

承 认 书

SPECIFICATION FOR APPROVAL

客 户 Customer:

产品名称 Project: MIC咪头4013 贴片绿板高温无绑定电容

规格型号 Part No:

MIC4013-G

贵公司承认印 Approval signatures

料 号/Part No.	签 章/Signatures

日期 Date:

拟制/Drawn	王宗华	
审核/Check	陈森森	
批准/Approved	张春华	

Type: Electret Condenser Microphone

Number: T401301

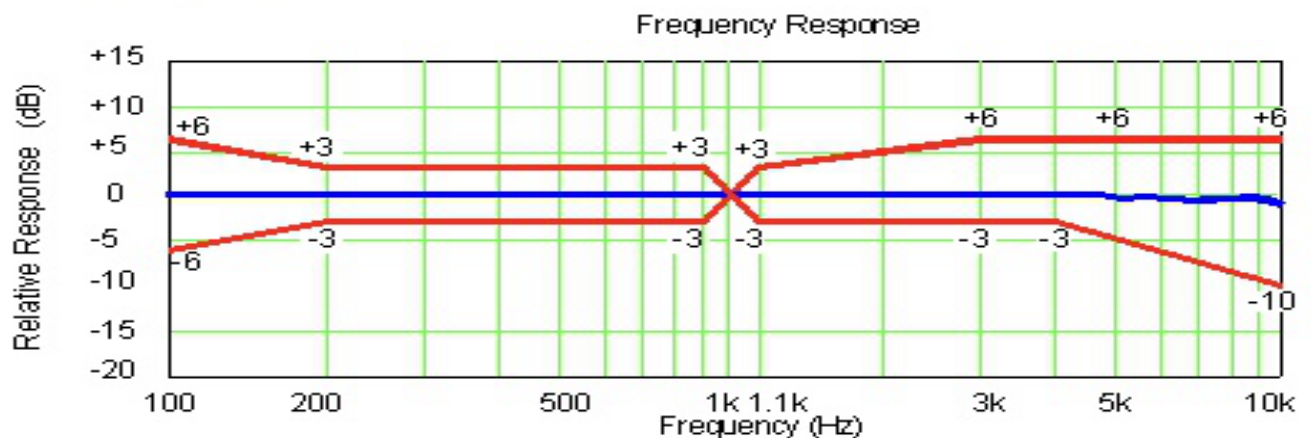
1 Test Condition ($V_s=2.0V$, $R_L=2.2K\Omega$, $L=50CM$)

Standard Conditions (As IEC 60268-4)	Temperature	Humidity	Air pressure
Environment Conditions	+15°C~+35°C	25%RH-75%RH	86kPa-106kPa
Basic Test Conditions	+20°C ± 2°C	60%RH-70%RH	86kPa-106kPa

