

Application for FCC Certificate
On Behalf of
LG Electronics U.S.A., Inc.

LCD Monitor

Model No.: L1755TT

Serial No.: E07103001

FCC ID : BEJL1755TT

Prepared For : LG Electronics U.S.A., Inc.
1000 Sylvan Avenue, Englewood Cliffs,
NJ 07632, United States

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Report No. : ACI-F07050
Date of Test : Nov 07, 2007
Date of Report : Nov 09, 2007

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TEST REPORT FOR FCC CERTIFICATE

Applicant : LG Electronics U.S.A., Inc.
Manufacturer : LG Electronics Nanjing Display Co., Ltd.
EUT Description : LCD Monitor
(A) Model No. : L1755TT
(B) Serial No. : E07103001
(C) Power Supply : 120V/60Hz

Test Procedure Used:

*FCC RULES AND REGULATIONS PART 15 SUBPART B CLASS B 2007.05
AND ANSI C63.4-2003*

The device described above is tested by Audix Technology (Shanghai) Co., Ltd. to determine the maximum emission levels emanating from the device. The maximum emission levels are compared to the FCC Part 15 Subpart B (Class B) and ICES-003, Issue 4 February 2004 (CISPR 22:2002) limits both radiated and conducted emissions.

The test results are contained in this test report and Audix Technology (Shanghai) Co., Ltd. is assumed full responsibility for the accuracy and completeness of these measurements. This report shows that the EUT (M/N: L1755TT; S/N: E07103001) which was tested in 3m anechoic chamber on Nov 07, 2007 is technically compliance with the FCC official limits also.

This report applies to above tested sample only. This report shall not be reproduced in part without written approval of Audix Technology (Shanghai) Co., Ltd.

This report contains data that are not covered by the NVLAP accreditation.

This report must not be used by the client to claim product certification, approval, or endorsement by NVLAP, NIST, or any agency of the federal government.

Date of Test : Nov 07, 2007

Prepared By: Zeno Gu 2007.11.15
ZENO GU / Assistant

Reviewer: Sammy Chen 2007.11.15
SAMMY CHEN / Deputy Assistant Manager

AUDIX[®] For and on behalf of
Audix Technology (Shanghai) Co., Ltd.

Approved Signatory: Sam Chien 2007.11.15
Authorized Signature EMC IAN CHIEN / Assistant Manager

1 SUMMARY OF STANDARDS AND RESULTS

1.1 Description of Standards and Results

The EUT have been tested according to the applicable standards as referenced below:

Description / Test Item	Test Standard	Results	Meets Limit
EMISSION			
Conducted Disturbance At main terminal	FCC RULES AND REGULATIONS PART 15 SUBPART B 2007.05 AND ANSI C63.4-2003	Pass	15.107(a) Class B
Radiated Disturbance	FCC RULES AND REGULATIONS PART 15 SUBPART B 2007.05 AND ANSI C63.4-2003	Pass	15.109(a) Class B

2 GENERAL INFORMATION

2.1 Description of Equipment Under Test

Description	:	LCD Monitor
Type of EUT	:	☒ Production ☐ Pre-product ☐ Pro-type
Model No.	:	L1755TT
Serial No.	:	E07103001
Real Power	:	31.0W
Applicant	:	LG Electronics U.S.A., Inc. 1000 Sylvan Avenue, Englewood Cliffs, NJ 07632, United States
Manufacturer	:	LG Electronics Nanjing Display Co., Ltd. No.346, Yao Xin Road, Economic&Technical Development Zone, Nanjing, China
LCD Panel	:	Manufacturer: LG. PHILIPS LCD M/N : LM170E03 (TL) (L1)
D-Sub Cable	:	Shielded, Detachable, 1.85m, with two cores
DVI Cable	:	Shielded, Detachable, 1.90m, with two cores

Remark:

The EUT is a LCD Monitor which input/output ports as follows:

- | | |
|--------------------------|-----------------------|
| (1) One D-Sub Input Port | :Connected with PC |
| (2) One DVI Input Port | :Connected with PC |
| (3) AC In Port | :Connected with Power |

2.2 Supported Simulators

2.2.1 PC

Manufacturer : HP
Model Number : dx6120MT
Serial Number : CNG53004J2
Power Cable : Unshielded, Detachable, 1.8m
Certificate : FCC DoC; CE/EMC; VCCI; C-Tick; UL
BSMI (R33001) 3C (A000111)
MIC (E-A011-04-2659(B))

2.2.2 Keyboard

Manufacturer : Microsoft
Model Number : RT2300
Serial Number : 7668200662248
Data Cable : Shielded, Detachable, 1.8m
Certificate : CE/EMC, FCC DoC, VCCI, MIC, C-Tick,
BSMI

2.2.3 Mouse

Manufacturer : Microsoft
Model Number : RT2300
Serial Number : 6965712071551
Data Cable : Shielded, Detachable, 1.85m.
Certificate : FCC DoC, VCCI, CE/EMC, MIC, GS

2.2.4 Printer

Manufacturer : HP
Model Number : C3990A
Serial Number : JPZX020487
Data Cable : Shielded, Detachable, 1.5m
Certificate : GS, CE/EMC, C-Tick, FCC DoC

2.2.5 Modem

Manufacturer : Aceex
Model Number : 1414
Serial Number : 980013576
Data Cable : Shielded, Detachable, 1.8m
Certificate : FCC ID: IFAXDM1414

2.3 Description of Test Facility

Site Description (Semi-Anechoic Chamber) : Sept. 17, 1998 file on
July 26, 2006 Renewed
Federal Communications Commission
FCC Engineering Laboratory
7435 Oakland Mills Road
Columbia, MD 21046, USA

Name of Firm : Audix Technology (Shanghai) Co., Ltd.

