

ETS PRODUCT SERVICE AG

TEST - REPORT

FCC RULES PARTS 15.247 IC RADIO STANDARDS RSS-210 - Issue 7

FCC ID:U9A277IWLAN-V100

Model Name: Mobile Panel

Test report no.:G0M20706-1478-C-1





Certificate #1983.01



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1 General information

1.1 Notes

The purpose of conformity testing is to increase the probability of adherence to the essential requirements or conformity specifications, as appropriate.

The complexity of the technical specifications, however, means that full and thorough testing is impractical for both technical and economic reasons.

Furthermore, there is no guarantee that a test sample which has passed all the relevant tests conforms to a specification.

Neither is there any guarantee that such a test sample will interwork with other genuinely open systems.

The existence of the tests nevertheless provides the confidence that the test sample possesses the qualities as maintained and that is performance generally conforms to representative cases of communications equipment.

The test results of this test report relate exclusively to the item tested as specified in 1.5.

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Operator:

14.12.2007 W. Treffke

Date ETS Lab. Name Signature

Technical responsibility for area of testing:

14.12.2007 K. Damm

Date Name Signature



1.2 Testing laboratory

1.2.1 Location

ETS PRODUCT SERVICE AG STORKOWER STR. 38c D- 15526 REICHENWALDE B. BERLIN GERMANY

Telephone: + 49 33631 888-00 Telefax: + 49 33631 888-660

1.2.2 Details of accreditation status

DAR Accredited Testing LaboratoryDAR-REGISTRATION NUMBER: DAT-P-268/08

RECOGNIZED NOTIFIED BODY EMC

REGISTRATION NUMBER: BNetzA-bS EMV-07/61

RECOGNIZED NOTIFIED BODY R&TTE

REGISTRATION NUMBER: BNetzA-bS-02/51-53

FCC FILED TEST LABORATORY

REG.-No. 96970

A2LA ACCREDITED TESTING LABORATORY

CERTIFICATE No. 1983.01

BLUETOOTH QUALIFICATION TEST FACILITY (BQTF)

ACCREDITED BY BLUETOOTH QUALIFICATION REVIEW BOARD

INDUSTRY CANADA FILED TEST LABORATORY

REG. No. IC 3470

1.3 Details of approval holder

Name : Siemens AG A&D AS RD ST Type Test

Street : Werner-von-Siemens-Str. 50

Town : 92224 Amberg Country : Germany

Telephone : +49 (9621) 80-3033 Fax : +49 (9621) 80-3033

Contact : Herr Alois Gresser

E-Mail : alois.gresser@siemens.com

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1.4 Application details

Date of receipt of application : 14.06.2007 Date of receipt of test item : 14.06.2007

Date of test : 15.06.2007 – 29.08.2007

1.5 Test item

Description of test item : Mobile Panel

Type identification : Mobile Panel 277 IWLAN

Hardware version : A5E00244080-01

Software version : 01.00.00.00_02.01

Serial number : Test sample without serial number/ pre-series 1

Photos : See appendix A.

Technical data

Frequency band : 2400 MHz –2483.5 MHz

Frequency (ch A) : 2412 MHz
Frequency (ch B) : 2437 MHz
Frequency (ch C) : 2462 MHz

Number of Channels : 11

Operating Modes : semi-duplex

Type of modulation : DSSS, OFDM

Data Rate (Mbit/s)	Modulation	Support
11	DSSS	\boxtimes
54	OFDM	

Fixed point-to-point operation: \square Yes / \boxtimes No

Power supply : 12 V DC

Antenna : internal (antenna 1, antenna 2)

Antenna gain : 2 dBi



Classification : For a module not determined.

Fixed Device	
Mobile Device (Human Body distance > 20cm	
Portable Device (Human Body distance < 20cm	\boxtimes

Antenna 1

11 Mbit/s:

<u>Transmitter</u>	<u>Unom = 12 V</u>	<u>Umin = 10.2 V</u>	<u>Umax = 13.8 V</u>
Power (ch A)	: Conducted: 17.87 dBm	Conducted: 17.85 dBm	Conducted: 17.87 dBm
Power (ch B)	: Conducted: 18.17 dBm	Conducted: 18.16 dBm	Conducted: 18.19 dBm
Power (ch C)	: Conducted: 18.46 dBm	Conducted: 18.44 dBm	Conducted: 18.46 dBm

54 Mbit/s:

<u>Transmitter</u>	<u>Unom = 12 V</u>	<u>Umin = 10.2 V</u>	<u>Umax = 13.8 V</u>
Power (ch A)	: Conducted: 18.01 dBm	Conducted: 18.00 dBm	Conducted: 18.10 dBm
Power (ch B)	: Conducted: 19.02 dBm	Conducted: 19.00 dBm	Conducted: 19.08 dBm
Power (ch C)	: Conducted: 19.43 dBm	Conducted: 19.30 dBm	Conducted: 19.45 dBm

Antenna 2

11 Mbit/s:

<u>Transmitter</u>	<u>Unom = 12 V</u>	<u>Umin = 10.2 V</u>	<u>Umax = 13.8 V</u>
Power (ch A)	: Conducted: 16.93 dBm	Conducted: 16.90 dBm	Conducted: 16.95 dBm
Power (ch B)	: Conducted: 17.67 dBm	Conducted: 17.65 dBm	Conducted: 17.69 dBm
Power (ch C)	: Conducted: 18.44 dBm	Conducted: 18.40 dBm	Conducted: 18.44 dBm

54 Mbit/s:

<u>i ransmitter</u>	<u>Unom = 12 V</u>	<u>Umin = 10.2 V</u>	<u>Umax = 13.8 V</u>
Power (ch A)	: Conducted: 19.10 dBm	Conducted: 19.00 dBm	Conducted: 19.10 dBm
Power (ch B)	: Conducted: 19.70 dBm	Conducted: 19.70 dBm	Conducted: 19.72 dBm
Power (ch C)	: Conducted: 19.54 dBm	Conducted: 19.50 dBm	Conducted: 19.58 dBm



Manufacturer:

(if applicable)

Name : Siemens AG A&D AS RD ST Type Test

Street : Werner-von-Siemens-Str. 50

Town : 92224 Amberg Country : Germany

Additional information: The sample is using WLAN technology according IEEE 802.11

b/g.

The scheme for frequency generation, spectrum spreading, receiver parameters, synchronization procedure, and other parameters are determined by the mentioned standard above.

1.6 Test standards

Technical standard: FCC Parts: 15.247

IC Standards: RSS 210 Issue 7 Annex 8.2

2 Technical test

2.1 Summary of test results

No deviations from the technical specification(s) were ascertained in the course of the tests performed.

×

or

The deviations were ascertained in the course of the tests . performed.

2.2 Test environment

Temperature : 25°C

Relative humidity content : 20 ... 75 %

Air pressure : 86 ... 103 kPa

Details of power supply : 12.0 V DC 120 V AC/DC Adapter

Extrem conditions parameters: : test voltage - extreme min.: 10.2 V V DC

max: 13.8 V V DC



2.3 Test equipment utilized

No.	Test equipment	Туре	Manufacturer
ETS 0012	Biconical Antenna	HK 116	R&S
ETS 0013	LPD Antenna	HL 223	R&S
ETS 0014	Log Periodical Antenna	HL 025	R&S
ETS 0015	Log Periodical Antenna	HL 025	R&S
ETS 0018	Horn antenna	BBHA 9120 D	Schwarzbeck
ETS 0253	Spectrum Analyzer	FSIQ 26	R&S
ETS 0271	Spectrum Analyzer	FSEK 30	R&S
ETS 0288	Artificial mains	ESH2-Z5	R&S
ETS 0294	Biconical antenna	HK 116	R&S
ETS 0295	LPD antenna	HL 223	R&S
ETS 0310	Anechoic chamber	AC 3	Frankonia
ETS 0311	Anechoic chamber	AC 4	Frankonia
ETS 0416	Power Supply	EX752M	TTi
ETS 0474	EMI Test Receiver	ESCS 30	R&S
ETS 0484	Radio Communication Tester	CMU 200	R&S



2.4 General test procedure

POWER LINE CONDUCTED INTERFERENCE: The procedure used was ANSI STANDARD C63.4-2003 5.2 using a 50µH LISN (if necessary). Both lines were observed. The bandwidth of the spectrum analyzer was 10 kHz with an appropriate sweep speed.

RADIATION INTERFERENCE: The test procedure used was ANSI STANDARD C63.4-2003 6.4 using a spectrum analyzer. The resolution bandwidth of the spectrum analyzer was 100 kHz for measurements below 1 GHz and RBW 1 MHz was used above 1 GHz. The analyzer was calibrated in dB above a microvolt at the output of the antenna.

FORMULA OF CONVERSION FACTORS for Field strength: The Field Strength at 3m was established by adding the meter reading of the spectrum analyzer (which is set to read in units of $dB\mu V$) to the antenna correction factor supplied by the antenna manufacturer. The antenna correction factors are stated in terms of dB.

Example:

Freq. (MHz) METER READING + ACF + CABLE LOSS (to the receiver) = FS

33 20 dB μ V + 10.36 dB + 6 dB = 36.36 dB μ V/m @3m

ANSI STANDARD C63.4-2003 6.2.1 MEASUREMENT PROCEDURES: The UUT was placed on a table 80 cm high and with dimensions of 1m by 1.5m (non metallic table). The UUT was placed in the center of the table. The table used for radiated measurements is capable of continuous rotation. The spectrum was scanned from 30 MHz to at least 10th harmonic of the fundamental.

Peak readings were taken in three (3) orthogonal planes and the highest readings.

Measurements were made by ETS Product Service AG at the registered open field test site located at Storkower Str. 38c, 15526 Reichenwalde, Germany.

When an emission was found, the table was rotated to produce the maximum signal strength. At this point, the antenna was raised and lowered from 1m to 4m. The antenna was placed in both the horizontal and vertical planes.

ANTENNA & GROUND:

This unit uses internal antenna.

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3	Test	resu	lts

f z 1st test $m \Box$ test after modification $m \Box$ production test

SECT.	TEST CASE	FCC 47CFR PART	IC RSS-	Required	Test passed	Test failed
3	TRANSMITTER PARAMETE	RS				
3.1	RF power output conducted	15.247 (b)(3)	210 A8.4	×	×	
3.2	RF power output radiated (EIRP)	15.247 (b)(3)	210 A8.4			
3.3	6 dB bandwidth	15.247 (a)(2)	210 A8.2	×	×	
3.4	Peak power spectral density	15.247 (e)	210 A8.2	×	×	
3.5	Spurious emission conducted	15.247 (d)	210 A8.5			
3.6	Spurious emission radiated	15.247 (d)	210 A8.5	×	×	
3.7	AC power line conducted emissions	15.207	Gen 7.2.2	×	×	
4	RECEIVER PARAMETERS			•		•
4.1	Radiated emissions	-	Gen 7.2.3	×	×	



3 Transmitter parameters

3.1 RF power output, conducted

Reference

FCC	47 CFR part 15.247 (b)
IC	RSS-210 A 8.4

Method of measurement

This measurement applies to equipment with an integral antenna and to equipment with an antenna connector and equipped with an antenna as declared by the applicant.

The power was measured with modulation (declared by the applicant).

Limits

FCC	1 Watt (30dBm)
IC	1 Watt (30dBm)

Test results

Antenna 1

Test conditions	Frequency 1	Frequency 2	Frequency 3
11 Mbit/s	[dBm]	[dBm]	[dBm]
T _{nom} = 25 ° C V _{nom} = 12 V	17.87	18.17	18.46
$T_{\text{nom}} = 25 ^{\circ} \text{C}$ $V_{\text{min}} = 10.2 \text{V}$	17.85	18.16	18.44
T _{nom} = 25 ° C V _{max} = 13.8 V	17.87	18.19	18.46
Measurement uncertainty	< 3 dB		

Test conditions	Frequency 1	Frequency 2	Frequency 3
54 Mbit/s	[dBm]	[dBm]	[dBm]
$T_{\text{nom}} = 25 ^{\circ} \text{C}$ $V_{\text{nom}} = 12 \text{V}$	18.01	19.02	19.43
$T_{nom} = 25 ^{\circ} C$ $V_{min} = 10.2 ^{\circ} V$	18.00	19.00	19.33
$T_{\text{nom}} = 25 ^{\circ} \text{C}$ $V_{\text{max}} = 13.8 ^{\circ} \text{V}$	18.10	19.08	19.45
Measurement uncertainty		< 3 dB	



Antenna 2

Test conditions	Frequency 1	Frequency 2	Frequency 3
11 Mbit/s	[dBm]	[dBm]	[dBm]
T _{nom} = 25 ° C V _{nom} = 12 V	16.93	17.67	18.44
T _{nom} = 25 ° C V _{min} = 10.2 V	16.90	17.65	18.40
T _{nom} = 25 ° C V _{max} = 13.8 V	16.95	17.69	18.44
Measurement uncertainty		< 3 dB	

Test conditions	Frequency 1	Frequency 2	Frequency 3
54 Mbit/s	[dBm]	[dBm]	[dBm]
T _{nom} = 25 ° C V _{nom} = 12 V	19.10	19.70	19.54
T _{nom} = 25 ° C V _{min} = 10.2 V	19.00	19.70	19.50
$T_{nom} = 25 ^{\circ} C$ $V_{max} = 13.8 ^{\circ} V$	19.10	19.72	19.58
Measurement uncertainty	< 3 dB		

Test equipment: ETS 0253, ETS 0271



3.2 RF power output, radiated (EIRP)

Reference

FCC	CFR part 15.247 (b)(3)
IC	RSS-210 A8.4

Method of measurement

This measurement applies to equipment with an integral antenna and to equipment with an antenna connector and equipped with an antenna as declared by the applicant.

The power was measured with modulation (declared by the applicant).

Limits

FCC	1 Watt (30dBm)
IC	1 Watt (30dBm)

Test Results

Test conditions	Channel A	Channel B	Channel C
	EIRP [dBm]	EIRP [dBm]	EIRP [dBm]
T _{nom} = 25 ° C V _{nom} = 12 V			
Measurement uncertainty	< 3 dB		

Test equipment: ETS 0012, ETS, 0013, ETS, 0015, ETS 0018, ETS 0253, ETS 0271, ETS 0311

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3.3 6 dB bandwidth; Occupied bandwidth

Reference

FCC	CFR part 15.247 (a)(2)
IC	RSS-210 A8.2

Method of measurement

Spectrum analyser:

RBW: 100 kHz Span: > RBW

Limits

FCC	BW _{6dB} ≥ 500 kHz
IC	BW _{6dB} ≥ 500 kHz

Test results

Antenna 1

Test conditions	Frequency 1	Frequency 2	Frequency 3
11 Mbit/s	BW	BW	BW
6 dB BW			
T _{nom} = 25 ° C V _{nom} = 12 V	12.6252 MHz	12.8056 MHz	13.0461 MHz
Occupied BW			
T _{nom} = 25 ° C V _{nom} = 12.0 V	15.4509 MHz	15.4509 MHz	15.4509 MHz
Measurement uncertainty	< 10 Hz		

Test conditions	Frequency 1	Frequency 2	Frequency 3
54 Mbit/s	BW	BW	BW
6 dB BW			
T _{nom} = 25 ° C V _{nom} = 12 V	16.5932 MHz	16.5932 MHz	16.5346 MHz
Occupied BW			
T _{nom} = 25 ° C V _{nom} = 12.0 V	16.5331 MHz	16.4729 MHz	16.4729 MHz
Measurement uncertainty		< 10 Hz	



Antenna 2

Test conditions	Frequency 1	Frequency 2	Frequency 3
11 Mbit/s	BW	BW	BW
6 dB BW			
T _{nom} = 25 ° C V _{nom} = 12 V	12.3246 MHz	12.2044 MHz	12.6252 MHz
Occupied BW			
T _{nom} = 25 ° C V _{nom} = 12.0 V	15.4509 MHz	15.4509 MHz	15.4509 MHz
Measurement uncertainty	< 10 Hz		

Test conditions	Frequency 1	Frequency 2	Frequency 3
54 Mbit/s	BW	BW	BW
6 dB BW			
T _{nom} = 25 ° C V _{nom} = 12 V	16.5331 MHz	16.5932 MHz	16.5932 MHz
Occupied BW			
T _{nom} = 25 ° C V _{nom} = 12.0 V	16.5331 MHz	16.4729 MHz	16.4729 MHz
Measurement uncertainty		< 10 Hz	

System receiver input bandwidth:
The manufacturer declares that the receiver input bandwidth matches to the bandwidth of the transmitter signal.

Comment: Please see attached diagrams.

Test equipment: ETS 0271



3.4 Peak power spectral density

Reference

FCC	CFR part 15.247 (e)
IC	RSS-210 A8.2

Method of measurement

The same method of determing the conducted output power shall be used to determine the power spectral density.

Limits

FCC	≤ 8 dBm in any 3kHz band
IC	≤ 8 dBm in any 3kHz band

Test results

Antenne 1

Test conditions	Spectral density		
11 Mbit/s	Channel A	Channel B	Channel C
11 MIDIUS	[dBm]	[dBm]	[dBm]
$T_{\text{nom}} = 25 ^{\circ} \text{C}$ $V_{\text{nom}} = 12.0 ^{\circ} \text{V}$	-6.93	-3.40	-1.87
Measurement uncertainty		< 3 dBs	

Test conditions	Spectral density		
54 Mbit/s	Channel A [dBm]	Channel B [dBm]	Channel C [dBm]
T _{nom} = 25 ° C V _{nom} = 12.0 V	-8.78	-9.71	-8.47
Measurement uncertainty		< 3 dBs	



Antenne 2

Test conditions	Spectral density		
44 Mh:4/a	Channel A	Channel B	Channel C
11 Mbit/s	[dBm]	[dBm]	[dBm]
T _{nom} = 25 ° C V _{nom} = 12.0 V	1.71	-5.72	-4.68
Measurement uncertainty		< 3 dBs	

Test conditions	Spectral density		
E4 Mbit/o	Channel A	Channel B	Channel C
54 Mbit/s	[dBm]	[dBm]	[dBm]
T _{nom} = 25 ° C V _{nom} = 12.0 V	-9.75	-9.37	-9.42
Measurement uncertainty	< 3 dBs		

Comment: Please see attached diagrams.

Test equipment: ETS 0271



3.5 Spurious emissions, conducted

Reference

FCC	CFR part 15.247 (d)
IC	RSS-210 A8.5

Method of measurement

The EUT is connected to the spectrum analyzer via a low loss cable. If the EUT is not equipped with and antenna connector, a temporary antenna connector has to be installed. The EUT is switched on, the hopping function is disabled.

The analyzer setting was as following:

Frequency range	RES bandwidth		Video bandwidth	
	Pk	Avg	Pk	Avg
f < 1GHz	100 kHz	-	100 kHz	=
f > 1GHz	1 MHz	1 MHz	1 MHz	1MHz

Limits

FCC	20 dB below peak output power
IC	20 dB below peak output power

Test results

Frequency	Result [dBm]	Limit [dBm]	Margin [dB]	Reference level [dBm]

Comment: Not required.

Test equipment: ETS 0253



3.6 Spurious emissions, radiated

Reference

FCC	CFR part 15.247(d), 15.205. 15.209, 15.35
IC	RSS-210 A8.5

Method of measurement

Spurious emissions were measured with modulation (declared by manufacturer).

According to 47 CFR 15, Part 15.247 (d): In any 100 kHz bandwidth outside the frequency band in which the spread spectrum or digitally modulated intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement, provided the transmitter demonstrates compliance with the peak conducted power limits. If the transmitter complies with the conducted power limits based on the use of RMS averaging over a time interval, as permitted under paragraph (b)(3) of this section, the attenuation required under this paragraph shall be 30 dB instead of 20 dB. Attenuation below the general limits specified in Section 15.209(a) is not required.

In addition, radiated emissions which fall in the restricted bands, as defined in Section 15.205(a), must also comply with the radiated emissions limits specified in Section 15.209(a) (see Section 15.205(c)).

Sample Calculation of Limit:

All results are updated by an automatic measuring system in accordance to point 2.3

Limit = max. reading (because peak detector is used)

Antenna 1 11Mbit/s Antenna 1 54 Mbit/s

98.33 $dB\mu V/m$ 94.85 $dB\mu V/m$

Antenna 2 11Mbit/s Antenna 2 54 Mbit/s

98.58 dB μ V/m 98.16 dB μ V/m

Limit = Max. reading - 20 dB (because average detector is used)

Antenna 1 11Mbit/s

 $98.33 \text{ dB}\mu\text{V/m} - 20 \text{ dB} = 78.33 \text{ dB}\mu\text{V/m}$

Antenna 1 54Mbit/s

 $94.85 \text{ dB}\mu\text{V/m} - 20 \text{ dB} = 74.85 \text{ dB}\mu\text{V/m}$

Antenna 2 11Mbit/s

 $98.58 \text{ dB}\mu\text{V/m} - 20 \text{ dB} = 78.58 \text{ dB}\mu\text{V/m}$

Antenna 2 54Mbit/s

 $98.16 \text{ dB}\mu\text{V/m} - 20 \text{ dB} = 78.16 \text{ dB}\mu\text{V/m}$

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Calculation of test results:

Such factors like antenna correction, cable loss, external attenuation etc. are already included in the provided measurement results.

The peak and average spurious emissions plots were measured with the average limits.

In the Table being listed the critical peak and average value an exhibit the compliance with the above calculated Limits.

If in the column's correction factor states a value then the max. Field strength in the same row is corrected by a value gained from the "Marker-Delta-Method" or the "Duty-Cycle Correction Factor".

15.35 (c) average value

When the radiated emissions limits are expressed in terms of the average value of the emissions, and pulsed operation is employed, the measurement field strength shall be determined by averaging over one complete pulse train, including blanking intervals, as long as the pulse train does not exceed o.1 seconds.

Duty cycle correction = 20 log (dwell time / pulse-train time of 100 ms or less)

The radiated emissions measurements were performed from 30 MHz to 26000 MHz.

The analyzer setting was as following:

Frequency range	RES bandwidth		Video bandwidth		
	Pk Avg		Pk	Avg	
f < 1GHz	100 kHz	=	100 kHz	-	
f > 1GHz	1 MHz	1 MHz	1 MHz	1MHz	

Limits

	20 dB below peak output power, emmissions which fall in the restricted bands (15.205(a)) must comply the following limits:					
FCC	Frequencies below 1GHz: Frequency of emissions [MHz] 30 – 88 88 – 216 216 – 960 Above 960 For frequencies above 1 GHz For frequencies above 1 GHz Limit + 20 dB = 54.0 dBµV / r	(Pk measurements):	·			
IC	20 dB below peak output power, emmissions which fall in the restricted bands of table 1 (RSS-210 §2.7)must also comply with limits specified in tables 2 and 3					



Test results

Antenna 1

Summary table with radiated data of the test plots 11 Mbits/s

Freq.	Used Ch.	Frequency Marker [GHz]	Polari- zation	Δ corrections dB	Max. Field Strength [dΒμV/m]	Compliance Limit [dBµV/m]	Detector	BW [MHz]	Margin [dB]
4	High	4.942	V	-	54.21	74	peak	1	<u>-19.79</u>
4	High	7.968	V	-	31.32	54	average	1	<u>-22.68</u>
4	Middle	4.844	Н	-	50.43	74	peak	1	<u>-23.57</u>
4	Middle	7.984	Н	-	31.45	54	average	1	<u>-22.55</u>

Antenna 1 Summary table with radiated data of the test plots 54 Mbits/s

Freq.	Used Ch.	Frequency Marker	Polari- zation	Δ corrections	Max. Field Strength	Compliance Limit	Detector	BW	<u>Margin</u>
	0	[GHz]	Zution	dB	[dBµV/m]	[dBµV/m]		[MHz]	[dB]
3	Middle	2.091	Η	-	67.92	74	peak	1	<u>-6.08</u>
3	Middle	3.973	I	-	37.91	54	average	1	<u>-16.09</u>
3	Middle	2.369	V	-	56.32	74	peak	1	<u>-17.68</u>
3	Middle	3.973	V	-	37.91	54	average	1	<u>-16.09</u>
3	Low	2.394	V	-	65.14	74	peak	1	<u>-8.86</u>
3	Low	2.066	V	-	43.01	54	average	1	<u>-10.99</u>
3	Low	2.394	Η	-	63.86	74	peak	1	<u>-10.14</u>
3	Low	2.687	Η	-	37.97	54	average	1	<u>-16.03</u>
3	High	2.687	I	-	57.35	74	peak	1	<u>-16.65</u>
3	High	2.687	Η	-	40.62	54	average	1	<u>-13.38</u>
3	High	2.069	V	-	66.44	74	peak	1	<u>-7.56</u>
3	High	3.964	V	-	37.89	54	average	1	<u>-16.11</u>



Antenna 2

Summary table with radiated data of the test plots 54 Mbits/s

Freq.	Used Ch.	Frequency Marker	Polari- zation	∆ corrections	Max. Field Strength	Compliance Limit	Detector	BW	<u>Margin</u>
		[GHz]		dB	[dBµV/m]	[dBµV/m]		[MHz]	[dB]
3	Low	2.394	V	-	66.20	74	peak	1	<u>-7.80</u>
3	Low	3.937	V	-	37.91	54	average	1	<u>-16.09</u>
3	Low	2.394	Η	-	70.18	74	peak	1	<u>-3.82</u>
3	Low	2.386	Η	-	40.29	54	average	1	<u>-13.71</u>
3	Middle	2.369	V	-	54.08	74	peak	1	<u>-19.92</u>
3	Middle	3.954	V	-	38.26	54	average	1	<u>-15.74</u>
3	Middle	2.687	Н	-	59.79	74	peak	1	<u>-14.21</u>
3	Middle	2.687	Н	-	39.83	54	average	1	<u>-14.17</u>
4	Middle	4.962	V	-	54.31	74	peak	1	<u>-19.69</u>
4	Middle	7.952	V	-	31.36	54	average	1	-22.64
3	High	2.687	Н	-	57.66	74	peak	1	<u>-16.34</u>
3	High	3.964	Н	-	38.28	54	average	1	<u>-15.72</u>

Freq. - Frequency Range:

1: 30 200 MHz 2: 200 1000 MHz 4 GHz 3: 1 4: 4 8 GHz 5: 12 GHz 8 17 GHz 6: 12 7: 17 26.5 GHz

Comment: All other not noted test plots do not contain significant test results in relation to the limits.

Please see attached diagrams.

Test equipment: ETS 0012, ETS 0013, ETS 0015, ETS 0018, ETS 0271, ETS 0253, ETS 0311

ETS Product Service AG Registration number: G0M20706-1478-C-1 Page 21 of 24



3.7 AC power line conducted emissions

Reference

Γ	FCC	CFR part 15.207
Ī	IC	RSS-Gen 7.2.2

Method of measurement

For an intentional radiator which is designed to be connected to the public utility (AC) power line, the radio frequency voltage that is conducted back onto the AC line on any frequency or frequencies within the band 150 kHz to 30 MHz shall not exceed the limits. Compliance with this provision shall be based on the measurement of the radio frequency voltage between each power line and ground at the power terminals.

This measurement was transact first with instrumentation using an average and peak detector and a 10 kHz bandwidth. If the peak detector achieves a calculated level, the measurement is repeated by an instrumentation using a quasi-peak detector.

Limits

	Frequency of emissions	Conducted limit field strength [dBμV]				
FCC & IC	[MHz]	Quasi Peak	Avg			
	0.15 - 0.5	66 to 56	56 - 46			
	0.5 - 5	56	46			
	5 - 30	60	50			

Test results

_	Level		
Frequency	Quasi-peak	Average	
150 kHz	Lower limit line	Lower limit line	

Comment: See attached diagrams.

Test equipment: ETS 0288, ETS 0474

ETS Product Service AG Registration number: G0M20706-1478-C-1 Page 22 of 24



4 Receiver parameters

4.1 Radiated emissions

Reference

FCC	-
IC	RSS-Gen 7.2.3

Method of measurement

The compliance of the EUT Receiver with the Limits of spurious emissions was performed according to the radiated measurement method.

The spectrum analyzer RBW was set to 100 kHz for measurements below 100 kHz and 1.0 MHz above 1.0 GHz. The measurement results are evaluated according to the procedure described in section 2.4 of this test report.

Limits:

	Spurious frequency	Field strength		
MHz		microvolt/m at 3 meter		
	30 - 88	100		
	88 - 216	150		
FCC & IC	216 - 960	200		
	above 960	500		

Test Results

Frequency marker indication [MHz]	Antenna polarization	Worst case emissions level [μV/m]	Compliance limit [μV/m]	Results
130.160	Н	103.16	150	-46.84
130.160	V	113.63	150	-36.37

Comment: Please see attached diagrams.