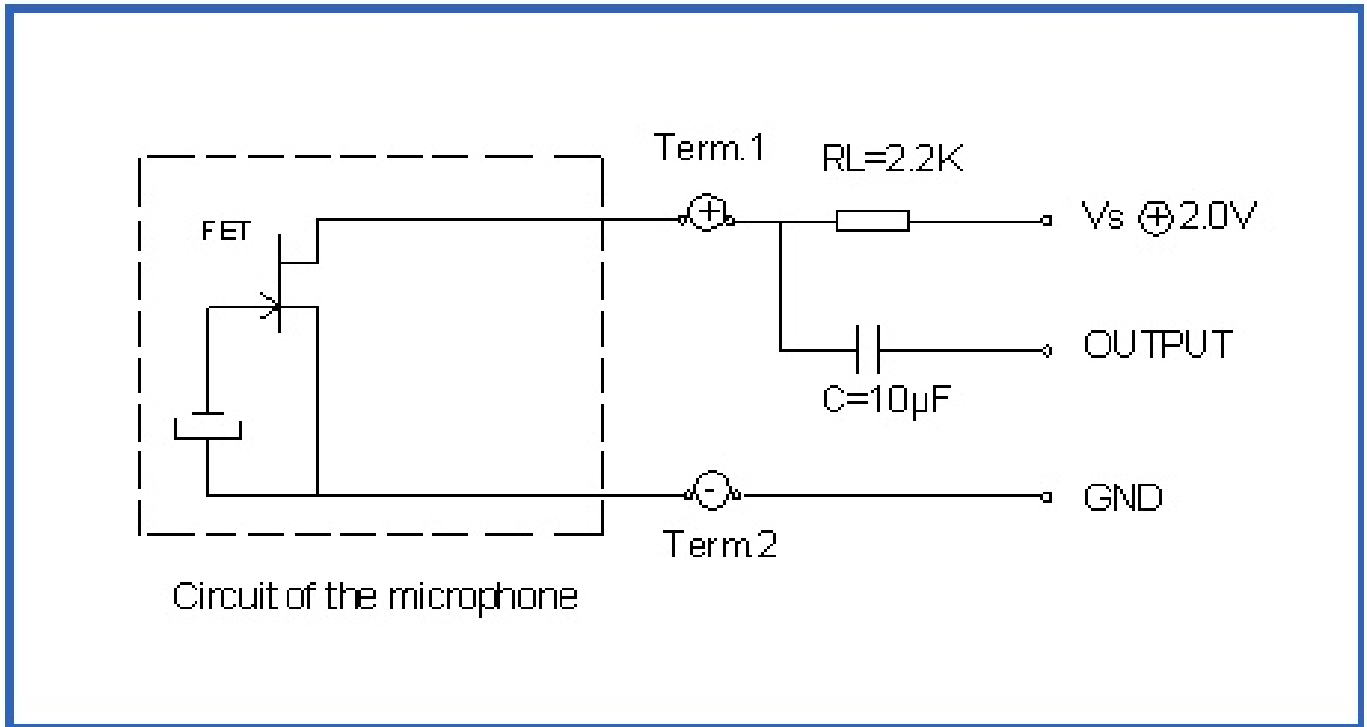
2 Electrical Characteristics

Item	Symbol	Test Conditions	Min	Standard	Max	Unit
Sensitivity	S	f=1kHz, Pin=1Pa	-45	-42	-39	dB 0dB=1V/Pa
Output Impedance	Zout	f=1kHz, Pin=1Pa			2.2k	Ω
Directivity	D(8)	Omnidirectional				dB
Current Consumption	I				500	μA
S/N Ratio	S/N(A)	f=1kHz, Pin=1Pa A-Weighted Curve	58			dB
Decreasing Voltage Characteristic	ΔS	f=1kHz, Pin=1Pa $V_s=2.0-1.5V$			-3	dB
Operating Voltage Range	V_s		1.0		10	V
Distortion	THD	f=1kHz, Pin=104dB			3	%