Site Location : 3F 34Bldg 680 Guiping Rd,
Caohejing Hi-Tech Park,
Shanghai, China 200233

NVLAP Lab Code : 200371-0

2.4 Measurement Uncertainty

Conducted Emission Expanded Uncertainty: U = 1.84 dB
Radiated Emission Expanded Uncertainty : U = 2.96 dB

3 CONDUCTED EMISSION TEST

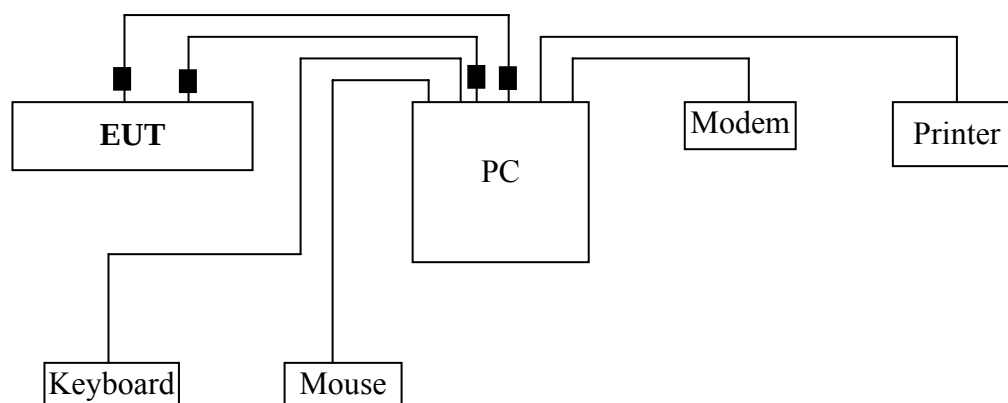
3.1 Test Equipment

The following test equipment are used during the conducted emission test in a shielded room:

Item	Type	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
1.	Test Receiver	R&S	ESHS10	830223/007	Apr 08, 2007	Apr 08, 2008
2.	Line Impedance Stabilization Network (LISN)	Kyoritsu	KNW-407	8-1280-5	Apr 06, 2007	Apr 06, 2008
3.	AMN	R&S	ESH2-Z5	843890/011	Apr 06, 2007	Apr 06, 2008
4.	50 Ω Coaxial Switch	Anritsu	MP59B	6200426389	Sep 18, 2007	Mar 18, 2008
5.	Software	Audix	E3	SET00200 9804M592	--	--

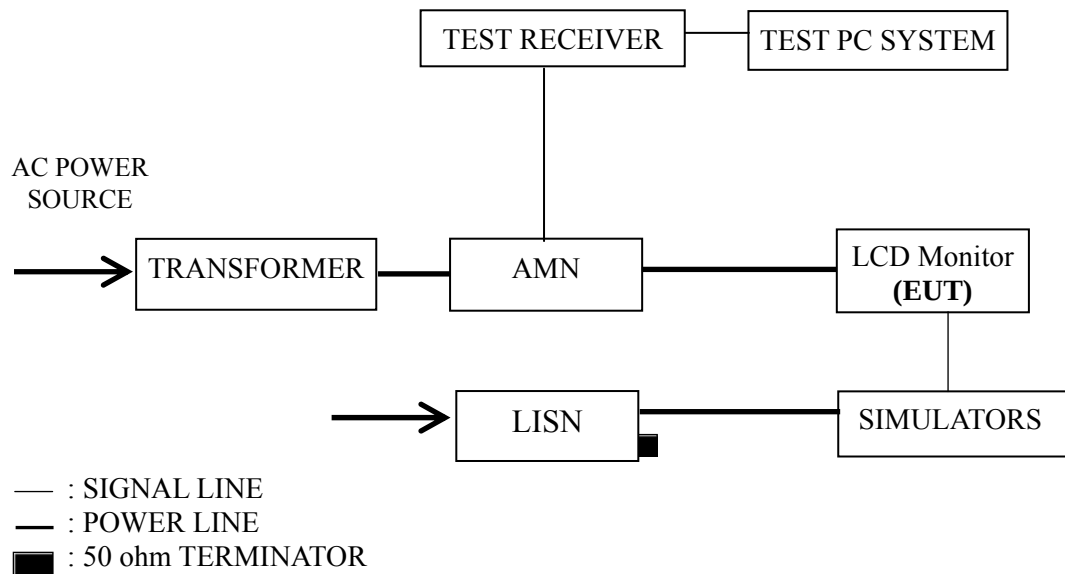
3.2 Block Diagram of Test Setup

3.2.1 EUT & Supported Simulators



■ : Ferrite core

3.2.2 Conducted Disturbance Test Setup



3.3 Conducted Emission Limit [FCC Part 15 Subpart B 15.107(a)]

Frequency Range (MHz)	Limits dB (μV)	
	Quasi-peak	Average
0.15 ~ 0.5	66~56	56~46
0.5 ~ 5	56	46
5 ~ 30	60	50

NOTE 1 – The lower limit shall apply at the transition frequencies.
 NOTE 2 – The limit decreases linearly with the logarithm of the frequency in the range 0.15 MHz~0.50 MHz
 NOTE 3 – If the average limit is met when using a quasi-peak detector, the EUT shall be deemed to meet both limits and measurement with the average detector is unnecessary.

3.4 Test Configuration

The EUT (listed in Sec.2.1) and the simulators (listed in Sec 2.2) were installed as shown on Sec.3.2 to meet FCC requirement and operating in a manner that tends to maximize its emission level in a normal application.

