

EMC TEST REPORT

Test item : LED LCD TV monitor
Model No. : 42LM3700-UC
Order No. : 1206-00917
Date of receipt : 2012-06-19
Test duration : 2012-06-22 ~ 2012-06-25
Use of report : FCC CoC Marking
Date of Issue : 2012-06-27

Applicant : LG Electronics Inc.

19-1, Cheongho-ri, Jinwi-myeon, Pyeongtaek-si, Gyeonggi-do, 451-713, Korea

Test laboratory : Digital EMC Co., Ltd.

683-3, Yubang-Dong, Cheoin-Gu, Yongin-Si, Gyeonggi-Do, 449-080, Korea

Test specification : ANSI C 63.4:2003
FCC Part 15 Subpart B
(Type of Device : Class B Personal Computers
and Peripherals (JBP))

Test environment : Temperature : 21 °C,
Humidity : 40 % R.H.

Test result : ☒ Comply ☐ Not Comply

The test results presented in this test report are limited only to the sample supplied by applicant and
the use of this test report is inhibited other than its purpose.

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Tested by:



Assistant Manager
D.H.EUN

Reviewed by:



Manager
M.J.SONG

PRESIDENT OF DIGITAL EMC CO., LTD.

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1. General Remarks

This report contains the result of tests performed by:

DIGITAL EMC CO., LTD.

Address : 683-3, Yubang-Dong, Cheoin-Gu, Yongin-Si, Gyeonggi-Do, 449-080, Korea

<http://www.digitalemcc.com>

Tel: +82-31-321-2664 Fax: +82-31-321-1664

2. Test Laboratory

Digital EMC Co., Ltd. has been accredited / filed / authorized by the agencies listed in the following table;

Certificate	Nation	Agency	Code	Mark
Accreditation	Korea	KOLAS	393	ISO/IEC 17025
Site Filing	USA	FCC	101842 678747	Test Facility list & NSA Data
	Canada	IC	5740A-1 5740A-2	Test Facility list & NSA Data
	Japan	VCCI	C-1427 R-1364, R-3385 T-1442, G-338	Test Facility list & NSA Data
Certification	Korea	KC	KR0034	Test Facility list & NSA Data
	Germany	TUV	ROK1124C	ISO/IEC 17025

Quality control in the testing laboratory is implemented as per ISO/IEC 17025 which is the "General requirements for the competent of calibration and testing laboratory".

3. General Information of EUT

Model No.	42LM3700-UC
EUT Type	LED LCD TV monitor
Serial No	N/A
FCC ID	BEJ42LM3700UC
Type of Sample Tested	Pre-Production
High Frequency	667 MHz
Rating	AC100-240, ~ 50/60Hz
Supplied Power for Test	AC120V, 60Hz
Applicant	LG Electronics Inc. 19-1, Cheongho-ri, Jinwi-myeon, Pyeongtaek-si, Gyeonggi-do, 451-713, Korea
Manufacturer	LG Electronics Inc. 19-1, Cheongho-ri, Jinwi-myeon, Pyeongtaek-si, Gyeonggi-do, 451-713, Korea

Related Submittal(s) / Grant(s)

Original submittal only.

Resolution	Horizontal Frequency (KHz)	Vertical Frequency (Hz)
640 x 350	31.468	70.09
720 x 400	31.469	70.08
640 x 480	31.469	59.94
800 x 600	37.879	60.31
1024 x 768	48.363	60.00
1360 x 768	47.712	60.015
1152 x 864	54.348	60.053
1280 x 1024	63.981	60.02
1920 x 1080	67.50	60.00

4. Test Summary

4.1 Applied standards and test results

Test Items	Applied Standards	Results
Conducted Disturbance	ANSI C63.4:2003	C
Radiated Disturbance	ANSI C63.4:2003	C
C=Comply N/C=Not Comply N/T=Not Tested N/A=Not Applicable		

The data in this test report are traceable to the national or international standards.

4.2 Test environment and conditions

Test Items	Test date (MM-DD)	Temp (°C)	Humidity (% R.H.)
Conducted Disturbance	06-22	21	40
Radiated Disturbance	06-25	21	40

4.3 Test result Summary

(1) Conducted Emission (USB MODE)

Frequency [MHz]	Phase	Result [dBμV]	Detector	Limit [dBμV]	Margin [dB]
0.554	L1	43.8	Quasi-Peak	56.0	12.2

(2) Radiated Emission (HDMI MODE)

Frequency [MHz]	Pol.	Result [dB(μV/m)]	Detector	Limit [dB(μV/m)]	Margin [dB]
1709.588	H	48.6	Average-Peak	54.0	5.4

5. Test Set-up and operation mode

5.1 Principle of Configuration Selection

Emission : The equipment under test (EUT) was configured to measure its highest possible radiation level. The test modes were adapted accordingly in reference to the instructions for use.

5.2 Test Operation Mode

- HDMI MODE – Resolution : 1920 X 1080 Resolution (Worst Case)
- USB MODE

5.3 Support Equipment Used

Unit	Model No.	Serial No.	Manufacturer	CABLE			Backshell	FCC ID
				Connect type	Length (m)	shield		
PC	VOSTRO430	9K77SBX	DELL	POWER	1.8	Non-Shield	Plastic	DOC
				HDMI	1.8	Shield		
				USB	1.8	Shield		
				USB	1.8	Shield		
KEYBOARD	SKG-2000UB	TAKB401425B	MONITEREY INTERNATIONAL CORP	USB	1.8	Shield	Plastic	DOC
MOUSE	M-UAE96	LZ751AP01L3	LOGITECH Inc.	USB	1.8	Shield	Plastic	DOC
CD/DVD PLAYER	DVP-NS92V	2000407	SONY EMCS	POWER AV	1.8 1.6	Non-Shield Non-Shield	Plastic	VER
USB MEMORY	USM4GP	11725AGGNN	SONY Corporation	USB	-	-	-	DOC
SOUND BAR	N32020	N/A	LG	POWER OPTICAL	1.8 1.5	Non-Shield Shield	Plastic	DOC
PRINTER	SRP-770	SRP77008060035	BICSOLON	POWER USB	1.8 1.8	Non-Shield	Plastic	DOC

(Configuration of Tested System)

6. Test Results : Emission

6.1 Conducted Disturbance

6.1.1 Measurement Procedure

In the range of 0.15 MHz to 30 MHz, the conducted disturbance was measured and set-up was made accordance with **ANSI C63.4**.

If the EUT is table top equipment, it was placed on a wooden table with a height of 0.8 m above the reference ground plane and 0.4 m from the conducting wall of the shielded room.

Also if the EUT is floor-standing equipment, it was placed on a non-conducted support with a height up to 0.15 m above the reference ground plane.

Connect the EUT's power source lines to the appropriate power mains / peripherals through the LISN. All the other peripherals are connected to the 2nd LISN, if any.

Unused measuring port of the LISN was resistively terminated by 50 ohm terminator.

The measuring port of the LISN for EUT was connected to spectrum analyzer.

Using conducted emission test software, the emissions were scanned with peak detector mode.

After scanning over the frequency range, suspected emissions were selected to perform final measurement. When performing final measurement, the receiver was used which has Quasi-Peak detector and Average detector.

By varying the configuration of the test sample and the cable routing it was attempted to maximize the emission.

For further description of the configuration refer to the picture of the test set-up.

6.1.2 Limit for Conducted Disturbance

(1) Conducted disturbance at mains ports.

Frequency range (MHz)	Limits dB(μV)			
	Quasi-peak		Average	
	Class A	Class B	Class A	Class B
0.15 to 0.50	79	66 to 56	66	56 to 46
0.50 to 5	73	56	60	46
5 to 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 to 0.5 MHz.				

