



PUIaudio



Data Sheet

AI-1223-TWT-2-R

Features:

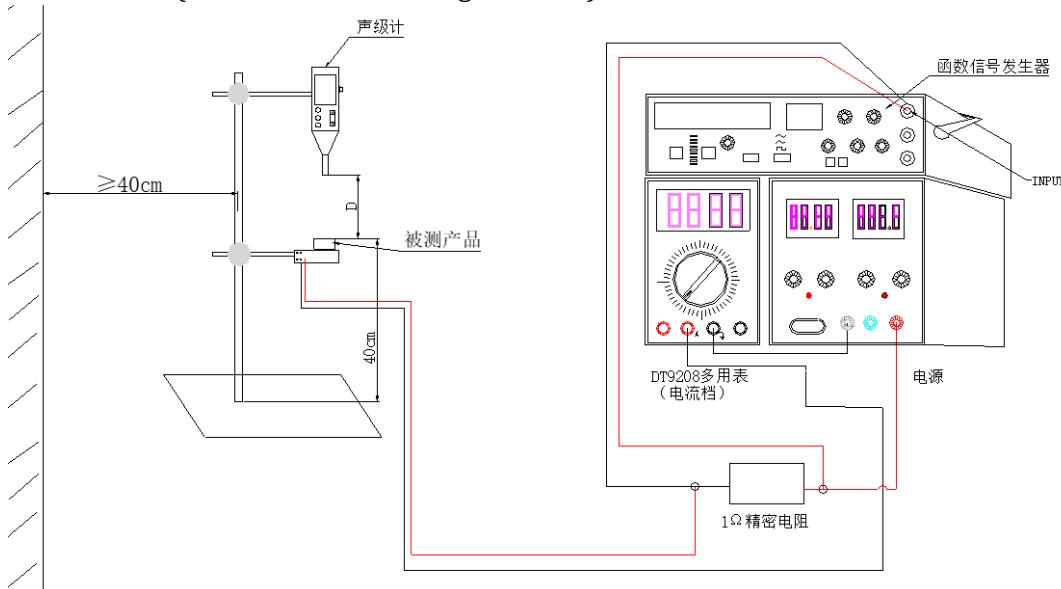
- Top-firing, thru-hole magnetic indicator
- 1.5 V_{DC}, 2400 Hz resonant frequency
- Wave solder and wash allowed

Specifications

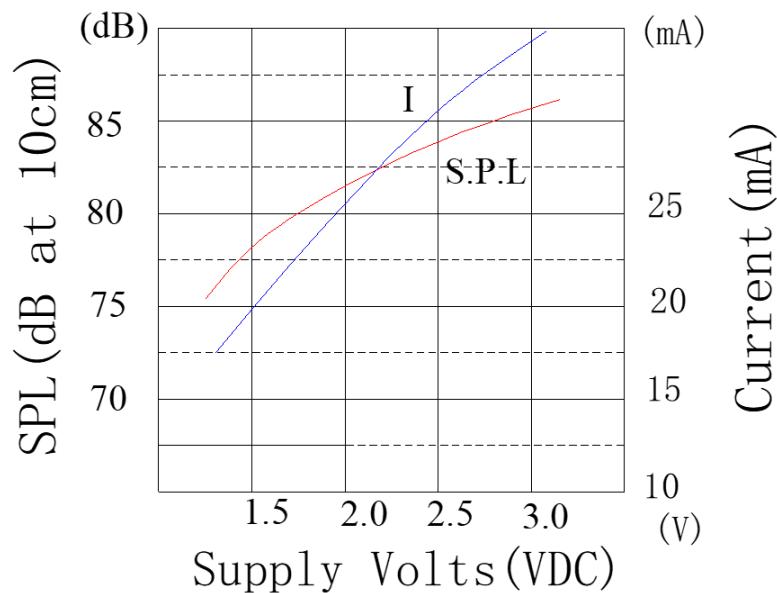
Parameters	Values	Units
Rated Voltage	1.5	V _{DC}
Operating Voltage Range	1.3 ~ 3	V _{DC}
Current Draw at Rated Voltage	25(Max.)	mA
Minimum SPL @ 10cm	80	dBA
Resonant Frequency	2,300±500	Hz
Tone or Pulse Rate	Continuous	-
Housing Material	PBT	-
Terminal Material	Sn Plated Red Copper(DSn)	-
Weight	2	Grams
Acceptable Soldering Methods	Hand Solder, Wave Solder	-
Environmental Compliances	RoHS/REACH	-
Storage Temperature	-40 ~ +85	°C
Operating Temperature	-30 ~ +70	°C