3.5 Operating Condition of EUT

- 3.5.1 Setup the EUT and simulators as shown in Sec. 3.2.
- 3.5.2 Turn on the power of all equipment and the EUT.
- 3.5.3 Set the contrast control to maximum.
- 3.5.4 Set the brightness control to maximum or at raster extinction if raster extinction occurs at less than maximum brightness.
- 3.5.5 For color monitors, use white letters on a black background to represent all color.
- 3.5.6 Select the worse case of positive or negative video if both alternatives are available.
- 3.5.7 Set character size and number of characters per line so that typically the greatest number of characters per screen is displayed.
- 3.5.8 For monitors with graphics capabilities, a pattern consisting of all scrolling Hs should be displayed. For monitors with text only capability, a pattern consisting of random text shall be displayed. If neither of the above is applied, use a typical display.
- 3.5.9 Set the EUT on the test modes in turn, and then test it.
- 3.5.10 The test modes are as follows:

Model Number	Test Mode
L1755TT	VGA 640*480@60Hz
	VGA 1024*768@60Hz
	VGA 1280*1024@60Hz
	DVI 640*480@60Hz
	DVI 1024*768@60Hz
	DVI 1280*1024@60Hz

3.6 Test Procedures

The EUT was connected to the power mains through a Line Impedance Stabilization Network (LISN). This provided a 50 ohm coupling impedance for the measuring equipment.

Both sides of AC line (VA & VB) were checked for maximum conducted interference. In order to find the maximum emission, the relative positions of equipment and all of the interface cables were changed or manipulated according to ANSI C63.4:2003 during conducted emission test.

The bandwidth of R&S Test Receiver ESHS10 was set at 10 kHz.

The frequency range from 150 kHz to 30 MHz was checked.

The test modes were done on conducted disturbance test and all the test results are listed in Sec. 3.7.

3.7 Test Results

< PASS >

The frequency and amplitude of the highest conducted emission relative to the limit is reported. All emissions not reported below are too low against the prescribed limits.

Model Number	Test Mode	Data Page
L1755TT	VGA 640*480@60Hz	P12
	VGA 1024*768@60Hz	P13
	VGA 1280*1024@60Hz	P14
	DVI 640*480@60Hz	P15
	DVI 1024*768@60Hz	P16
	DVI 1280*1024@60Hz	P17

NOTE 1 – Factor = Cable Loss + LISN Factor.

NOTE 2 – Emission Level = Meter Reading + Factor.

NOTE 3 –All reading are Quasi-Peak values and Average values.

NOTE 4 – The worst case is for DVI 1024*768@60Hz mode. The worst emission is detected at 0.98391 MHz with corrected signal level of 26.97 (μV) (limit is 46.00 dB (μV)), when the VA (Average Value) of the EUT is connected to LISN.

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : VGA 640*480@60Hz

Test Line	Frequency (MHz)	Meter Reading dB(μV)	Factor (dB)	Emission Level dB(μV)	Limits dB(μV)	Margin (dB)	Remark
VA	0.157	35.30	0.67	35.97	65.62	29.65	QP
	0.241	35.70	0.72	36.42	62.06	25.64	
	0.371	33.40	0.68	34.08	58.48	24.40	
	0.491	32.20	0.66	32.86	56.15	23.29	
	0.983	33.40	0.57	33.97	56.00	22.03	
	1.110	31.30	0.55	31.85	56.00	24.15	
	0.157	20.90	0.67	21.57	55.62	34.05	AV
	0.241	29.70	0.72	30.42	52.06	21.64	
	0.371	20.40	0.68	21.08	48.48	27.40	
	0.491	20.30	0.66	20.96	46.15	25.19	
	0.983	21.80	0.57	22.37	46.00	23.63	
	1.110	17.30	0.55	17.85	46.00	28.15	
VB	0.158	35.60	0.55	36.15	65.57	29.42	QP
	0.200	36.90	0.67	37.57	63.61	26.04	
	0.369	34.50	0.65	35.15	58.52	23.37	
	0.486	29.50	0.65	30.15	56.24	26.09	
	0.983	32.90	0.56	33.46	56.00	22.54	
	1.110	30.20	0.55	30.75	56.00	25.25	
	0.158	20.00	0.55	20.55	55.57	35.02	AV
	0.200	25.80	0.67	26.47	53.61	27.14	
	0.369	22.00	0.65	22.65	48.52	25.87	
	0.486	17.10	0.65	17.75	46.24	28.49	
	0.983	21.00	0.56	21.56	46.00	24.44	
	1.110	15.50	0.55	16.05	46.00	29.95	

TEST ENGINEER: RAVEN JIN

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : VGA 1024*768@60Hz

Test Line	Frequency (MHz)	Meter Reading dB(μV)	Factor (dB)	Emission Level dB(μV)	Limits dB(μV)	Margin (dB)	Remark
VA	0.159	35.81	0.67	36.48	65.52	29.04	QP
	0.242	36.3	0.72	37.02	62.03	25.01	
	0.369	34.9	0.68	35.58	58.52	22.94	
	0.491	32.2	0.66	32.86	56.15	23.29	
	0.984	33.2	0.57	33.77	56.00	22.23	
	1.110	31.00	0.55	31.55	56.00	24.45	
	0.159	20.91	0.67	21.58	55.52	33.94	AV
	0.242	30.30	0.72	31.02	52.03	21.01	
	0.369	22.50	0.68	23.18	48.52	25.34	
	0.491	20.20	0.66	20.86	46.15	25.29	
	0.984	21.20	0.57	21.77	46.00	24.23	
	1.110	18.10	0.55	18.65	46.00	27.35	
VB	0.150	35.60	0.53	36.13	66.00	29.87	QP
	0.197	37.30	0.66	37.96	63.74	25.78	
	0.369	34.60	0.65	35.25	58.52	23.27	
	0.491	31.90	0.65	32.55	56.15	23.60	
	0.983	33.00	0.56	33.56	56.00	22.44	
	1.110	31.00	0.55	31.55	56.00	24.45	
	0.150	24.40	0.53	24.93	56.00	31.07	AV
	0.197	25.80	0.66	26.46	53.74	27.28	
	0.369	22.50	0.65	23.15	48.52	25.37	
	0.491	20.00	0.65	20.65	46.15	25.50	
	0.983	21.40	0.56	21.96	46.00	24.04	
	1.110	16.90	0.55	17.45	46.00	28.55	

