

SAR TEST REPORT

No. I21Z62218-SEM01

For

vivo Mobile Communication Co., Ltd.

Mobile Phone

Model Name: V2127

with

Hardware Version: MP_0.1

Software Version: PD2166EF_EX_A_3.6.0

FCC ID: 2AUCY-V2127V

Issued Date: 2022-2-22

Note:

The test results in this test report relate only to the devices specified in this report. This report shall not be reproduced except in full without the written approval of CTTL.

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REPORT HISTORY

Report Number	Revision	Issue Date	Description
I21Z62218-SEM01	Rev.0	2022-2-17	Initial creation of test report
I21Z62218-SEM01	Rev.1	2022-2-22	Add the test exclusion analyses of 10g extremity SAR for phablet on page 180

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1 Test Laboratory

1.1 Testing Location

Company Name:	CTTL(Shouxiang)
Address:	No. 51 Shouxiang Science Building, Xueyuan Road, Haidian District, Beijing, P. R. China100191

1.2 Testing Environment

Temperature:	18°C~25°C,
Relative humidity:	30%~ 70%
Ground system resistance:	< 0.5 Ω
Ambient noise & Reflection:	< 0.012 W/kg

1.3 Project Data

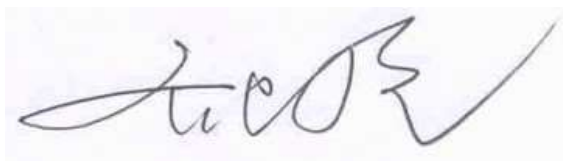
Project Leader:	Qi Dianyuan
Test Engineer:	Lin Xiaojun
Testing Start Date:	December 27, 2021
Testing End Date:	January 26, 2022

1.4 Signature



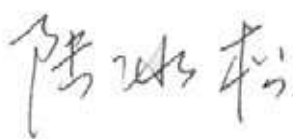
Lin Xiaojun

(Prepared this test report)



Qi Dianyuan

(Reviewed this test report)



Lu Bingsong

Deputy Director of the laboratory

(Approved this test report)

2 Statement of Compliance

The maximum results of Specific Absorption Rate (SAR) found during testing for vivo Mobile Communication Co., Ltd. Mobile Phone V2127 are as follows:

Table 2.1: Highest Reported SAR -Standalone(1g)

Mode		Antenna	Highest Reported SAR (1g)		
			1g SAR Head	1g SAR Hotspot	1g SAR Body-worn
CDMA	CDMA BC0	13	0.42	0.21	0.21
	CDMA BC0	41	0.21	0.39	0.39
GSM	GSM 850	13	0.18	0.43	0.43
	GSM 850	41	0.28	0.46	0.57
	PCS 1900	13	0.44	0.55	0.59
	PCS 1900	31	0.12	0.36	0.24
WCDMA	UMTS FDD 2	13	0.77	0.56	0.40
	UMTS FDD 2	31	0.24	0.29	0.33
	UMTS FDD 4	13	0.75	0.38	0.50
	UMTS FDD 4	31	0.33	0.50	0.32
	UMTS FDD 5	13	0.24	0.33	0.33
	UMTS FDD 5	41	0.34	0.54	0.54
LTE	LTE Band 2	13	0.66	0.51	0.47
	LTE Band 2	31	0.21	0.48	0.31
	LTE Band 4	13	0.57	0.42	0.59
	LTE Band 4	31	0.23	0.53	0.25
	LTE Band 5	13	0.24	0.21	0.21
	LTE Band 5	41	0.26	0.30	0.30
	LTE Band 7	13	0.51	0.45	0.70
	LTE Band 7	31	0.30	0.26	0.14
	LTE Band 12	13	0.22	0.14	0.14
	LTE Band 12	41	0.16	0.15	0.15
	LTE Band 38	13	0.60	0.28	0.39
	LTE Band 38	31	0.18	0.09	0.06
	LTE Band 41	13	0.38	0.16	0.36
	LTE Band 41	31	0.23	0.52	0.52
NR SA/NSA	N5	13	0.29	0.24	0.24
	N5	41	0.23	0.29	0.29
	N7	11	0.41	0.30	0.33
	N7	13	0.69	0.28	0.66
	N41	11	0.71	0.36	0.55
	N41	13	0.42	0.74	0.74
	N78	11	0.59	0.40	0.40
	N78	12	0.33	0.16	0.06
WLAN 2.4 GHz		22	0.21	0.39	0.39
WLAN 5 GHz		22	0.45	0.97	0.97
BT		22	0.11	/	0.03

Note: The device have similar frequency in some LTE bands : LTEB12/17, since the supported frequency spans for the smaller LTE bands are completely cover by the larger LTE bands and the channel bandwidth and other operating parameters for the smaller band be fully supported by the larger band, therefore, only larger LTE bands were required to be tested for SAR.

The SAR values found for the Mobile Phone are below the maximum recommended levels of 1.6 W/kg as averaged over any 1g tissue according to the ANSI C95.1-1992.

For body operation, this device has been tested and meets FCC RF exposure guidelines when used with any accessory that contains no metal and which provides a minimum separation distance of 10 mm for hotspot and 15mm for body worn between this device and the body of the user. Use of other accessories may not ensure compliance with FCC RF exposure guidelines.

The EUT battery must be fully charged and checked periodically during the test to ascertain uniform power output.

The measurement together with the test system set-up is described in annex C. A detailed description of the equipment under test can be found in chapter 4 of this test report.

Table 2.2: Highest Reported SAR -Simultaneous transmission

reported SAR 1g (W/kg)						
Body		WWAN		WIFI5G	BT	WWAN+WiFi5G +BT
		N78 ANT11	LTE Band7 ANT13			
Rear	15mm	0.40	0.70	0.13	0.03	1.26

The detail for simultaneous transmission consideration is described in chapter 15.

The highest reported SAR for Head, Hotspot, Body Worn and Simultaneous transmission exposure conditions are 0.77W/kg, 0.97W/kg, 0.97W/kg, and 1.26W/kg

3 Client Information

3.1 Applicant Information

Company Name:	vivo Mobile Communication Co., Ltd.
Address/Post:	No.1, vivo Road, Chang'an, Dongguan, Guangdong, China
Contact Person:	xiangjianfeng
E-mail:	xiangjianfeng@vivo.com
Telephone:	188 2371 0059
Fax:	/

3.2 Manufacturer Information

Company Name:	vivo Mobile Communication Co., Ltd.
Address/Post:	No.1, vivo Road, Chang'an, Dongguan, Guangdong, China
Contact Person:	xiangjianfeng
E-mail:	xiangjianfeng@vivo.com
Telephone:	188 2371 0059
Fax:	/

4 Equipment Under Test (EUT) and Ancillary Equipment (AE)

4.1 About EUT

Description:	Mobile Phone
Model name:	V2127
Tested mode(s):	GSM850/1900, WCDMA1900/1700/850, CDMA BC0, LTE Band 2/4/5/7/12/17/38/41 N5/n7/n41/n78, BT, Wi-Fi (2.4G/5G),
Tested Tx Frequency:	824 – 849 MHz (GSM 850)
	1850 – 1910 MHz (GSM 1900)
	824–849 MHz (WCDMA 850 Band V)
	1710 – 1755 MHz (WCDMA 1700 Band IV)
	1850–1910 MHz (WCDMA1900 Band II)
	1850 – 1910 MHz(LTE Band 2)
	1710 – 1755 MHz (LTE Band 4)
	824 – 849 MHz (LTE Band 5)
	2500 – 2570 MHz(LTE Band 7)
	699 – 716 MHz (LTE Band 12)
	2570 – 2620 MHz (LTE Band 38)
	2496 – 2690 MHz (LTE Band 41)
	824 – 849 MHz(NR n5)
	2500 – 2570 MHz (NR n7)
	2496 – 2690 MHz (NR n41)
	3300 – 3800 MHz (NR n78)
	2402 – 2480 MHz (Bluetooth)
	2412 – 2462 MHz (Wi-Fi 2.4G)
	5150-5825 MHz (Wi-Fi 5G)
GPRS/EGPRS Multislot Class:	12
GPRS capability Class:	B
Antenna type:	Integrated antenna
Hotspot mode:	Support
Note: 1. The device have similar frequency in some LTE bands : LTEB12/17, since the supported frequency spans for the smaller LTE bands are completely cover by the larger LTE bands and the channel bandwidth and other operating parameters for the smaller band be fully supported by the larger band, therefore, only larger LTE bands were required to be tested for SAR 2. For 5G NR test, using FTM (Factory Test Mode) to perform SAR with default 100% transmission.	

4.2 Internal Identification of EUT used during the test

EUT ID*	IMEI/SN	HW	SW Version
EUT1	861904059966789 861904059966797	MP_0.1	PD2166EF_EX_A_3.6.0
EUT2	861904059968389 861904059968397	MP_0.1	PD2166EF_EX_A_3.6.0
EUT3	861904059951245 861904059951252	MP_0.1	PD2166EF_EX_A_3.6.0
EUT4	861904059957465 861904059957473	MP_0.1	PD2166EF_EX_A_3.6.0
EUT5	861904059956863 861904059956871	MP_0.1	PD2166EF_EX_A_3.6.0

*EUT ID: is used to identify the test sample in the lab internally.

Note: It is performed to test SAR with the EUT3-5 and conducted power with the EUT1-2.

4.3 Internal Identification of AE used during the test

AE ID*	Description	Model	SN	Manufacturer
AE1	Battery	B-T6	/	Dongguan NVT Technology Co.,Ltd
AE2	Headset	XE160	/	/

*AE ID: is used to identify the test sample in the lab internally.

5 TEST METHODOLOGY

5.1 Applicable Limit Regulations

ANSI C95.1–1992: IEEE Standard for Safety Levels with Respect to Human Exposure to Radio Frequency Electromagnetic Fields, 3 kHz to 300 GHz.

It specifies the maximum exposure limit of **1.6 W/kg** as averaged over any 1 gram of tissue for portable devices being used within 20 cm of the user in the uncontrolled environment.

5.2 Applicable Measurement Standards

IEEE 1528–2013: Recommended Practice for Determining the Peak Spatial-Average Specific Absorption Rate (SAR) in the Human Head from Wireless Communications Devices: Measurement Techniques.

KDB447498 D01: General RF Exposure Guidance v06: Mobile and Portable Devices RF Exposure Procedures and Equipment Authorization Policies.

KDB648474 D04 Handset SAR v01r03: SAR Evaluation Considerations for Wireless Handsets.

KDB941225 D01 SAR test for 3G devices v03r01: SAR Measurement Procedures for 3G Devices

KDB941225 D05 SAR for LTE Devices v02r05: SAR Evaluation Considerations for LTE Devices

KDB941225 D06 Hotspot Mode SAR v02r01: SAR Evaluation Procedures for Portable Devices with Wireless Router Capabilities

KDB248227 D01 802.11 Wi-Fi SAR v02r02: SAR GUIDANCE FOR IEEE 802.11 (Wi-Fi) TRANSMITTERS

KDB865664 D01 SAR measurement 100 MHz to 6 GHz v01r04: SAR Measurement Requirements for 100 MHz to 6 GHz.

KDB865664 D02 RF Exposure Reporting v01r02: RF Exposure Compliance Reporting and Documentation Considerations

6 Specific Absorption Rate (SAR)

6.1 Introduction

SAR is related to the rate at which energy is absorbed per unit mass in an object exposed to a radio field. The SAR distribution in a biological body is complicated and is usually carried out by experimental techniques or numerical modeling. The standard recommends limits for two tiers of groups, occupational/controlled and general population/uncontrolled, based on a person's awareness and ability to exercise control over his or her exposure. In general, occupational/controlled exposure limits are higher than the limits for general population/uncontrolled.

6.2 SAR Definition

The SAR definition is the time derivative (rate) of the incremental energy (dW) absorbed by (dissipated in) an incremental mass (dm) contained in a volume element (dv) of a given density (ρ). The equation description is as below:

$$SAR = \frac{d}{dt} \left(\frac{dW}{dm} \right) = \frac{d}{dt} \left(\frac{dW}{\rho dv} \right)$$

SAR is expressed in units of Watts per kilogram (W/kg)

SAR measurement can be either related to the temperature elevation in tissue by

$$SAR = c \left(\frac{\delta T}{\delta t} \right)$$

Where: C is the specific heat capacity, δT is the temperature rise and δt is the exposure duration, or related to the electrical field in the tissue by

$$SAR = \frac{\sigma |E|^2}{\rho}$$

Where: σ is the conductivity of the tissue, ρ is the mass density of tissue and E is the RMS electrical field strength.

However for evaluating SAR of low power transmitter, electrical field measurement is typically applied.

7 Tissue Simulating Liquids

The temperature of the tissue-equivalent medium used during measurement must also be within 18 °C to 25 °C and within ± 2 °C of the temperature when the tissue parameters are characterized. The dielectric parameters must be measured before the tissue-equivalent medium is used in a series of SAR measurements. The parameters should be re-measured after each 3 – 4 days of use; or earlier if the dielectric parameters can become out of tolerance; for example, when the parameters are marginal at the beginning of the measurement series.

The dielectric constant (ϵ_r) and conductivity (σ) of typical tissue-equivalent media recipes are expected to be within $\pm 5\%$ of the required target values; but for SAR measurement systems that have implemented the SAR error compensation algorithms documented in IEEE Std 1528-2013, to automatically compensate the measured SAR results for deviations between the measured and required tissue dielectric parameters, the tolerance for ϵ_r and σ may be relaxed to $\pm 10\%$. This is limited to frequencies ≤ 3 GHz.

7.1 Targets for tissue simulating liquid

Table 7.1: Targets for tissue simulating liquid

Frequency(MHz)	Liquid Type	Conductivity(σ)	$\pm 10\%$ Range	Permittivity(ϵ)	$\pm 10\%$ Range
750	Head	0.89	0.80~0.98	41.94	37.75~46.13
835	Head	0.90	0.81~0.99	41.5	37.35~45.65
1750	Head	1.37	1.26~1.54	40.08	36.07~44.09
1900	Head	1.40	1.26~1.54	40.0	36~44
2450	Head	1.80	1.62~1.98	39.2	35.28~43.12
2600	Head	1.96	1.76~2.16	39.01	35.11~42.91

Table 7.2: Targets for tissue simulating liquid

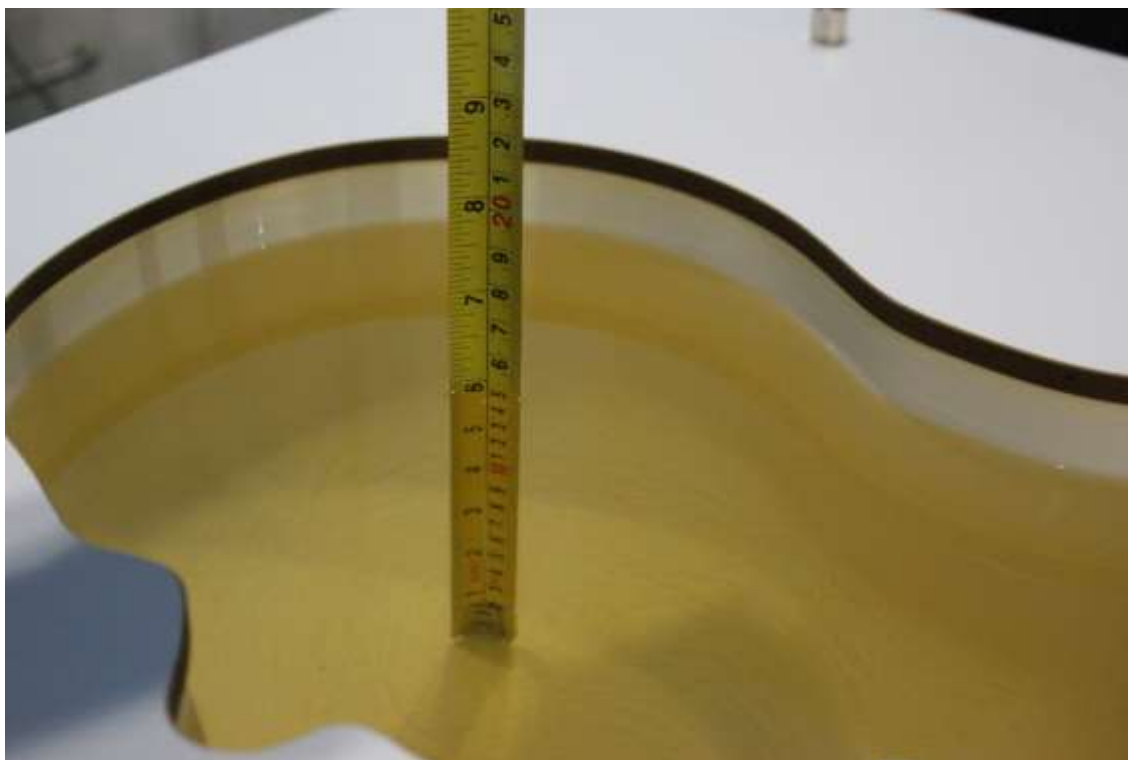
Frequency(MHz)	Liquid Type	Conductivity(σ)	$\pm 5\%$ Range	Permittivity(ϵ)	$\pm 5\%$ Range
3300	Head	2.71	2.57~2.85	38.16	36.25~40.07
3500	Head	2.91	2.76~3.06	37.93	36.03~39.83
3700	Head	3.12	2.96~3.28	37.70	35.82~39.59
5250	Head	4.71	4.47~4.95	35.93	34.13~37.73
5600	Head	5.07	4.82~5.32	35.53	33.8~37.3
5750	Head	5.22	4.96~5.48	35.36	33.59~37.13

7.2 Dielectric Performance

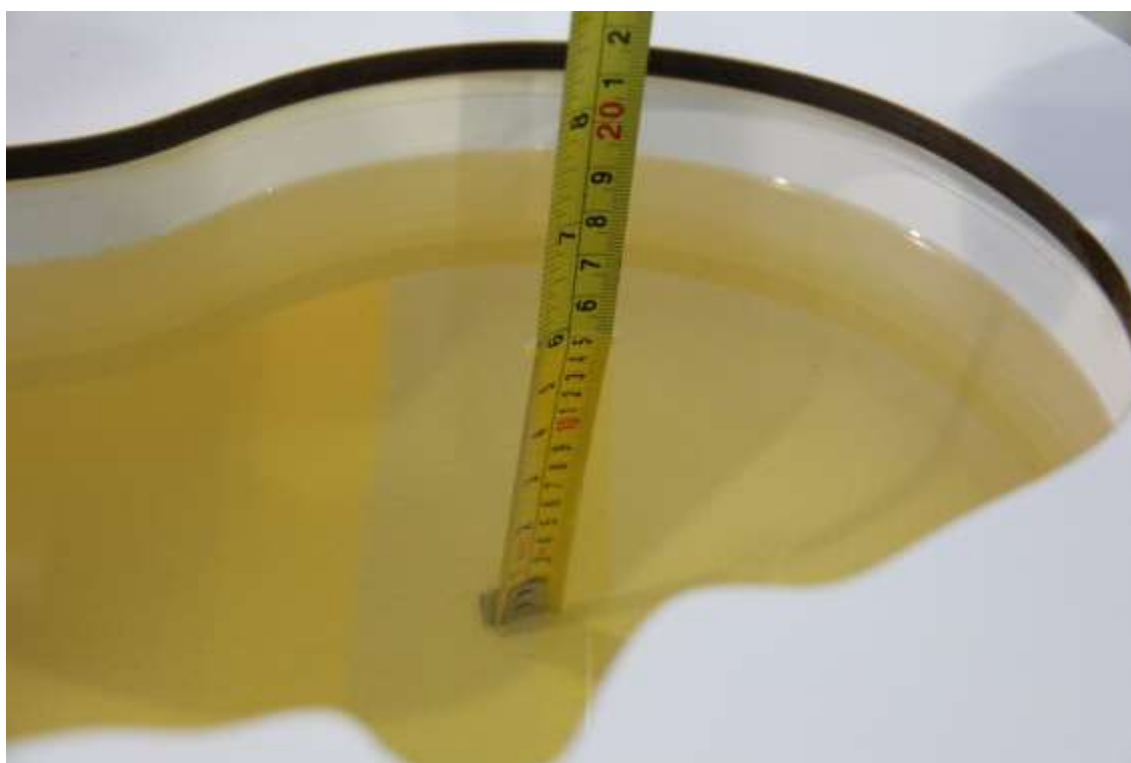
Table 7.3: Dielectric Performance of Tissue Simulating Liquid

Measurement Date yyyy/mm/dd	Frequency	Type	Permittivity ϵ	Drift (%)	Conductivity σ (S/m)	Drift (%)
2021/12/28	750MHz	Head	44.29	5.60	0.8657	-2.73
2021/12/29	750MHz	Head	44.18	5.34	0.8546	-3.98
2021/12/30	750MHz	Head	44.33	5.70	0.8711	-2.12
2021/12/31	750MHz	Head	44.37	5.79	0.8293	-6.82
2021/12/23	835 MHz	Head	44.18	6.46	0.9164	1.82
2021/12/29	835 MHz	Head	43.85	5.66	0.8577	-4.70
2021/12/31	835 MHz	Head	43.76	5.45	0.8392	-6.76
2022/1/7	835 MHz	Head	43.52	4.87	0.8413	-6.52
2021/12/28	1750MHz	Head	41.66	3.94	1.344	-1.90
2021/12/29	1750MHz	Head	41.89	4.52	1.336	-2.48
2021/12/30	1750MHz	Head	41.97	4.72	1.349	-1.53
2021/12/31	1750MHz	Head	42.17	5.21	1.335	-2.55
2022/1/4	1750MHz	Head	41.33	3.12	1.328	-3.07
2022/1/5	1750MHz	Head	41.12	2.59	1.453	6.06
2021/12/28	1900 MHz	Head	42.16	5.40	1.369	-2.21
2021/12/30	1900 MHz	Head	41.67	4.18	1.374	-1.86
2022/1/4	1900 MHz	Head	39.44	-1.40	1.446	3.29
2022/1/6	1900 MHz	Head	39.27	-1.82	1.418	1.29
2022/1/7	1900 MHz	Head	38.86	-2.85	1.405	0.36
2022/1/24	2450MHz	Head	38.35	-2.17	1.862	3.44
2021/12/27	2600 MHz	Head	38.49	-1.33	1.996	1.84
2021/12/29	2600 MHz	Head	38.06	-2.44	2.015	2.81
2022/1/4	2600 MHz	Head	39.88	2.23	1.947	-0.66
2022/1/6	2600 MHz	Head	39.76	1.92	1.922	-1.94
2022/1/10	2600 MHz	Head	40.28	3.26	1.965	0.26
2022/1/11	3300 MHz	Head	37.77	-1.02	2.781	2.62
2022/1/11	3500 MHz	Head	37.02	-2.40	2.884	-0.89
2022/1/11	3700 MHz	Head	37.61	-0.24	3.045	-2.40
2022/1/26	5250 MHz	Head	34.82	-3.09	4.809	2.10
2022/1/26	5600 MHz	Head	34.39	-3.21	5.191	2.39
2022/1/26	5750 MHz	Head	33.99	-3.87	5.366	2.80

Note: The liquid temperature is (22.0 -23.0)°C



Picture 7-1 Liquid depth in the Head Phantom (750MHz)



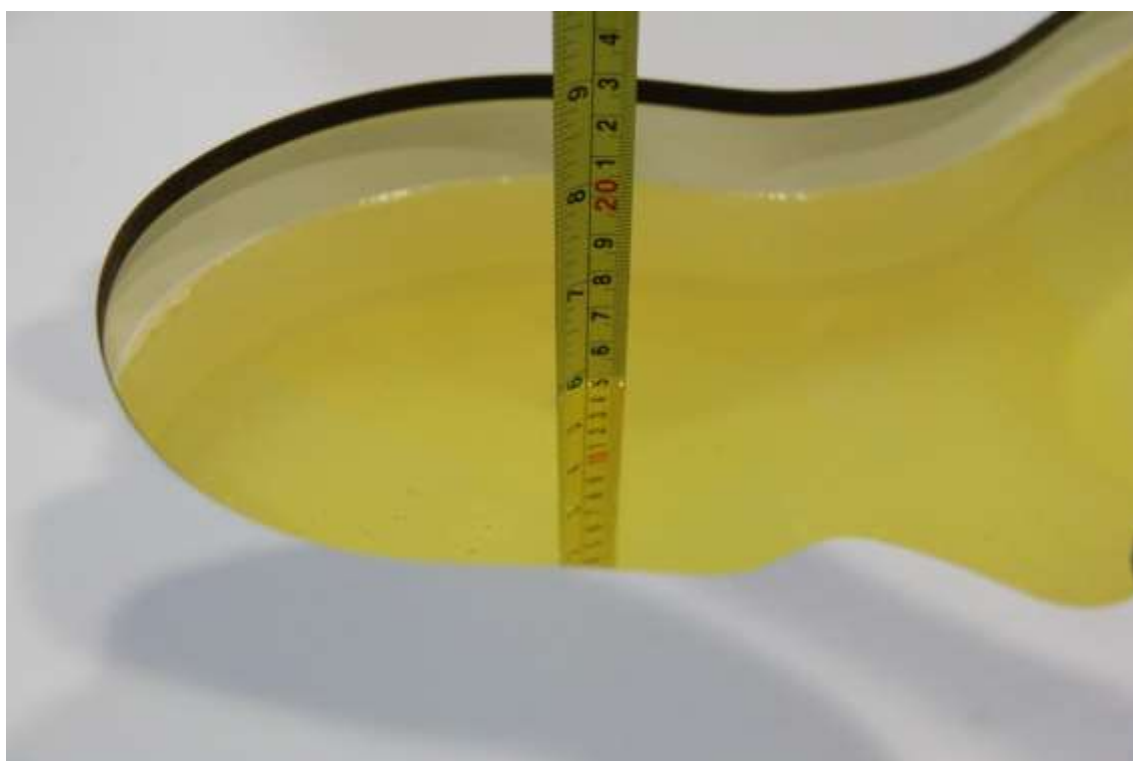
Picture 7-2 Liquid depth in the Head Phantom (835 MHz)



Picture 7-3 Liquid depth in the Head Phantom (1750 MHz)



Picture 7-4 Liquid depth in the Head Phantom (1900 MHz)



Picture 7-5 Liquid depth in the Head Phantom (2450MHz)



Picture 7-6 Liquid depth in the Head Phantom (2600 MHz)



Picture 7-7 Liquid depth in the Head Phantom (3300-3900 MHz)

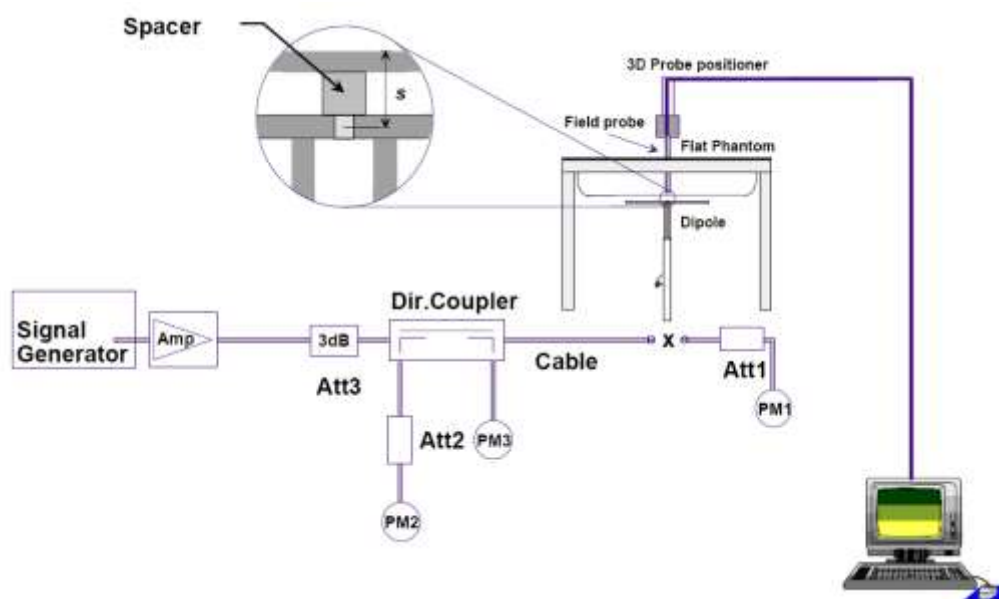


Picture 7-8 Liquid depth in the Head Phantom (5GHz)

8 System verification

8.1 System Setup

In the simplified setup for system evaluation, the DUT is replaced by a calibrated dipole and the power source is replaced by a continuous wave that comes from a signal generator. The calibrated dipole must be placed beneath the flat phantom section of the SAM twin phantom with the correct distance holder. The distance holder should touch the phantom surface with a light pressure at the reference marking and be oriented parallel to the long side of the phantom. The equipment setup is shown below:



Picture 8.1 System Setup for System Evaluation



Picture 8.2 Photo of Dipole Setup

8.2 System Verification

SAR system verification is required to confirm measurement accuracy, according to the tissue dielectric media, probe calibration points and other system operating parameters required for measuring the SAR of a test device. The system verification must be performed for each frequency band and within the valid range of each probe calibration point required for testing the device.

Table 8.1: System Verification of Head

Calibration Date	Frequency	Target value (W/kg)		Measured value (W/kg)		Deviation	
		10 g Average	1 g Average	10 g Average	1 g Average	10 g Average	1 g Average
2021/12/28	750 MHz	5.65	8.68	5.64	8.44	-0.18%	-2.76%
2021/12/29	750 MHz	5.65	8.68	5.72	8.56	1.24%	-1.38%
2021/12/30	750 MHz	5.65	8.68	5.80	8.72	2.65%	0.46%
2021/12/31	750 MHz	5.65	8.68	5.60	8.40	-0.88%	-3.23%
2021/12/23	835 MHz	6.24	9.63	5.96	9.16	-4.49%	-4.88%
2021/12/29	835 MHz	6.24	9.63	5.96	9.20	-4.49%	-4.47%
2021/12/31	835 MHz	6.24	9.63	6.04	9.24	-3.21%	-4.05%
2022/1/7	835 MHz	6.24	9.63	6.40	9.72	2.56%	0.93%
2021/12/28	1750 MHz	19.4	36.9	20.2	37.1	3.92%	0.49%
2021/12/29	1750 MHz	19.4	36.9	20.4	37.9	4.95%	2.76%
2021/12/30	1750 MHz	19.4	36.9	19.0	35.8	-2.27%	-3.09%
2021/12/31	1750 MHz	19.4	36.9	20.0	37.2	2.89%	0.81%
2022/1/4	1750 MHz	19.4	36.9	20.1	37.3	3.71%	1.14%
2022/1/5	1750 MHz	19.4	36.9	19.5	36.7	0.41%	-0.49%
2021/12/28	1900 MHz	20.9	40.1	20.4	39.9	-2.58%	-0.55%
2021/12/30	1900 MHz	20.9	40.1	20.8	40.4	-0.29%	0.75%
2022/1/4	1900 MHz	20.9	40.1	20.6	39.6	-1.24%	-1.35%
2022/1/6	1900 MHz	20.9	40.1	20.9	40.4	-0.10%	0.75%
2022/1/7	1900 MHz	20.9	40.1	21.6	41.2	3.54%	2.74%
2022/1/24	2450 MHz	24.9	53.3	25.3	54.8	1.69%	2.81%
2021/12/27	2600 MHz	25.5	57.1	25.6	58.8	0.39%	2.98%
2021/12/29	2600 MHz	25.5	57.1	25.6	58.4	0.39%	2.28%
2022/1/4	2600 MHz	25.5	57.1	26.5	59.6	3.84%	4.38%
2022/1/6	2600 MHz	25.5	57.1	25.6	56.8	0.39%	-0.53%
2022/1/10	2600 MHz	25.5	57.1	25.0	56.0	-1.96%	-1.93%
2022/1/11	3300 MHz	25.0	64.9	24.4	64.2	-2.40%	-1.08%
2022/1/11	3500 MHz	25.2	67.3	24.0	64.7	-4.76%	-3.86%
2022/1/11	3700 MHz	24.3	67.1	25.5	69.6	4.94%	3.73%
2022/1/26	5250 MHz	22.7	79.5	22.1	77.5	-2.64%	-2.52%
2022/1/26	5600 MHz	23.7	83.8	22.8	80.1	-3.80%	-4.42%
2022/1/26	5750 MHz	22.7	81.0	22.1	78.0	-2.64%	-3.70%

9 General Measurement Procedure

9.1 Power Reference Measurement

The Power Reference Measurement and Power Drift Measurements are for monitoring the power drift of the device under test in the batch process. The minimum distance of probe sensors to surface determines the closest measurement point to phantom surface. This distance cannot be smaller than the distance of sensor calibration points to probe tip as defined in the probe properties.

