Report No: CCISE190512304

# **FCC REPORT**

**Applicant:** Autel Intelligent Technology Corp., Ltd.

Address of Applicant: 7th-8th, 10th Floor, Bldg. B1, Zhiyuan, Xueyuan Rd., Xili,

Nanshan, Shenzhen, China

**Equipment Under Test (EUT)** 

Product Name: ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM

Model No.: MaxiSys Ultra

Trade mark: AUTEL

FCC ID: WQ8MAXISYSULTRA

Applicable standards: FCC CFR Title 47 Part 15 Subpart B

Date of sample receipt: 23 May., 2019

**Date of Test:** 24 May., to 23 Sep., 2019

Date of report issued: 24 Sep., 2019

Test Result: PASS \*

### Authorized Signature:



Bruce Zhang Laboratory Manager

This report details the results of the testing carried out on one sample. The results contained in this test report do not relate to other samples of the same product and does not permit the use of the CCIS product certification mark. The manufacturer should ensure that all products in series production are in conformity with the product sample detailed in this report.

This report may only be reproduced and distributed in full. If the product in this report is used in any configuration other than that detailed in the report, the manufacturer must ensure the new system complies with all relevant standards.

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<sup>\*</sup> In the configuration tested, the EUT complied with the standards specified above.





# 2 Version

Version No.	Date	Description
00	24 Sep., 2019	Original

**Tested by:** Date: 24 Sep., 2019

Test Engineer

Reviewed by: Date: 24 Sep., 2019

Project Engineer

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# 4 Test Summary

Test Item	Section in CFR 47	Result
Conducted Emission	Part 15.107	Pass
Radiated Emission	Part 15.109	Pass

Remark:

Pass: The EUT complies with the essential requirements in the standard.

N/A: The EUT not applicable of the test item.





# **General Information**

# 5.1 Client Information

Applicant:	Autel Intelligent Technology Corp., Ltd.
Address:	7th-8th, 10th Floor, Bldg. B1, Zhiyuan, Xueyuan Rd., Xili, Nanshan, Shenzhen, China
Manufacturer:	Autel Intelligent Technology Corp., Ltd.
Address:	7th-8th, 10th Floor, Bldg. B1, Zhiyuan, Xueyuan Rd., Xili, Nanshan, Shenzhen, China
Factory1:	Autel Intelligent Technology Corp., Ltd.
Address:	6th Floor, Building 1,Yanxiang Zhigu, NO.11 Gaoxin West Rd, Guangming New District, Shenzhen City, Guangdong Province, China.
Factory2:	AUTEL VIETNAM COMPANY LIMITED
Address:	4th Floor, Factory#6, Land#CN1, An Duong Industrial Zone, Hong Phong Township, An Duong County, Hai Phong, VietNam

# 5.2 General Description of E.U.T.

Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM
Model No.:	MaxiSys Ultra
Power supply:	Rechargeable Li-ion Battery DC3.8V, 18000mAh
AC adapter :	Adapter 1:  Model: GME36A-120300FDS Input: 100-240V, 50/60Hz, 1.2A Output: 12V, 3A Adapter 2: Model: A361-1203000DI Input: 100-240V, 50/60Hz, 1.5A Output:12V,3000mA Adapter 3: Model: J361-1203000DI Input: 100-240V, 50/60Hz, 1.5A Output:12V,3000mA
Test Sample Condition:  The test samples were provided in good working order with visible defects.	

# 5.3 Test Mode

Operating mode	Detail description
PC mode	Keep the EUT in U disk data transmission mode Keep the EUT in TF card data transmission mode
Charging+Recording mode	Keep the EUT in Charging+Recording+HDMI Output mode
Charging+Recording mode	Keep the EUT in Charging+Recording+ mode
Charging+Playing mode	Keep the EUT in Charging+Playing+HDMI Output mode
Charging+Playing mode	Keep the EUT in Charging+Playing mode
GPS mode	Keep the EUT in GPS receiver mode

The sample was placed 0.8m above the ground plane of 3m chamber. Measurements in both horizontal and vertical polarities were performed. During the test, each emission was maximized by: having the EUT continuously working, investigated all operating modes, rotated about all 3 axis (X, Y & Z) and considered

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Report No: CCISE190512304

typical configuration to obtain worst position, manipulating interconnecting cables, rotating the turntable, varying antenna height from 1m to 4m in both horizontal and vertical polarizations. The emissions worst-case are shown in Test Results of the following pages.

# 5.4 Measurement Uncertainty

Parameters	Expanded Uncertainty
Conducted Emission (9kHz ~ 30MHz)	±1.60 dB (k=2)
Radiated Emission (9kHz ~ 30MHz)	±3.12 dB (k=2)
Radiated Emission (30MHz ~ 1000MHz)	±4.32 dB (k=2)
Radiated Emission (1GHz ~ 18GHz)	±5.38 dB (k=2)
Radiated Emission (18GHz ~ 40GHz)	±3.36 dB (k=2)

# 5.5 Description of Support Units

Manufacturer	Description	Model	S/N	FCC ID/DoC
MERCURY	Wireless router	MW150R	12922104015	FCC ID
NAKAMICHI	Bluetooth earphone	Т8	N/A	FCC ID
Skyworth	Color LCD TV	24E12HR	K026709	N/A
Kingston	U disk	16GB	N/A	N/A
SanDisk	TF memory card	16GB	N/A	N/A

# 5.6 Related Submittal(s) / Grant (s)

This is an original grant, no related submittals and grants.

# 5.7 Description of Cable Used

Cable Type	Description	Length	From	То
Power Adapter	shielded	1.5m	EUT	Adapter

# 5.8 Laboratory Facility

The test facility is recognized, certified, or accredited by the following organizations:

#### FCC - Designation No.: CN1211

Shenzhen Zhongjian Nanfang Testing Co., Ltd. has been accredited as a testing laboratory by FCC(Federal Communications Commission). The test firm Registration No. is 727551.

#### • ISED - CAB identifier.: CN0021

The 3m Semi-anechoic chamber of Shenzhen Zhongjian Nanfang Testing Co., Ltd. has been Registered by Certification and Engineering Bureau of Industry Canada for radio equipment testing with Registration No.: 10106A-1.

#### CNAS - Registration No.: CNAS L6048

Shenzhen Zhongjian Nanfang Testing Co., Ltd. is accredited to ISO/IEC 17025:2005 General Requirements for the Competence of Testing and Calibration laboratories for the competence of testing. The Registration No. is CNAS L6048.

#### A2LA - Registration No.: 4346.01

This laboratory is accredited in accordance with the recognized International Standard ISO/IEC 17025:2005 General requirements for the competence of testing and calibration laboratories. The test scope can be found as below link: <a href="https://portal.a2la.org/scopepdf/4346-01.pdf">https://portal.a2la.org/scopepdf/4346-01.pdf</a>

# 5.9 Laboratory Location

Shenzhen Zhongjian Nanfang Testing Co., Ltd.