TEST ENGINEER: RAVEN JIN

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : VGA 1280*1024@60Hz

Test Line	Frequency (MHz)	Meter Reading dB(μV)	Factor (dB)	Emission Level dB(μV)	Limits dB(μV)	Margin (dB)	Remark
VA	0.162	37.50	0.68	38.18	65.36	27.18	QP
	0.242	36.20	0.72	36.92	62.03	25.11	
	0.369	35.00	0.68	35.68	58.52	22.84	
	0.491	32.30	0.66	32.96	56.15	23.19	
	0.983	33.40	0.57	33.97	56.00	22.03	
	1.110	31.60	0.55	32.15	56.00	23.85	
	0.162	21.40	0.68	22.08	55.36	33.28	AV
	0.242	30.30	0.72	31.02	52.03	21.01	
	0.369	22.90	0.68	23.58	48.52	24.94	
	0.491	20.50	0.66	21.16	46.15	24.99	
	0.983	22.00	0.57	22.57	46.00	23.43	
	1.110	18.70	0.55	19.25	46.00	26.75	
VB	0.150	35.50	0.53	36.03	66.00	29.97	QP
	0.369	34.60	0.65	35.25	58.52	23.27	
	0.491	31.90	0.65	32.55	56.15	23.60	
	0.857	30.20	0.57	30.77	56.00	25.23	
	0.983	33.20	0.56	33.76	56.00	22.24	
	1.110	30.30	0.55	30.85	56.00	25.15	
	0.150	24.40	0.53	24.93	56.00	31.07	AV
	0.369	22.40	0.65	23.05	48.52	25.47	
	0.491	20.00	0.65	20.65	46.15	25.50	
	0.857	18.20	0.57	18.77	46.00	27.23	
	0.983	21.60	0.56	22.16	46.00	23.84	
	1.110	16.30	0.55	16.85	46.00	29.15	

TEST ENGINEER: RAVEN JIN

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : DVI 640*480@60Hz

Test Line	Frequency (MHz)	Meter Reading dB(μV)	Factor (dB)	Emission Level dB(μV)	Limits dB(μV)	Margin (dB)	Remark
VA	0.160	37.70	0.68	38.38	65.46	27.08	QP
	0.191	36.30	0.72	37.02	63.99	26.97	
	0.242	36.50	0.72	37.22	62.03	24.81	
	0.371	33.80	0.68	34.48	58.48	24.00	
	0.983	33.20	0.57	33.77	56.00	22.23	
	26.89	26.40	0.94	27.34	60.00	32.66	
	0.160	28.50	0.68	29.18	55.46	26.28	AV
	0.191	24.96	0.72	25.68	53.99	28.31	
	0.242	30.30	0.72	31.02	52.03	21.01	
	0.371	20.00	0.68	20.68	48.48	27.80	
	0.983	21.20	0.57	21.77	46.00	24.23	
	26.89	19.40	0.94	20.34	50.00	29.66	
VB	0.171	38.60	0.59	39.19	64.91	25.72	QP
	0.369	34.60	0.65	35.25	58.52	23.27	
	0.983	33.10	0.56	33.66	56.00	22.34	
	1.100	32.40	0.55	32.95	56.00	23.05	
	1.700	30.00	0.52	30.52	56.00	25.48	
	26.000	29.99	1.02	31.01	60.00	28.99	
	0.171	28.90	0.59	29.49	54.91	25.42	AV
	0.369	23.00	0.65	23.65	48.52	24.87	
	0.983	23.00	0.56	23.56	46.00	22.44	
	1.100	23.00	0.55	23.55	46.00	22.45	
	1.700	20.00	0.52	20.52	46.00	25.48	
	26.000	21.99	1.02	23.01	50.00	26.99	

TEST ENGINEER: RAVEN JIN

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : DVI 1024*768@60Hz

Test Line	Frequency (MHz)	Meter Reading dB(μV)	Factor (dB)	Emission Level dB(μV)	Limits dB(μV)	Margin (dB)	Remark
VA	0.162	37.50	0.68	38.18	65.36	27.18	QP
	0.242	36.60	0.72	37.32	62.03	24.71	
	0.375	35.40	0.68	36.08	58.39	22.31	
	0.98391	33.40	0.57	33.97	56.00	22.03	
	26.700	29.81	0.93	30.74	60.00	29.26	
	0.162	37.50	0.68	38.18	65.36	27.18	
	0.162	21.70	0.68	22.38	55.36	32.98	AV
	0.242	30.50	0.72	31.22	52.03	20.81	
	0.375	21.30	0.68	21.98	48.39	26.41	
	0.491	20.10	0.66	20.76	46.15	25.39	
	0.98391	26.40	0.57	26.97	46.00	19.03	
	26.700	22.81	0.93	23.74	50.00	26.26	
VB	0.153	35.70	0.54	36.24	65.84	29.60	QP
	0.369	34.40	0.65	35.05	58.52	23.47	
	0.858	30.50	0.57	31.07	56.00	24.93	
	0.973	33.50	0.56	34.06	56.00	21.94	
	1.100	30.30	0.55	30.85	56.00	25.15	
	3.930	24.80	0.54	25.34	56.00	30.66	
	0.153	23.00	0.54	23.54	55.84	32.30	AV
	0.369	21.80	0.65	22.45	48.52	26.07	
	0.858	18.60	0.57	19.17	46.00	26.83	
	0.973	11.50	0.56	12.06	46.00	33.94	
	1.100	17.00	0.55	17.55	46.00	28.45	
	3.930	15.10	0.54	15.64	46.00	30.36	