9.2 Area Scan

The area scan is used as a fast scan in two dimensions to find the area of high field values, before doing a fine measurement around the hot spot. The sophisticated interpolation routines implemented in DASY software can find the maximum found in the scanned area, within a range of the global maximum. The range (in dB) is specified in the standards for compliance testing. For example, a 2 dB range is required in IEEE standard 1528 and IEC 62209 standards, whereby 3 dB is a requirement when compliance is assessed in accordance with the ARIB standard (Japan), if only one zoom scan follows the area scan, then only the absolute maximum will be taken as reference. For cases where multiple maximums are detected, the number of zoom scans has to be increased accordingly.

Area scan parameters extracted from FCC KDB 865664 D01v01r04 SAR measurement 100 MHz to 6 GHz.

	≤ 3 GHz	> 3 GHz
Maximum distance from closest measurement point (geometric center of probe sensors) to phantom surface	5 ± 1 mm	$\frac{1}{2} \cdot \delta \cdot \ln(2) \pm 0.5$ mm
Maximum probe angle from probe axis to phantom surface normal at the measurement location	$30^\circ \pm 1^\circ$	$20^\circ \pm 1^\circ$
Maximum area scan spatial resolution: Δx_{Area} , Δy_{Area}	≤ 2 GHz: ≤ 15 mm $2 - 3$ GHz: ≤ 12 mm	$3 - 4$ GHz: ≤ 12 mm $4 - 6$ GHz: ≤ 10 mm
	When the x or y dimension of the test device, in the measurement plane orientation, is smaller than the above, the measurement resolution must be $\leq$ the corresponding x or y dimension of the test device with at least one measurement point on the test device.	

9.3 Zoom Scan

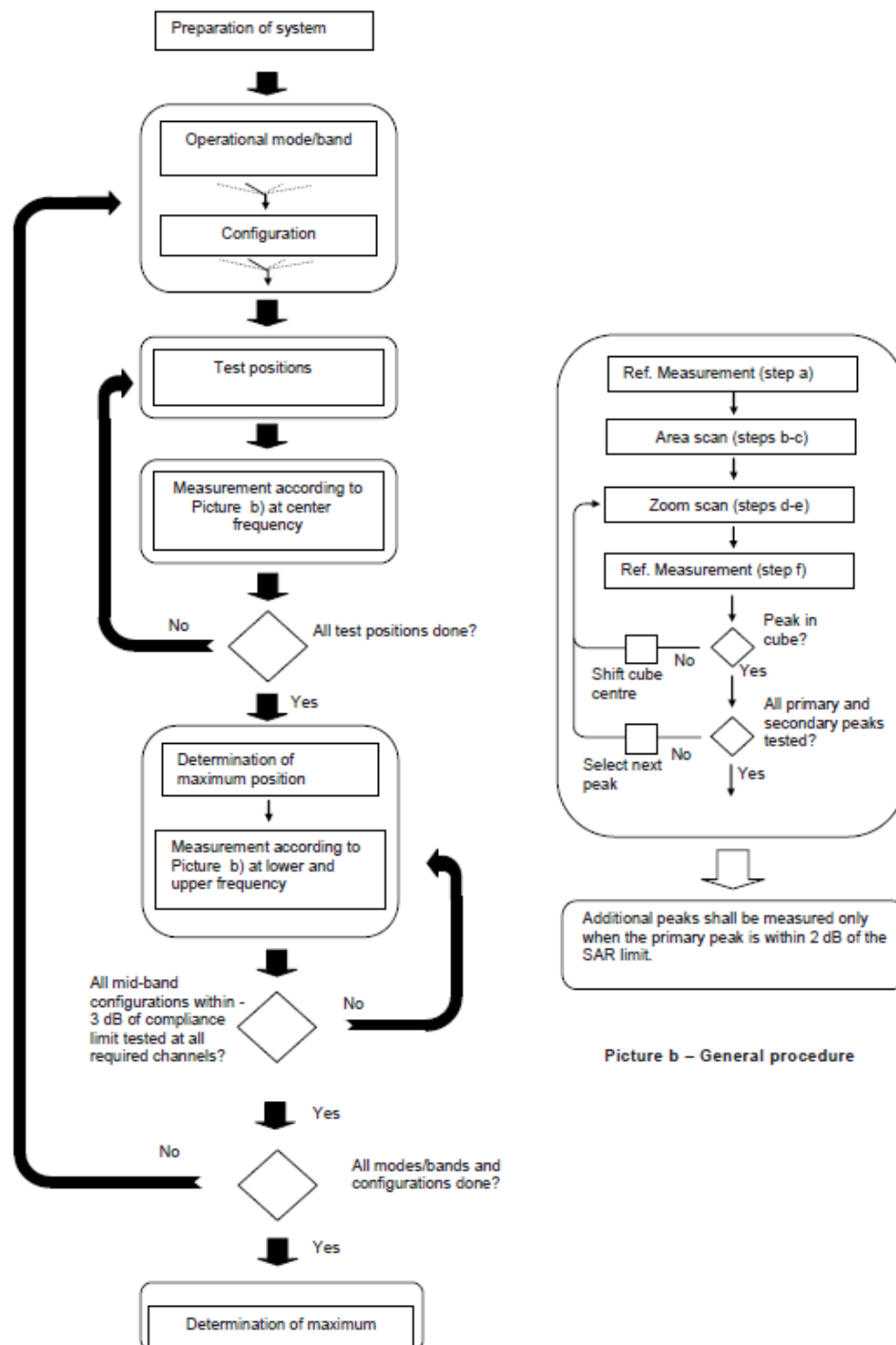
Zoom Scans are used to assess the peak spatial SAR values within a cubic averaging volume containing 1 g and 10g of simulated tissue. The Zoom Scan measures points (refer to table below) within a cube whose base faces are centered on the maxima found in a preceding area scan job within the same procedure. When the measurement is done, the Zoom Scan evaluates the averaged SAR for 1 g and 10 g and displays these values next to the job' s label.

Zoom Scan Parameters extracted from KDB 865664 D01 SAR Measurement 100 MHz to 6 GHz

Maximum zoom scan spatial resolution: $\Delta x_{\text{Zoom}}, \Delta y_{\text{Zoom}}$			$\leq 2 \text{ GHz}: \leq 8 \text{ mm}$ $2 - 3 \text{ GHz}: \leq 5 \text{ mm}^*$	$3 - 4 \text{ GHz}: \leq 5 \text{ mm}^*$ $4 - 6 \text{ GHz}: \leq 4 \text{ mm}^*$
Maximum zoom scan spatial resolution, normal to phantom surface	uniform grid: $\Delta z_{\text{Zoom}}(n)$		$\leq 5 \text{ mm}$	$3 - 4 \text{ GHz}: \leq 4 \text{ mm}$ $4 - 5 \text{ GHz}: \leq 3 \text{ mm}$ $5 - 6 \text{ GHz}: \leq 2 \text{ mm}$
	graded grid	$\Delta z_{\text{Zoom}}(1)$: between 1 st two points closest to phantom surface	$\leq 4 \text{ mm}$	$3 - 4 \text{ GHz}: \leq 3 \text{ mm}$ $4 - 5 \text{ GHz}: \leq 2.5 \text{ mm}$ $5 - 6 \text{ GHz}: \leq 2 \text{ mm}$
		$\Delta z_{\text{Zoom}}(n>1)$: between subsequent points	$\leq 1.5 \cdot \Delta z_{\text{Zoom}}(n-1)$	
Minimum zoom scan volume	x, y, z		$\geq 30 \text{ mm}$	$3 - 4 \text{ GHz}: \geq 28 \text{ mm}$ $4 - 5 \text{ GHz}: \geq 25 \text{ mm}$ $5 - 6 \text{ GHz}: \geq 22 \text{ mm}$
Note: δ is the penetration depth of a plane-wave at normal incidence to the tissue medium; see draft standard IEEE P1528-2011 for details.				
* When zoom scan is required and the <u>reported</u> SAR from the <i>area scan based 1-g SAR estimation</i> procedures of KDB 447498 is $\leq 1.4 \text{ W/kg}$, $\leq 8 \text{ mm}$, $\leq 7 \text{ mm}$ and $\leq 5 \text{ mm}$ zoom scan resolution may be applied, respectively, for 2 GHz to 3 GHz, 3 GHz to 4 GHz and 4 GHz to 6 GHz.				

9.4 Power drift measurement

The Power Drift Measurement measures the field at the same location as the most recent power reference measurement within the same procedure, and with the same settings. The Power Drift Measurement gives the field difference in dB from the reading conducted within the last Power Reference Measurement. This allows a user to monitor the power drift of the device under test within a batch process. The measurement procedure is the same as 10.1.



Picture a – Tests to be performed

Picture 9.1Block diagram of the tests to be performed

9.5 Area Scan Based 1-g SAR

9.5-1 Requirement of KDB

According to the KDB447498 D01 v06, when the implementation is based the specific polynomial fit algorithm as presented at the 29th Bioelectromagnetics Society meeting (2007) and the estimated 1-gSAR is ≤ 1.2 W/kg, a zoom scan measurement is not required provided it is also not needed for any other purpose; for example, if the peak SAR location required for simultaneous transmission SAR test exclusion can be determined accurately by the SAR system or manually to discriminate between distinctive peaks and scattered noisy SAR distributions from area scans.

There must not be any warning or alert messages due to various measurement concerns identified by the SAR system; for example, noise in measurements, peaks too close to scan boundary, peaks are too sharp, spatial resolution and uncertainty issues etc. The SAR system verification must also demonstrate that the area scan estimated 1-g SAR is within 3% of the zoom scan 1-g SAR (See Annex B). When all the SAR results for each exposure condition in a frequency band and wireless mode are based on estimated 1-g SAR, the 1-g SAR for the highest SAR configuration must be determined by a zoom scan.

9.5-2 Fast SAR Algorithms

The approach is based on the area scan measurement applying a frequency dependent attenuation parameter. This attenuation parameter was empirically determined by analyzing a large number of phones. The MOTOROLA FAST SAR was developed and validated by the MOTOROLA Research Group in Ft. Lauderdale.

In the initial study, an approximation algorithm based on Linear fit was developed. The accuracy of the algorithm has been demonstrated across a broad frequency range (136-2450 MHz) and for both 1- and 10-g averaged SAR using a sample of 264 SAR measurements from 55 wireless handsets. For the sample size studied, the root-mean-squared errors of the algorithm are 1.2% and 5.8% for 1- and 10-g averaged SAR, respectively. The paper describing the algorithm in detail is expected to be published in August 2004 within the Special Issue of Transactions on MTT.

In the second step, the same research group optimized the fitting algorithm to an Polynomial fit whereby the frequency validity was extended to cover the range 30-6000MHz. Details of this study can be found in the BEMS 2007 Proceedings.

Both algorithms are implemented in DASY software.

10 Measurement Procedure for different technologies

10.1 GSM/GPRS Measurement Procedures for SAR

GSM / GPRS / EDGE modes is determined by the source-based time-averaged output power including tune-up tolerance. The mode with highest specified time-averaged output power should be tested for SAR compliance in the applicable exposure conditions. For modes with the same specified maximum output power and tolerance, the higher number time-slot configuration should be tested. Other configurations of GSM / GPRS / EDGE are considered as secondary modes. The 3G SAR test reduction procedure is applied, when the maximum output power and tune-up tolerance specified for production units in a secondary mode is $\leq \frac{1}{4}$ dB higher than the primary mode, SAR measurement is not required for the secondary mode.

10.2 WCDMA Measurement Procedures for SAR

The following procedures are applicable to WCDMA handsets operating under 3GPP Release99, Release 5 and Release 6. The default test configuration is to measure SAR with an established radio link between the DUT and a communication test set using a 12.2kbps RMC (reference measurement channel) configured in Test Loop Mode 1. SAR is selectively confirmed for other physical channel configurations (DPCCH & DPDCH_n), HSDPA and HSPA (HSUPA/HSDPA) modes according to output power, exposure conditions and device operating capabilities. Both uplink and downlink should be configured with the same RMC or AMR, when required. SAR for Release 5 HSDPA and Release 6 HSPA are measured using the applicable FRC (fixed reference channel) and E-DCH reference channel configurations. Maximum output power is verified according to applicable versions of 3GPP TS 34.121 and SAR must be measured according to these maximum output conditions. When Maximum Power Reduction (MPR) is not implemented according to Cubic Metric (CM) requirements for Release 6 HSPA, the following procedures do not apply.

For Release 5 HSDPA Data Devices:

Sub-test	β_c	β_d	β_d (SF)	β_c / β_d	β_{hs}	CM/dB
1	2/15	15/15	64	2/15	4/15	0.0
2	12/15	15/15	64	12/15	24/25	1.0
3	15/15	8/15	64	15/8	30/15	1.5
4	15/15	4/15	64	15/4	30/15	1.5

For Release 6 HSPA Data Devices

Sub-test	β_c	β_d	β_d (SF)	β_c / β_d	β_{hs}	β_{ec}	β_{ed}	β_{ed} (SF)	β_{ed} (codes)	CM (dB)	MPR (dB)	AG Index	E-TFCI
1	11/15	15/15	64	11/15	22/15	209/225	1039/225	4	1	1.5	1.5	20	75
2	6/15	15/15	64	6/15	12/15	12/15	12/15	4	1	1.5	1.5	12	67
3	15/15	9/15	64	15/9	30/15	30/15	$\beta_{ed1}:47/15$	4	2	1.5	1.5	15	92

							$\beta_{ed2}:47/15$						
4	2/15	15/15	64	2/15	4/15	4/15	56/75	4	1	1.5	1.5	17	71
5	15/15	15/15	64	15/15	24/15	30/15	134/15	4	1	1.5	1.5	21	81

Rel.7 Release 7 HSPA+ Data Devices

Table C.11.1.4: β values for transmitter characteristics tests with HS-DPCCH and E-DCH with 16QAM

Sub-test	β_c (Note 3)	β_d	β_{HS} (Note 1)	β_{EC}	β_{ed} (2xSF2) (Note 4)	β_{ed} (2xSF4) (Note 4)	CM (dB) (Note 2)	MPR (dB) (Note 2)	AG Index (Note 4)	E-TFCI (Note 5)	E-TFCI (boost)
1	1	0	30/15	30/15	β_{ed1} : 30/15 β_{ed2} : 30/15	β_{ed3} : 24/15 β_{ed4} : 24/15	3.5	2.5	14	105	105

Note 1: Δ_{ACK} , Δ_{NACK} and $\Delta_{CQI} = 30/15$ with $\beta_{HS} = 30/15 * \beta_c$.
 Note 2: CM = 3.5 and the MPR is based on the relative CM difference, MPR = MAX(CM-1,0).
 Note 3: DPDCH is not configured, therefore the β_c is set to 1 and $\beta_d = 0$ by default.
 Note 4: β_{ed} can not be set directly; it is set by Absolute Grant Value.
 Note 5: All the sub-tests require the UE to transmit 2SF2+2SF4 16QAM EDCH and they apply for UE using E-DPDCH category 7. E-DCH TTI is set to 2ms TTI and E-DCH table index = 2. To support these E-DCH configurations DPDCH is not allocated. The UE is signalled to use the extrapolation algorithm.

Rel.8 DC-HSDPA (Cat 24)

SAR test exclusion for Rel.8 DC-HSDPA must satisfy the SAR test exclusion requirements of Rel.5 HSDPA. SAR test exclusion for DC-HSDPA devices is determined by power measurements according to the H-Set 12, Fixed Reference Channel (FRC) configuration in Table C.8.1.12 of 3GPP TS 34.121-1. A primary and a secondary serving HS-DSCH Cell are required to perform the power measurement and for the results to qualify for SAR test exclusion.

Table C.8.1.12: Fixed Reference Channel H-Set 12

Parameter	Unit	Value
Nominal Avg. Inf. Bit Rate	kbps	60
Inter-TTI Distance	TTI's	1
Number of HARQ Processes	Processes	6
Information Bit Payload (N_{INF})	Bits	120
Number Code Blocks	Blocks	1
Binary Channel Bits Per TTI	Bits	960
Total Available SML's in UE	SML's	19200
Number of SML's per HARQ Proc.	SML's	3200
Coding Rate		0.15
Number of Physical Channel Codes	Codes	1
Modulation		QPSK
Note 1: The RMC is intended to be used for DC-HSDPA mode and both cells shall transmit with identical parameters as listed in the table. Note 2: Maximum number of transmission is limited to 1, i.e., retransmission is not allowed. The redundancy and constellation version 0 shall be used.		

10.3 LTE Measurement Procedures for SAR

SAR tests for LTE are performed with a base station simulator, Rohde & Schwarz CMW500 or Anritsu MT8821C Closed loop power control was used so the UE transmits with maximum output power during SAR testing.

It is performed for conducted power and SAR based on the KDB941225 D05.

SAR is evaluated separately according to the following procedures for the different test positions in each exposure condition – head, body, body-worn accessories and other use conditions. The procedures in the following subsections are applied separately to test each LTE frequency band.

1) QPSK with 1 RB allocation

Start with the largest channel bandwidth and measure SAR for QPSK with 1 RB allocation, using the RB offset and required test channel combination with the highest maximum output power among RB offsets at the upper edge, middle and lower edge of each required test channel. When the reported SAR is ≤ 0.8 W/kg, testing of the remaining RB offset configurations and required test channels is not required for 1 RB allocation; otherwise, SAR is required for the remaining required test channels and only for the RB offset configuration with the highest output power for that channel. When the reported SAR of a required test channel is > 1.45 W/kg, SAR is required for all three RB offset configurations for that required test channel.

2) QPSK with 50% RB allocation

The procedures required for 1 RB allocation in 1) are applied to measure the SAR for QPSK with 50% RB allocation.

3) QPSK with 100% RB allocation

For QPSK with 100% RB allocation, SAR is not required when the highest maximum output power for 100 % RB allocation is less than the highest maximum output power in 50% and 1 RB allocations and the highest reported SAR for 1 RB and 50% RB allocation in 1) and 2) are ≤ 0.8 W/kg. Otherwise, SAR is measured for the highest output power channel; and if the reported SAR is > 1.45 W/kg, the remaining required test channels must also be tested.

TDD test:

TDD testing is performed using guidance from FCC KDB 941225 D05 v02r05 and the SAR test guidance provided in April 2013 TCB works hop notes. TDD is tested at the highest duty factor using UL-DL configuration 0 with special subframe configuration 6 and applying the FDD LTE procedures in KDB 941225 D05 v02r05. SAR testing is performed using the extended cyclic prefix listed in 3GPP TS 36.211.

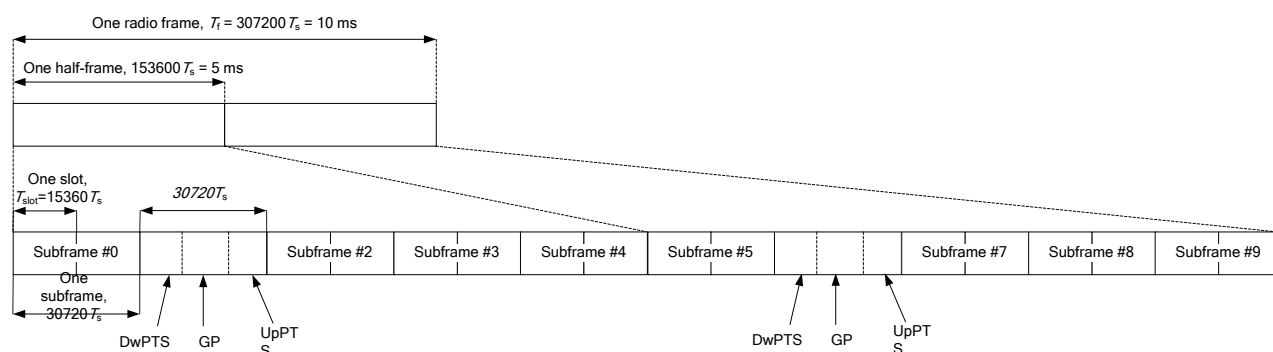


Figure 10.2: Frame structure type 2 (for 5 ms switch-point periodicity)

Table 10.1: Configuration of special subframe (lengths of DwPTS/GP/UpPTS)

Special subframe configuration	Normal cyclic prefix in downlink			Extended cyclic prefix in downlink		
	DwPTS	UpPTS		DwPTS	UpPTS	
		Normal cyclic prefix in uplink	Extended cyclic prefix in uplink		Normal cyclic prefix in uplink	Extended cyclic prefix in uplink
0	$6592 \cdot T_s$	$2192 \cdot T_s$	$2560 \cdot T_s$	$7680 \cdot T_s$	$2192 \cdot T_s$	$2560 \cdot T_s$
1	$19760 \cdot T_s$			$20480 \cdot T_s$		
2	$21952 \cdot T_s$			$23040 \cdot T_s$		
3	$24144 \cdot T_s$			$25600 \cdot T_s$		
4	$26336 \cdot T_s$	$4384 \cdot T_s$	$5120 \cdot T_s$	$7680 \cdot T_s$	$4384 \cdot T_s$	$5120 \cdot T_s$
5	$6592 \cdot T_s$			$20480 \cdot T_s$		
6	$19760 \cdot T_s$			$23040 \cdot T_s$		
7	$21952 \cdot T_s$			$12800 \cdot T_s$		
8	$24144 \cdot T_s$			-	-	-
9	$13168 \cdot T_s$			-	-	-

Table 10.2: Uplink-downlink configurations

Uplink-downlink configuration	Downlink-to-Uplink Switch-point periodicity	Subframe number									
		0	1	2	3	4	5	6	7	8	9
0	5 ms	D	S	U	U	U	D	S	U	U	U
1	5 ms	D	S	U	U	D	D	S	U	U	D
2	5 ms	D	S	U	D	D	D	S	U	D	D
3	10 ms	D	S	U	U	U	D	D	D	D	D
4	10 ms	D	S	U	U	D	D	D	D	D	D
5	10 ms	D	S	U	D	D	D	D	D	D	D
6	5 ms	D	S	U	U	U	D	S	U	U	D

Duty factor is calculated by:

$$\begin{aligned}
 \text{Duty factor} &= \text{uplink frame} \cdot 6 + \text{UpPTS} \cdot 2 / \text{one frame length} \\
 &= (30720 \cdot T_s \cdot 6 + 5120 \cdot T_s \cdot 2) / 307200 \cdot T_s \\
 &= 0.633
 \end{aligned}$$

According to the KDB 447498 D01, SAR should be evaluated at more than 3 frequencies for devices supporting transmit bands wider than 100MHz. Oct.2014 FCC-TCB conference notes (Dec. 2014 rev.) specifies the 5 test channels to use for 3GPP band 38/41 SAR evaluation.

10.4 Bluetooth & Wi-Fi Measurement Procedures for SAR

Normal network operating configurations are not suitable for measuring the SAR of 802.11 transmitters in general. Unpredictable fluctuations in network traffic and antenna diversity conditions can introduce undesirable variations in SAR results. The SAR for these devices should be measured using chipset based test mode software to ensure that the results are consistent and reliable.

Chipset based test mode software is hardware dependent and generally varies among manufacturers. The device operating parameters established in a test mode for SAR measurements must be identical to those programmed in production units, including output power levels, amplifier gain settings and other RF performance tuning parameters. The test frequencies should correspond to actual channel frequencies defined for domestic use. SAR for devices with switched diversity should be measured with only one antenna transmitting at a time during each SAR measurement, according to a fixed modulation and data rate. The same data pattern should be used for all measurements.

10.5 SAR Measurement for ENDC

1. Test LTE SAR with single uplink at maximum power following LTE SAR test procedure.
 2. Test conducted power of 5G NR sub-carrier under EN-DC at maximum power (FDD and TDD)[1] and change the different parameters to find the worst-case configuration, see detail procedure as attached.
- [1] For TDD band (n41), PC2 mode is only tested, because the duty cycle of both PC2 and PC3 are the same and PC2 has higher power than PC3.
3. Test SAR in worst case configuration for 5G NR in single uplink (test mode).
 4. If the single uplink 1g SAR values for 5G NR and LTE are both less than 0.8W/kg and the algebraic summation of the 1g SAR values are less than 1.45W/kg, no additional measurements need to be performed.

11 Conducted Output Power

DSI	Rceiver mode	Sensor	Hotspot	Transmissing	Position
				conditions	
DSI2	ON(head scenario)	/	OFF	WWAN Use Only	Head
DSI3	ON(head scenario)	/	OFF	WWAN +WLAN	Head
DSI4	OFF (Body/other scenario)	OFF	OFF	WWAN Use Only	Back/Left for antenna11 limb SAR of sensor Trigger distance-1 Front/Back/Top for antenna13 limb SAR of sensor Trigger distance-1
					ALL position for all antenna of Body 15mm
					Front/Right/Top/Bottom for antenna11 limb SAR 0mm Right/Left/Bottom for antenna13 limb SAR 0mm ALL position for antenna 12/31/41 limb SAR 0mm
DSI5	OFF (Body/other scenario)	ON	OFF	WWAN Use Only	Front/Back/Top for antenna13 limb SAR 0mm
					Back/Left for antenna11 limb SAR 0mm
DSI8	OFF (Body/other scenario)	ON	OFF	WWAN +WLAN	Front/Back/Top for antenna13 limb SAR 0mm
		ON	OFF	WWAN +WLAN	Back/Left for antenna11 limb SAR 0mm
		OFF	OFF	WWAN +WLAN	Front/Right/Top/Bottom for antenna11 limb SAR 0mm Right/Left/Bottom for antenna13 limb SAR 0mm ALL position for antenna 12/31/41 limb SAR 0mm
DSI9	OFF (Body/other scenario)	OFF	OFF	WWAN +WLAN	Front/Right/Top/Bottom for antenna11 limb SAR 0mm
DSI10	OFF (Body/other scenario)	OFF	OFF	WWAN +WLAN	Right/Left/Bottom for antenna13 limb SAR 0mm
		ON	ON	WWAN Use Only WWAN +WLAN	ALL position for FCC Hotspot mode When hotspot and sensor are both on to reduce power, hotspot mode has a higher priority than the sensor mode.

11.1 GSM Measurement result

GSM850(ANT13 DSI2/3)

GSM 850 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	25.04	25.11	24.93	26.20	-9.03	16.01	16.08	15.90
GSM 850 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	25.10	25.16	25.16	26.20	-9.03	16.07	16.13	16.13
2Txslots	23.87	23.90	23.91	24.50	-6.02	17.85	17.88	17.89
3Txslots	21.86	21.89	21.92	22.50	-4.26	17.60	17.63	17.66
4Txslots	19.86	19.88	19.89	20.70	-3.01	16.85	16.87	16.88
GSM 850 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	25.06	25.14	25.13	26.20	-9.03	16.03	16.11	16.10
2Txslots	23.84	23.86	23.88	24.50	-6.02	17.82	17.84	17.86
3Txslots	21.83	21.87	21.89	22.50	-4.26	17.57	17.61	17.63
4Txslots	19.83	19.86	19.87	20.70	-3.01	16.82	16.85	16.86
GSM 850 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	24.55	24.62	24.64	25.70	-9.03	15.52	15.59	15.61
2Txslots	23.17	23.16	23.20	24.50	-6.02	17.15	17.14	17.18
3Txslots	21.02	20.98	20.99	22.50	-4.26	16.76	16.72	16.73
4Txslots	19.12	19.17	19.21	20.50	-3.01	16.11	16.16	16.20

GSM850(ANT13 DSI4)

GSM 850 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	32.55	32.61	32.41	33.70	-9.03	23.52	23.58	23.38
GSM 850 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	32.57	32.58	32.36	33.70	-9.03	23.54	23.55	23.33
2Txslots	31.25	31.25	31.03	31.70	-6.02	25.23	25.23	25.01
3Txslots	29.28	29.31	29.09	29.70	-4.26	25.02	25.05	24.83
4Txslots	27.31	27.35	27.14	28.20	-3.01	24.30	24.34	24.13
GSM 850 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	32.54	32.56	32.36	33.70	-9.03	23.51	23.53	23.33
2Txslots	31.24	31.26	31.03	31.70	-6.02	25.22	25.24	25.01
3Txslots	29.26	29.34	29.09	29.70	-4.26	25.00	25.08	24.83
4Txslots	27.30	27.37	27.14	28.20	-3.01	24.29	24.36	24.13
GSM 850 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	26.74	26.95	26.69	28.00	-9.03	17.71	17.92	17.66
2Txslots	25.05	24.60	24.48	26.00	-6.02	19.03	18.58	18.46
3Txslots	22.62	22.40	22.90	24.00	-4.26	18.36	18.14	18.64
4Txslots	20.80	21.77	20.64	22.00	-3.01	17.79	18.76	17.63

GSM850(ANT13 DSI8/9/10)

GSM 850 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	30.55	30.63	30.57	31.70	-9.03	21.52	21.60	21.54
GSM 850 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	30.48	30.56	30.49	31.70	-9.03	21.45	21.53	21.46
2Txslots	29.24	29.33	29.25	29.70	-6.02	23.22	23.31	23.23
3Txslots	27.25	27.35	27.27	27.70	-4.26	22.99	23.09	23.01
4Txslots	25.23	25.34	25.24	26.20	-3.01	22.22	22.33	22.23
GSM 850 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	30.48	30.47	30.24	31.70	-9.03	21.45	21.44	21.21
2Txslots	29.22	29.23	28.97	29.70	-6.02	23.20	23.21	22.95
3Txslots	27.25	27.26	27.00	27.70	-4.26	22.99	23.00	22.74
4Txslots	25.20	25.19	24.98	26.20	-3.01	22.19	22.18	21.97
GSM 850 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	26.57	26.47	26.46	28.00	-9.03	17.54	17.44	17.43
2Txslots	24.32	24.22	24.21	26.00	-6.02	18.30	18.20	18.19
3Txslots	22.26	22.41	22.22	24.00	-4.26	18.00	18.15	17.96
4Txslots	20.73	20.42	20.61	22.00	-3.01	17.72	17.41	17.60

GSM850(ANT41 DSI2/3)

GSM 850 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	32.34	32.51	32.44	33.70	-9.03	23.31	23.48	23.41
GSM 850 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	32.57	32.71	32.63	33.70	-9.03	23.54	23.68	23.60
2Txslots	31.23	31.39	31.34	31.70	-6.02	25.21	25.37	25.32
3Txslots	29.23	29.42	29.39	29.70	-4.26	24.97	25.16	25.13
4Txslots	27.25	27.46	27.44	28.20	-3.01	24.24	24.45	24.43
GSM 850 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	32.55	32.70	32.62	33.70	-9.03	23.52	23.67	23.59
2Txslots	31.21	31.37	31.32	31.70	-6.02	25.19	25.35	25.30
3Txslots	29.21	29.41	29.38	29.70	-4.26	24.95	25.15	25.12
4Txslots	27.23	27.45	27.42	28.20	-3.01	24.22	24.44	24.41
GSM 850 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	27.04	27.01	27.14	28.00	-9.03	18.01	17.98	18.11
2Txslots	24.82	24.74	24.85	26.00	-6.02	18.80	18.72	18.83
3Txslots	22.60	23.88	22.72	24.00	-4.26	18.34	19.62	18.46
4Txslots	20.82	20.85	20.97	22.00	-3.01	17.81	17.84	17.96

GSM850(ANT41 DSI4/8/9/10)