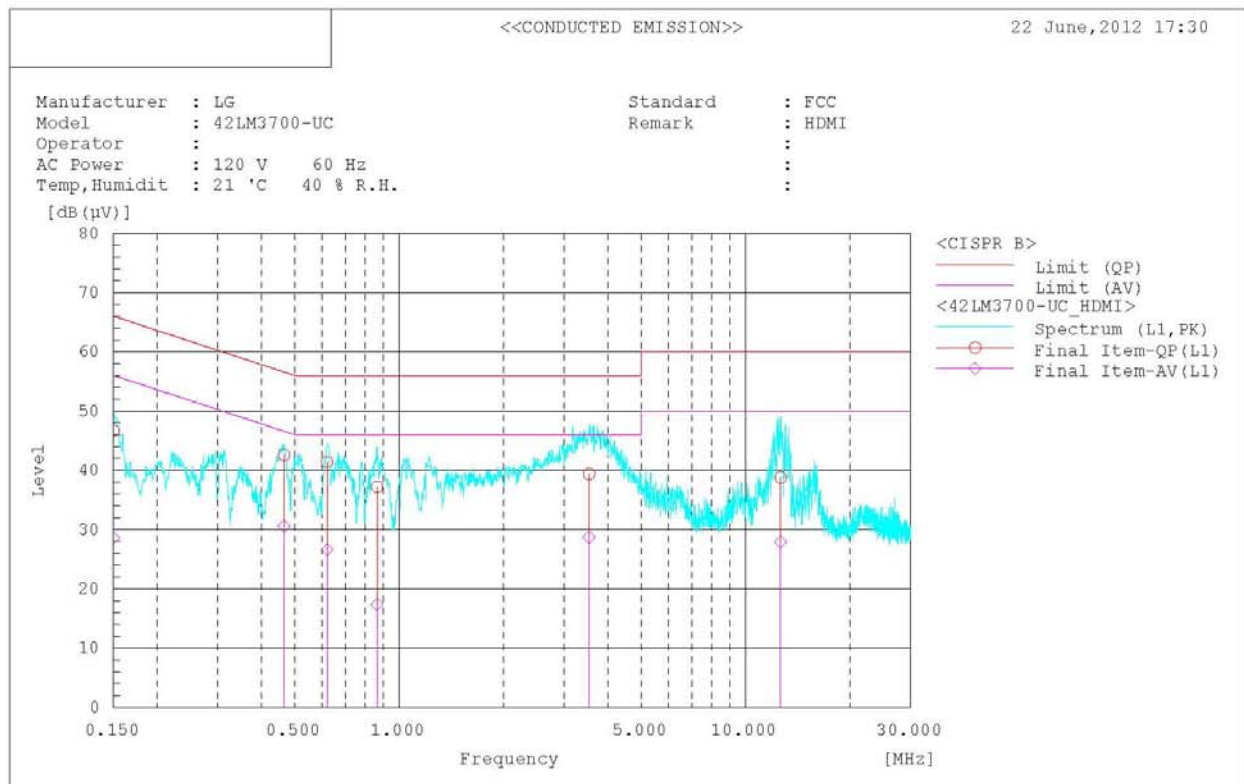
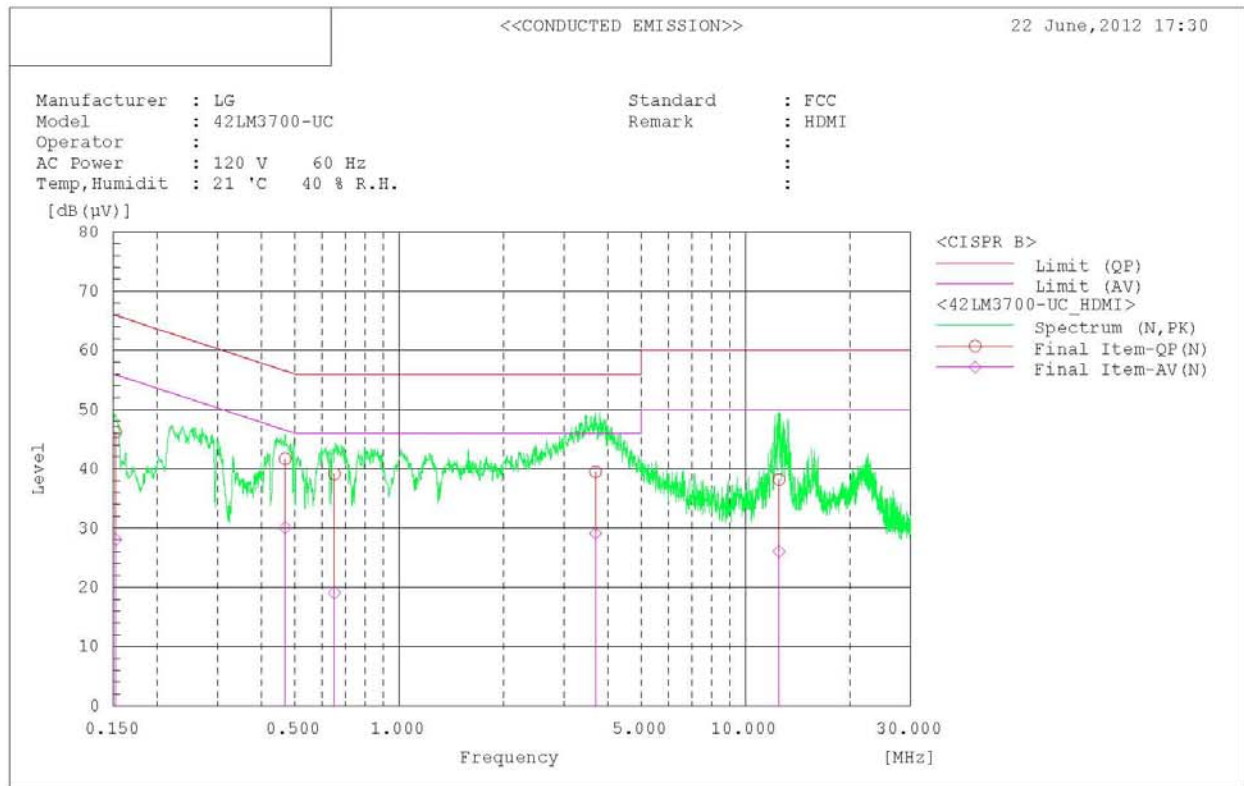
Note) 1. Emission Level = Reading Value + Correction Factor.

2. Correction Factor = Cable Loss + Insertion Loss of LISN

3. Margin = Limit - Emission level

Test Result

< HDMI MODE >



<<CONDUCTED EMISSION>>

22 June, 2012 17:30

Standard : FCC
Manufacturer : LG
Model : 42LM3700-UC
Operator :
AC Power : 120 V 60 Hz
Temp, Humidit : 21 °C 40 % R.H.
Remark : HDMI
:
:
:

Final Result

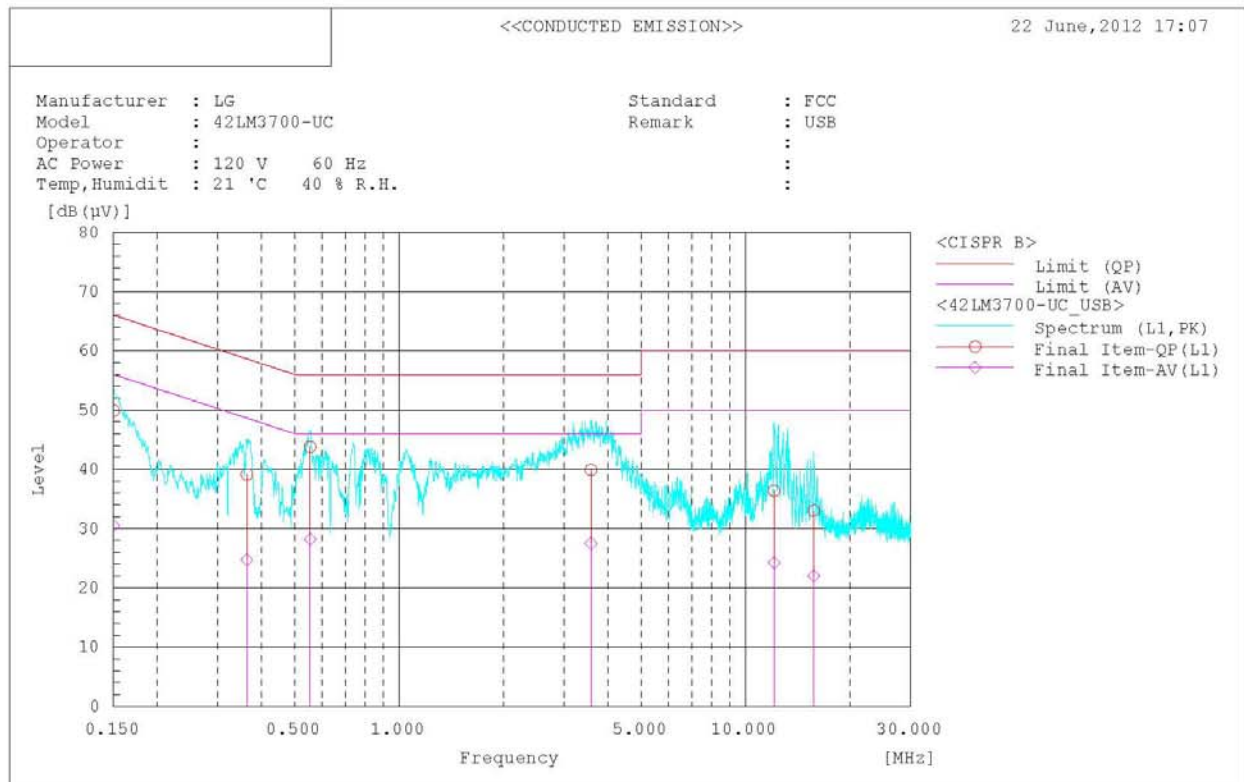
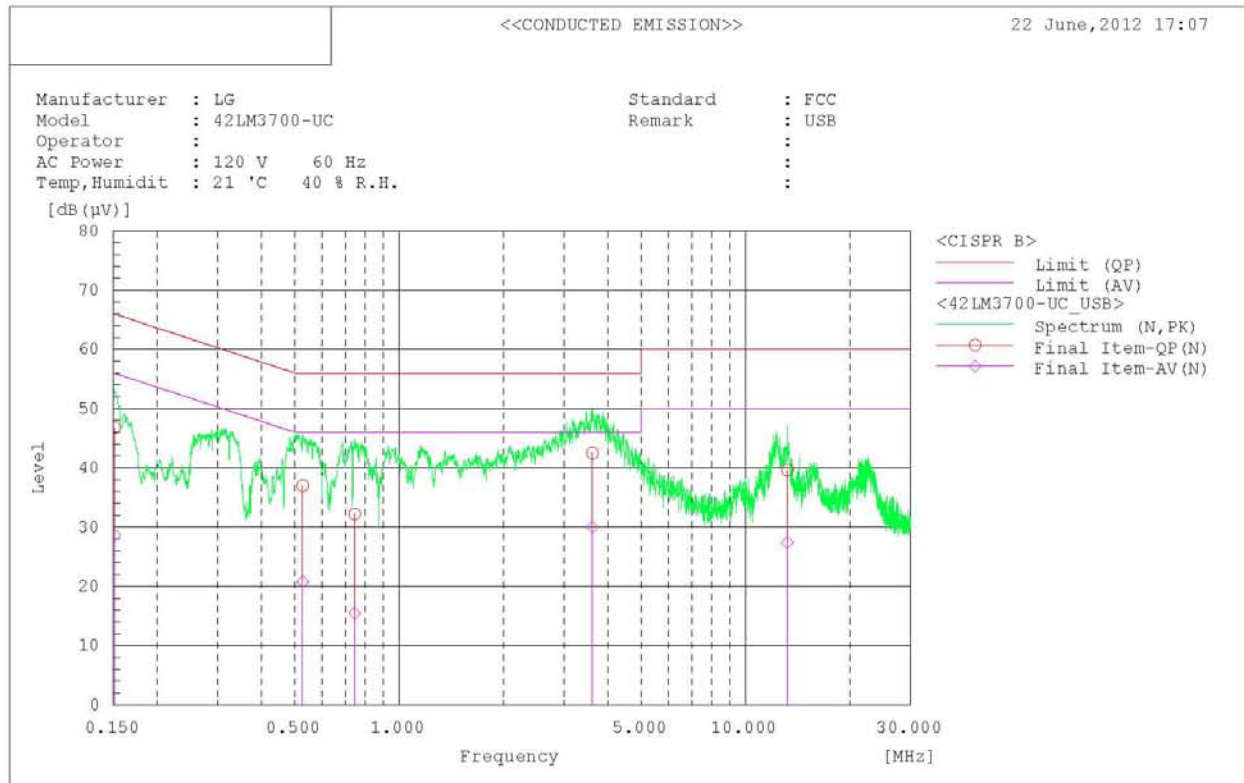
--- N Phase ---

No.	Frequency	Reading QP	Reading AV	c.f	Result QP	Result AV	Limit QP	Limit AV	Margin QP	Margin AV	Remark
	[MHz]	[dB(μV)]	[dB(μV)]	[dB]	[dB(μV)]	[dB(μV)]	[dB(μV)]	[dB(μV)]	[dB]	[dB]	
1	0.152	35.8	17.7	10.4	46.2	28.1	65.9	55.9	19.7	27.8	
2	0.469	31.5	19.9	10.2	41.7	30.1	56.5	46.5	14.8	16.4	
3	0.651	29.0	9.0	10.1	39.1	19.1	56.0	46.0	16.9	26.9	
4	3.690	29.3	18.9	10.2	39.5	29.1	56.0	46.0	16.5	16.9	
5	12.500	27.8	15.7	10.4	38.2	26.1	60.0	50.0	21.8	23.9	

--- L1 Phase ---

No.	Frequency	Reading QP	Reading AV	c.f	Result QP	Result AV	Limit QP	Limit AV	Margin QP	Margin AV	Remark
	[MHz]	[dB(μV)]	[dB(μV)]	[dB]	[dB(μV)]	[dB(μV)]	[dB(μV)]	[dB(μV)]	[dB]	[dB]	
1	0.150	36.8	18.7	9.9	46.7	28.6	66.0	56.0	19.3	27.4	
2	0.466	32.6	20.6	10.0	42.6	30.6	56.6	46.6	14.0	16.0	
3	0.620	31.4	16.6	10.0	41.4	26.6	56.0	46.0	14.6	19.4	
4	0.864	27.2	7.4	10.0	37.2	17.4	56.0	46.0	18.8	28.6	
5	3.535	29.3	18.6	10.1	39.4	28.7	56.0	46.0	16.6	17.3	
6	12.637	28.6	17.7	10.2	38.8	27.9	60.0	50.0	21.2	22.1	

< USB MODE >



<<CONDUCTED EMISSION>>

22 June, 2012 17:07

Standard	:	FCC
Manufacturer	:	LG
Model	:	42LM3700-UC
Operator	:	
AC Power	:	120 V 60 Hz
Temp, Humidit	:	21 °C 40 % R.H.
Remark	:	USB
	:	
	:	

Final Result

--- N Phase ---											
No.	Frequency	Reading QP	Reading AV	c.f	Result QP	Result AV	Limit QP	Limit AV	Margin QP	Margin AV	Remark
	[MHz]	[dB(μV)]	[dB(μV)]	[dB]	[dB(μV)]	[dB(μV)]	[dB(μV)]	[dB(μV)]	[dB]	[dB]	
1	0.151	36.4	18.2	10.4	46.8	28.6	65.9	55.9	19.1	27.3	
2	0.527	26.8	10.6	10.2	37.0	20.8	56.0	46.0	19.0	25.2	
3	0.745	22.1	5.4	10.1	32.2	15.5	56.0	46.0	23.8	30.5	
4	3.615	32.3	19.8	10.2	42.5	30.0	56.0	46.0	13.5	16.0	
5	13.212	29.2	17.0	10.4	39.6	27.4	60.0	50.0	20.4	22.6	
--- L1 Phase ---											
No.	Frequency	Reading QP	Reading AV	c.f	Result QP	Result AV	Limit QP	Limit AV	Margin QP	Margin AV	Remark
	[MHz]	[dB(μV)]	[dB(μV)]	[dB]	[dB(μV)]	[dB(μV)]	[dB(μV)]	[dB(μV)]	[dB]	[dB]	
1	0.150	40.0	20.6	9.9	49.9	30.5	66.0	56.0	16.1	25.5	
2	0.364	29.1	14.7	10.0	39.1	24.7	58.6	48.6	19.5	23.9	
3	0.554	33.8	18.2	10.0	43.8	28.2	56.0	46.0	12.2	17.8	
4	3.580	29.8	17.4	10.1	39.9	27.5	56.0	46.0	16.1	18.5	
5	12.087	26.2	14.0	10.2	36.4	24.2	60.0	50.0	23.6	25.8	
6	15.738	22.8	11.8	10.2	33.0	22.0	60.0	50.0	27.0	28.0	

6.2 Radiated Disturbance

6.2.1 Measurement Procedure

The radiated disturbance was measured and set-up was made accordance with **ANSI C63.4**.

