

MESSRS.

SPECIFICATION FOR APPROVAL

承 认 书

Product	ELECTRET CONDENSER MICROPHONE
Part No.	AMB-O40S44-CB-LF
Customer Approval	

Approved By	Checked By	Made By



常 州 立 翔 电 子 有 限 公 司

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EDITION:1.1

1. SPECIFICATIONS

AMB-O40S44-CB-LF

01	Electret's Type	Back type
02	Sensitivity	-44±3dB (0dB=1V/Pa,1KHz)Band form 300 to 3K Hz
03	Output Impedance (Max)	2.2KΩ
04	Directivity	Omni directional
05	Frequency Range	70-20,000Hz
06	Max. Operation Voltage	10V
07	Standard Operation Voltage	2.0V
08	Current Consumption	Max.0.5mA
09	Sensitivity Reduction	Within -3dB 0dB=1V/Pa,1KHz Vs=2.0 to 1.5V
10	S/N Ratio	> 58dB
11	Operating Temperature	-25~+70°C
12	Storage Temperature	-40~+70°C

2. MEASURING METHOD

2-1. Test Condition

Standard Conditions:

Generally Temperature 15~35°C

Generally Humidity 45~85%

Generally Atmospheric Pressure 860~1060hpa

Basic Test Conditions:

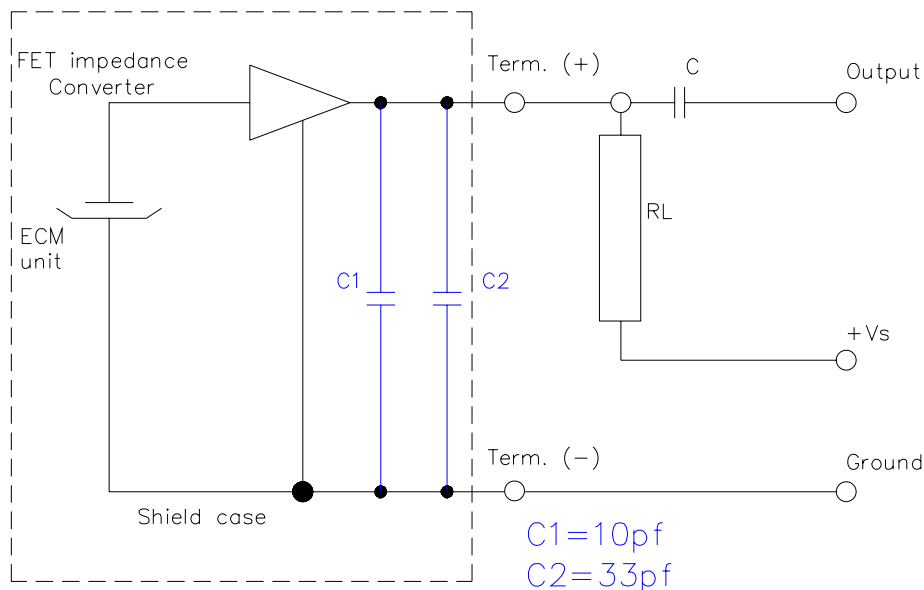
Temperature 20±2°C

Humidity 60~70%

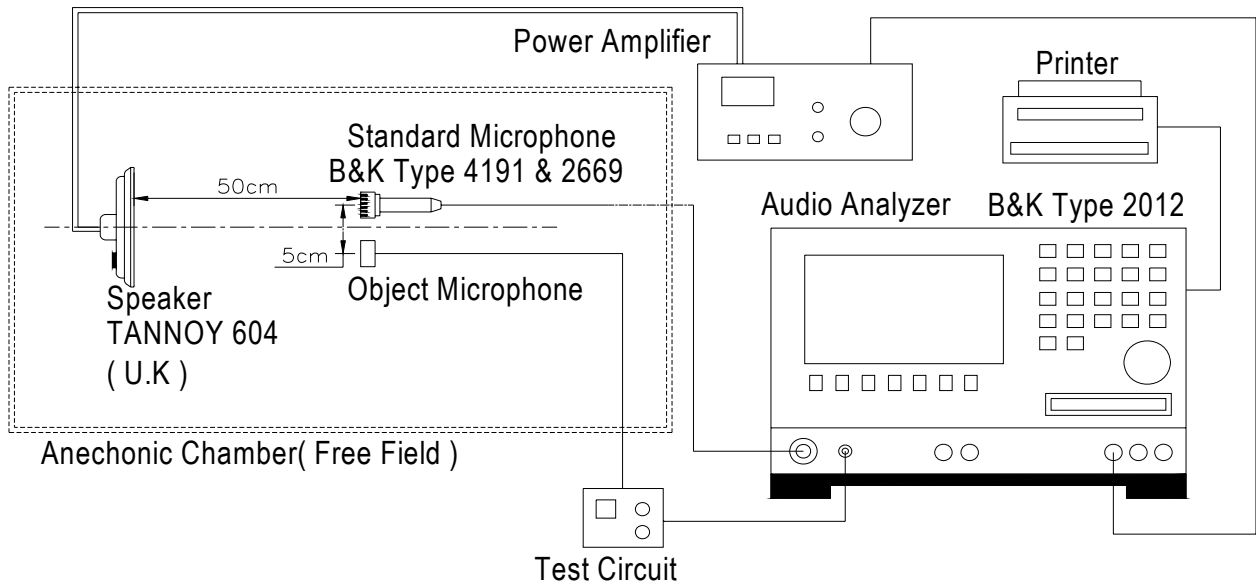
Generally Atmospheric Pressure 860~1060hpa