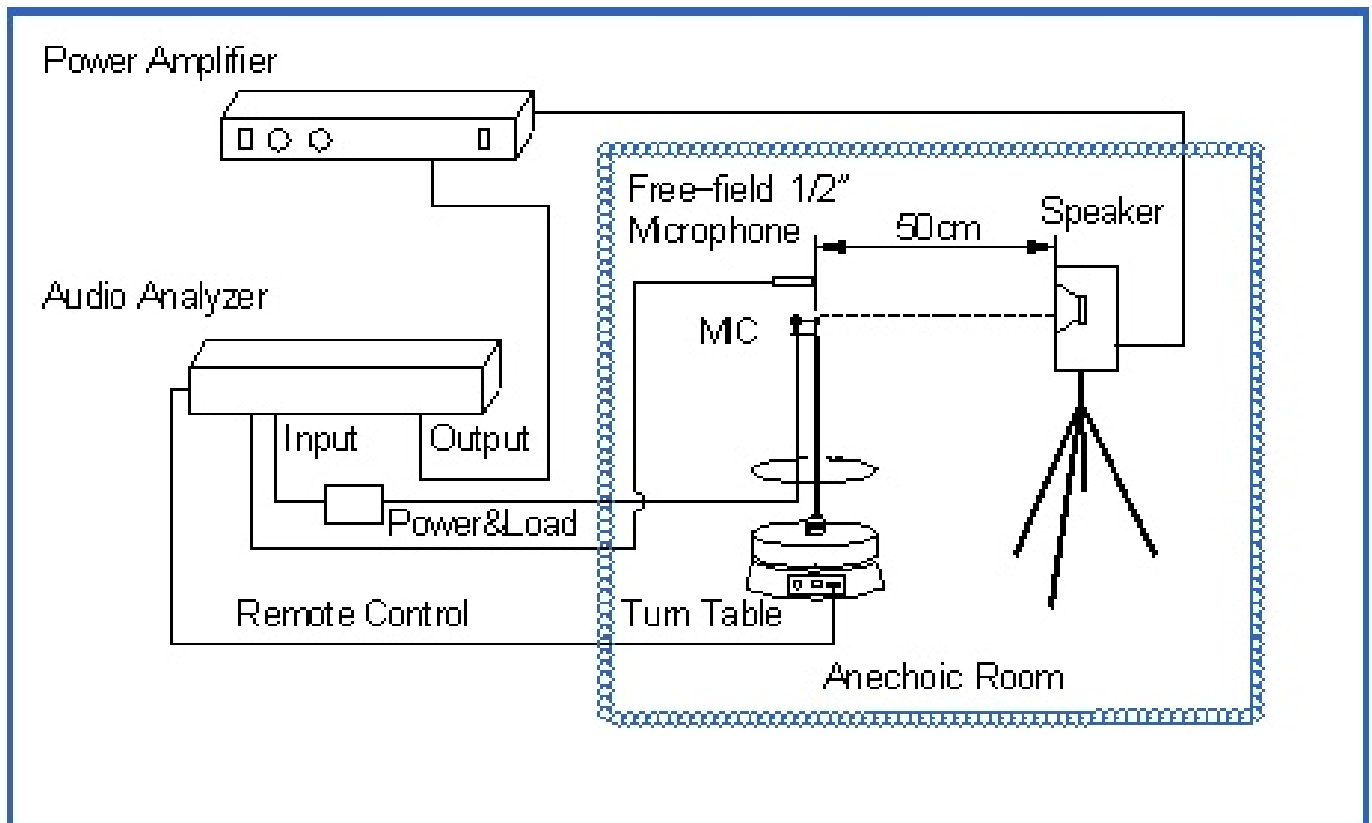
3 Frequency Response Curve and Limits



4 Measurement Circuit

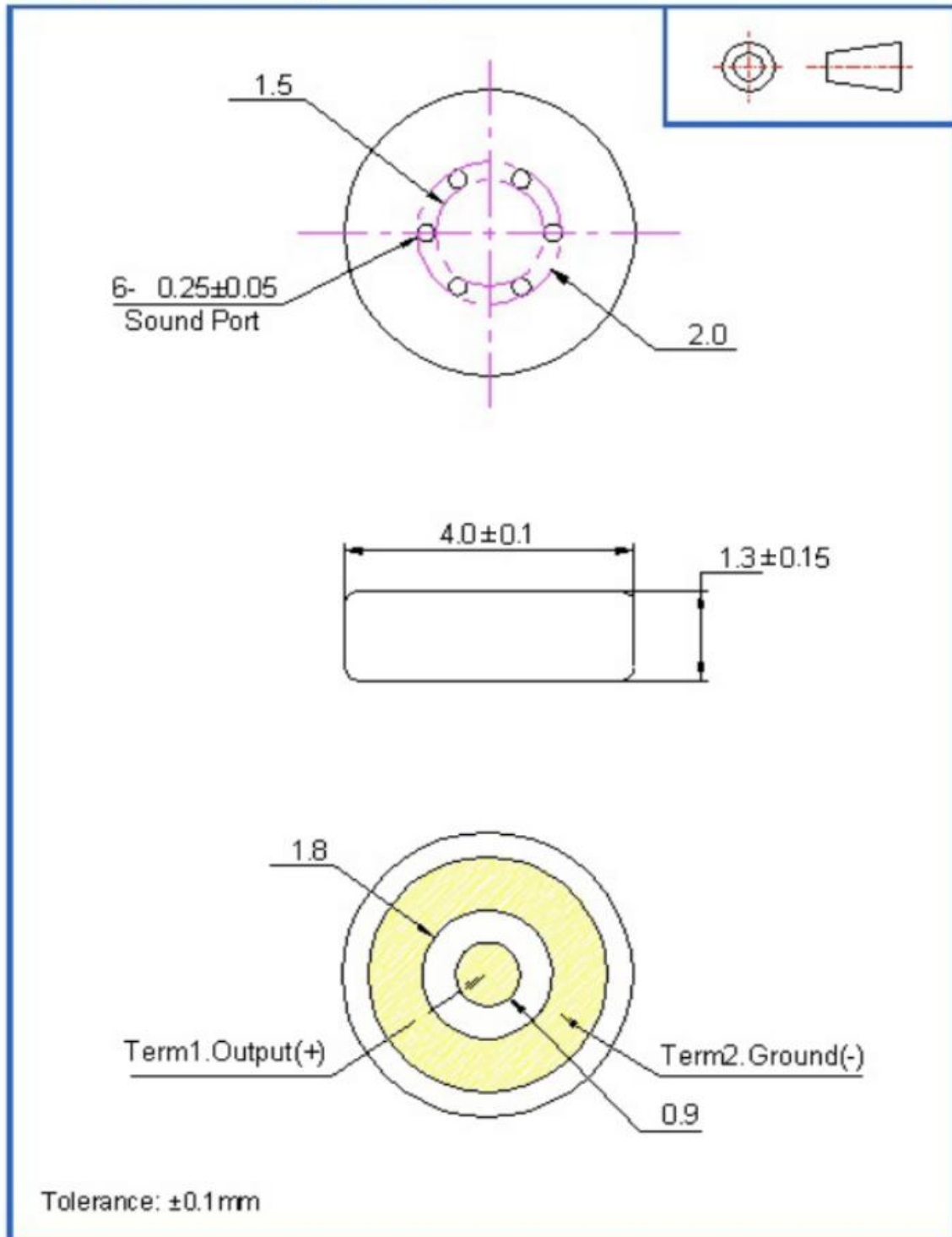


5 Test setup Drawing



6 Mechanical Characteristics

6.1 Appearance Drawing(Unit: mm)



6.2 Weight

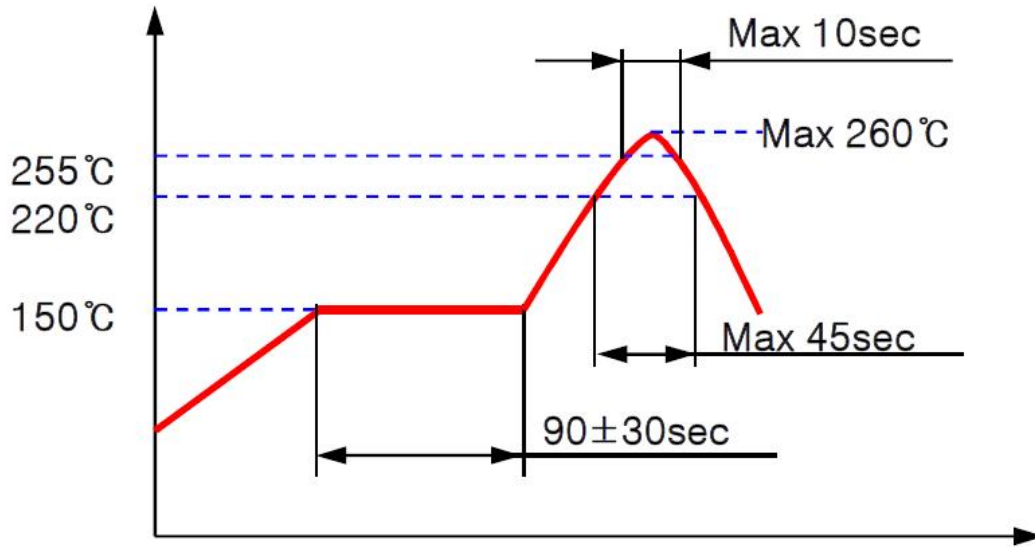
Less than 0.2g

7 Reliability Test

<p>7.1 Vibration Test</p>	<p>To be no interference in operation after vibrations,10Hz to 55 Hz for 1 minute full amplitude 1.52mm,for 2 hours at three axes in state of standard packing,sensitivity to be within $\pm 3\text{dB}$ from initial sensitivity. (The measurement to be done after 2 hours of conditioning at +15 °C~+35 °C, R.H 25%~75%)</p>
<p>7.2 Drop Test</p>	<p>To be no interference in operation after dropped to steel plate each one time from 1.5 meter height ,12 times,sensitivity to be within $\pm 3\text{dB}$ from initial sensitivity. (The measurement to be done after 2 hours of conditioning at +15 °C~+35 °C, R.H 25%~75%)</p>