Test equipment: ETS 0014, ETS 0294, ETS 0295, ETS 0310, ETS 0416, ETS 0484



Annex

A	Pictures	28 pages
В	6 dB bandwidth; Occupied Bandwidth	18 pages
С	Peak Power Spectral Density	12 Pages
D	Spurious emission radiated	105 pages
E	AC power line conducted emissions	2 pages
F	Receiver radiated emissions	10 pages



Annex A

Pictures



Annex B

6 dB bandwidth



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

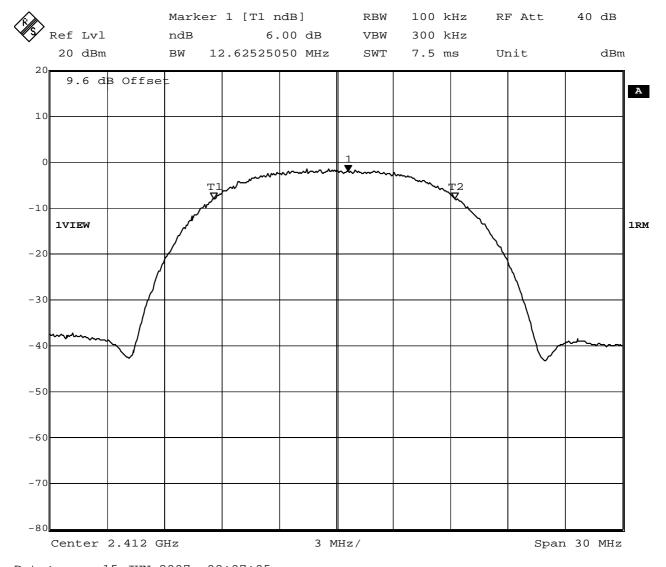
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2412 MHz

Comment 3 DSSS/ant1



Date: 15.JUN.2007 08:07:05



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

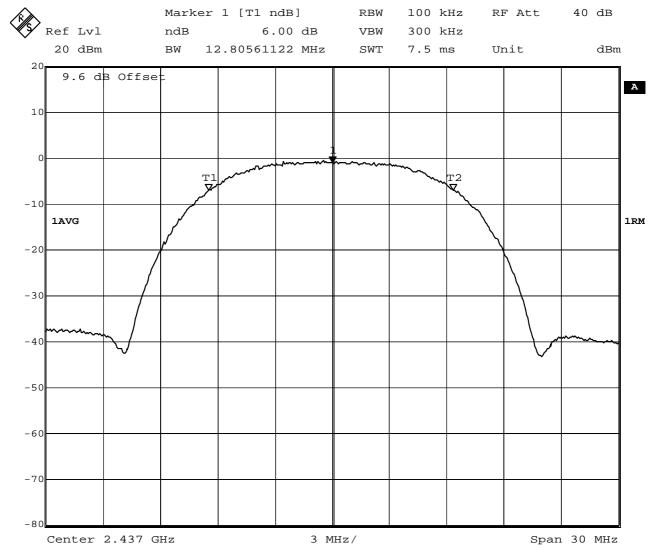
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2437 MHz

Comment 3 DSSS/ant1



Date: 15.JUN.2007 08:19:35



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

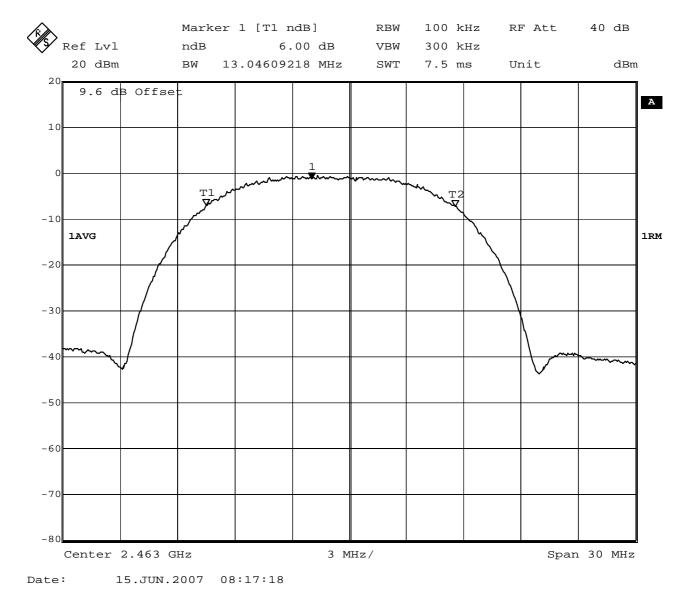
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2462 MHz

Comment 3 DSSS/ant1





EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

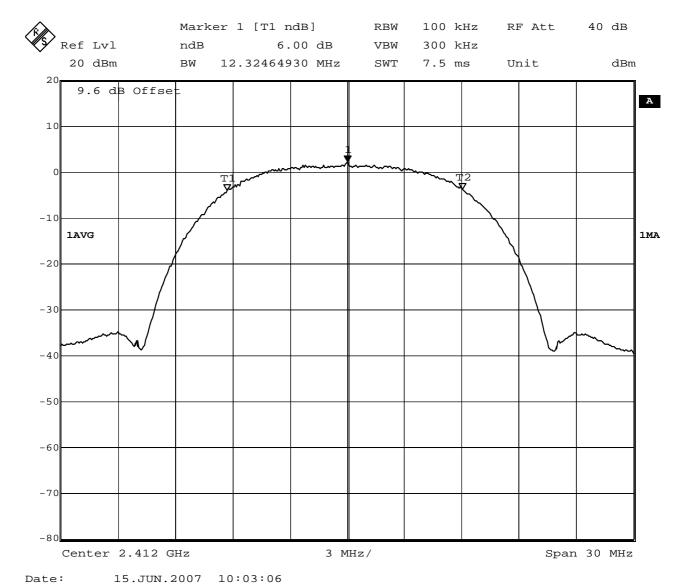
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2412 MHz

Comment 3 DSSS/ant2





EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

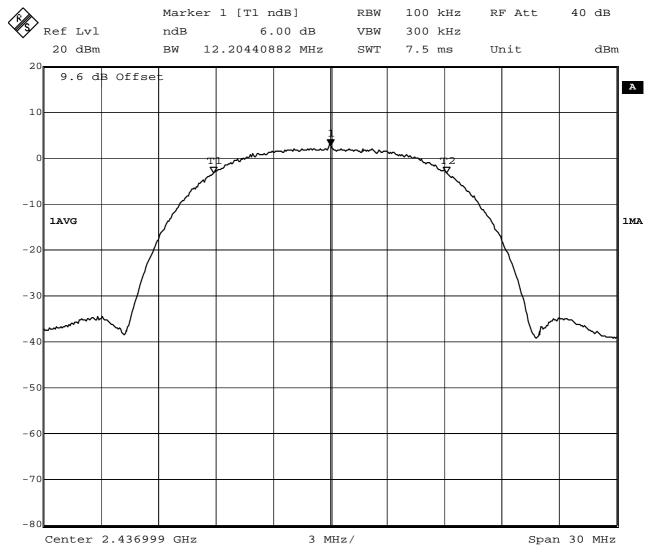
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2437 MHz

Comment 3 DSSS/ant2



Date: 15.JUN.2007 09:59:19



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

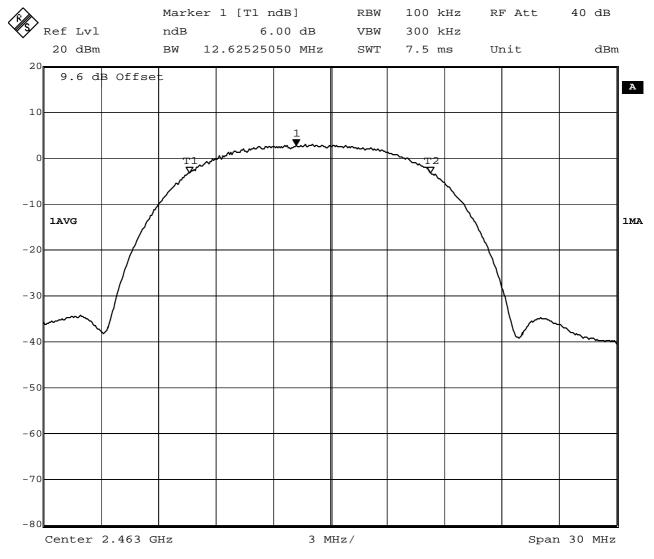
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2462 MHz

Comment 3 DSSS/ant2



Date: 15.JUN.2007 10:07:14



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

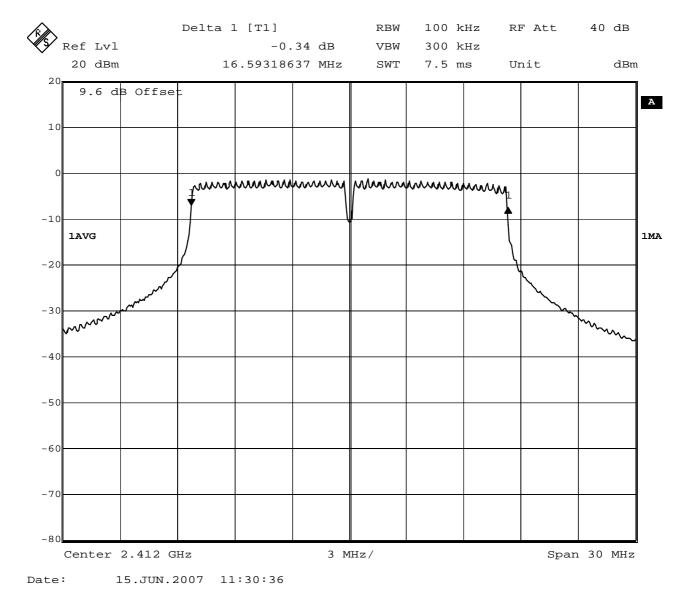
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2412 MHz

Comment 3 OFDM / ant 1





EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

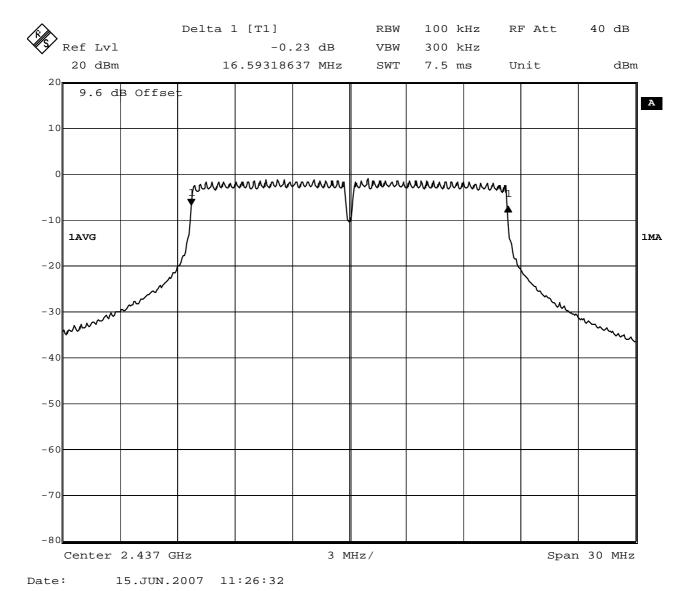
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2437 MHz

Comment 3 OFDM / ant 1





EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

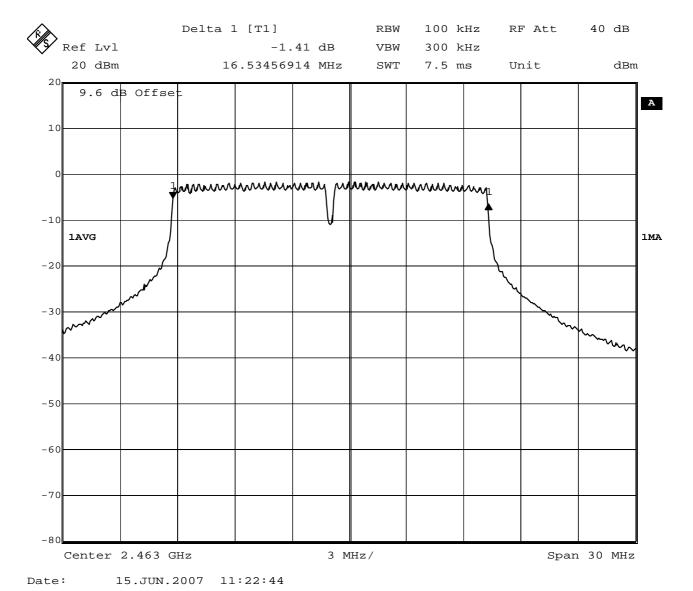
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2462 MHz

Comment 3 OFDM / ant 1





FCC part 15.247 (a)2 Bandwidth

EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

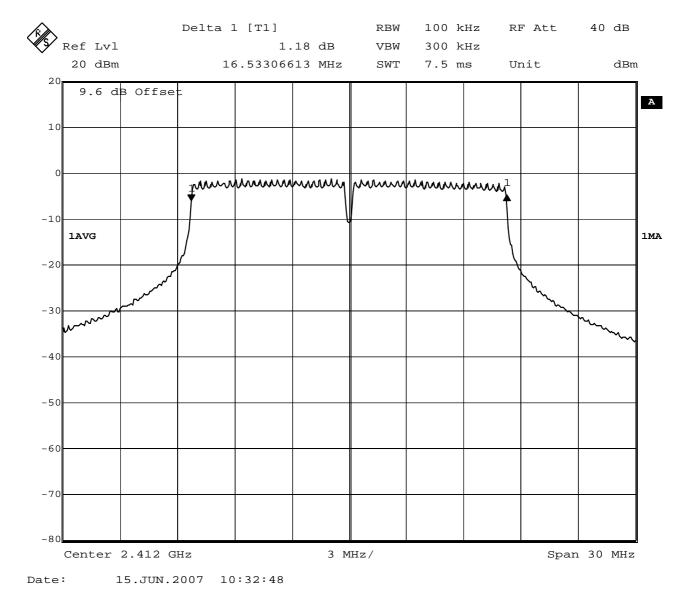
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2412 MHz

Comment 3 OFDM / ant 2





FCC part 15.247 (a)2 Bandwidth

EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

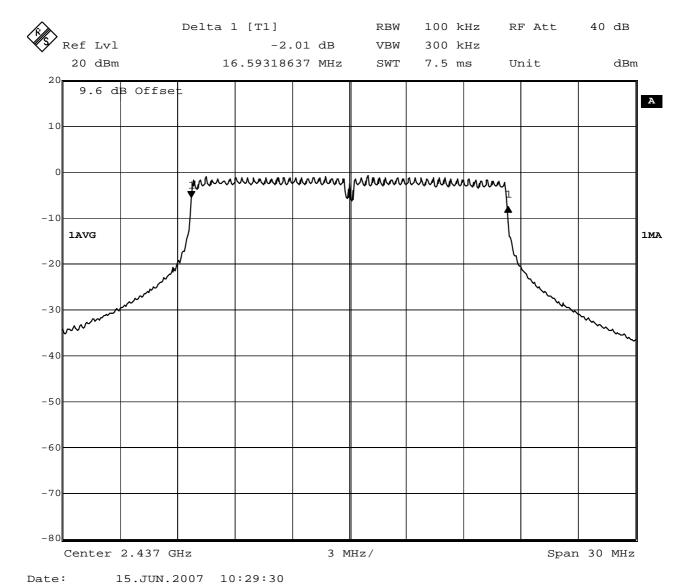
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2437 MHz

Comment 3 OFDM / ant 2





FCC part 15.247 (a)2 Bandwidth

EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

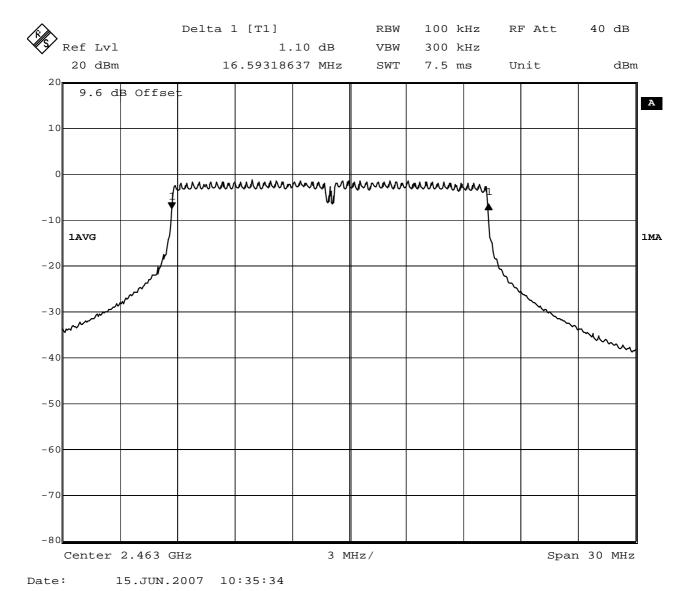
Test Site / Operator ETS

Test Specification FCC part 15.247 (a)2

Comment 1 Bandwidth

Comment 2 Channel: 2462 MHz

Comment 3 OFDM / ant 2





EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

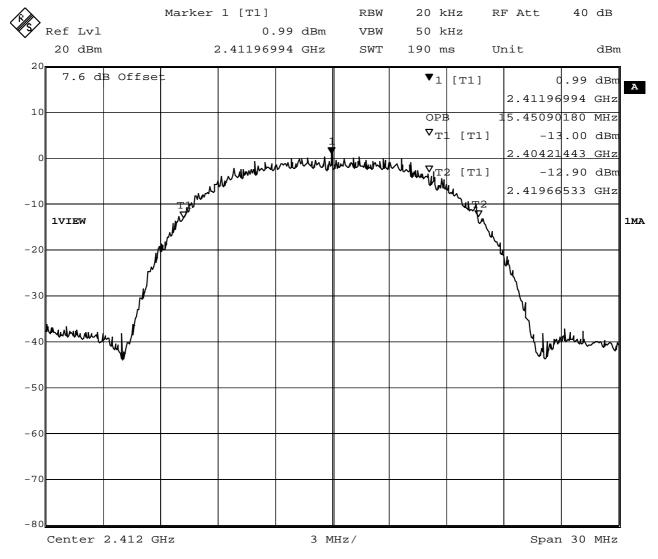
Approval Holder Siemens AG
Temperature / Voltage 23°C / Vnom

Test Site / Operator ETS

Test Specification 4.4.1 Occupied Bandwidth Comment 1 Channel.: 2412 MHz

Comment 2 A spectrum analyzer with an integrated 99% power bandwidth function is used

Comment 3 DSSS / 11 Mbps



Comment A: Occupied bandwidth: 15450.9 KHz

Date: 15.JUN.2007 15:28:00



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

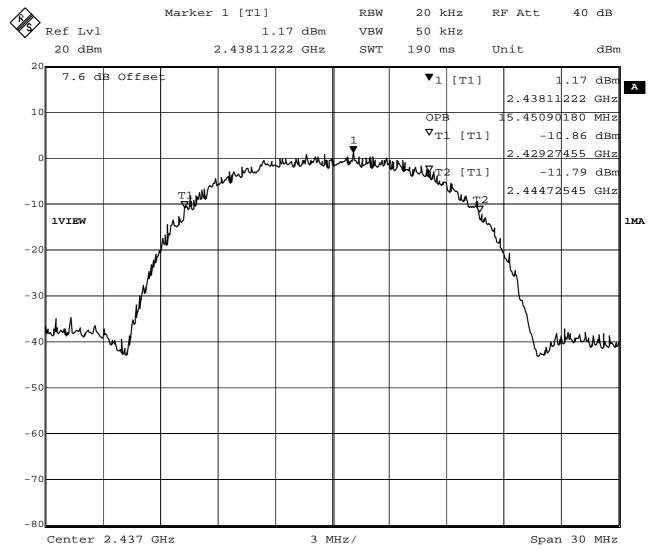
Approval Holder Siemens AG
Temperature / Voltage 23°C / Vnom

Test Site / Operator ETS

Test Specification 4.4.1 Occupied Bandwidth Comment 1 Channel.: 2437 MHz

Comment 2 A spectrum analyzer with an integrated 99% power bandwidth function is used

Comment 3 DSSS / 11 Mbps



Comment A: Occupied bandwidth: 15450.9 KHz

Date: 15.JUN.2007 15:25:37



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

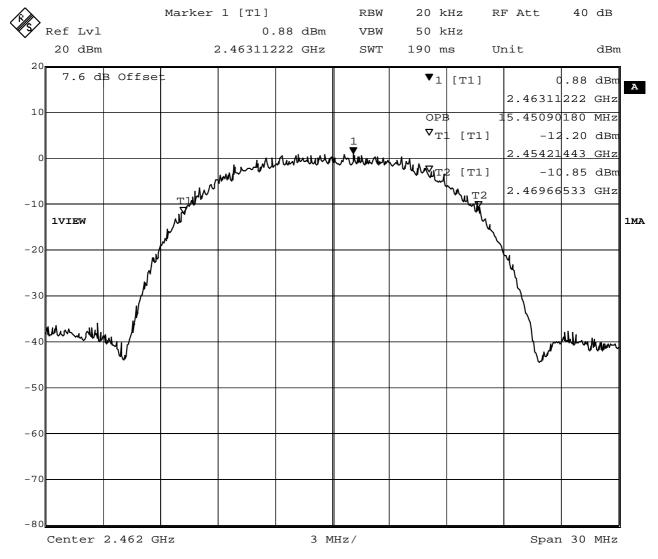
Approval Holder Siemens AG
Temperature / Voltage 23°C / Vnom

Test Site / Operator ETS

Test Specification 4.4.1 Occupied Bandwidth Comment 1 Channel.: 2462 MHz

Comment 2 A spectrum analyzer with an integrated 99% power bandwidth function is used

Comment 3 DSSS / 11 Mbps



Comment A: Occupied bandwidth: 15450.9 KHz

Date: 15.JUN.2007 15:23:46



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

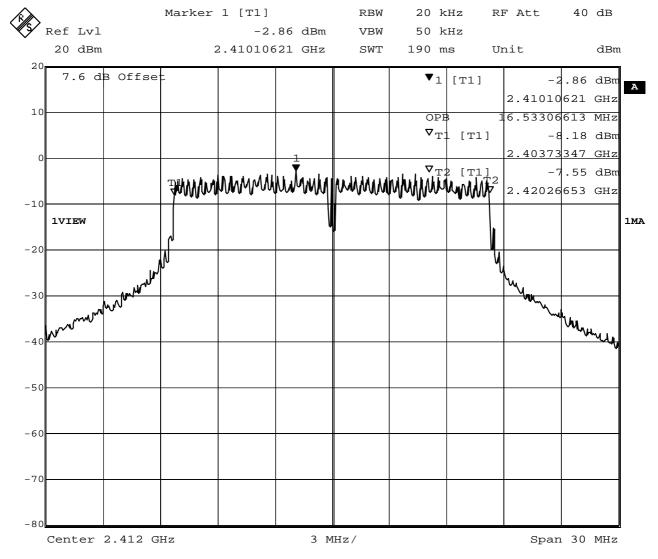
Approval Holder Siemens AG
Temperature / Voltage 23°C / Vnom

Test Site / Operator ETS

Test Specification 4.4.1 Occupied Bandwidth Comment 1 Channel.: 2412 MHz

Comment 2 A spectrum analyzer with an integrated 99% power bandwidth function is used

Comment 3 OFDM / 54 Mbps



Comment A: Occupied bandwidth: 16533.1 KHz

Date: 15.JUN.2007 15:07:29



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

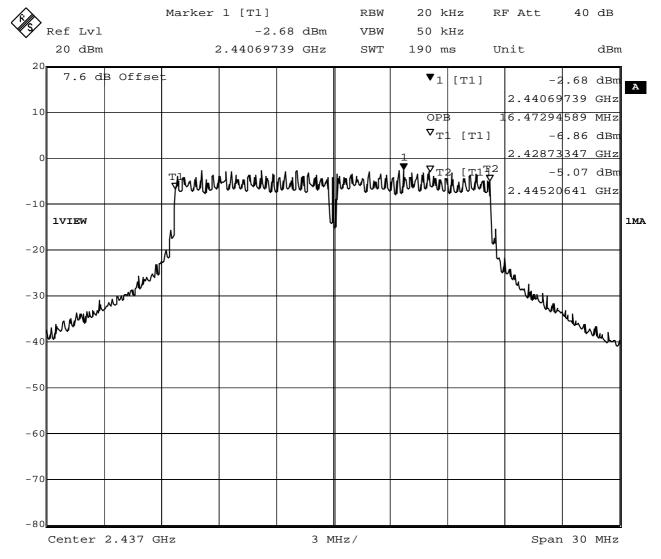
Approval Holder Siemens AG
Temperature / Voltage 23°C / Vnom

Test Site / Operator ETS

Test Specification 4.4.1 Occupied Bandwidth Comment 1 Channel.: 2437 MHz

Comment 2 A spectrum analyzer with an integrated 99% power bandwidth function is used

Comment 3 OFDM / 54 Mbps



Comment A: Occupied bandwidth: 16472.9 KHz

Date: 15.JUN.2007 15:12:25



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

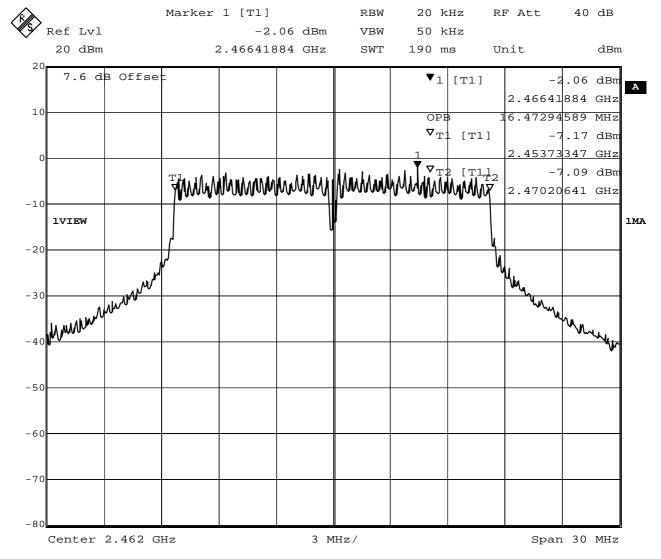
Approval Holder Siemens AG
Temperature / Voltage 23°C / Vnom

Test Site / Operator ETS

Test Specification 4.4.1 Occupied Bandwidth Comment 1 Channel.: 2462 MHz

Comment 2 A spectrum analyzer with an integrated 99% power bandwidth function is used

Comment 3 OFDM / 54 Mbps



Comment A: Occupied bandwidth: 16472.9 KHz

Date: 15.JUN.2007 15:17:38



Annex C

Peak Power Spectral Density



EUT Mobile Panel for Industry Automation

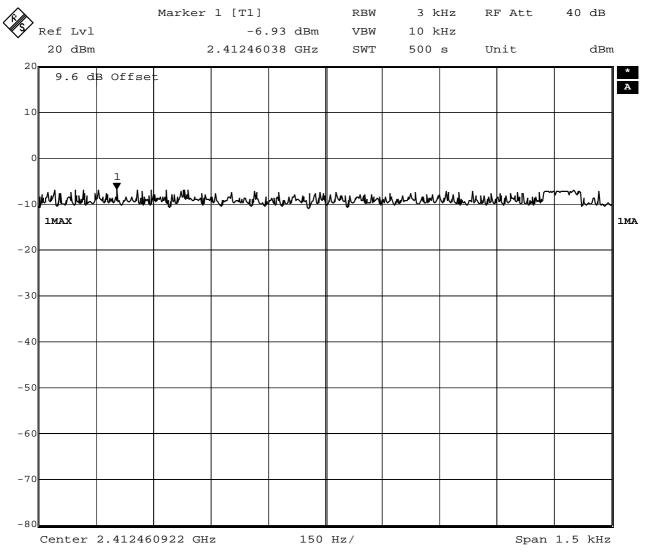
Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2412 MHz
Comment 3 DSSS/Ant.1