Address: No. B-C, 1/F., Building 2, Laodong No.2 Industrial Park, Xixiang Road,

Bao'an District, Shenzhen, Guangdong, China

Shenzhen Zhongjian Nanfang Testing Co., Ltd.

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Email: info@ccis-cb.com, Website: http://www.ccis-cb.com

# 5.10 Test Instruments list

Radiated Emission:					
Test Equipment	Manufacturer	Model No.	Serial No.	Cal. Date (mm-dd-yy)	Cal. Due date (mm-dd-yy)
3m SAC	SAEMC	9m*6m*6m	966	07-22-2017	07-21-2020
Loop Antenna	SCHWARZBECK	FMZB1519B	00044	03-18-2019	03-17-2020
BiConiLog Antenna	SCHWARZBECK	VULB9163	497	03-18-2019	03-17-2020
Horn Antenna	SCHWARZBECK	BBHA9120D	916	03-18-2019	03-17-2020
Horn Antenna	SCHWARZBECK	BBHA9120D	1805	06-22-2017	06-21-2020
Horn Antenna	SCHWARZBECK	BBHA 9170	BBHA9170582	11-21-2018	11-20-2019
EMI Test Software	AUDIX	E3	\	/ersion: 6.110919	b
Pre-amplifier	HP	8447D	2944A09358	03-18-2019	03-17-2020
Pre-amplifier	CD	PAP-1G18	11804	03-18-2019	03-17-2020
Spectrum analyzer	Rohde & Schwarz	FSP30	101454	03-18-2019	03-17-2020
Spectrum analyzer	Rohde & Schwarz	FSP40	100363	11-21-2018	11-20-2019
EMI Test Receiver	Rohde & Schwarz	ESRP7	101070	03-18-2019	03-17-2020
Cable	ZDECL	Z108-NJ-NJ-81	1608458	03-18-2019	03-17-2020
Cable	MICRO-COAX	MFR64639	K10742-5	03-18-2019	03-17-2020
Cable	SUHNER	SUCOFLEX100	58193/4PE	03-18-2019	03-17-2020

Conducted Emission:					
Test Equipment	Manufacturer	Model No.	Serial No.	Cal. Date (mm-dd-yy)	Cal. Due date (mm-dd-yy)
EMI Test Receiver	Rohde & Schwarz	ESCI	101189	03-18-2019	03-17-2020
Pulse Limiter	SCHWARZBECK	OSRAM 2306	9731	03-18-2019	03-17-2020
LISN	CHASE	MN2050D	1447	03-18-2019	03-17-2020
LION	Dahda & Cahusara	F0110.75	0.4200204/040	07-21-2018	07-20-2019
LISN	Rohde & Schwarz	ESH3-Z5	8438621/010	07-21-2019	07-20-2020
Cable	HP	10503A	N/A	03-18-2019	03-17-2020
EMI Test Software	AUDIX	E3	Version: 6.110919b		



# 6 Test results and Measurement Data

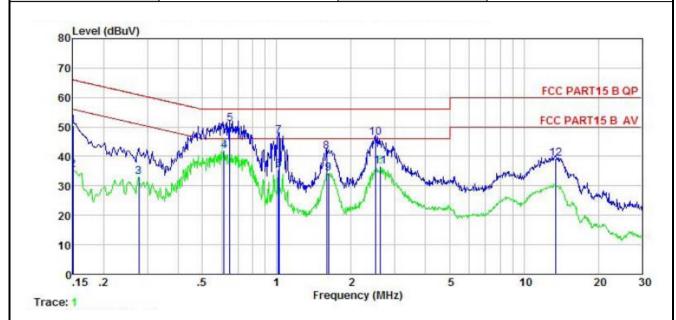
# **6.1 Conducted Emission**

Test Requirement:	ECC Part 15 P Section 15 10	7			
•	FCC Part 15 B Section 15.107				
Test Method:		ANSI C63.4:2014			
Test Frequency Range:	150kHz to 30MHz				
Class / Severity:	Class B				
Receiver setup:	RBW=9kHz, VBW=30kHz				
Limit:	Frequency range (MHz)		(dBµV)		
	. , ,	Quasi-peak	Average		
	0.15-0.5	66 to 56*	56 to 46*		
	0.5-5	56	46		
	0.5-30	60	50		
Tank ankimi	* Decreases with the logarith	· · · · · ·			
Test setup:	Reference Plan		_		
	AUX Filter AC power  Equipment E.U.T  Test table/Insulation plane  Remark  E.U.T. Equipment Under Test  L/SN: Line Impedence Stabilization Network  Test table height=0.8m				
Test procedure	<ol> <li>The E.U.T and simulators are connected to the main power through a line impedance stabilization network(L.I.S.N.). The provide a 50ohm/50uH coupling impedance for the measuring equipment.</li> <li>The peripheral devices are also connected to the main power through a LISN that provides a 50ohm/50uH coupling impedance with 50ohm termination. (Please refers to the block diagram of the test setup and photographs).</li> <li>Both sides of A.C. line are checked for maximum conducted interference. In order to find the maximum emission, the relative positions of equipment and all of the interface cables must be changed according to ANSI C63.4: 2014 on conducted measurement.</li> </ol>				
Test Instruments:	Refer to section 5.10 for details				
Test mode:	Refer to section 5.3 for details				
Test results:	Pass				



# Measurement data(For Adapter 1):

Product name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product model:	MaxiSys Ultra		
Test by:	YT	Test mode:	PC mode		
Test frequency:	150 kHz ~ 30 MHz	Phase:	Line		
Test voltage:	AC 120 V/60 Hz	Environment:	Temp: 22.5℃ Huni: 55%		