Measurement Method (Temperature: 25±3°C; Relative Humidity: 60% ~ 70%)

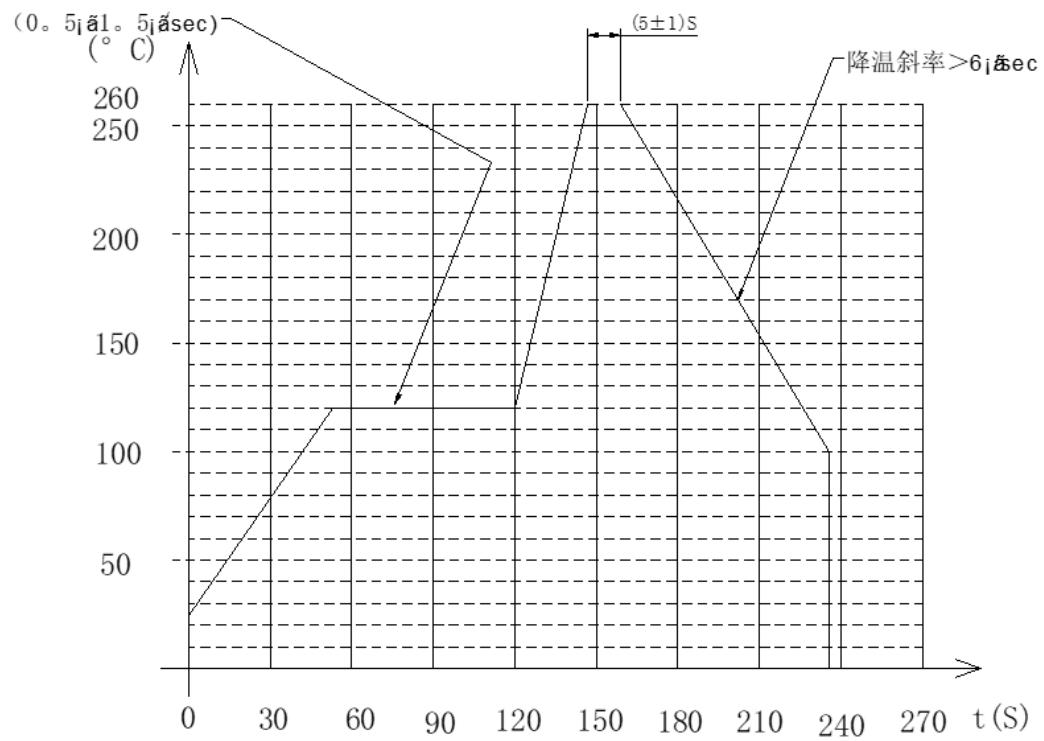
Standard test fixture (Distance: 10cm; Voltage: 1.5 V_{DC})



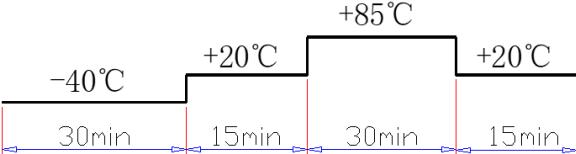
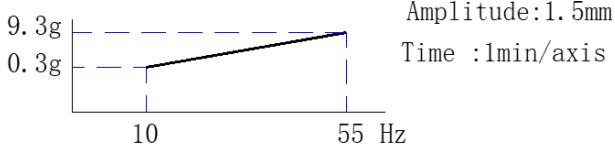
Typical SPL Vs Voltage