Date: 15.JUN.2007 09:28:53



EUT Mobile Panel for Industry Automation

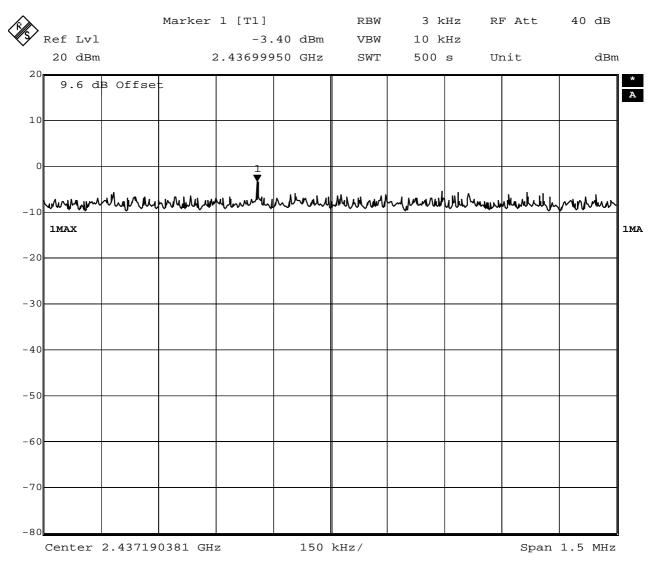
Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2437 MHz
Comment 3 DSSS/Ant.1



Date: 15.JUN.2007 09:21:00



EUT Mobile Panel for Industry Automation

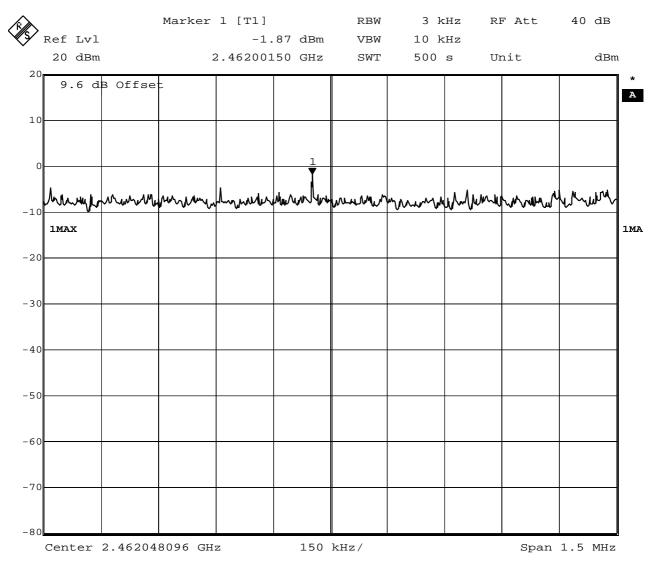
Model Mobile Panel 277 Wireless

Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2462 MHz
Comment 3 DSSS/Ant.1



Date: 15.JUN.2007 09:16:33



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

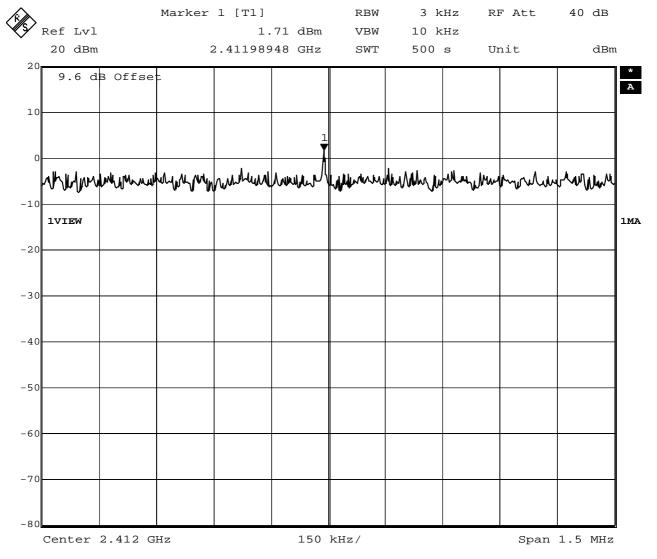
Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2412 MHz

Comment 3 DSSS / Ant. 2



Date: 15.JUN.2007 09:37:10



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

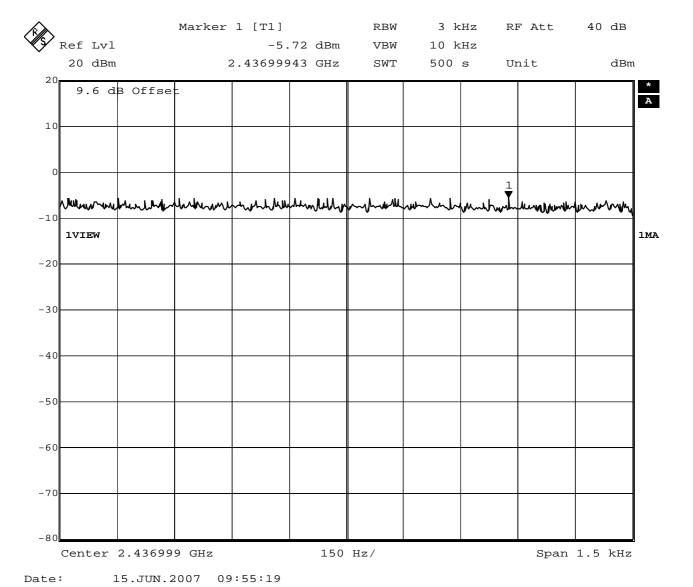
Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2437 MHz

Comment 3 DSSS / Ant. 2





EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

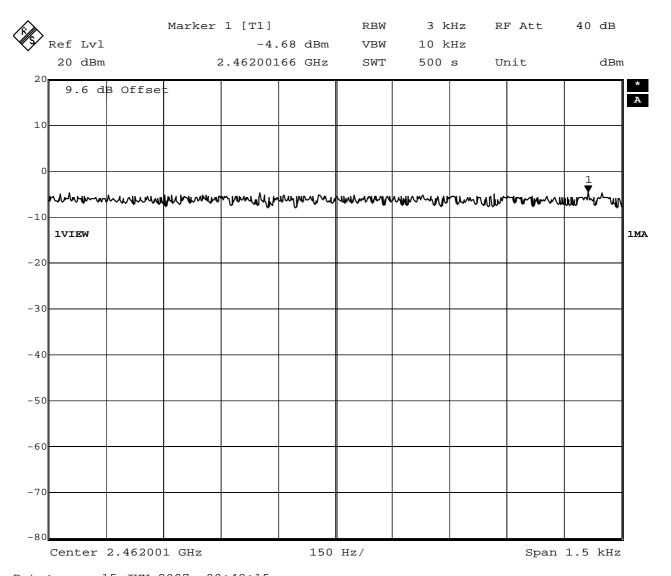
Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2462 MHz

Comment 3 DSSS / Ant. 2



Date: 15.JUN.2007 09:48:15



EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

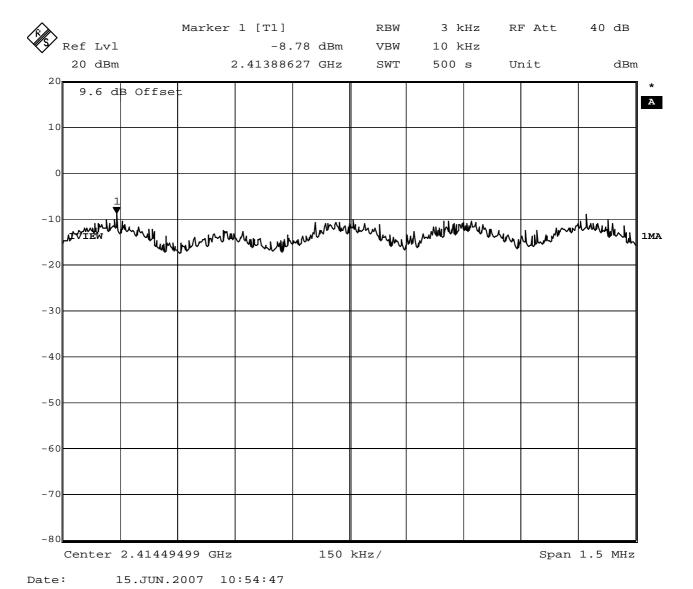
Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2412 MHz

Comment 3 OFDM / ant 1





EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

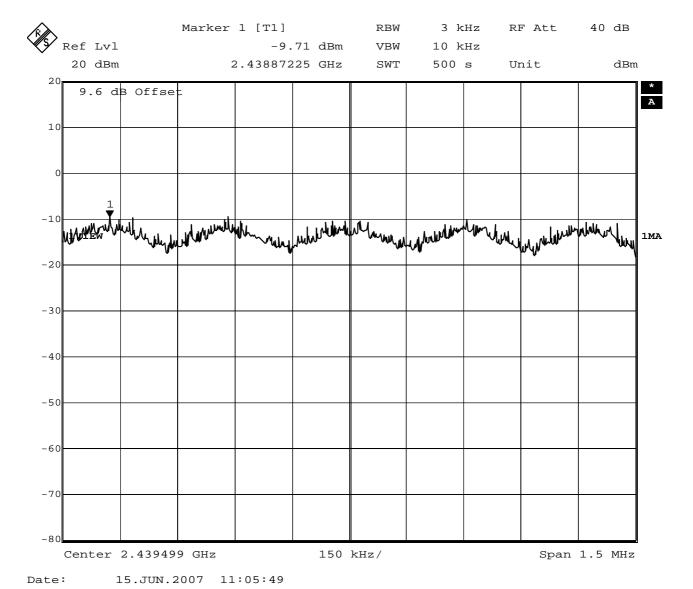
Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2437 MHz

Comment 3 OFDM / ant 1





EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

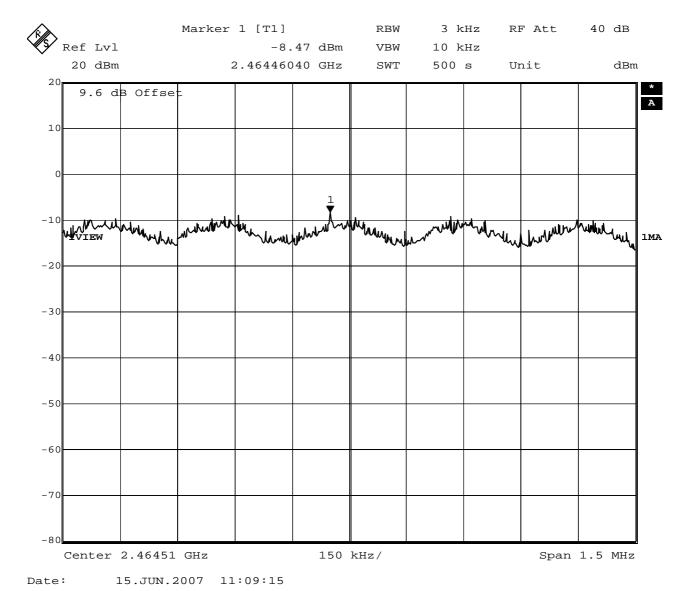
Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2462 MHz

Comment 3 OFDM / ant 1





EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

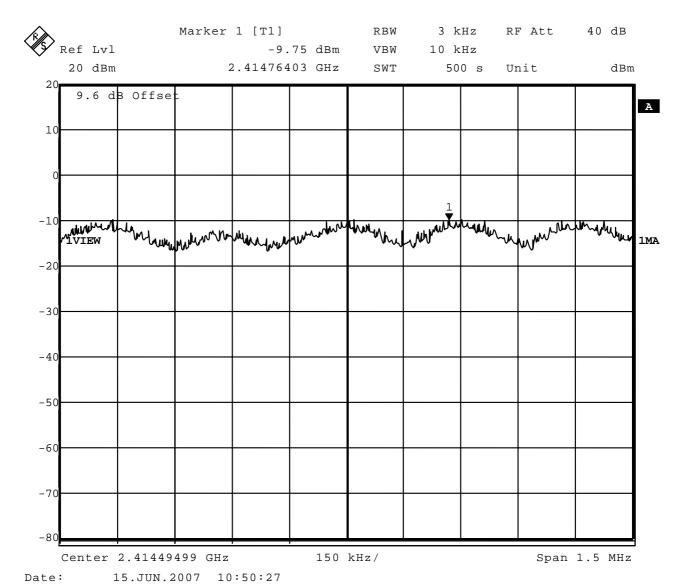
Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2412 MHz

Comment 3 OFDM / ant 2





EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

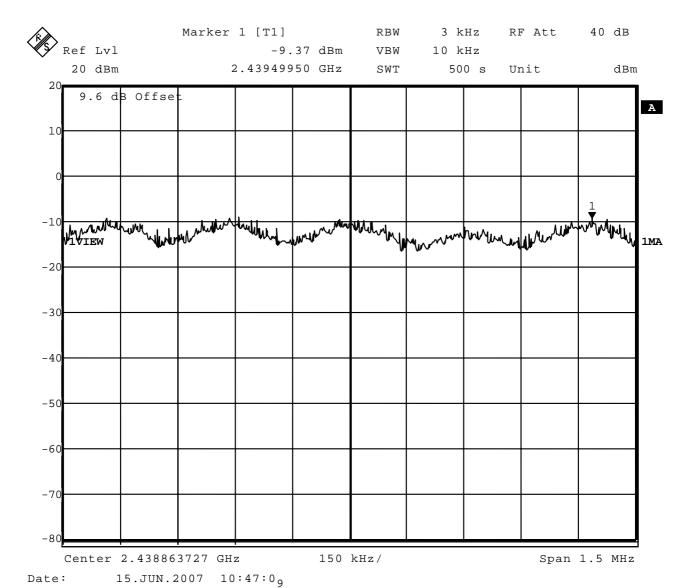
Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2437 MHz

Comment 3 OFDM / ant 2





FCC part 15.247 (d)

Power spectral density (PSD)

EUT Mobile Panel for Industry Automation

Model Mobile Panel 277 Wireless

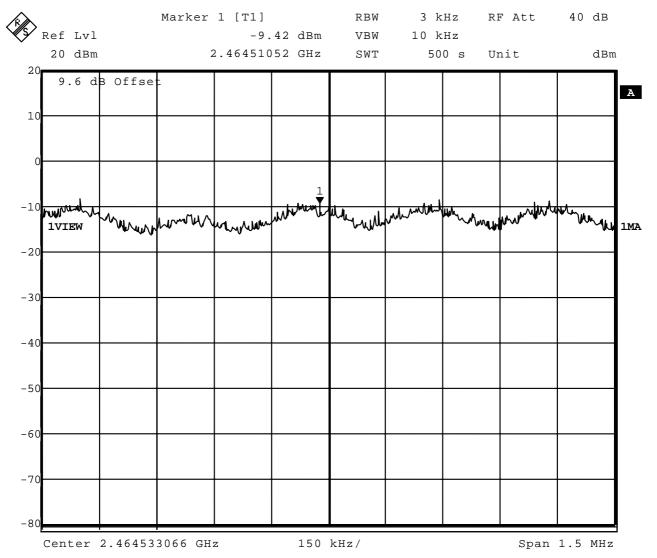
Approval Holder Siemens AG
Temperature / Voltage 25°C / Vnom

Test Site / Operator ETS

Test Specification FCC part 15.247 (d) (PSD)
Comment 1 Power spectral density conducted

Comment 2 Channel: 2462 MHz

Comment 3 OFDM / ant 2



Date: 15.JUN.2007 10:41:₁₂



Annex D

Spurious emission radiated

FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

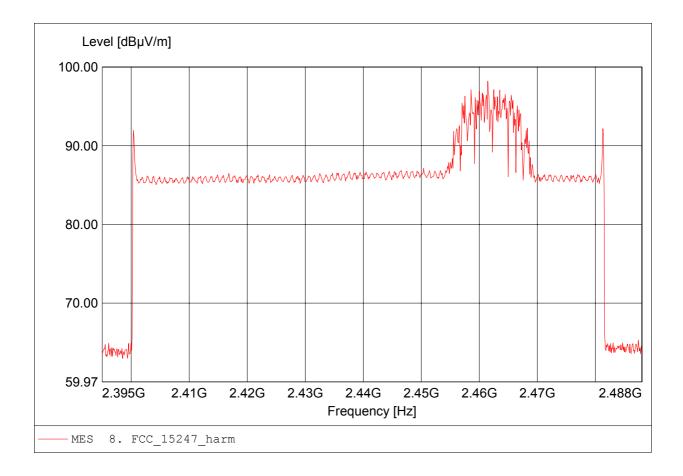
Mobile Panel EUT

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)

Test Specification: according to \$15.247 Comment 1:

Dist.: 3m, Ant.: H1 025 Freq: 2.461GHz, Emax: 98.23dBµV/m, RBW: 100kHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

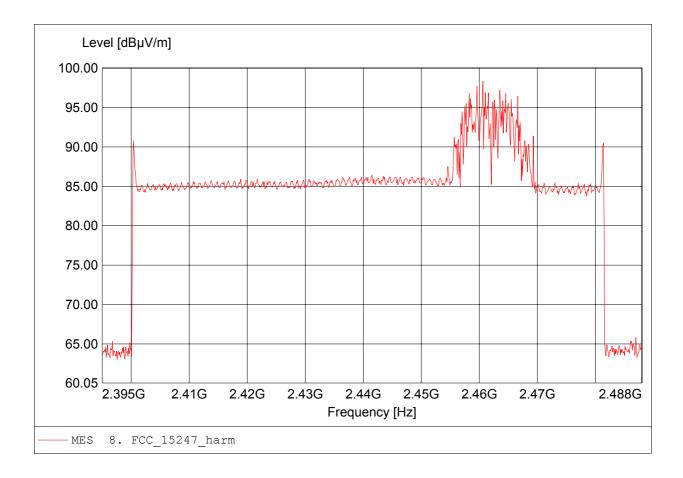
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)

Test Specification: according to \$15.247 Comment 1:

Dist.: 3m, Ant.: H1 025 Freq: 2.461GHz, Emax: 98.33dBµV/m, RBW: 100kHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

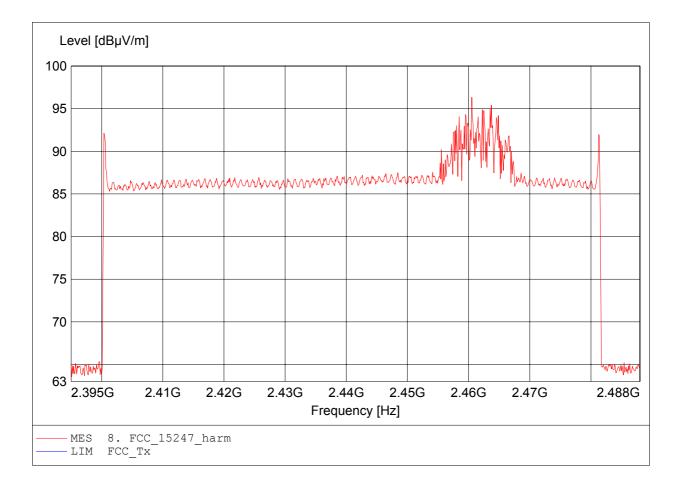
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2462 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)

Test Specification: according to \$15.247 Comment 1:

Dist.: 3m, Ant.: H1 025 Freq: 2.461GHz, Emax: 96.35dBµV/m, RBW: 100kHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

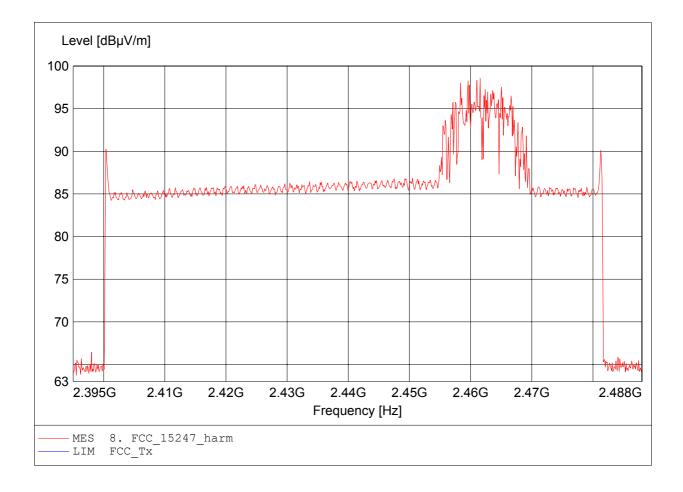
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2462 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)

Test Specification: according to \$15.247 Comment 1:

Dist.: 3m, Ant.: H1 025 Freq: 2.462GHz, Emax: 98.58dBµV/m, RBW: 100kHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

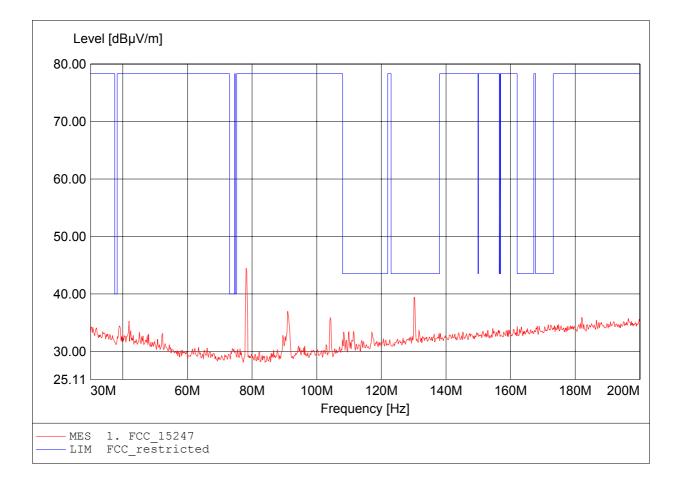
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)

Test Specification: according to \$15.247 Comment 1:

Dist.: 3m, Ant.: HK 116 Freq: 78.167MHz, Emax: 44.50dBuV/m, RBW: 100kHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

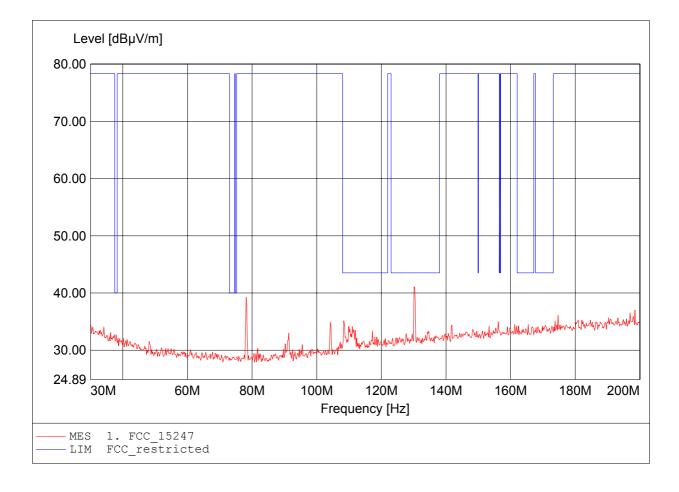
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)

Test Specification: according to \$15.247 Comment 1: Dist.: 3m, Ant.: HK 116

Freq: 130.111MHz, Emax: 41.12dBµV/m, RBW: 100kHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model :

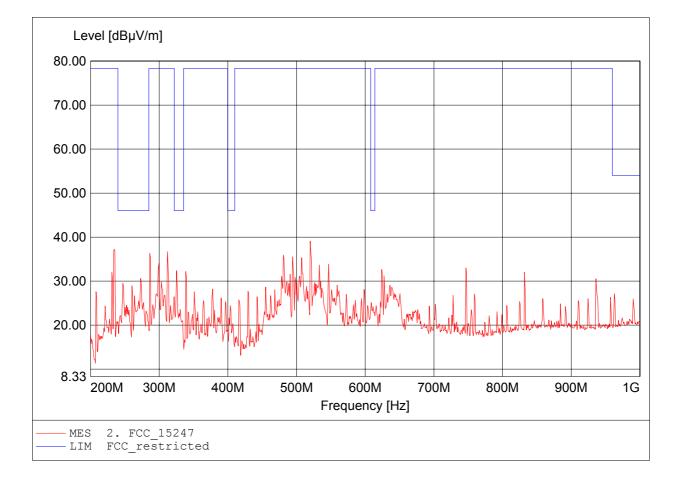
Operator :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)

Test Specification: according to \$15.247

Comment 1:

Dist.: 3m, Ant.: HL 223, amplif. Freq: 520.000MHz, Emax: 39.07dBµV/m, RBW: 100kHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model :

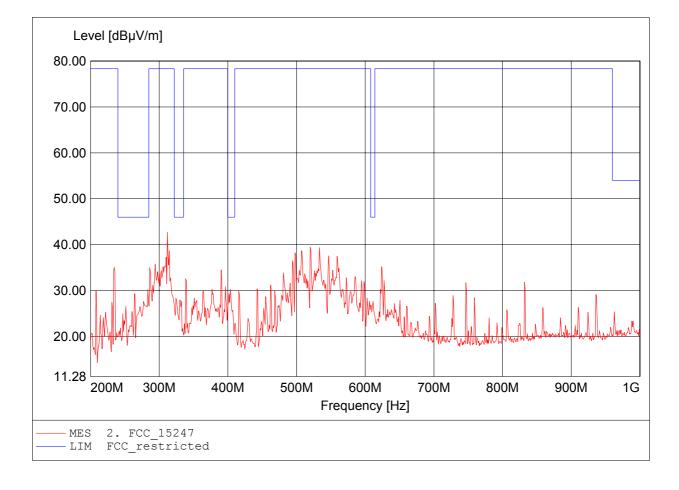
Operator :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)

Test Specification: according to \$15.247

Comment 1:

Dist.: 3m, Ant.: HL 223, amplif. Freq: 312.000MHz, Emax: 42.69dBµV/m, RBW: 100kHz Comment 2:



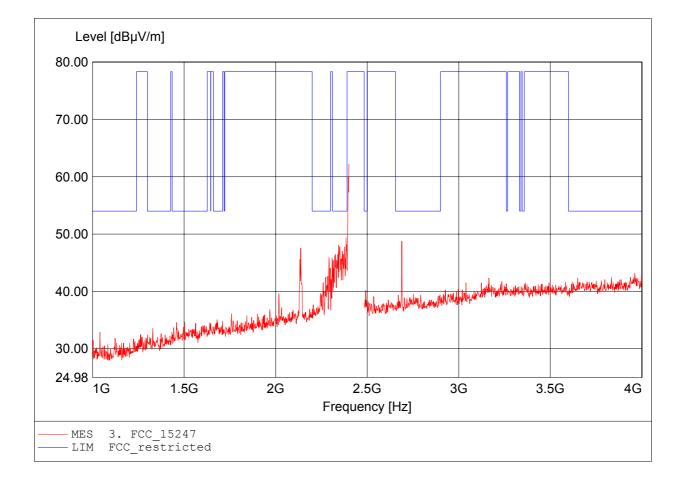
FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:



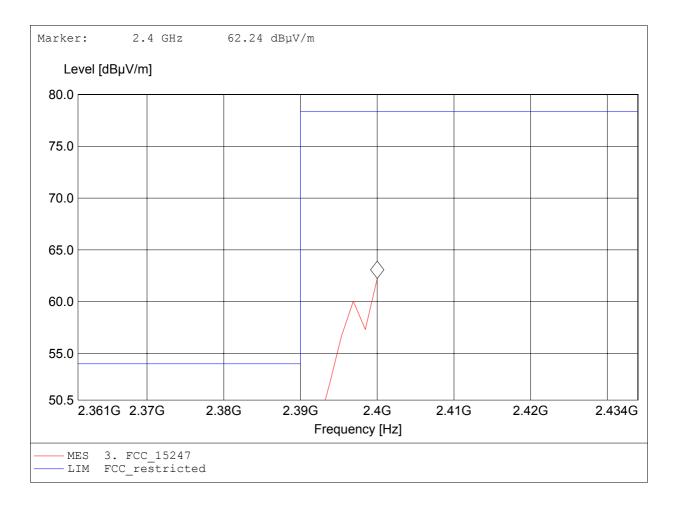
FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model :

Operator: ETS / Mr. Handrik
Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)
Test Specification: according to \$15.247, peak detector Comment 1:



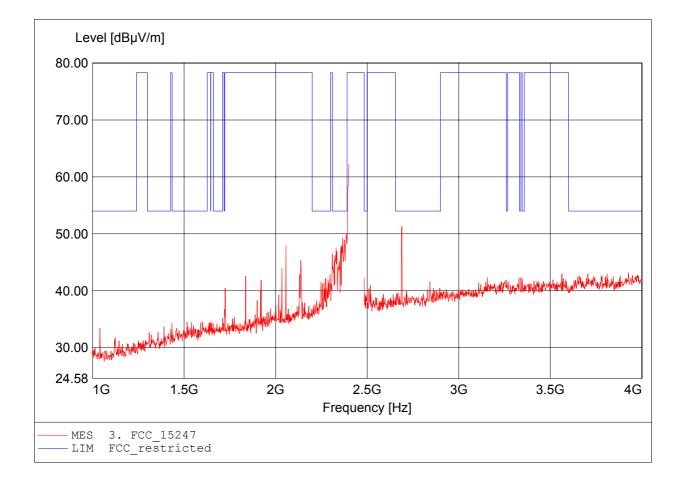
FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model :