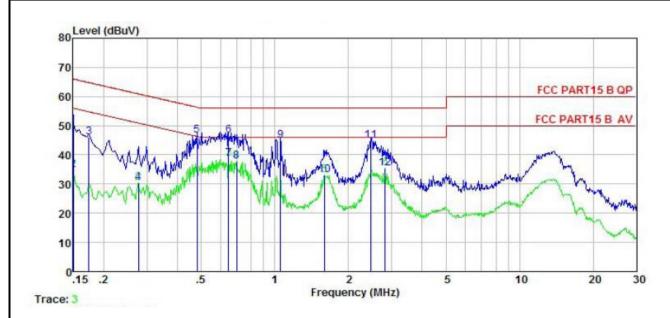
	Freq	Read Level	LISN Factor	Cable Loss	Level	Limit Line	Over Limit	Remark
-	MHz	dBu∀	₫B	₫B	dBu₹	dBu₹	<u>d</u> B	
1	0.150	40.15	-0.45	10.78	50.48	66.00	-15.52	QP
1 2 3 4 5 6 7 8 9	0.150	25.14	-0.45	10.78	35.47	56.00	-20.53	Average
3	0.277	22.62	-0.39	10.74	32.97	50.90	-17.93	Average
4	0.614	31.51	-0.38	10.77	41.90	46.00	-4.10	Average
5	0.647	40.63	-0.38	10.77	51.02	56.00	-4.98	QP
6	1.016	25.06	-0.38	10.87	35.55	46.00	-10.45	Average
7	1.021	36.54	-0.38	10.87	47.03	56.00	-8.97	QP
8	1.593	31.24	-0.40	10.93	41.77	56.00	-14.23	QP
9	1.619	23.76	-0.40	10.93	34.29	46.00	-11.71	Average
10	2.500	35.85	-0.43	10.94	46.36	56.00	-9.64	
11	2.636	26.02	-0.43	10.93	36.52	46.00		Average
12	13.408	29.00	-0.66	10.91	39.25		-20.75	

#### Notes

- 1. An initial pre-scan was performed on the line and neutral lines with peak detector.
- 2. Quasi-Peak and Average measurement were performed at the frequencies with maximized peak emission.
- 3. Final Level =Receiver Read level + LISN Factor + Cable Loss.



Product name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product model:	MaxiSys Ultra		
Test by:	YT	Test mode:	PC mode		
Test frequency:	150 kHz ~ 30 MHz	Phase:	Neutral		
Test voltage:	AC 120 V/60 Hz	Environment:	Temp: 22.5℃ Huni: 55%		



	Freq	Read Level	LISN Factor	Cable Loss	Level	Limit Line	Over Limit	Remark
	MHz	dBu∀	dB	dB	dBu∜	dBu∀	<u>d</u> B	
1	0.150	40.14	-0.68	10.78	50.24	66.00	-15.76	QP
2	0.150	24.60	-0.68	10.78	34.70	56.00	-21.30	Average
3	0.174	36.01	-0.69	10.77	46.09	64.77	-18.68	QP
4	0.277	20.36	-0.64		30.46			Average
5	0.481	36.48	-0.65		46.58	56.32		
1 2 3 4 5 6 7 8 9	0.647	36.66	-0.64	10.77	46.79	56.00	-9.21	QP
7	0.647	28.56	-0.64	10.77	38.69			Average
8	0.697	27.67	-0.64	10.77	37.80	46.00		Average
9	1.054	34.66	-0.63	10.88	44.91		-11.09	
10	1.602	22.89	-0.66	10.93	33.16			Average
11	2.461	34.59	-0.67	10.94	44.86		-11.14	
12	2.824	25.17	-0.67	10.93	35.43			Average

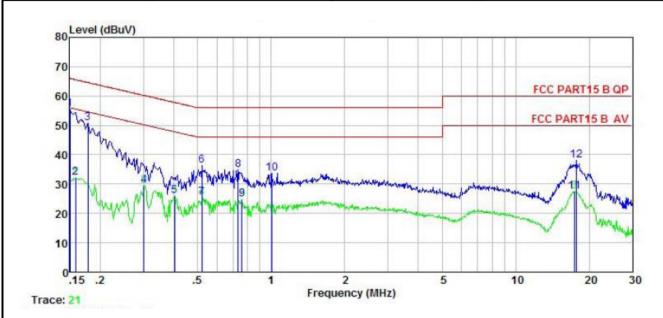
### Notes:

- 1. An initial pre-scan was performed on the line and neutral lines with peak detector.
- 2. Quasi-Peak and Average measurement were performed at the frequencies with maximized peak emission.
- 3. Final Level =Receiver Read level + LISN Factor + Cable Loss.



# Measurement data(For Adapter 2):

Product name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product model:	MaxiSys Ultra
Test by:	YT	Test mode:	PC mode
Test frequency:	150 kHz ~ 30 MHz	Phase:	Line
Test voltage:	AC 120 V/60 Hz	Environment:	Temp: 22.5℃ Huni: 55%



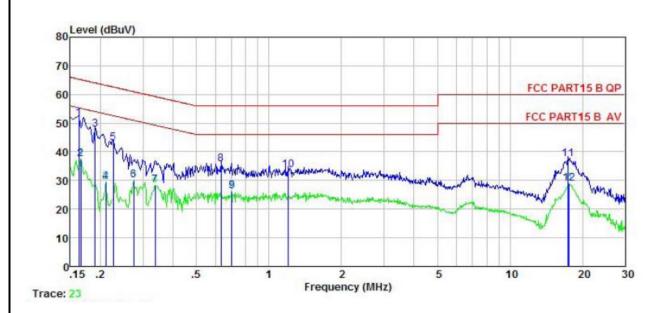
	Freq	Read Level	LISN Factor	Cable Loss	Level	Limit Line	Over Limit	Remark
	MHz	dBu∀	<u>d</u> B	₫B	dBu∀	dBu∜	<u>d</u> B	
1	0.150	45.16	-0.45	10.78	55.49	66.00	-10.51	QP
2	0.158	21.86	-0.44	10.77	32.19	55.56	-23.37	Average
3	0.178	40.34	-0.43	10.77	50.68		-13.91	
4	0.302	19.31	-0.39	10.74	29.66			Average
1 2 3 4 5 6 7 8 9	0.402	15.63	-0.37	10.72	25.98			Average
6	0.521	25.99	-0.39	10.76	36.36		-19.64	
7	0.521	15.10	-0.39	10.76	25.47			Average
8	0.731	24.43	-0.38	10.78	34.83		-21.17	
9	0.759	14.43	-0.38	10.80	24.85			Average
10	1.005	23.30	-0.38	10.87	33.79		-22.21	
11	17.383	17.47	-0.83	10.92	27.56			Average
12	17.755	28.03	-0.85	10.92	38.10		-21.90	

#### Notes

- 1. An initial pre-scan was performed on the line and neutral lines with peak detector.
- 2. Quasi-Peak and Average measurement were performed at the frequencies with maximized peak emission.
- 3. Final Level =Receiver Read level + LISN Factor + Cable Loss.