If the EUT is tabletop equipment, it was placed on a wooden table with a height of 0.8 m above the reference ground plane and 3 m away from the interference receiving antenna in the **10m semi-anechoic chamber**.

Also if the EUT is floor-standing equipment, it was placed on a non-conducted support with a height up to 0.15 m above the reference ground plane.

Rotate the EUT from (0 - 360)° and position the receiving antenna at heights from (1 - 4) m above the reference ground plane continuously to determine associated with higher emission levels and record them.

The measurement was made in both the vertical and horizontal polarization, and the maximum value is presented in the report.

For below 1 GHz frequency range, Quasi-Peak detector with 120 kHz RBW was used.

Also Peak and Average detector with 1 MHz RBW were used for above 1 GHz frequency range.

For further description of the configuration refer to the picture of the test set-up.

6.2.2 Limit for Radiated Disturbance

- The test frequency range of Radiated Disturbance measurements are listed below.

Highest frequency generated or used in the device or on which the device operates or tunes (MHz)	Upper frequency of measurement range (MHz)
Below 108	1 000
108 – 500	2 000
500 – 1 000	5 000
Above 1 000	5 th harmonic of the highest frequency or 40 GHz, whichever is lower

(1) Limit for Radiated Emission below 1 000MHz

Frequency range (MHz)	Class A Equipment (10m distance)	Class B Equipment (3m distance)
	Quasi-peak (dBμV/m)	Quasi-peak (dBμV/m)
30 to 88	39.1	40
88 to 216	43.5	43.5
216 to 960	46.4	46
960 to 1 000	49.5	54

Note 1 The lower limit shall apply at the transition frequency.

Note 2 Additional provisions may be required for cases where interference occurs.

Note 3 According to 15.109(g), as an alternative to the radiated emission limit shown above, digital devices may be shown to comply with the standards(CISPR), Pub. 22 shown as below.

Frequency range (MHz)	Class A Equipment (10 m distance)	Class B Equipment (10 m distance)
	Quasi-peak (dBμV/m)	Quasi-peak (dBμV/m)
30 to 230	40	30
230 to 1 000	47	37

(2) Limits for Radiated Emission above 1 000MHz at a measuring distance of 3m

Frequency (GHz)	Class A Equipment		Class B Equipment	
	Peak (dBμV/m)	Average (dBμV/m)	Peak (dBμV/m)	Average (dBμV/m)
1 to 40	80	60	74	54

Note) 1. Emission Level = Reading Value + Correction Factor.

2. Correction Factor = Cable loss - Amp gain + Antenna Factor

3. Margin = Limit - Emission level

Test Result

< HDMI MODE_30 MHz ~ 1 GHz >

RADIATED EMISSION

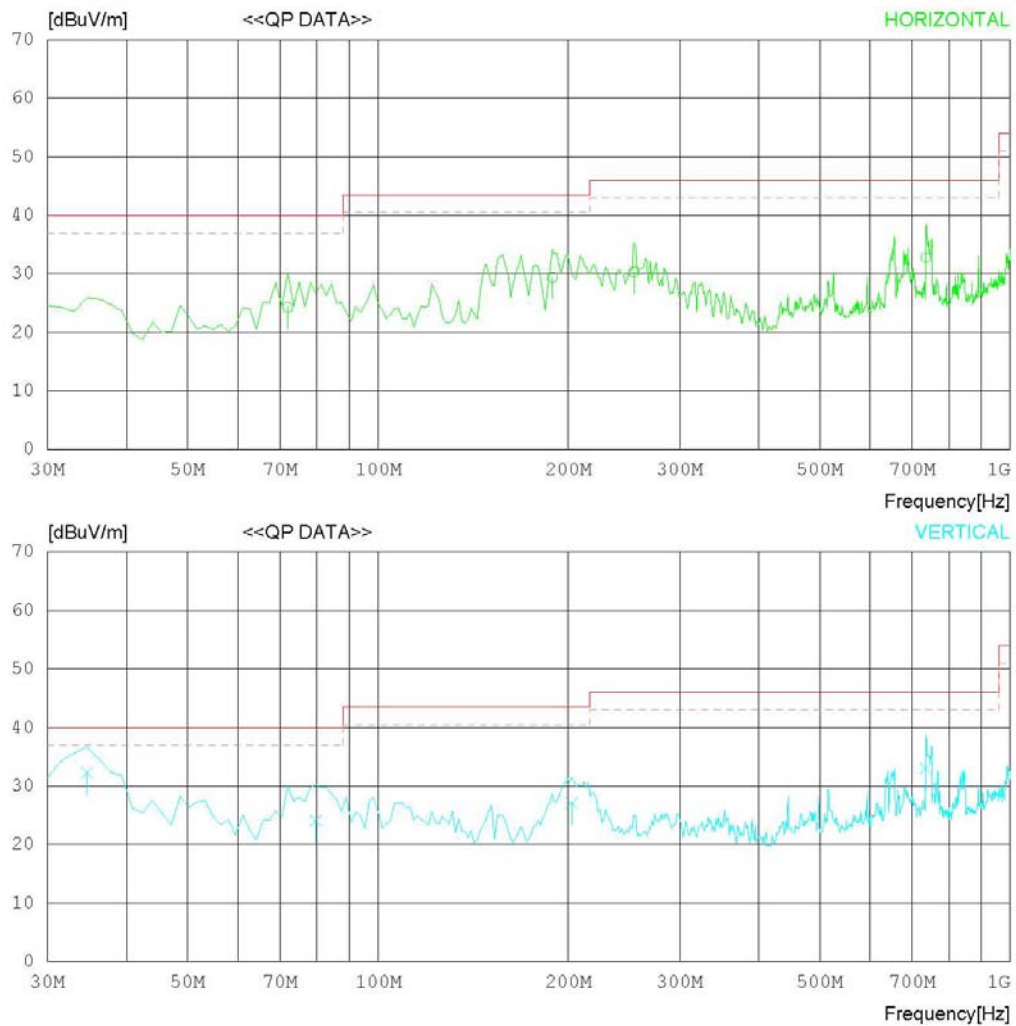
Date : 2012-06-25

Model Name : 42LM3700-UC
Model No. :
Serial No. :
Test Condition : HDMI

Reference No. :
Power Supply : 120 V 60 Hz
Temp/Humi : 21 'C 40 % R.H.
Operator :

Memo :

LIMIT : FCC Part15 Subpart.B Class B (3m)
MARGIN: 3 dB



RADIATED EMISSION

Date : 2012-06-25

Model Name : 42LM3700-UC	Reference No. :
Model No. :	Power Supply : 120 V 60 Hz
Serial No. :	Temp/Humi : 21 'C 40 % R.H.
Test Condition : HDMI	Operator :

Memo :

LIMIT : FCC Part15 Subpart.B Class B (3m)
MARGIN: 3 dB

No.	FREQ [MHz]	READING QP [dBuV]	ANT FACTOR [dB]	LOSS [dB]	GAIN [dB]	RESULT [dBuV/m]	LIMIT [dBuV/m]	MARGIN [dB]	ANTENNA [cm]	TABLE [DEG]
----- Horizontal -----										
1	71.971	38.6	6.7	1.7	22.7	24.3	40.0	15.7	288	57
2	188.558	41.2	9.3	2.2	23.3	29.4	43.5	14.1	112	340
3	253.846	38.9	12.4	2.6	23.6	30.3	46.0	15.7	109	345
4	735.738	32.9	19.3	4.6	24.0	32.8	46.0	13.2	132	359
----- Vertical -----										
5	34.663	38.1	16.2	1.1	23.1	32.3	40.0	7.7	132	358
6	79.744	38.2	7.1	1.6	22.8	24.1	40.0	15.9	121	254
7	202.548	38.9	9.3	2.3	23.4	27.1	43.5	16.4	232	1
8	735.738	33.1	19.3	4.6	24.0	33.0	46.0	13.0	222	359