Operator: ETS / Mr. Handrik
Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)
Test Specification: according to \$15.247, peak detector Comment 1:



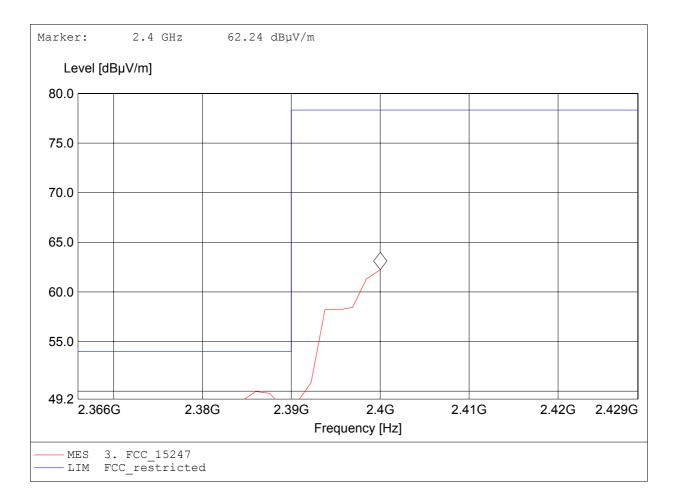
FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model :

Operator: ETS / Mr. Handrik
Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)
Test Specification: according to \$15.247, peak detector Comment 1:



FCC RULES PART 15, SUBPART C

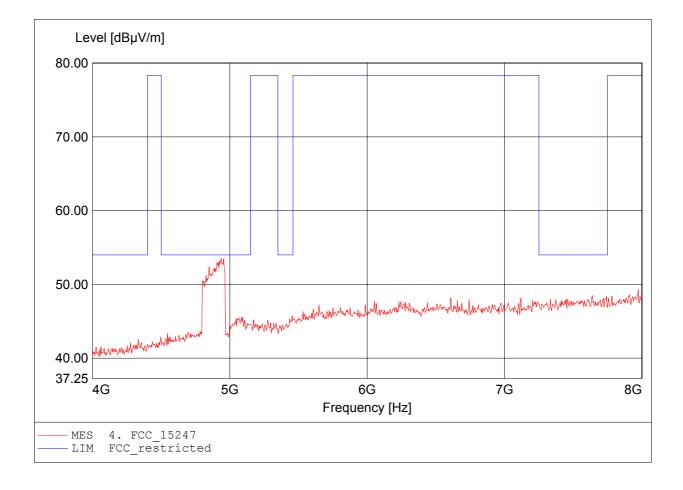
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.938GHz, Emax: 53.54dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

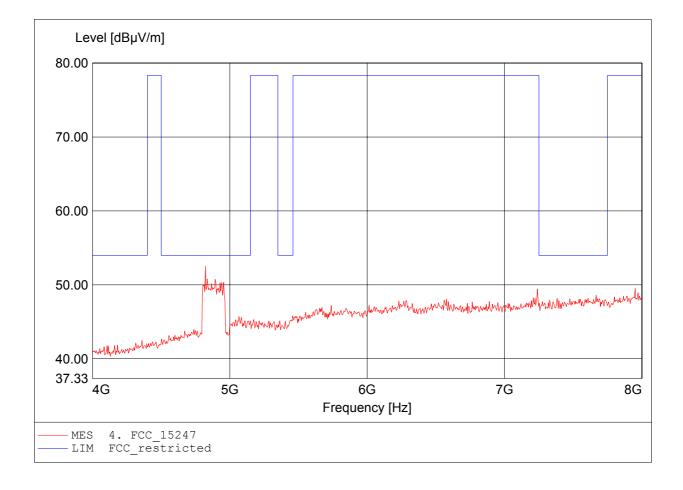
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.822GHz, Emax: 52.54dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

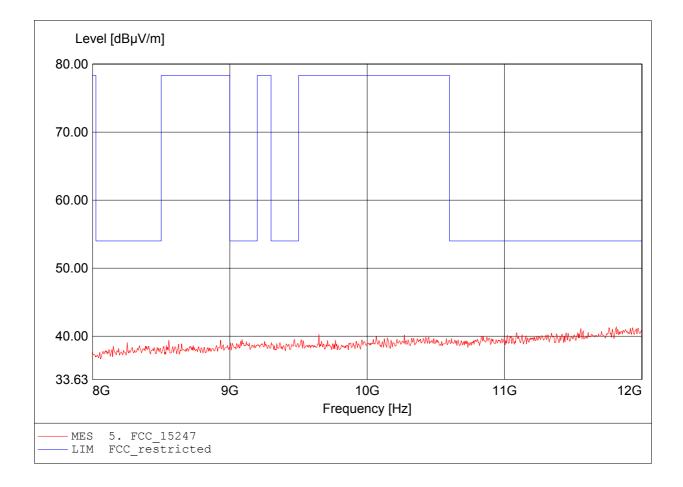
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, ampl.+HP. Freq: 11.813GHz, Emax: 41.38dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

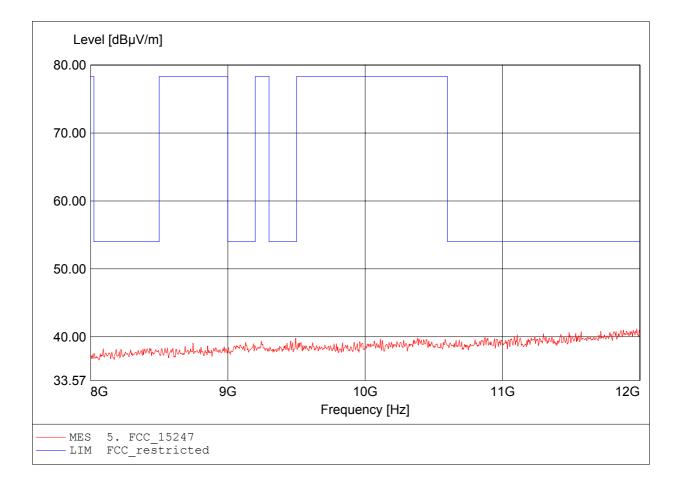
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, ampl.+HP. Freq: 11.978GHz, Emax: 41.18dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

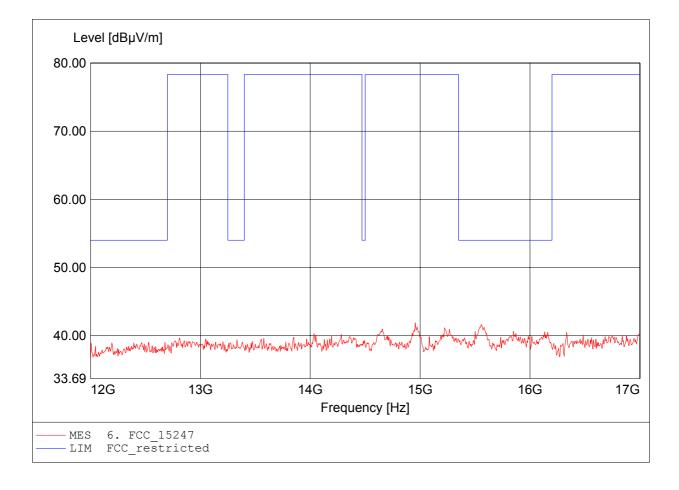
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model:

Operator :

ETS / Mr. Handrik 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Conditions: Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, ampl.+HP. Freq: 14.956GHz, Emax: 41.87dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

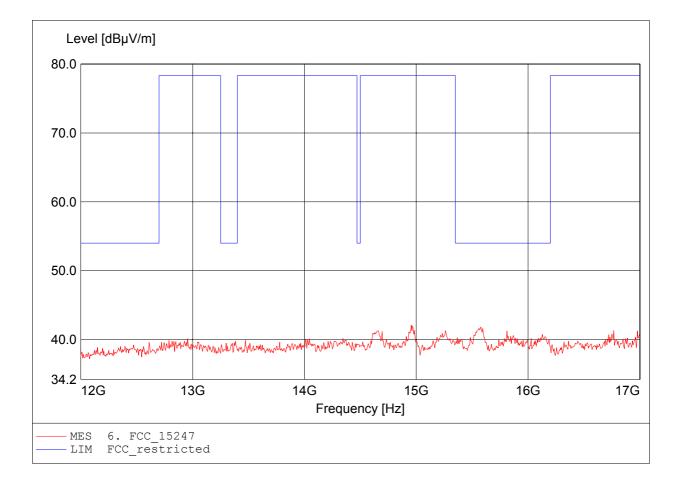
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model:

Operator :

ETS / Mr. Handrik 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Conditions: Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, ampl.+HP. Freq: 14.956GHz, Emax: 42.10dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

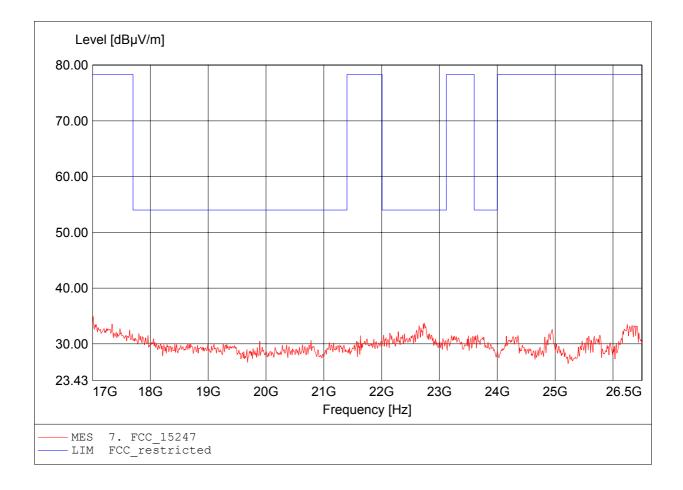
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model :

Operator :

ETS / Mr. Handrik 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Conditions: Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: HL025, amplif. Freq: 17.011GHz, Emax: 34.90dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

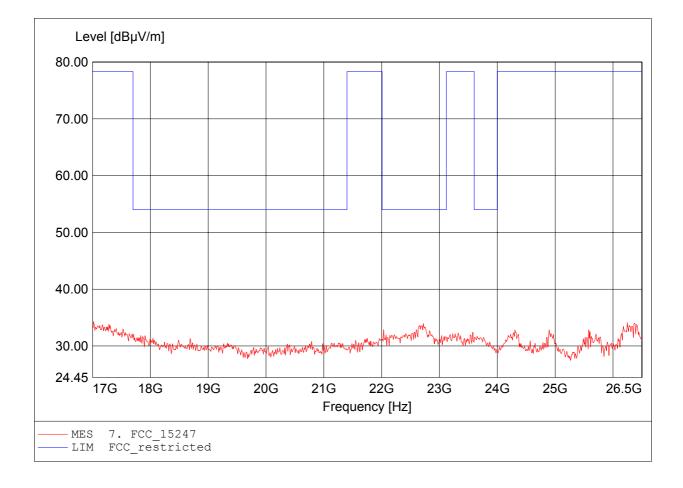
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2412 MHz Model :

Operator :

ETS / Mr. Handrik 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Conditions: Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: HL025, amplif. Freq: 17.021GHz, Emax: 34.30dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

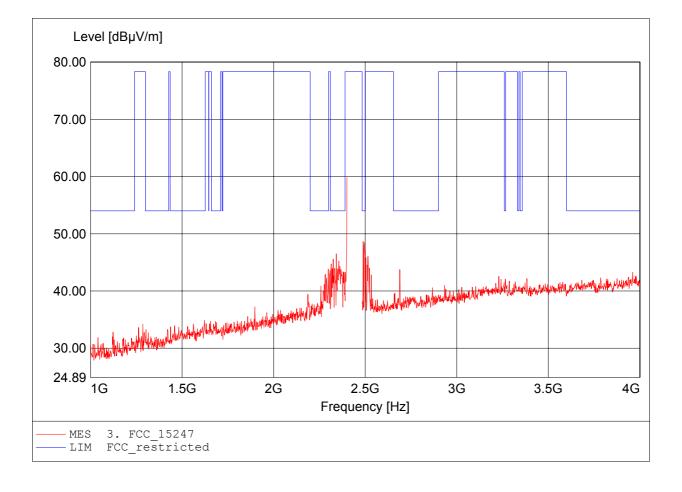
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2437 MHz Model :

Operator: ETS / Mr. Handrik
Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.400GHz, Emax: 59.80dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

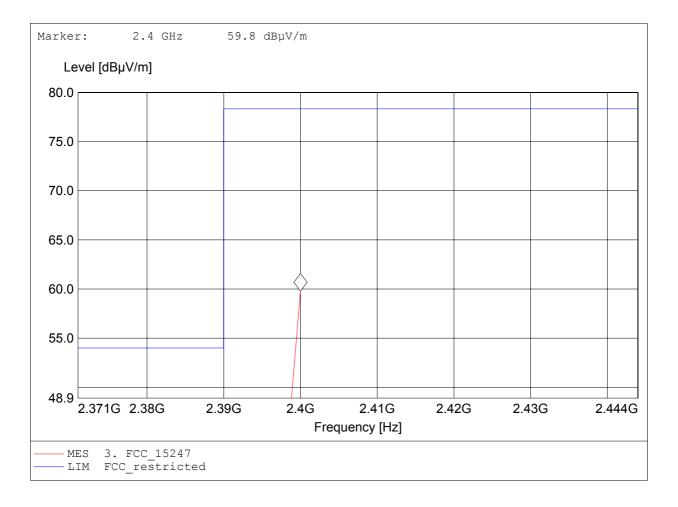
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2437 MHz Model :

Operator: ETS / Mr. Handrik
Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)
Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.400GHz, Emax: 59.80dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

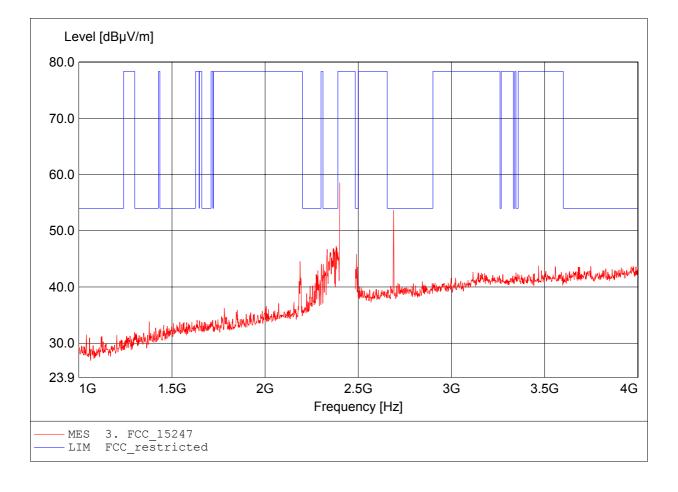
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2437 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.400GHz, Emax: 58.53dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

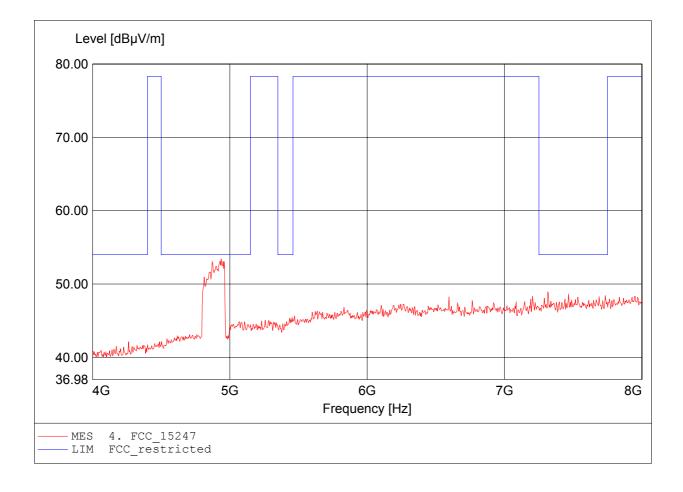
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2437 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.938GHz, Emax: 53.43dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

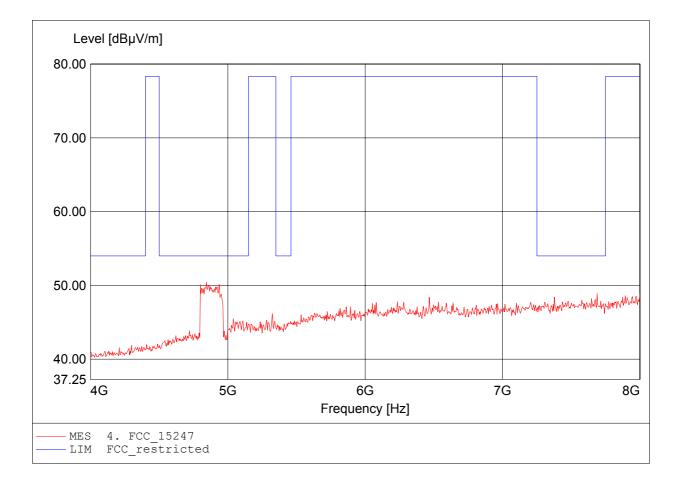
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2437 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.844GHz, Emax: 50.43dBµV/m, RBW: 1MHz Comment 2:



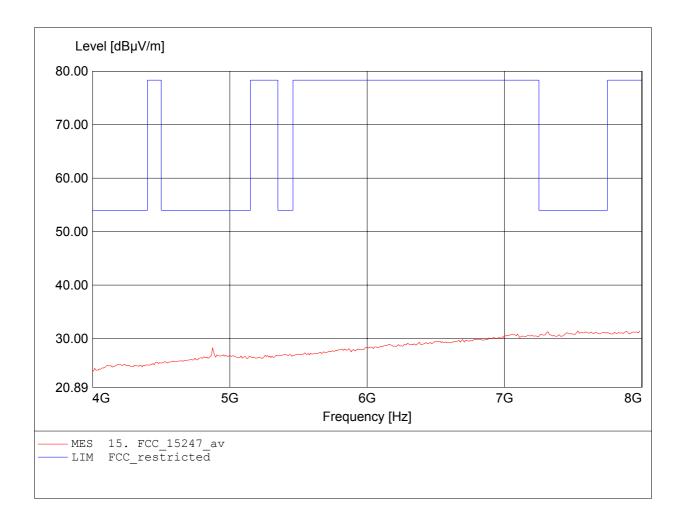
Spurious emissions Field Strength FCC RULES PART 15, SUBPART C

Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 11Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, average detector Dist.: 3m, Ant.: HL025, ampl.+HP.
Comment 2: Freq: 7.984GHz, Emax: 31.45dBµV/m, RBW: 1MHz



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

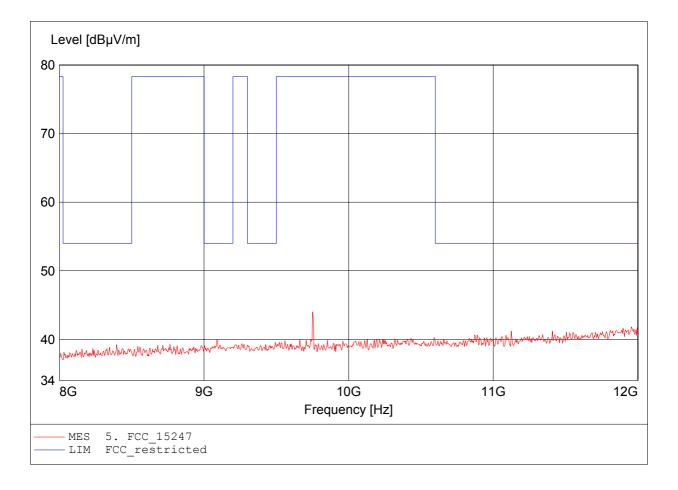
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2437 MHz Model:

Operator :

ETS / Mr. Handrik 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Conditions: Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 9.751GHz, Emax: 44.01dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

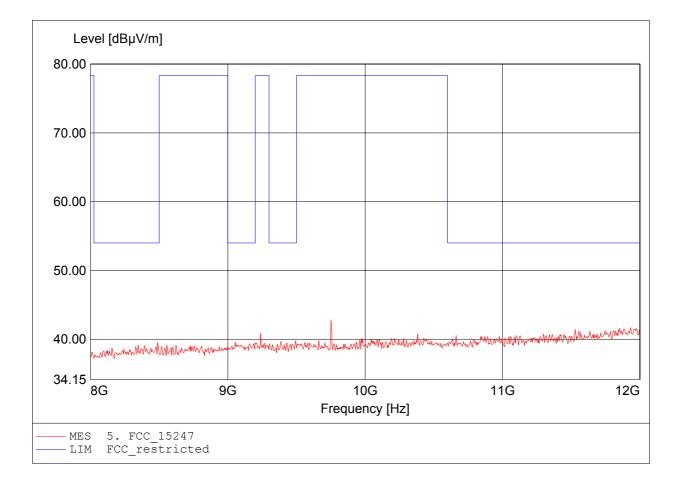
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2437 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 9.751GHz, Emax: 42.82dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

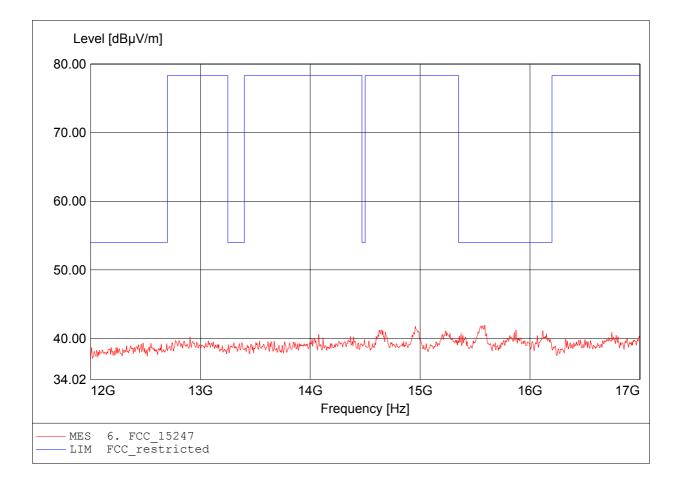
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2437 MHz Model:

Operator :

ETS / Mr. Handrik 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Conditions: Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, ampl.+HP. Freq: 15.589GHz, Emax: 41.94dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

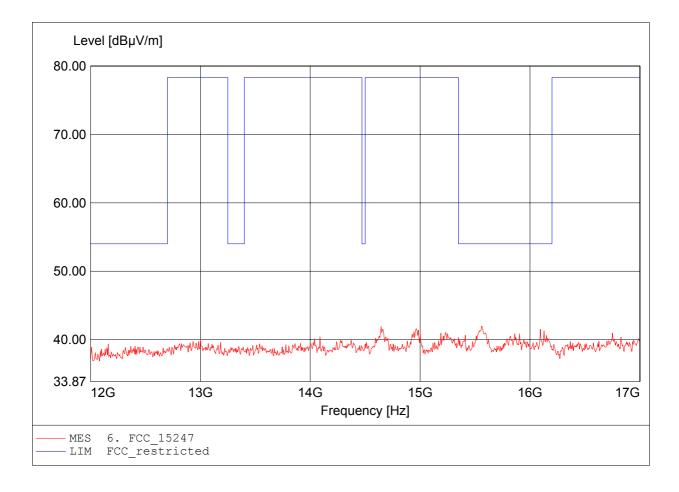
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2437 MHz Model :

Operator :

ETS / Mr. Handrik 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Conditions: Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, ampl.+HP. Freq: 15.561GHz, Emax: 41.98dBuV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

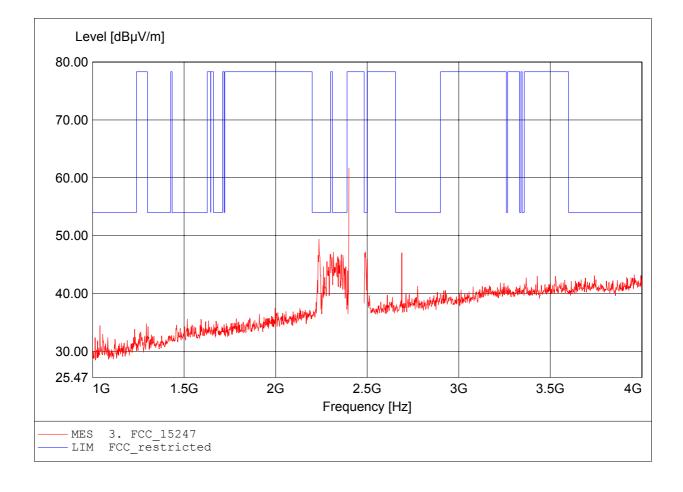
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, amplif. Freq: 2.400GHz, Emax: 61.63dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

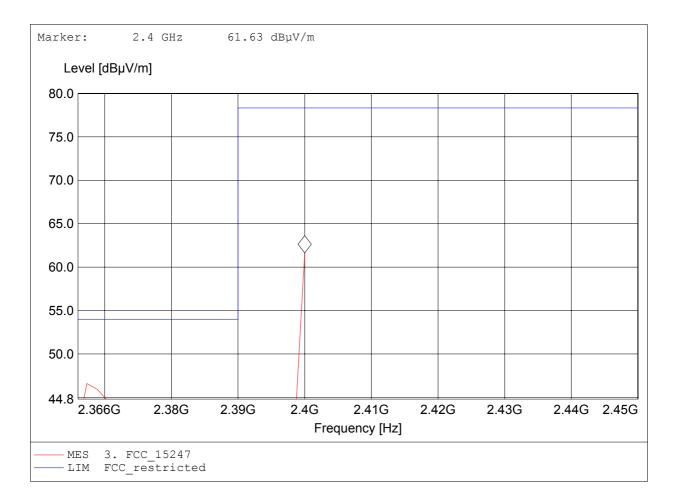
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model:

Operator: ETS / Mr. Handrik
Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)
Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.400GHz, Emax: 61.63dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

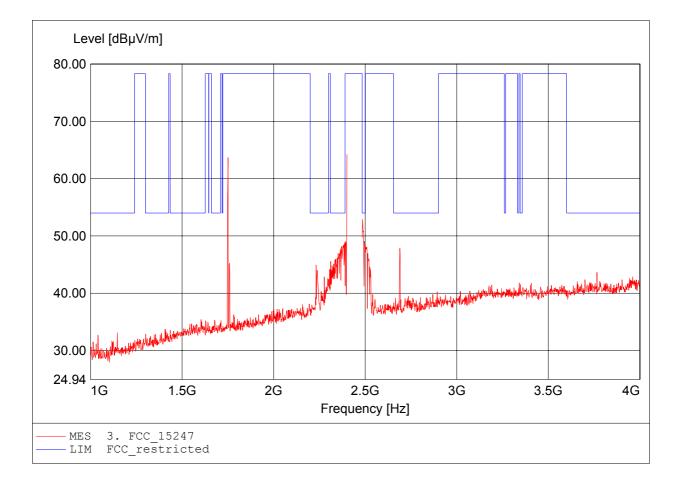
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model :

Operator: ETS / Mr. Handrik
Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.400GHz, Emax: 64.22dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

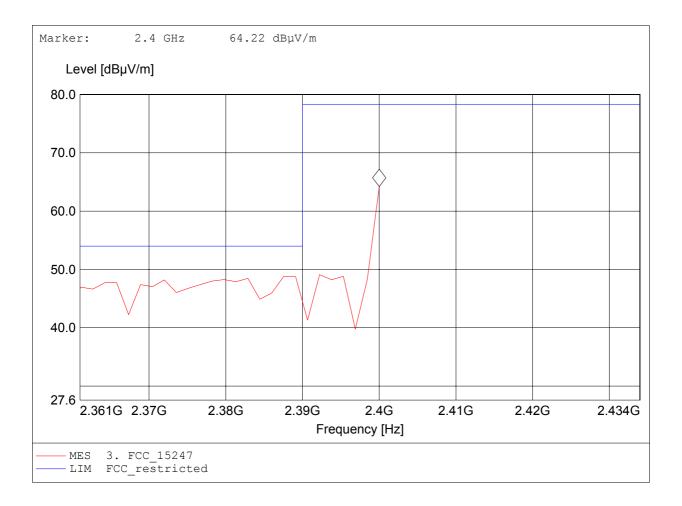
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model :

Operator: ETS / Mr. Handrik
Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)
Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.400GHz, Emax: 64.22dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