Product name:	150 kHz ~ 30 MHz	Product model:	MaxiSys Ultra		
Test by:	YT	Test mode:	PC mode		
Test frequency:	150 kHz ~ 30 MHz	Phase:	Neutral		
Test voltage:	AC 120 V/60 Hz	Environment:	Temp: 22.5℃ Huni: 55%		



	Freq	Read Level	LISN Factor	Cable Loss	Level	Limit Line	Over Limit	Remark
-	MHz	dBu∀	₫₿	dB	dBu∜	dBu∜	<u>d</u> B	
1	0.162	41.44	-0.68	10.77	51.53	65.34	-13.81	QP
2	0.166	27.39	-0.68	10.77	37.48	55.16	-17.68	Average
3	0.190	37.72	-0.69	10.76	47.79	64.02	-16.23	QP
4	0.211	19.35	-0.68	10.76	29.43	53.18	-23.75	Average
5	0.226	33.06	-0.67	10.75	43.14	62.61	-19.47	QP
6	0.274	20.02	-0.64	10.74	30.12	50.98	-20.86	Average
7	0.337	18.15	-0.63	10.73	28.25			Average
8	0.634	25.63	-0.64	10.77	35.76		-20.24	
1 2 3 4 5 6 7 8 9	0.701	16.21	-0.64	10.77	26.34			Average
10	1.197	23.53	-0.64	10.89	33.78		-22.22	
11	17.383	27.56	-1.12	10.92	37.36		-22.64	
12	17.568	19.05	-1.14	10.92	28.83			Average

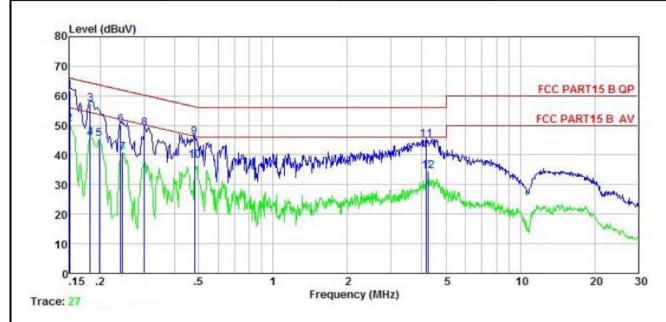
### Notes:

- 1. An initial pre-scan was performed on the line and neutral lines with peak detector.
- 3. Quasi-Peak and Average measurement were performed at the frequencies with maximized peak emission.
- 3. Final Level =Receiver Read level + LISN Factor + Cable Loss.



# Measurement data(For Adapter 3):

Product name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product model:	MaxiSys Ultra
Test by:	YT	Test mode:	PC mode
Test frequency:	150 kHz ~ 30 MHz	Phase:	Line
Test voltage:	AC 120 V/60 Hz	Environment:	Temp: 22.5°C Huni: 55%



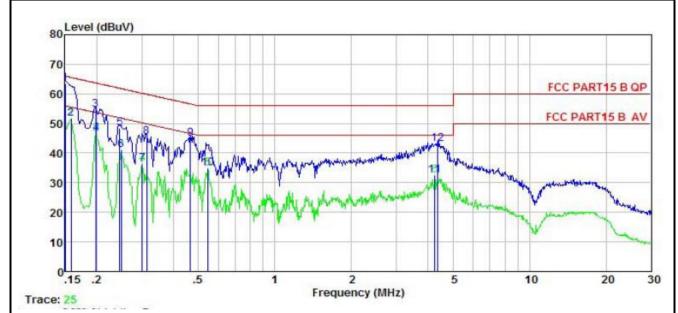
	Freq	Read Level	LISN Factor	Cable Loss	Level	Limit Line	Over Limit	Remark
	MHz	dBu∀	<u>d</u> B	dB	dBu₹	dBu∀	<u>dB</u>	
1	0.150	51.43	-0.45	10.78	61.76	66.00	-4.24	QP
2	0.150	40.07	-0.45	10.78	50.40	56.00	-5.60	Average
3	0.182	46.83	-0.42	10.77	57.18	64.42	-7.24	QP
4	0.182	35.44	-0.42	10.77	45.79	54.42	-8.63	Average
5	0.198	35.06	-0.41	10.76	45.41	53.71		Average
1 2 3 4 5 6 7 8 9	0.242	39.86	-0.40	10.75	50.21	62.04	-11.83	QP
7	0.246	30.30	-0.40	10.75	40.65	51.91	-11.26	Average
8	0.302	38.68	-0.39	10.74	49.03	60.19	-11.16	QP
9	0.481	35.60	-0.39	10.75	45.96	56.32	-10.36	QP
10	0.481	27.87	-0.39	10.75	38.23	46.32	-8.09	Average
11	4.180	34.77	-0.47	10.88	45.18	56.00	-10.82	
12	4.247	24.11	-0.47	10.88	34.52			Average

#### Notes

- 1. An initial pre-scan was performed on the line and neutral lines with peak detector.
- 2. Quasi-Peak and Average measurement were performed at the frequencies with maximized peak emission.
- 3. Final Level = Receiver Read level + LISN Factor + Cable Loss.



Product name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product model:	MaxiSys Ultra
Test by:	YT	Test mode:	PC mode
Test frequency:	150 kHz ~ 30 MHz	Phase:	Neutral
Test voltage:	AC 120 V/60 Hz	Environment:	Temp: 22.5℃ Huni: 55%



	Freq	Read Level	LISN Factor	Cable Loss	Level	Limit Line	Over Limit	Remark
-	MHz	dBu∜	₫B	₫B	dBu₹	dBu∜	<u>d</u> B	
1	0.150	53.35	-0.68	10.78	63.45	66.00	-2.55	QP
1 2 3 4 5 6 7 8 9	0.158	41.44	-0.68	10.77	51.53	55.56	-4.03	Average
3	0.198	44.59	-0.69	10.76	54.66	63.71	-9.05	QP
4	0.199	36.55	-0.69	10.76	46.62	53.67	-7.05	Average
5	0.246	38.44	-0.66	10.75	48.53	61.91	-13.38	QP
6	0.249	30.84	-0.66	10.75	40.93	51.78	-10.85	Average
7	0.302	26.07	-0.63	10.74	36.18			Average
8	0.313	35.48	-0.63	10.74	45.59	59.88	-14.29	QP
9	0.466	34.69	-0.65	10.75	44.79	56.58	-11.79	QP
10	0.546	24.87	-0.65	10.76	34.98	46.00	-11.02	Average
11	4.247	22.23	-0.70	10.88	32.41			Average
12	4.338	32.93	-0.71	10.88	43.10		-12.90	

### Notes:

- 1. An initial pre-scan was performed on the line and neutral lines with peak detector.
- 2. Quasi-Peak and Average measurement were performed at the frequencies with maximized peak emission.
- 3. Final Level =Receiver Read level + LISN Factor + Cable Loss.



