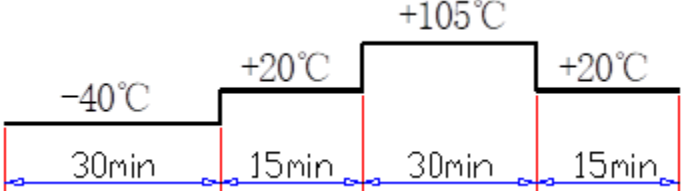
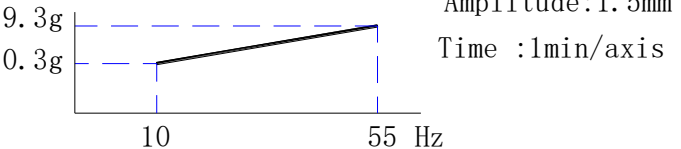
Measurement Method (3Vp-p, 2900Hz square wave)



Typical Frequency Response (12Vp-p square wave, distance=10cm)

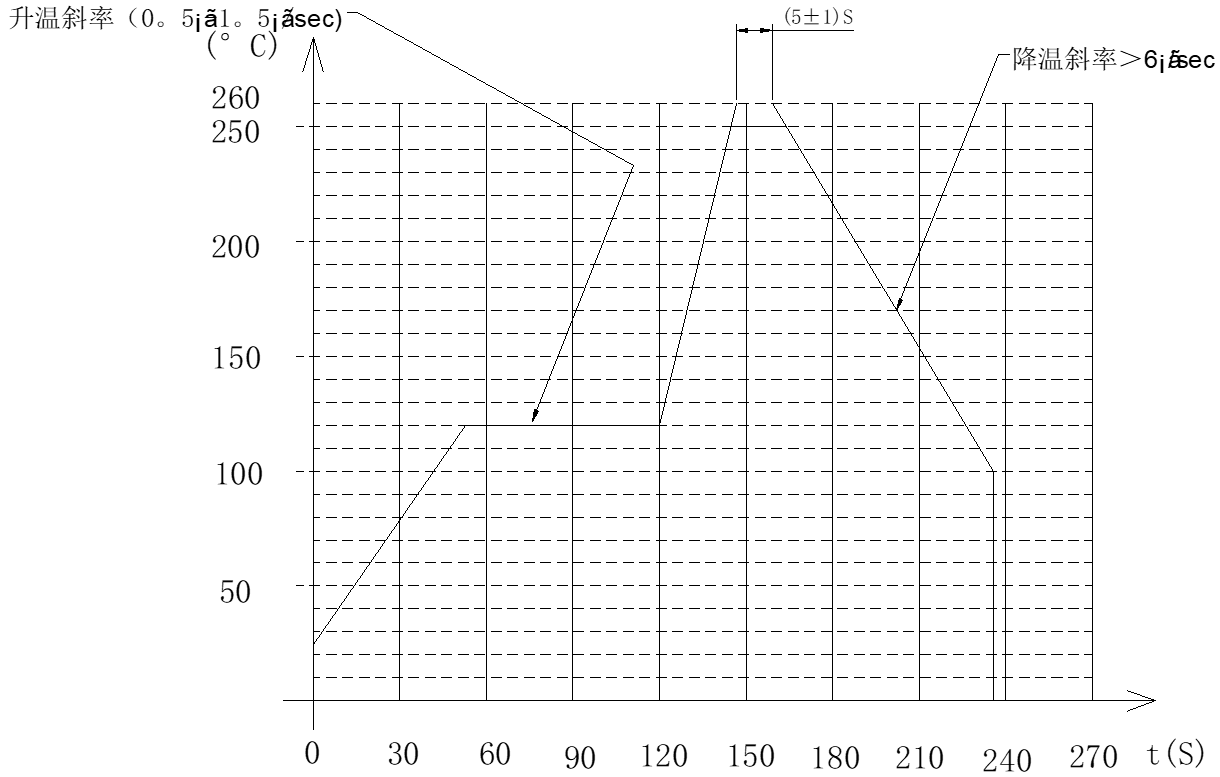


Reliability Testing

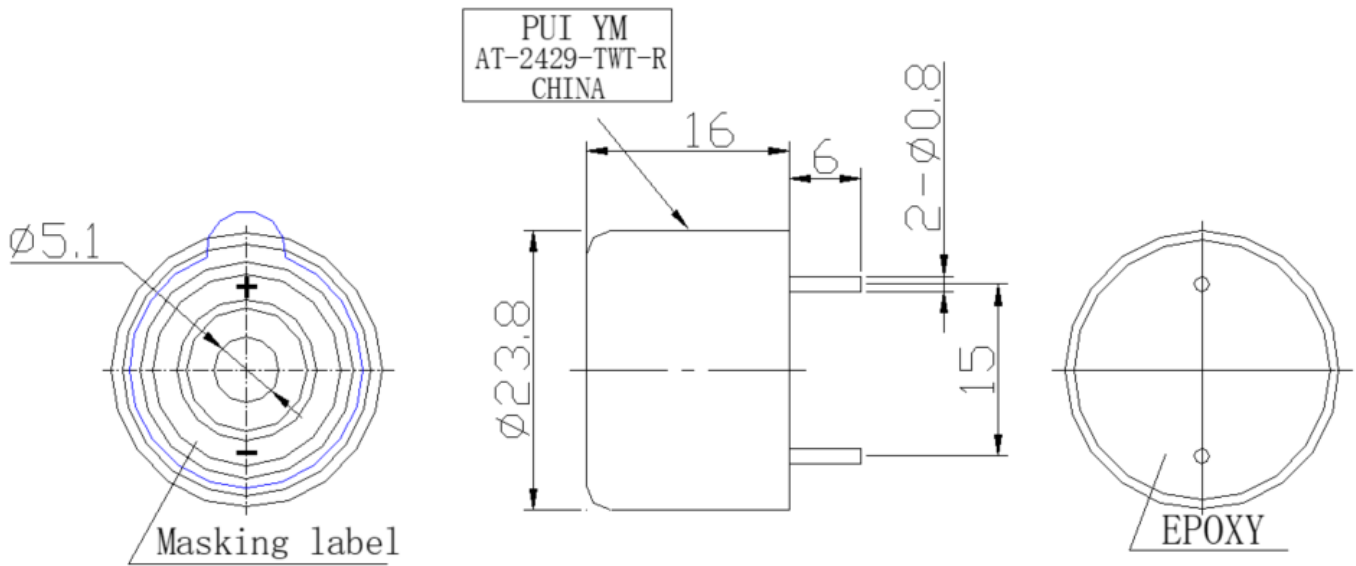
Type of Test	Test Specifications
High Temperature Test	Storage in $+105^{\circ}\text{C} \pm 2^{\circ}\text{C}$ test box for 96 hours, then expose to the room temperature for 2 hours without applying power.
Low Temperature Test	Storage in $-40^{\circ}\text{C} \pm 2^{\circ}\text{C}$ test box for 96 hours, then expose to the room temperature for 2 hours without applying power.
Humidity Test	Storage in $+40^{\circ}\text{C} \pm 2^{\circ}\text{C}$ 90-95%RH test box for 96 hours, then expose to the room temperature for 2 hours without applying power.
Temperature Cycle Testing	 <p>Make this test for 5 cycles without applying power, then expose to the room temperature for 2 hours.</p>
Vibration Test	 <p>Make this test for the directions of X,Y, Z for 2 hours each (total 6 hours).</p>
Drop Test	Free drop a unit from the height 70cm to the surface of 10mm thick board ,three directions(X,Y,Z).

After tests, parts shall test SPL within $\pm 5\text{dB}$.