GSM 850 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	31.92	32.12	32.10	33.20	-9.03	22.89	23.09	23.07
GSM 850 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	31.87	32.07	32.05	33.20	-9.03	22.84	23.04	23.02
2Txslots	30.64	30.85	30.88	31.20	-6.02	24.62	24.83	24.86
3Txslots	28.58	28.82	28.87	29.20	-4.26	24.32	24.56	24.61
4Txslots	26.66	26.89	26.92	27.70	-3.01	23.65	23.88	23.91
GSM 850 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	31.88	32.08	32.07	33.20	-9.03	22.85	23.05	23.04
2Txslots	30.65	30.88	30.90	31.20	-6.02	24.63	24.86	24.88
3Txslots	28.58	28.85	28.87	29.20	-4.26	24.32	24.59	24.61
4Txslots	26.67	26.92	26.96	27.70	-3.01	23.66	23.91	23.95
GSM 850 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	251	190	128			251	190	128
1Txslot	26.62	27.43	27.55	28.00	-9.03	17.59	18.40	18.52
2Txslots	24.93	24.84	24.95	26.00	-6.02	18.91	18.82	18.93
3Txslots	22.49	22.57	22.72	24.00	-4.26	18.23	18.31	18.46
4Txslots	20.57	20.68	20.71	22.00	-3.01	17.56	17.67	17.70

GSM1900(ANT13 DSI2/3)

GSM 1900 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	22.90	23.09	23.08	23.80	-9.03	13.87	14.06	14.05
GSM 1900 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	22.77	22.95	22.94	23.80	-9.03	13.74	13.92	13.91
2Txslots	21.06	21.20	21.21	21.80	-6.02	15.04	15.18	15.19
3Txslots	19.08	19.21	19.14	19.80	-4.26	14.82	14.95	14.88
4Txslots	17.62	17.70	17.64	18.30	-3.01	14.61	14.69	14.63
GSM 1900 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	22.73	22.93	22.90	23.80	-9.03	13.70	13.90	13.87
2Txslots	21.03	21.19	21.17	21.80	-6.02	15.01	15.17	15.15
3Txslots	19.05	19.17	19.11	19.80	-4.26	14.79	14.91	14.85
4Txslots	17.59	17.66	17.61	18.30	-3.01	14.58	14.65	14.60
GSM 1900 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	22.89	22.99	23.01	23.80	-9.03	13.86	13.96	13.98
2Txslots	20.79	20.91	20.94	22.00	-6.02	14.77	14.89	14.92
3Txslots	18.50	18.63	18.67	20.00	-4.26	14.24	14.37	14.41
4Txslots	16.72	16.90	16.95	18.50	-3.01	13.71	13.89	13.94

GSM1900(ANT13 DSI4)

GSM 1900 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	29.59	29.71	29.90	30.80	-9.03	20.56	20.68	20.87
GSM 1900 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	29.50	29.63	29.85	30.80	-9.03	20.47	20.60	20.82
2Txslots	27.77	27.90	27.95	28.80	-6.02	21.75	21.88	21.93
3Txslots	25.77	25.92	25.95	26.80	-4.26	21.51	21.66	21.69
4Txslots	24.31	24.44	24.48	25.30	-3.01	21.30	21.43	21.47
GSM 1900 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	29.46	29.59	29.79	30.80	-9.03	20.43	20.56	20.76
2Txslots	27.72	27.86	27.89	28.80	-6.02	21.70	21.84	21.87
3Txslots	25.73	25.89	25.89	26.80	-4.26	21.47	21.63	21.63
4Txslots	24.27	24.41	24.42	25.30	-3.01	21.26	21.40	21.41
GSM 1900 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	26.00	26.24	26.03	27.00	-9.03	16.97	17.21	17.00
2Txslots	23.89	24.09	24.06	25.00	-6.02	17.87	18.07	18.04
3Txslots	21.50	21.64	22.08	23.00	-4.26	17.24	17.38	17.82
4Txslots	19.70	19.88	20.07	21.50	-3.01	16.69	16.87	17.06

GSM1900(ANT13 DSI8/9/10)

GSM 1900 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	25.62	25.89	26.39	26.80	-9.03	16.59	16.86	17.36
GSM 1900 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	25.59	25.75	25.75	26.80	-9.03	16.56	16.72	16.72
2Txslots	23.75	23.93	23.91	24.80	-6.02	17.73	17.91	17.89
3Txslots	21.77	21.93	21.92	22.80	-4.26	17.51	17.67	17.66
4Txslots	20.32	20.49	20.44	21.30	-3.01	17.31	17.48	17.43
GSM 1900 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	25.57	25.74	25.74	26.80	-9.03	16.54	16.71	16.71
2Txslots	23.74	23.92	23.90	24.80	-6.02	17.72	17.90	17.88
3Txslots	21.77	21.93	21.92	22.80	-4.26	17.51	17.67	17.66
4Txslots	20.31	20.49	20.44	21.30	-3.01	17.30	17.48	17.43
GSM 1900 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	25.58	25.71	25.77	26.80	-9.03	16.55	16.68	16.74
2Txslots	23.84	24.01	24.06	25.00	-6.02	17.82	17.99	18.04
3Txslots	21.50	21.67	21.74	23.00	-4.26	17.24	17.41	17.48
4Txslots	19.75	19.90	20.04	21.50	-3.01	16.74	16.89	17.03

GSM1900(ANT31 DSI2/3)

GSM 1900 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	29.69	29.80	30.02	31.00	-9.03	20.66	20.77	20.99
GSM 1900 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	29.81	29.90	30.11	31.00	-9.03	20.78	20.87	21.08
2Txslots	28.15	28.27	28.35	29.00	-6.02	22.13	22.25	22.33
3Txslots	26.04	26.21	26.39	27.00	-4.26	21.78	21.95	22.13
4Txslots	24.54	24.73	24.91	25.50	-3.01	21.53	21.72	21.90
GSM 1900 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	29.80	29.97	30.09	31.00	-9.03	20.77	20.94	21.06
2Txslots	28.06	28.29	28.32	29.00	-6.02	22.04	22.27	22.30
3Txslots	25.93	26.17	26.35	27.00	-4.26	21.67	21.91	22.09
4Txslots	24.53	24.69	24.87	25.50	-3.01	21.52	21.68	21.86
GSM 1900 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	26.06	26.14	26.38	27.00	-9.03	17.03	17.11	17.35
2Txslots	23.99	24.07	24.31	25.00	-6.02	17.97	18.05	18.29
3Txslots	21.72	21.81	22.15	23.00	-4.26	17.46	17.55	17.89
4Txslots	20.07	20.14	20.18	21.50	-3.01	17.06	17.13	17.17

GSM1900(ANT31 DSI4)

GSM 1900 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	28.73	28.86	29.15	30.00	-9.03	19.70	19.83	20.12
GSM 1900 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	28.75	28.77	28.89	30.00	-9.03	19.72	19.74	19.86
2Txslots	26.91	27.01	27.27	28.00	-6.02	20.89	20.99	21.25
3Txslots	24.83	24.96	25.29	26.00	-4.26	20.57	20.70	21.03
4Txslots	23.28	23.44	23.75	24.50	-3.01	20.27	20.43	20.74
GSM 1900 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	28.74	28.78	28.85	30.00	-9.03	19.71	19.75	19.82
2Txslots	26.88	27.01	27.24	28.00	-6.02	20.86	20.99	21.22
3Txslots	24.83	24.96	25.24	26.00	-4.26	20.57	20.70	20.98
4Txslots	23.27	23.42	23.70	24.50	-3.01	20.26	20.41	20.69
GSM 1900 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	25.69	25.78	26.09	27.00	-9.03	16.66	16.75	17.06
2Txslots	23.74	24.05	24.07	25.00	-6.02	17.72	18.03	18.05
3Txslots	21.49	21.58	21.76	23.00	-4.26	17.23	17.32	17.50
4Txslots	19.62	19.71	19.88	21.50	-3.01	16.61	16.70	16.87

GSM1900(ANT31 DSI8/9/10)

GSM 1900 Speech (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	27.06	27.21	27.52	28.50	-9.03	18.03	18.18	18.49
GSM 1900 GPRS (GMSK)	Measured timeslot-averaged output power (dBm)			Tune up	calculation	Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	27.13	27.16	27.37	28.50	-9.03	18.10	18.13	18.34
2Txslots	25.28	25.34	25.63	26.50	-6.02	19.26	19.32	19.61
3Txslots	23.23	23.31	23.62	24.50	-4.26	18.97	19.05	19.36
4Txslots	21.68	21.77	22.13	23.00	-3.01	18.67	18.76	19.12
GSM 1900 EGPRS (GMSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	27.17	27.22	27.43	28.50	-9.03	18.14	18.19	18.40
2Txslots	25.32	25.40	25.68	26.50	-6.02	19.30	19.38	19.66
3Txslots	23.27	23.37	23.66	24.50	-4.26	19.01	19.11	19.40
4Txslots	21.72	21.82	22.15	23.00	-3.01	18.71	18.81	19.14
GSM 1900 EGPRS(8PSK)	Measured timeslot-averaged output power (dBm)					Source-based time-averaged output power (dBm)		
	810	661	512			810	661	512
1Txslot	25.77	25.83	26.09	27.00	-9.03	16.74	16.80	17.06
2Txslots	23.67	23.76	24.10	25.00	-6.02	17.65	17.74	18.08
3Txslots	21.40	21.49	21.87	23.00	-4.26	17.14	17.23	17.61
4Txslots	19.84	19.88	20.01	21.50	-3.01	16.83	16.87	17.00

11.2 WCDMA Measurement result

WCDMA1900(ANT13 DSI2/3)

Item	band	FDDII result			
	ARFCN	9538 (1907.6MHz)	9400 (1880MHz)	9262 (1852.4MHz)	Tune up
WCDMA	1	13.85	14.03	13.70	15.50
HSUPA	1	11.32	11.53	11.25	13.00
	2	10.85	11.09	10.74	12.50
	3	10.86	11.12	10.77	12.50
	4	10.39	10.60	10.58	12.00
	5	11.86	12.05	12.02	13.50
HSPA+	1	12.46	12.63	12.35	14.00
DC-HSDPA	1	12.83	13.01	12.75	14.00
	2	12.82	13.00	12.74	14.00
	3	12.38	12.49	12.32	14.00
	4	12.37	12.47	12.31	14.00

WCDMA1900(ANT13 DSI4)

Item	band	FDDII result			
	ARFCN	9538 (1907.6MHz)	9400 (1880MHz)	9262 (1852.4MHz)	Tune up
WCDMA	1	21.32	21.48	21.22	23.00
HSUPA	1	19.27	19.47	19.18	20.50
	2	19.41	19.62	19.30	20.50
	3	19.43	19.60	19.29	20.50
	4	18.94	19.14	18.81	20.00
	5	20.18	20.41	20.35	21.50
HSPA+	1	20.16	20.61	20.30	21.50
DC-HSDPA	1	20.7	20.86	20.58	21.50
	2	20.68	20.84	20.56	21.50
	3	20.2	20.35	20.08	21.50
	4	20.19	20.36	20.09	21.50

WCDMA1900(ANT13 DSI8/9/10)

Item	band	FDDII result			
	ARFCN	9538 (1907.6MHz)	9400 (1880MHz)	9262 (1852.4MHz)	Tune up
WCDMA	1	16.40	16.57	16.27	18.00
HSUPA	1	13.25	13.52	13.19	15.00
	2	13.41	13.63	13.30	15.00
	3	13.27	13.53	13.19	15.00
	4	12.75	12.97	12.67	14.50
	5	14.08	14.10	14.08	15.50
HSPA+	1	14.84	15.08	14.83	16.50
DC-HSDPA	1	15.1	15.33	15.09	16.50
	2	15.11	15.32	15.10	16.50
	3	14.64	14.83	14.62	16.00
	4	14.63	14.81	14.62	16.00

WCDMA1900(ANT31 DSI2/3)

Item	band	FDDII result			
	ARFCN	9538 (1907.6MHz)	9400 (1880MHz)	9262 (1852.4MHz)	Tune up
WCDMA	1	23.01	23.32	23.10	24.70
HSUPA	1	19.66	19.95	19.63	21.00
	2	19.65	19.93	19.62	21.00
	3	19.66	19.92	19.61	21.00
	4	19.19	19.48	19.30	21.00
	5	20.46	20.72	20.67	22.00
HSPA+	1	21.05	21.34	21.23	23.00
DC-HSDPA	1	21.56	21.73	21.64	23.00
	2	21.55	21.74	21.66	23.00
	3	21.04	21.27	21.14	22.50
	4	21.03	21.26	21.15	22.50

WCDMA1900(ANT31 DSI4)

Item	band	FDDII result			
	ARFCN	9538 (1907.6MHz)	9400 (1880MHz)	9262 (1852.4MHz)	Tune up
WCDMA	1	20.57	20.70	20.64	22.20
HSUPA	1	18.34	18.13	17.90	19.50
	2	18.03	18.30	18.05	19.50
	3	19.08	19.33	19.08	20.00
	4	17.56	17.84	17.79	19.00
	5	19.02	19.27	19.07	20.50
HSPA+	1	19.6	19.37	19.09	20.50
DC-HSDPA	1	19.56	19.77	19.60	21.00
	2	19.58	19.80	19.61	21.00
	3	19.14	19.30	19.16	20.50
	4	19.15	19.28	19.14	20.50

WCDMA1900(ANT31 DSI8/9/10)

Item	band	FDDII result			
	ARFCN	9538 (1907.6MHz)	9400 (1880MHz)	9262 (1852.4MHz)	Tune up
WCDMA	1	19.73	20.03	19.83	21.20
HSUPA	1	16.36	16.76	16.68	17.50
	2	16.32	16.64	16.56	17.50
	3	16.34	16.62	16.44	17.50
	4	15.89	16.16	16.12	17.50
	5	17.14	17.44	17.40	18.50
HSPA+	1	17.72	18.02	17.86	19.00
DC-HSDPA	1	18.22	18.51	18.35	19.50
	2	18.24	18.50	18.35	19.50
	3	17.79	18.04	17.87	19.00
	4	17.8	18.02	17.86	19.00

WCDMA1700(ANT13 DSI2/3)

Item	band	FDDIV result			
	ARFCN	1513 (1752.6MHz)	1412 (1732.4MHz)	1312 (1712.4MHz)	Tune up
WCDMA	1	14.72	14.68	14.83	16.00
HSUPA	1	11.94	12.07	12.08	13.50
	2	11.21	11.53	11.58	13.00
	3	11.49	11.56	11.60	13.00
	4	10.95	11.06	11.12	12.50
	5	12.44	12.51	12.55	14.00
HSPA+	1	12.95	13.11	13.13	14.50
DC-HSDPA	1	13.42	13.58	13.60	14.50
	2	13.43	13.60	13.61	14.50
	3	12.99	13.22	13.23	14.50
	4	13	13.20	13.21	14.50

WCDMA1700(ANT13 DSI4)

Item	band	FDDIV result			
	ARFCN	1513 (1752.6MHz)	1412 (1732.4MHz)	1312 (1712.4MHz)	Tune up
WCDMA	1	23.07	23.04	23.17	24.00
HSUPA	1	19.76	19.80	19.90	21.00
	2	19.87	19.95	20.00	21.00
	3	19.88	19.96	19.99	21.00
	4	19.39	19.46	19.48	20.50
	5	20.67	20.79	20.81	22.00
HSPA+	1	21.24	21.38	21.37	22.50
DC-HSDPA	1	21.66	21.74	21.80	22.50
	2	21.67	21.73	21.81	22.50
	3	21.2	21.29	21.38	22.50
	4	21.19	21.28	21.36	22.50

WCDMA1700(ANT13 DSI8/9/10)

Item	band	FDDIV result			
	ARFCN	1513 (1752.6MHz)	1412 (1732.4MHz)	1312 (1712.4MHz)	Tune up
WCDMA	1	16.27	16.25	16.30	17.50
HSUPA	1	13.71	13.96	13.67	14.50
	2	13.72	13.72	13.80	14.50
	3	13.75	13.74	13.83	14.50
	4	13.27	13.23	13.33	14.00
	5	14.6	14.58	14.68	15.50
HSPA+	1	14.72	14.64	14.65	15.50
DC-HSDPA	1	15.13	15.11	15.22	16.50
	2	15.12	15.10	15.21	16.50
	3	14.62	14.60	14.72	16.00
	4	14.63	14.62	14.73	16.00

WCDMA1700(ANT31 DSI2/3)

Item	band	FDDIV result			
	ARFCN	1513 (1752.6MHz)	1412 (1732.4MHz)	1312 (1712.4MHz)	Tune up
WCDMA	1	23.70	23.59	23.68	24.70
HSUPA	1	20.16	20.19	20.16	21.50
	2	20.29	20.31	20.28	21.50
	3	20.31	20.32	20.29	21.50
	4	19.82	19.84	19.79	21.00
	5	21.1	21.08	21.11	22.50
HSPA+	1	21.72	21.71	21.74	23.00
DC-HSDPA	1	22.15	22.10	22.14	23.50
	2	22.13	22.11	22.15	23.50
	3	21.69	21.65	21.69	23.00
	4	21.68	21.66	21.68	23.00

WCDMA1700(ANT31 DSI4)

Item	band	FDDIV result			
	ARFCN	1513 (1752.6MHz)	1412 (1732.4MHz)	1312 (1712.4MHz)	Tune up
WCDMA	1	20.28	20.18	20.22	21.20
HSUPA	1	17.94	17.50	17.53	18.50
	2	17.69	17.64	17.69	18.50
	3	17.72	17.67	17.70	18.50
	4	17.22	17.17	17.19	18.00
	5	18.66	18.67	18.67	19.50
HSPA+	1	18.81	18.66	18.70	19.50
DC-HSDPA	1	19.24	19.14	19.21	20.50
	2	19.22	18.13	19.20	20.50
	3	18.81	18.72	18.80	20.00
	4	18.8	18.71	18.78	20.00

WCDMA1700(ANT31 DSI8/9/10)

Item	band	FDDIV result			
	ARFCN	1513 (1752.6MHz)	1412 (1732.4MHz)	1312 (1712.4MHz)	Tune up
WCDMA	1	19.21	19.16	19.18	20.20
HSUPA	1	16.53	16.47	16.50	17.20
	2	16.65	16.61	16.65	17.20
	3	16.68	16.62	16.66	17.20
	4	16.17	16.11	16.16	17.20
	5	17.66	17.64	17.65	18.20
HSPA+	1	17.65	17.71	17.77	18.20
DC-HSDPA	1	18.21	18.10	18.14	19.20
	2	18.2	18.10	18.12	19.20
	3	17.72	17.60	17.62	18.20
	4	17.7	17.58	17.61	18.20

WCDMA850(ANT13 DSI2/3)

Item	band	FDDV result			
	ARFCN	4233 (846.6MHz)	4183 (836.6MHz)	4132 (826.4MHz)	Tune up
WCDMA	\	18.67	18.81	18.92	20.00
HSUPA	1	15.42	15.39	15.55	16.50
	2	14.9	14.88	15.04	15.50
	3	15.43	15.56	15.69	16.50
	4	14.99	15.05	15.19	16.00
	5	16.53	16.51	16.72	17.50
HSPA+	1	17.02	17.00	17.19	18.00
DC-HSDPA	1	17.51	17.49	17.65	18.50
	2	17.52	17.50	17.64	18.50
	3	17.05	17.02	17.17	18.00
	4	17.04	17.03	17.15	18.00

WCDMA850(ANT13 DSI4/8/9/10)

Item	band	FDDV result			
	ARFCN	4233 (846.6MHz)	4183 (836.6MHz)	4132 (826.4MHz)	Tune up
WCDMA	\	23.20	23.38	23.52	25.00
HSUPA	1	19.72	19.85	19.95	21.50
	2	19.82	19.94	20.01	21.50
	3	19.85	19.83	20.02	21.50
	4	19.36	19.34	19.52	21.00
	5	20.62	20.75	20.82	22.50
HSPA+	1	21.17	21.35	21.44	23.00
DC-HSDPA	1	21.6	21.78	21.79	23.00
	2	21.62	21.78	21.80	23.00
	3	21.16	21.35	21.38	23.00
	4	21.15	21.34	21.37	23.00

WCDMA850(ANT41 DSI2/3/4/8/9/10)

Item	band	FDDV result			
	ARFCN	4233 (846.6MHz)	4183 (836.6MHz)	4132 (826.4MHz)	Tune up
WCDMA	\	23.61	23.72	23.82	25.00
HSUPA	1	20.18	20.29	20.37	21.50
	2	20.29	20.39	20.46	21.50
	3	20.3	20.40	20.45	21.50
	4	19.78	19.87	19.95	21.00
	5	21.15	21.24	21.30	22.00
HSPA+	1	21.77	21.85	21.93	23.00
DC-HSDPA	1	22.25	22.33	22.39	23.50
	2	22.23	22.31	22.37	23.50
	3	21.8	21.91	21.98	23.00
	4	21.77	21.89	21.95	23.00

11.3 CDMA Measurement result

CDMA BC0(ANT13 DSI2/3)

CDMA BC0	Conducted Power (dBm)			Tune up
	777 (848.31MHz)	384 (836.52MHz)	1013 (824.7MHz)	
SO55/RC3	18.40	18.46	18.36	19.5
SO55/RC1	18.42	18.40	18.39	19.5
SO32/RC3(FCH only)	18.41	18.42	18.34	19.5
SO32/RC3(FCH+SCH _n)	17.45	17.47	17.41	19.5
EVDO Rev.0	18.34	18.42	18.32	19.5
EVDO Rev.A	18.37	18.45	18.35	19.5

CDMA BC0(ANT13 DSI4/8/9/10)

CDMA BC0	Conducted Power (dBm)			Tune up
	777 (848.31MHz)	384 (836.52MHz)	1013 (824.7MHz)	
SO55/RC3	19.91	19.98	19.92	21
SO55/RC1	19.86	19.91	19.87	21
SO32/RC3(FCH only)	19.87	19.94	19.83	21
SO32/RC3(FCH+SCH _n)	18.90	18.93	18.86	21
EVDO Rev.0	19.89	19.87	19.87	21
EVDO Rev.A	19.92	19.95	19.95	21

CDMA BC0(ANT41 DSI2/3/4/8/9/10)

CDMA BC0	Conducted Power (dBm)			Tune up
	777 (848.31MHz)	384 (836.52MHz)	1013 (824.7MHz)	
SO55/RC3	19.95	19.98	19.87	21
SO55/RC1	19.91	19.93	19.80	21
SO32/RC3(FCH only)	19.95	19.92	19.87	21
SO32/RC3(FCH+SCH _n)	18.99	18.95	18.94	21
EVDO Rev.0	20.03	20.00	20.04	21
EVDO Rev.A	20.04	20.02	20.02	21

11.4 LTE Measurement result

The maximum output power(Tune-up Limit)=Target power+ Uncertainty

Mode/Band	ANT	Target power							Uncertainty (dB)
		DSI2 (dBm)	DSI3 (dBm)	DSI4 (dBm)	DSI5 (dBm)	DSI8 (dBm)	DSI9 (dBm)	DSI10 (dBm)	
LTE2	Ant.13	14.5	14.5	22.0	18.0	17.5	17.5	17.5	±1
LTE4	Ant.13	15.5	15.5	23.0	18.5	17.5	17.5	17.5	±1
LTE5	Ant.13	19.0	19.0	23.5	23.5	23.5	23.5	23.5	±1
LTE7	Ant.13	15.0	15.0	22.5	18.0	17.0	17.0	17.0	±1
LTE12	Ant.13	20.5	20.5	23.5	23.5	23.5	23.5	23.5	±1
LTE38	Ant.13	18.0	18.0	23.0	20.5	19.5	19.5	19.5	±1
LTE41	Ant.13	16.5	16.5	23.0	21.0	20.0	20.0	20.0	±1
LTE2	Ant.31	23.8	23.8	22.3	22.3	20.8	20.8	20.8	±1
LTE4	Ant.31	23.8	23.8	20.8	20.8	19.8	19.8	19.8	±1
LTE5	Ant.41	23.5	23.5	23.5	23.5	23.5	23.5	23.5	±1
LTE7	Ant.31	23.0	23.0	21.0	21.0	19.0	19.0	19.0	±1
LTE12	Ant.41	23.5	23.5	23.5	23.5	23.5	23.5	23.5	±1
LTE38	Ant.31	23.0	23.0	20.5	20.5	18.5	18.5	18.5	±1
LTE41	Ant.31	23.0	23.0	23.0	23.0	23.0	23.0	23.0	±1

LTE Band2(ANT13 DSI2/3)

Band 2					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	1909.3	14.56	14.96	14.78
		1880	14.48	14.76	14.67
		1850.7	14.45	14.63	14.61
	1RB-Middle	1909.3	14.57	14.95	14.78
		1880	14.48	14.76	14.67
		1850.7	14.46	14.69	14.58
	1RB-Low	1909.3	14.55	14.89	14.74
		1880	14.49	14.76	14.66
		1850.7	14.43	14.73	14.55
	3RB-High	1909.3	14.61	14.63	14.69
		1880	14.50	14.54	14.61
		1850.7	14.49	14.55	14.57
	3RB-Middle	1909.3	14.58	14.62	14.71
		1880	14.50	14.51	14.57
		1850.7	14.48	14.54	14.54
	3RB-Low	1909.3	14.62	14.58	14.75
		1880	14.49	14.57	14.56
		1850.7	14.48	14.55	14.58
	6RB	1909.3	14.60	14.65	14.59
		1880	14.50	14.61	14.50
		1850.7	14.47	14.59	14.48
3MHz	1RB-High	1908.5	14.58	14.83	14.75
		1880	14.49	14.78	14.68

	1RB-Middle	1851.5	14.45	14.64	14.60
		1908.5	14.53	14.77	14.68
		1880	14.52	14.68	14.64
	1RB-Low	1851.5	14.47	14.73	14.64
		1908.5	14.51	14.80	14.70
		1880	14.47	14.76	14.70
	8RB-High	1851.5	14.44	14.78	14.64
		1908.5	14.58	14.68	14.66
		1880	14.49	14.60	14.54
	8RB-Middle	1851.5	14.46	14.52	14.52
		1908.5	14.56	14.65	14.59
		1880	14.46	14.58	14.50
	8RB-Low	1851.5	14.45	14.57	14.52
		1908.5	14.55	14.66	14.66
		1880	14.50	14.57	14.56
	15RB	1851.5	14.47	14.55	14.53
		1908.5	14.52	14.62	14.60
		1880	14.47	14.50	14.50
5MHz	1RB-High	1851.5	14.45	14.50	14.44
		1907.5	14.52	14.62	14.60
		1880	14.47	14.50	14.50
	1RB-Middle	1907.5	14.63	14.90	14.74
		1880	14.50	14.68	14.68
		1852.5	14.45	14.69	14.57
	1RB-Low	1907.5	14.60	14.78	14.78
		1880	14.56	14.70	14.64
		1852.5	14.47	14.76	14.67
	12RB-High	1907.5	14.53	14.74	14.68
		1880	14.53	14.74	14.68
		1852.5	14.50	14.75	14.63
	12RB-Middle	1907.5	14.54	14.55	14.60
		1880	14.48	14.50	14.51
		1852.5	14.48	14.47	14.49
	12RB-Low	1907.5	14.58	14.61	14.66
		1880	14.52	14.51	14.58
		1852.5	14.44	14.48	14.50
	25RB	1907.5	14.61	14.65	14.64
		1880	14.52	14.56	14.61
		1852.5	14.51	14.54	14.57
10MHz	1RB-High	1907.5	14.58	14.63	14.65
		1880	14.55	14.55	14.56
		1852.5	14.50	14.53	14.49
	1RB-Middle	1905	14.58	14.88	14.73
		1880	14.52	14.68	14.76
		1855	14.40	14.69	14.55
	1RB-Low	1905	14.54	14.88	14.69
		1880	14.53	14.72	14.75
		1855	14.46	14.72	14.67
	25RB-High	1905	14.46	14.66	14.58
		1880	14.50	14.64	14.67
		1855	14.46	14.64	14.62
	25RB-Middle	1905	14.55	14.51	14.55
		1880	14.51	14.54	14.49
		1855	14.49	14.50	14.48
	25RB-Low	1905	14.55	14.59	14.56
		1880	14.53	14.56	14.56
		1855	14.52	14.50	14.52

	25RB-Low	1905	14.51	14.63	14.60
		1880	14.52	14.54	14.54
		1855	14.47	14.53	14.50
	50RB	1905	14.59	14.60	14.59
		1880	14.53	14.52	14.50
		1855	14.55	14.55	14.48
15MHz	1RB-High	1902.5	14.52	14.84	14.71
		1880	14.44	14.74	14.63
		1857.5	14.36	14.67	14.48
	1RB-Middle	1902.5	14.49	14.82	14.66
		1880	14.49	14.71	14.71
		1857.5	14.46	14.80	14.60
	1RB-Low	1902.5	14.44	14.68	14.64
		1880	14.38	14.77	14.59
		1857.5	14.41	14.66	14.53
	36RB-High	1902.5	14.54	14.53	14.55
		1880	14.45	14.52	14.49
		1857.5	14.46	14.49	14.47
	36RB-Middle	1902.5	14.46	14.55	14.53
		1880	14.51	14.51	14.54
		1857.5	14.47	14.45	14.48
	36RB-Low	1902.5	14.53	14.48	14.52
		1880	14.51	14.50	14.47
		1857.5	14.45	14.49	14.49
	75RB	1902.5	14.54	14.53	14.48
		1880	14.53	14.50	14.50
		1857.5	14.48	14.44	14.45
20MHz	1RB-High	1900	14.43	14.69	14.63
		1880	14.34	14.62	14.49
		1860	14.30	14.57	14.50
	1RB-Middle	1900	14.40	14.68	14.51
		1880	14.40	14.75	14.55
		1860	14.46	14.76	14.65
	1RB-Low	1900	14.30	14.64	14.43
		1880	14.30	14.62	14.49
		1860	14.39	14.56	14.57
	50RB-High	1900	14.42	14.40	14.41
		1880	14.34	14.38	14.35
		1860	14.52	14.46	14.45
	50RB-Middle	1900	14.35	14.38	14.42
		1880	14.42	14.43	14.43
		1860	14.44	14.41	14.44
	50RB-Low	1900	14.42	14.42	14.39
		1880	14.41	14.48	14.45
		1860	14.45	14.41	14.43
	100RB	1900	14.40	14.33	14.36
		1880	14.39	14.38	14.40
		1860	14.41	14.45	14.41

LTE Band2(ANT13 DSI4)

Band 2					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
	1RB-High	1909.3	22.09	21.03	21.84

		1880	22.05	21.43	21.60
		1850.7	21.90	21.31	20.35
		1909.3	22.06	21.24	20.24
	1RB-Middle	1880	22.03	21.42	21.62
		1850.7	21.84	22.43	20.38
		1909.3	22.06	21.20	21.85
	1RB-Low	1880	21.99	21.47	21.61
		1850.7	21.89	22.50	20.47
		1909.3	22.05	22.45	21.72
	3RB-High	1880	22.00	21.15	20.17
		1850.7	21.92	21.13	20.38
		1909.3	22.06	21.02	21.80
	3RB-Middle	1880	21.96	22.58	20.22
		1850.7	21.95	21.09	20.34
		1909.3	22.04	22.45	21.79
	3RB-Low	1880	22.08	22.49	20.22
		1850.7	21.92	21.04	21.60
		1909.3	22.04	20.17	20.61
3MHz	1RB-High	1880	22.10	21.58	20.34
		1850.7	21.91	20.39	20.43
		1908.5	22.18	22.40	21.36
	1RB-Middle	1880	22.09	22.38	21.24
		1851.5	22.15	22.15	21.35
		1908.5	22.16	22.31	21.44
	1RB-Low	1880	22.31	22.45	21.31
		1851.5	22.15	22.35	21.31
		1908.5	22.12	22.20	21.29
	8RB-High	1880	22.19	22.34	21.36
		1851.5	22.14	22.27	21.24
		1908.5	22.05	21.19	20.23
	8RB-Middle	1880	22.14	21.06	20.26
		1851.5	22.24	21.24	20.15
		1908.5	22.11	21.24	20.21
	8RB-Low	1880	22.25	21.15	20.31
		1851.5	22.19	21.19	20.18
		1908.5	22.13	21.28	20.25
5MHz	1RB-High	1880	22.32	21.22	20.42
		1851.5	22.10	21.12	20.13
		1908.5	22.07	21.27	20.21
	1RB-Middle	1880	22.23	21.11	20.27
		1851.5	22.18	21.17	20.18
		1907.5	22.09	22.27	21.17
	1RB-Low	1880	22.08	22.25	21.05
		1852.5	21.94	22.02	21.16
		1907.5	22.06	22.18	21.25
	12RB-High	1880	22.14	22.32	21.12
		1852.5	21.92	22.22	21.12
		1907.5	22.00	22.07	21.10
	12RB-Middle	1880	22.13	22.21	21.17
		1852.5	21.92	22.14	21.05
		1907.5	21.99	21.07	20.05
	12RB-Low	1880	22.05	20.94	20.08
		1852.5	21.98	21.12	19.97
		1907.5	22.02	21.12	20.03
	12RB-High	1880	22.10	21.03	20.13
		1852.5	21.92	21.03	20.13
		1907.5	22.02	21.12	20.03