# 6.2 Radiated Emission

6.2 Radiated Emission	1						
Test Requirement:	FCC Part 15 B Section 15.109						
Test Method:	ANSI C63.4:2014	1					
Test Frequency Range:	30MHz to 6000M	lHz					
Test site:	Measurement Dis	stance: 3m	(Sen	ni-Anechoic	Chamber)		
Receiver setup:	Frequency Detector			RBW	VBW	Remark	
·	30MHz-1GHz	Quasi-pe	eak	120kHz	300kHz	Quasi-peak Value	
	Above 1GHz	Peak		1MHz	3MHz	Peak Value	
		RMS	1.1.	1MHz	3MHz	Average Value	
Limit:	Frequenc		Lim	nit (dBuV/m	@3m)	Remark	
	30MHz-88N 88MHz-216I			40.0 43.5		Quasi-peak Value  Quasi-peak Value	
	216MHz-960			46.0		Quasi-peak Value  Quasi-peak Value	
	960MHz-10			54.0		Quasi-peak Value	
				54.0		Average Value	
	Above 1G	HZ		74.0		Peak Value	
Test setup:							
Test Procedure:	1. The EUT was placed on the top of a rotating table 0.8 meters above the ground at a 3 meter semi-anechoic camber. The table was rotated 360 degrees to determine the position of the highest radiation.  2. The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.  3. The antenna height is varied from one meter to four meters above the ground to determine the maximum value of the field strength. Both						





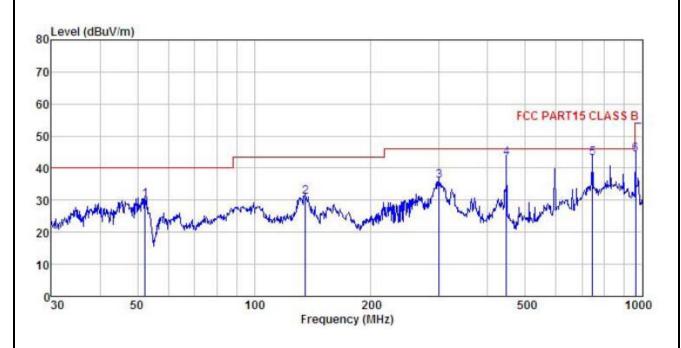
	horizontal and vertical polarizations of the antenna are set to make the measurement.
	4. For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights from 1 meter to 4 meters and the rotatable table was turned from 0 degrees to 360 degrees to find the maximum reading.
	<ol><li>The test-receiver system was set to Peak Detect Function and Specified Bandwidth with Maximum Hold Mode.</li></ol>
	6. If the emission level of the EUT in peak mode was 10dB lower than the limit specified, then testing could be stopped and the peak values of the EUT would be reported. Otherwise the emissions that did not have 10dB margin would be re-tested one by one using peak, quasi-peak or average method as specified and then reported in a data sheet.
Test Instruments:	Refer to section 5.10 for details
Test mode:	Refer to section 5.3 for details
Test results:	Passed
Remark:	All of the observed value above 6GHz ware the niose floor , which were no recorded



# Measurement Data(For Adapter 1):

# **Below 1GHz:**

Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product Model:	MaxiSys Ultra		
Test By:	YT	Test mode:	PC mode		
Test Frequency:	30 MHz ~ 1 GHz	Polarization:	Vertical		
Test Voltage:	AC 120/60Hz	Environment:	Temp: 24℃ Huni: 57%		



	Freq		Antenna Factor				Limit Line		
-	MHz	dBu∜	<u>dB</u> /m		dB	dBuV/m	dBuV/m	<u>dB</u>	
1	52.391	46.90	11.85	1.29	29.81	30.23	40.00	-9.77	QP
2 3	135.506	48.01	9.80	2.35	29.30	30.86	43.50	-12.64	QP
3	299.316	47.88	13.60	2.94	28.45	35.97	46.00	-10.03	QP
4	446.414	52.28	16.41	3.19	28.86	43.02	46.00	-2.98	QP
5	744.866	46.79	20.59	4.34	28.50	43.22	46.00	-2.78	QP
5	962.162	44.84	22.73	4.27	27.65	44.19	54.00	-9.81	QP

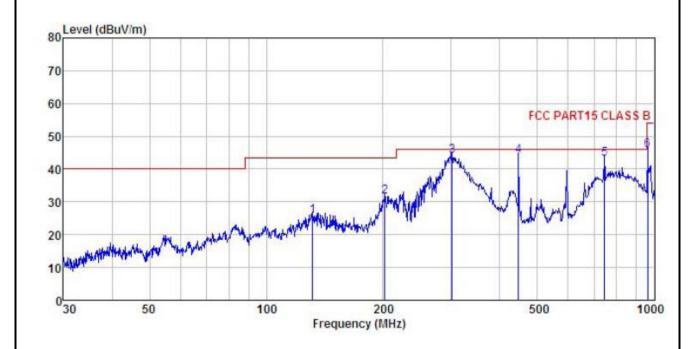
#### Remark:

<sup>1.</sup> Final Level = Receiver Read level + Antenna Factor + Cable Loss - Preamplifier Factor.

<sup>2.</sup> The emission levels of other frequencies are very lower than the limit and not show in test report.



Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product Model:	MaxiSys Ultra
Test By:	YT	Test mode:	PC mode
Test Frequency:	30 MHz ~ 1 GHz	Polarization:	Horizontal
Test Voltage:	AC 120/60Hz	Environment:	Temp: 24℃ Huni: 57%



			Ant enna				Limit		
	Freq	Level	Factor	Loss	Factor	Level	Line	Limit	Remark
	MHz	dBu₹	dB/m	dB	<u>dB</u>	dBu√/m	dBu∀/m	<u>dB</u>	
1	131.758	42.78	10.06	2.30	29.32	25.82	43.50	-17.68	QP
2	202.100	46.94	10.68	2.87	28.82	31.67	43.50	-11.83	QP
3	301.422	55.99	13.63	2.94	28.45	44.11	46.00	-1.89	QP
4 5	446.414	53.18	16.41	3.19	28.86	43.92	46.00	-2.08	QP
5	744.866	46.78	20.59	4.34	28.50	43.21	46.00	-2.79	QP
6	962.162	46.35	22.73	4.27	27.65	45.70	54.00	-8.30	QP

### Remark:

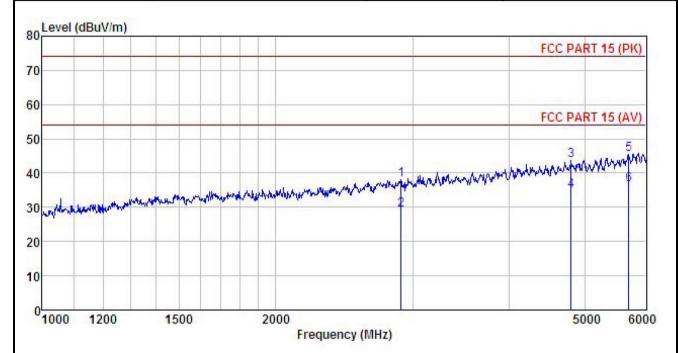
<sup>1.</sup> Final Level = Receiver Read level + Antenna Factor + Cable Loss - Preamplifier Factor.

<sup>2.</sup> The emission levels of other frequencies are very lower than the limit and not show in test report.