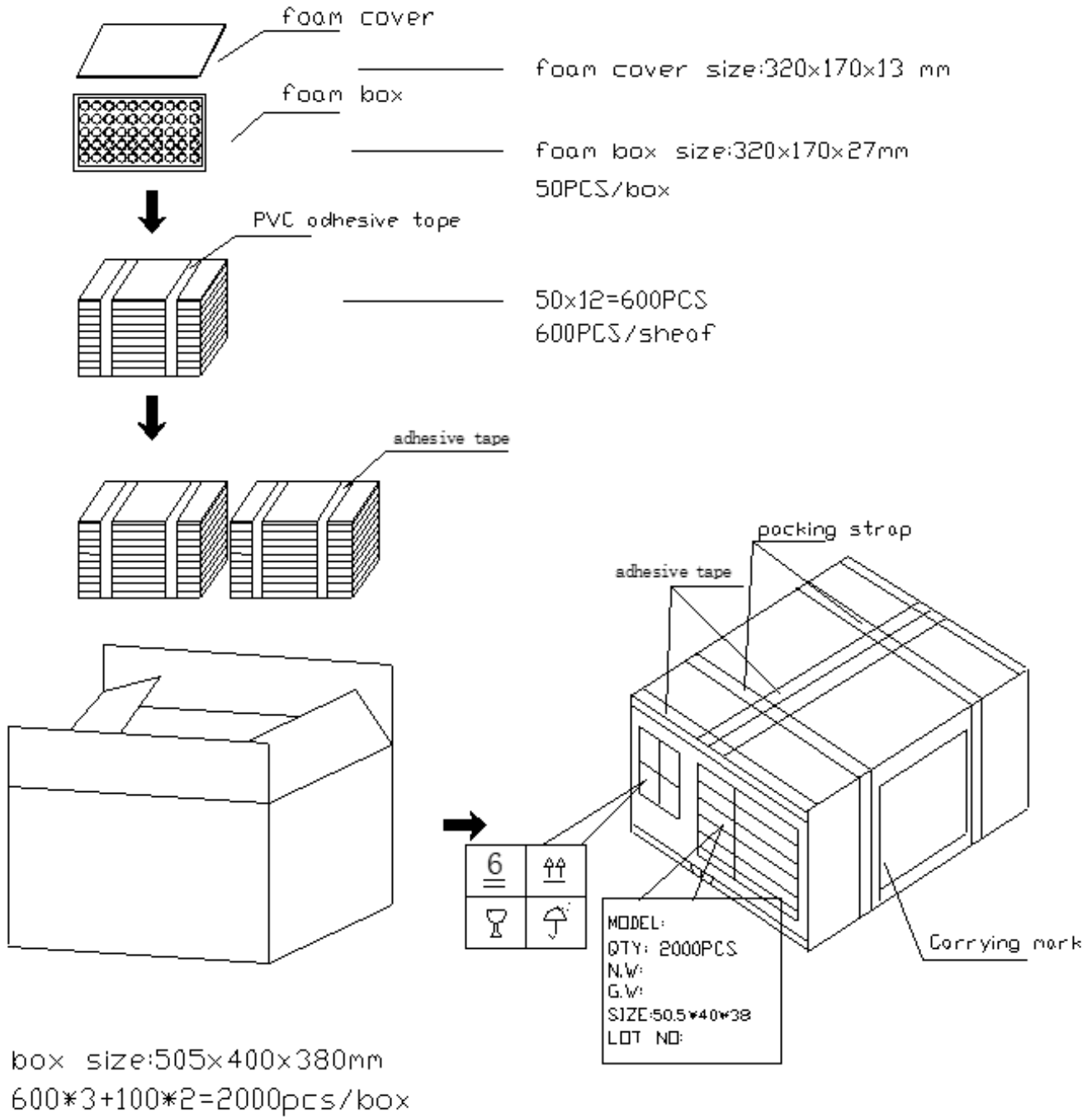
Recommended Wave Solder Profile



Dimensions



Packaging



Specification Revisions

Revision	Description	Date	Approved
-	RELEASED FROM ENGINEERING	02/22/2006	-
A	REVISED TEMPERATURE RANGES	05/28/2006	BR
B	REVISED TEMPERATURE RANGES	06/24/2008	BR
C	REVISED TO INVENTOR 3D DRAWING TEMPLATE	09/30/2008	BR
D	REVISED CAPACITANCE	07/23/2018	MV
E	REVISED TEMPERATURE SPECIFICATIONS	02/28/2020	MV
F	Update Spec Format, Add Details for Reliability, Packaging, Etc.	10/14/2024	ML

Note:

1. Unless otherwise specified:
 - A. All dimensions are in millimeters.
 - B. Default tolerances are $\pm 0.5\text{mm}$ and angles are $\pm 3^\circ$.
2. Specifications subject to change or withdrawal without notice.