< HDMI MODE _ (1 ~ 6) GHz _ Peak >

RADIATED EMISSION

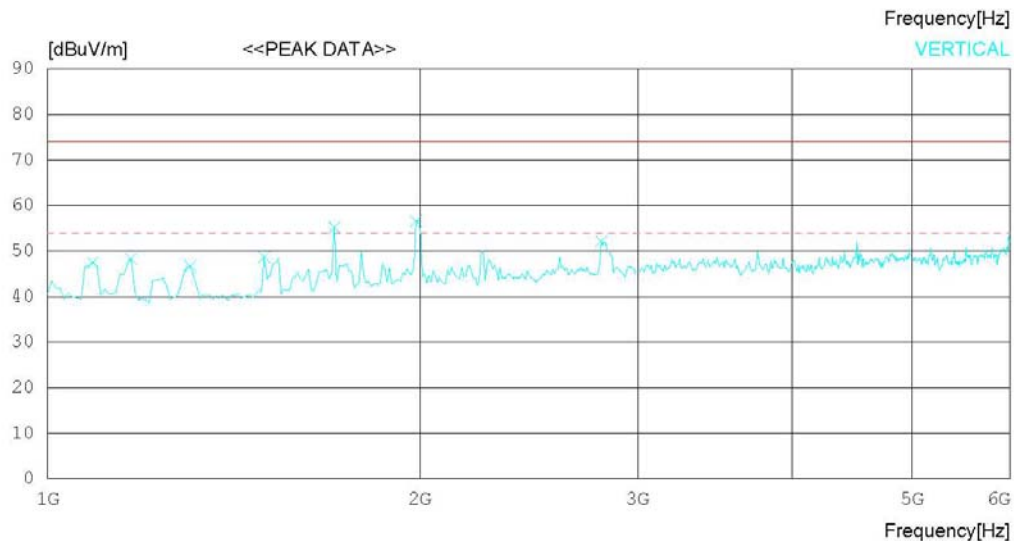
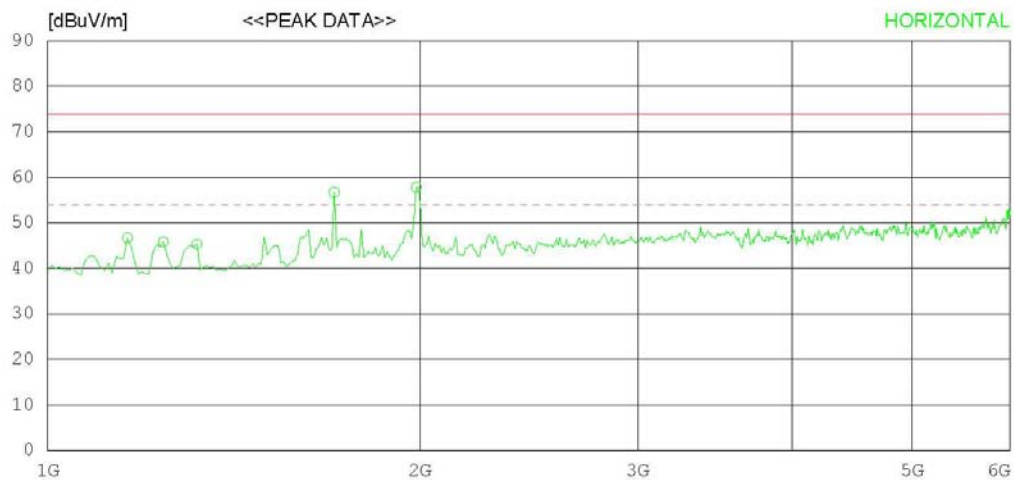
Date : 2012-06-25

Model Name : 42LM3700-UC
Model No. :
Serial No. :
Test Condition : HDMI

Reference No. :
Power Supply : 120 V 60 Hz
Temp/Humi : 21 'C 40 % R.H.
Operator :

Memo :

LIMIT : FCC Part15 Subpart.B Class B (3m) - 18G(Peak)
FCC Part15 Subpart.B Class B (3m) - 18G(Avg)



RADIATED EMISSION

Date : 2012-06-25

Model Name	: 42LM3700-UC	Reference No.	:
Model No.	:	Power Supply	: 120 V 60 Hz
Serial No.	:	Temp/Humi	: 21 'C 40 % R.H.
Test Condition	: HDMI	Operator	:

Memo :

LIMIT : FCC Part15 Subpart B Class B (3m) - 18G(Peak)
FCC Part15 Subpart B Class B (3m) - 18G(Avg)

No.	FREQ [MHz]	READING PEAK [dBuV]	ANT FACTOR [dB]	LOSS [dB]	GAIN [dB]	RESULT [dBuV/m]	LIMIT [dBuV/m]	MARGIN [dB]	ANTENNA [cm]	TABLE [DEG]
----- Horizontal -----										
1	1160.256	58.6	24.8	5.2	41.9	46.7	74.0	27.3	100	358
2	1240.385	57.1	25.1	5.4	41.8	45.8	74.0	28.2	100	235
3	1320.513	56.2	25.4	5.5	41.8	45.3	74.0	28.7	100	220
4	1705.128	65.1	26.9	6.4	41.7	56.7	74.0	17.3	100	147
5	1985.577	64.6	27.9	7.0	41.7	57.8	74.0	16.2	100	213
----- Vertical -----										
6	1088.141	59.7	24.6	5.0	41.8	47.5	74.0	26.5	100	1
7	1168.269	60.1	24.9	5.2	41.9	48.3	74.0	25.7	100	1
8	1304.487	57.6	25.4	5.5	41.8	46.7	74.0	27.3	100	1
9	1496.795	58.3	26.1	5.9	41.6	48.7	74.0	25.3	100	1
10	1705.128	63.6	26.9	6.4	41.7	55.2	74.0	18.8	100	122
11	1985.577	63.4	27.9	7.0	41.7	56.6	74.0	17.4	100	1
12	2802.896	55.8	29.6	8.4	41.7	52.1	74.0	21.9	100	1

< HDMI MODE _ (1 ~ 6) GHz _ Average >

RADIATED EMISSION

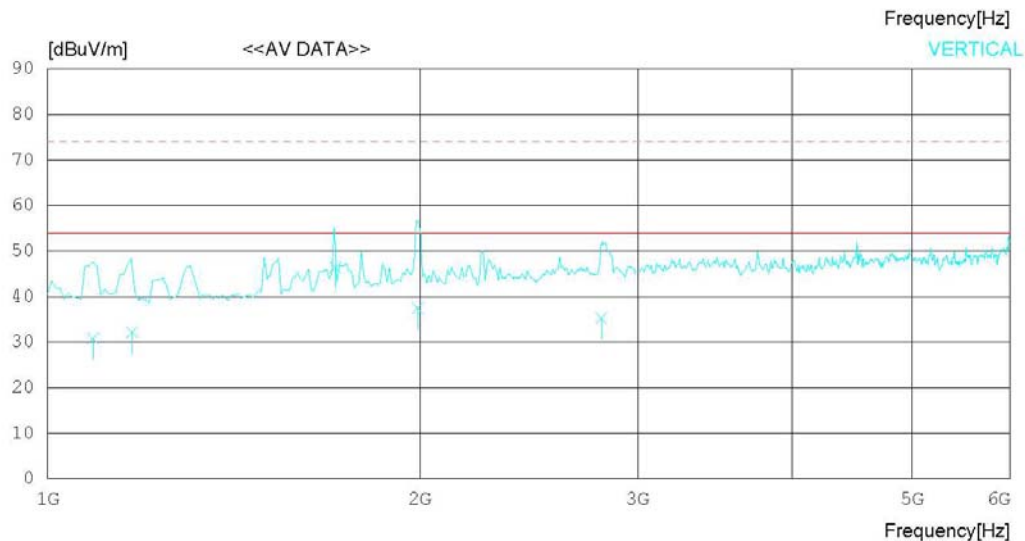
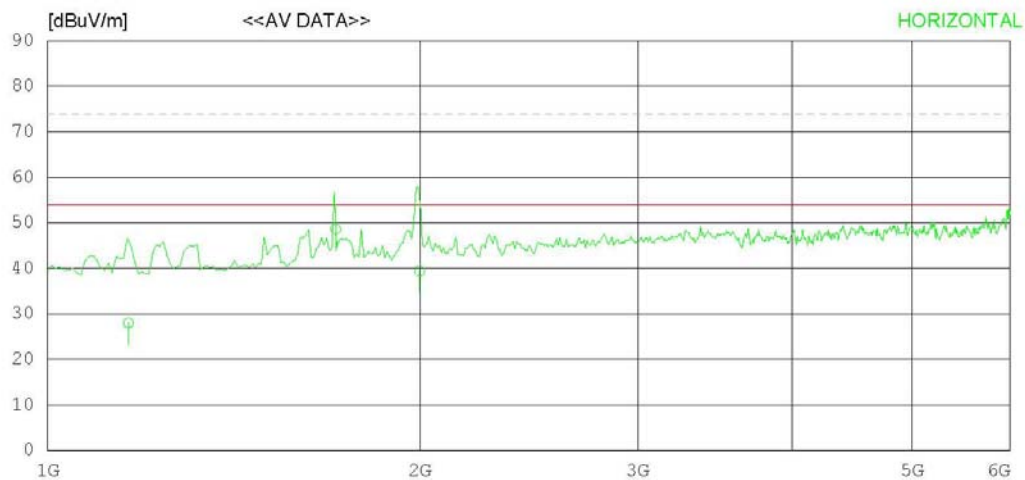
Date : 2012-06-25

