

Shuttle [®]	Acoustic test report	<i>Model name</i>	<i>SH55J2</i>
		<i>Design phase</i>	<i>A Phase</i>
浩鑫股份有限公司		<i>Release Date:</i>	<i>2010/4/22</i>

SH55J2

Acoustic Test Report

Design Phase Version: A

Date: Apr, 22, 2010

Shuttle- Thermal Department

<i>Approved by:</i>	<i>Checked by:</i>	<i>Prepared by:</i>
<i>Alex</i>	<i>Peter-k</i>	<i>Funson Yeh</i>

Shuttle®	Acoustic test report	<i>Model name</i>	SH55J2
		<i>Design phase</i>	A Phase
浩鑫股份有限公司		<i>Release Date:</i>	2010/4/22

1. Samples Configuration:

Configuration:	Brand/Frequency/Capacity/Description
<i>P/N</i>	<i>A phase sample</i>
<i>Main Board Version</i>	<i>A0</i>
<i>BIOS/EC Version</i>	<i>SH55JSTD.A03</i>
<i>CPU</i>	<i>Intel® Core™ i7 870 (TDP 95W)</i>
<i>Memory</i>	<i>2 Pcs of Transcend 2GB(DDR3 1333MHz)</i>
<i>VGA</i>	<i>UMA</i>
<i>HDD</i>	<i>Maxtor SATA 120G , WD SATA 320G</i>
<i>W-LAN</i>	<i>N/a</i>
<i>ADAPTER</i>	<i>PC61(300W)</i>

2. Test Equipment:

2-1 *Semi-Anechoic Chamber: Acoustic testing for system sound quality shall be testing in a qualified Semi-anechoic chamber meeting the requirements of Is0-3744.*

2-2 *Microphone: Follow ISO-3744*

2-3 *Fan power is provided by power supply. Testing sound pressure every Fan control PWM duty between 0%~100% or higher to determine fan RPM.*

3. Test Condition

3-1 *Environment Temperature: 23+-2degC*

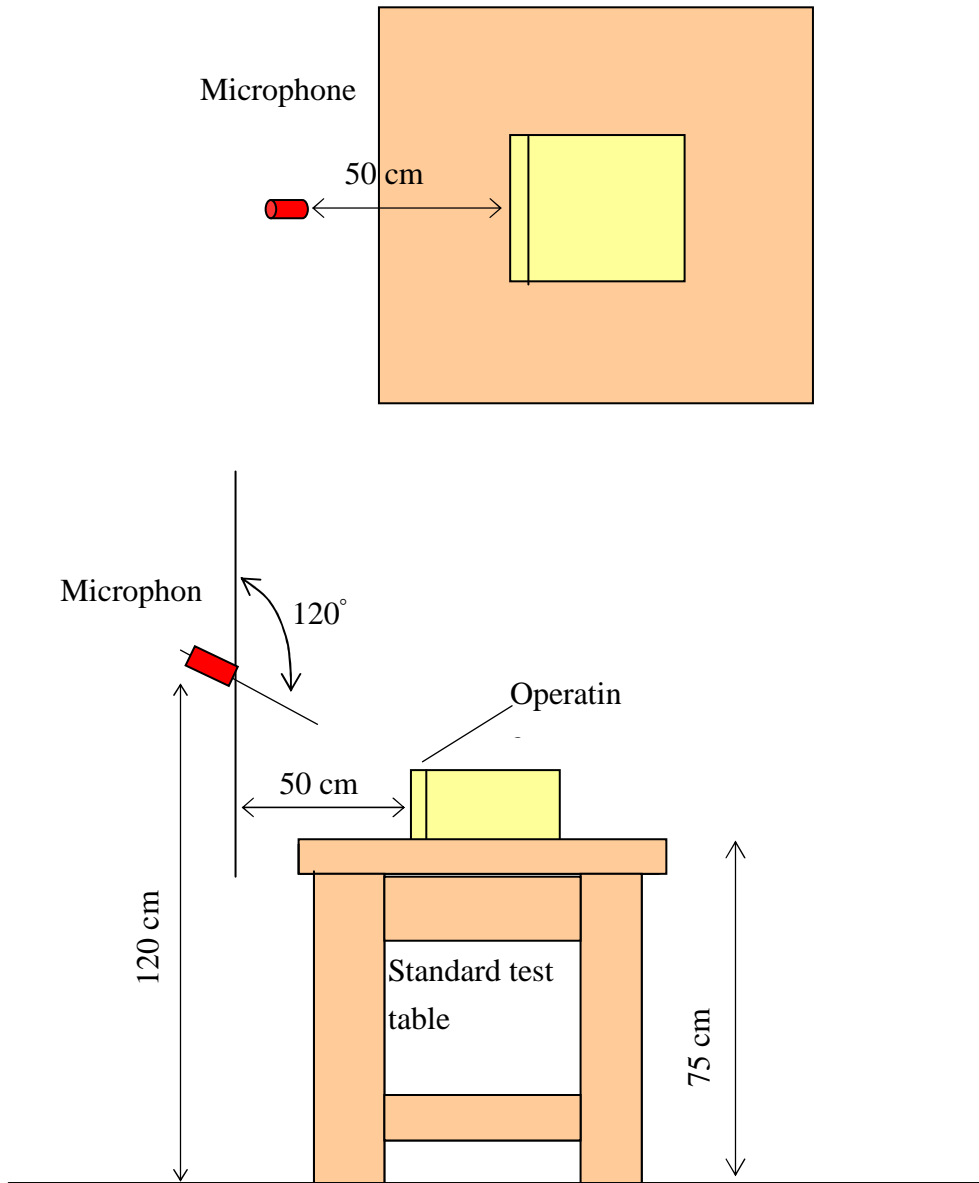
4. Test Standard Reference

4-1 *Sound pressure standard: follow ISO7779-chapter 8.6.3-C*

4-2 *It is 50cm away from test machine for the fornt side.*

4-3 *Show as below picture.*

Shuttle®	Acoustic test report	<i>Model name</i>	SH55J2
		<i>Design phase</i>	A Phase
浩鑫股份有限公司		<i>Release Date:</i>	2010/4/22



4-4 For B phase test, we determine the fan RPM to meet Shuttle acoustic SPEC in front side sound pressure (Idle & 3D Mark 200x $\leq 28\text{ dBA}$).

Shuttle®	Acoustic test report	<i>Model name</i>	SH55J2
		<i>Design phase</i>	A Phase
浩鑫股份有限公司		<i>Release Date:</i>	2010/4/22

5. Acoustic test report

a. Sound pressure (System 50cm)

9225 Fan System Fan

Semi-Anechoic Chamber		AVC				
		Front (dBA)	Right (dBA)	Rear (dBA)	Left (dBA)	Fan RPM
AVC	Background	15.6	16.2	16.7	15.6	N/A
	3DMark06	26.4	27.8	28.9	27.2	1254RPM
	Idle	26.8	28.2	29.3	27.6	1200RPM
	UL	24.7	26.6	26.9	25.9	1120RPM
	Low	27.7	29.8	31.4	30.7	1621RPM
	Mid	35.8	37.3	38.7	35.7	2660RPM
	Full	46.4	47.5	48.8	46.2	3921RPM

6. Conclusion:

1. SH55J2 For sound pressure:

System Idle @26.8<=28 dBA(spec).

3DMark200x @ 26.4<=28 dBA(spec).

2. SH55J2 for sound pressure, all of acoustic result under spec.