	12RB-Low	1852.5	21.96	21.07	20.00
		1907.5	22.05	21.16	20.07
		1880	22.20	21.10	20.24
		1852.5	21.94	21.00	19.95
	25RB	1907.5	22.09	21.15	20.03
		1880	22.11	20.99	20.09
		1852.5	22.03	21.05	20.00
10MHz	1RB-High	1905	22.12	22.38	21.33
		1880	22.11	22.36	21.21
		1855	21.97	22.13	21.32
	1RB-Middle	1905	22.09	22.29	21.41
		1880	22.17	22.43	21.28
		1855	21.95	22.33	21.28
	1RB-Low	1905	22.03	22.18	21.26
		1880	22.16	22.32	21.33
		1855	21.95	22.25	21.21
	25RB-High	1905	22.02	21.17	20.20
		1880	22.08	21.04	20.23
		1855	22.01	21.22	20.12
	25RB-Middle	1905	22.05	21.22	20.18
		1880	22.13	21.13	20.28
		1855	21.99	21.17	20.15
	25RB-Low	1905	22.08	21.26	20.22
		1880	22.23	21.20	20.39
		1855	21.97	21.10	20.10
	50RB	1905	22.12	21.25	20.18
		1880	22.14	21.09	20.24
		1855	22.06	21.15	20.15
15MHz	1RB-High	1902.5	21.94	22.30	21.40
		1880	22.00	22.29	21.06
		1857.5	21.90	22.27	21.22
	1RB-Middle	1902.5	22.03	22.33	21.30
		1880	22.15	22.36	21.23
		1857.5	21.97	22.33	21.34
	1RB-Low	1902.5	21.95	22.32	21.29
		1880	22.04	22.37	21.08
		1857.5	21.90	22.18	21.21
	36RB-High	1902.5	22.01	21.20	20.22
		1880	22.05	21.04	20.25
		1857.5	21.98	21.17	20.12
	36RB-Middle	1902.5	22.04	21.21	20.18
		1880	22.10	21.05	20.28
		1857.5	21.96	21.16	20.14
	36RB-Low	1902.5	21.97	21.14	20.19
		1880	22.12	21.13	20.28
		1857.5	21.94	21.08	20.13
	75RB	1902.5	22.05	21.17	20.19
		1880	22.13	21.08	20.22
		1857.5	22.00	21.12	20.09
20MHz	1RB-High	1900	21.96	22.16	21.25
		1880	21.87	22.08	21.13
		1860	21.93	22.28	21.10
	1RB-Middle	1900	21.94	22.13	21.22
		1880	22.09	22.34	21.19
		1860	21.93	22.17	21.26

	1RB-Low	1900	21.90	22.16	21.17
		1880	21.97	22.35	21.08
		1860	21.92	22.20	21.19
	50RB-High	1900	21.83	21.00	19.99
		1880	21.92	20.91	20.08
		1860	22.02	21.16	20.15
	50RB-Middle	1900	21.89	21.08	20.04
		1880	22.03	21.04	20.17
		1860	21.97	21.09	20.10
	50RB-Low	1900	21.91	21.08	20.04
		1880	22.10	21.08	20.26
		1860	21.88	21.00	19.96
	100RB	1900	21.85	20.98	20.00
		1880	22.01	20.97	20.12
		1860	21.96	21.08	20.11

LTE Band2(ANT13 DSI8/9/10)

Band 2					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	1909.3	17.59	17.94	17.76
		1880	17.52	17.82	17.67
		1850.7	17.44	17.78	17.68
	1RB-Middle	1909.3	17.54	17.92	17.77
		1880	17.54	17.76	17.70
		1850.7	17.44	17.70	17.63
	1RB-Low	1909.3	17.55	17.92	17.64
		1880	17.51	17.80	17.76
		1850.7	17.46	17.83	17.74
	3RB-High	1909.3	17.54	17.56	17.67
		1880	17.52	17.60	17.65
		1850.7	17.48	17.46	17.57
	3RB-Middle	1909.3	17.57	17.62	17.60
		1880	17.54	17.51	17.67
		1850.7	17.49	17.48	17.56
	3RB-Low	1909.3	17.56	17.58	17.70
		1880	17.53	17.55	17.67
		1850.7	17.48	17.54	17.54
	6RB	1909.3	17.55	17.63	17.54
		1880	17.51	17.60	17.47
		1850.7	17.49	17.53	17.49
3MHz	1RB-High	1908.5	17.54	17.74	17.77
		1880	17.51	17.90	17.71
		1851.5	17.46	17.83	17.67
	1RB-Middle	1908.5	17.53	17.75	17.80
		1880	17.59	17.86	17.76
		1851.5	17.45	17.73	17.77
	1RB-Low	1908.5	17.48	17.72	17.62
		1880	17.52	17.88	17.75
		1851.5	17.46	17.68	17.61
	8RB-High	1908.5	17.52	17.66	17.60
		1880	17.51	17.64	17.58
		1851.5	17.47	17.55	17.54
	8RB-Middle	1908.5	17.55	17.64	17.56

		1880	17.50	17.63	17.57
		1851.5	17.49	17.57	17.54
		1908.5	17.55	17.61	17.59
		1880	17.53	17.59	17.63
		1851.5	17.49	17.57	17.55
	8RB-Low	1908.5	17.51	17.54	17.56
		1880	17.49	17.57	17.57
		1851.5	17.44	17.51	17.50
		1907.5	17.60	17.87	17.77
		1880	17.57	17.93	17.76
5MHz	1RB-High	1852.5	17.50	17.83	17.69
		1907.5	17.57	17.75	17.78
		1880	17.60	17.82	17.81
	1RB-Middle	1852.5	17.51	17.83	17.78
		1907.5	17.51	17.86	17.69
		1880	17.58	17.87	17.74
	1RB-Low	1852.5	17.50	17.83	17.70
		1907.5	17.52	17.54	17.56
		1880	17.50	17.55	17.61
	12RB-High	1852.5	17.47	17.43	17.53
		1907.5	17.56	17.56	17.64
		1880	17.54	17.56	17.60
	12RB-Middle	1852.5	17.45	17.50	17.48
		1907.5	17.60	17.62	17.61
		1880	17.61	17.58	17.62
	12RB-Low	1852.5	17.47	17.52	17.58
		1907.5	17.60	17.57	17.57
		1880	17.59	17.64	17.63
	25RB	1852.5	17.52	17.52	17.50
		1905	17.56	17.77	17.80
		1880	17.58	17.94	17.74
10MHz	1RB-High	1855	17.47	17.68	17.67
		1905	17.52	17.87	17.74
		1880	17.60	17.90	17.85
	1RB-Middle	1855	17.49	17.74	17.68
		1905	17.50	17.68	17.61
		1880	17.51	17.78	17.71
	1RB-Low	1855	17.48	17.67	17.66
		1905	17.51	17.50	17.51
		1880	17.55	17.59	17.60
	25RB-High	1855	17.51	17.52	17.49
		1905	17.52	17.57	17.54
		1880	17.52	17.59	17.59
	25RB-Middle	1855	17.51	17.54	17.51
		1905	17.57	17.60	17.57
		1880	17.59	17.63	17.63
	25RB-Low	1855	17.51	17.55	17.56
		1905	17.58	17.60	17.55
		1880	17.57	17.60	17.57
	50RB	1855	17.56	17.55	17.54
15MHz	1RB-High	1902.5	17.52	17.74	17.73
		1880	17.45	17.77	17.69
		1857.5	17.36	17.74	17.63
	1RB-Middle	1902.5	17.51	17.77	17.74
		1880	17.54	17.81	17.80

	1RB-Low	1857.5	17.46	17.74	17.60
		1902.5	17.47	17.79	17.61
		1880	17.42	17.66	17.58
	36RB-High	1857.5	17.41	17.69	17.69
		1902.5	17.46	17.51	17.51
		1880	17.51	17.57	17.56
	36RB-Middle	1857.5	17.43	17.50	17.53
		1902.5	17.48	17.50	17.56
		1880	17.52	17.53	17.60
	36RB-Low	1857.5	17.44	17.48	17.54
		1902.5	17.48	17.51	17.47
		1880	17.50	17.53	17.56
	75RB	1857.5	17.47	17.44	17.47
		1902.5	17.52	17.55	17.50
		1880	17.54	17.58	17.55
20MHz	1RB-High	1857.5	17.47	17.47	17.48
		1900	17.37	17.70	17.52
		1880	17.36	17.71	17.57
	1RB-Middle	1860	17.33	17.67	17.46
		1900	17.36	17.62	17.55
		1880	17.41	17.60	17.63
	1RB-Low	1860	17.48	17.82	17.63
		1900	17.28	17.71	17.41
		1880	17.31	17.57	17.47
	50RB-High	1860	17.37	17.58	17.62
		1900	17.37	17.37	17.39
		1880	17.33	17.35	17.39
	50RB-Middle	1860	17.52	17.48	17.51
		1900	17.40	17.39	17.38
		1880	17.47	17.50	17.48
	50RB-Low	1860	17.41	17.44	17.39
		1900	17.38	17.40	17.42
		1880	17.48	17.49	17.46
	100RB	1860	17.41	17.43	17.41
		1900	17.34	17.31	17.35
		1880	17.43	17.43	17.41
		1860	17.45	17.43	17.43

LTE Band2(ANT31 DSI2/3)

Band 2					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	1909.3	23.60	22.89	21.71
		1880	23.67	22.93	21.86
		1850.7	23.58	22.76	21.89
	1RB-Middle	1909.3	23.58	22.79	21.69
		1880	23.70	23.01	21.81
		1850.7	23.63	22.86	21.94
	1RB-Low	1909.3	23.62	22.88	21.73
		1880	23.69	22.84	21.81
		1850.7	23.62	22.85	21.86
	3RB-High	1909.3	23.60	22.59	21.62
		1880	23.66	22.62	21.66
		1850.7	23.62	22.53	21.85

	3RB-Middle	1909.3	23.59	22.64	21.69
		1880	23.70	22.64	21.70
		1850.7	23.60	22.56	21.86
	3RB-Low	1909.3	23.59	22.55	21.68
		1880	23.66	22.61	21.71
		1850.7	23.63	22.48	21.84
	6RB	1909.3	22.61	21.62	20.68
		1880	22.64	21.73	20.73
		1850.7	22.59	21.81	20.71
3MHz	1RB-High	1908.5	23.60	22.81	21.71
		1880	23.67	22.95	21.82
		1851.5	23.59	22.85	21.90
	1RB-Middle	1908.5	23.60	22.75	21.91
		1880	23.70	22.92	21.86
		1851.5	23.65	22.87	21.86
	1RB-Low	1908.5	23.56	22.72	21.80
		1880	23.71	22.89	21.81
		1851.5	23.60	22.91	21.84
	8RB-High	1908.5	22.58	21.60	20.71
		1880	22.63	21.66	20.73
		1851.5	22.56	21.82	20.74
	8RB-Middle	1908.5	22.57	21.78	20.66
		1880	22.65	21.67	20.76
		1851.5	22.56	21.76	20.69
	8RB-Low	1908.5	22.57	21.79	20.73
		1880	22.64	21.65	20.78
		1851.5	22.59	21.76	20.72
	15RB	1908.5	22.54	21.72	20.64
		1880	22.63	21.61	20.72
		1851.5	22.52	21.75	20.68
5MHz	1RB-High	1907.5	23.65	22.91	21.67
		1880	23.72	22.92	21.82
		1852.5	23.61	22.77	21.89
	1RB-Middle	1907.5	23.68	22.95	21.89
		1880	23.76	22.94	21.86
		1852.5	23.68	22.88	21.92
	1RB-Low	1907.5	23.60	22.83	21.80
		1880	23.74	22.90	21.81
		1852.5	23.63	22.79	21.86
	12RB-High	1907.5	22.56	21.49	20.70
		1880	22.65	21.54	20.80
		1852.5	22.62	21.74	20.69
	12RB-Middle	1907.5	22.61	21.71	20.74
		1880	22.66	21.57	20.79
		1852.5	22.57	21.75	20.70
	12RB-Low	1907.5	22.63	21.76	20.76
		1880	22.67	21.66	20.86
		1852.5	22.56	21.77	20.75
	25RB	1907.5	22.61	21.75	20.73
		1880	22.72	21.67	20.81
		1852.5	22.61	21.72	20.70
10MHz	1RB-High	1905	23.65	22.90	21.72
		1880	23.69	22.87	21.81
		1855	23.58	22.80	21.83
	1RB-Middle	1905	23.66	22.88	21.83

		1880	23.77	22.99	21.81
		1855	23.66	22.86	21.81
		1905	23.59	22.78	21.74
	1RB-Low	1880	23.63	22.95	21.68
		1855	23.65	22.95	21.83
		1905	22.55	21.68	20.68
	25RB-High	1880	22.66	21.65	20.79
		1855	22.62	21.79	20.74
		1905	22.55	21.72	20.66
	25RB-Middle	1880	22.69	21.63	20.75
		1855	22.61	21.77	20.74
		1905	22.61	21.83	20.77
	25RB-Low	1880	22.68	21.67	20.83
		1855	22.57	21.73	20.71
		1905	22.65	21.75	20.75
15MHz	1RB-High	1880	22.68	21.64	20.81
		1855	22.65	21.82	20.76
		1902.5	23.62	22.79	21.68
	1RB-Middle	1880	23.64	22.82	21.64
		1857.5	23.55	22.73	21.75
		1902.5	23.64	22.82	21.85
	1RB-Low	1880	23.75	22.93	21.82
		1857.5	23.67	22.81	21.85
		1902.5	23.63	22.70	21.66
	36RB-High	1880	23.62	22.87	21.64
		1857.5	23.60	22.87	21.84
		1902.5	22.50	21.67	20.57
	36RB-Middle	1880	22.61	21.62	20.75
		1857.5	22.56	21.77	20.73
		1902.5	22.55	21.69	20.65
	36RB-Low	1880	22.68	21.57	20.82
		1857.5	22.59	21.70	20.67
		1902.5	22.61	21.75	20.68
	75RB	1880	22.69	21.65	20.79
		1857.5	22.52	21.67	20.68
		1902.5	22.59	21.73	20.64
20MHz	1RB-High	1880	22.68	21.62	20.70
		1857.5	22.58	21.66	20.67
		1900	23.57	22.81	21.77
	1RB-Middle	1880	23.63	22.93	21.72
		1860	23.57	22.78	21.60
		1900	23.60	22.69	21.81
	1RB-Low	1880	23.82	22.97	21.84
		1860	23.65	22.84	21.88
		1900	23.57	22.82	21.64
	50RB-High	1880	23.57	22.74	21.66
		1860	23.58	22.76	21.83
		1900	22.42	21.52	20.49
	50RB-Middle	1880	22.69	21.60	20.70
		1860	22.66	21.83	20.73
		1900	22.54	21.70	20.65
	50RB-Low	1880	22.73	21.67	20.78
		1860	22.63	21.71	20.70
		1900	22.58	21.68	20.65
		1880	22.78	21.77	20.87

	100RB	1860	22.51	21.65	20.57
		1900	22.46	21.55	20.56
		1880	22.78	21.68	20.77
		1860	22.61	21.70	20.64

LTE Band2(ANT31 DSI4)

Band 2					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	1909.3	20.99	21.38	21.23
		1880	20.98	21.39	21.29
		1850.7	21.03	21.35	21.23
	1RB-Middle	1909.3	21.02	21.31	21.18
		1880	21.06	21.42	21.20
		1850.7	21.02	21.41	21.20
	1RB-Low	1909.3	20.98	21.22	21.21
		1880	21.02	21.33	21.18
		1850.7	21.03	21.42	21.28
	3RB-High	1909.3	20.98	20.95	21.12
		1880	21.05	20.98	21.15
		1850.7	21.08	21.10	21.13
	3RB-Middle	1909.3	20.96	21.04	21.08
		1880	21.09	21.08	21.21
		1850.7	21.07	20.97	21.19
	3RB-Low	1909.3	21.00	21.01	21.05
		1880	21.04	21.05	21.12
		1850.7	21.04	21.01	21.15
	6RB	1909.3	21.01	21.15	20.93
		1880	21.04	21.16	21.05
		1850.7	21.05	21.18	21.05
3MHz	1RB-High	1908.5	21.01	21.23	21.17
		1880	21.02	21.31	21.25
		1851.5	21.08	21.23	21.23
	1RB-Middle	1908.5	20.98	21.19	21.23
		1880	21.06	21.43	21.23
		1851.5	21.07	21.40	21.27
	1RB-Low	1908.5	20.98	21.23	21.20
		1880	21.04	21.26	21.25
		1851.5	21.03	21.23	21.24
	8RB-High	1908.5	20.98	21.03	21.05
		1880	21.00	21.08	21.03
		1851.5	21.02	21.15	21.10
	8RB-Middle	1908.5	21.00	21.06	21.02
		1880	21.03	21.05	21.02
		1851.5	21.03	21.08	21.09
	8RB-Low	1908.5	21.02	21.09	21.08
		1880	21.07	21.11	21.10
		1851.5	21.08	21.09	21.07
	15RB	1908.5	20.99	21.06	21.05
		1880	21.03	21.04	21.06
		1851.5	21.05	21.10	21.10
5MHz	1RB-High	1907.5	21.03	21.37	21.28
		1880	21.06	21.30	21.20
		1852.5	21.10	21.31	21.27

	1RB-Middle	1907.5	21.05	21.39	21.22
		1880	21.04	21.39	21.22
		1852.5	21.11	21.32	21.29
	1RB-Low	1907.5	21.03	21.39	21.24
		1880	21.10	21.44	21.28
		1852.5	21.09	21.30	21.29
	12RB-High	1907.5	20.97	20.99	21.03
		1880	21.04	21.05	21.07
		1852.5	21.07	21.01	21.09
	12RB-Middle	1907.5	21.03	21.07	21.08
		1880	21.09	21.10	21.10
		1852.5	21.05	21.09	21.10
	12RB-Low	1907.5	21.07	21.05	21.07
		1880	21.10	21.08	21.10
		1852.5	21.10	21.10	21.14
	25RB	1907.5	21.07	21.08	21.07
		1880	21.08	21.08	21.09
		1852.5	21.11	21.10	21.08
10MHz	1RB-High	1905	21.01	21.26	21.15
		1880	21.04	21.27	21.22
		1855	21.15	21.50	21.23
	1RB-Middle	1905	21.11	21.31	21.16
		1880	21.09	21.40	21.22
		1855	21.14	21.48	21.21
	1RB-Low	1905	21.03	21.31	21.25
		1880	21.11	21.40	21.22
		1855	21.05	21.29	21.27
	25RB-High	1905	21.04	21.07	21.06
		1880	21.01	21.09	21.05
		1855	21.14	21.20	21.15
	25RB-Middle	1905	21.08	21.10	21.15
		1880	21.01	21.08	21.07
		1855	21.14	21.11	21.12
	25RB-Low	1905	21.08	21.15	21.13
		1880	21.10	21.13	21.12
		1855	21.03	21.03	21.09
	50RB	1905	21.12	21.10	21.11
		1880	21.07	21.08	21.05
		1855	21.12	21.12	21.15
15MHz	1RB-High	1902.5	20.96	21.25	21.16
		1880	21.00	21.19	21.25
		1857.5	20.98	21.31	21.15
	1RB-Middle	1902.5	21.08	21.31	21.21
		1880	21.06	21.29	21.21
		1857.5	21.12	21.45	21.22
	1RB-Low	1902.5	20.95	21.19	21.21
		1880	21.07	21.36	21.24
		1857.5	21.03	21.34	21.21
	36RB-High	1902.5	21.05	21.07	21.11
		1880	21.03	21.06	21.05
		1857.5	21.07	21.07	21.09
	36RB-Middle	1902.5	21.04	21.04	21.04
		1880	21.05	21.05	21.12
		1857.5	21.14	21.15	21.16
	36RB-Low	1902.5	21.06	21.06	21.04

		1880	21.08	21.07	21.05
		1857.5	21.11	21.10	21.11
20MHz	75RB	1902.5	21.09	21.09	21.05
		1880	21.09	21.06	21.02
		1857.5	21.02	21.05	21.06
		1900	21.04	21.23	21.16
		1880	20.90	21.25	21.07
	1RB-High	1860	20.91	21.19	21.07
		1900	21.09	21.34	21.28
		1880	20.99	21.38	21.21
	1RB-Middle	1860	21.07	21.40	21.11
		1900	20.88	21.25	21.07
		1880	21.00	21.27	21.12
	1RB-Low	1860	21.04	21.32	21.24
		1900	21.08	21.10	21.13
		1880	21.03	20.99	21.05
	50RB-High	1860	20.98	21.02	20.94
		1900	21.10	21.06	21.09
		1880	21.01	20.95	20.95
	50RB-Middle	1860	21.05	21.01	21.10
		1900	21.01	21.02	21.04
		1880	20.99	20.95	20.93
	50RB-Low	1860	21.02	21.04	21.04
		1900	21.09	21.00	21.05
		1880	20.98	20.95	20.96
	100RB	1860	20.97	21.00	21.01

LTE Band2(ANT31 DSI8/9/10)

Band 2					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	1909.3	20.76	21.03	20.90
		1880	20.81	21.18	20.98
		1850.7	20.73	21.07	20.93
	1RB-Middle	1909.3	20.77	21.03	20.98
		1880	20.85	21.21	20.94
		1850.7	20.74	21.09	20.88
	1RB-Low	1909.3	20.74	21.06	20.92
		1880	20.86	21.12	20.98
		1850.7	20.73	21.10	20.87
	3RB-High	1909.3	20.71	20.72	20.87
		1880	20.82	20.84	20.93
		1850.7	20.77	20.69	20.85
	3RB-Middle	1909.3	20.72	20.71	20.86
		1880	20.84	20.87	20.97
		1850.7	20.77	20.67	20.91
	3RB-Low	1909.3	20.76	20.69	20.86
		1880	20.82	20.82	20.93
		1850.7	20.80	20.78	20.87
	6RB	1909.3	20.78	20.86	20.69

		1880	20.83	20.92	20.79
		1850.7	20.77	20.86	20.75
3MHz	1RB-High	1908.5	20.76	21.01	20.98
		1880	20.86	21.15	21.04
		1851.5	20.79	21.13	20.85
		1908.5	20.70	21.05	21.02
	1RB-Middle	1880	20.82	21.23	21.06
		1851.5	20.74	21.01	20.89
		1908.5	20.71	21.07	20.88
		1880	20.81	21.07	21.00
	1RB-Low	1851.5	20.73	21.08	20.99
		1908.5	20.74	20.84	20.75
		1880	20.81	20.89	20.89
		1851.5	20.75	20.80	20.79
	8RB-High	1908.5	20.73	20.80	20.73
		1880	20.83	20.87	20.88
		1851.5	20.73	20.79	20.78
		1908.5	20.76	20.82	20.78
	8RB-Middle	1880	20.85	20.90	20.87
		1851.5	20.77	20.87	20.78
		1908.5	20.71	20.76	20.74
		1880	20.80	20.84	20.83
	8RB-Low	1851.5	20.77	20.79	20.79
		1908.5	20.78	20.76	20.74
		1880	20.80	20.84	20.83
		1851.5	20.77	20.79	20.79
5MHz	1RB-High	1907.5	20.78	21.16	20.95
		1880	20.89	21.21	21.14
		1852.5	20.80	20.96	21.03
		1907.5	20.77	21.02	20.95
	1RB-Middle	1880	20.89	21.14	21.06
		1852.5	20.81	21.03	21.06
		1907.5	20.75	21.05	20.88
		1880	20.88	21.10	21.00
	1RB-Low	1852.5	20.81	21.12	21.03
		1907.5	20.70	20.71	20.77
		1880	20.86	20.86	20.84
		1852.5	20.79	20.78	20.78
	12RB-High	1907.5	20.75	20.75	20.81
		1880	20.86	20.87	20.91
		1852.5	20.78	20.73	20.79
		1907.5	20.80	20.83	20.83
	12RB-Middle	1880	20.88	20.91	20.95
		1852.5	20.74	20.81	20.85
		1907.5	20.75	20.77	20.83
		1880	20.86	20.88	20.92
	12RB-Low	1852.5	20.78	20.80	20.79
		1907.5	20.73	21.14	20.91
		1880	20.86	21.02	20.96
		1855	20.73	20.87	20.92
10MHz	1RB-High	1905	20.77	20.97	20.88
		1880	20.90	21.23	21.03
		1855	20.77	21.14	20.96
		1905	20.73	21.03	20.83
	1RB-Middle	1880	20.81	21.09	20.95
		1855	20.77	21.10	20.97
		1905	20.72	20.68	20.69
		1880	20.87	20.85	20.84
	1RB-Low				
	25RB-High				

	25RB-Middle	1855	20.78	20.86	20.83
		1905	20.77	20.75	20.73
		1880	20.89	20.90	20.87
		1855	20.78	20.79	20.79
	25RB-Low	1905	20.86	20.88	20.85
		1880	20.85	20.91	20.89
		1855	20.74	20.74	20.74
	50RB	1905	20.79	20.84	20.80
		1880	20.84	20.84	20.86
		1855	20.83	20.79	20.82
	1RB-High	1902.5	20.68	21.05	20.89
		1880	20.74	21.14	20.99
		1857.5	20.66	21.03	20.89
15MHz	1RB-Middle	1902.5	20.69	20.96	20.84
		1880	20.87	21.22	21.03
		1857.5	20.74	21.13	20.90
	1RB-Low	1902.5	20.67	21.03	20.90
		1880	20.71	21.07	21.00
		1857.5	20.67	21.02	20.85
	36RB-High	1902.5	20.65	20.66	20.67
		1880	20.77	20.86	20.88
		1857.5	20.71	20.80	20.80
	36RB-Middle	1902.5	20.68	20.70	20.72
		1880	20.85	20.84	20.91
		1857.5	20.70	20.72	20.76
	36RB-Low	1902.5	20.71	20.77	20.75
		1880	20.78	20.81	20.86
		1857.5	20.67	20.71	20.73
	75RB	1902.5	20.73	20.71	20.72
		1880	20.80	20.82	20.78
		1857.5	20.76	20.75	20.74
	1RB-High	1900	20.70	21.04	20.82
		1880	20.70	21.10	20.81
		1860	20.65	20.94	20.87
	1RB-Middle	1900	20.72	20.89	20.77
		1880	20.87	21.14	20.98
		1860	20.75	21.14	20.84
	1RB-Low	1900	20.63	21.10	20.85
		1880	20.69	21.02	20.83
		1860	20.70	21.00	20.87
	50RB-High	1900	20.55	20.56	20.53
		1880	20.77	20.78	20.76
		1860	20.81	20.77	20.81
20MHz	50RB-Middle	1900	20.69	20.66	20.68
		1880	20.84	20.86	20.81
		1860	20.78	20.72	20.75
	50RB-Low	1900	20.71	20.68	20.69
		1880	20.91	20.97	20.94
		1860	20.71	20.66	20.67
	100RB	1900	20.58	20.55	20.56
		1880	20.86	20.87	20.81
		1860	20.71	20.71	20.68

LTE Band4(ANT13 DSI2/3)

Band 4					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4 MHz	1RB_High	1754.3	15.21	15.47	15.47
		1732.5	15.34	15.73	15.56
		1710.7	15.48	15.73	15.71
	1RB_Middle	1754.3	15.20	15.49	15.53
		1732.5	15.38	15.78	15.56
		1710.7	15.50	15.80	15.63
	1RB_Low	1754.3	15.19	15.63	15.45
		1732.5	15.35	15.65	15.52
		1710.7	15.51	15.82	15.70
	3RB_High	1754.3	15.22	15.21	15.27
		1732.5	15.35	15.36	15.46
		1710.7	15.56	15.49	15.60
	3RB_Middle	1754.3	15.19	15.24	15.36
		1732.5	15.36	15.34	15.53
		1710.7	15.52	15.52	15.63
	3RB_Low	1754.3	15.21	15.26	15.36
		1732.5	15.41	15.43	15.46
		1710.7	15.52	15.45	15.65
	6RB	1754.3	15.22	15.34	15.17
		1732.5	15.40	15.46	15.38
		1710.7	15.54	15.62	15.52
3 MHz	1RB_High	1753.5	15.17	15.52	15.40
		1732.5	15.35	15.58	15.52
		1711.5	15.55	15.76	15.74
	1RB_Middle	1753.5	15.20	15.70	15.45
		1732.5	15.29	15.77	15.58
		1711.5	15.51	15.87	15.73
	1RB_Low	1753.5	15.19	15.52	15.52
		1732.5	15.39	15.76	15.60
		1711.5	15.47	15.81	15.63
	8RB_High	1753.5	15.22	15.31	15.31
		1732.5	15.34	15.48	15.41
		1711.5	15.53	15.57	15.52
	8RB_Middle	1753.5	15.26	15.34	15.32
		1732.5	15.36	15.46	15.43
		1711.5	15.52	15.61	15.57
	8RB_Low	1753.5	15.23	15.36	15.30
		1732.5	15.37	15.50	15.49
		1711.5	15.51	15.60	15.57
	15RB	1753.5	15.23	15.33	15.26
		1732.5	15.34	15.43	15.40
		1711.5	15.51	15.53	15.52
5 MHz	1RB_High	1752.5	15.27	15.68	15.48
		1732.5	15.37	15.77	15.55
		1712.5	15.58	15.94	15.74
	1RB_Middle	1752.5	15.31	15.48	15.44
		1732.5	15.43	15.72	15.66
		1712.5	15.63	15.92	15.70
	1RB_Low	1752.5	15.28	15.60	15.45
		1732.5	15.45	15.84	15.65
		1712.5	15.57	15.78	15.68

	12RB_High	1752.5	15.28	15.27	15.30
		1732.5	15.35	15.37	15.38
		1712.5	15.54	15.52	15.50
	12RB_Middle	1752.5	15.28	15.27	15.26
		1732.5	15.43	15.40	15.46
		1712.5	15.53	15.53	15.56
	12RB_Low	1752.5	15.30	15.26	15.29
		1732.5	15.42	15.47	15.50
		1712.5	15.57	15.59	15.63
	25RB	1752.5	15.26	15.30	15.29
		1732.5	15.36	15.41	15.43
		1712.5	15.56	15.56	15.55
10MHz	1RB_High	1750	15.36	15.52	15.46
		1732.5	15.32	15.61	15.54
		1715	15.61	15.85	15.76
	1RB_Middle	1750	15.33	15.69	15.49
		1732.5	15.43	15.74	15.54
		1715	15.55	15.95	15.66
	1RB_Low	1750	15.36	15.59	15.44
		1732.5	15.49	15.84	15.60
		1715	15.53	15.88	15.73
	25RB_High	1750	15.33	15.30	15.34
		1732.5	15.32	15.35	15.35
		1715	15.59	15.58	15.63
	25RB_Middle	1750	15.33	15.35	15.37
		1732.5	15.37	15.44	15.39
		1715	15.56	15.55	15.55
	25RB_Low	1750	15.40	15.31	15.37
		1732.5	15.45	15.43	15.44
		1715	15.55	15.58	15.58
	50RB	1750	15.36	15.32	15.35
		1732.5	15.35	15.39	15.41
		1715	15.60	15.61	15.60
15MHz	1RB_High	1747.5	15.14	15.59	15.43
		1732.5	15.25	15.61	15.40
		1717.5	15.41	15.80	15.66
	1RB_Middle	1747.5	15.25	15.60	15.44
		1732.5	15.37	15.65	15.65
		1717.5	15.52	15.84	15.81
	1RB_Low	1747.5	15.23	15.49	15.40
		1732.5	15.44	15.74	15.64
		1717.5	15.47	15.73	15.70
	36RB_High	1747.5	15.26	15.28	15.35
		1732.5	15.29	15.32	15.38
		1717.5	15.55	15.58	15.59
	36RB_Middle	1747.5	15.28	15.33	15.36
		1732.5	15.38	15.41	15.43
		1717.5	15.57	15.57	15.60
	36RB_Low	1747.5	15.25	15.34	15.36
		1732.5	15.41	15.43	15.42
		1717.5	15.56	15.52	15.60
	75RB	1747.5	15.28	15.34	15.31
		1732.5	15.38	15.38	15.34
		1717.5	15.53	15.52	15.51
20MHz	1RB_High	1745	15.43	15.82	15.58