# **Above 1GHz:**

Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product Model:	MaxiSys Ultra		
Test By:	YT	Test mode:	PC mode		
Test Frequency:	1 GHz ~ 6 GHz	Polarization:	Vertical		
Test Voltage:	AC 120/60Hz	Environment:	Temp: 24℃ Huni: 57%		



	Freq		Intenna Factor				Limit Line	Over Limit	Remark
3	MHz	dBu₹	<u>dB</u> 7m		<u>а</u> Б	$\overline{dBuV/m}$	dBuV/m	<u>dB</u>	· <del></del>
1	2898.824	46.17	28. 29	5. 24	41.58	38.12	74.00	-35.88	Peak
2	2898.824	37.42	28. 29	5.24	41.58	29.37	54.00	-24.63	Average
3	4804.636	47.67	31.02	6.80	41.81	43.68	74.00	-30.32	Peak
4	4804.636	38.74	31.02	6.80	41.81	34.75	54.00	-19.25	Average
1 2 3 4 5 6	5696.195	47.11	32.64	7.60	41.90	45.45	74.00	-28.55	Peak
6	5696.195	38.23	32.64	7.60	41.90	36.57	54.00	-17.43	Average

#### Remark:

<sup>1.</sup> Final Level = Receiver Read level + Antenna Factor + Cable Loss - Preamplifier Factor.

<sup>2.</sup> The emission levels of other frequencies are very lower than the limit and not show in test report.



Product N	ame:		ED DIAGNO EMENT SY		F	Product Mo	odel:	MaxiSy	MaxiSys Ultra		MaxiSys Ultra			
Test By:		YT			Test mode:				PC mode			PC mode		
Test Frequ	uency:	1 GHz ~ 6	GHz		F	Polarization:			Horizontal					
Test Volta	ge:	AC 120/60	)Hz		E	Invironme	nt:	Temp:	Temp: 24℃ Huni: 57%					
Lovel	(dBuV/m)													
80	(dDdv/III)					Ţ.		F	CC PART 15	(PK)				
70										2 - 1 2-2				
60														
00								F	CC PART 15	(AV)				
50									5	7.471.40				
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00	hand on the property of	Land Mary Carles	Market Water	all was product	var fellowayer had now	and the same	MANA	1	The state of the s					
30	Carry Light Hay salar													
20														
10														
										22				
1000	1200	1500	2	000					5000	6000				
				Fred	luency (Mi	Hz)								
	55. u.f	ReadA	ntenna	Cable	Preamp		Limit	Over						
	Freq	Level	Factor	Loss	Factor	Level	Line	Limit	Remark					
3	MHz	dBu∀	dB/π	₫B	<u>ap</u>	$\overline{dBuV/m}$	$\overline{dBuV/m}$	dB	<del></del>					
1	2972.460	46.94	28.44	5.32				-34.83	Peak					
2	2972.460	37.66	28.44	5.32		29.89			Average					
3	4208.015	47.25	30.34	6.41				-31.81						
4	4208.015	38.45	30.34	6.41					Average					
5 6	5321.268 5321.268	47.71 38.37	32.18 32.18	7.10 7.10		45.09 35.75	74.00		Peak Average					
U	JJZ1. Z00	J0.J[	JZ. 10	1.10	41.20	JU. 10	04.00	10.20	vactage					

#### Remark

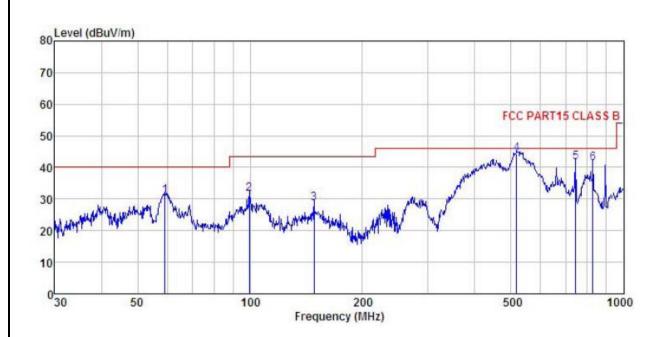
- 1. Final Level = Receiver Read level + Antenna Factor + Cable Loss Preamplifier Factor.
- 2. The emission levels of other frequencies are very lower than the limit and not show in test report.



# Measurement Data(For Adapter 2):

### **Below 1GHz:**

Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product Model:	MaxiSys Ultra		
Test By:	YT	Test mode:	PC mode		
Test Frequency:	30 MHz ~ 1 GHz	Polarization:	Vertical		
Test Voltage:	AC 120/60Hz	Environment:	Temp: 24℃ Huni: 57%		



	Freq		Antenna Factor						Remark
	MHz	dBu₹	<u>dB</u> /m	dB	dB	dBuV/m	dBuV/m	<u>d</u> B	
1	59.232	48.06	11.43	1.38	29.77	31.10	40.00	-8.90	QP
2	99.528	46.78	12.41	1.95	29.53	31.61	43.50	-11.89	QP
3	148.441	46.52	8.97	2.50	29.23	28.76	43.50	-14.74	QP
4	517.248	51.39	18.27	3.71	29.00	44.37	46.00	-1.63	QP
23456	744.866	45.24	20.59	4.34	28.50	41.67	46.00	-4.33	QP
6	827.493	42.95	22.13	4.26	28.09	41.25	46.00	-4.75	QP

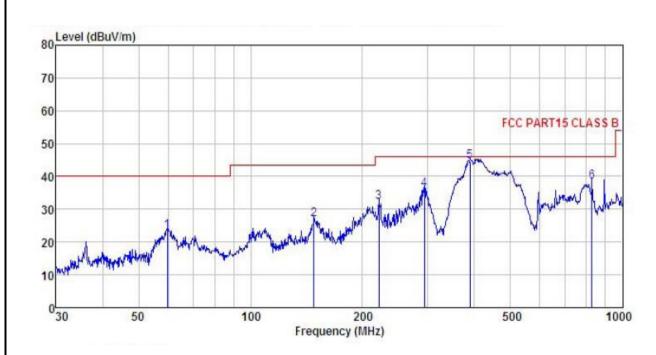
### Remark:

<sup>1.</sup> Final Level = Receiver Read level + Antenna Factor + Cable Loss - Preamplifier Factor.

<sup>2.</sup> The emission levels of other frequencies are very lower than the limit and not show in test report.



Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product Model:	MaxiSys Ultra		
Test By:	YT	Test mode:	PC mode		
Test Frequency:	30 MHz ~ 1 GHz	Polarization:	Horizontal		
Test Voltage:	AC 120/60Hz	Environment:	Temp: 24℃ Huni: 57%		



	Freq			ReadAntenna Cable Preamp Freq Level Factor Loss Factor			Limit		Remark
	MHz	dBu∜	dB/m	₫B	dB	dBu√/m	dBuV/m	dB	
1	59.649	40.17	11.41	1.38	29.77	23.19	40.00	-16.81	QP
2	147.921	44.66	9.01	2.50	29.23	26.94	43.50	-16.56	QP
3	221.392	46.45	11.55	2.84	28.70	32.14	46.00	-13.86	QP
4	293.084	48.15	13.50	2.92	28.46	36.11	46.00	-9.89	QP
5	389.355	55.01	15.15	3.08	28.73	44.51	46.00	-1.49	QP
6	827.493	39.93	22.13	4.26	28.09	38.23	46.00	-7.77	QP

# Remark:

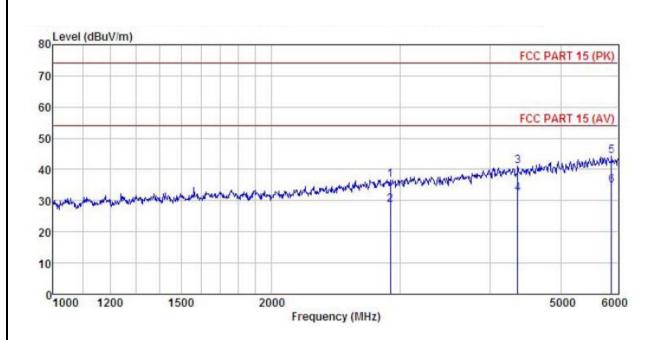
<sup>1.</sup> Final Level = Receiver Read level + Antenna Factor + Cable Loss - Preamplifier Factor.

<sup>2.</sup> The emission levels of other frequencies are very lower than the limit and not show in test report.



# **Above 1GHz:**

Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product Model:	MaxiSys Ultra		
Test By:	YT	Test mode:	PC mode		
Test Frequency:	1 GHz ~ 6 GHz	Polarization:	Vertical		
Test Voltage:	AC 120/60Hz	Environment:	Temp: 24°C Huni: 57%		



	Freq		Antenna Factor			Level	Limit Line	Over Limit	Remark
	MHz	dBu∜	-dB/m	₫B	dB	dBuV/m	dBuV/m	dB	
1	2914.448	44.57	28.33	5.26	41.57	36.59	74.00	-37.41	Peak
2	2914.448	36.70	28.33	5.26	41.57	28.72	54.00	-25.28	Average
3	4361.545	45.83	30.38	6.65	41.94	40.92	74.00	-33.08	Peak
4	4361.545	37.10	30.38	6.65	41.94	32.19	54.00	-21.81	Average
5	5872.370	45.66	32.67	7.90	42.03	44.20		-29.80	
6	5872.370	36.32	32.67	7.90	42.03	34.86			Average

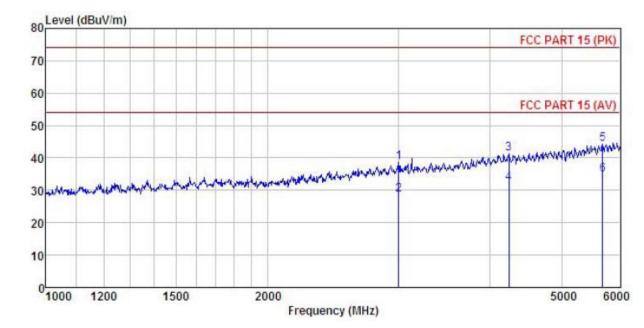
### Remark:

<sup>1.</sup> Final Level = Receiver Read level + Antenna Factor + Cable Loss - Preamplifier Factor.

<sup>2.</sup> The emission levels of other frequencies are very lower than the limit and not show in test report.



	JREMENT SYSTEM	Product Model:	MaxiSys Ultra		
Test By: YT		Test mode:	PC mode		
Test Frequency: 1 GHz	~ 6 GHz	Polarization:	Horizontal		
Test Voltage: AC 120	)/60Hz	Environment:	Temp: 24℃	Huni: 57%	



	Freq		Antenna Factor		Preamp Factor		Limit Line	Over Limit	Remark
	MHz	dBu₹	dB/m	₫B	₫B	dBuV/m	dBuV/m	<u>d</u> B	
1	3004.588	46.36	28.50	5.35	41.51	38.70	74.00	-35.30	Peak
2	3004.588	36.42	28.50	5.35	41.51	28.76	54.00	-25.24	Average
2	4238.283	46.37	30.35	6.47	41.84	41.35	74.00	-32.65	Peak
4	4238.283	37.29	30.35	6.47	41.84	32.27	54.00	-21.73	Average
5	5685.998	46.01	32.64	7.55	41.89	44.31	74.00	-29.69	Peak
6	5685.998	36.65	32.64	7.55	41.89	34.95	54.00	-19.05	Average

#### Remark:

<sup>1.</sup> Final Level = Receiver Read level + Antenna Factor + Cable Loss - Preamplifier Factor.

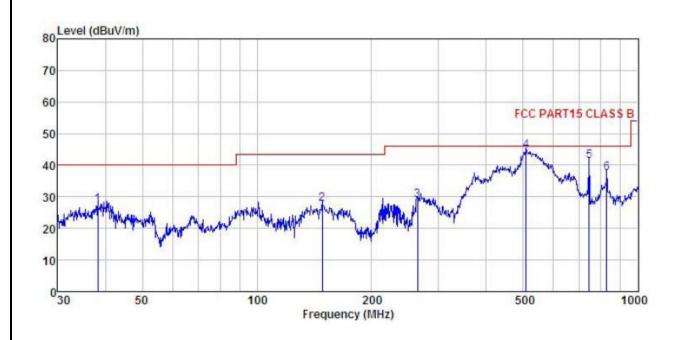
<sup>2.</sup> The emission levels of other frequencies are very lower than the limit and not show in test report.