TEST ENGINEER: RAVEN JIN

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : DVI 1280*1024@60Hz

Test Line	Frequency (MHz)	Meter Reading dB(μV)	Factor (dB)	Emission Level dB(μV)	Limits dB(μV)	Margin (dB)	Remark
VA	0.171	39.50	0.69	40.19	64.91	24.72	QP
	0.243	37.00	0.72	37.72	61.99	24.27	
	0.370	33.90	0.68	34.58	58.50	23.92	
	0.983	33.40	0.57	33.97	56.00	22.03	
	1.10	32.60	0.56	33.16	56.00	22.84	
	4.430	23.90	0.64	24.54	56.00	31.46	
	0.171	27.90	0.69	28.59	54.91	26.32	AV
	0.243	30.60	0.72	31.32	51.99	20.67	
	0.370	26.00	0.68	26.68	48.50	21.82	
	0.983	22.00	0.57	22.57	46.00	23.43	
	1.100	23.10	0.56	23.66	46.00	22.34	
	4.430	20.10	0.64	20.74	46.00	25.26	
VB	0.158	35.70	0.55	36.25	65.57	29.32	QP
	0.366	34.00	0.65	34.65	58.59	23.94	
	0.491	31.90	0.65	32.55	56.15	23.60	
	0.857	30.00	0.57	30.57	56.00	25.43	
	0.985	32.50	0.56	33.06	56.00	22.94	
	1.110	30.50	0.55	31.05	56.00	24.95	
	0.158	20.40	0.55	20.95	55.57	34.62	AV
	0.366	21.90	0.65	22.55	48.59	26.04	
	0.491	19.60	0.65	20.25	46.15	25.90	
	0.857	18.10	0.57	18.67	46.00	27.33	
	0.985	16.80	0.56	17.36	46.00	28.64	
	1.110	16.00	0.55	16.55	46.00	29.45	

TEST ENGINEER: RAVEN JIN

4 RADIATED EMISSION TEST

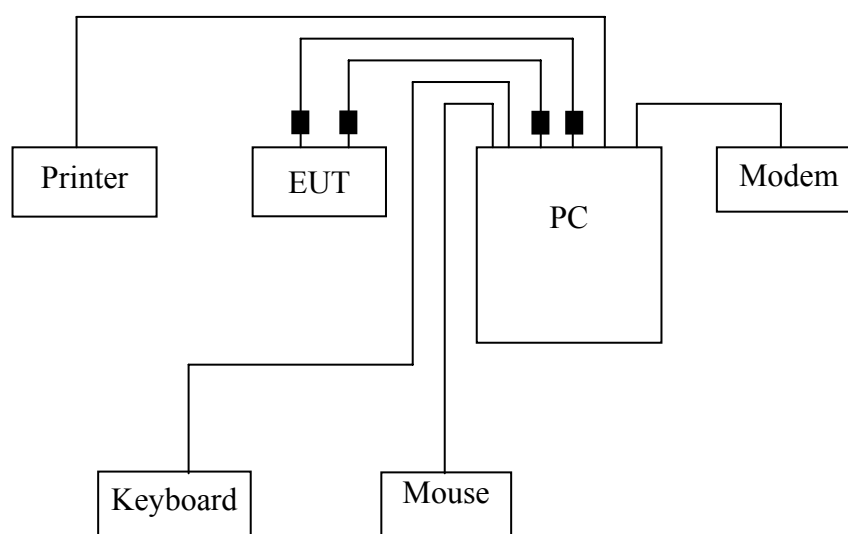
4.1 Test Equipment

The following test equipment are used during the radiated emission test in a semi-anechoic chamber:

Item	Type	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
1.	Test Receiver	R&S	ESVS10	844594/001	Apr 06, 2007	Apr 06, 2008
2.	Preamplifier	Agilent	8447D	2944A10548	Sep 19, 2007	Mar 19, 2008
3.	Preamplifier	HP	8449B	3008A00864	Apr 06, 2007	Apr 06, 2008
4.	Bi-log Antenna	Chase	CBL6111	1145	Sep 18, 2007	Mar 18, 2008
5.	Horn Antenna	EMCO	3115	9607-4878	Apr 06, 2007	Apr 06, 2008
6.	Spectrum	Agilent	E7405A	MY45106600	Apr 06, 2007	Apr 06, 2008
7.	Software	Audix	E3	SET00200 9912M295-2	--	--