	1RB_Middle	1732.5	15.34	15.65	15.58
		1720	15.41	15.78	15.53
		1745	15.53	15.74	15.61
	1RB_Low	1732.5	15.51	15.64	15.66
		1720	15.57	15.87	15.83
		1745	15.34	15.67	15.50
	50RB_High	1732.5	15.50	15.90	15.73
		1720	15.62	15.96	15.79
		1745	15.45	15.47	15.47
	50RB_Middle	1732.5	15.37	15.39	15.44
		1720	15.59	15.60	15.58
		1745	15.49	15.47	15.50
	50RB_Low	1732.5	15.46	15.47	15.51
		1720	15.60	15.59	15.61
		1745	15.48	15.56	15.55
	100RB	1732.5	15.42	15.40	15.40
		1720	15.61	15.61	15.54
		1745	15.51	15.51	15.51

LTE Band4(ANT13 DSI4)

Band 4					
Bandwidth (MHz)	RB allocation RB offset	Frequency (MHz)	Actual output power (dBm)		
			QPSK	16QAM	64QAM
1.4 MHz	1RB_High	1754.3	22.85	22.08	21.13
		1732.5	22.93	22.12	21.27
		1710.7	23.08	22.30	21.35
	1RB_Middle	1754.3	22.82	22.04	21.06
		1732.5	22.94	22.19	21.22
		1710.7	23.12	22.22	21.33
	1RB_Low	1754.3	22.85	22.06	21.22
		1732.5	22.95	22.12	21.19
		1710.7	23.09	22.28	21.38
	3RB_High	1754.3	22.81	21.74	21.08
		1732.5	22.95	21.95	21.11
		1710.7	23.09	22.11	21.28
	3RB_Middle	1754.3	22.83	21.77	21.03
		1732.5	22.97	21.98	21.15
		1710.7	23.10	22.07	21.30
	3RB_Low	1754.3	22.83	21.85	21.04
		1732.5	22.97	21.98	21.14
		1710.7	23.11	22.03	21.29
	6RB	1754.3	21.80	21.05	19.87
		1732.5	21.96	21.18	20.03
		1710.7	22.10	21.29	20.17
3 MHz	1RB_High	1753.5	22.83	22.11	21.10
		1732.5	22.92	22.07	21.21
		1711.5	23.07	22.25	21.40
	1RB_Middle	1753.5	22.87	22.03	21.15
		1732.5	22.96	22.11	21.20
		1711.5	23.17	22.31	21.42
	1RB_Low	1753.5	22.81	22.01	21.12
		1732.5	22.96	22.07	21.19

	8RB_High	1711.5	23.10	22.19	21.36
		1753.5	21.72	20.99	19.91
		1732.5	21.86	21.07	20.01
	8RB_Middle	1711.5	22.01	21.26	20.22
		1753.5	21.81	21.04	19.96
		1732.5	21.88	21.07	20.03
	8RB_Low	1711.5	22.04	21.31	20.21
		1753.5	21.80	21.02	19.97
		1732.5	21.93	21.17	20.13
	15RB	1711.5	22.03	21.28	20.18
		1753.5	21.75	20.96	19.94
		1732.5	21.87	21.07	20.03
5 MHz	1RB_High	1711.5	22.03	21.25	20.16
		1752.5	22.80	22.10	21.10
		1732.5	22.88	22.13	21.10
	1RB_Middle	1712.5	23.03	22.22	21.34
		1752.5	22.75	22.04	21.12
		1732.5	22.89	22.08	21.20
	1RB_Low	1712.5	23.05	22.19	21.40
		1752.5	22.72	22.08	21.07
		1732.5	22.90	22.23	21.25
	12RB_High	1712.5	23.01	22.31	21.34
		1752.5	21.70	20.98	19.90
		1732.5	21.83	21.09	20.01
	12RB_Middle	1712.5	21.92	21.20	20.17
		1752.5	21.73	21.02	19.85
		1732.5	21.85	21.11	20.05
	12RB_Low	1712.5	21.92	21.20	20.18
		1752.5	21.73	20.98	19.92
		1732.5	21.85	21.17	20.09
	25RB	1712.5	21.97	21.28	20.24
		1752.5	21.70	21.03	19.91
		1732.5	21.85	21.17	20.04
10MHz	1RB_High	1712.5	21.96	21.25	20.20
		1750	22.85	21.95	21.09
		1732.5	22.91	21.98	21.16
	1RB_Middle	1715	23.17	22.35	21.48
		1750	22.94	22.06	21.29
		1732.5	23.03	22.10	21.38
	1RB_Low	1715	23.15	22.32	21.44
		1750	22.87	22.00	21.26
		1732.5	22.99	22.28	21.29
	25RB_High	1715	23.12	22.16	21.39
		1750	21.89	21.04	19.89
		1732.5	21.85	21.07	19.92
	25RB_Middle	1715	22.16	21.26	20.14
		1750	21.86	21.03	19.89
		1732.5	21.92	21.09	19.96
	25RB_Low	1715	22.10	21.24	20.10
		1750	21.83	21.05	19.85
		1732.5	22.01	21.16	19.98
	50RB	1715	22.10	21.26	20.12
		1750	21.91	21.08	19.87
		1732.5	21.91	21.05	19.93
		1715	22.14	21.23	20.11

15MHz	1RB_High	1747.5	22.79	22.09	21.07
		1732.5	22.83	22.04	21.04
		1717.5	22.96	22.24	21.16
	1RB_Middle	1747.5	22.90	22.14	21.21
		1732.5	22.98	22.14	21.28
		1717.5	23.12	22.32	21.37
	1RB_Low	1747.5	22.81	22.00	21.06
		1732.5	23.03	22.22	21.22
		1717.5	23.05	22.25	21.27
	36RB_High	1747.5	21.81	21.01	20.01
		1732.5	21.87	20.98	20.05
		1717.5	22.05	21.24	20.24
	36RB_Middle	1747.5	21.81	21.00	19.98
		1732.5	21.92	21.10	20.13
		1717.5	22.08	21.22	20.26
	36RB_Low	1747.5	21.86	20.99	19.99
		1732.5	21.94	21.07	20.12
		1717.5	22.10	21.23	20.20
20MHz	1RB_High	1747.5	21.88	20.97	20.01
		1732.5	21.91	21.00	19.98
		1717.5	22.07	21.16	20.16
	1RB_Middle	1745	23.01	22.21	21.26
		1732.5	22.92	22.15	21.16
		1720	22.95	22.26	21.24
	1RB_Low	1745	23.13	22.33	21.31
		1732.5	23.12	22.24	21.22
		1720	23.21	22.38	21.33
	50RB_High	1745	22.87	22.05	21.08
		1732.5	23.08	22.20	21.33
		1720	23.20	22.24	21.42
	50RB_Middle	1745	22.08	21.20	20.17
		1732.5	21.95	21.08	20.04
		1720	22.12	21.21	20.22
	50RB_Low	1745	22.05	21.18	20.19
		1732.5	22.00	21.08	20.14
		1720	22.16	21.26	20.23
	100RB	1745	22.08	21.19	20.19
		1732.5	21.98	21.10	20.04
		1720	22.13	21.23	20.26

LTE Band4(ANT13 DSI8/9/10)

Band 4					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4 MHz	1RB_High	1754.3	17.30	17.72	17.53
		1732.5	17.44	17.80	17.69
		1710.7	17.57	17.93	17.80
	1RB_Middle	1754.3	17.35	17.79	17.59
		1732.5	17.44	17.85	17.77
		1710.7	17.58	18.00	17.83
	1RB_Low	1754.3	17.33	17.71	17.54

		1732.5	17.48	17.86	17.69
		1710.7	17.57	17.96	17.80
		1754.3	17.35	17.40	17.49
	3RB_High	1732.5	17.46	17.50	17.56
		1710.7	17.61	17.62	17.70
		1754.3	17.35	17.34	17.48
	3RB_Middle	1732.5	17.52	17.57	17.67
		1710.7	17.58	17.65	17.72
		1754.3	17.34	17.42	17.51
	3RB_Low	1732.5	17.50	17.58	17.62
		1710.7	17.61	17.56	17.71
		1754.3	17.32	17.47	17.36
3 MHz	6RB	1732.5	17.48	17.62	17.52
		1710.7	17.62	17.74	17.63
		1753.5	17.27	17.73	17.62
	1RB_High	1732.5	17.42	17.83	17.71
		1711.5	17.60	17.86	17.79
		1753.5	17.36	17.76	17.64
	1RB_Middle	1732.5	17.47	17.79	17.69
		1711.5	17.62	17.94	17.82
		1753.5	17.32	17.66	17.59
	1RB_Low	1732.5	17.47	17.71	17.74
		1711.5	17.58	17.94	17.83
		1753.5	17.32	17.43	17.39
	8RB_High	1732.5	17.44	17.56	17.51
		1711.5	17.60	17.70	17.66
		1753.5	17.38	17.48	17.47
	8RB_Middle	1732.5	17.45	17.56	17.51
		1711.5	17.60	17.73	17.66
		1753.5	17.34	17.47	17.46
	8RB_Low	1732.5	17.49	17.58	17.56
		1711.5	17.64	17.72	17.72
		1753.5	17.33	17.43	17.39
	15RB	1732.5	17.46	17.54	17.50
		1711.5	17.57	17.64	17.64
		1752.5	17.35	17.65	17.57
5 MHz	1RB_High	1732.5	17.49	17.85	17.69
		1712.5	17.64	18.05	17.83
		1752.5	17.38	17.71	17.68
	1RB_Middle	1732.5	17.52	17.83	17.70
		1712.5	17.67	18.03	17.91
		1752.5	17.36	17.73	17.64
	1RB_Low	1732.5	17.56	17.95	17.82
		1712.5	17.61	17.97	17.77
		1752.5	17.32	17.42	17.46
	12RB_High	1732.5	17.44	17.49	17.52
		1712.5	17.60	17.63	17.64
		1752.5	17.39	17.41	17.44
	12RB_Middle	1732.5	17.48	17.50	17.58
		1712.5	17.62	17.65	17.70
		1752.5	17.37	17.45	17.43
	12RB_Low	1732.5	17.55	17.56	17.61
		1712.5	17.64	17.70	17.69
		1752.5	17.39	17.45	17.46
	25RB	1732.5	17.49	17.54	17.57

		1712.5	17.63	17.68	17.67
10MHz	1RB_High	1750	17.29	17.77	17.55
		1732.5	17.40	17.64	17.65
		1715	17.61	18.12	17.85
	1RB_Middle	1750	17.41	17.83	17.68
		1732.5	17.48	17.77	17.71
		1715	17.66	17.98	17.87
	1RB_Low	1750	17.35	17.78	17.63
		1732.5	17.54	17.96	17.81
		1715	17.61	17.94	17.82
	25RB_High	1750	17.42	17.47	17.47
		1732.5	17.43	17.48	17.48
		1715	17.69	17.73	17.74
	25RB_Middle	1750	17.43	17.48	17.48
		1732.5	17.49	17.55	17.56
		1715	17.61	17.69	17.69
	25RB_Low	1750	17.42	17.48	17.52
		1732.5	17.55	17.57	17.61
		1715	17.69	17.69	17.71
	50RB	1750	17.44	17.49	17.48
		1732.5	17.50	17.52	17.52
		1715	17.69	17.73	17.69
15MHz	1RB_High	1747.5	17.27	17.74	17.46
		1732.5	17.33	17.70	17.60
		1717.5	17.47	17.77	17.72
	1RB_Middle	1747.5	17.39	17.81	17.63
		1732.5	17.47	17.86	17.69
		1717.5	17.64	18.01	17.84
	1RB_Low	1747.5	17.34	17.73	17.57
		1732.5	17.51	17.80	17.77
		1717.5	17.52	17.86	17.81
	36RB_High	1747.5	17.34	17.46	17.46
		1732.5	17.43	17.43	17.49
		1717.5	17.60	17.67	17.65
	36RB_Middle	1747.5	17.36	17.44	17.47
		1732.5	17.48	17.50	17.60
		1717.5	17.64	17.70	17.72
	36RB_Low	1747.5	17.36	17.50	17.47
		1732.5	17.47	17.53	17.56
		1717.5	17.60	17.67	17.65
	75RB	1747.5	17.42	17.47	17.45
		1732.5	17.46	17.49	17.49
		1717.5	17.61	17.65	17.66
20MHz	1RB_High	1745	17.48	17.95	17.78
		1732.5	17.48	17.81	17.68
		1720	17.49	17.93	17.68
	1RB_Middle	1745	17.56	17.93	17.76
		1732.5	17.57	17.87	17.73
		1720	17.67	18.07	17.86
	1RB_Low	1745	17.44	17.76	17.69
		1732.5	17.56	17.93	17.84
		1720	17.66	18.06	17.87
	50RB_High	1745	17.62	17.58	17.64
		1732.5	17.54	17.58	17.55
		1720	17.71	17.72	17.75

	50RB_Middle	1745	17.58	17.62	17.64
		1732.5	17.61	17.59	17.59
		1720	17.69	17.71	17.71
	50RB_Low	1745	17.64	17.70	17.71
		1732.5	17.55	17.55	17.56
		1720	17.73	17.71	17.71
	100RB	1745	17.59	17.63	17.65
		1732.5	17.48	17.50	17.47
		1720	17.71	17.73	17.73

LTE Band4(ANT31 DSI2/3)

Band 4					
Bandwidth (MHz)	RB allocation RB offset	Frequency (MHz)	Actual output power (dBm)		
			QPSK	16QAM	64QAM
1.4 MHz	1RB_High	1754.3	23.82	23.12	22.08
		1732.5	23.84	23.03	22.16
		1710.7	23.88	23.07	22.08
	1RB_Middle	1754.3	23.83	23.05	22.08
		1732.5	23.83	23.11	22.19
		1710.7	23.86	23.03	22.16
	1RB_Low	1754.3	23.82	23.09	22.04
		1732.5	23.85	23.12	22.16
		1710.7	23.87	23.03	22.15
	3RB_High	1754.3	23.84	22.84	22.01
		1732.5	23.85	22.85	22.00
		1710.7	23.88	22.86	22.15
	3RB_Middle	1754.3	23.82	22.76	22.01
		1732.5	23.89	22.89	22.06
		1710.7	23.92	22.92	22.16
	3RB_Low	1754.3	23.82	22.85	22.02
		1732.5	23.91	22.88	22.07
		1710.7	23.89	22.92	22.12
	6RB	1754.3	22.80	22.03	20.87
		1732.5	22.85	22.08	20.97
		1710.7	22.88	22.04	20.91
3 MHz	1RB_High	1753.5	23.82	23.05	22.10
		1732.5	23.83	23.01	22.15
		1711.5	23.92	23.18	22.07
	1RB_Middle	1753.5	23.88	23.06	22.10
		1732.5	23.89	23.07	22.15
		1711.5	23.93	23.07	22.17
	1RB_Low	1753.5	23.84	22.94	22.11
		1732.5	23.86	23.08	22.15
		1711.5	23.87	23.07	22.13
	8RB_High	1753.5	22.77	22.01	20.94
		1732.5	22.80	22.02	20.99
		1711.5	22.84	22.05	21.02
	8RB_Middle	1753.5	22.81	22.01	20.96
		1732.5	22.80	22.02	20.98
		1711.5	22.86	22.02	21.00
	8RB_Low	1753.5	22.84	22.03	20.99
		1732.5	22.82	22.06	20.98
		1711.5	22.88	22.05	21.01
	15RB	1753.5	22.86	22.00	20.95

5 MHz		1732.5	22.82	21.98	20.94
		1711.5	22.87	22.04	20.94
	1RB_High	1752.5	23.87	23.00	22.09
		1732.5	23.89	23.13	22.15
		1712.5	23.92	23.06	22.14
		1752.5	23.84	23.04	22.06
	1RB_Middle	1732.5	23.96	23.11	22.18
		1712.5	24.04	23.11	22.12
		1752.5	23.89	23.07	22.10
	1RB_Low	1732.5	23.92	23.15	22.19
		1712.5	23.94	23.11	22.18
		1752.5	22.80	21.90	20.97
	12RB_High	1732.5	22.85	21.96	20.97
		1712.5	22.87	21.96	21.03
		1752.5	22.83	21.97	20.98
	12RB_Middle	1732.5	22.88	21.99	21.00
		1712.5	22.87	22.02	21.00
		1752.5	22.86	21.96	20.96
	12RB_Low	1732.5	22.91	22.02	21.04
		1712.5	22.90	22.02	20.98
		1752.5	22.86	22.01	20.95
	25RB	1732.5	22.89	22.04	21.00
		1712.5	22.88	22.01	21.01
		1750	23.85	23.04	22.09
10MHz	1RB_High	1732.5	23.84	23.01	22.10
		1715	24.01	23.16	22.11
		1750	23.93	23.22	22.15
	1RB_Middle	1732.5	23.98	23.15	22.18
		1715	23.98	23.06	22.19
		1750	23.88	23.15	22.12
	1RB_Low	1732.5	23.91	23.18	22.12
		1715	23.91	23.07	22.10
		1750	22.82	21.99	21.00
	25RB_High	1732.5	22.86	22.00	20.96
		1715	22.95	22.11	21.04
		1750	22.91	21.99	21.03
	25RB_Middle	1732.5	22.84	22.01	21.00
		1715	22.89	22.07	21.05
		1750	22.88	22.04	21.04
	25RB_Low	1732.5	22.90	22.03	21.05
		1715	22.86	22.00	20.98
		1750	22.89	22.00	21.02
	50RB	1732.5	22.86	22.04	21.00
		1715	22.92	22.07	20.99
		1750	23.79	22.90	22.03
15MHz	1RB_High	1732.5	23.79	23.00	22.09
		1717.5	23.81	22.92	22.08
		1747.5	23.88	23.17	22.11
	1RB_Middle	1732.5	23.88	23.09	22.14
		1717.5	23.90	23.19	22.17
		1747.5	23.74	23.04	22.00
	1RB_Low	1732.5	23.88	23.05	22.05
		1717.5	23.82	22.93	22.09
		1747.5	22.80	21.94	20.93
	36RB_High	1732.5	22.82	21.92	20.98

	36RB_Middle	1717.5	22.82	21.96	20.99
		1747.5	22.79	21.95	20.99
		1732.5	22.83	21.94	20.95
		1717.5	22.89	21.99	21.05
	36RB_Low	1747.5	22.81	21.96	20.95
		1732.5	22.77	21.98	20.95
		1717.5	22.82	21.99	20.95
	75RB	1747.5	22.79	21.92	20.96
		1732.5	22.81	21.91	20.98
		1717.5	22.85	21.94	20.98
	1RB_High	1745	23.88	22.97	22.09
		1732.5	23.78	22.95	21.94
		1720	23.77	22.98	22.03
	1RB_Middle	1745	23.98	23.22	22.08
		1732.5	23.87	23.12	22.13
		1720	23.93	23.09	22.09
20MHz	1RB_Low	1745	23.72	23.00	21.94
		1732.5	23.83	23.00	22.09
		1720	23.96	23.03	22.14
	50RB_High	1745	22.89	21.99	20.97
		1732.5	22.84	21.93	20.89
		1720	22.83	21.93	20.88
	50RB_Middle	1745	22.90	21.97	21.00
		1732.5	22.81	21.88	20.86
		1720	22.87	21.99	20.95
	50RB_Low	1745	22.82	21.92	20.95
		1732.5	22.74	21.93	20.87
		1720	22.84	21.95	20.95
	100RB	1745	22.86	21.93	20.93
		1732.5	22.80	21.92	20.84
		1720	22.84	21.88	20.87

LTE Band4(ANT31 DSI4)

Band 4					
Bandwidth (MHz)	RB allocation RB offset	Frequency (MHz)	Actual output power (dBm)		
			QPSK	16QAM	64QAM
1.4 MHz	1RB_High	1754.3	20.99	21.38	21.23
		1732.5	20.98	21.39	21.29
		1710.7	21.03	21.35	21.23
	1RB_Middle	1754.3	21.02	21.31	21.18
		1732.5	21.06	21.42	21.20
		1710.7	21.02	21.41	21.20
	1RB_Low	1754.3	20.98	21.22	21.21
		1732.5	21.02	21.33	21.18
		1710.7	21.03	21.42	21.28
	3RB_High	1754.3	20.98	20.95	21.12
		1732.5	21.05	20.98	21.15
		1710.7	21.08	21.10	21.13
	3RB_Middle	1754.3	20.96	21.04	21.08
		1732.5	21.09	21.08	21.21
		1710.7	21.07	20.97	21.19
	3RB_Low	1754.3	21.00	21.01	21.05

	6RB	1732.5	21.04	21.05	21.12
		1710.7	21.04	21.01	21.15
		1754.3	21.01	21.15	20.93
		1732.5	21.04	21.16	21.05
		1710.7	21.05	21.18	21.05
3 MHz	1RB_High	1753.5	21.01	21.23	21.17
		1732.5	21.02	21.31	21.25
		1711.5	21.08	21.23	21.23
	1RB_Middle	1753.5	20.98	21.19	21.23
		1732.5	21.06	21.43	21.23
		1711.5	21.07	21.40	21.27
	1RB_Low	1753.5	20.98	21.23	21.20
		1732.5	21.04	21.26	21.25
		1711.5	21.03	21.23	21.24
	8RB_High	1753.5	20.98	21.03	21.05
		1732.5	21.00	21.08	21.03
		1711.5	21.02	21.15	21.10
	8RB_Middle	1753.5	21.00	21.06	21.02
		1732.5	21.03	21.05	21.02
		1711.5	21.03	21.08	21.09
	8RB_Low	1753.5	21.02	21.09	21.08
		1732.5	21.07	21.11	21.10
		1711.5	21.08	21.09	21.07
	15RB	1753.5	20.99	21.06	21.05
		1732.5	21.03	21.04	21.06
		1711.5	21.05	21.10	21.10
5 MHz	1RB_High	1752.5	21.03	21.37	21.28
		1732.5	21.06	21.30	21.20
		1712.5	21.10	21.31	21.27
	1RB_Middle	1752.5	21.05	21.39	21.22
		1732.5	21.04	21.39	21.22
		1712.5	21.11	21.32	21.29
	1RB_Low	1752.5	21.03	21.39	21.24
		1732.5	21.10	21.44	21.28
		1712.5	21.09	21.30	21.29
	12RB_High	1752.5	20.97	20.99	21.03
		1732.5	21.04	21.05	21.07
		1712.5	21.07	21.01	21.09
	12RB_Middle	1752.5	21.03	21.07	21.08
		1732.5	21.09	21.10	21.10
		1712.5	21.05	21.09	21.10
	12RB_Low	1752.5	21.07	21.05	21.07
		1732.5	21.10	21.08	21.10
		1712.5	21.10	21.10	21.14
	25RB	1752.5	21.07	21.08	21.07
		1732.5	21.08	21.08	21.09
		1712.5	21.11	21.10	21.08
10MHz	1RB_High	1750	21.01	21.26	21.15
		1732.5	21.04	21.27	21.22
		1715	21.15	21.50	21.23
	1RB_Middle	1750	21.11	21.31	21.16
		1732.5	21.09	21.40	21.22
		1715	21.14	21.48	21.21
	1RB_Low	1750	21.03	21.31	21.25
		1732.5	21.11	21.40	21.22

	25RB_High	1715	21.05	21.29	21.27
		1750	21.04	21.07	21.06
		1732.5	21.01	21.09	21.05
	25RB_Middle	1715	21.14	21.20	21.15
		1750	21.08	21.10	21.15
		1732.5	21.01	21.08	21.07
	25RB_Low	1715	21.14	21.11	21.12
		1750	21.08	21.15	21.13
		1732.5	21.10	21.13	21.12
	50RB	1715	21.03	21.03	21.09
		1750	21.12	21.10	21.11
		1732.5	21.07	21.08	21.05
15MHz	1RB_High	1715	21.12	21.12	21.15
		1747.5	20.96	21.25	21.16
		1732.5	21.00	21.19	21.25
	1RB_Middle	1717.5	20.98	21.31	21.15
		1747.5	21.08	21.31	21.21
		1732.5	21.06	21.29	21.21
	1RB_Low	1717.5	21.12	21.45	21.22
		1747.5	20.95	21.19	21.21
		1732.5	21.07	21.36	21.24
	36RB_High	1717.5	21.03	21.34	21.21
		1747.5	21.05	21.07	21.11
		1732.5	21.03	21.06	21.05
	36RB_Middle	1717.5	21.07	21.07	21.09
		1747.5	21.04	21.04	21.04
		1732.5	21.05	21.05	21.12
	36RB_Low	1717.5	21.14	21.15	21.16
		1747.5	21.06	21.06	21.04
		1732.5	21.08	21.07	21.05
	75RB	1717.5	21.11	21.10	21.11
		1747.5	21.09	21.09	21.05
		1732.5	21.09	21.06	21.02
20MHz	1RB_High	1717.5	21.02	21.05	21.06
		1745	21.04	21.23	21.16
		1732.5	20.90	21.25	21.07
	1RB_Middle	1720	20.91	21.19	21.07
		1745	21.09	21.34	21.28
		1732.5	20.99	21.38	21.21
	1RB_Low	1720	21.07	21.40	21.11
		1745	20.88	21.25	21.07
		1732.5	21.00	21.27	21.12
	50RB_High	1720	21.04	21.32	21.24
		1745	21.08	21.10	21.13
		1732.5	21.03	20.99	21.05
	50RB_Middle	1720	20.98	21.02	20.94
		1745	21.10	21.06	21.09
		1732.5	21.01	20.95	20.95
	50RB_Low	1720	21.05	21.01	21.10
		1745	21.01	21.02	21.04
		1732.5	20.99	20.95	20.93
	100RB	1720	21.02	21.04	21.04
		1745	21.09	21.00	21.05
		1732.5	20.98	20.95	20.96
		1720	20.97	21.00	21.01

LTE Band4(ANT31 DSI8/9/10)

Band 4					
Bandwidth (MHz)	RB allocation RB offset	Frequency (MHz)	Actual output power (dBm)		
			QPSK	16QAM	64QAM
1.4 MHz	1RB_High	1754.3	19.88	20.18	20.01
		1732.5	19.89	20.21	20.01
		1710.7	19.92	20.19	20.06
	1RB_Middle	1754.3	19.89	20.21	19.99
		1732.5	19.89	20.12	20.16
		1710.7	19.94	20.27	20.06
	1RB_Low	1754.3	19.83	20.17	20.09
		1732.5	19.91	20.28	20.16
		1710.7	19.92	20.28	20.12
	3RB_High	1754.3	19.88	19.86	19.93
		1732.5	19.92	19.96	20.04
		1710.7	19.94	19.98	20.04
	3RB_Middle	1754.3	19.87	19.83	20.01
		1732.5	19.91	19.94	19.99
		1710.7	19.96	19.90	20.00
	3RB_Low	1754.3	19.86	19.87	20.03
		1732.5	19.96	19.87	20.02
		1710.7	19.94	19.95	20.08
	6RB	1754.3	19.88	19.99	19.81
		1732.5	19.94	20.04	19.91
		1710.7	19.94	20.05	19.97
3 MHz	1RB_High	1753.5	19.86	20.13	20.08
		1732.5	19.90	20.22	20.11
		1711.5	19.96	20.25	20.18
	1RB_Middle	1753.5	19.88	20.20	20.04
		1732.5	19.92	20.25	20.10
		1711.5	19.96	20.14	20.06
	1RB_Low	1753.5	19.87	20.18	20.07
		1732.5	19.91	20.26	20.09
		1711.5	19.92	20.27	20.05
	8RB_High	1753.5	19.87	19.96	19.93
		1732.5	19.91	19.99	19.94
		1711.5	19.92	20.04	19.98
	8RB_Middle	1753.5	19.90	19.96	19.98
		1732.5	19.89	19.98	19.92
		1711.5	19.94	19.99	19.97
	8RB_Low	1753.5	19.92	19.98	19.95
		1732.5	19.94	20.02	19.97
		1711.5	19.94	20.02	19.99
	15RB	1753.5	19.89	19.96	19.95
		1732.5	19.90	19.93	19.91
		1711.5	19.95	19.97	19.95
5 MHz	1RB_High	1752.5	19.90	20.22	20.08
		1732.5	19.95	20.13	20.14
		1712.5	19.99	20.22	20.12
	1RB_Middle	1752.5	19.89	20.24	20.07
		1732.5	19.93	20.32	20.22
		1712.5	19.98	20.33	20.14
	1RB_Low	1752.5	19.90	20.14	20.12

		1732.5	19.98	20.17	20.17
		1712.5	19.96	20.31	20.15
		1752.5	19.90	19.89	19.95
	12RB_High	1732.5	19.93	19.88	19.95
		1712.5	19.91	19.98	19.94
		1752.5	19.90	19.94	19.91
	12RB_Middle	1732.5	19.96	19.93	19.98
		1712.5	19.93	19.98	19.99
		1752.5	19.98	19.93	19.98
	12RB_Low	1732.5	19.99	20.02	19.96
		1712.5	19.98	19.92	19.97
		1752.5	19.95	19.97	19.94
	25RB	1732.5	19.93	19.98	19.97
		1712.5	19.95	19.98	19.98
10MHz	1RB_High	1750	19.89	20.10	20.09
		1732.5	19.90	20.18	20.05
		1715	20.03	20.38	20.24
	1RB_Middle	1750	19.95	20.24	20.06
		1732.5	19.93	20.19	20.23
		1715	20.04	20.32	20.13
	1RB_Low	1750	19.91	20.21	20.06
		1732.5	19.95	20.16	20.09
		1715	19.92	20.25	20.05
	25RB_High	1750	19.93	19.97	19.89
		1732.5	19.94	19.95	19.97
		1715	20.05	20.07	20.08
	25RB_Middle	1750	19.96	20.02	20.00
		1732.5	19.94	19.98	19.99
		1715	20.01	20.04	20.03
	25RB_Low	1750	19.99	19.99	19.98
		1732.5	19.99	19.97	20.03
		1715	19.94	19.98	19.96
	50RB	1750	19.98	19.97	19.94
		1732.5	19.99	19.99	19.94
		1715	20.01	20.02	20.01
15MHz	1RB_High	1747.5	19.82	20.14	20.01
		1732.5	19.82	20.14	20.05
		1717.5	19.88	20.14	20.01
	1RB_Middle	1747.5	19.92	20.24	20.13
		1732.5	19.92	20.23	20.18
		1717.5	19.96	20.22	20.17
	1RB_Low	1747.5	19.82	20.08	19.97
		1732.5	19.97	20.32	20.09
		1717.5	19.88	20.11	20.12
	36RB_High	1747.5	19.87	19.96	19.94
		1732.5	19.89	19.92	19.94
		1717.5	19.93	19.97	19.99
	36RB_Middle	1747.5	19.93	19.96	19.99
		1732.5	19.95	19.96	19.96
		1717.5	19.96	20.01	20.02
	36RB_Low	1747.5	19.92	19.98	20.01
		1732.5	19.88	19.91	19.92
		1717.5	19.88	19.92	19.95
	75RB	1747.5	19.93	19.93	19.91
		1732.5	19.88	19.94	19.95

		1717.5	19.96	19.97	19.94
20MHz	1RB_High	1745	19.96	20.28	20.09
		1732.5	19.82	20.16	20.02
		1720	19.86	20.21	20.08
	1RB_Middle	1745	20.01	20.28	20.11
		1732.5	19.88	20.18	20.03
		1720	19.95	20.21	20.17
	1RB_Low	1745	19.74	20.05	20.00
		1732.5	19.94	20.17	20.06
		1720	20.00	20.26	20.17
	50RB_High	1745	20.03	20.03	19.96
		1732.5	19.96	19.90	19.94
		1720	19.93	19.94	19.89
	50RB_Middle	1745	20.01	20.02	20.01
		1732.5	19.91	19.92	19.94
		1720	19.97	20.02	20.01
	50RB_Low	1745	19.98	19.98	19.98
		1732.5	19.87	19.92	19.89
		1720	19.95	19.94	19.96
	100RB	1745	19.98	19.96	19.97
		1732.5	19.92	19.87	19.85
		1720	19.96	19.88	19.89

