



# **Product Specification**

Product Name:	External-Driven Piezo Transducer
Part Number:	TFM-75B
Version:	1.01
Date:	2015-5-11
Note:	

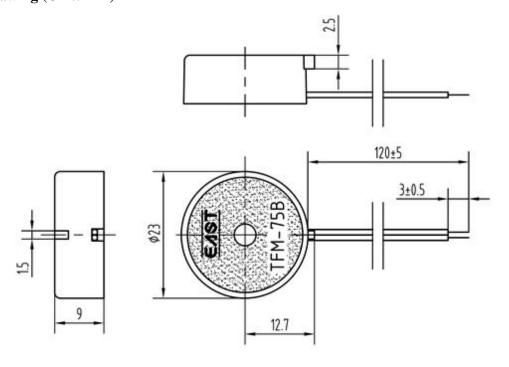
## Company passed ISO 9001 / ISO TS16949 / ISO 14001 Certifications

## **Revision History**

Rev.	Description	Author/Date	Checked By	Approver
1.01	Quality Certificate Symbol revised	刘进 2015-5-11	汤礼东	王建成
1.0	Released	汤礼东 2011-8-9	张春雷	王建成

#### 1. Part Number TFM-75B

## 2. Dimension Drawing (Unit: mm)



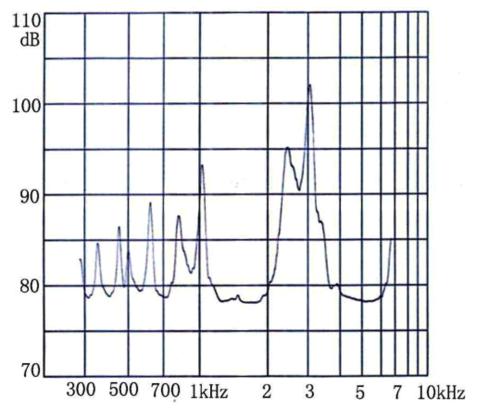
## 3. Specification

No.	Item	Specification
3-1	Min. Sound Pressure Level	88dB/2.5kHz/9Vp-p square wave /10cm
3-2	Allowed Input Voltage	40Vp-p
3-3	Capacitance	24±30%nF(At 1000Hz)
3-4	Max. Consumption	12mA/2.5kHz/9Vp-p square wave
3-5	Resonant Frequency	2.5± 0.5kHz
3-6	Operating Temperature	-20~+70℃
3-7	Case Material /Color	ABS (PA-757)/Black
3-8	Weight	2.5g
3-9	Wire Standard	UL1095-30AWG

#### **NOTES:**

Test should be made under the conditions of room temperature  $(20\pm10^{\circ}\text{C})$ , normal humidity  $(60\pm20\%)$  and normal atmospheric pressure. In this case, however, that the judgment is questionable, the test conditions are to be changed to room temperature  $20\pm2^{\circ}\text{C}$ , relative humidity  $60\sim70\%$  and normal atmospheric pressure

## **4.**Typical Frequency Response Curve



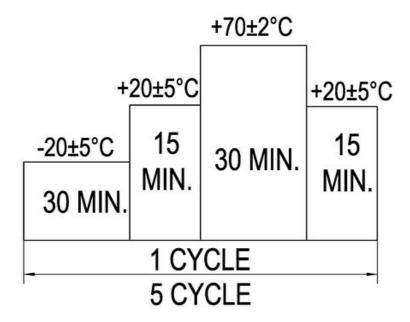
**Note:** Input Voltage 9Vp-p square wave

Distance 10 cm

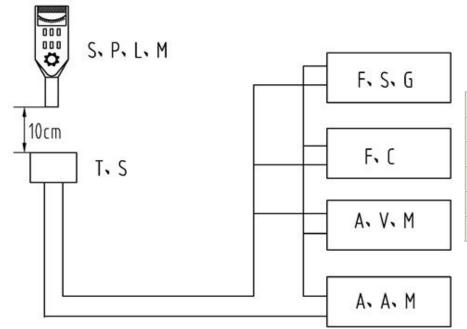
## 5. Reliability Test

No.	Item	Method of Test	Tolerance after Testing	
5-1	Operating Temperature	-20~+70°C	Sound pressure level initial value ±10dB  Max. consumption value ±20%  Capacitance value ±20%	
5-2	Storage in high temperature	Storage in +70°C test box 96 hours then exposed to the room temperature for 2 hours		
5-3	Storage in low temperature	Storage in -20°C test box 96 hours then exposed to the room temperature for 2 hours		
5-4	Life test in the room temperature	Operate the product continuously 5 seconds on 5 seconds off 300 hours at rated voltage		
5-5	Temperature / humidity cycle test	Storage in +40°C, 93±3%RH test box 96 hours then exposed to the room temperature for 2 hours		
5-6	Temperature (high and low) cycle test	Conduct the test for 5 cycles without applying power then expose to the room temperature for 2 hours.(See Figure 5-6)		
5-7	Vibration test	Conduct the test for the directions of X Y and Z for 0.5 hour each (total 1.5 hours). To-and Fri sweep time(from 10 to 55Hz and then 55 to 10) under single amplitude of 0.75mm is 3 minute, then expose to the room temperature for 2 hours		
5-8	Drop test	Drop a product naturally from the height of 700mm onto the surface of 100mm thick wooden board. Two directions: upper and side of the product are to be applied for this drop test once respectively		

Figure 5-6



## 6. Electrical Testing Method



S.P.L.M	Sound Pressure Level Meter
T.S	Testing Sample
F.C	Frequency Counter
F.S.G	Frequency Signal Generator
A.V.M	AC Voltage Meter
A.A.M	AC Ampere Meter

## 7. Packing Information

Packing: 1680 pcs per export carton Carton Size:  $47 \times 30.5 \times 35$  cm

G. Weight: 6.0 kgs N. Weight: 4.5 kgs