# Measurement Data(For Adapter 3):

### **Below 1GHz:**

Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product Model:	MaxiSys Ultra		
Test By:	YT	Test mode:	PC mode		
Test Frequency:	30 MHz ~ 1 GHz	Polarization:	Vertical		
Test Voltage:	AC 120/60Hz	Environment:	Temp: 24℃ Huni: 57%		



		Read	Ant enna	Cable	Preamp		Limit	Over	
	Freq	Level	Factor	Loss	Factor	Level	Line	Limit	Remark
	MHz	dBu∜	dB/m	dB	<u>dB</u>	dBu√/m	dBu√/m	<u>dB</u>	
1	38.212	44.30	11.99	1.18	29.92	27.55	40.00	-12.45	QP
2	148.441	45.63	8.97	2.50	29.23	27.87	43.50	-15.63	QP
3	263.819	41.51	12.97	2.85	28.51	28.82	46.00	-17.18	QP
4	508.258	51.65	18.23	3.66	28.98	44.56	46.00	-1.44	QP
3 4 5	744.866	45.04	20.59	4.34	28.50	41.47	46.00	-4.53	QP
6	827.493	39.22	22.13	4.26	28.09	37.52	46.00	-8.48	QP

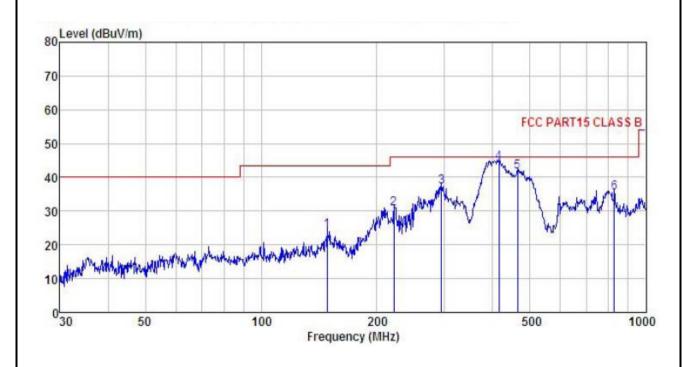
### Remark:

<sup>1.</sup> Final Level = Receiver Read level + Antenna Factor + Cable Loss - Preamplifier Factor.

<sup>2.</sup> The emission levels of other frequencies are very lower than the limit and not show in test report.



Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product Model:	MaxiSys Ultra
Test By:	YT	Test mode:	PC mode
Test Frequency:	30 MHz ~ 1 GHz	Polarization:	Horizontal
Test Voltage:	AC 120/60Hz	Environment:	Temp: 24℃ Huni: 57%



	Freq		Antenna Factor				Limit Line		
	MHz	dBu∀	dB/m	dB	<u>dB</u>	dBu√/m	dBu∀/m	dB	
1	148.441	42.11	8.97	2.50	29.23	24.35	43.50	-19.15	QP
2	221.392	45.04	11.55	2.84	28.70	30.73	46.00	-15.27	QP
1 2 3	294.114	49.28	13.52	2.92	28.46	37.26	46.00	-8.74	QP
4 5 6	414.722	54.40	15.64	3.12	28.81	44.35	46.00	-1.65	QP
5	463.970	50.11	16.98	3.32	28.89	41.52	46.00	-4.48	QP
6	827.493	37.07	22.13	4.26	28.09	35.37	46.00	-10.63	QP

# Remark:

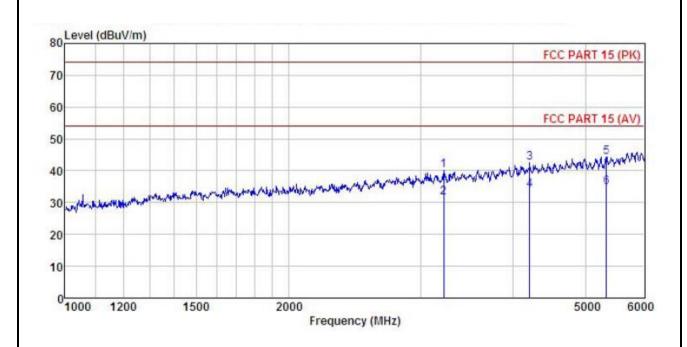
<sup>1.</sup> Final Level = Receiver Read level + Antenna Factor + Cable Loss - Preamplifier Factor.

<sup>2.</sup> The emission levels of other frequencies are very lower than the limit and not show in test report.



# **Above 1GHz:**

Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product Model:	MaxiSys Ultra
Test By:	YT	Test mode:	PC mode
Test Frequency:	1 GHz ~ 6 GHz	Polarization:	Vertical
Test Voltage:	AC 120/60Hz	Environment:	Temp: 24°C Huni: 57%



	Freq		Antenna Factor		Preamp Factor		Limit Line	Over Limit	Remark
	MHz	dBu∜	dB/m	dB	dB	$\overline{dBuV/m}$	dBuV/m	dB	
1	3227.832	47.53	28.55	5.45	41.40	40.13	74.00	-33.87	Peak
2	3227.832	38.84	28.55	5.45	41.40	31.44	54.00	-22.56	Average
3	4208.015	47.63	30.34	6.41	41.81	42.57	74.00	-31.43	Peak
4	4208.015	38.99	30.34	6.41	41.81	33.93	54.00	-20.07	Average
5	5330.811	46.88	32.20	7.11	41.89	44.30	74.00	-29.70	Peak
6	5330.811	37.52	32.20	7.11	41.89	34.94	54.00	-19.06	Average

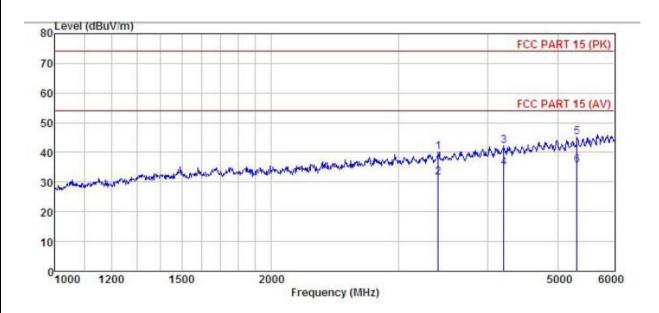
#### Remark:

<sup>1.</sup> Final Level = Receiver Read level + Antenna Factor + Cable Loss - Preamplifier Factor.

<sup>2.</sup> The emission levels of other frequencies are very lower than the limit and not show in test report.



Product Name:	ADVANCED DIAGNOSTIC & MEASUREMENT SYSTEM	Product Model:	MaxiSys Ultra
Test By:	YT	Test mode:	PC mode
Test Frequency:	1 GHz ~ 6 GHz	Polarization:	Horizontal
Test Voltage:	AC 120/60Hz	Environment:	Temp: 24°C Huni: 57%



	Freq MHz	ReadAntenna Level Factor					Limit Line	Over Limit	Remark
		dBu∜	dB/m	dB	dB	dBuV/m	dBu∀/m	dB	
1	3412.193	47.38	28.58	5.65	41.37	40.24	74.00	-33.76	Peak
2	3412.193	38.85	28.58	5.65	41.37	31.71	54.00	-22.29	Average
3	4208.015	47.25	30.34	6.41	41.81	42.19	74.00	-31.81	Peak
4	4208.015	40.01	30.34	6.41	41.81	34.95	54.00	-19.05	Average
5	5321.268	47.71	32.18	7.10	41.90	45.09	74.00	-28.91	Peak
6	5321.268	38.40	32.18	7.10	41.90	35.78			Average

# Remark:

- 1. Final Level = Receiver Read level + Antenna Factor + Cable Loss Preamplifier Factor.
- 2. The emission levels of other frequencies are very lower than the limit and not show in test report.