LTE Band5(ANT13 DSI2/3)

Band 5					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	848.3	18.73	19.04	18.97
		836.5	18.87	19.10	19.06
		824.7	18.85	19.14	19.08
	1RB-Middle	848.3	18.72	19.08	18.90
		836.5	18.85	19.22	19.08
		824.7	18.81	19.19	19.01
	1RB-Low	848.3	18.73	19.03	18.98
		836.5	18.81	19.16	19.06
		824.7	18.82	19.17	19.01
	3RB-High	848.3	18.74	18.78	18.92
		836.5	18.84	18.85	18.98
		824.7	18.86	18.89	18.94
	3RB-Middle	848.3	18.78	18.81	18.86
		836.5	18.87	18.87	18.94
		824.7	18.85	18.83	18.98
	3RB-Low	848.3	18.78	18.81	18.90
		836.5	18.84	18.84	18.95
		824.7	18.85	18.86	18.96
	6RB	848.3	18.77	18.88	18.73
		836.5	18.88	18.98	18.90
		824.7	18.86	18.94	18.81
3MHz	1RB-High	847.5	18.70	19.07	18.94
		836.5	18.81	19.19	18.99
		825.5	18.82	19.14	19.06
	1RB-Middle	847.5	18.71	19.12	19.02
		836.5	18.83	19.23	19.03
		825.5	18.88	19.12	19.01

	1RB-Low	847.5	18.80	19.18	19.00
		836.5	18.77	19.11	18.99
		825.5	18.86	19.08	19.05
	8RB-High	847.5	18.71	18.89	18.85
		836.5	18.76	18.93	18.87
		825.5	18.86	18.96	18.93
	8RB-Middle	847.5	18.70	18.86	18.83
		836.5	18.79	18.96	18.93
		825.5	18.85	18.92	18.89
	8RB-Low	847.5	18.77	18.87	18.86
		836.5	18.82	18.93	18.92
		825.5	18.81	18.94	18.88
	15RB	847.5	18.77	18.84	18.87
		836.5	18.83	18.89	18.80
		825.5	18.83	18.90	18.85
5MHz	1RB-High	846.5	18.81	19.09	18.96
		836.5	18.89	19.23	18.98
		826.5	18.92	19.18	19.09
	1RB-Middle	846.5	18.86	19.22	19.11
		836.5	18.87	19.09	19.17
		826.5	18.93	19.21	19.03
	1RB-Low	846.5	18.87	19.18	19.07
		836.5	18.86	19.27	19.09
		826.5	18.93	19.25	19.09
	12RB-High	846.5	18.84	18.82	18.85
		836.5	18.86	18.86	18.87
		826.5	18.84	18.84	18.88
	12RB-Middle	846.5	18.81	18.83	18.84
		836.5	18.85	18.83	18.86
		826.5	18.90	18.88	18.90
	12RB-Low	846.5	18.93	18.89	18.89
		836.5	18.83	18.87	18.90
		826.5	18.91	18.87	18.93
	25RB	846.5	18.86	18.88	18.85
		836.5	18.85	18.84	18.83
		826.5	18.92	18.87	18.85
10MHz	1RB-High	844	18.78	19.14	18.88
		836.5	18.82	19.17	18.97
		829	18.86	19.14	19.04
	1RB-Middle	844	18.90	19.22	19.04
		836.5	18.87	19.13	19.12
		829	18.96	19.31	19.14
	1RB-Low	844	18.85	19.11	19.07
		836.5	18.88	19.14	18.99
		829	18.87	19.17	19.07
	25RB-High	844	18.80	18.84	18.84
		836.5	18.86	18.90	18.90
		829	18.92	18.94	18.91
	25RB-Middle	844	18.91	18.90	18.94
		836.5	18.85	18.88	18.87
		829	18.97	18.96	18.96
	25RB-Low	844	19.01	19.02	19.00
		836.5	18.81	18.82	18.87
		829	19.02	19.08	19.06
	50RB	844	18.91	18.95	18.92

		836.5	18.90	18.88	18.87
		829	18.99	18.97	18.98

LTE Band5(ANT13 DSI4/10)

Band 5					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	848.3	23.15	22.31	21.50
		836.5	23.30	22.51	21.58
		824.7	23.28	22.49	21.56
	1RB-Middle	848.3	23.10	22.41	21.39
		836.5	23.27	22.56	21.58
		824.7	23.25	22.39	21.57
	1RB-Low	848.3	23.14	22.30	21.35
		836.5	23.30	22.53	21.53
		824.7	23.30	22.46	21.50
	3RB-High	848.3	23.12	22.17	21.37
		836.5	23.30	22.22	21.46
		824.7	23.27	22.22	21.42
	3RB-Middle	848.3	23.17	22.14	21.37
		836.5	23.31	22.33	21.46
		824.7	23.28	22.25	21.45
	3RB-Low	848.3	23.20	22.22	21.41
		836.5	23.31	22.27	21.43
		824.7	23.26	22.31	21.48
	6RB	848.3	22.18	21.35	20.27
		836.5	22.32	21.52	20.39
		824.7	22.26	21.47	20.32
3MHz	1RB-High	847.5	23.14	22.37	21.44
		836.5	23.22	22.42	21.50
		825.5	23.27	22.39	21.54
	1RB-Middle	847.5	23.23	22.30	21.40
		836.5	23.32	22.59	21.61
		825.5	23.32	22.44	21.59
	1RB-Low	847.5	23.23	22.43	21.48
		836.5	23.29	22.38	21.57
		825.5	23.26	22.45	21.55
	8RB-High	847.5	22.14	21.37	20.32
		836.5	22.23	21.44	20.38
		825.5	22.24	21.47	20.42
	8RB-Middle	847.5	22.15	21.36	20.31
		836.5	22.24	21.47	20.38
		825.5	22.22	21.45	20.42
	8RB-Low	847.5	22.15	21.39	20.32
		836.5	22.20	21.46	20.38
		825.5	22.26	21.43	20.43
	15RB	847.5	22.18	21.39	20.33
		836.5	22.22	21.41	20.32
		825.5	22.24	21.43	20.36
5MHz	1RB-High	846.5	23.18	22.35	21.48
		836.5	23.29	22.46	21.53
		826.5	23.34	22.44	21.64
	1RB-Middle	846.5	23.22	22.51	21.49
		836.5	23.41	22.52	21.59

	1RB-Low	826.5	23.28	22.55	21.60
		846.5	23.28	22.38	21.56
		836.5	23.30	22.45	21.51
	12RB-High	826.5	23.27	22.44	21.53
		846.5	22.19	21.34	20.38
		836.5	22.22	21.38	20.44
	12RB-Middle	826.5	22.22	21.38	20.39
		846.5	22.21	21.35	20.40
		836.5	22.26	21.37	20.39
	12RB-Low	826.5	22.27	21.41	20.45
		846.5	22.25	21.37	20.43
		836.5	22.24	21.35	20.42
	25RB	826.5	22.27	21.42	20.43
		846.5	22.20	21.42	20.39
		836.5	22.22	21.37	20.33
10MHz	1RB-High	826.5	22.27	21.45	20.43
		844	23.26	22.41	21.46
		836.5	23.34	22.48	21.50
	1RB-Middle	829	23.35	22.48	21.51
		844	23.42	22.60	21.58
		836.5	23.40	22.56	21.59
	1RB-Low	829	23.43	22.50	21.64
		844	23.37	22.48	21.57
		836.5	23.37	22.45	21.61
	25RB-High	829	23.37	22.47	21.60
		844	22.26	21.42	20.38
		836.5	22.32	21.48	20.43
	25RB-Middle	829	22.42	21.55	20.53
		844	22.33	21.49	20.47
		836.5	22.30	21.47	20.48
	25RB-Low	829	22.42	21.57	20.53
		844	22.40	21.59	20.57
		836.5	22.29	21.43	20.43
	50RB	829	22.48	21.64	20.57
		844	22.37	21.50	20.48
		836.5	22.34	21.44	20.45
		829	22.41	21.58	20.56

LTE Band5(ANT41 DSI2/3/4/10)

Band 5					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	848.3	23.27	22.45	21.61
		836.5	23.37	22.60	21.64
		824.7	23.33	22.54	21.63
	1RB-Middle	848.3	23.34	22.42	21.54
		836.5	23.40	22.66	21.57
		824.7	23.31	22.50	21.59
	1RB-Low	848.3	23.31	22.49	21.60
		836.5	23.38	22.53	21.64
		824.7	23.31	22.46	21.58
	3RB-High	848.3	23.26	22.24	21.45
		836.5	23.38	22.35	21.55
		824.7	23.31	22.31	21.48
	3RB-Middle	848.3	23.32	22.32	21.46

		836.5	23.39	22.34	21.58
		824.7	23.31	22.33	21.50
		848.3	23.27	22.24	21.51
		836.5	23.35	22.46	21.56
	3RB-Low	824.7	23.32	22.25	21.52
		848.3	22.31	21.46	20.30
		836.5	22.41	21.61	20.49
		824.7	22.30	21.50	20.43
3MHz	6RB	847.5	23.28	22.39	21.59
		836.5	23.31	22.56	21.62
		825.5	23.29	22.53	21.54
	1RB-High	847.5	23.33	22.50	21.59
		836.5	23.43	22.61	21.71
		825.5	23.32	22.65	21.62
	1RB-Middle	847.5	23.32	22.61	21.69
		836.5	23.37	22.61	21.63
		825.5	23.31	22.48	21.59
	1RB-Low	847.5	22.28	21.47	20.47
		836.5	22.30	21.55	20.48
		825.5	22.31	21.52	20.48
	8RB-High	847.5	22.28	21.51	20.40
		836.5	22.33	21.54	20.48
		825.5	22.29	21.51	20.47
	8RB-Middle	847.5	22.33	21.55	20.44
		836.5	22.34	21.53	20.49
		825.5	22.28	21.48	20.48
	8RB-Low	847.5	22.31	21.50	20.40
		836.5	22.27	21.48	20.46
		825.5	22.29	21.49	20.44
	15RB	846.5	23.32	22.50	21.54
		836.5	23.40	22.65	21.63
		826.5	23.41	22.55	21.64
5MHz	1RB-High	846.5	23.41	22.65	21.67
		836.5	23.43	22.65	21.73
		826.5	23.33	22.61	21.63
	1RB-Middle	846.5	23.39	22.50	21.70
		836.5	23.41	22.58	21.63
		826.5	23.32	22.61	21.56
	1RB-Low	846.5	22.27	21.42	20.44
		836.5	22.35	21.48	20.48
		826.5	22.28	21.44	20.44
	12RB-High	846.5	22.34	21.45	20.50
		836.5	22.29	21.47	20.46
		826.5	22.32	21.45	20.46
	12RB-Middle	846.5	22.41	21.50	20.57
		836.5	22.37	21.50	20.51
		826.5	22.26	21.40	20.43
	12RB-Low	846.5	22.34	21.51	20.46
		836.5	22.34	21.52	20.48
		826.5	22.27	21.48	20.41
10MHz	25RB	844	23.34	22.52	21.55
		836.5	23.33	22.47	21.54
		829	23.35	22.49	21.54
	1RB-High	844	23.42	22.56	21.63
		836.5	23.38	22.58	21.61

	1RB-Low	829	23.46	22.63	21.64
		844	23.35	22.55	21.60
		836.5	23.36	22.57	21.56
	25RB-High	829	23.37	22.54	21.61
		844	22.27	21.40	20.32
		836.5	22.37	21.55	20.47
	25RB-Middle	829	22.33	21.46	20.47
		844	22.34	21.47	20.44
		836.5	22.33	21.49	20.48
	25RB-Low	829	22.40	21.55	20.54
		844	22.39	21.57	20.53
		836.5	22.32	21.52	20.43
	50RB	829	22.39	21.57	20.56
		844	22.31	21.46	20.43
		836.5	22.35	21.52	20.49
		829	22.37	21.51	20.48

LTE Band7(ANT13 DSI2/3)

Band 7					
Bandwidth (MHz)	RB allocation RB offset	Frequency (MHz)	Actual output power (dBm)		
			QPSK	16QAM	64QAM
5MHz	1RB-High	2567.5	15.08	15.34	15.20
		2535	15.17	15.42	15.25
		2502.5	14.84	15.12	14.97
	1RB-Middle	2567.5	15.11	15.35	15.21
		2535	15.17	15.30	15.32
		2502.5	14.84	15.12	14.93
	1RB-Low	2567.5	15.07	15.34	15.20
		2535	15.16	15.46	15.29
		2502.5	14.80	15.10	14.94
	12RB-High	2567.5	15.09	15.10	15.12
		2535	15.13	15.10	15.13
		2502.5	14.85	14.88	14.92
	12RB-Middle	2567.5	15.05	15.07	15.08
		2535	15.10	15.15	15.18
		2502.5	14.80	14.85	14.86
	12RB-Low	2567.5	15.08	15.10	15.14
		2535	15.15	15.16	15.22
		2502.5	14.78	14.84	14.87
	25RB	2567.5	15.10	15.11	15.10
		2535	15.13	15.20	15.16
		2502.5	14.83	14.84	14.83
10MHz	1RB-High	2565	15.04	15.23	15.20
		2535	15.09	15.25	15.20
		2505	14.87	15.11	15.03
	1RB-Middle	2565	15.07	15.32	15.23
		2535	15.17	15.38	15.33
		2505	14.85	15.17	14.97
	1RB-Low	2565	15.08	15.38	15.26
		2535	15.09	15.36	15.21
		2505	14.78	14.96	14.89
	25RB-High	2565	15.05	15.08	15.08
		2535	15.14	15.18	15.15

	25RB-Middle	2505	14.91	14.93	14.91
		2565	15.09	15.12	15.10
		2535	15.14	15.17	15.14
		2505	14.83	14.90	14.88
	25RB-Low	2565	15.15	15.18	15.10
		2535	15.11	15.17	15.13
		2505	14.79	14.82	14.83
		2565	15.11	15.08	15.09
	50RB	2535	15.16	15.16	15.16
		2505	14.85	14.87	14.90
		2562.5	14.99	15.22	15.09
15MHz	1RB-High	2535	15.05	15.22	15.19
		2507.5	14.86	15.17	15.10
		2562.5	15.09	15.25	15.14
	1RB-Middle	2535	15.14	15.36	15.32
		2507.5	14.82	15.12	14.92
		2562.5	15.00	15.22	15.17
	1RB-Low	2535	15.10	15.38	15.24
		2507.5	14.71	14.93	14.84
		2562.5	15.06	15.04	15.07
	36RB-High	2535	15.11	15.15	15.14
		2507.5	14.91	14.89	14.92
		2562.5	15.02	15.05	15.08
	36RB-Middle	2535	15.05	15.15	15.16
		2507.5	14.85	14.90	14.92
		2562.5	15.11	15.10	15.12
	36RB-Low	2535	15.08	15.12	15.18
		2507.5	14.80	14.81	14.86
		2562.5	15.08	15.09	15.12
	75RB	2535	15.12	15.11	15.18
		2507.5	14.86	14.86	14.87
		2560	14.81	15.07	14.97
20MHz	1RB-High	2535	14.72	14.94	14.84
		2510	14.61	14.86	14.76
		2560	14.86	15.11	15.04
	1RB-Middle	2535	14.83	15.08	15.00
		2510	14.66	14.81	14.81
		2560	14.84	15.04	14.93
	1RB-Low	2535	14.65	14.83	14.73
		2510	14.54	14.69	14.66
		2560	14.87	14.90	14.87
	50RB-High	2535	14.79	14.79	14.80
		2510	14.69	14.70	14.69
		2560	14.95	14.92	14.93
	50RB-Middle	2535	14.84	14.83	14.83
		2510	14.65	14.69	14.69
		2560	14.94	14.95	14.97
	50RB-Low	2535	14.81	14.81	14.84
		2510	14.63	14.60	14.64
		2560	14.90	14.89	14.90
	100RB	2535	14.81	14.77	14.77
		2510	14.65	14.66	14.67

LTE Band7(ANT13 DSI4)

Band 7					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2567.5	22.79	22.49	21.36
		2535	22.86	22.44	21.45
		2502.5	22.64	22.28	21.19
	1RB-Middle	2567.5	22.82	22.45	21.41
		2535	22.86	22.46	21.49
		2502.5	22.56	22.29	21.13
	1RB-Low	2567.5	22.80	22.45	21.36
		2535	22.85	22.49	21.46
		2502.5	22.58	22.16	21.17
	12RB-High	2567.5	22.25	21.27	20.25
		2535	22.30	21.25	20.31
		2502.5	22.09	21.02	20.03
	12RB-Middle	2567.5	22.30	21.26	20.25
		2535	22.30	21.27	20.29
		2502.5	22.05	20.59	20.02
	12RB-Low	2567.5	22.29	21.31	20.27
		2535	22.33	21.28	20.30
		2502.5	22.08	21.01	20.03
	25RB	2567.5	22.27	21.27	20.27
		2535	22.29	21.31	20.27
		2502.5	22.02	21.08	20.00
10MHz	1RB-High	2565	22.77	22.44	21.36
		2535	22.81	22.47	21.39
		2505	22.63	22.39	21.26
	1RB-Middle	2565	22.79	22.49	21.45
		2535	22.84	22.47	21.43
		2505	22.62	22.32	21.20
	1RB-Low	2565	22.83	22.41	21.33
		2535	22.81	22.42	21.35
		2505	22.54	22.13	21.08
	25RB-High	2565	22.30	21.30	20.23
		2535	22.34	21.37	20.29
		2505	22.09	21.15	20.07
	25RB-Middle	2565	22.29	21.30	20.26
		2535	22.31	21.32	20.30
		2505	22.04	21.07	20.01
	25RB-Low	2565	22.34	21.34	20.32
		2535	22.31	21.31	20.26
		2505	21.98	21.04	19.98
	50RB	2565	22.29	21.28	20.28
		2535	22.32	21.31	20.31
		2505	22.07	21.02	20.02
15MHz	1RB-High	2562.5	22.69	22.44	21.20
		2535	22.76	22.41	21.32
		2507.5	22.61	22.30	21.23
	1RB-Middle	2562.5	22.81	22.46	21.41
		2535	22.84	22.49	21.41
		2507.5	22.62	22.16	21.20
	1RB-Low	2562.5	22.75	22.39	21.30
		2535	22.81	22.45	21.43
		2507.5	22.02	22.14	21.05

	36RB-High	2562.5	22.19	21.22	20.22
		2535	22.27	21.30	20.29
		2507.5	21.65	21.11	20.12
	36RB-Middle	2562.5	22.25	21.23	20.24
		2535	22.31	21.30	20.32
		2507.5	22.07	21.01	20.05
	36RB-Low	2562.5	22.29	21.28	20.27
		2535	22.30	21.24	20.21
		2507.5	22.00	21.01	20.00
	75RB	2562.5	22.26	21.23	20.25
		2535	22.29	21.26	20.28
		2507.5	22.11	21.02	20.01
20MHz	1RB-High	2560	22.39	21.98	21.01
		2535	22.29	22.02	20.90
		2510	22.18	21.78	20.78
	1RB-Middle	2560	22.49	22.21	21.03
		2535	22.41	22.00	20.97
		2510	22.25	21.97	20.77
	1RB-Low	2560	22.38	22.05	20.89
		2535	22.24	21.79	20.81
		2510	22.10	21.78	20.67
	50RB-High	2560	21.92	20.91	19.88
		2535	21.80	20.78	19.78
		2510	21.73	20.67	19.70
	50RB-Middle	2560	21.98	20.99	19.98
		2535	21.84	20.84	19.83
		2510	21.74	20.72	19.66
	50RB-Low	2560	22.02	21.04	19.97
		2535	21.83	20.81	19.79
		2510	21.66	20.63	19.61
	100RB	2560	21.96	20.97	19.94
		2535	21.81	20.77	19.78
		2510	21.66	20.66	19.65

LTE Band7(ANT13 DSI8/9/10)

Band 7					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2567.5	17.42	17.62	17.64
		2535	17.45	17.74	17.66
		2502.5	17.17	17.53	17.31
	1RB-Middle	2567.5	17.43	17.75	17.69
		2535	17.44	17.73	17.64
		2502.5	17.10	17.40	17.38
	1RB-Low	2567.5	17.43	17.73	17.66
		2535	17.47	17.77	17.56
		2502.5	17.11	17.39	17.29
	12RB-High	2567.5	17.42	17.50	17.50
		2535	17.39	17.42	17.43
		2502.5	17.18	17.15	17.19
	12RB-Middle	2567.5	17.47	17.44	17.47
		2535	17.44	17.44	17.45
		2502.5	17.13	17.16	17.18
	12RB-Low	2567.5	17.44	17.51	17.48

	25RB	2535	17.47	17.46	17.46
		2502.5	17.16	17.09	17.16
		2567.5	17.47	17.50	17.47
		2535	17.42	17.40	17.47
		2502.5	17.15	17.19	17.17
10MHz	1RB-High	2565	17.42	17.82	17.63
		2535	17.41	17.75	17.54
		2505	17.21	17.55	17.39
	1RB-Middle	2565	17.51	17.82	17.66
		2535	17.46	17.80	17.57
		2505	17.19	17.53	17.39
	1RB-Low	2565	17.48	17.69	17.67
		2535	17.41	17.78	17.58
		2505	17.14	17.46	17.26
	25RB-High	2565	17.46	17.48	17.47
		2535	17.46	17.46	17.46
		2505	17.23	17.25	17.22
	25RB-Middle	2565	17.48	17.55	17.48
		2535	17.40	17.46	17.48
		2505	17.24	17.20	17.24
	25RB-Low	2565	17.53	17.55	17.55
		2535	17.48	17.50	17.49
		2505	17.12	17.18	17.18
	50RB	2565	17.50	17.51	17.50
		2535	17.45	17.49	17.46
		2505	17.20	17.19	17.21
15MHz	1RB-High	2562.5	17.38	17.65	17.60
		2535	17.38	17.61	17.56
		2507.5	17.26	17.57	17.41
	1RB-Middle	2562.5	17.45	17.82	17.67
		2535	17.42	17.77	17.63
		2507.5	17.14	17.44	17.27
	1RB-Low	2562.5	17.36	17.60	17.50
		2535	17.41	17.61	17.58
		2507.5	17.06	17.33	17.13
	36RB-High	2562.5	17.39	17.44	17.47
		2535	17.35	17.40	17.41
		2507.5	17.22	17.30	17.26
	36RB-Middle	2562.5	17.43	17.47	17.48
		2535	17.44	17.49	17.49
		2507.5	17.19	17.22	17.14
	36RB-Low	2562.5	17.40	17.45	17.49
		2535	17.39	17.50	17.52
		2507.5	17.06	17.15	17.02
	75RB	2562.5	17.47	17.41	17.45
		2535	17.42	17.42	17.40
		2507.5	17.17	17.19	17.13
20MHz	1RB-High	2560	17.33	17.70	17.49
		2535	17.16	17.43	17.34
		2510	17.08	17.45	17.21
	1RB-Middle	2560	17.31	17.69	17.47
		2535	17.24	17.43	17.44
		2510	17.11	17.34	17.31
	1RB-Low	2560	17.20	17.59	17.43
		2535	17.13	17.39	17.22

	50RB-High	2510	17.05	17.25	17.17
		2560	17.34	17.33	17.31
		2535	17.18	17.13	17.21
		2510	17.20	17.18	17.16
	50RB-Middle	2560	17.39	17.39	17.40
		2535	17.22	17.30	17.27
		2510	17.15	17.14	17.20
		2560	17.35	17.39	17.39
	50RB-Low	2535	17.23	17.23	17.26
		2510	17.08	17.12	17.09
		2560	17.34	17.35	17.33
		2535	17.22	17.19	17.21
	100RB	2510	17.11	17.10	17.10

LTE Band7(ANT31 DSI2/3)

Band 7					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2567.5	23.68	22.82	21.80
		2535	23.41	22.56	21.45
		2502.5	23.63	22.74	21.62
	1RB-Middle	2567.5	23.70	22.83	21.80
		2535	23.45	22.59	21.49
		2502.5	23.66	22.88	21.78
	1RB-Low	2567.5	23.67	22.77	21.73
		2535	23.42	22.60	21.46
		2502.5	23.65	22.80	21.65
	12RB-High	2567.5	22.67	21.62	20.56
		2535	22.30	21.27	20.29
		2502.5	22.57	21.55	20.51
	12RB-Middle	2567.5	22.64	21.62	20.60
		2535	22.33	21.30	20.30
		2502.5	22.60	21.53	20.48
	12RB-Low	2567.5	22.68	21.62	20.58
		2535	22.36	21.32	20.33
		2502.5	22.61	21.56	20.55
	25RB	2567.5	22.67	21.68	20.57
		2535	22.36	21.33	20.30
		2502.5	22.58	21.58	20.50
10MHz	1RB-High	2565	23.67	22.79	21.64
		2535	23.42	22.63	21.47
		2505	23.53	22.74	21.55
	1RB-Middle	2565	23.69	22.85	21.72
		2535	23.45	22.56	21.39
		2505	23.63	22.73	21.73
	1RB-Low	2565	23.64	22.82	21.67
		2535	23.36	22.56	21.41
		2505	23.65	22.74	21.69
	25RB-High	2565	22.64	21.66	20.60
		2535	22.38	21.35	20.31
		2505	22.52	21.52	20.45
	25RB-Middle	2565	22.67	21.67	20.62
		2535	22.34	21.35	20.30
		2505	22.53	21.53	20.48

	25RB-Low	2565	22.65	21.66	20.61
		2535	22.33	21.33	20.29
		2505	22.53	21.54	20.46
	50RB	2565	22.65	21.58	20.58
		2535	22.38	21.37	20.30
		2505	22.58	21.54	20.47
15MHz	1RB-High	2562.5	23.62	22.84	21.65
		2535	23.38	22.59	21.41
		2507.5	23.40	22.59	21.48
	1RB-Middle	2562.5	23.65	22.91	21.66
		2535	23.41	22.57	21.47
		2507.5	23.53	22.74	21.59
	1RB-Low	2562.5	23.49	22.66	21.52
		2535	23.40	22.41	21.43
		2507.5	23.55	22.62	21.60
	36RB-High	2562.5	22.57	21.57	20.52
		2535	22.33	21.32	20.32
		2507.5	22.44	21.46	20.42
	36RB-Middle	2562.5	22.59	21.57	20.55
		2535	22.34	21.33	20.26
		2507.5	22.46	21.44	20.45
	36RB-Low	2562.5	22.58	21.57	20.55
		2535	22.35	21.30	20.29
		2507.5	22.47	21.48	20.50
	75RB	2562.5	22.54	21.58	20.55
		2535	22.31	21.32	20.33
		2507.5	22.51	21.43	20.44
20MHz	1RB-High	2560	23.38	22.53	21.41
		2535	23.21	22.47	21.28
		2510	23.16	22.30	21.16
	1RB-Middle	2560	23.42	22.62	21.50
		2535	23.26	22.40	21.32
		2510	23.35	22.53	21.40
	1RB-Low	2560	23.37	22.39	21.35
		2535	23.12	22.18	21.17
		2510	23.30	22.40	21.34
	50RB-High	2560	22.39	21.39	20.32
		2535	22.18	21.16	20.10
		2510	22.28	21.21	20.21
	50RB-Middle	2560	22.39	21.41	20.38
		2535	22.27	21.20	20.23
		2510	22.32	21.25	20.20
	50RB-Low	2560	22.45	21.45	20.39
		2535	22.22	21.21	20.17
		2510	22.31	21.29	20.23
	100RB	2560	22.41	21.38	20.33
		2535	22.18	21.18	20.13
		2510	22.28	21.22	20.20

LTE Band7(ANT31 DSI4)

Band 7					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
		2567.5	21.55	21.83	21.68

		2535	21.27	21.49	21.48
		2502.5	21.48	21.64	21.66
		2567.5	21.60	21.95	21.78
	1RB-Middle	2535	21.33	21.56	21.45
		2502.5	21.50	21.62	21.61
		2567.5	21.54	21.72	21.67
	1RB-Low	2535	21.30	21.48	21.44
		2502.5	21.51	21.70	21.65
		2567.5	21.56	21.60	20.51
	12RB-High	2535	21.25	21.28	20.24
		2502.5	21.49	21.49	20.48
		2567.5	21.55	21.55	20.51
	12RB-Middle	2535	21.24	21.29	20.23
		2502.5	21.47	21.50	20.45
		2567.5	21.60	21.57	20.59
	12RB-Low	2535	21.30	21.28	20.28
		2502.5	21.50	21.49	20.51
		2567.5	21.58	21.58	20.52
	25RB	2535	21.22	21.26	20.24
		2502.5	21.47	21.52	20.45
		2565	21.55	21.74	21.69
10MHz	1RB-High	2535	21.28	21.56	21.35
		2505	21.39	21.60	21.55
		2565	21.58	21.86	21.70
	1RB-Middle	2535	21.31	21.60	21.46
		2505	21.50	21.65	21.62
		2565	21.49	21.74	21.63
	1RB-Low	2535	21.23	21.38	21.34
		2505	21.48	21.56	21.59
		2565	21.58	21.60	20.55
	25RB-High	2535	21.31	21.34	20.26
		2505	21.47	21.49	20.43
		2565	21.55	21.61	20.57
	25RB-Middle	2535	21.27	21.29	20.27
		2505	21.44	21.47	20.44
		2565	21.55	21.63	20.55
	25RB-Low	2535	21.24	21.29	20.23
		2505	21.45	21.47	20.45
		2565	21.57	21.54	20.52
	50RB	2535	21.31	21.31	20.25
		2505	21.47	21.45	20.44
		2562.5	21.46	21.69	21.56
15MHz	1RB-High	2535	21.17	21.46	21.34
		2507.5	21.25	21.51	21.35
		2562.5	21.52	21.76	21.66
	1RB-Middle	2535	21.25	21.47	21.39
		2507.5	21.36	21.74	21.55
		2562.5	21.35	21.53	21.45
	1RB-Low	2535	21.22	21.44	21.34
		2507.5	21.38	21.63	21.52
		2562.5	21.48	21.51	20.55
	36RB-High	2535	21.28	21.26	20.27
		2507.5	21.35	21.36	20.33
		2562.5	21.49	21.49	20.49
	36RB-Middle	2535	21.24	21.23	20.24

	36RB-Low	2507.5	21.36	21.42	20.40
		2562.5	21.47	21.50	20.48
		2535	21.17	21.24	20.23
		2507.5	21.38	21.37	20.40
	75RB	2562.5	21.51	21.51	20.44
		2535	21.28	21.27	20.22
		2507.5	21.41	21.38	20.37
		2560	21.24	21.50	21.45
	1RB-High	2535	21.01	21.24	21.13
		2510	21.04	21.16	21.17
20MHz	1RB-Middle	2560	21.29	21.55	21.46
		2535	21.12	21.36	21.30
		2510	21.20	21.43	21.42
	1RB-Low	2560	21.13	21.39	21.30
		2535	21.03	21.25	21.12
		2510	21.14	21.41	21.23
	50RB-High	2560	21.28	21.30	20.25
		2535	21.07	21.09	20.05
		2510	21.21	21.17	20.16
	50RB-Middle	2560	21.35	21.37	20.34
		2535	21.13	21.14	20.09
		2510	21.21	21.20	20.18
	50RB-Low	2560	21.38	21.36	20.34
		2535	21.17	21.16	20.15
		2510	21.21	21.23	20.19
	100RB	2560	21.28	21.31	20.25
		2535	21.15	21.11	20.12
		2510	21.19	21.16	20.17

LTE Band7(ANT31 DSI8/9/10)

Band 7					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2567.5	19.35	19.58	19.54
		2535	18.99	19.30	19.18
		2502.5	19.14	19.39	19.28
	1RB-Middle	2567.5	19.29	19.67	19.53
		2535	19.01	19.27	19.18
		2502.5	19.13	19.47	19.26
	1RB-Low	2567.5	19.27	19.57	19.42
		2535	19.01	19.21	19.13
		2502.5	19.14	19.44	19.26
	12RB-High	2567.5	19.36	19.32	19.41
		2535	18.99	18.91	18.95
		2502.5	19.18	19.13	19.21
	12RB-Middle	2567.5	19.34	19.35	19.34
		2535	19.06	19.01	19.07
		2502.5	19.12	19.10	19.20
	12RB-Low	2567.5	19.38	19.36	19.38
		2535	19.01	19.04	19.11
		2502.5	19.19	19.16	19.19
	25RB	2567.5	19.34	19.37	19.38
		2535	19.00	19.07	19.03
		2502.5	19.16	19.18	19.21