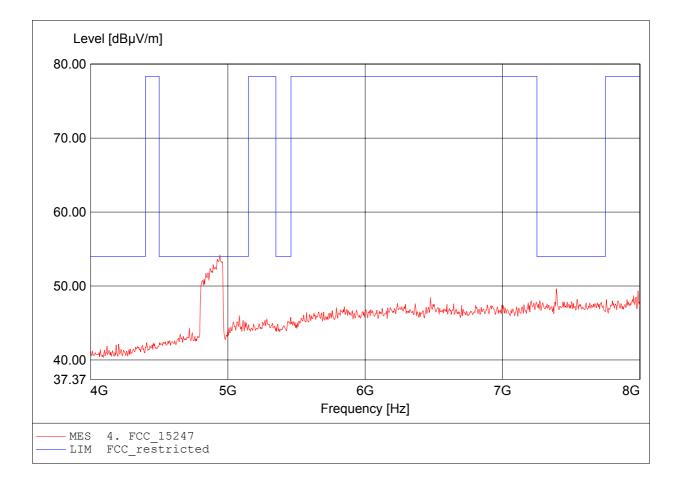
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.942GHz, Emax: 54.21dBµV/m, RBW: 1MHz Comment 2:



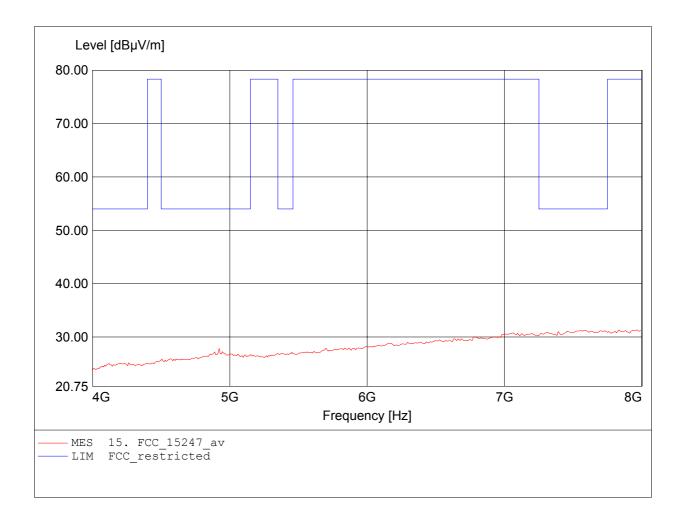
Spurious emissions Field Strength FCC RULES PART 15, SUBPART C

Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 11Mbit/s / 2462 MHz Model:

Test Site / Operator: ETS / Mr. Meng Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, average detector Dist.: 3m, Ant.: HL025, ampl.+HP.
Comment 2: Freq: 7.968GHz, Emax: 31.32dBµV/m, RBW: 1MHz



FCC RULES PART 15, SUBPART C

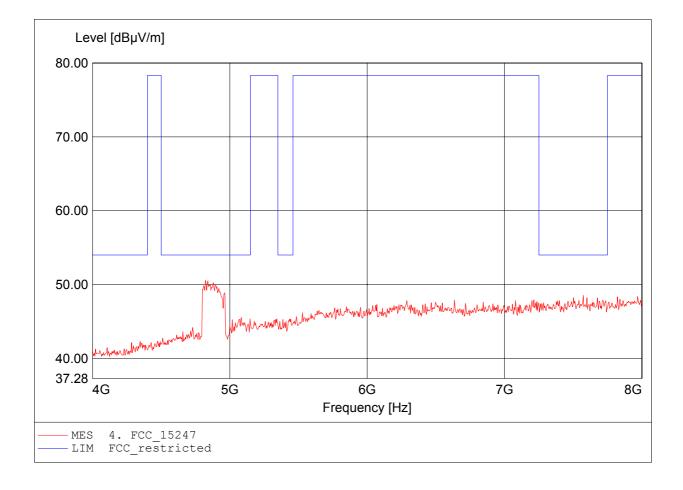
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.822GHz, Emax: 50.59dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

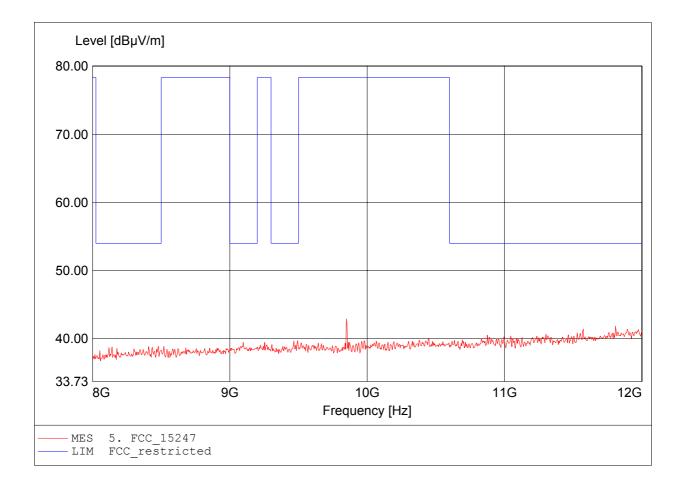
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 9.849GHz, Emax: 42.90dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

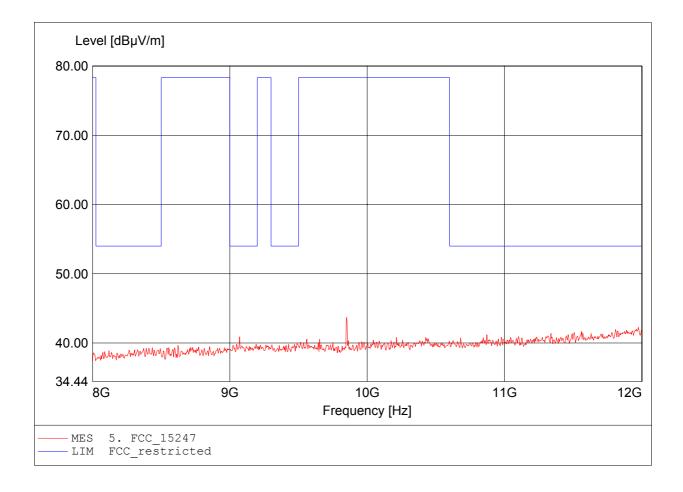
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 9.849GHz, Emax: 43.71dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

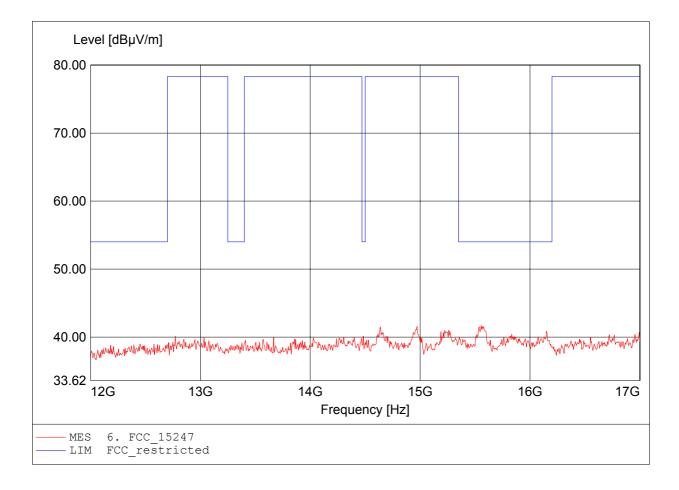
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model:

Operator :

ETS / Mr. Handrik 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Conditions: Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, ampl.+HP. Freq: 15.556GHz, Emax: 41.71dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

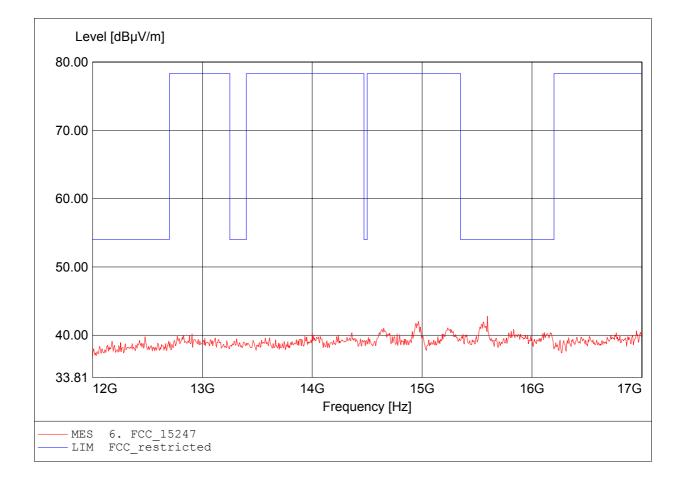
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:1 / 11 Mbit/s / 2462 MHz Model:

Operator :

ETS / Mr. Handrik 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Conditions: Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, ampl.+HP. Freq: 15.594GHz, Emax: 42.77dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

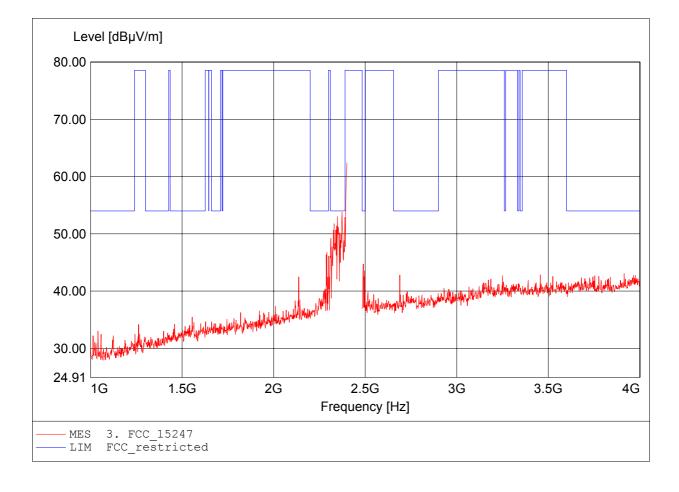
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2412 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: $25\,^{\circ}\text{C}$ / Unom.: $12\,^{\circ}\text{V}$ DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, amplif. Freq: 2.400GHz, Emax: 62.39dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

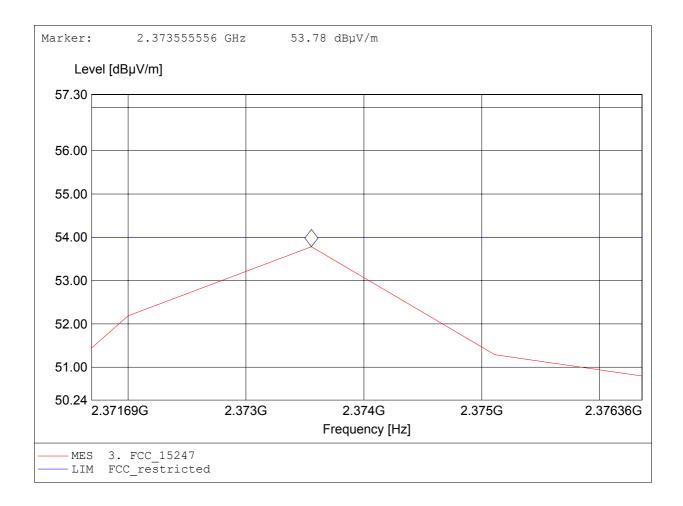
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2412 MHz Model:

Operator: ETS / Mr. Handrik
Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor)
Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.400GHz, Emax: 62.39dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

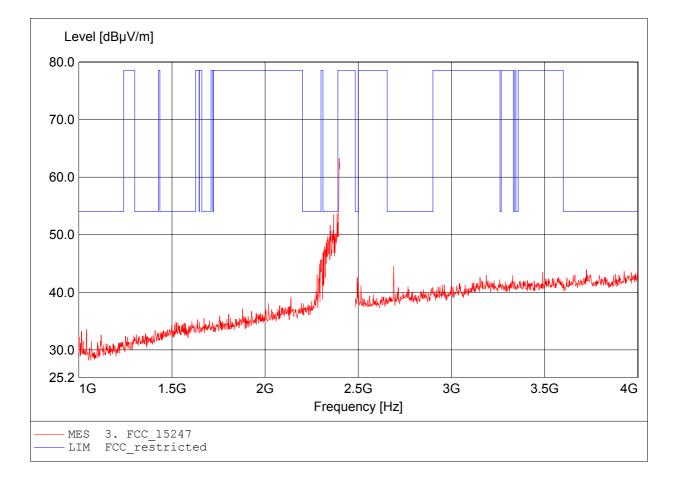
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2412 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.397GHz, Emax: 63.32dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

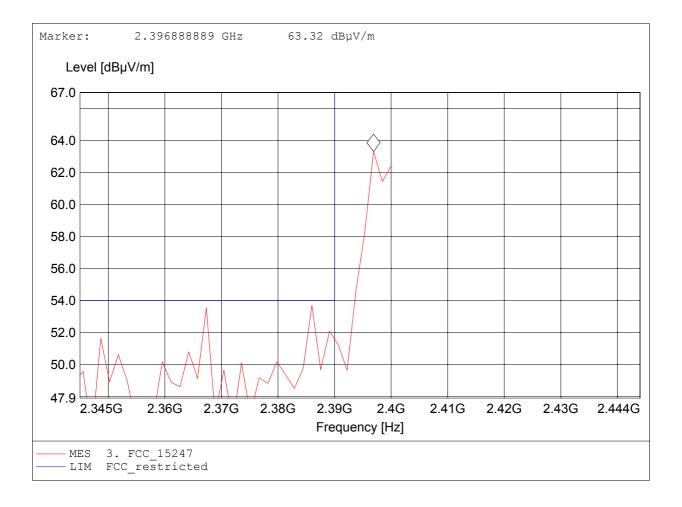
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2412 MHz Model:

Operator: ETS / Mr. Handrik
Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.397GHz, Emax: 63.32dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

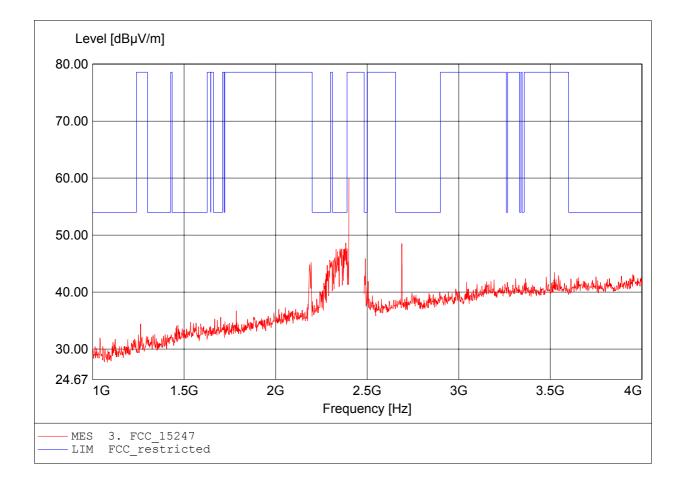
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2437 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: $25\,^{\circ}\text{C}$ / Unom.: $12\,^{\circ}\text{V}$ DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.400GHz, Emax: 59.90dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

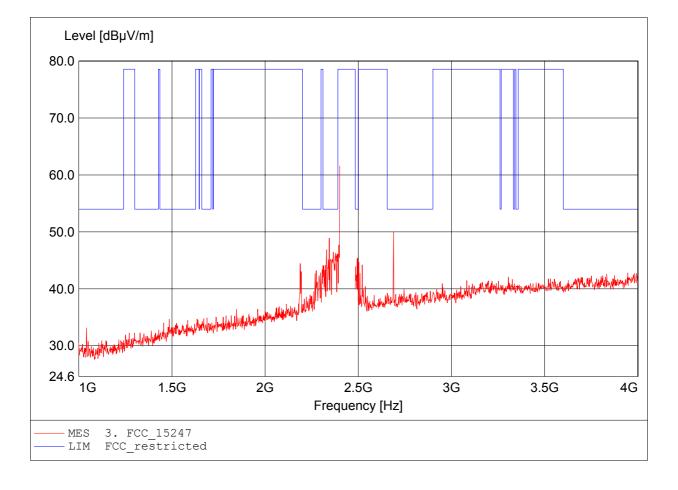
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2437 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, amplif. Freq: 2.400GHz, Emax: 61.61dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

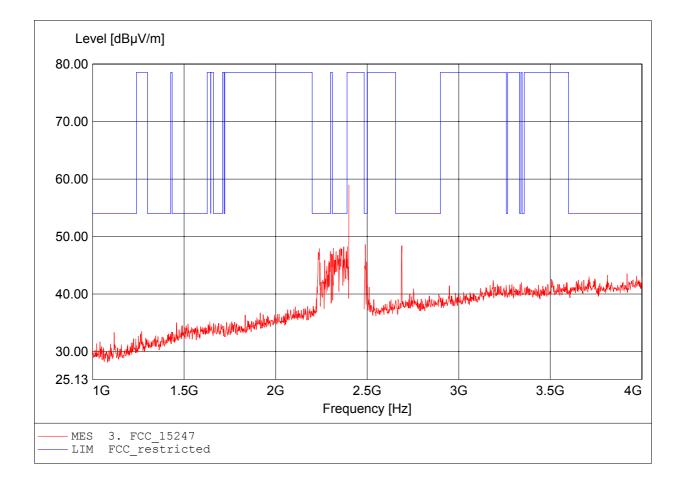
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2462 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: Hl 025, amplif. Freq: 2.400GHz, Emax: 58.96dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

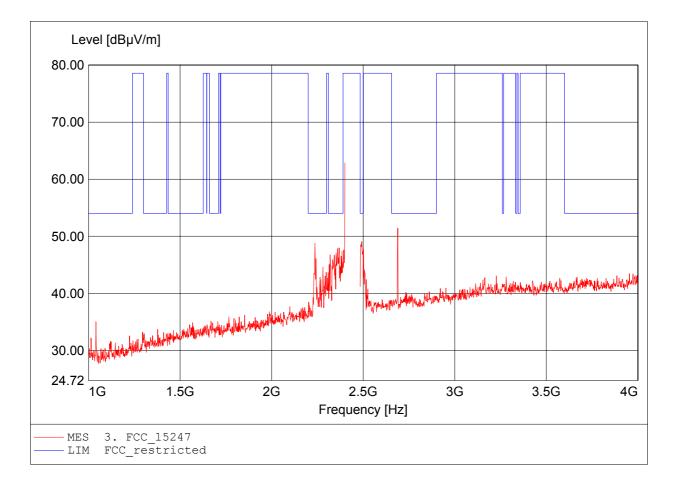
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2462 MHz Model :

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, amplif. Freq: 2.400GHz, Emax: 62.85dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

Approval Holder: Siemens AG A&D SE RD 51

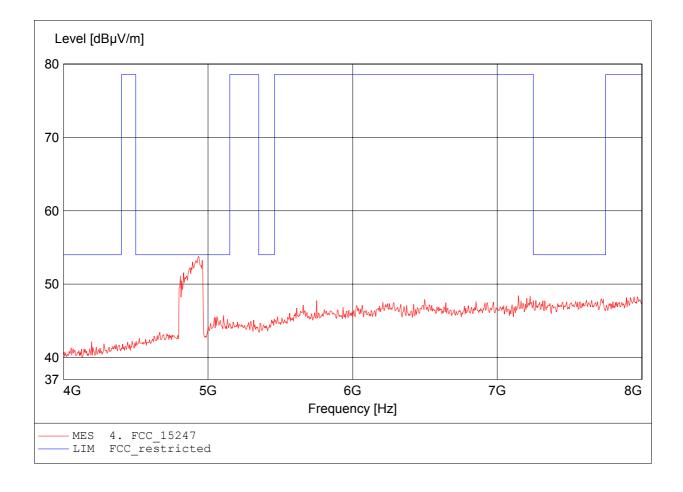
Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2412 MHz Model:

Operator :

ETS / Mr. Handrik 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Conditions: Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.933GHz, Emax: 53.80dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

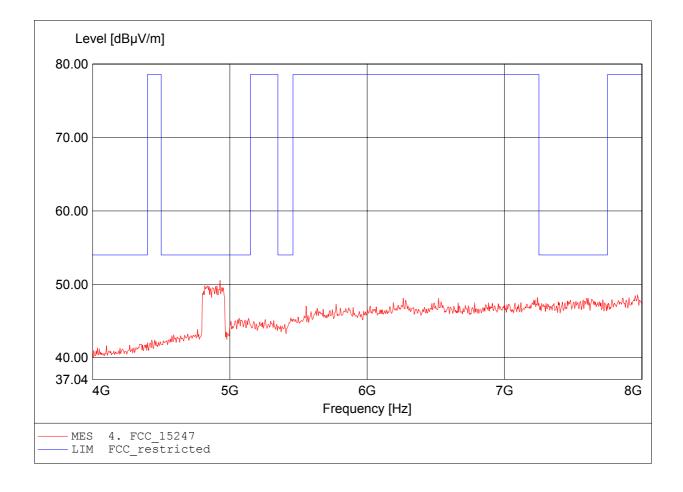
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2412 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.929GHz, Emax: 50.54dBµV/m, RBW: 1MHz Comment 1:

Comment 2:



FCC RULES PART 15, SUBPART C

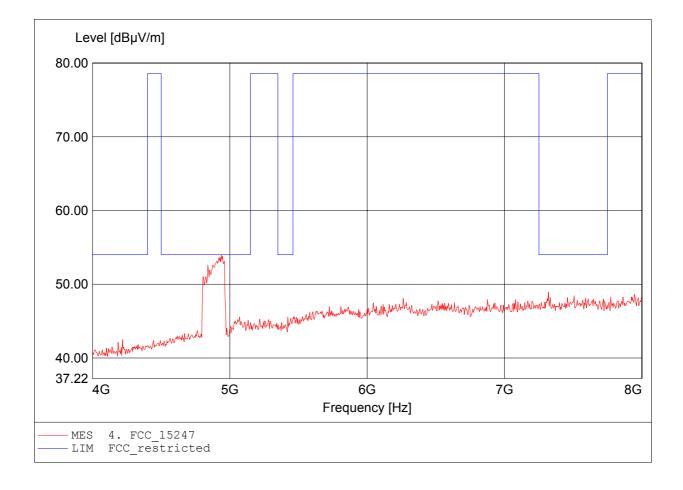
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2437 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.938GHz, Emax: 53.94dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

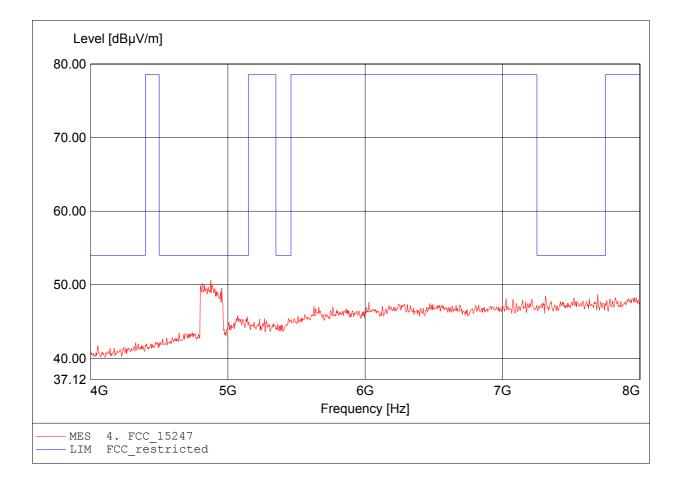
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2437 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.876GHz, Emax: 50.59dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

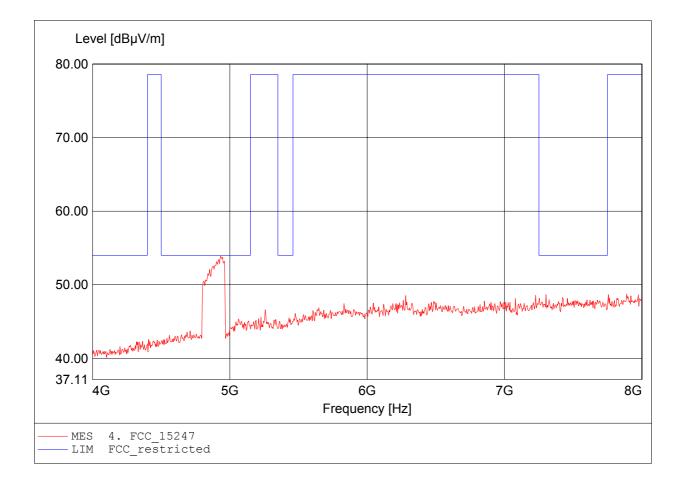
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2462 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.933GHz, Emax: 53.88dBµV/m, RBW: 1MHz Comment 2:



FCC RULES PART 15, SUBPART C

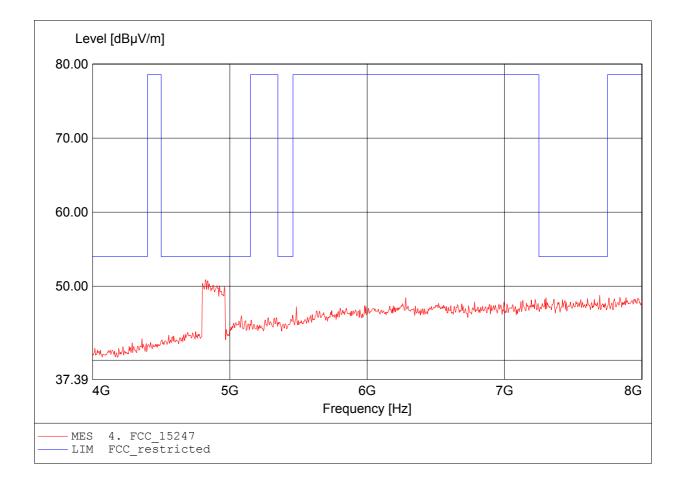
Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT :

Mobile Panel 277 IWLAN / ant.:2 / 11 Mbit/s / 2462 MHz Model:

Operator : ETS / Mr. Handrik Test Conditions: 25°C / Unom.: 12 V DC (AC/DC adaptor) Test Specification: according to \$15.247, peak detector Comment 1:

Dist.: 3m, Ant.: H1 025, ampl.+HP. Freq: 4.822GHz, Emax: 50.89dBµV/m, RBW: 1MHz Comment 2:



Siemens AG A&D SE RD 51 Approval Holder:

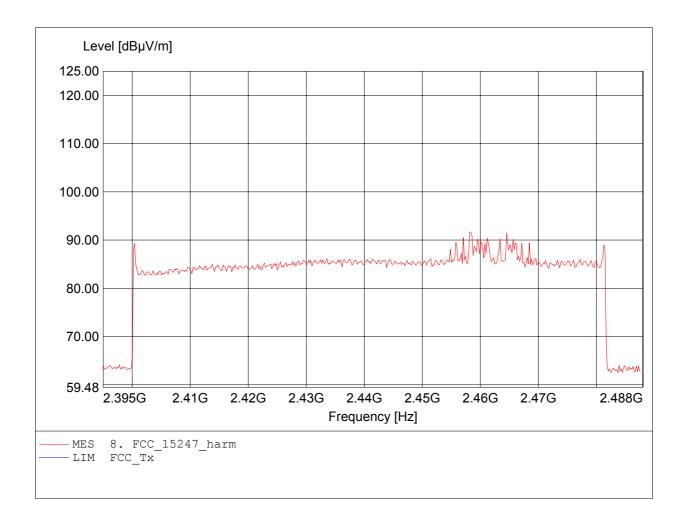
EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2462 MHz Model:

Test Site / Operator: ETS / Mr. Meng Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor)

Test Specification: according to \$15.247 Comment 1:

Dist.: 3m, Ant.: HL025 Freq: 2.458GHz, Emax: 91.69dBμV/m, RBW: 100kHz Comment 2:



Siemens AG A&D SE RD 51 Approval Holder:

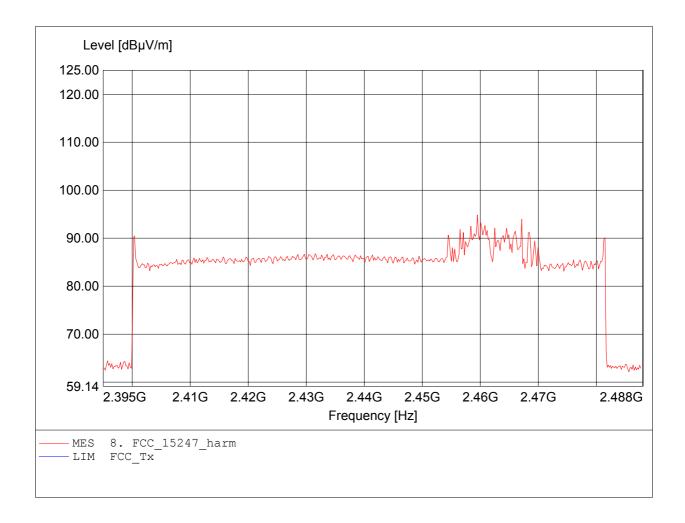
EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2462 MHz Model:

Test Site / Operator: ETS / Mr. Meng Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor)

Test Specification: according to \$15.247 Comment 1: Dist.: 3m, Ant.: HL025

Freq: 2.459GHz, Emax: 94.85dBμV/m, RBW: 100kHz Comment 2:



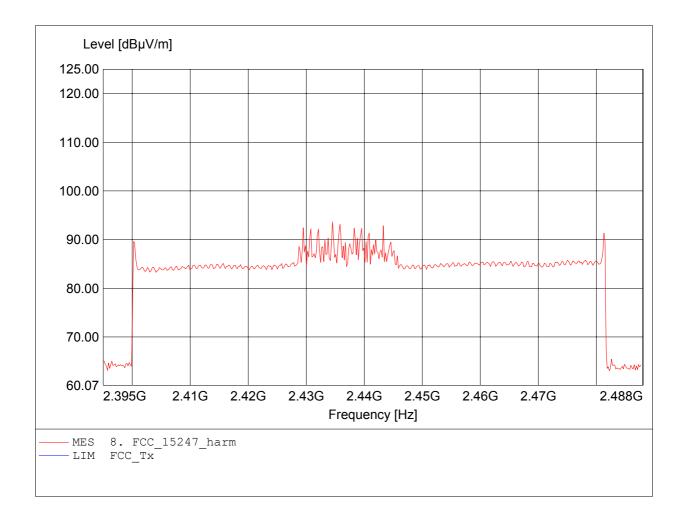
Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2437 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor)

Test Specification: according to \$15.247 Comment 1: Dist.: 3m, Ant.: HL025

Freq: 2.435GHz, Emax: 93.66dBμV/m, RBW: 100kHz Comment 2:



Siemens AG A&D SE RD 51 Approval Holder:

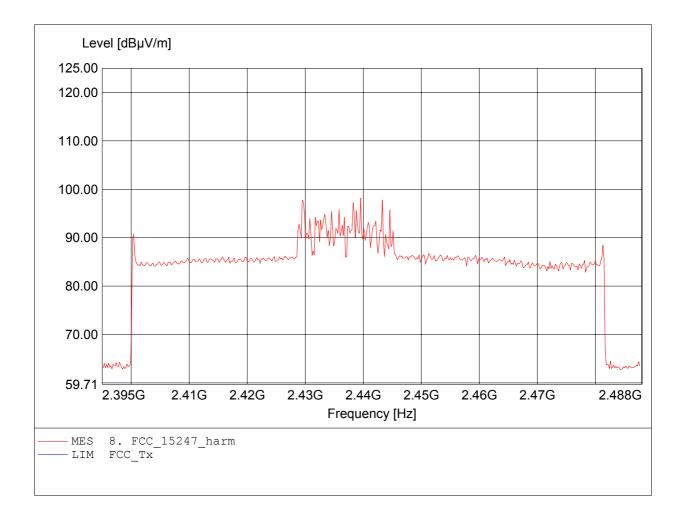
EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:2 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor)

Test Specification: according to \$15.247 Comment 1:

Dist.: 3m, Ant.: HL025 Freq: 2.440GHz, Emax: 98.16dBμV/m, RBW: 100kHz Comment 2:

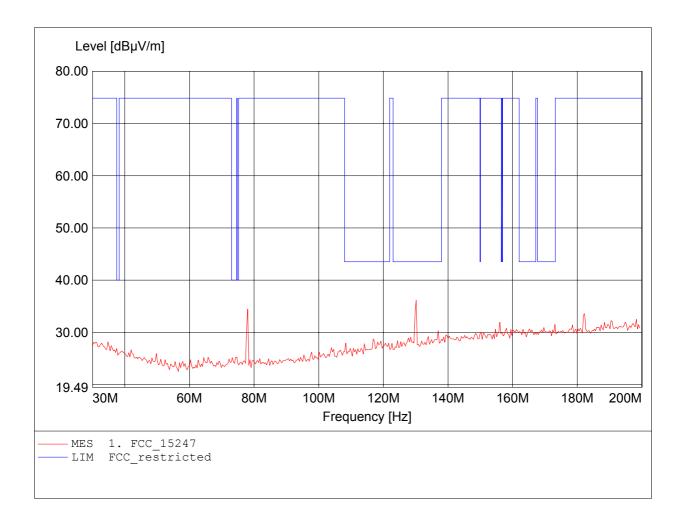


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN Mode: ant.:1 / 54Mbit/s / 2412 MHz (worst case)
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor)

Test Specification: according to \$15.247 Comment 1: Dist.: 3m, Ant.: HK 116

Comment 2: Freq: 130.160MHz, Emax: 36.17dBµV/m, RBW: 100kHz

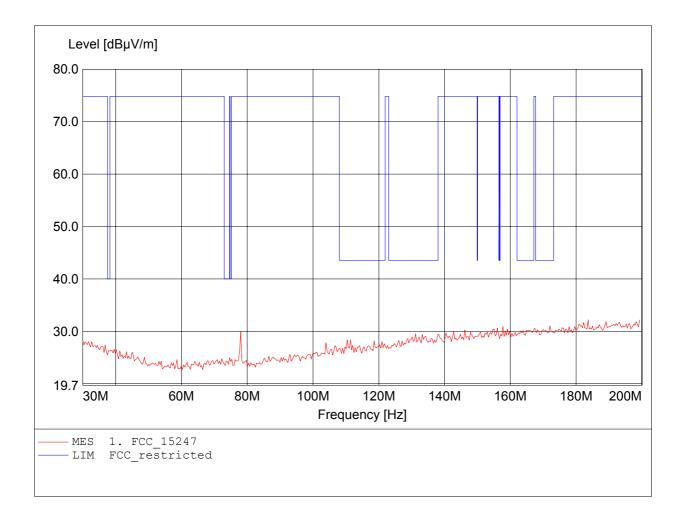


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN Mode: ant.:1 / 54Mbit/s / 2412 MHz (worst case)
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor)

Test Specification: according to \$15.247 Comment 1: Dist.: 3m, Ant.: HK 116

Comment 2: Freq: 183.647MHz, Emax: 32.19dBµV/m, RBW: 100kHz



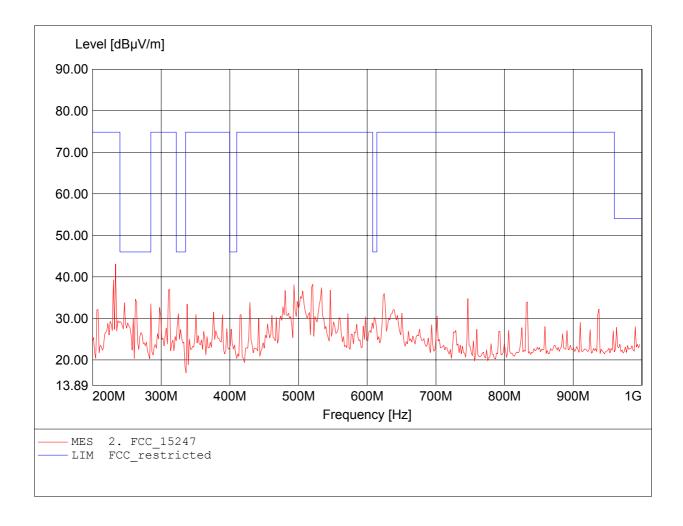
Siemens AG A&D SE RD 51 Approval Holder:

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN Mode: ant.:1 / 54Mbit/s / 2412 MHz (worst case)
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor)

Test Specification: according to \$15.247

Comment 1: Dist.: 3m, Ant.: HL 223, amplif.

Comment 2: Freq: 233.667MHz, Emax: 43.10dBμV/m, RBW: 100kHz



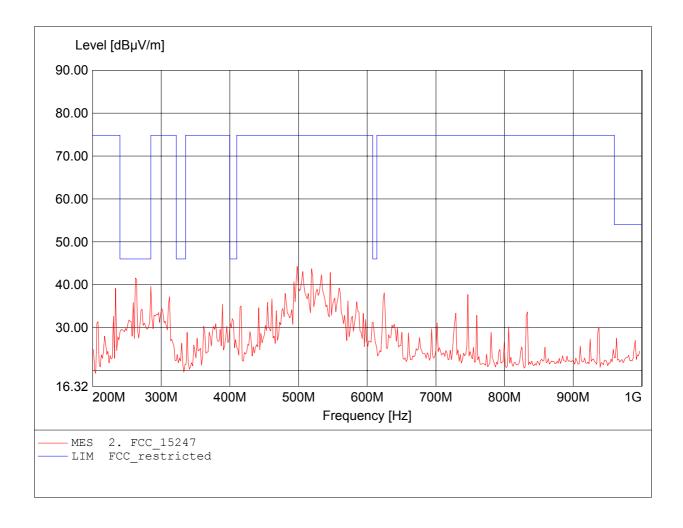
Siemens AG A&D SE RD 51 Approval Holder:

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN Mode: ant.:1 / 54Mbit/s / 2412 MHz (worst case)
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor)

Test Specification: according to \$15.247

Comment 1: Dist.: 3m, Ant.: HL 223, amplif.

Comment 2: Freq: 498.196MHz, Emax: 44.26dBµV/m, RBW: 100kHz

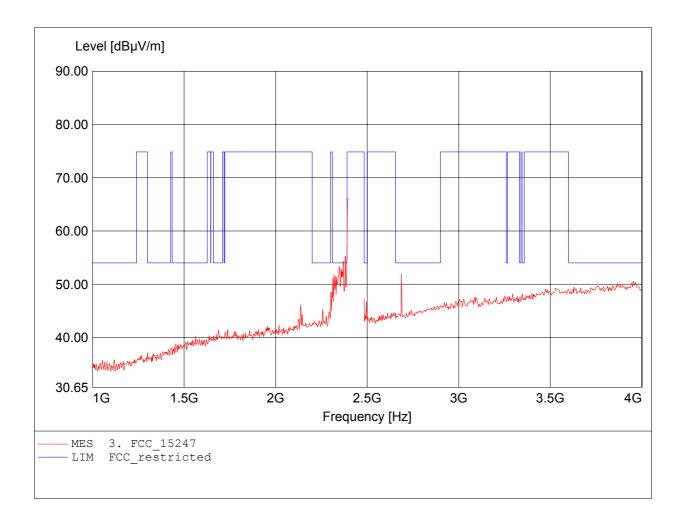


Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2412 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, amplif.
Comment 2: Freq: 2.394GHz, Emax: 66.20dBµV/m, RBW: 1MHz



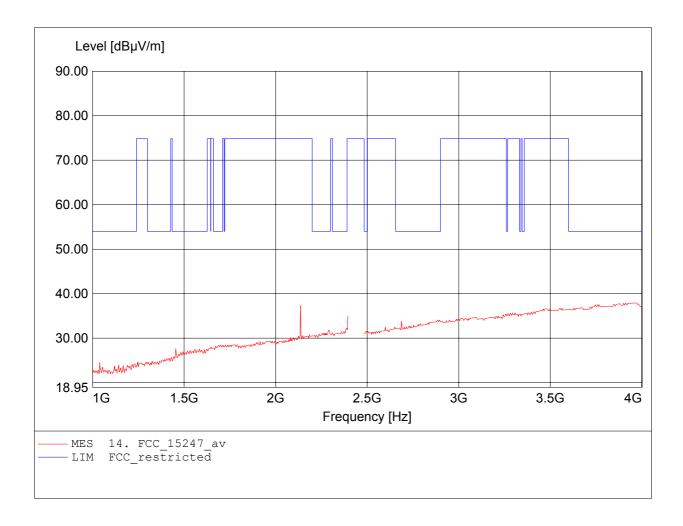
Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2412 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, average detector Dist.: 3m, Ant.: HL025, amplif.

Comment 2: Freq: 3.973GHz, Emax: 37.91dBµV/m, RBW: 1MHz

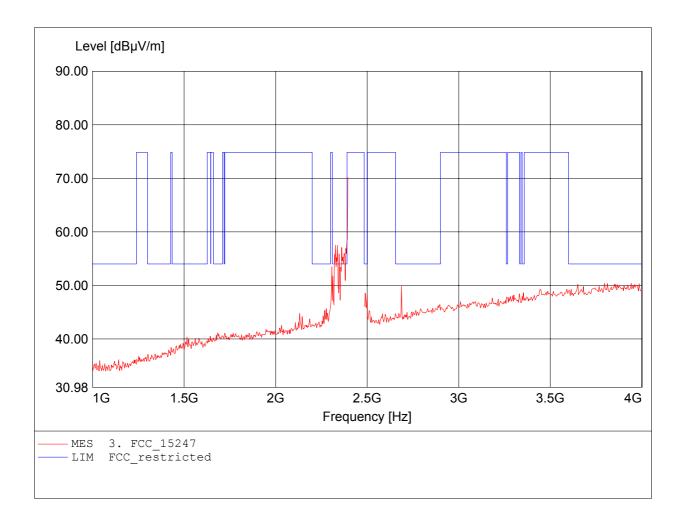


Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2412 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, amplif.
Comment 2: Freq: 2.394GHz, Emax: 70.18dBµV/m, RBW: 1MHz



Siemens AG A&D SE RD 51 Approval Holder:

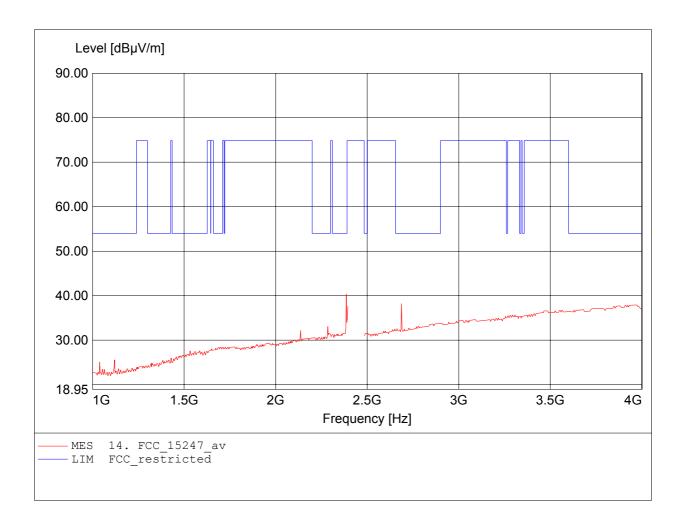
EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2412 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) according to \$15.247, average detector Test Specification:

Comment 1:

Dist.: 3m, Ant.: HL025, amplif. Freq: 2.386GHz, Emax: 40.29dBµV/m, RBW: 1MHz Comment 2:

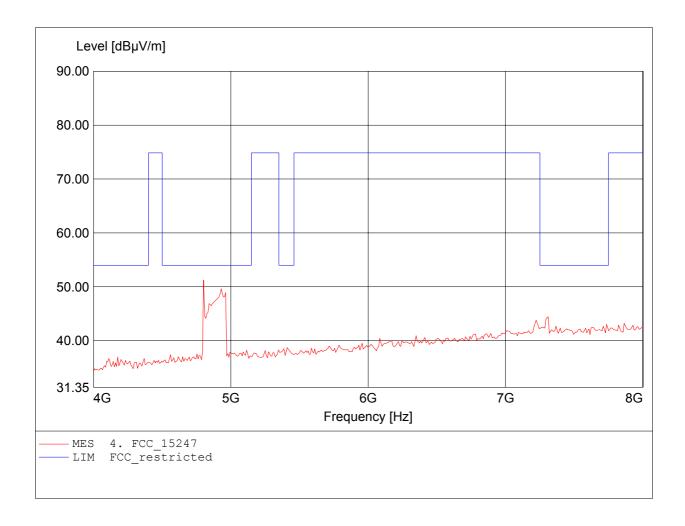


Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2412 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.
Comment 2: Freq: 4.802GHz, Emax: 51.24dBµV/m, RBW: 1MHz



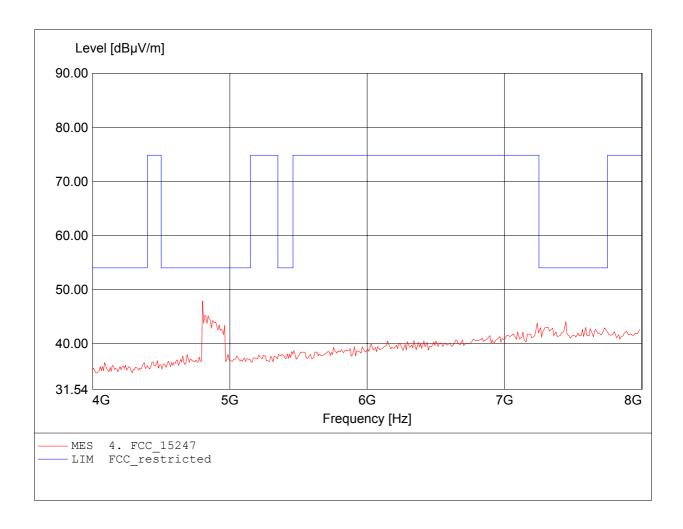
Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2412 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.

Comment 2: Freq: 4.802GHz, Emax: 47.87dBpV/m, RBW: 1MHz

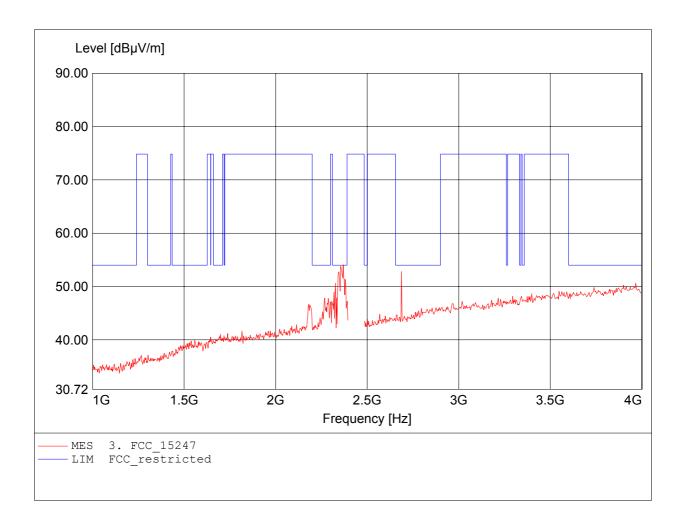


Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, amplif.
Comment 2: Freq: 2.369GHz, Emax: 54.08dBµV/m, RBW: 1MHz



Siemens AG A&D SE RD 51 Approval Holder:

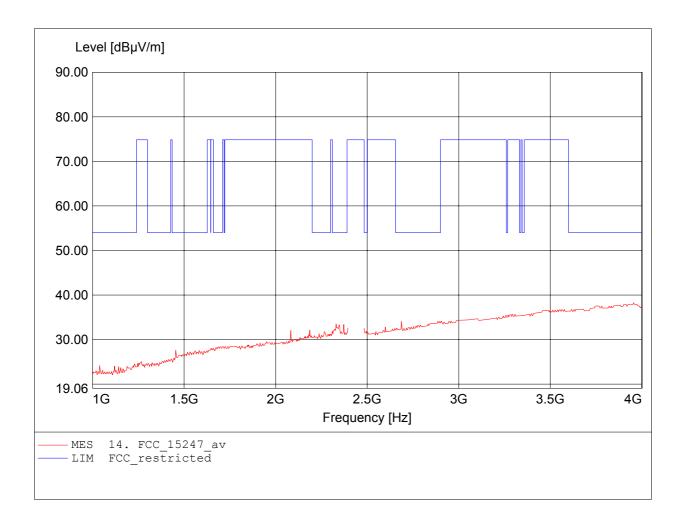
EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) according to \$15.247, average detector Test Specification:

Comment 1:

Dist.: 3m, Ant.: HL025, amplif. Freq: 3.954GHz, Emax: 38.26dBµV/m, RBW: 1MHz Comment 2:

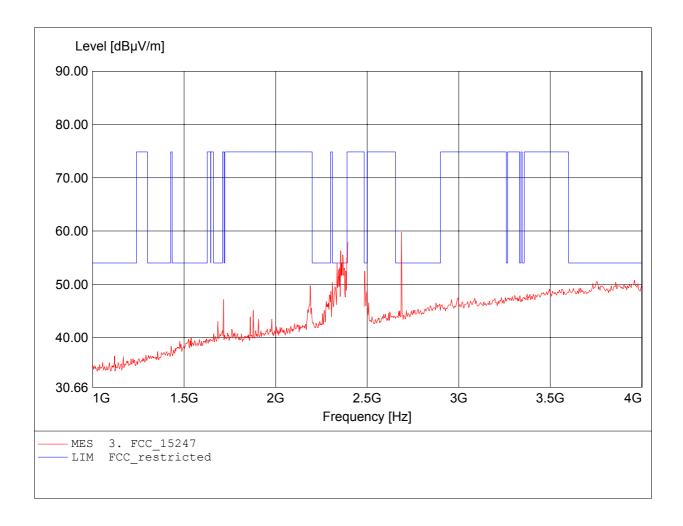


Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, amplif.
Comment 2: Freq: 2.687GHz, Emax: 59.79dBµV/m, RBW: 1MHz



Siemens AG A&D SE RD 51 Approval Holder:

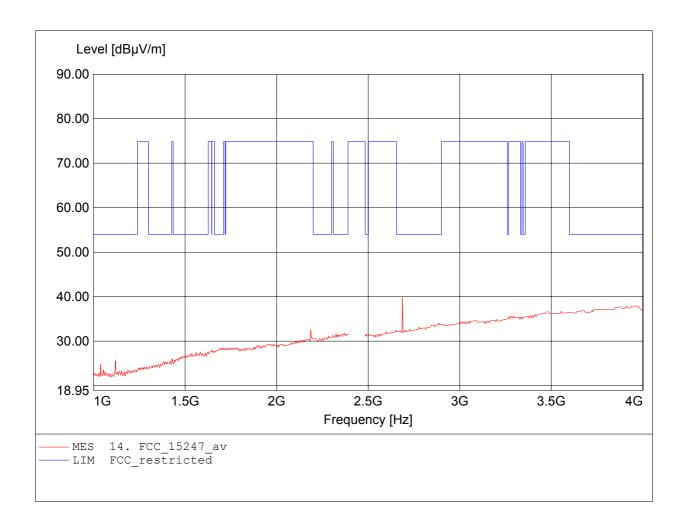
EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) according to §15.247, average detector Test Specification:

Comment 1:

Dist.: 3m, Ant.: HL025, amplif. Freq: 2.687GHz, Emax: 39.83dBµV/m, RBW: 1MHz Comment 2:

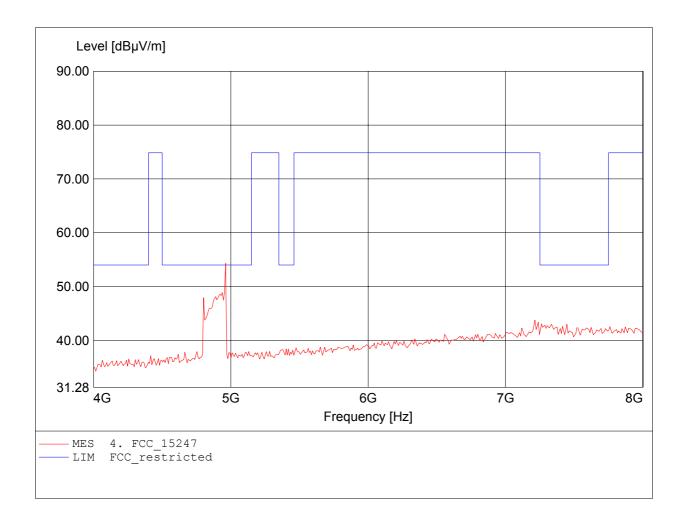


Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.
Comment 2: Freq: 4.962GHz, Emax: 54.31dBµV/m, RBW: 1MHz

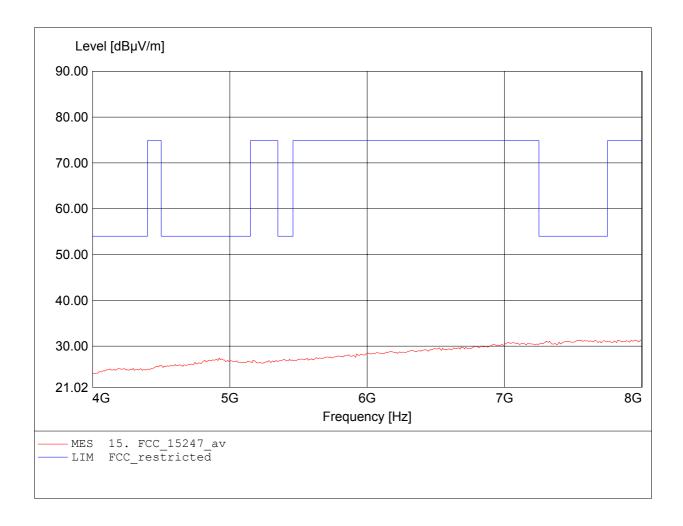


Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, average detector Dist.: 3m, Ant.: HL025, ampl.+HP.
Comment 2: Freq: 7.952GHz, Emax: 31.36dBµV/m, RBW: 1MHz



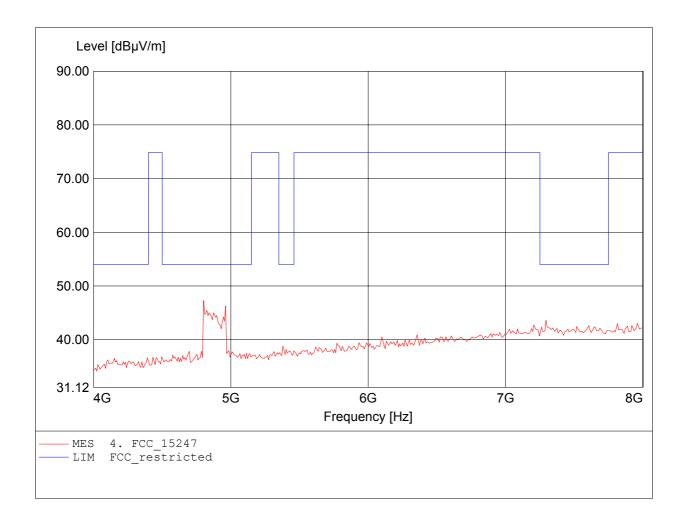
Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.