Model Name : 42LM3700-UC
Model No. :
Serial No. :
Test Condition : HDMI

Reference No. :
Power Supply : 120 V 60 Hz
Temp/Humi : 21 'C 40 % R.H.
Operator :

Memo :

LIMIT : FCC Part15 Subpart.B Class B (3m) - 18G(Avg)
FCC Part15 Subpart.B Class B (3m) - 18G(Peak)



RADIATED EMISSION

Date : 2012-06-25

Model Name : 42LM3700-UC	Reference No. :
Model No. :	Power Supply : 120 V 60 Hz
Serial No. :	Temp/Humi : 21 'C 40 % R.H.
Test Condition : HDMI	Operator :

Memo :

LIMIT : FCC Part15 Subpart B Class B (3m) - 18G(Avg)
FCC Part15 Subpart B Class B (3m) - 18G(Peak)

No.	FREQ [MHz]	READING AV [dBuV]	ANT FACTOR [dB]	LOSS [dB]	GAIN [dB]	RESULT [dBuV/m]	LIMIT [dBuV/m]	MARGIN [dB]	ANTENNA [cm]	TABLE [DEG]
----- Horizontal -----										
1	1162.215	39.9	24.8	5.2	41.9	28.0	54.0	26.0	100	243
2	1709.588	57.0	26.9	6.4	41.7	48.6	54.0	5.4	100	265
3	1998.591	46.1	28.0	7.0	41.7	39.4	54.0	14.6	100	233
----- Vertical -----										
4	1088.211	43.0	24.6	5.0	41.8	30.8	54.0	23.2	100	135
5	1170.130	44.0	24.9	5.2	41.9	32.2	54.0	21.8	100	167
6	1709.233	54.9	26.9	6.4	41.7	46.5	54.0	7.5	100	155
7	1991.255	44.3	27.9	7.0	41.7	37.5	54.0	16.5	100	196
8	2802.864	39.0	29.6	8.4	41.7	35.3	54.0	18.7	100	201

< USB MODE_30 MHz ~ 1 GHz >

RADIATED EMISSION

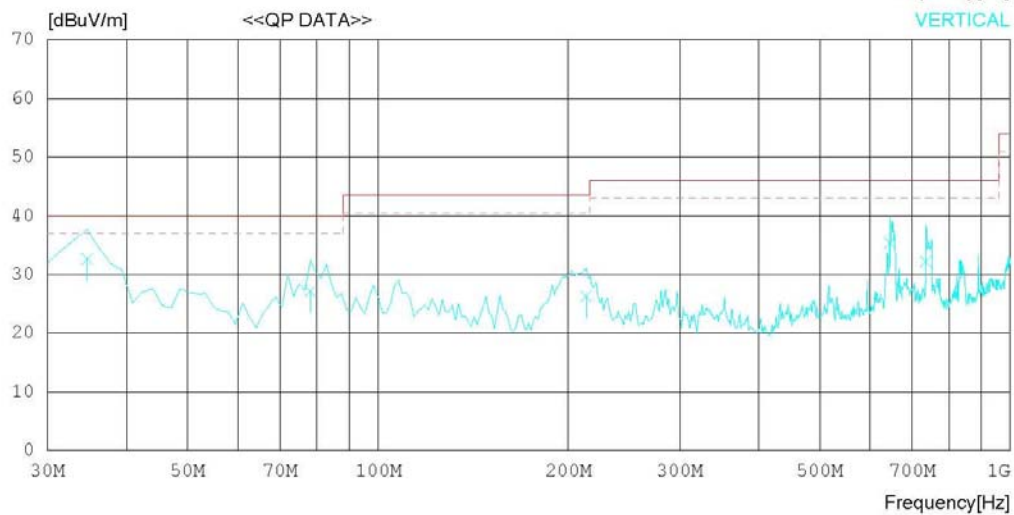
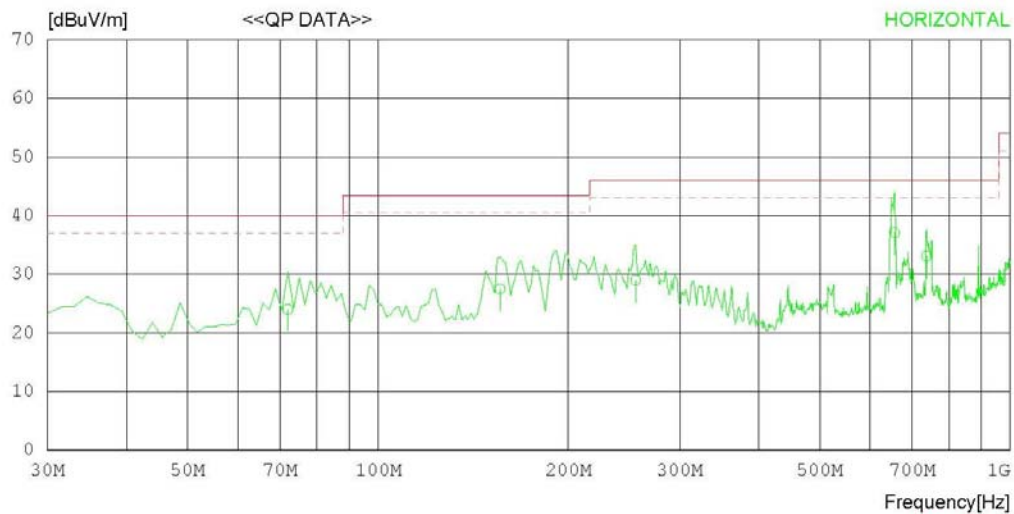
Date : 2012-06-25

Model Name : 42LM3700-UC
Model No. :
Serial No. :
Test Condition : USB

Reference No. :
Power Supply : 120 V 60 Hz
Temp/Humi : 21 °C 40 % R.H.
Operator :

Memo :

LIMIT : FCC Part15 Subpart.B Class B (3m)
MARGIN: 3 dB



RADIATED EMISSION

Date : 2012-06-25

Model Name : 42LM3700-UC
Model No. :
Serial No. :
Test Condition : USB

Reference No. :
Power Supply : 120 V 60 Hz
Temp/Humi : 21 °C 40 % R.H.
Operator :

Memo :