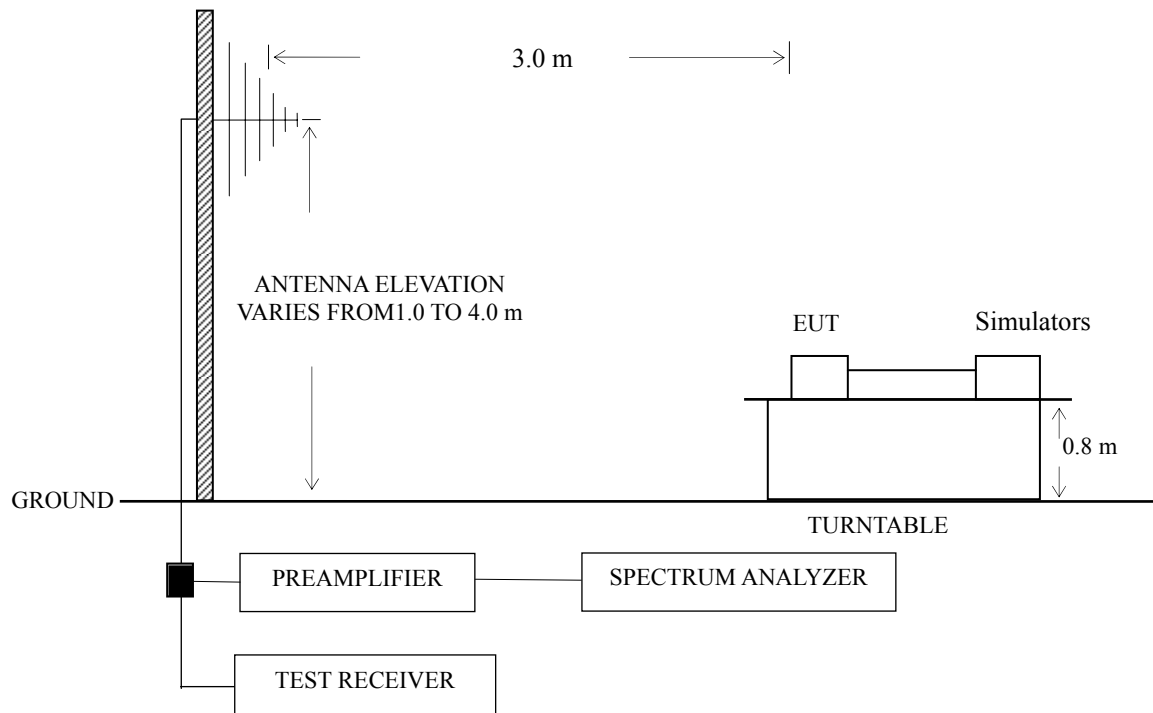
4.2 Block Diagram of Test Setup

4.2.1 EUT and simulators



■ : Ferrite Core

4.2.2 Radiated emission test setup



■ : 50 ohm Coaxial Switch

4.3 Radiated Emission Limit [FCC Part 15 Subpart B 15.109(a)]

Frequency (MHz)	Distance (m)	Field strength limits	
		($\mu\text{V/m}$)	dB ($\mu\text{V/m}$)
30 ~ 88	3	100	40.0
88 ~ 216	3	150	43.5
216 ~ 960	3	200	46.0
Above 960	3	500	54.0

NOTE 1 - Emission Level dB ($\mu\text{V/m}$) = 20 log Emission Level ($\mu\text{V/m}$)

NOTE 2 - The tighter limit applies at the band edges.

NOTE 3 - Distance refers to the distance in meters between the measuring instrument antenna and the closed point of any part of the device or system.

NOTE 4 - The limits shown are based on Quasi-peak value detector below or equal to 1GHz and Average value detector above 1GHz.

NOTE 5 - Above 1 GHz, the limit on peak emission is 20 dB above the maximum permitted average emission limit applicable to the EUT

4.4 Test Configuration

The configuration of the EUT and simulators are same as those used in conducted emission test.

Please refer to Sec.3.4.

4.5 Operating Condition of EUT

Same as conducted emission test which is listed in Sec.3.5, except the test setup replaced by Sec.4.2.

4.6 Test Procedures

The EUT and simulators were placed on a turntable that is 0.8 meter above ground. The turntable rotated 360 degrees to determine the position of the maximum emission level. The EUT was set 3 meters away from the receiving antenna, which was mounted on an antenna tower. The broadband antenna (Calibrated antenna) was used as receiving antenna below 1000MHz. The horn antenna was used as receiving antenna above 1000MHz. The antenna moved up and down between 1 meter and 4 meters to find out the maximum emission level. The broadband antenna (Calibrated Bilog Antenna) or the horn antenna was used as receiving antenna. Both horizontal and vertical polarizations of the antenna were set on measurement. In order to find the maximum emission, all of the interference cables were manipulated according to ANSI C63.4:2003 requirements during radiated emission test.

The bandwidth of Test Receiver R&S ESVS10 was set at 120 kHz below 1GHz and The Spectrum Agilent E7405A was set at 1MHz above 1GHz.

The frequency range from 30 MHz to 2000 MHz was checked.

The frequency range from 1 GHz to 2 GHz was checked for VGA 1280*1024@60Hz and DVI 1280*1024@60Hz mode.

The test modes were done on radiated disturbance test and all the test results are listed in Sec.4.7.

4.7 Test Results

<PASS>

The frequency and amplitude of the highest radiated emission relative the limit is reported. All the emissions not reported below are too low against the FCC limit.

Model Number	Test Mode	Data Page
L1755TT	VGA 640*480@60Hz	P22
	VGA 1024*768@60Hz	P23
	VGA 1280*1024@60Hz	P24 – P25
	DVI 640*480@60Hz	P26
	DVI 1024*768@60Hz	P27
	DVI 1280*1024@60Hz	P28 – P29

NOTE 1 – Emission Level = Antenna Factor + Cable Loss + Meter Reading.($< 1\text{GHz}$)

NOTE 2 – Emission Level = Antenna Factor + Cable Loss – Preamp Factor + Meter Reading.($> 1\text{GHz}$)

NOTE 3 – The emission levels that are 20dB below the official limit are not reported.

NOTE 4 – 0° was the table front facing the antenna. Degree is calculated from 0° clockwise facing the antenna.