2-2. Standard Test Circuit

Vs=2.0V RL=2.2KΩ Te=20°C R.H.=60%

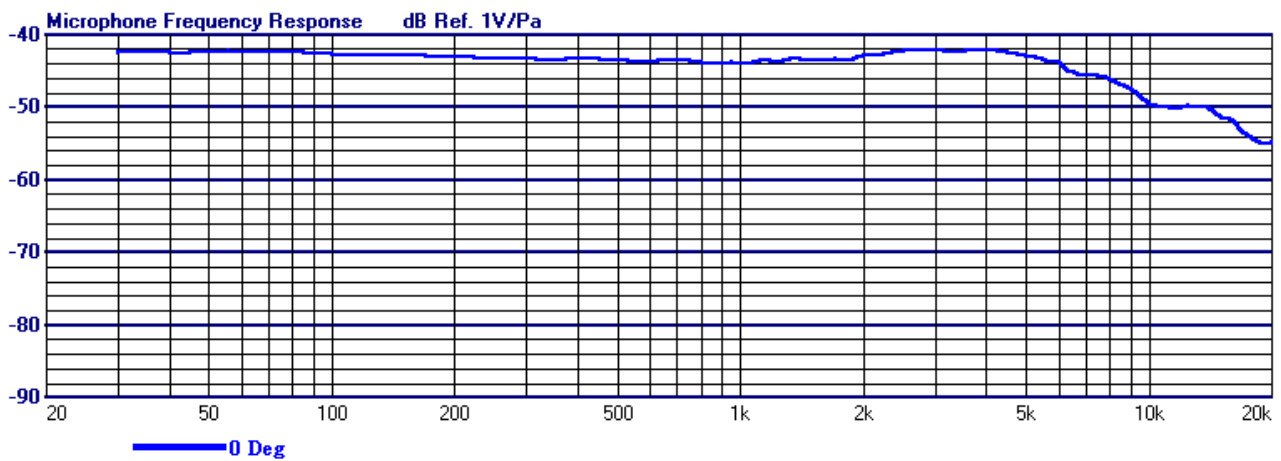


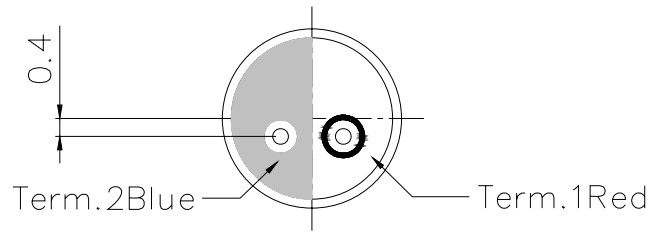
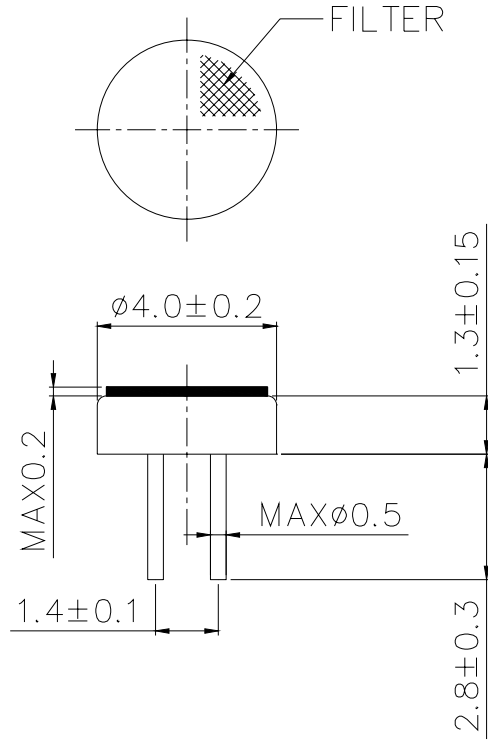
2-3. Standard Test Fixture



2-4. Frequency Response Curve

X : 1000 Hz **Y : -43.9 dBV/Pa**
Y : -41.7 dBm/Pa
D : 0.0 dB





TITLE: <i>MICROPHONE</i>		DRAWN: <i>Lily</i> 2006-06-21	SCALE: ***	SHEET: 1 of 1
PART NO. <i>AMB-040S44-CB-LF</i>		DESIGNED: <i>R & D OF AAT</i>	UNITS: <i>mm</i>	
DWG NO. <i>DTM-1294</i>	1 REV	CHECKED:	TOLERANCE ± 0.2	
		APPROVAL:	UNLESS OTHERWISE SPECIFIED: ONE PLACE DECIMAL \pm ***	
		MATERIAL: <i>*****</i>	TWO PLACE DECIMAL \pm *** THREE PLACE DECIMAL \pm ***	



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4.RELIABILITY TEST

Item		Test Conditions	Evaluation Standard
01	High Temp. Test	After exposure at 70°C for 100 hours, and expose to room temperature for 6 hours, sensitivity to be within ± 3 dB from initial sensitivity.	After any tests , the sensitivity to be within ± 3 dB of initial sensitivity after 3 hours of conditioning at 20°C and shall keep their initial operation and appearance.
02	Low Temp. Test	After exposure at -25°C for 100 hours, and expose to room temperature for 6 hours, sensitivity to be within ± 3 dB from initial sensitivity.	
03	Temp. Cycle Test	After exposure at 70°C for 1 hour, at room temp. for 1 hour, at -25°C for 1 hour, at room temp. for 1 hour, at 10 cycles, and expose to room temp. for 6 hours, sensitivity to be within ± 3 dB from initial sensitivity.	
04	Humidity Test	After exposure at 40°C and 90 \pm 5% relative humidity for 240 hours, and expose to room temperature for 6 hours, sensitivity to be within ± 3 dB from initial sensitivity.	
05	Vibration Test	The microphone unit must be subjected to each 30 minutes vibrations at three axis 3 mm dynamic rang. 1000cycles/minute.	
06	Drop test	The microphone unit without packaged must be subjected to each 3 drops at three axis from the height of 1 meter to 20mm thick hardwood.	
07	Pull Strength Test	The microphone assembly shall suffer no change from a pull strength of 0.5 kg for 3 seconds applied between the connector and the microphone.	Application of the "pin" type

5. SOLDERING CONDITION

Every Mic. has installed FET., The FET. is easy broken by strong heat and static electricity, so when you working on, pls be attention that :

- Recommend using constant branding iron in 15 ~ 30W, and in temperature range 320°C.
- Soldering time not over 3 seconds.
- Don't stay any hole or dust when soldering.
- To avoid the Mic. be broken by static electricity, the people and working station should install prevent static electricity equipment.