LIMIT : FCC Part15 Subpart.B Class B (3m)
MARGIN: 3 dB

No.	FREQ [MHz]	READING QP [dBuV]	ANT FACTOR [dB]	LOSS [dB]	GAIN [dB]	RESULT [dBuV/m]	LIMIT [dBuV/m]	MARGIN [dB]	ANTENNA [cm]	TABLE [DEG]
----- Horizontal -----										
1	71.971	38.3	6.7	1.7	22.7	24.0	40.0	16.0	286	1
2	155.914	38.6	10.2	1.8	23.1	27.5	43.5	16.0	185	358
3	255.401	37.6	12.4	2.6	23.6	29.0	46.0	17.0	132	1
4	656.458	38.6	18.8	4.2	24.5	37.1	46.0	8.9	103	217
5	737.292	33.2	19.3	4.6	24.0	33.1	46.0	12.9	391	358
----- Vertical -----										
6	34.663	38.5	16.2	1.1	23.1	32.7	40.0	7.3	103	358
7	78.189	41.3	7.1	1.6	22.8	27.2	40.0	12.8	136	342
8	213.430	37.3	10.0	2.4	23.4	26.3	43.5	17.2	232	1
9	645.577	36.9	18.8	4.2	24.5	35.4	46.0	10.6	336	0
10	735.738	32.3	19.3	4.6	24.0	32.2	46.0	13.8	126	0

< USB MODE _ (1 ~ 6) GHz _ Peak >

RADIATED EMISSION

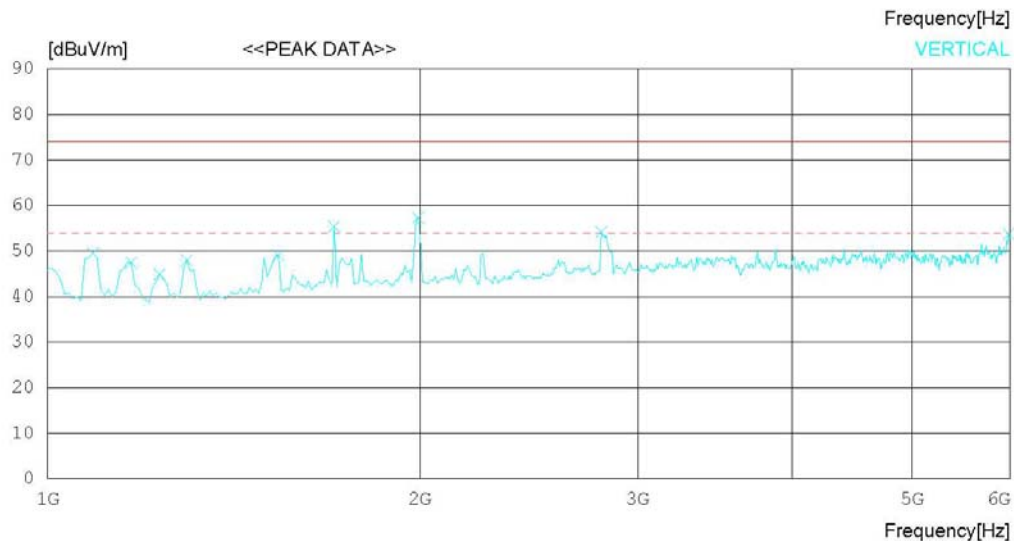
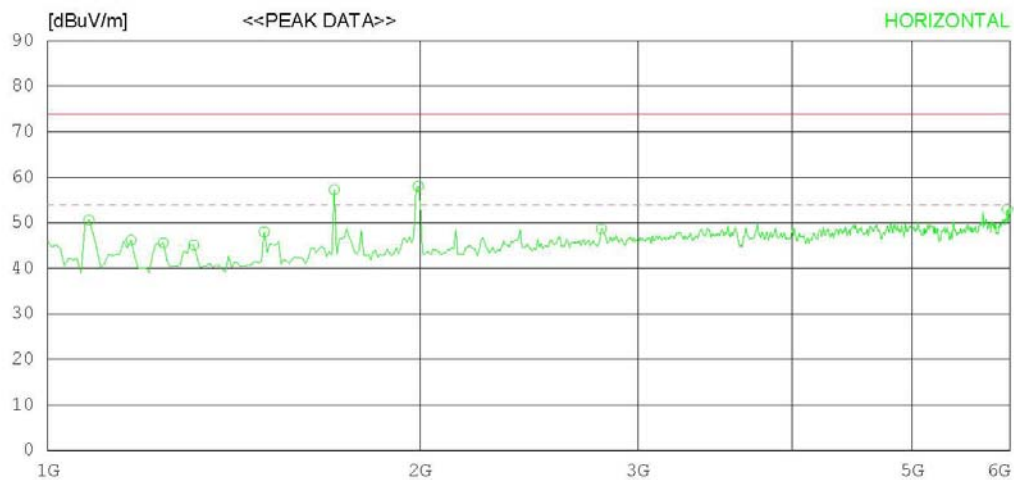
Date : 2012-06-25

Model Name : 42LM3700-UC
Model No. :
Serial No. :
Test Condition : USB

Reference No. :
Power Supply : 120 V 60 Hz
Temp/Humi : 21 'C 40 % R.H.
Operator :

Memo :

LIMIT : FCC Part15 Subpart.B Class B (3m) - 18G(Peak)
FCC Part15 Subpart.B Class B (3m) - 18G(Avg)



RADIATED EMISSION

Date : 2012-06-25

Model Name : 42LM3700-UC	Reference No. :
Model No. :	Power Supply : 120 V 60 Hz
Serial No. :	Temp/Humi : 21 °C 40 % R.H.
Test Condition : USB	Operator :

Memo :

LIMIT : FCC Part15 Subpart B Class B (3m) - 18G(Peak)
FCC Part15 Subpart B Class B (3m) - 18G(Avg)

No.	FREQ [MHz]	READING PEAK [dBuV]	ANT FACTOR [dB]	LOSS [dB]	GAIN [dB]	RESULT [dBuV/m]	LIMIT [dBuV/m]	MARGIN [dB]	ANTENNA [cm]	TABLE [DEG]
----- Horizontal -----										
1	1080.128	62.9	24.5	5.0	41.8	50.6	74.0	23.4	100	229
2	1168.269	58.0	24.9	5.2	41.9	46.2	74.0	27.8	100	238
3	1240.385	56.9	25.1	5.4	41.8	45.6	74.0	28.4	100	1
4	1312.500	56.0	25.4	5.5	41.8	45.1	74.0	28.9	100	1
5	1496.795	57.6	26.1	5.9	41.6	48.0	74.0	26	100	1
6	1705.128	65.7	26.9	6.4	41.7	57.3	74.0	16.7	100	145
7	1993.589	64.8	27.9	7.0	41.7	58.0	74.0	16	100	212
8	2802.896	52.4	29.6	8.4	41.7	48.7	74.0	25.3	100	1
9	5967.950	48.3	34.3	12.5	42.1	53.0	74.0	21	100	359
----- Vertical -----										
10	1088.141	61.7	24.6	5.0	41.8	49.5	74.0	24.5	100	162
11	1168.269	59.3	24.9	5.2	41.9	47.5	74.0	26.5	100	358
12	1232.372	56.3	25.1	5.3	41.8	44.9	74.0	29.1	100	358
13	1296.474	58.9	25.3	5.5	41.8	47.9	74.0	26.1	100	172
14	1536.859	58.5	26.2	6.0	41.6	49.1	74.0	24.9	100	269
15	1705.128	63.8	26.9	6.4	41.7	55.4	74.0	18.6	100	358
16	1993.589	64.1	27.9	7.0	41.7	57.3	74.0	16.7	100	358
17	2802.896	57.9	29.6	8.4	41.7	54.2	74.0	19.8	100	207
18	5983.975	49.0	34.3	12.5	42.1	53.7	74.0	20.3	100	351