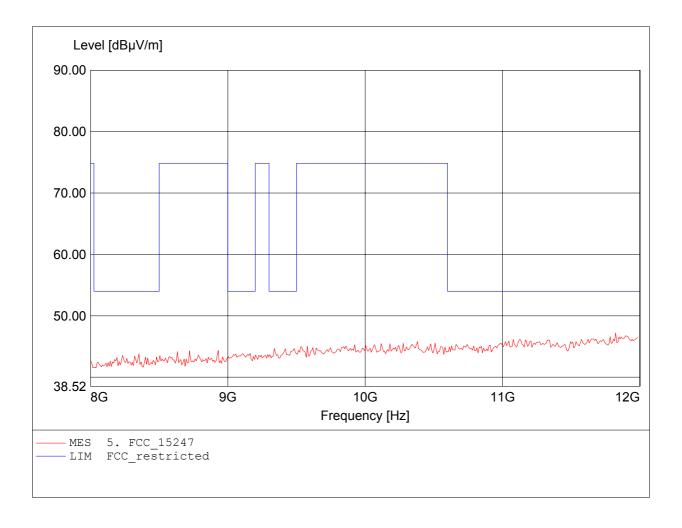
Comment 2: Freq: 4.802GHz, Emax: 47.26dBpV/m, RBW: 1MHz



Approval Holder: Siemens AG A&D SE RD 51 EUT:

Mobile Panel (worst case)
Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

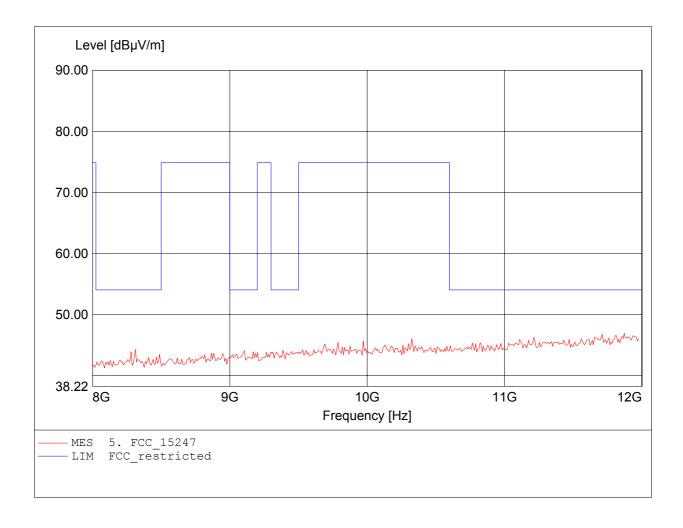
Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.
Comment 2: Freq: 11.824GHz, Emax: 47.19dBµV/m, RBW: 1MHz



Approval Holder: Siemens AG A&D SE RD 51 EUT:

Mobile Panel (worst case)
Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

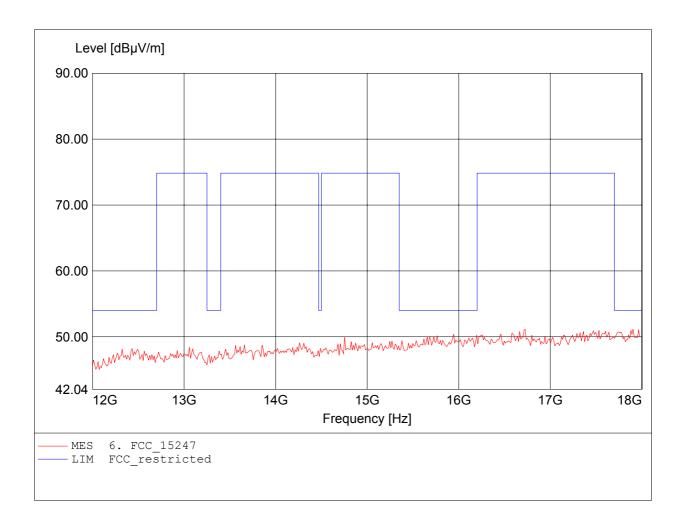
Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.
Comment 2: Freq: 11.872GHz, Emax: 46.92dBµV/m, RBW: 1MHz



Approval Holder: Siemens AG A&D SE RD 51 EUT:

Mobile Panel (worst case)
Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

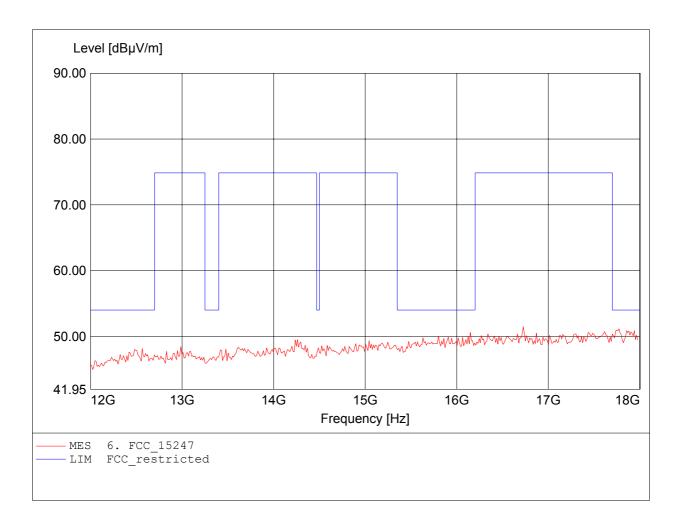
Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.
Comment 2: Freq: 17.904GHz, Emax: 51.17dBµV/m, RBW: 1MHz



Approval Holder: Siemens AG A&D SE RD 51 EUT:

Mobile Panel (worst case) Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.
Comment 2: Freq: 16.725GHz, Emax: 51.45dBµV/m, RBW: 1MHz

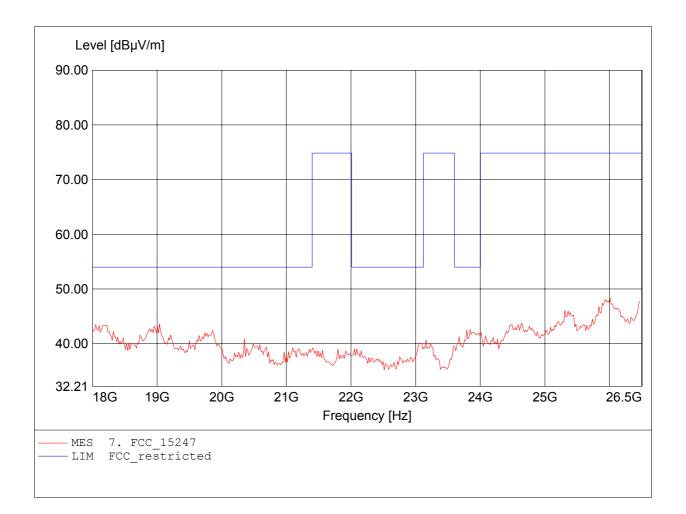


Siemens AG A&D SE RD 51 Approval Holder: EUT:

Mobile Panel (worst case) Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) according to \$15.247, peak detector Dist.: 3m, Ant.: HL025, amplif. Freq: 26.006GHz, Emax: 48.36dBµV/m, RBW: 1MHz Test Specification: Comment 1:

Comment 2:

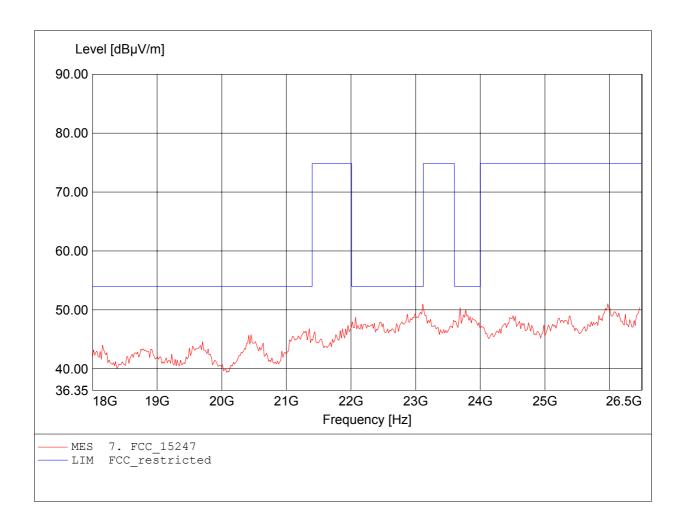


Siemens AG A&D SE RD 51 Approval Holder: EUT:

Mobile Panel (worst case) Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) according to \$15.247, peak detector Dist.: 3m, Ant.: HL025, amplif. Freq: 25.972GHz, Emax: 51.03dBµV/m, RBW: 1MHz Test Specification: Comment 1:

Comment 2:

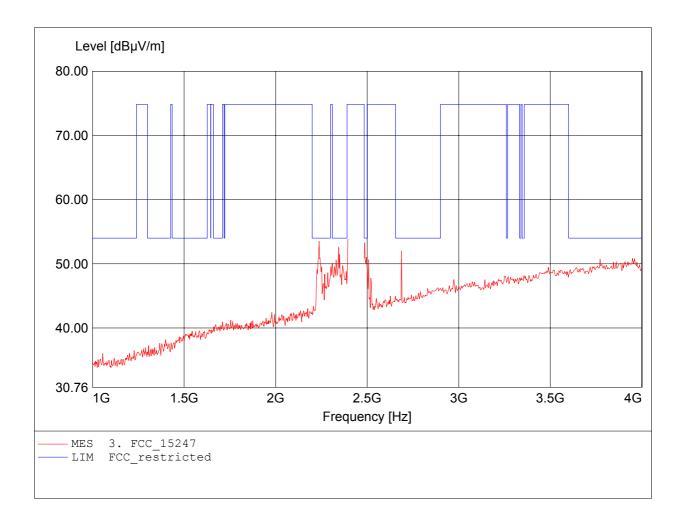


Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2462 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, amplif.
Comment 2: Freq: 2.394GHz, Emax: 53.86dBµV/m, RBW: 1MHz

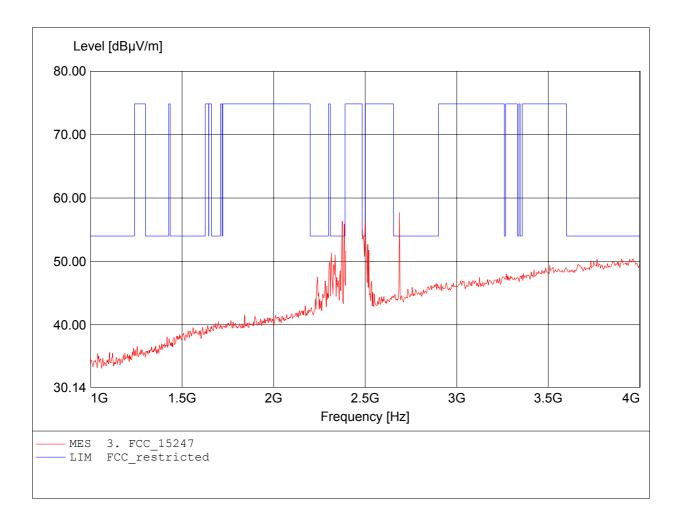


Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2462 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector
Comment 1: Dist.: 3m, Ant.: HL025, amplif.
Comment 2: Freq: 2.687GHz, Emax: 57.66dBµV/m, RBW: 1MHz



Siemens AG A&D SE RD 51 Approval Holder:

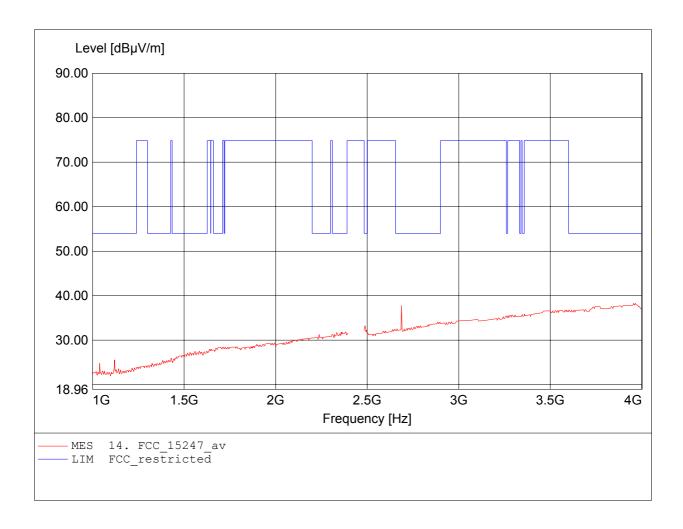
EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2462 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) according to §15.247, average detector Test Specification:

Comment 1:

Dist.: 3m, Ant.: HL025, amplif. Freq: 3.964GHz, Emax: 38.28dBµV/m, RBW: 1MHz Comment 2:



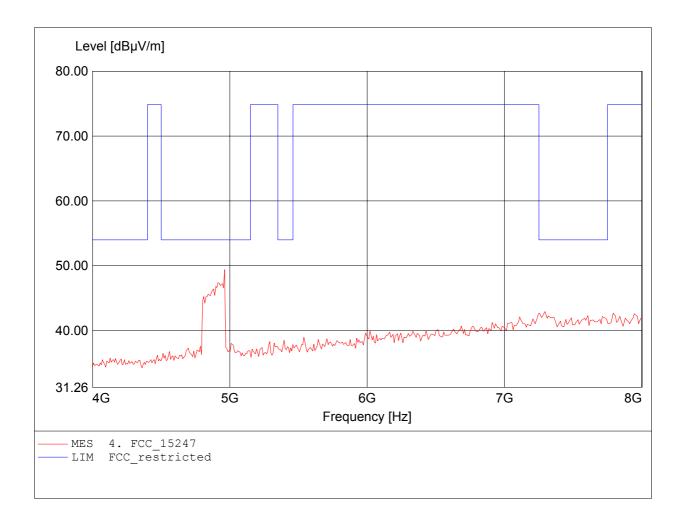
Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2462 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.

Comment 2: Freq: 4.962GHz, Emax: 49.38dBpV/m, RBW: 1MHz



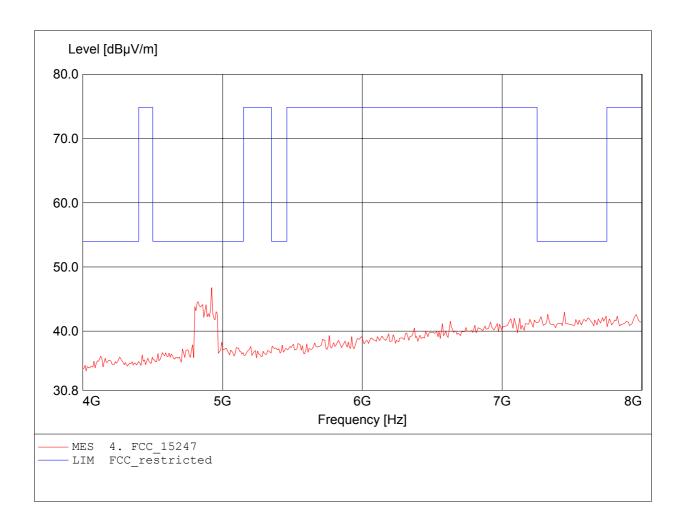
Siemens AG A&D SE RD 51 Approval Holder:

EUT: Mobile Panel

Mobil Panel 277 / WLAN / ant.:1 / 54Mbit/s / 2462 MHz Model:

Test Site / Operator: ETS / Mr. Schostek
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.

Comment 2: Freq: 4.922GHz, Emax: 46.77dBpV/m, RBW: 1MHz

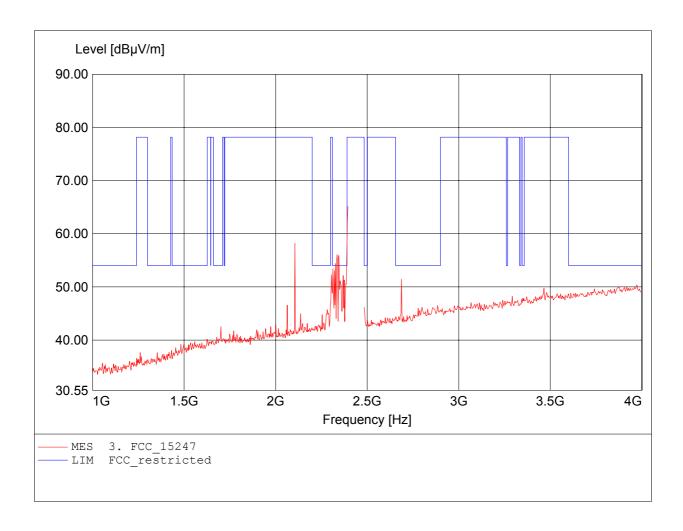


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2412 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, amplif.

Comment 2: Freq: 2.394GHz, Emax: 65.14dBpV/m, RBW: 1MHz



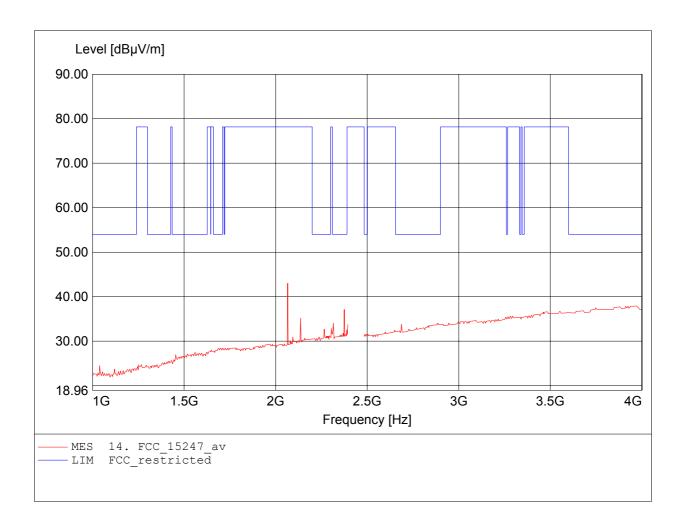
Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2412 MHz

Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, average detector Dist.: 3m, Ant.: HL025, amplif.

Comment 2: Freq: 2.066GHz, Emax: 43.01dBµV/m, RBW: 1MHz

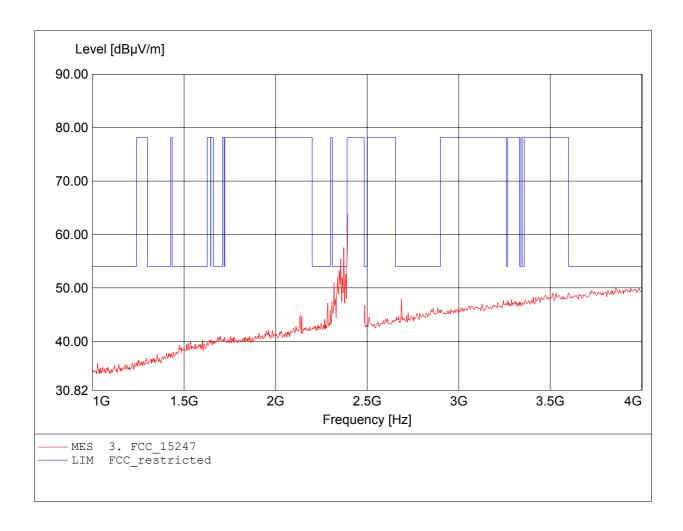


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2412 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, amplif.

Comment 2: Freq: 2.394GHz, Emax: 63.82dBµV/m, RBW: 1MHz



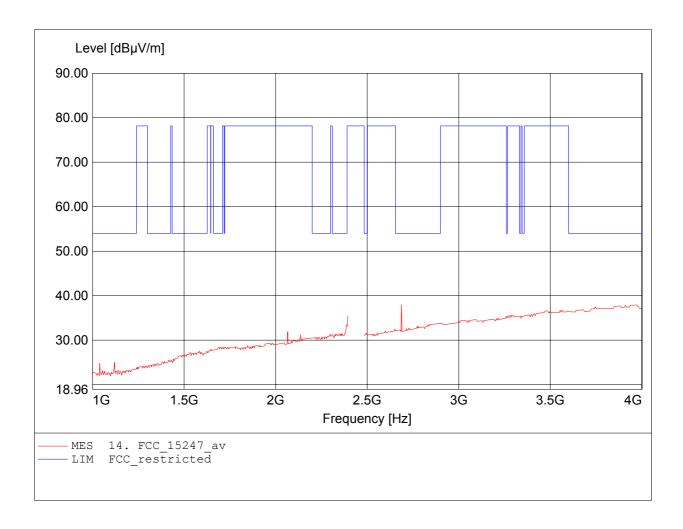
Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2412 MHz

Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, average detector Dist.: 3m, Ant.: HL025, amplif.

Comment 2: Freq: 2.687GHz, Emax: 37.97dBµV/m, RBW: 1MHz

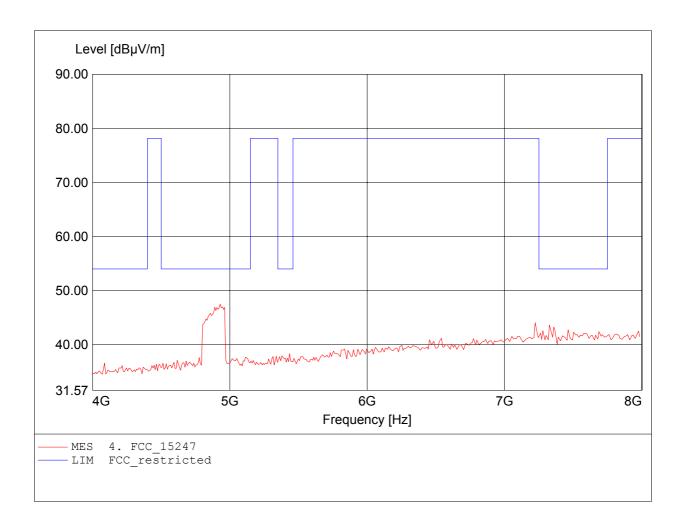


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2412 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.

Comment 2: Freq: 4.930GHz, Emax: 47.47dBμV/m, RBW: 1MHz

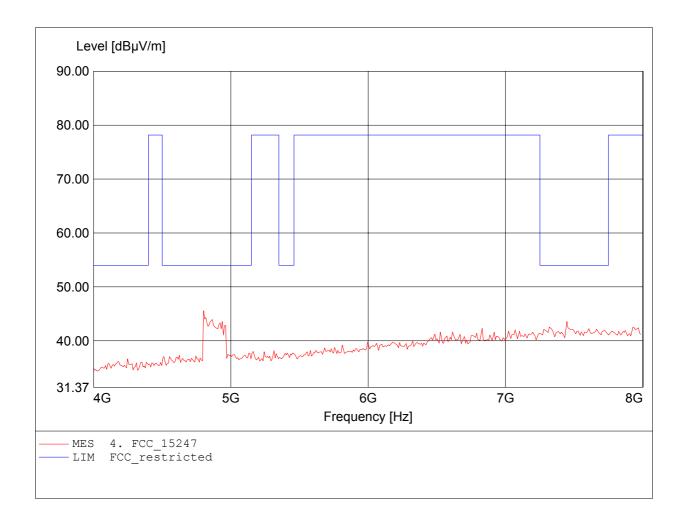


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2412 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.

Comment 2: Freq: 4.802GHz, Emax: 45.54dBpV/m, RBW: 1MHz

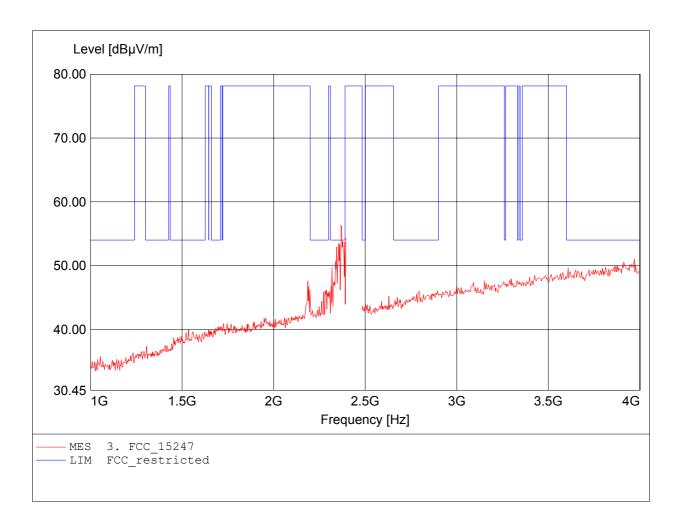


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant:2 / 54Mbit/s / 2437 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to §15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, amplif.

Comment 2: Freq: 2.369GHz, Emax: 56.32dBµV/m, RBW: 1MHz



Approval Holder: Siemens AG A&D SE RD 51

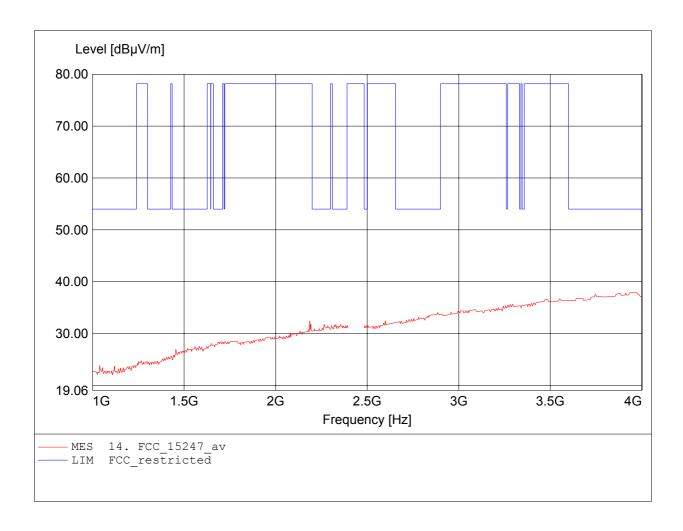
EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2437 MHz

Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to §15.247, average detector

Comment 1:

Dist.: 3m, Ant.: HL025, amplif. Freq: 3.973GHz, Emax: 37.91dBµV/m, RBW: 1MHz Comment 2:

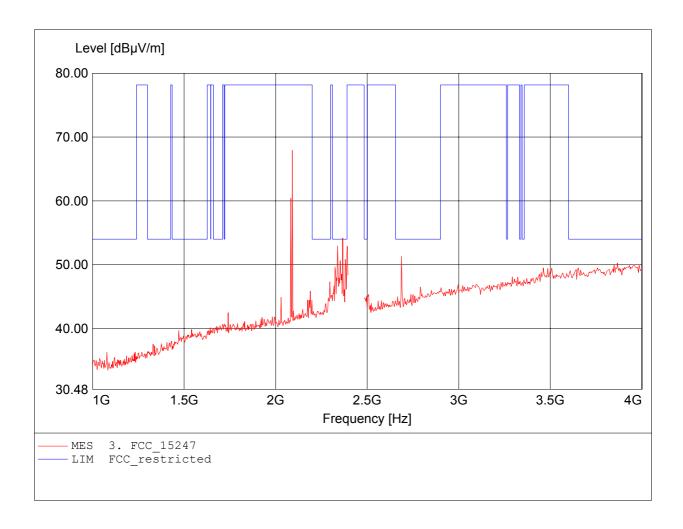


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2437 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to §15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, amplif.

Comment 2: Freq: 2.091GHz, Emax: 67.92dBpV/m, RBW: 1MHz



Approval Holder: Siemens AG A&D SE RD 51

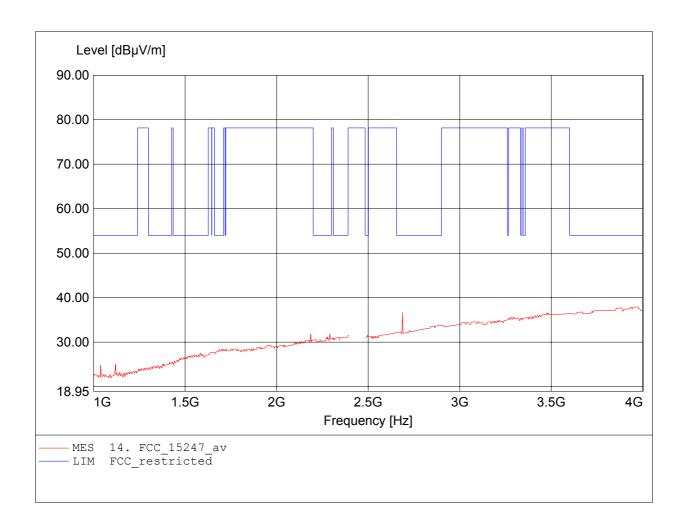
EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2437 MHz

Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to §15.247, average detector

Comment 1:

Dist.: 3m, Ant.: HL025, amplif. Freq: 3.973GHz, Emax: 37.91dBµV/m, RBW: 1MHz Comment 2:

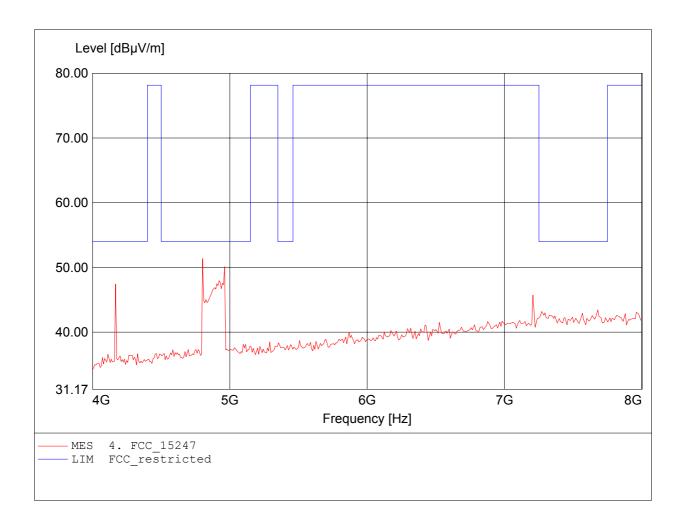


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2437 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.

Comment 2: Freq: 4.802GHz, Emax: 51.37dB μ V/m, RBW: 1MHz

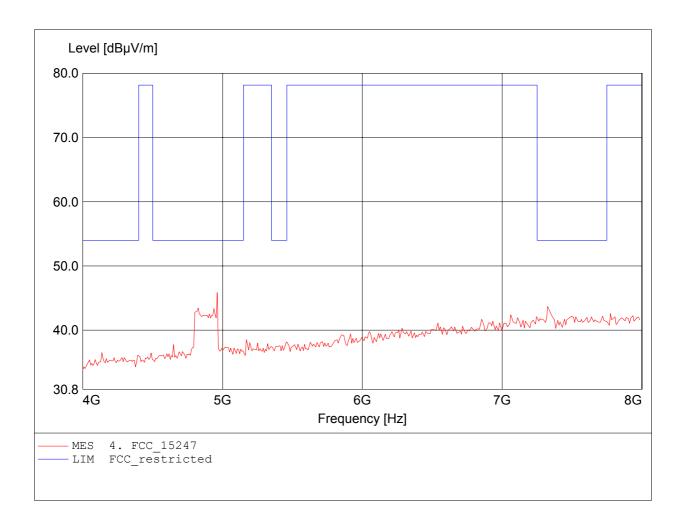


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2437 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.