NOTE 5 – All reading are Quasi-Peak values below or equal to 1GHz and Peak values above 1GHz.

NOTE 6 – The worst case is for DVI 1280*1024@60Hz. The worst emission at horizontal polarization was detected at 179.38 MHz with corrected signal level of 38.64 dB ($\mu\text{V/m}$) (limit is 43.50 dB ($\mu\text{V/m}$)), when the antenna was 1.10 m height and the turntable was at 335° . The worst emission at vertical polarization was detected at 30.97 MHz with corrected signal level of 36.89 dB ($\mu\text{V/m}$) (limit is 40.00 dB ($\mu\text{V/m}$)), when the antenna was 1.00 m height and the turntable was at 120° .

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : VGA 640*480@60Hz

Polarization	Frequency (MHz)	Meter Reading dB (μV)	Antenna Factor (dB/m)	Cable Loss (dB)	Emission Level dB (μV/m)	Limits dB (μV/m)	Margin (dB)
Horizontal	30.00	13.87	18.02	0.91	32.80	40.00	7.20
	182.29	19.42	11.80	2.25	33.47	43.50	10.03
	193.93	20.51	12.64	2.30	35.45	43.50	8.05
	237.58	19.26	13.67	2.68	35.61	46.00	10.39
	400.54	10.58	17.98	3.60	32.16	46.00	13.84
	746.83	9.44	22.55	5.11	37.10	46.00	8.90
Vertical	30.00	17.22	18.02	0.91	36.15	40.00	3.85
	67.83	18.45	12.10	1.37	31.92	40.00	8.08
	85.29	18.32	11.51	1.57	31.40	40.00	8.60
	182.29	19.87	11.80	2.25	33.92	43.50	9.58
	216.24	17.21	13.35	2.50	33.06	46.00	12.94
	851.59	5.28	23.34	5.55	34.17	46.00	11.83

TEST ENGINEER: KEN XU

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : VGA 1024*768@60Hz

Polarization	Frequency (MHz)	Meter Reading dB (μV)	Antenna Factor (dB/m)	Cable Loss (dB)	Emission Level dB (μV/m)	Limits dB (μV/m)	Margin (dB)
Horizontal	30.00	16.21	18.02	0.91	35.14	40.00	4.86
	69.77	18.13	12.34	1.41	31.88	40.00	8.12
	127.97	21.51	11.91	1.93	35.35	43.50	8.15
	193.93	22.68	12.64	2.30	37.62	43.50	5.88
	237.58	24.26	13.67	2.68	40.61	46.00	5.39
	746.83	13.44	22.55	5.11	41.10	46.00	4.90
Vertical	31.94	18.20	15.50	0.92	34.62	40.00	5.38
	69.77	18.96	12.34	1.41	32.71	40.00	7.29
	85.29	20.55	11.51	1.57	33.63	40.00	6.37
	193.93	23.28	12.64	2.30	38.22	43.50	5.28
	216.24	22.09	13.35	2.50	37.94	46.00	8.06
	746.83	9.26	22.55	5.11	36.92	46.00	9.08

TEST ENGINEER: KEN XU

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : VGA 1280*1024@60Hz

Polarization	Frequency (MHz)	Meter Reading dB (μV)	Antenna Factor (dB/m)	Cable Loss (dB)	Emission Level dB (μV/m)	Limits dB (μV/m)	Margin (dB)
Horizontal	30.97	18.03	16.76	0.91	35.70	40.00	4.30
	128.94	17.48	11.87	1.94	31.29	43.50	12.21
	193.93	23.51	12.64	2.30	38.45	43.50	5.05
	216.24	22.9	13.35	2.50	38.75	46.00	7.25
	237.58	23.26	13.67	2.68	39.61	46.00	6.39
	746.83	10.44	22.55	5.11	38.10	46.00	7.90
Vertical	30.97	16.20	16.76	0.91	33.87	40.00	6.13
	69.77	20.99	12.34	1.41	34.74	40.00	5.26
	85.29	22.55	11.51	1.57	35.63	40.00	4.37
	140.58	25.30	11.37	2.01	38.68	43.5	4.82
	193.93	24.28	12.64	2.30	39.22	43.5	4.28
	397.63	17.90	17.86	3.60	39.36	46.00	6.64

TEST ENGINEER: KEN XU

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : VGA 1280*1024@60Hz

Polarization	Frequency (MHz)	Meter Reading dB (μV)	Antenna Factor (dB/m)	Cable Loss (dB)	Preamplifier Factor (dB)	Emission Level dB (μV/m)	Limits dB (μV/m)	Margin (dB)	Remark
Horizontal	1080.00	51.95	24.49	6.85	37.47	45.82	74.00	28.18	PK
	1290.00	46.18	25.38	7.50	36.96	42.10	74.00	31.90	
	1363.00	46.85	25.66	7.84	36.81	43.54	74.00	30.46	
	1464.00	50.29	26.02	8.26	36.60	47.97	74.00	26.03	
	1576.00	45.18	26.39	8.64	36.38	43.83	74.00	30.17	
	1729.00	43.88	26.86	9.15	36.12	43.77	74.00	30.23	
Vertical	1099.00	46.78	24.58	6.89	37.42	40.83	74.00	33.17	PK
	1188.00	44.53	24.98	7.07	37.20	39.38	74.00	34.62	
	1272.00	43.13	25.31	7.41	37.01	38.84	74.00	35.16	
	1405.00	45.65	25.82	8.01	36.71	42.77	74.00	31.23	
	1529.00	46.47	26.24	8.5	36.47	44.74	74.00	29.26	
	1621.00	45.62	26.54	8.78	36.31	44.63	74.00	29.37	