10MHz	1RB-High	2565	19.31	19.48	19.44
		2535	18.97	19.20	19.20
		2505	19.08	19.43	19.29
	1RB-Middle	2565	19.29	19.64	19.46
		2535	19.02	19.21	19.19
		2505	19.12	19.39	19.23
	1RB-Low	2565	19.21	19.52	19.40
		2535	19.00	19.18	19.16
		2505	19.10	19.32	19.26
	25RB-High	2565	19.29	19.37	19.37
		2535	19.00	19.05	19.00
		2505	19.09	19.16	19.11
	25RB-Middle	2565	19.29	19.32	19.31
		2535	19.02	19.02	19.07
		2505	19.11	19.15	19.20
	25RB-Low	2565	19.36	19.35	19.35
		2535	19.06	19.05	19.07
		2505	19.12	19.16	19.11
	50RB	2565	19.30	19.36	19.33
		2535	19.04	19.06	19.07
		2505	19.14	19.12	19.13
15MHz	1RB-High	2562.5	19.24	19.64	19.47
		2535	18.95	19.29	19.12
		2507.5	18.98	19.29	19.14
	1RB-Middle	2562.5	19.25	19.60	19.35
		2535	18.98	19.24	19.18
		2507.5	19.05	19.35	19.24
	1RB-Low	2562.5	19.11	19.34	19.25
		2535	18.94	19.25	19.09
		2507.5	19.07	19.27	19.23
	36RB-High	2562.5	19.30	19.29	19.29
		2535	18.97	18.92	18.97
		2507.5	19.09	19.10	19.12
	36RB-Middle	2562.5	19.22	19.24	19.31
		2535	18.97	19.04	19.05
		2507.5	19.07	19.05	19.14
	36RB-Low	2562.5	19.18	19.25	19.26
		2535	19.05	18.99	19.04
		2507.5	19.06	19.07	19.06
	75RB	2562.5	19.27	19.27	19.27
		2535	19.03	18.98	19.00
		2507.5	19.10	19.11	19.09
20MHz	1RB-High	2560	19.34	19.65	19.54
		2535	19.04	19.25	19.16
		2510	19.06	19.30	19.29
	1RB-Middle	2560	19.30	19.59	19.45
		2535	19.13	19.35	19.26
		2510	19.20	19.54	19.40
	1RB-Low	2560	19.16	19.35	19.27
		2535	19.03	19.19	19.10
		2510	19.18	19.35	19.37
	50RB-High	2560	19.31	19.35	19.34
		2535	19.07	19.08	19.06
		2510	19.25	19.20	19.25
	50RB-Middle	2560	19.34	19.35	19.37

		2535	19.18	19.12	19.12
		2510	19.25	19.27	19.26
		2560	19.37	19.37	19.40
	50RB-Low	2535	19.19	19.18	19.19
		2510	19.27	19.21	19.21
		2560	19.31	19.38	19.36
	100RB	2535	19.15	19.12	19.11
		2510	19.24	19.17	19.20

LTE Band12(ANT13 DSI2/3)

Band 12					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	715.3	20.31	20.53	20.57
		707.5	20.29	20.53	20.45
		699.7	20.38	20.74	20.62
	1RB-Middle	715.3	20.39	20.56	20.55
		707.5	20.31	20.55	20.49
		699.7	20.37	20.70	20.61
	1RB-Low	715.3	20.34	20.64	20.48
		707.5	20.34	20.69	20.49
		699.7	20.41	20.66	20.64
	3RB-High	715.3	20.37	20.40	20.50
		707.5	20.33	20.32	20.46
		699.7	20.41	20.40	20.51
	3RB-Middle	715.3	20.37	20.39	20.47
		707.5	20.33	20.35	20.43
		699.7	20.37	20.46	20.51
	3RB-Low	715.3	20.35	20.30	20.44
		707.5	20.33	20.38	20.44
		699.7	20.40	20.46	20.49
	6RB	715.3	20.41	20.48	20.40
		707.5	20.33	20.39	20.29
		699.7	20.45	20.47	20.42
3MHz	1RB-High	714.5	20.32	20.54	20.48
		707.5	20.24	20.53	20.41
		700.5	20.39	20.62	20.64
	1RB-Middle	714.5	20.35	20.62	20.55
		707.5	20.38	20.70	20.53
		700.5	20.43	20.71	20.68
	1RB-Low	714.5	20.35	20.59	20.51
		707.5	20.34	20.67	20.51
		700.5	20.43	20.69	20.62
	8RB-High	714.5	20.33	20.43	20.38
		707.5	20.29	20.42	20.37
		700.5	20.39	20.49	20.50
	8RB-Middle	714.5	20.30	20.38	20.37
		707.5	20.32	20.42	20.39
		700.5	20.36	20.52	20.49
	8RB-Low	714.5	20.39	20.47	20.43
		707.5	20.29	20.36	20.39
		700.5	20.36	20.51	20.50
	15RB	714.5	20.31	20.37	20.30
		707.5	20.30	20.33	20.26

5MHz	1RB-High	700.5	20.40	20.47	20.45
		713.5	20.39	20.55	20.55
		707.5	20.32	20.43	20.48
	1RB-Middle	701.5	20.44	20.64	20.58
		713.5	20.42	20.70	20.56
		707.5	20.38	20.57	20.56
	1RB-Low	701.5	20.44	20.58	20.69
		713.5	20.40	20.65	20.57
		707.5	20.39	20.68	20.50
	12RB-High	701.5	20.44	20.59	20.55
		713.5	20.26	20.24	20.29
		707.5	20.31	20.32	20.31
	12RB-Middle	701.5	20.44	20.43	20.45
		713.5	20.40	20.35	20.43
		707.5	20.34	20.36	20.40
	12RB-Low	701.5	20.37	20.44	20.45
		713.5	20.37	20.40	20.41
		707.5	20.36	20.36	20.38
	25RB	701.5	20.34	20.43	20.41
		713.5	20.33	20.33	20.37
		707.5	20.30	20.34	20.37
10MHz	1RB-High	701.5	20.36	20.45	20.45
		711	20.37	20.64	20.48
		707.5	20.33	20.56	20.41
	1RB-Middle	704	20.35	20.63	20.50
		711	20.41	20.59	20.47
		707.5	20.52	20.78	20.62
	1RB-Low	704	20.54	20.66	20.65
		711	20.46	20.61	20.47
		707.5	20.46	20.71	20.60
	25RB-High	704	20.51	20.73	20.71
		711	20.32	20.36	20.32
		707.5	20.38	20.40	20.36
	25RB-Middle	704	20.48	20.49	20.49
		711	20.37	20.40	20.43
		707.5	20.42	20.45	20.48
	25RB-Low	704	20.42	20.50	20.49
		711	20.42	20.45	20.48
		707.5	20.42	20.47	20.43
	50RB	704	20.31	20.35	20.38
		711	20.36	20.42	20.40
		707.5	20.38	20.43	20.41
		704	20.39	20.42	20.45

LTE Band12(ANT13 DSI4/8/9/10)

Band 12					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	715.3	23.26	22.65	21.54
		707.5	23.17	22.54	21.55
		699.7	23.31	22.73	21.55
	1RB-Middle	715.3	23.25	22.61	21.54
		707.5	23.20	22.54	21.54

	1RB-Low	699.7	23.32	22.73	21.61
		715.3	23.23	22.49	21.55
		707.5	23.23	22.67	21.56
	3RB-High	699.7	23.36	22.72	21.62
		715.3	23.31	22.46	21.48
		707.5	23.20	22.33	21.39
	3RB-Middle	699.7	23.32	22.57	21.56
		715.3	23.29	22.52	21.45
		707.5	23.20	22.40	21.48
	3RB-Low	699.7	23.37	22.56	21.54
		715.3	23.25	22.45	21.46
		707.5	23.21	22.39	21.43
	6RB	699.7	23.38	22.51	21.55
		715.3	22.44	21.49	20.35
		707.5	22.37	21.39	20.31
3MHz	1RB-High	699.7	22.52	21.54	20.46
		714.5	23.24	22.54	21.56
		707.5	23.15	22.46	21.43
	1RB-Middle	700.5	23.31	22.69	21.58
		714.5	23.28	22.63	21.56
		707.5	23.28	22.62	21.49
	1RB-Low	700.5	23.42	22.70	21.65
		714.5	23.18	22.54	21.47
		707.5	23.23	22.51	21.55
	8RB-High	700.5	23.36	22.71	21.65
		714.5	22.36	21.43	20.40
		707.5	22.31	21.40	20.35
	8RB-Middle	700.5	22.47	21.50	20.49
		714.5	22.38	21.43	20.36
		707.5	22.36	21.43	20.37
	8RB-Low	700.5	22.45	21.49	20.47
		714.5	22.41	21.48	20.46
		707.5	22.39	21.40	20.38
5MHz	12RB-High	700.5	22.49	21.52	20.53
		714.5	22.35	21.40	20.32
		707.5	22.34	21.36	20.31
	12RB-Middle	700.5	22.43	21.49	20.42
		713.5	23.29	22.58	21.55
		707.5	23.20	22.50	21.44
	12RB-Low	701.5	23.35	22.64	21.65
		713.5	23.32	22.62	21.57
		707.5	23.32	22.53	21.53
	6RB	701.5	23.38	22.60	21.71
		713.5	23.27	22.61	21.54
		707.5	23.29	22.57	21.58
	3RB-High	701.5	23.38	22.60	21.62
		713.5	22.29	21.28	20.28
		707.5	22.33	21.33	20.34
	3RB-Middle	701.5	22.50	21.47	20.44
		713.5	22.40	21.42	20.43
		707.5	22.42	21.31	20.39
	3RB-Low	701.5	22.47	21.43	20.46
		713.5	22.40	21.39	20.40
		707.5	22.39	21.38	20.40
	1RB	701.5	22.45	21.41	20.41

10MHz	25RB	713.5	22.37	21.37	20.31
		707.5	22.36	21.35	20.34
		701.5	22.47	21.45	20.47
	1RB-High	711	23.30	22.65	21.53
		707.5	23.22	22.59	21.47
		704	23.29	22.63	21.53
	1RB-Middle	711	23.33	22.60	21.49
		707.5	23.42	22.77	21.58
		704	23.49	22.81	21.68
	1RB-Low	711	23.35	22.71	21.63
		707.5	23.39	22.74	21.63
		704	23.50	22.68	21.69
	25RB-High	711	22.36	21.33	20.32
		707.5	22.43	21.44	20.40
		704	22.54	21.53	20.49
	25RB-Middle	711	22.39	21.45	20.44
		707.5	22.45	21.50	20.49
		704	22.55	21.54	20.53
	25RB-Low	711	22.47	21.51	20.48
		707.5	22.49	21.52	20.47
		704	22.38	21.41	20.40
	50RB	711	22.41	21.41	20.42
		707.5	22.46	21.42	20.40
		704	22.49	21.50	20.46

LTE Band12(ANT41 DSI2/3/4/8/9/10)

Band 12					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
1.4MHz	1RB-High	715.3	23.52	22.83	21.78
		707.5	23.46	22.85	21.68
		699.7	23.62	22.93	21.92
	1RB-Middle	715.3	23.48	22.83	21.79
		707.5	23.49	22.83	21.70
		699.7	23.64	22.97	21.89
	1RB-Low	715.3	23.53	22.80	21.81
		707.5	23.51	22.79	21.83
		699.7	23.59	22.95	21.91
	3RB-High	715.3	23.51	22.62	21.72
		707.5	23.45	22.65	21.69
		699.7	23.61	22.79	21.77
	3RB-Middle	715.3	23.51	22.64	21.70
		707.5	23.47	22.59	21.66
		699.7	23.62	22.82	21.86
	3RB-Low	715.3	23.49	22.62	21.65
		707.5	23.48	22.70	21.69
		699.7	23.59	22.81	21.83
	6RB	715.3	22.65	21.73	20.59
		707.5	22.64	21.68	20.49
		699.7	22.80	21.82	20.68
3MHz	1RB-High	714.5	23.52	22.87	21.78
		707.5	23.41	22.76	21.71
		700.5	23.57	22.94	21.78
	1RB-Middle	714.5	23.54	22.77	21.74

		707.5	23.57	22.87	21.76
		700.5	23.67	23.01	21.89
		714.5	23.47	22.82	21.76
	1RB-Low	707.5	23.52	22.81	21.73
		700.5	23.65	23.04	21.93
		714.5	22.60	21.69	20.57
	8RB-High	707.5	22.60	21.66	20.57
		700.5	22.74	21.79	20.70
		714.5	22.63	21.67	20.57
	8RB-Middle	707.5	22.62	21.70	20.58
		700.5	22.71	21.79	20.70
		714.5	22.67	21.66	20.67
	8RB-Low	707.5	22.64	21.68	20.59
		700.5	22.73	21.78	20.74
		714.5	22.58	21.61	20.55
5MHz	1RB-High	707.5	22.61	21.67	20.59
		700.5	22.69	21.74	20.66
		713.5	23.54	22.84	21.75
	1RB-Middle	707.5	23.50	22.73	21.64
		701.5	23.64	22.93	21.78
		713.5	23.60	22.80	21.77
	1RB-Low	707.5	23.52	22.92	21.84
		701.5	23.66	22.84	21.87
		713.5	23.54	22.79	21.78
	12RB-High	707.5	23.56	22.82	21.83
		701.5	23.67	22.89	21.86
		713.5	22.50	21.47	20.47
	12RB-Middle	707.5	22.59	21.54	20.60
		701.5	22.75	21.68	20.68
		713.5	22.67	21.63	20.63
	12RB-Low	707.5	22.63	21.65	20.64
		701.5	22.73	21.74	20.71
		713.5	22.66	21.60	20.64
	25RB	707.5	22.68	21.65	20.67
		701.5	22.68	21.62	20.63
		713.5	22.56	21.58	20.54
10MHz	1RB-High	707.5	22.63	21.66	20.58
		701.5	22.69	21.74	20.65
		711	23.47	22.77	21.71
	1RB-Middle	707.5	23.45	22.82	21.68
		704	23.49	22.79	21.67
		711	23.56	22.89	21.77
	1RB-Low	707.5	23.65	22.98	21.88
		704	23.65	22.90	21.89
		711	23.54	22.90	21.83
	25RB-High	707.5	23.58	22.97	21.77
		704	23.68	22.95	21.83
		711	22.58	21.58	20.55
	25RB-Middle	707.5	22.69	21.68	20.61
		704	22.69	21.69	20.63
		711	22.63	21.61	20.59
	25RB-Low	707.5	22.71	21.70	20.67
		704	22.71	21.75	20.70
		711	22.56	21.60	20.54
		707.5	22.67	21.66	20.62

	50RB	704	22.77	21.78	20.74
		711	22.64	21.58	20.57
		707.5	22.64	21.61	20.57
		704	22.71	21.64	20.66

LTE Band38(ANT13 DSI2/3)

Band 38					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2617.5	18.19	18.34	18.07
		2595	18.20	18.31	18.09
		2572.5	18.09	18.23	17.98
	1RB-Middle	2617.5	18.20	18.31	18.06
		2595	18.24	18.34	18.11
		2572.5	18.15	18.27	18.03
	1RB-Low	2617.5	18.20	18.33	18.08
		2595	18.23	18.32	18.12
		2572.5	18.15	18.25	18.01
	12RB-High	2617.5	18.11	18.13	18.18
		2595	18.12	18.14	18.18
		2572.5	18.06	18.04	18.10
	12RB-Middle	2617.5	18.09	18.10	18.13
		2595	18.14	18.12	18.19
		2572.5	18.04	18.04	18.07
	12RB-Low	2617.5	18.14	18.14	18.18
		2595	18.15	18.17	18.20
		2572.5	18.06	18.05	18.11
	25RB	2617.5	18.08	18.15	18.16
		2595	18.16	18.18	18.20
		2572.5	18.02	18.09	18.10
10MHz	1RB-High	2615	18.12	18.30	18.02
		2595	18.14	18.30	18.03
		2575	18.09	18.24	17.97
	1RB-Middle	2615	18.16	18.35	18.06
		2595	18.17	18.35	18.08
		2575	18.10	18.29	18.00
	1RB-Low	2615	18.20	18.38	18.10
		2595	18.23	18.38	18.10
		2575	18.14	18.30	18.02
	25RB-High	2615	18.07	18.13	18.16
		2595	18.09	18.12	18.16
		2575	18.04	18.07	18.11
	25RB-Middle	2615	18.10	18.13	18.15
		2595	18.12	18.13	18.19
		2575	18.05	18.10	18.13
	25RB-Low	2615	18.13	18.19	18.22
		2595	18.15	18.19	18.25
		2575	18.03	18.10	18.13
	50RB	2615	18.13	18.16	18.16
		2595	18.14	18.17	18.15
		2575	18.09	18.12	18.09
15MHz	1RB-High	2612.5	18.04	18.22	17.96
		2595	18.06	18.23	17.98
		2577.5	18.05	18.18	17.95

	1RB-Middle	2612.5	18.12	18.30	18.03
		2595	18.17	18.31	18.08
		2577.5	18.08	18.24	17.98
	1RB-Low	2612.5	18.13	18.31	18.04
		2595	18.09	18.28	18.02
		2577.5	18.04	18.22	17.98
	36RB-High	2612.5	18.03	18.02	18.04
		2595	18.07	18.07	18.07
		2577.5	18.04	18.05	18.08
	36RB-Middle	2612.5	18.12	18.08	18.11
		2595	18.12	18.11	18.16
		2577.5	18.09	18.05	18.08
	36RB-Low	2612.5	18.14	18.14	18.17
		2595	18.13	18.13	18.15
		2577.5	18.06	18.06	18.11
	75RB	2612.5	18.12	18.13	18.14
		2595	18.12	18.12	18.15
		2577.5	18.09	18.09	18.09
20MHz	1RB-High	2610	18.16	18.17	17.76
		2595	18.08	18.10	17.68
		2580	18.15	18.18	17.81
	1RB-Middle	2610	18.22	18.23	17.83
		2595	18.27	18.27	17.86
		2580	18.33	18.31	17.96
	1RB-Low	2610	18.18	18.21	17.82
		2595	18.23	18.19	17.78
		2580	18.16	18.16	17.77
	50RB-High	2610	18.18	18.20	18.18
		2595	18.13	18.12	18.14
		2580	18.15	18.13	18.16
	50RB-Middle	2610	18.23	18.25	18.21
		2595	18.21	18.21	18.20
		2580	18.18	18.23	18.22
	50RB-Low	2610	18.20	18.26	18.23
		2595	18.20	18.23	18.22
		2580	18.27	18.34	18.30
	100RB	2610	18.18	18.20	18.18
		2595	18.17	18.13	18.23
		2580	18.19	18.20	18.20

LTE Band38(ANT13 DSI4)

Band 38					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2617.5	23.31	22.39	21.17
		2595	23.32	22.38	21.18
		2572.5	23.22	22.32	21.09
	1RB-Middle	2617.5	23.36	22.42	21.20
		2595	23.36	22.42	21.25
		2572.5	23.29	22.34	21.16
	1RB-Low	2617.5	23.33	22.38	21.20
		2595	23.35	22.42	21.23
		2572.5	23.25	22.32	21.14
	12RB-High	2617.5	22.21	21.21	20.24

		2595	22.21	21.23	20.24
		2572.5	22.15	21.14	20.17
		2617.5	22.21	21.21	20.26
	12RB-Middle	2595	22.24	21.25	20.28
		2572.5	22.13	21.16	20.16
		2617.5	22.25	21.24	20.27
	12RB-Low	2595	22.29	21.29	20.31
		2572.5	22.16	21.16	20.20
		2617.5	22.22	21.25	20.26
	25RB	2595	22.26	21.29	20.28
		2572.5	22.16	21.20	20.19
		2615	23.28	22.36	21.15
10MHz	1RB-High	2595	23.26	22.37	21.14
		2575	23.20	22.33	21.09
		2615	23.30	22.43	21.21
	1RB-Middle	2595	23.33	22.45	21.22
		2575	23.26	22.38	21.16
		2615	23.33	22.42	21.22
	1RB-Low	2595	23.34	22.46	21.24
		2575	23.25	22.36	21.14
		2615	22.21	21.25	20.27
	25RB-High	2595	22.20	21.24	20.25
		2575	22.16	21.20	20.21
		2615	22.20	21.22	20.24
	25RB-Middle	2595	22.22	21.25	20.26
		2575	22.18	21.22	20.20
		2615	22.25	21.29	20.31
	25RB-Low	2595	22.27	21.31	20.31
		2575	22.16	21.20	20.20
		2615	22.26	21.28	20.25
	50RB	2595	22.27	21.28	20.23
		2575	22.20	21.24	20.17
		2612.5	23.19	22.29	21.10
15MHz	1RB-High	2595	23.20	22.30	21.10
		2577.5	23.19	22.29	21.07
		2612.5	23.26	22.37	21.17
	1RB-Middle	2595	23.32	22.42	21.22
		2577.5	23.21	22.34	21.13
		2612.5	23.25	22.36	21.16
	1RB-Low	2595	23.23	22.35	21.15
		2577.5	23.19	22.31	21.10
		2612.5	22.15	21.15	20.13
	36RB-High	2595	22.16	21.17	20.16
		2577.5	22.16	21.15	20.16
		2612.5	22.22	21.20	20.20
	36RB-Middle	2595	22.23	21.22	20.23
		2577.5	22.17	21.18	20.16
		2612.5	22.25	21.23	20.25
	36RB-Low	2595	22.23	21.22	20.21
		2577.5	22.18	21.17	20.17
		2612.5	22.23	21.25	20.22
	75RB	2595	22.22	21.23	20.22
		2577.5	22.20	21.20	20.18
		2610	23.10	22.06	20.69
20MHz	1RB-High	2595	23.03	22.00	20.66

	1RB-Middle	2580	23.08	22.07	20.69
		2610	23.28	22.18	20.85
		2595	23.25	22.19	20.84
		2580	23.26	22.14	20.78
	1RB-Low	2610	23.13	22.12	20.76
		2595	23.16	22.08	20.73
		2580	23.12	22.09	20.73
	50RB-High	2610	22.11	21.12	20.07
		2595	22.06	21.07	20.04
		2580	22.10	21.10	20.08
	50RB-Middle	2610	22.15	21.17	20.13
		2595	22.14	21.15	20.13
		2580	22.15	21.16	20.12
	50RB-Low	2610	22.17	21.19	20.13
		2595	22.16	21.18	20.14
		2580	22.15	21.16	20.12
	100RB	2610	22.13	21.13	20.09
		2595	22.11	21.12	20.10
		2580	22.11	21.13	20.11

LTE Band38(ANT13 DSI8/9/10)

Band 38					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2617.5	19.99	20.07	19.59
		2595	19.91	19.95	19.52
		2572.5	19.90	19.92	19.55
	1RB-Middle	2617.5	20.02	20.05	19.67
		2595	20.01	19.98	19.65
		2572.5	19.95	19.93	19.62
	1RB-Low	2617.5	19.96	20.01	19.62
		2595	19.97	20.02	19.59
		2572.5	19.90	19.88	19.53
	12RB-High	2617.5	19.93	19.89	19.97
		2595	19.85	19.81	19.88
		2572.5	19.79	19.75	19.85
	12RB-Middle	2617.5	19.91	19.88	19.95
		2595	19.86	19.85	19.92
		2572.5	19.81	19.79	19.88
	12RB-Low	2617.5	19.92	19.87	19.96
		2595	19.92	19.85	19.95
		2572.5	19.85	19.79	19.90
	25RB	2617.5	19.93	19.96	19.99
		2595	19.87	19.91	19.94
		2572.5	19.83	19.85	19.88
10MHz	1RB-High	2615	19.89	19.95	19.58
		2595	19.83	19.88	19.49
		2575	19.81	19.98	19.56
	1RB-Middle	2615	19.94	19.98	19.60
		2595	19.92	19.97	19.61
		2575	19.89	19.97	19.58
	1RB-Low	2615	19.88	19.93	19.57
		2595	19.93	20.00	19.62
		2575	19.85	19.93	19.59

	25RB-High	2615	19.92	19.91	19.99
		2595	19.81	19.83	19.90
		2575	19.82	19.89	19.95
	25RB-Middle	2615	19.91	19.91	19.98
		2595	19.85	19.87	19.93
		2575	19.85	19.89	19.93
	25RB-Low	2615	19.86	19.90	19.94
		2595	19.89	19.92	19.97
		2575	19.81	19.88	19.91
	50RB	2615	19.92	19.92	19.95
		2595	19.87	19.92	19.91
		2575	19.86	19.92	19.90
15MHz	1RB-High	2612.5	19.85	19.93	19.52
		2595	19.79	19.82	19.43
		2577.5	19.85	19.88	19.50
	1RB-Middle	2612.5	19.89	19.95	19.56
		2595	19.89	19.96	19.58
		2577.5	19.87	19.93	19.54
	1RB-Low	2612.5	19.85	19.91	19.49
		2595	19.91	19.93	19.54
		2577.5	19.85	19.89	19.48
	36RB-High	2612.5	19.84	19.83	19.83
		2595	19.79	19.77	19.79
		2577.5	19.82	19.81	19.83
	36RB-Middle	2612.5	19.84	19.83	19.84
		2595	19.86	19.85	19.86
		2577.5	19.85	19.83	19.84
	36RB-Low	2612.5	19.84	19.80	19.82
		2595	19.88	19.86	19.90
		2577.5	19.85	19.80	19.84
	75RB	2612.5	19.87	19.87	19.87
		2595	19.84	19.85	19.86
		2577.5	19.87	19.88	19.88
20MHz	1RB-High	2610	19.67	19.88	19.60
		2595	19.68	19.88	19.56
		2580	19.77	19.92	19.71
	1RB-Middle	2610	19.72	19.89	19.64
		2595	19.81	19.99	19.73
		2580	19.85	20.03	19.79
	1RB-Low	2610	19.77	19.97	19.73
		2595	19.81	20.02	19.70
		2580	19.89	20.07	19.75
	50RB-High	2610	19.67	19.72	19.67
		2595	19.66	19.72	19.68
		2580	19.80	19.85	19.82
	50RB-Middle	2610	19.72	19.76	19.73
		2595	19.76	19.82	19.78
		2580	19.82	19.86	19.83
	50RB-Low	2610	19.73	19.79	19.75
		2595	19.81	19.87	19.83
		2580	19.84	19.87	19.84
	100RB	2610	19.70	19.72	19.72
		2595	19.72	19.77	19.73
		2580	19.79	19.83	19.81

LTE Band38(ANT31 DSI2/3)

Band 38					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2617.5	23.55	22.60	21.37
		2595	23.70	22.75	21.52
		2572.5	23.71	22.78	21.56
	1RB-Middle	2617.5	23.59	22.64	21.44
		2595	23.78	22.81	21.62
		2572.5	23.75	22.81	21.58
	1RB-Low	2617.5	23.57	22.62	21.42
		2595	23.76	22.81	21.60
		2572.5	23.72	22.76	21.56
	12RB-High	2617.5	22.43	21.42	20.45
		2595	22.60	21.57	20.61
		2572.5	22.62	21.58	20.61
	12RB-Middle	2617.5	22.45	21.42	20.43
		2595	22.64	21.61	20.64
		2572.5	22.59	21.59	20.58
	12RB-Low	2617.5	22.45	21.46	20.48
		2595	22.68	21.63	20.66
		2572.5	22.64	21.61	20.62
	25RB	2617.5	22.44	21.47	20.44
		2595	22.63	21.65	20.64
		2572.5	22.60	21.65	20.60
10MHz	1RB-High	2615	23.52	22.57	21.35
		2595	23.65	22.72	21.47
		2575	23.68	22.79	21.52
	1RB-Middle	2615	23.56	22.66	21.41
		2595	23.74	22.84	21.59
		2575	23.74	22.84	21.58
	1RB-Low	2615	23.61	22.70	21.45
		2595	23.78	22.88	21.63
		2575	23.71	22.82	21.54
	25RB-High	2615	22.41	21.45	20.44
		2595	22.59	21.59	20.59
		2575	22.64	21.65	20.63
	25RB-Middle	2615	22.43	21.45	20.44
		2595	22.61	21.62	20.61
		2575	22.63	21.66	20.64
	25RB-Low	2615	22.49	21.53	20.51
		2595	22.67	21.70	20.68
		2575	22.62	21.64	20.62
	50RB	2615	22.48	21.50	20.42
		2595	22.65	21.64	20.57
		2575	22.67	21.68	20.61
15MHz	1RB-High	2612.5	23.43	22.51	21.28
		2595	23.53	22.63	21.41
		2577.5	23.64	22.75	21.51
	1RB-Middle	2612.5	23.51	22.64	21.38
		2595	23.70	22.81	21.58
		2577.5	23.68	22.81	21.58
	1RB-Low	2612.5	23.54	22.66	21.43
		2595	23.68	22.79	21.55
		2577.5	23.64	22.76	21.54

	36RB-High	2612.5	22.36	21.36	20.33
		2595	22.51	21.52	20.50
		2577.5	22.64	21.60	20.60
	36RB-Middle	2612.5	22.46	21.44	20.43
		2595	22.62	21.61	20.60
		2577.5	22.65	21.62	20.61
	36RB-Low	2612.5	22.52	21.51	20.52
		2595	22.64	21.62	20.63
		2577.5	22.65	21.61	20.59
	75RB	2612.5	22.48	21.50	20.45
		2595	22.60	21.59	20.58
		2577.5	22.66	21.65	20.64
20MHz	1RB-High	2610	23.31	22.25	20.87
		2595	23.30	22.24	20.87
		2580	23.46	22.38	21.04
	1RB-Middle	2610	23.43	22.34	20.98
		2595	23.56	22.48	21.11
		2580	23.62	22.56	21.18
	1RB-Low	2610	23.45	22.37	20.99
		2595	23.54	22.44	21.08
		2580	23.52	22.42	21.07
	50RB-High	2610	22.28	21.29	20.23
		2595	22.34	21.33	20.28
		2580	22.46	21.47	20.41
	50RB-Middle	2610	22.37	21.37	20.33
		2595	22.45	21.44	20.39
		2580	22.51	21.52	20.46
	50RB-Low	2610	22.39	21.41	20.35
		2595	22.49	21.50	20.43
		2580	22.52	21.52	20.46
	100RB	2610	22.32	21.33	20.28
		2595	22.40	21.41	20.35
		2580	22.47	21.48	20.40

LTE Band38(ANT31 DSI4)

Band 38					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2617.5	20.76	20.85	20.48
		2595	20.85	20.91	20.55
		2572.5	20.87	20.91	20.55
	1RB-Middle	2617.5	20.79	20.82	20.46
		2595	20.90	20.89	20.59
		2572.5	20.91	20.92	20.61
	1RB-Low	2617.5	20.74	20.82	20.47
		2595	20.94	20.93	20.59
		2572.5	20.87	20.92	20.57
	12RB-High	2617.5	20.70	20.66	20.26
		2595	20.80	20.75	20.34
		2572.5	20.79	20.76	20.34
	12RB-Middle	2617.5	20.70	20.67	20.25
		2595	20.83	20.78	20.38
		2572.5	20.82	20.79	20.36
	12RB-Low	2617.5	20.72	20.68	20.26