Recommended Wave Soldering Profile

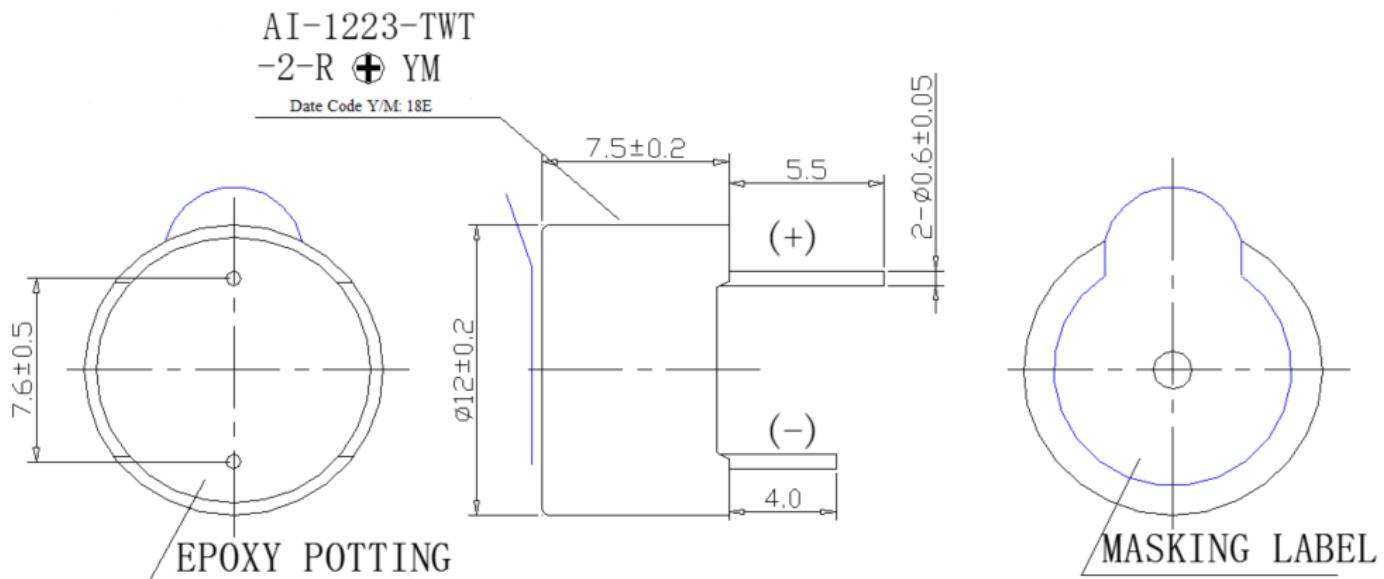


Reliability Testing

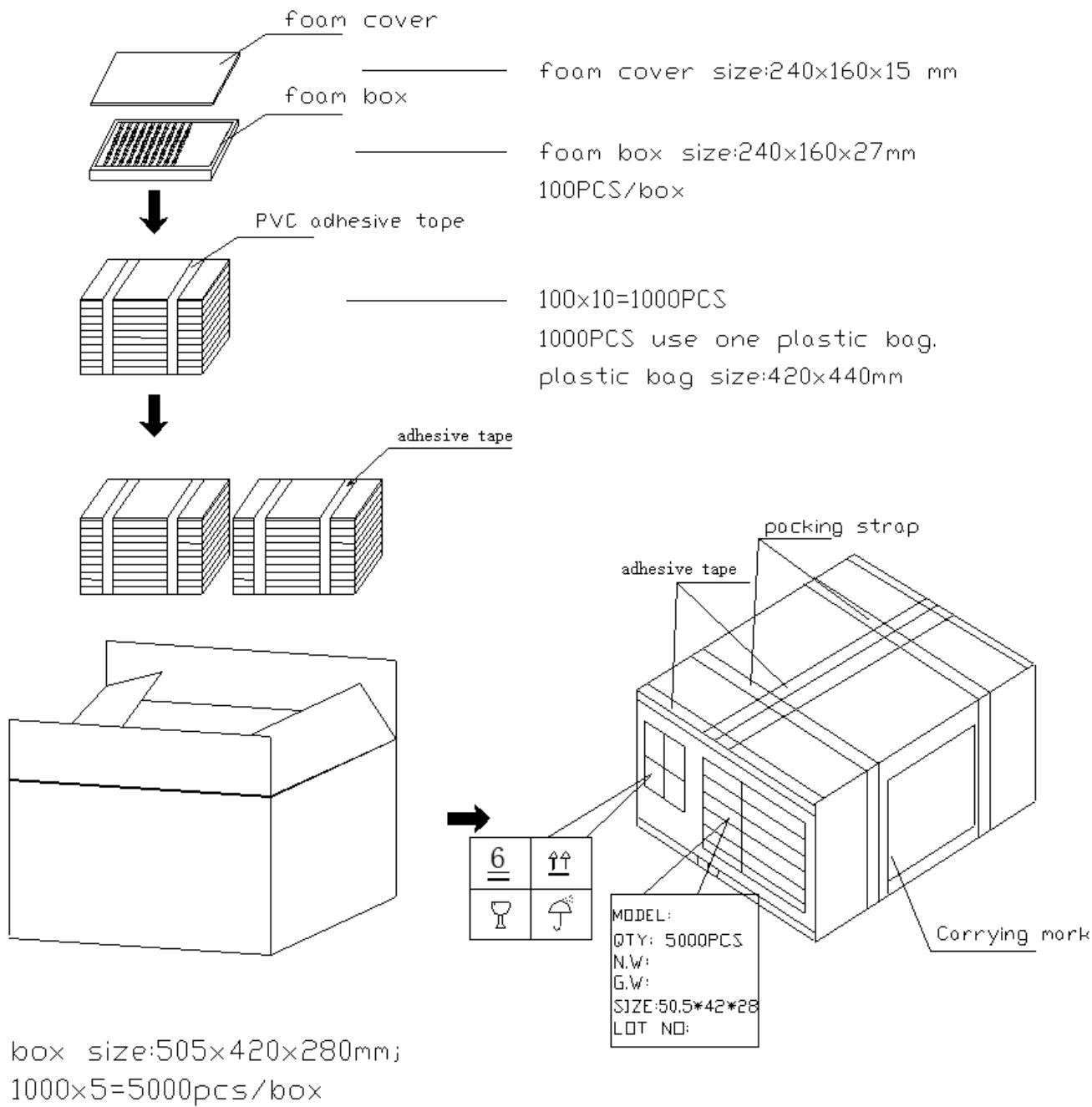
Type of Test	Test Specifications
High Temperature Test	96 hours at $+85 \pm 2^\circ\text{C}$, then rest at room temperature for 2 hours without applying power.
Low Temperature Test	96 hours at $-40 \pm 2^\circ\text{C}$, then rest at room temperature for 2 hours without applying power.
Humidity Test	96 hours at $+40 \pm 2^\circ\text{C}$ with relative humidity at 95% then rest at room temperature for 2 hours without applying power.
Temperature Cycle Testing	 <p>Complete test above for 5 cycles without power, retest after exposure to room temperature for 2 hours</p>
Vibration Test	 <p>Amplitude: 1.5mm Time : 1min/axis</p> <p>Complete this test for X,Y,Z directions for 2 hours each (total 6 hrs).</p>
Drop Test	Drop from 100cm onto the surface of a 1cm thick wooden board.

*After these tests, part SPL shall be within $\pm 5\text{dB}$.

Dimensions



Packaging



Specifications Revisions

Revision	Description	Date	Approved
-	RELEASED FROM ENGINEERING	03/22/2006	-
A	REVISED TO INVENTOR 3D DRAWING TEMPLATE	11/12/2007	BR
B	Update Spec Format, Revised SPL, Current Draw, and Resonant Frequency, Revised Housing Material, Add details for Reliability, Packaging, etc.	06/28/2024	ML
C	Updated Operating Voltage Range, Current Draw at Rated Voltage, Resonant Frequency, and SPL	12/2/2025	JD

Note:

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