Comment 2: Freq: 4.962GHz, Emax: 45.86dBpV/m, RBW: 1MHz

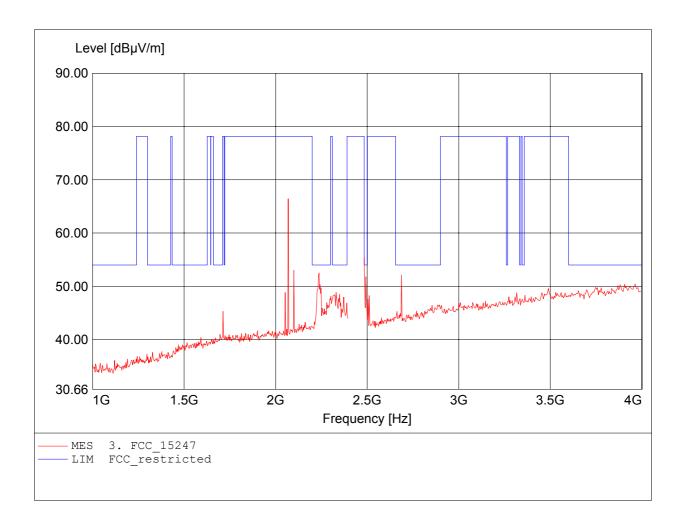


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2462 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, amplif.

Comment 2: Freq: 2.069GHz, Emax: 66.44dBpV/m, RBW: 1MHz



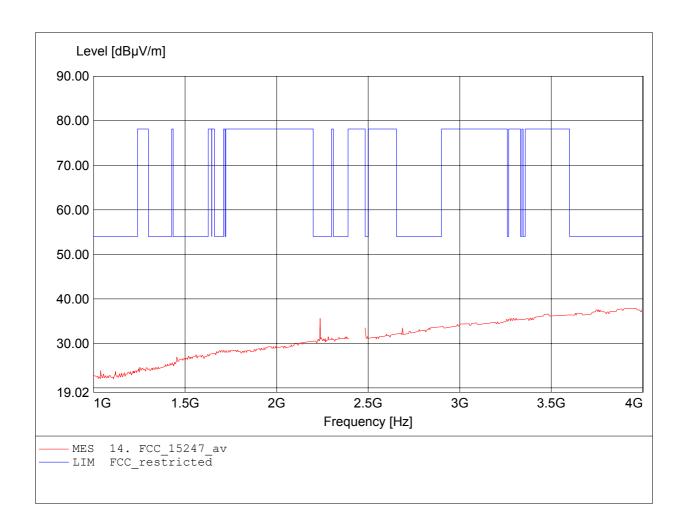
Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2462 MHz

Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, average detector Dist.: 3m, Ant.: HL025, amplif.

Comment 2: Freq: 3.964GHz, Emax: 37.89dBµV/m, RBW: 1MHz

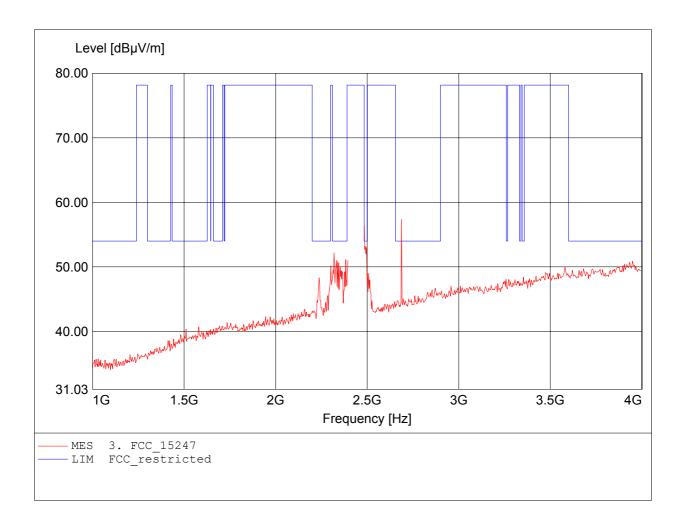


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant:2 / 54Mbit/s / 2462 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to §15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, amplif.

Comment 2: Freq: 2.687GHz, Emax: 57.35dBpV/m, RBW: 1MHz



Approval Holder: Siemens AG A&D SE RD 51

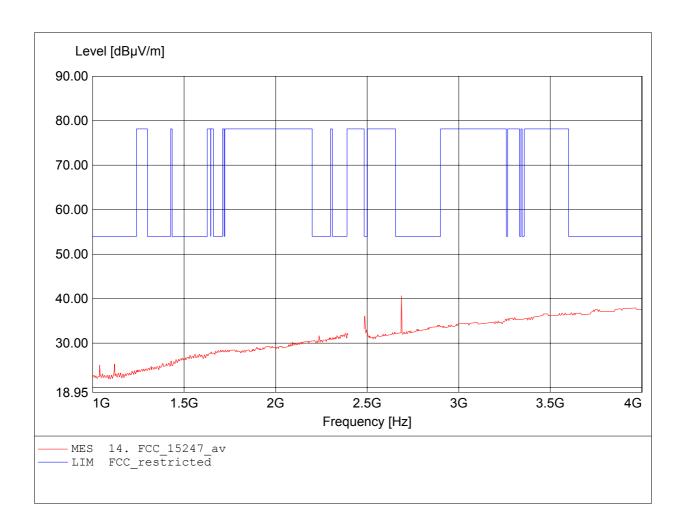
EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2462 MHz

Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to §15.247, average detector

Comment 1:

Dist.: 3m, Ant.: HL025, amplif. Freq: 2.687GHz, Emax: 40.62dBµV/m, RBW: 1MHz Comment 2:

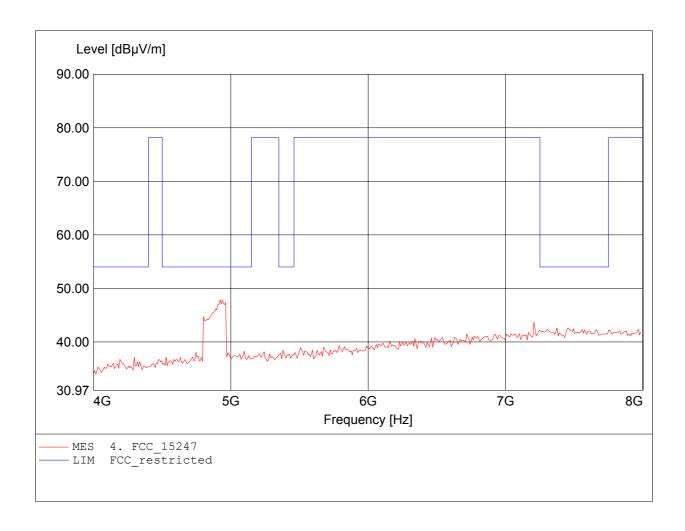


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2462 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.

Comment 2: Freq: 4.922GHz, Emax: 47.86dBpV/m, RBW: 1MHz

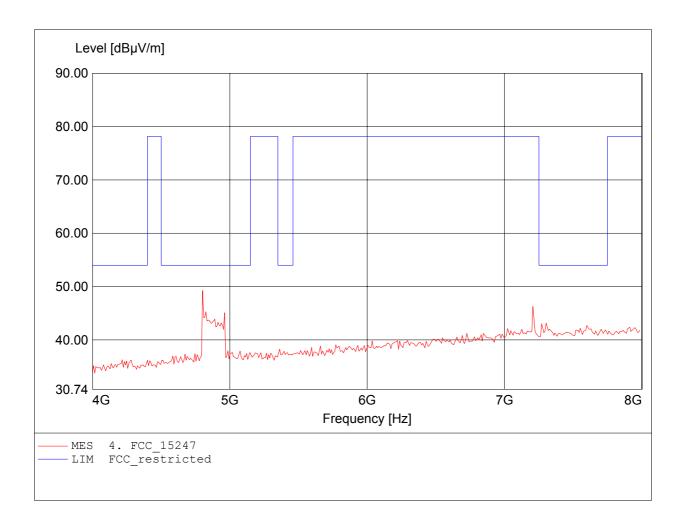


Approval Holder: Siemens AG A&D SE RD 51

EUT / Model: Mobile Panel / Mobil Panel 277 / WLAN

Mode: ant.:2 / 54Mbit/s / 2462 MHz
Test Site / Operator: ETS / Mr. Meng
Operating Conditions: 23°C / Unom.: 12 VDC (AC/DC-adaptor) Test Specification: according to \$15.247, peak detector Comment 1: Dist.: 3m, Ant.: HL025, ampl.+HP.

Comment 2: Freq: 4.802GHz, Emax: 49.27dBµV/m, RBW: 1MHz





Annex E

AC power line conducted emissions

EMI voltage test in the ac-mains according to FCC part 15

EUT: Mobile Panel 277 I WLAN Manufacturer: Siemens AG A&D SE RD 51

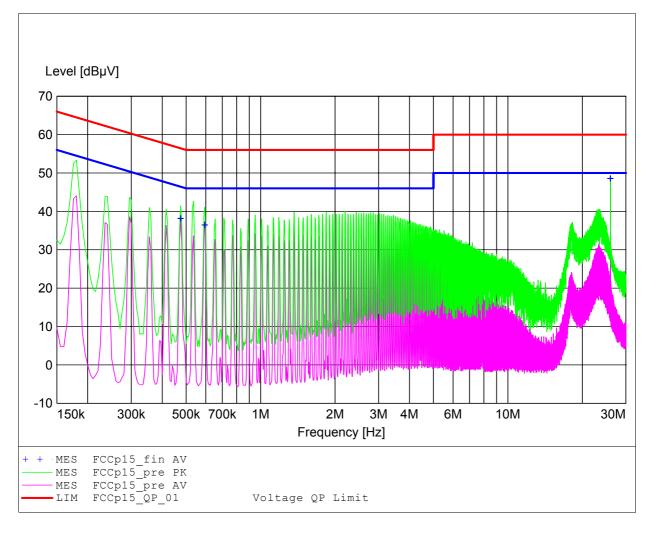
Operating Condition: Unom: 120 VAC (AC/DC adaptor), Tnom: 23°C

Test Site: ETS

Operator: Mr. Marquardt

Test Specification: V-Network: ESH2-Z5 (L1)
Comment: model: 6AV6645-0DC01-0AX0

mode: charging



EMI voltage test in the ac-mains according to FCC part 15

EUT: Mobile Panel 277 I WLAN Manufacturer: Siemens AG A&D SE RD 51

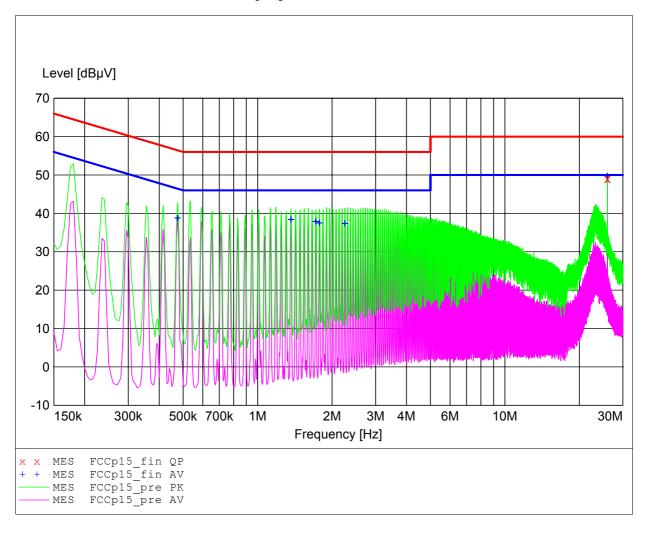
Operating Condition: Unom: 120 VAC (AC/DC adaptor), Tnom: 23°C

Test Site: ETS

Operator: Mr. Marquardt

Test Specification: V-Network: ESH2-Z5 (N/L1)
Comment: model: 6AV6645-0DC01-0AX0

mode: charging





Annex F

Receiver radiated emisisons

Standards Industry Canada, RSS-GEN

Approval Holder: Siemens AG A&D SE RD 51

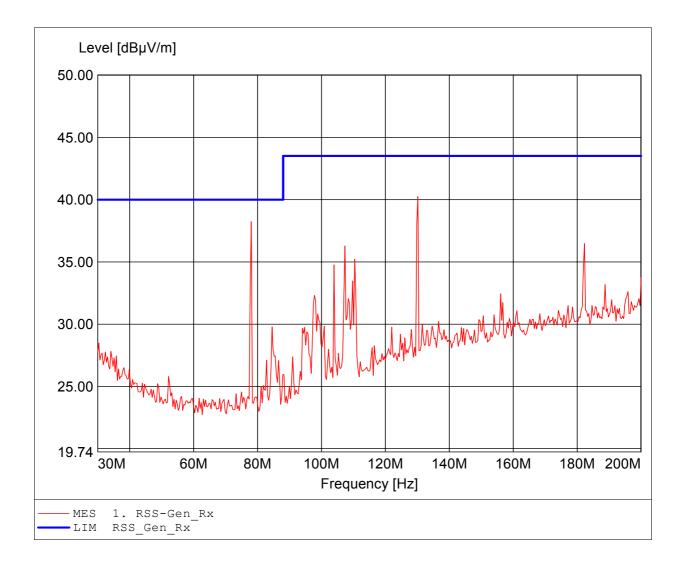
Mobile Panel EUT:

Mobile Pannel 277 IWLAN / 802.11g / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng
Test Condition: 25°C / Unom: 12 V DC (AC/DC-adaptor)

Test Specification: according to RSS-Gen Issue 1 Comment 1: Dist.: 3m, Ant.: HK 116

Comment 2: Freq:130.160MHz Emax:40.27dBµV/m RBW: 100 kHz



Standards Industry Canada, RSS-GEN

Approval Holder: Siemens AG A&D SE RD 51

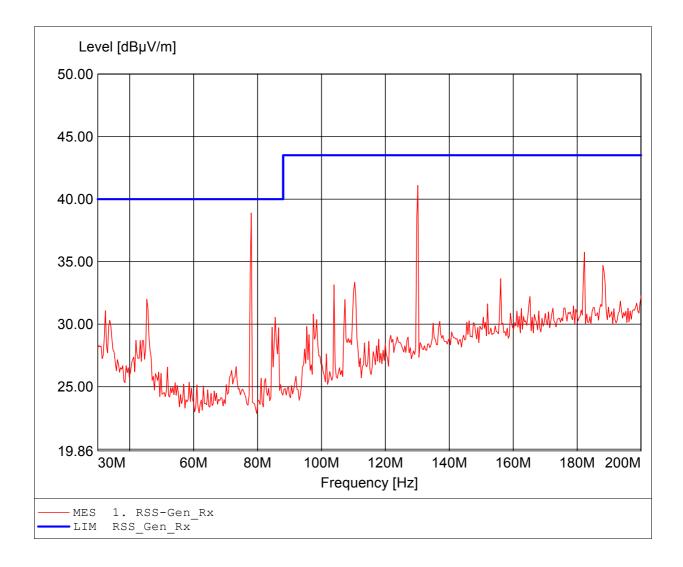
Mobile Panel EUT:

Mobile Pannel 277 IWLAN / 802.11g / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng
Test Condition: 25°C / Unom: 12 V DC (AC/DC-adaptor)

Test Specification: according to RSS-Gen Issue 1 Comment 1: Dist.: 3m, Ant.: HK 116

Comment 2: Freq:130.160MHz Emax:41.11dBuV/m RBW: 100 kHz



Standards Industry Canada, RSS-GEN

Approval Holder: Siemens AG A&D SE RD 51

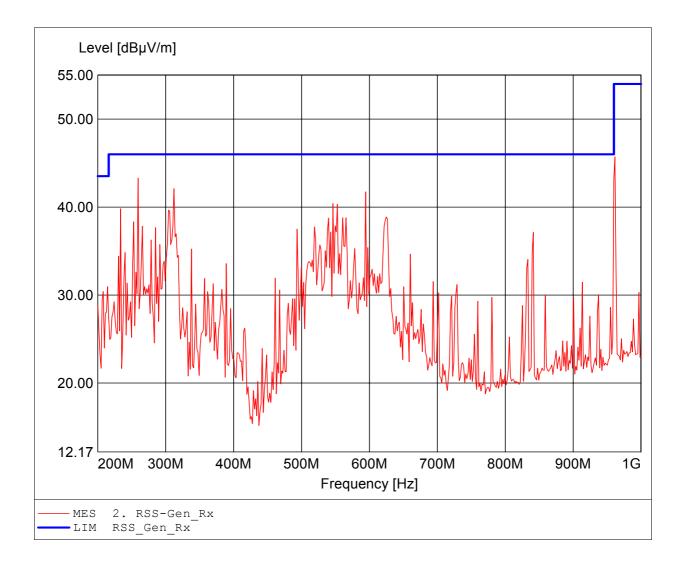
Mobile Panel EUT:

Mobile Pannel 277 IWLAN / 802.11g / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng
Test Condition: 25°C / Unom: 12 V DC (AC/DC-adaptor)

Test Specification: according to RSS-Gen Issue 1 Comment 1:

Dist.: 3m, Ant.: HL 223, ampl. Freq:961.523MHz Emax:45.71dBµV/m RBW: 100 kHz Comment 2:



Standards Industry Canada, RSS-GEN

Approval Holder: Siemens AG A&D SE RD 51

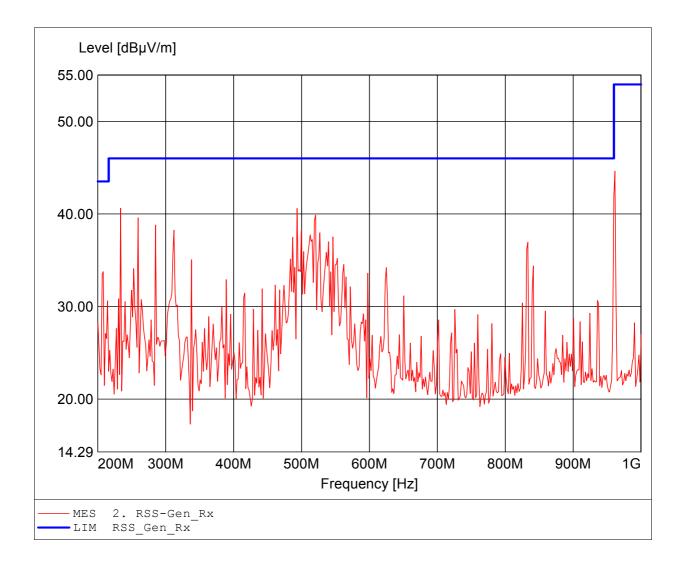
Mobile Panel EUT:

Mobile Pannel 277 IWLAN / 802.11g / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng
Test Condition: 25°C / Unom: 12 V DC (AC/DC-adaptor)

Test Specification: according to RSS-Gen Issue 1 Comment 1: Dist.: 3m, Ant.: HL 223, ampl.

Freq:961.523MHz Emax:44.62dBuV/m RBW: 100 kHz Comment 2:



Standards Industry Canada, RSS-GEN

Approval Holder: Siemens AG A&D SE RD 51

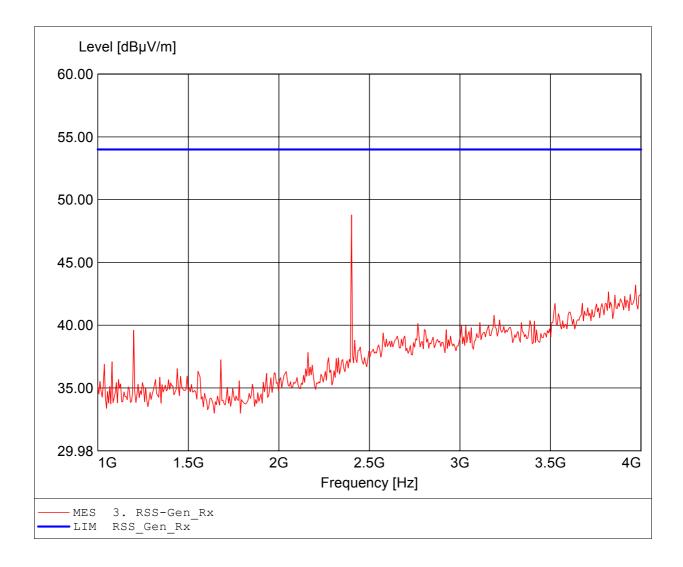
Mobile Panel EUT:

Mobile Pannel 277 IWLAN / 802.11g / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng
Test Condition: 25°C / Unom: 12 V DC (AC/DC-adaptor)

Test Specification: according to RSS-Gen Issue 1 Comment 1: Dist.: 3m, Ant.: BBHA9120D, ampl.

Comment 2: Freq:2.401GHz Emax:48.78dBuV/m RBW: 1 MHz



Standards Industry Canada, RSS-GEN

Approval Holder: Siemens AG A&D SE RD 51

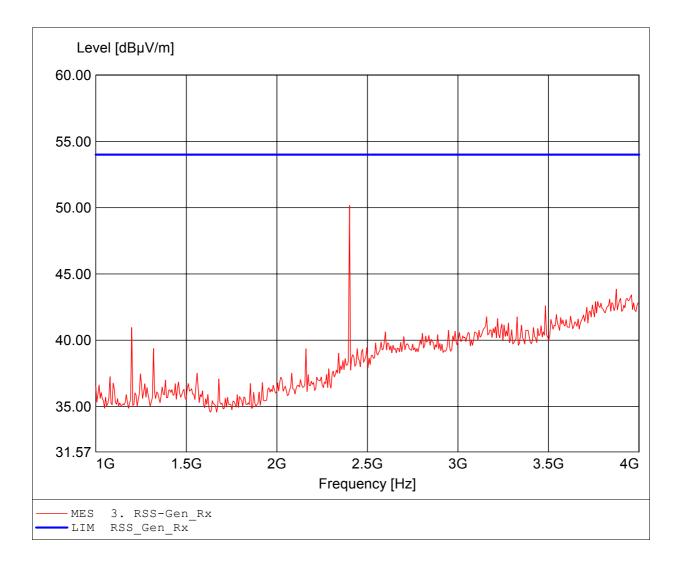
Mobile Panel EUT:

Mobile Pannel 277 IWLAN / 802.11g / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng
Test Condition: 25°C / Unom: 12 V DC (AC/DC-adaptor)

Test Specification: according to RSS-Gen Issue 1 Dist.: 3m, Ant.: BBHA9120D, ampl. Comment 1:

Comment 2: Freq:2.401GHz Emax:50.17dBuV/m RBW: 1 MHz



Standards Industry Canada, RSS-GEN

Approval Holder: Siemens AG A&D SE RD 51

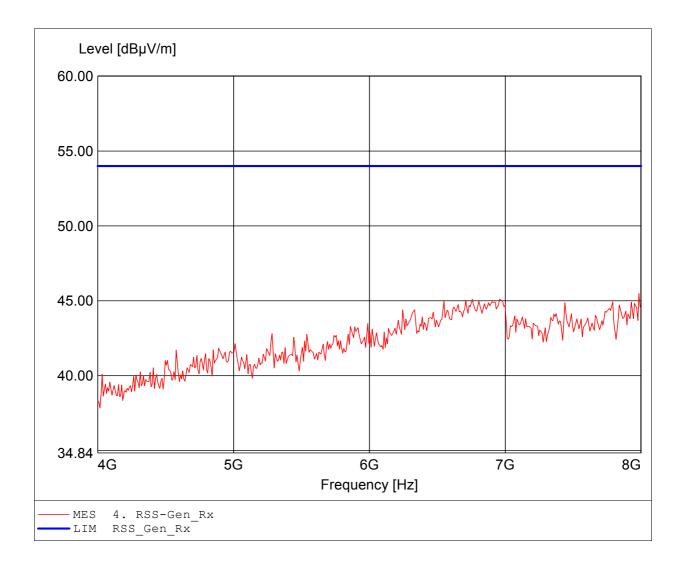
Mobile Panel EUT:

Mobile Pannel 277 IWLAN / 802.11g / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng
Test Condition: 25°C / Unom: 12 V DC (AC/DC-adaptor)

Test Specification: according to RSS-Gen Issue 1 Dist.: 3m, Ant.: BBHA9120D, ampl. Comment 1:

Comment 2: Freq:7.984GHz Emax:45.49dBuV/m RBW: 1 MHz



Standards Industry Canada, RSS-GEN

Approval Holder: Siemens AG A&D SE RD 51

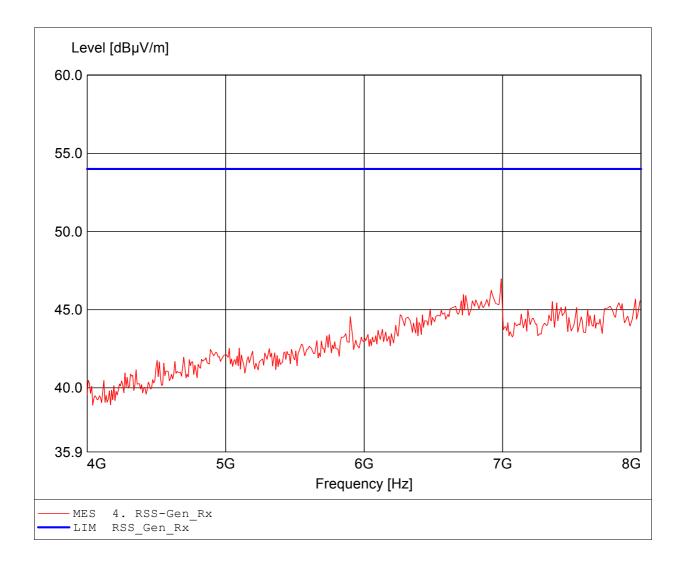
Mobile Panel EUT:

Mobile Pannel 277 IWLAN / 802.11g / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng
Test Condition: 25°C / Unom: 12 V DC (AC/DC-adaptor)

Test Specification: according to RSS-Gen Issue 1Dist.: 3m, Ant.: BBHA9120D, ampl. Comment 1:

Comment 2: Freq: 6.990GHz Emax: 46.97dBuV/m RBW: 1 MHz



Standards Industry Canada, RSS-GEN

Approval Holder: Siemens AG A&D SE RD 51

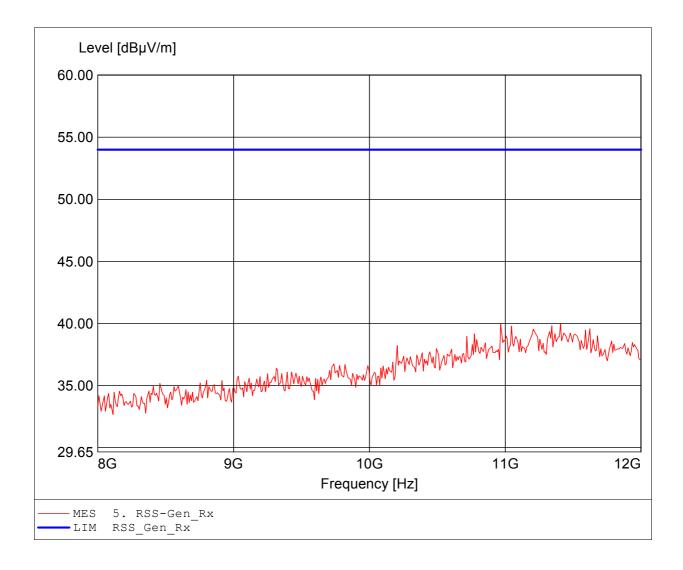
Mobile Panel EUT:

Mobile Pannel 277 IWLAN / 802.11g / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng
Test Condition: 25°C / Unom: 12 V DC (AC/DC-adaptor)

Test Specification: according to RSS-Gen Issue 1 Comment 1: Dist.: 3m, Ant.: BBHA9120D, ampl.

Freq:10.966GHz Emax:40.00dBuV/m RBW: 1 MHz Comment 2:



Standards Industry Canada, RSS-GEN

Approval Holder: Siemens AG A&D SE RD 51

Mobile Panel EUT:

Mobile Pannel 277 IWLAN / 802.11g / 2437 MHz Model:

Test Site / Operator: ETS / Mr. Meng
Test Condition: 25°C / Unom: 12 V DC (AC/DC-adaptor)

Test Specification: according to RSS-Gen Issue 1 Comment 1: Dist.: 3m, Ant.: BBHA9120D, ampl.

Freq:11.006GHz Emax:39.96dBuV/m RBW: 1 MHz Comment 2:

