

Annex 4: Measurement diagrams
to TEST REPORT
No.: 2-20823287r/13

According to:
FCC Regulations
Part15.225

for

Sony Mobile Communications

Tablet PC
(RFID)

FCC-ID: PY7TM-0042







Laboratory Accreditation and Listings			
 <p>DAkKS Deutsche Akkreditierungsstelle D-PL-12047-01-01</p>	 <p>FEDERAL COMMUNICATIONS COMMISSION FC USA Reg. No.: 736496 MRA US-EU 0003</p>	 <p>Industry Canada Reg. No.: 3462D-1 Reg. No.: 3462D-2 Reg. No.: 3462D-3</p>	 <p>Voluntary Controls for Electromagnetic Emissions Reg. No.: R-2666 C-2914, T-1967, G-301</p>
 <p>WiFi ALLIANCE AUTHORIZED RF LABORATORY</p>	 <p>CTIA Authorized Test Lab LAB CODE 20011130-00</p>		
accredited according to DIN EN ISO/IEC 17025			
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1. Field strength of emissions within-band operational band

Diagram No. 2.01_RFID

Test description:	Date: 17.03.2014 Page 1 of 2
Test site and distance:	Magnetic Field strength Measurement related to 30/300 m distance
Version of Testsoftware:	Ref.-Nr. 441 Semi Anechoic Room (SAR) with 3 m measurement distance
Distance correction:	8.51.0
Rec. antenna (pre-scan):	used accord. table, pls. see test report
Used filter:	bypass
Test specification:	FCC 15.225(a)(b)(c)

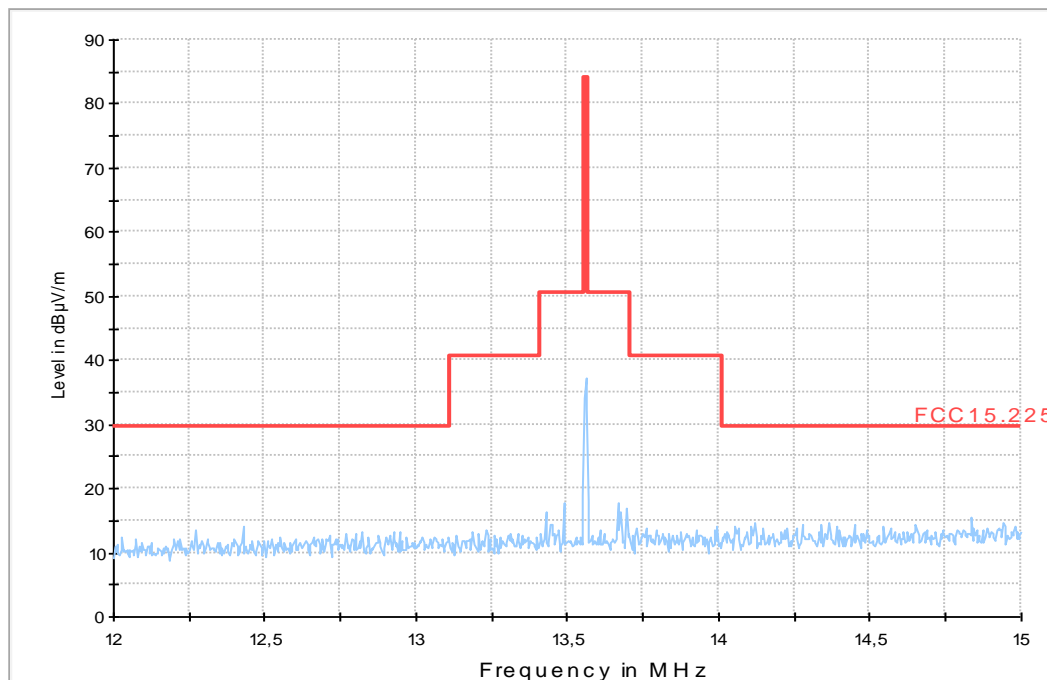
Operator:	dpa
Operating conditions:	TX-on continuous, RFID Mode
Power during tests:	full battery
Comment 1:	with Tag

EUT Information

Manufacturer:	Sony
FCC ID:	PY7TM-0042
Type:	GSM-/ WCDMA- /LTE Tablet PC

EUT:	RSE #02
HW version:	AP1
SW version:	tbd
SVN:	-
Config:	-
Serial number:	CB5126DQ20Q
Connected Interfaces:	Power Supply (EP850) ; USB-cable (EC700)
Power Supply:	Battery fully charged before test, Device is powered via Power Supply & USB cable connected to 120VAC/60Hz during test
Comments:	-

FCC15.209_magn hor+vert_In_Band_13.56MHz



EMI Auto Test Template: FCC15.209_magn hor+vert_In_Band_13.56MHz

2. Field strength of emissions outside operational band

Diagram No. 2.02_RFID

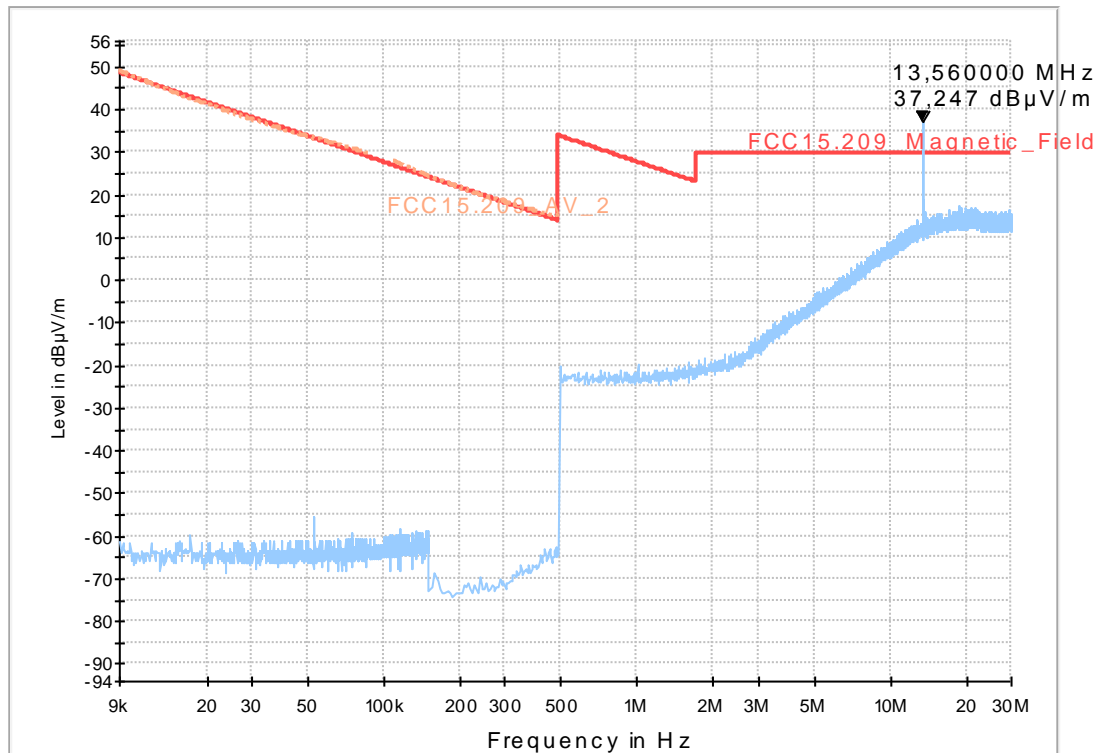
Date:	17.03.2014	Page 1 of 1
Test description:	Magnetic Field strength Measurement related to 30/300 m distance	
Test site and distance:	Ref.-Nr. 441 Semi Anechoic Room (SAR) with 3 m measurement distance	
Version of Testsoftware:	8.51.0	
Distance correction:	used accord. table, pls. see test report	
Rec. antenna (pre-scan):	height 1.00 m, parallel and 90° to EUT polarisation	
Used filter:	bypass	
Test specification:	FCC 15.225(d)	
Operator:	dpa	
Operating conditions:	TX-continuous, RFID Mode	
Power during tests:	full battery	
Comment 1:	with Tag	

EUT Information

Manufacturer:	Sony
FCC ID:	PY7TM-0042
Type:	GSM-/ WCDMA- /LTE Tablet PC

EUT:	RSE #02
HW version:	AP1
SW version:	tbd
SVN:	-
Config:	-
Serial number:	CB5126DQ20Q
Connected Interfaces:	Power Supply (EP850) ; USB-cable (EC700)
Power Supply:	Battery fully charged before test, Device is powered via Power Supply & USB cable connected to 120VAC/60Hz during test
Comments:	-

FCC15.209_magn hor+vert



3. Field strength of emissions 30MHz<f<1GHz

Diagram No. 3.01_RFID

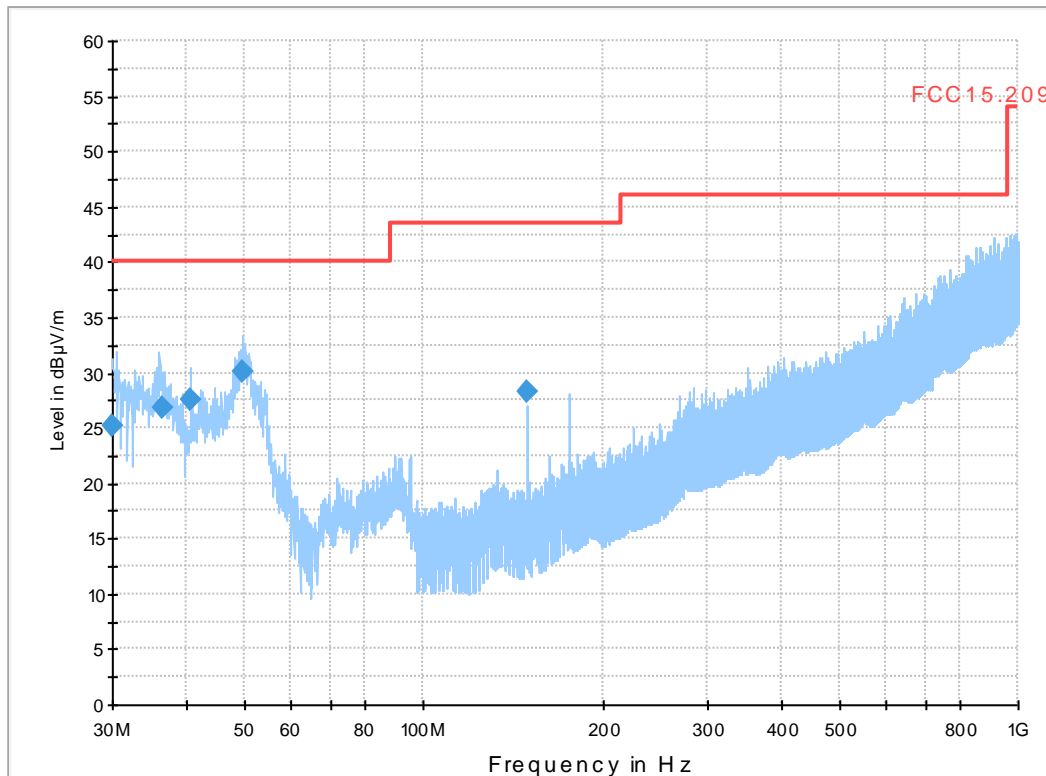
Test description:	17.03.2014 Page 1 of 2
Test site and distance:	Electric Field strength Measurement
Version of Testsoftware:	Ref.-Nr. 441 Semi Anechoic Room (SAR) with 3 m measurement distance
Distance correction:	8.51.0
Used filter:	not used
Test specification.:	not used
	FCC 15.225&15.209
Operator:	Lor
Operating conditions:	TX-on continuous, RFID-Mode
Power during tests:	full battery
Comment 1:	with Tag

EUT Information

Manufacturer:	Sony
FCC ID:	PY7TM-0042
Type:	GSM-/ WCDMA- /LTE Tablet PC

EUT:	RSE #02
HW version:	AP1
SW version:	tbd
SVN:	-
Config:	-
Serial number:	CB5126DQ20Q
Connected Interfaces:	Power Supply (EP850) ; USB-cable (EC700)
Power Supply:	Battery fully charged before test, Device is powered via Power Supply & USB cable connected to 120VAC/60Hz during test
Comments:	-

01_FCC15.209_hor+vert_kipp



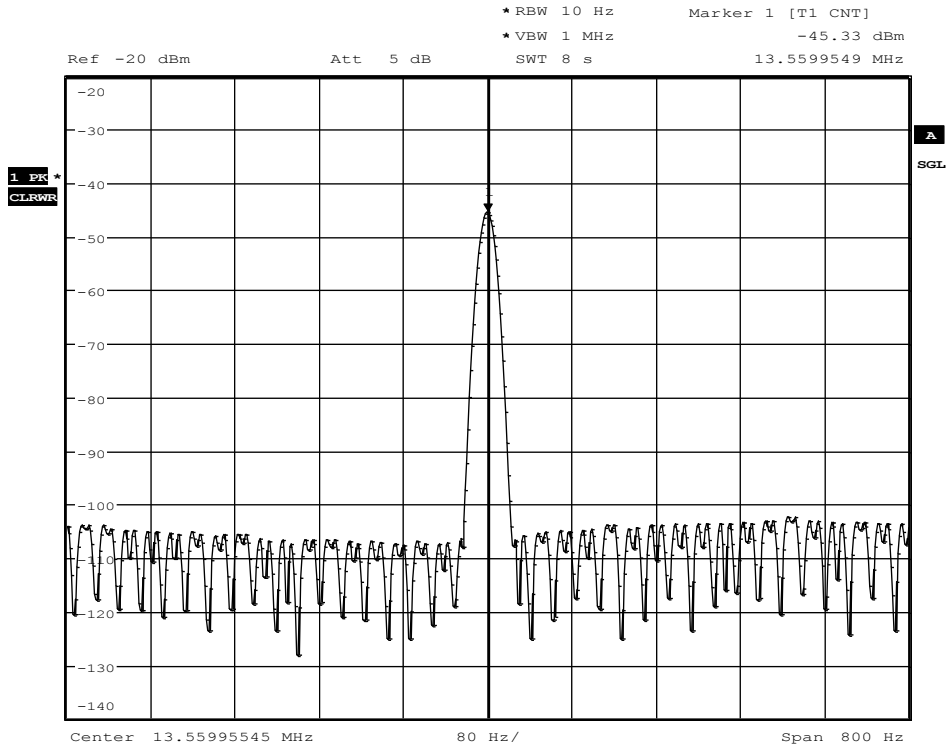
Final Result 1

Frequency (MHz)	QuasiPeak (dB μ V/m)	Meas. Time (ms)	Bandwidth (kHz)	Height (cm)	Polarization	Azimuth (deg)	Elevation (deg)	Corr. (dB)	Margin (dB)
30.030000	25.3	1000.0	120.000	135.0	V	266.0	90.0	22.1	14.70
36.500000	26.8	1000.0	120.000	306.0	V	328.0	90.0	19.0	13.20
40.720000	27.5	1000.0	120.000	105.0	V	138.0	0.0	17.2	12.50
49.750000	30.2	1000.0	120.000	105.0	V	306.0	90.0	13.7	9.90
149.160000	28.2	1000.0	120.000	182.0	H	28.0	90.0	8.8	15.30

(continuation of the "Final Result 1" table from column 10 ...)

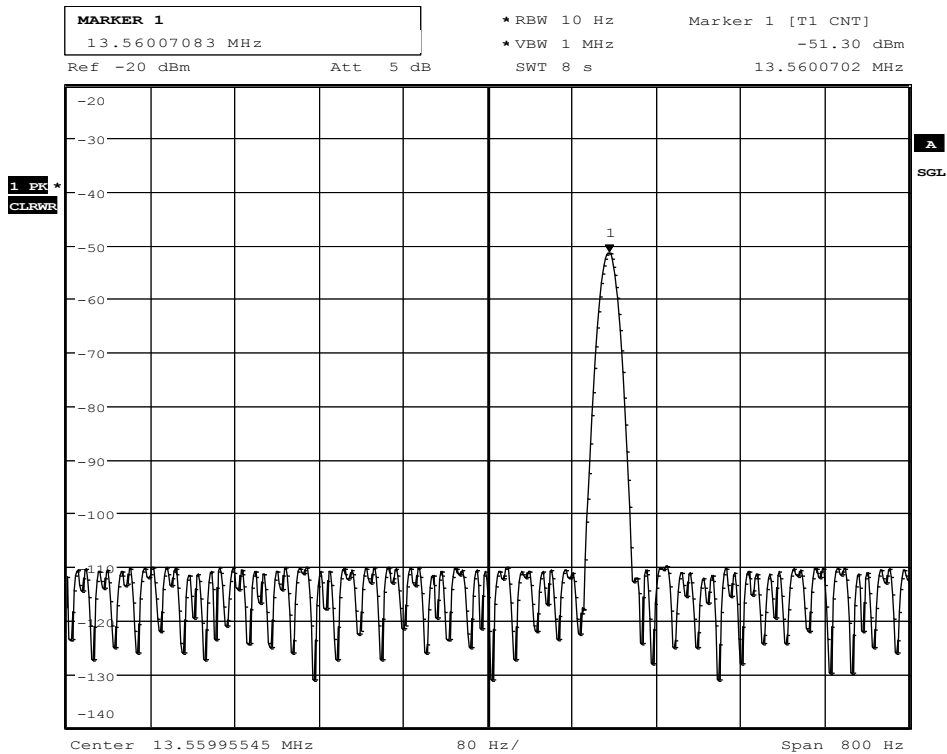
Frequency (MHz)	Limit (dB μ V/m)
30.030000	40.00
36.500000	40.00
40.720000	40.00
49.750000	40.00
149.160000	43.50

4. Frequency Error due voltage and temperature variations



Date: 20.MAR.2014 08:21:28

Reference frequency at nominal conditions



Date: 20.MAR.2014 13:04:22

Maximum recorded deviation at T=-20°C, Vnom=3.7V