TEST ENGINEER: KEN XU

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : DVI 640*480@60Hz

Polarization	Frequency (MHz)	Meter Reading dB (μV)	Antenna Factor (dB/m)	Cable Loss (dB)	Emission Level dB (μV/m)	Limits dB (μV/m)	Margin (dB)
Horizontal	30.00	12.63	18.02	0.91	31.56	40.00	8.44
	179.38	15.39	11.56	2.24	29.19	43.50	14.31
	211.39	11.36	13.28	2.46	27.10	43.50	16.40
	264.74	10.08	13.66	2.89	26.63	46.00	19.37
	313.24	12.02	13.92	3.20	29.14	46.00	16.86
	538.28	6.68	20.39	4.08	31.15	46.00	14.85
Vertical	30.00	15.82	18.02	0.91	34.75	40.00	5.25
	70.74	18.26	12.36	1.43	32.05	40.00	7.95
	167.74	20.46	11.15	2.17	33.78	43.50	9.72
	182.29	18.06	11.80	2.25	32.11	43.50	11.39
	473.29	9.41	19.54	3.89	32.84	46.00	13.16
	538.28	9.86	20.39	4.08	34.33	46.00	11.67

TEST ENGINEER: KEN XU

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : DVI 1024*768@60Hz

Polarization	Frequency (MHz)	Meter Reading dB (μV)	Antenna Factor (dB/m)	Cable Loss (dB)	Emission Level dB (μV/m)	Limits dB (μV/m)	Margin (dB)
Horizontal	30.00	13.05	18.02	0.91	31.98	40.00	8.02
	179.38	19.38	11.56	2.24	33.18	43.50	10.32
	216.24	17.75	13.35	2.50	33.60	46.00	12.40
	322.94	15.68	14.44	3.25	33.37	46.00	12.63
	538.28	14.20	20.39	4.08	38.67	46.00	7.33
	730.34	10.14	22.05	4.99	37.18	46.00	8.82
Vertical	30.00	16.82	18.02	0.91	35.75	40.00	4.25
	69.77	18.31	12.34	1.41	32.06	40.00	7.94
	80.44	17.01	12.19	1.52	30.72	40.00	9.28
	172.59	24.47	11.19	2.2	37.86	43.50	5.64
	216.24	18.01	13.35	2.5	33.86	46.00	12.14
	539.25	13.17	20.41	4.1	37.68	46.00	8.32

TEST ENGINEER: KEN XU

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : DVI 1280*1024@60Hz

Polarization	Frequency (MHz)	Meter Reading dB (μV)	Antenna Factor (dB/m)	Cable Loss (dB)	Emission Level dB (μV/m)	Limits dB (μV/m)	Margin (dB)
Horizontal	30.00	16.11	18.02	0.91	35.04	40.00	4.96
	179.38	24.84	11.56	2.24	38.64	43.50	4.86
	216.24	17.75	13.35	2.50	33.60	46.00	12.40
	322.94	15.68	14.44	3.25	33.37	46.00	12.63
	538.28	14.20	20.39	4.08	38.67	46.00	7.33
	730.34	10.14	22.05	4.99	37.18	46.00	8.82
Vertical	30.97	19.22	16.76	0.91	36.89	40.00	3.11
	70.74	21.46	12.36	1.43	35.25	40.00	4.75
	180.35	21.52	11.66	2.24	35.42	43.50	8.08
	216.24	18.01	13.35	2.5	33.86	46.00	12.14
	538.28	17.37	20.39	4.08	41.84	46.00	4.16
	730.34	10.89	22.05	4.99	37.93	46.00	8.07

TEST ENGINEER: KEN XU

EUT : LCD Monitor Temperature : 22°C

Model No. : L1755TT Humidity : 60%

Serial No. : E07103001 Date of Test : Nov 07, 2007

Test Mode : DVI 1280*1024@60Hz

Polarization	Frequency (MHz)	Meter Reading dB (μV)	Antenna Factor (dB/m)	Cable Loss (dB)	Preamplifier Factor (dB)	Emission Level dB (μV/m)	Limits dB (μV/m)	Margin (dB)	Remark
Horizontal	1108.00	49.76	24.61	6.92	37.41	43.88	74.00	30.12	PK
	1204.00	47.56	25.03	7.16	37.16	42.59	74.00	31.41	
	1307.00	49.96	25.46	7.58	36.93	46.07	74.00	27.93	
	1404.00	49.74	25.81	8.01	36.72	46.84	74.00	27.16	
	1621.00	48.17	26.54	8.78	36.31	47.18	74.00	26.82	
	1775.00	43.32	27.00	9.24	36.04	43.52	74.00	30.48	
Vertical	1080.00	53.54	24.49	6.85	37.47	47.41	74.00	26.59	PK
	1155.00	47.08	24.83	7.01	37.28	41.64	74.00	32.36	
	1314.00	45.97	25.47	7.66	36.91	42.19	74.00	31.81	
	1427.00	50.37	25.89	8.09	36.67	47.68	74.00	26.32	
	1530.00	49.76	26.24	8.50	36.47	48.03	74.00	25.97	
	1693.00	45.62	26.75	8.99	36.18	45.18	74.00	28.82	
	1080.00	53.54	24.49	6.85	37.47	47.41	74.00	26.59	

TEST ENGINEER: KEN XU

5 DEVIATION TO TEST SPECIFICATIONS

None.

6 DEBUG DESCRIPTION

Name	M/N	Specifications (mm)	Manufacturer	Location
Aluminum foil	T-308	50mm*30mm	DAEHUNG SUBSIDIARY MATERIALS	See Appendix II Figure 4, 5, 24, 25