<p>7.3 Temperature Test</p>	<p>a) After exposure at +85°C for 200 hours,sensitivity to be within $\pm 3\text{dB}$ from initial sensitivity. (The measurement to be done after 2 hours of conditioning at +15 °C~+35 °C, R.H 25%~75%) b) After exposure at -40°C for 200 hours,sensitivity to be within $\pm 3\text{dB}$ from initial sensitivity. (The measurement to be done after 2 hours of conditioning at +15 °C~+35 °C, R.H 25%~75%)</p>
<p>7.4 Humidity Test</p>	<p>After exposure at +60°C and 90~95% relative humidity for 200 hours,sensitivity to be within $\pm 3\text{dB}$ from initial sensitivity. (The measurement to be done after 2 hours of conditioning at +15 °C~+35 °C, R.H 25%~75%)</p>
<p>7.5 Temperature Cycle Test</p>	<p>After exposure at -40°C for 30 minutes, at 20°C for 10 minutes, at +85°C for 30 minutes, at 20°C for 10 minutes,5 cycles,sensitivity to be within $\pm 3\text{dB}$ from initial sensitivity. (The measurement to be done after 2 hours of conditioning at +15 °C~+35 °C, R.H 25%~75%)</p>
<p>7.6 Temperature Shock Test</p>	<p>After exposure at -40 °C for 60 minutes, at +85 °C for 60 minutes(change time 20 seconds), 32 cycles,sensitivity to be within $\pm 3\text{dB}$ from initial sensitivity. (The measurement to be done after 2 hours of conditioning at +15 °C~+35 °C, R.H 25%~75%)</p>
<p>7.7 ESD Shock Test</p>	<p>The microphone under test must be discharged between each ESD exposure without ground. (contact: $\pm 8\text{kV}$,air: $\pm 15\text{kV}$) There is no interference in operation after 10 times exposure.</p>
<p>7.8 Reflow Test</p>	<p>Adopt the reflowcurve of item 11.3,after two reflows,sensitivity to be within $\pm 3\text{dB}$ from initial sensitivity. (The measurement to be done after 2 hours of conditioning at +15 °C~+35 °C, R.H 25%~75%)</p>

Guaranteed Maximum Reflow Condition 极限回流条件

Ambient temperature

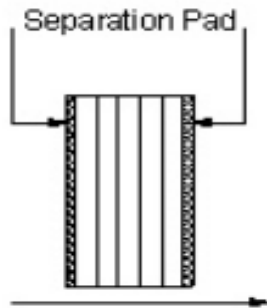


NOTE : After the first reflow, the second reflow is tested on keeping MIC the usual temperature. 第一次回流焊后, 待产品温度恢复常温再进行第二次回流焊.

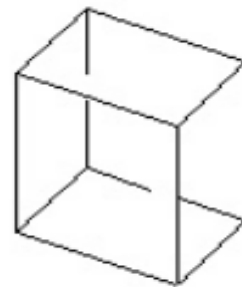
9.Package 包装



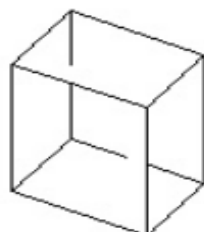
Packing (5000PCS)



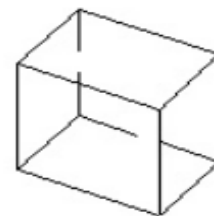
5 pcs reels



Plastic Bag (25000PCS)
(336mm*115mm*450mm)



Plastic Bag (25000PCS)
(336mm*115mm*450mm)



Inner Box (25000PCS)
(340mm*135mm*355mm)