< USB MODE _ (1 ~ 6) GHz _ Average >

RADIATED EMISSION

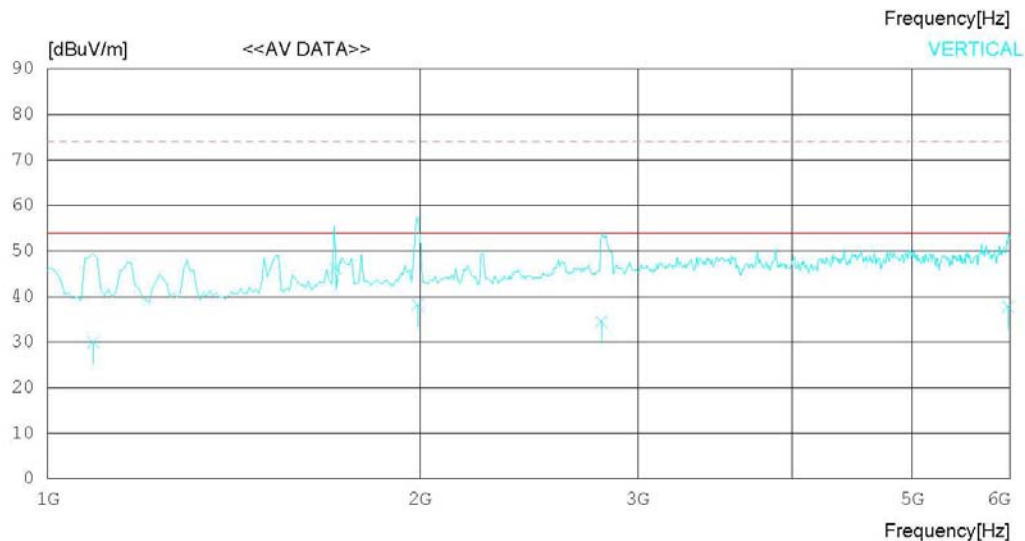
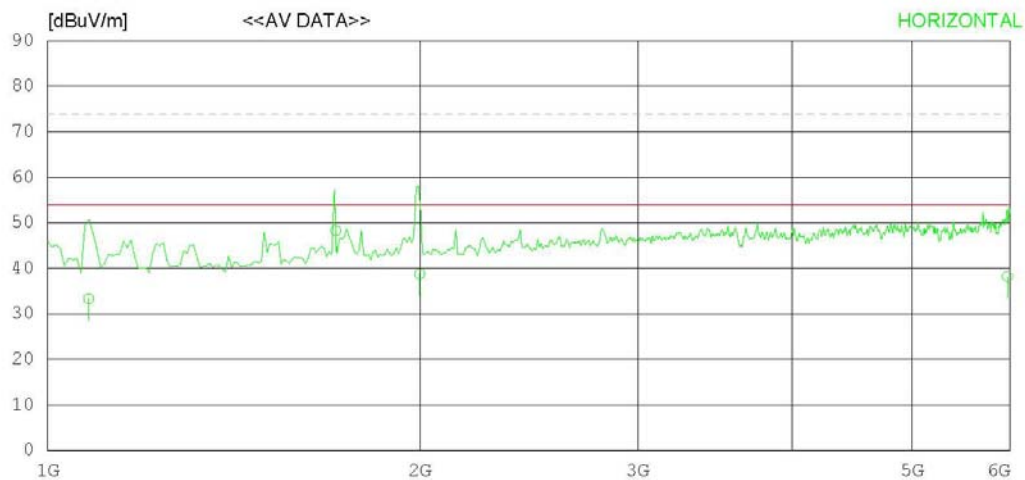
Date : 2012-06-25

Model Name : 42LM3700-UC
Model No. :
Serial No. :
Test Condition : USB

Reference No. :
Power Supply : 120 V 60 Hz
Temp/Humi : 21 'C 40 % R.H.
Operator :

Memo :

LIMIT : FCC Part15 Subpart.B Class B (3m) - 18G(Avg)
FCC Part15 Subpart.B Class B (3m) - 18G(Peak)



RADIATED EMISSION

Date : 2012-06-25

Model Name : 42LM3700-UC	Reference No. :
Model No. :	Power Supply : 120 V 60 Hz
Serial No. :	Temp/Humi : 21 'C 40 % R.H.
Test Condition : USB	Operator :

Memo :

LIMIT : FCC Part15 Subpart B Class B (3m) - 18G(Avg)
FCC Part15 Subpart B Class B (3m) - 18G(Peak)

No.	FREQ [MHz]	READING AV [dBuV]	ANT FACTOR [dB]	LOSS [dB]	GAIN [dB]	RESULT [dBuV/m]	LIMIT [dBuV/m]	MARGIN [dB]	ANTENNA [cm]	TABLE [DEG]
----- Horizontal -----										
1	1080.003	45.6	24.5	5.0	41.8	33.3	54.0	20.7	100	201
2	1709.999	56.7	26.9	6.4	41.7	48.3	54.0	5.7	100	230
3	1998.429	45.5	28.0	7.0	41.7	38.8	54.0	15.2	100	249
4	5968.303	33.5	34.3	12.5	42.1	38.2	54.0	15.8	100	235
----- Vertical -----										
5	1088.505	42.2	24.6	5.0	41.8	30.0	54.0	24.0	100	169
6	1709.807	54.6	26.9	6.4	41.7	46.2	54.0	7.8	100	189
7	1991.717	44.9	27.9	7.0	41.7	38.1	54.0	15.9	100	195
8	2802.801	38.2	29.6	8.4	41.7	34.5	54.0	19.5	100	168
9	5975.788	33.1	34.3	12.5	42.1	37.8	54.0	16.2	100	201

Appendix 1

List of Test and Measurement Instruments

To facilitate inclusion on each page of the test equipment used for related tests, each item of test equipment is identified by the Test Laboratory.

1. Conducted Disturbance

Name of Instrument	Model No.	Manufacturer	Serial No.	Cal. Date	Next Cal. Date
☒ SPECTRUM ANALYZER	8591E	H/P	3649A05889	2012.03.05	2013.03.05
☒ RFI/FIELD INTENSITY METER	KNM-2402	KYORITSU	4N-170-3	2011.07.02	2012.07.02
☒ LISN	KNW-407	KYORITSU	8-317-8	2012.01.09	2013.01.09
☒ LISN	PMM L2-16B	NARDA S.T.S. / PMM	000WX20305	2011.09.19	2012.09.19
☒ ATTENUATOR	CFA-10BPJ-10	TAMAGAWA ELECTRONICS	1760307E	N/A	N/A
☒ 50 OHM TERMINATOR	CT-01	TME	N/A	2012.01.09	2013.01.09
☐ EMI TEST RECEIVER	ESCI	ROHDE & SCHWARZ	100364	2012.03.06	2013.03.06
☐ LISN	ESH2-Z5	ROHDE & SCHWARZ	828739/006	2011.09.30	2012.09.30
☐ LISN	LISN1600	TTI	197204	2011.07.02	2012.07.02
☐ 50 OHM TERMINATOR	CT-01	TME	N/A	2012.01.09	2013.01.09

2. Radiated Disturbance

Name of Instrument	Model No.	Manufacturer	Serial No.	Cal. Date	Next Cal. Date
☒ EMI TEST RECEIVER	ESU	ROHDE & SCHWARZ	100014	2012.01.09	2013.01.09
☒ BILOG ANTENNA	CBL6112D	SCHAFFNER	22609	2010.12.21	2012.12.21
☒ HORN ANTENNA	BBHA9120A	SCHWARZBECK	322	2012.05.15	2014.05.15
☒ AMPLIFIER	8447E	H/P	2945A02865	2012.01.09	2013.01.09
☒ AMPLIFIER	MLA-00108-B02-36	TSJ	1518831	2012.01.09	2013.01.09
☐ SPECTRUM ANALYZER	E4411B	AGILENT	US41062735	2011.07.11	2012.07.11
☐ AMPLIFIER	8447D	AGILENT	2443A03690	2011.07.01	2012.07.01
☐ BILOG ANTENNA	VULB9160	SCHAFFNER	3151	2010.08.25	2012.08.25
☐ EMI TEST RECEIVER	ESCI	ROHDE & SCHWARZ	100364	2012.03.06	2013.03.06
☐ BICONICAL ANT.	VHA 9103	SCHWARZBECK	91032789	2010.11.29	2012.11.29
☐ LOG-PERIODIC ANT.	UHALP 9108A	SCHWARZBECK	590	2010.07.07	2012.07.07
☐ BICONICAL ANT.	VHA 9103	SCHWARZBECK	91031946	2010.12.21	2012.12.21
☐ LOG-PERIODIC ANT.	UHALP 9108-A1	SCHWARZBECK	1098	2010.11.29	2012.11.29
☐ AMPLIFIER	MLA-100K01-B01-26	TSJ	1252741	2012.03.05	2013.03.05