	25RB	2595	20.87	20.81	20.40
		2572.5	20.85	20.81	20.40
		2617.5	20.73	20.74	20.28
		2595	20.84	20.88	20.41
		2572.5	20.83	20.86	20.40
10MHz	1RB-High	2615	20.72	20.75	20.36
		2595	20.75	20.79	20.40
		2575	20.88	20.88	20.59
	1RB-Middle	2615	20.74	20.80	20.41
		2595	20.84	20.88	20.56
		2575	20.90	20.92	20.57
	1RB-Low	2615	20.72	20.73	20.39
		2595	20.89	20.95	20.57
		2575	20.86	20.88	20.58
	25RB-High	2615	20.68	20.72	20.24
		2595	20.74	20.77	20.31
		2575	20.87	20.88	20.42
	25RB-Middle	2615	20.69	20.72	20.24
		2595	20.79	20.80	20.35
		2575	20.85	20.87	20.41
	25RB-Low	2615	20.69	20.71	20.24
		2595	20.85	20.86	20.41
		2575	20.83	20.87	20.38
	50RB	2615	20.72	20.74	20.21
		2595	20.81	20.84	20.33
		2575	20.87	20.89	20.38
15MHz	1RB-High	2612.5	20.60	20.68	20.29
		2595	20.64	20.72	20.34
		2577.5	20.82	20.88	20.50
	1RB-Middle	2612.5	20.65	20.74	20.38
		2595	20.83	20.88	20.51
		2577.5	20.88	20.92	20.53
	1RB-Low	2612.5	20.68	20.75	20.39
		2595	20.85	20.91	20.53
		2577.5	20.81	20.86	20.48
	36RB-High	2612.5	20.60	20.60	20.12
		2595	20.69	20.68	20.20
		2577.5	20.84	20.84	20.35
	36RB-Middle	2612.5	20.63	20.62	20.12
		2595	20.78	20.77	20.30
		2577.5	20.84	20.84	20.36
	36RB-Low	2612.5	20.67	20.65	20.17
		2595	20.83	20.85	20.35
		2577.5	20.83	20.82	20.33
	75RB	2612.5	20.66	20.69	20.18
		2595	20.77	20.80	20.29
		2577.5	20.87	20.87	20.38
20MHz	1RB-High	2610	20.67	20.89	20.59
		2595	20.68	20.93	20.64
		2580	20.81	21.04	20.75
	1RB-Middle	2610	20.79	20.99	20.70
		2595	20.93	21.09	20.82
		2580	20.96	21.11	20.87
	1RB-Low	2610	20.83	20.99	20.74
		2595	20.95	21.15	20.86

	50RB-High	2580	20.80	20.99	20.74
		2610	20.75	20.80	20.25
		2595	20.78	20.82	20.28
		2580	20.90	20.96	20.41
	50RB-Middle	2610	20.81	20.86	20.32
		2595	20.88	20.92	20.39
		2580	20.92	20.96	20.42
		2610	20.85	20.90	20.34
	50RB-Low	2595	20.91	20.99	20.43
		2580	20.89	20.95	20.41
		2610	20.80	20.82	20.28
		2595	20.85	20.88	20.34
	100RB	2580	20.87	20.93	20.39

LTE Band38(ANT31 DSI8/9/10)

Band 38					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2617.5	18.83	18.86	18.46
		2595	18.89	18.94	18.56
		2572.5	18.97	18.98	18.61
	1RB-Middle	2617.5	18.85	18.84	18.51
		2595	18.96	18.95	18.60
		2572.5	19.00	19.01	18.63
	1RB-Low	2617.5	18.82	18.85	18.46
		2595	18.99	19.10	18.64
		2572.5	18.99	18.96	18.59
	12RB-High	2617.5	18.76	18.71	18.80
		2595	18.86	18.81	18.90
		2572.5	18.87	18.84	18.90
	12RB-Middle	2617.5	18.78	18.72	18.79
		2595	18.88	18.82	18.90
		2572.5	18.89	18.89	18.88
	12RB-Low	2617.5	18.77	18.73	18.82
		2595	18.92	18.89	18.96
		2572.5	18.92	18.78	18.89
	25RB	2617.5	18.76	18.81	18.83
		2595	18.90	18.93	18.94
		2572.5	18.91	18.87	18.90
10MHz	1RB-High	2615	18.79	18.83	18.43
		2595	18.86	18.93	18.55
		2575	19.00	19.09	18.56
	1RB-Middle	2615	18.80	18.84	18.44
		2595	18.95	18.98	18.61
		2575	18.97	19.03	18.62
	1RB-Low	2615	18.79	18.82	18.44
		2595	19.01	19.08	18.68
		2575	18.99	19.00	18.62
	25RB-High	2615	18.73	18.78	18.81
		2595	18.84	18.90	18.81
		2575	18.93	19.00	18.98
	25RB-Middle	2615	18.76	18.79	18.82
		2595	18.88	18.91	18.96
		2575	18.93	18.97	19.00

	25RB-Low	2615	18.76	18.78	18.83
		2595	18.95	18.97	19.01
		2575	18.91	18.96	18.99
	50RB	2615	18.77	18.81	18.79
		2595	18.90	18.97	18.88
		2575	18.96	19.00	18.98
15MHz	1RB-High	2612.5	18.73	18.79	18.37
		2595	18.78	18.81	18.44
		2577.5	18.94	18.99	18.60
	1RB-Middle	2612.5	18.78	18.81	18.41
		2595	18.91	19.07	18.64
		2577.5	18.96	19.01	18.61
	1RB-Low	2612.5	18.81	18.97	18.37
		2595	18.97	19.02	18.62
		2577.5	18.93	18.96	18.58
	36RB-High	2612.5	18.69	18.67	18.72
		2595	18.76	18.73	18.72
		2577.5	18.91	18.90	18.93
	36RB-Middle	2612.5	18.71	18.69	18.72
		2595	18.84	18.75	18.74
		2577.5	18.94	18.94	18.95
	36RB-Low	2612.5	18.73	18.72	18.76
		2595	18.92	18.87	18.86
		2577.5	18.92	18.91	18.94
	75RB	2612.5	18.74	18.74	18.76
		2595	18.85	18.84	18.81
		2577.5	18.95	18.96	18.96
20MHz	1RB-High	2610	18.84	19.05	18.76
		2595	18.87	19.05	18.79
		2580	19.01	19.21	18.87
	1RB-Middle	2610	18.92	19.16	18.83
		2595	19.08	19.24	18.93
		2580	19.11	19.26	18.99
	1RB-Low	2610	19.00	19.19	18.87
		2595	19.09	19.31	18.99
		2580	19.02	19.14	18.89
	50RB-High	2610	18.89	18.94	18.91
		2595	18.93	18.98	18.94
		2580	19.04	19.11	19.08
	50RB-Middle	2610	18.95	19.00	18.98
		2595	19.04	19.07	19.04
		2580	19.09	19.11	19.09
	50RB-Low	2610	18.99	19.04	19.00
		2595	19.08	19.13	19.11
		2580	19.05	19.10	19.06
	100RB	2610	18.94	18.98	18.96
		2595	19.01	19.03	19.02
		2580	19.02	19.06	19.05

LTE Band41(ANT13 DSI2/3)

Band 41					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2687.5	16.75	16.77	16.40
		2640.3	16.92	16.93	16.59
		2593	16.93	16.93	16.60
		2545.8	16.99	16.97	16.65
		2498.5	16.65	16.62	16.33
	1RB-Middle	2687.5	16.78	16.77	16.38
		2640.3	16.95	16.93	16.62
		2593	16.99	16.93	16.66
		2545.8	17.03	17.00	16.69
		2498.5	16.63	16.57	16.30
	1RB-Low	2687.5	16.78	16.76	16.40
		2640.3	16.98	16.96	16.64
		2593	16.98	16.95	16.64
		2545.8	16.99	16.95	16.67
		2498.5	16.60	16.55	16.25
	12RB-High	2687.5	16.71	16.64	16.72
		2640.3	16.89	16.84	16.93
		2593	16.84	16.80	16.88
		2545.8	16.94	16.90	16.97
		2498.5	16.53	16.50	16.57
	12RB-Middle	2687.5	16.72	16.68	16.76
		2640.3	16.86	16.83	16.92
		2593	16.87	16.82	16.90
		2545.8	16.94	16.89	16.99
		2498.5	16.52	16.48	16.57
	12RB-Low	2687.5	16.70	16.65	16.76
		2640.3	16.91	16.87	16.96
		2593	16.89	16.84	16.93
		2545.8	16.92	16.88	16.97
		2498.5	16.53	16.48	16.57
	25RB	2687.5	16.71	16.75	16.79
		2640.3	16.90	16.94	16.98
		2593	16.88	16.92	16.93
		2545.8	16.91	16.96	16.99
		2498.5	16.53	16.58	16.60
10MHz	1RB-High	2685	16.73	16.75	16.36
		2639	16.87	16.86	16.53
		2593	16.90	16.89	16.56
		2547	16.90	16.90	16.56
		2501	16.65	16.64	16.34
	1RB-Middle	2685	16.74	16.76	16.38
		2639	16.93	16.95	16.60
		2593	16.93	16.95	16.62
		2547	17.00	16.98	16.65
		2501	16.61	16.61	16.29
	1RB-Low	2685	16.72	16.74	16.36
		2639	16.96	16.96	16.61
		2593	16.90	16.92	16.57
		2547	16.97	16.99	16.65
		2501	16.55	16.53	16.22
	25RB-High	2685	16.69	16.76	16.77

		2639	16.86	16.89	16.93
		2593	16.86	16.87	16.91
		2547	16.86	16.94	16.98
		2501	16.56	16.62	16.66
		2685	16.70	16.74	16.78
	25RB-Middle	2639	16.89	16.91	16.96
		2593	16.85	16.87	16.90
		2547	16.95	16.96	17.00
		2501	16.51	16.59	16.61
		2685	16.68	16.71	16.76
	25RB-Low	2639	16.93	16.97	17.00
		2593	16.84	16.90	16.93
		2547	16.90	16.96	16.99
		2501	16.49	16.55	16.57
		2685	16.71	16.74	16.73
	50RB	2639	16.91	16.97	16.93
		2593	16.84	16.88	16.89
		2547	16.93	16.97	16.97
		2501	16.54	16.58	16.58
		2682.5	16.63	16.68	16.30
15MHz	1RB-High	2637.8	16.78	16.81	16.46
		2593	16.82	16.83	16.49
		2548.3	16.80	16.83	16.48
		2503.5	16.65	16.66	16.36
		2682.5	16.72	16.75	16.37
	1RB-Middle	2637.8	16.95	16.96	16.61
		2593	16.93	16.94	16.61
		2548.3	16.96	16.98	16.65
		2503.5	16.60	16.62	16.32
		2682.5	16.65	16.68	16.32
	1RB-Low	2637.8	16.89	16.92	16.57
		2593	16.85	16.88	16.54
		2548.3	16.91	16.92	16.60
		2503.5	16.45	16.47	16.16
		2682.5	16.64	16.65	16.69
	36RB-High	2637.8	16.85	16.84	16.86
		2593	16.81	16.79	16.83
		2548.3	16.85	16.86	16.87
		2503.5	16.58	16.59	16.64
		2682.5	16.66	16.65	16.69
	36RB-Middle	2637.8	16.89	16.87	16.91
		2593	16.83	16.81	16.85
		2548.3	16.87	16.88	16.91
		2503.5	16.55	16.56	16.60
		2682.5	16.66	16.66	16.70
	36RB-Low	2637.8	16.90	16.89	16.93
		2593	16.82	16.84	16.89
		2548.3	16.88	16.89	16.95
		2503.5	16.50	16.48	16.53
		2682.5	16.70	16.71	16.72
	75RB	2637.8	16.91	16.92	16.93
		2593	16.88	16.90	16.92
		2548.3	16.88	16.94	16.94
		2503.5	16.57	16.61	16.63
		2680	16.46	16.48	16.11
20MHz	1RB-High	2680	16.46	16.48	16.11

		2636.5	16.48	16.50	16.12
		2593	16.38	16.37	16.03
		2549.5	16.37	16.37	16.02
		2506	16.21	16.18	15.87
		2680	16.61	16.61	16.24
	1RB-Middle	2636.5	16.62	16.61	16.24
		2593	16.61	16.59	16.24
		2549.5	16.50	16.47	16.14
		2506	16.26	16.22	15.90
		2680	16.57	16.57	16.21
	1RB-Low	2636.5	16.56	16.55	16.19
		2593	16.56	16.53	16.18
		2549.5	16.42	16.39	16.07
		2506	16.13	16.10	15.77
		2680	16.55	16.59	16.58
	50RB-High	2636.5	16.54	16.56	16.59
		2593	16.48	16.51	16.50
		2549.5	16.43	16.48	16.47
		2506	16.21	16.30	16.27
		2680	16.58	16.60	16.60
	50RB-Middle	2636.5	16.59	16.64	16.62
		2593	16.50	16.53	16.52
		2549.5	16.44	16.48	16.47
		2506	16.22	16.27	16.26
		2680	16.59	16.66	16.62
	50RB-Low	2636.5	16.63	16.68	16.64
		2593	16.56	16.60	16.54
		2549.5	16.44	16.51	16.49
		2506	16.18	16.22	16.19
		2680	16.58	16.60	16.59
	100RB	2636.5	16.60	16.61	16.61
		2593	16.51	16.53	16.52
		2549.5	16.43	16.47	16.45
		2506	16.22	16.23	16.23

LTE Band41(ANT13 DSI4)

Band 41					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2687.5	23.12	22.03	20.68
		2640.3	23.28	22.20	20.88
		2593	23.37	22.33	20.96
		2545.8	23.43	22.36	21.04
		2498.5	23.12	22.09	20.70
	1RB-Middle	2687.5	23.12	22.06	20.70
		2640.3	23.34	22.23	20.93
		2593	23.44	22.35	21.00
		2545.8	23.53	22.41	21.08
		2498.5	23.12	22.04	20.69
	1RB-Low	2687.5	23.13	22.07	20.70
		2640.3	23.34	22.24	20.94
		2593	23.43	22.35	20.99
		2545.8	23.48	22.37	21.06
		2498.5	23.07	22.00	20.64

	12RB-High	2687.5	22.01	20.92	19.98
		2640.3	22.18	21.12	20.18
		2593	22.24	21.16	20.23
		2545.8	22.36	21.25	20.33
		2498.5	21.99	20.89	19.97
	12RB-Middle	2687.5	22.06	20.97	20.01
		2640.3	22.20	21.12	20.18
		2593	22.28	21.19	20.26
		2545.8	22.37	21.28	20.35
		2498.5	21.97	20.90	19.96
	12RB-Low	2687.5	22.03	20.94	20.02
		2640.3	22.24	21.15	20.24
		2593	22.31	21.22	20.28
		2545.8	22.35	21.26	20.34
		2498.5	21.97	20.90	19.96
	25RB	2687.5	22.06	21.05	20.05
		2640.3	22.24	21.25	20.25
		2593	22.29	21.28	20.28
		2545.8	22.33	21.36	20.34
		2498.5	21.99	21.00	20.00
10MHz	1RB-High	2685	23.06	21.99	20.65
		2639	23.19	22.12	20.83
		2593	23.27	22.30	20.91
		2547	23.30	22.29	20.96
		2501	23.11	22.10	20.71
	1RB-Middle	2685	23.09	22.05	20.70
		2639	23.26	22.19	20.94
		2593	23.37	22.36	21.02
		2547	23.44	22.42	21.09
		2501	23.07	22.08	20.69
	1RB-Low	2685	23.05	22.00	20.65
		2639	23.28	22.21	20.96
		2593	23.31	22.32	20.97
		2547	23.40	22.37	21.05
		2501	22.98	22.00	20.61
	25RB-High	2685	22.02	21.02	20.07
		2639	22.13	21.15	20.21
		2593	22.22	21.24	20.26
		2547	22.29	21.32	20.33
		2501	22.01	21.06	20.06
	25RB-Middle	2685	21.99	21.00	20.04
		2639	22.17	21.19	20.22
		2593	22.19	21.24	20.26
		2547	22.31	21.38	20.36
		2501	21.94	21.01	20.01
	25RB-Low	2685	21.98	20.98	20.03
		2639	22.21	21.23	20.27
		2593	22.21	21.26	20.28
		2547	22.29	21.35	20.36
		2501	21.92	20.96	19.97
	50RB	2685	22.01	21.02	20.02
		2639	22.17	21.19	20.22
		2593	22.21	21.28	20.24
		2547	22.29	21.34	20.34
		2501	21.95	21.00	19.97

15MHz	1RB-High	2682.5	23.02	21.98	20.59
		2637.8	23.17	22.11	20.79
		2593	23.25	22.24	20.88
		2548.3	23.27	22.23	20.86
		2503.5	23.15	22.16	20.76
	1RB-Middle	2682.5	23.09	22.05	20.66
		2637.8	23.32	22.26	20.95
		2593	23.37	22.36	20.98
		2548.3	23.44	22.39	21.04
		2503.5	23.11	22.10	20.72
	1RB-Low	2682.5	23.04	21.99	20.62
		2637.8	23.29	22.23	20.91
		2593	23.33	22.31	20.92
		2548.3	23.40	22.33	21.00
		2503.5	22.96	21.96	20.55
	36RB-High	2682.5	21.97	20.94	19.95
		2637.8	22.17	21.15	20.15
		2593	22.20	21.19	20.18
		2548.3	22.27	21.24	20.22
		2503.5	22.04	21.02	20.01
	36RB-Middle	2682.5	21.95	20.95	19.96
		2637.8	22.20	21.19	20.19
		2593	22.21	21.20	20.18
		2548.3	22.30	21.28	20.28
		2503.5	22.01	20.99	19.99
	36RB-Low	2682.5	21.98	20.92	19.95
		2637.8	22.22	21.21	20.22
		2593	22.23	21.22	20.22
		2548.3	22.31	21.29	20.28
		2503.5	21.92	20.90	19.90
	75RB	2682.5	22.00	21.00	19.99
		2637.8	22.23	21.24	20.21
		2593	22.28	21.28	20.25
		2548.3	22.32	21.32	20.30
		2503.5	22.05	21.03	20.03
20MHz	1RB-High	2680	22.99	21.96	20.55
		2636.5	22.97	21.91	20.56
		2593	22.90	21.86	20.44
		2549.5	22.85	21.83	20.46
		2506	22.73	21.69	20.28
	1RB-Middle	2680	23.11	22.05	20.67
		2636.5	23.14	22.09	20.73
		2593	23.12	22.07	20.68
		2549.5	23.02	21.97	20.58
		2506	22.78	21.73	20.34
	1RB-Low	2680	23.09	22.02	20.66
		2636.5	23.03	21.99	20.63
		2593	23.05	22.02	20.59
		2549.5	22.93	21.87	20.53
		2506	22.63	21.61	20.22
	50RB-High	2680	22.03	21.03	20.01
		2636.5	22.01	21.03	19.97
		2593	21.94	20.96	19.90
		2549.5	21.93	20.92	19.87
		2506	21.72	20.72	19.68

	50RB-Middle	2680	22.06	21.06	20.03
		2636.5	22.09	21.10	20.06
		2593	21.96	21.00	19.93
		2549.5	21.95	20.94	19.89
		2506	21.71	20.73	19.66
	50RB-Low	2680	22.08	21.08	20.04
		2636.5	22.07	21.07	20.06
		2593	22.02	21.02	19.97
		2549.5	21.92	20.95	19.90
		2506	21.67	20.63	19.63
	100RB	2680	22.03	21.03	20.00
		2636.5	22.05	21.05	20.01
		2593	21.98	20.92	19.93
		2549.5	21.90	20.91	19.87
		2506	21.69	20.69	19.64

LTE Band41(ANT13 DSI8/9/10)

Band 41					
Bandwidth (MHz)	RB allocation	Frequency (MHz)	Actual output power (dBm)		
	RB offset		QPSK	16QAM	64QAM
5MHz	1RB-High	2687.5	20.37	20.44	20.05
		2640.3	20.46	20.49	20.10
		2593	20.39	20.46	20.07
		2545.8	20.40	20.40	20.04
		2498.5	20.08	20.17	19.71
	1RB-Middle	2687.5	20.38	20.38	20.04
		2640.3	20.50	20.47	20.15
		2593	20.47	20.47	20.11
		2545.8	20.43	20.42	20.10
		2498.5	20.16	20.14	19.76
	1RB-Low	2687.5	20.39	20.41	20.04
		2640.3	20.50	20.52	20.16
		2593	20.46	20.48	20.09
		2545.8	20.44	20.44	20.10
		2498.5	20.07	20.10	19.68
	12RB-High	2687.5	20.31	20.26	20.37
		2640.3	20.40	20.33	20.46
		2593	20.32	20.27	20.36
		2545.8	20.31	20.27	20.37
		2498.5	20.03	19.99	20.04
	12RB-Middle	2687.5	20.30	20.26	20.34
		2640.3	20.40	20.35	20.44
		2593	20.33	20.30	20.39
		2545.8	20.32	20.27	20.37
		2498.5	20.00	19.95	20.03
	12RB-Low	2687.5	20.34	20.30	20.39
		2640.3	20.44	20.37	20.50
		2593	20.37	20.34	20.43
		2545.8	20.35	20.31	20.42
		2498.5	20.01	19.98	20.05
	25RB	2687.5	20.33	20.34	20.40
		2640.3	20.45	20.45	20.50
		2593	20.36	20.37	20.43
		2545.8	20.31	20.40	20.41

		2498.5	19.99	20.03	20.07
10MHz	1RB-High	2685	20.35	20.39	19.94
		2639	20.37	20.42	20.08
		2593	20.33	20.41	20.03
		2547	20.35	20.36	20.03
		2501	20.14	20.15	19.75
	1RB-Middle	2685	20.31	20.40	20.01
		2639	20.43	20.51	20.17
		2593	20.39	20.48	20.12
		2547	20.37	20.42	20.06
		2501	20.08	20.14	19.75
	1RB-Low	2685	20.34	20.37	20.00
		2639	20.46	20.50	20.13
		2593	20.40	20.43	20.07
		2547	20.46	20.42	20.08
		2501	20.02	20.04	19.71
	25RB-High	2685	20.27	20.30	20.39
		2639	20.39	20.40	20.48
		2593	20.31	20.33	20.42
		2547	20.29	20.34	20.37
		2501	20.02	20.06	20.13
	25RB-Middle	2685	20.28	20.29	20.41
		2639	20.40	20.45	20.49
		2593	20.34	20.37	20.41
		2547	20.31	20.35	20.42
		2501	20.01	20.05	20.11
	25RB-Low	2685	20.27	20.29	20.38
		2639	20.43	20.46	20.53
		2593	20.33	20.34	20.42
		2547	20.31	20.36	20.42
		2501	19.94	19.99	20.03
	50RB	2685	20.30	20.34	20.34
		2639	20.41	20.45	20.47
		2593	20.33	20.36	20.37
		2547	20.33	20.37	20.38
		2501	20.01	20.05	20.06
15MHz	1RB-High	2682.5	20.27	20.32	19.91
		2637.8	20.31	20.34	19.98
		2593	20.24	20.33	19.92
		2548.3	20.26	20.33	19.93
		2503.5	20.07	20.18	19.71
	1RB-Middle	2682.5	20.28	20.35	19.95
		2637.8	20.43	20.47	20.10
		2593	20.37	20.45	20.04
		2548.3	20.33	20.37	20.00
		2503.5	20.06	20.13	19.71
	1RB-Low	2682.5	20.23	20.29	19.89
		2637.8	20.39	20.45	20.08
		2593	20.32	20.38	19.97
		2548.3	20.32	20.38	20.00
		2503.5	19.93	19.98	19.56
	36RB-High	2682.5	20.26	20.24	20.27
		2637.8	20.35	20.35	20.37
		2593	20.25	20.26	20.25
		2548.3	20.26	20.24	20.27

	36RB-Middle	2503.5	20.04	20.02	20.03
		2682.5	20.23	20.24	20.26
		2637.8	20.39	20.37	20.39
		2593	20.31	20.29	20.33
		2548.3	20.28	20.25	20.32
		2503.5	19.99	19.97	20.00
	36RB-Low	2682.5	20.24	20.26	20.25
		2637.8	20.39	20.39	20.41
		2593	20.30	20.29	20.32
		2548.3	20.29	20.29	20.31
		2503.5	19.96	19.93	19.96
	75RB	2682.5	20.26	20.28	20.27
		2637.8	20.42	20.43	20.42
		2593	20.33	20.35	20.36
		2548.3	20.30	20.33	20.33
		2503.5	20.02	20.02	20.00
20MHz	1RB-High	2680	20.26	20.48	20.23
		2636.5	20.19	20.40	20.12
		2593	20.13	20.37	20.09
		2549.5	20.13	20.34	20.09
		2506	19.99	20.21	19.94
	1RB-Middle	2680	20.31	20.50	20.24
		2636.5	20.24	20.44	20.16
		2593	20.28	20.51	20.22
		2549.5	20.15	20.35	20.07
		2506	20.00	20.23	19.93
	1RB-Low	2680	20.28	20.49	20.23
		2636.5	20.27	20.47	20.19
		2593	20.30	20.52	20.25
		2549.5	20.14	20.34	20.09
		2506	19.93	20.15	19.88
	50RB-High	2680	20.18	20.32	20.30
		2636.5	20.20	20.24	20.22
		2593	20.19	20.23	20.20
		2549.5	20.17	20.21	20.19
		2506	20.06	20.05	20.02
	50RB-Middle	2680	20.29	20.33	20.31
		2636.5	20.28	20.32	20.29
		2593	20.23	20.26	20.23
		2549.5	20.16	20.21	20.19
		2506	20.14	20.06	20.04
	50RB-Low	2680	20.30	20.33	20.31
		2636.5	20.28	20.33	20.31
		2593	20.25	20.31	20.27
		2549.5	20.17	20.22	20.20
		2506	20.20	20.00	19.98
	100RB	2680	20.30	20.30	20.30
		2636.5	20.25	20.27	20.27
		2593	20.21	20.26	20.22
		2549.5	20.14	20.18	20.17
		2506	20.21	20.00	20.00

LTE Band41(ANT31 DSI2/3/4/10)

Band 41					
Bandwidth (MHz)	RB allocation RB offset	Frequency (MHz)	Actual output power (dBm)		
			QPSK	16QAM	64QAM
5MHz	1RB-High	2687.5	23.49	22.61	21.37
		2640.3	23.40	22.47	21.30
		2593	23.54	22.66	21.42
		2545.8	23.39	22.50	21.29
		2498.5	23.42	22.52	21.27
	1RB-Middle	2687.5	23.54	22.63	21.39
		2640.3	23.45	22.47	21.31
		2593	23.64	22.71	21.53
		2545.8	23.46	22.53	21.34
		2498.5	23.45	22.53	21.33
	1RB-Low	2687.5	23.53	22.60	21.40
		2640.3	23.41	22.49	21.31
		2593	23.61	22.72	21.51
		2545.8	23.36	22.43	21.24
		2498.5	23.42	22.52	21.29
	12RB-High	2687.5	22.40	21.40	20.45
		2640.3	22.31	21.31	20.37
		2593	22.44	21.43	20.47
		2545.8	22.33	21.31	20.33
		2498.5	22.29	21.28	20.30
	12RB-Middle	2687.5	22.42	21.43	20.52
		2640.3	22.30	21.32	20.32
		2593	22.49	21.49	20.50
		2545.8	22.32	21.31	20.31
		2498.5	22.32	21.31	20.33
	12RB-Low	2687.5	22.43	21.44	20.51
		2640.3	22.32	21.33	20.37
		2593	22.52	21.52	20.53
		2545.8	22.29	21.28	20.32
		2498.5	22.34	21.34	20.37
	25RB	2687.5	22.45	21.48	20.49
		2640.3	22.35	21.38	20.39
		2593	22.49	21.50	20.52
		2545.8	22.29	21.34	20.33
		2498.5	22.32	21.36	20.35
10MHz	1RB-High	2685	23.48	22.58	21.34
		2639	23.38	22.46	21.25
		2593	23.48	22.60	21.37
		2547	23.37	22.50	21.24
		2501	23.35	22.44	21.18
	1RB-Middle	2685	23.53	22.65	21.43
		2639	23.41	22.52	21.29
		2593	23.60	22.74	21.49
		2547	23.43	22.56	21.30
		2501	23.41	22.56	21.26
	1RB-Low	2685	23.50	22.62	21.38
		2639	23.38	22.47	21.23
		2593	23.57	22.70	21.47
		2547	23.34	22.44	21.23

	25RB-High	2501	23.39	22.52	21.23
		2685	22.46	21.47	20.52
		2639	22.31	21.35	20.36
		2593	22.46	21.47	20.48
		2547	22.32	21.35	20.35
		2501	22.28	21.31	20.30
	25RB-Middle	2685	22.45	21.49	20.52
		2639	22.32	21.36	20.35
		2593	22.45	21.48	20.49
		2547	22.33	21.37	20.36
		2501	22.29	21.32	20.31
		2685	22.43	21.47	20.48
	25RB-Low	2639	22.35	21.38	20.37
		2593	22.50	21.52	20.52
		2547	22.27	21.31	20.31
		2501	22.31	21.36	20.35
		2685	22.49	21.51	20.46
		2639	22.34	21.38	20.30
15MHz	1RB-High	2593	23.39	22.54	21.31
		2548.3	23.31	22.45	21.24
		2503.5	23.25	22.39	21.14
		2682.5	23.41	22.53	21.30
		2637.8	23.29	22.42	21.22
		2593	23.58	22.73	21.49
	1RB-Middle	2548.3	23.41	22.56	21.30
		2503.5	23.35	22.52	21.25
		2682.5	23.45	22.58	21.36
		2637.8	23.30	22.42	21.20
		2593	23.54	22.69	21.47
		2548.3	23.27	22.41	21.17
	1RB-Low	2503.5	23.30	22.46	21.20
		2682.5	22.41	21.38	20.40
		2637.8	22.30	21.31	20.30
		2593	22.41	21.40	20.38
		2548.3	22.30	21.31	20.28
		2503.5	22.21	21.22	20.21
	36RB-High	2682.5	22.42	21.40	20.41
		2637.8	22.31	21.33	20.31
		2593	22.43	21.43	20.41
		2548.3	22.30	21.29	20.27
		2503.5	22.28	21.28	20.26
		2682.5	22.42	21.41	20.41
	36RB-Middle	2637.8	22.31	21.31	20.30
		2593	22.49	21.47	20.45
		2548.3	22.26	21.26	20.24
		2503.5	22.29	21.27	20.25
		2682.5	22.44	21.45	20.43
		2637.8	22.33	21.35	20.30
	36RB-Low	2593	22.49	21.47	20.47
		2548.3	22.31	21.33	20.28
	75RB	2593	22.49	21.47	20.47
		2548.3	22.31	21.33	20.28

		2503.5	22.29	21.30	20.28
20MHz	1RB-High	2680	23.40	22.33	20.97
		2636.5	23.29	22.26	20.90
		2593	23.29	22.25	20.87
		2549.5	23.26	22.22	20.84
		2506	23.15	22.09	20.70
	1RB-Middle	2680	23.55	22.52	21.13
		2636.5	23.39	22.34	20.99
		2593	23.54	22.50	21.09
		2549.5	23.34	22.30	20.92
		2506	23.29	22.23	20.85
	1RB-Low	2680	23.47	22.43	21.04
		2636.5	23.33	22.27	20.95
		2593	23.51	22.50	21.12
		2549.5	23.24	22.20	20.81
		2506	23.22	22.17	20.80
	50RB-High	2680	22.44	21.45	20.41
		2636.5	22.27	21.30	20.25
		2593	22.35	21.40	20.32
		2549.5	22.28	21.30	20.22
		2506	22.14	21.15	20.09
	50RB-Middle	2680	22.45	21.48	20.42
		2636.5	22.34	21.37	20.33
		2593	22.40	21.42	20.36
		2549.5	22.24	21.28	20.22
		2506	22.20	21.22	20.14
	50RB-Low	2680	22.49	21.50	20.45
		2636.5	22.35	21.38	20.35
		2593	22.45	21.48	20.42
		2549.5	22.22	21.25	20.18
		2506	22.21	21.23	20.17
	100RB	2680	22.45	21.46	20.41
		2636.5	22.32	21.34	20.29
		2593	22.41	21.42	20.38
		2549.5	22.23	21.25	20.18
		2506	22.17	21.19	20.12

LTE Carrier Aggregation Conducted Power (Uplink)

This device supports uplink carrier aggregation for LTE CA_7C, CA_38C and CA_41C with a maximum of two 20MHz component carriers. For intra band contiguous carrier aggregation scenarios, 3GPP specifies that the aggregate maximum allowed output power is equivalent to the single carrier scenario. For the non-contiguously allocated resource blocks which the MPR level is determined by various RB separation and RB sizes requirement, and the allowed MPR levels, settings and the conducted powers are permanently implemented in this device per the 3GPP requirements.

According to FCC guidance, the output power with uplink CA active was measured for the high / middle / low channel configuration with the highest reported SAR for each exposure condition, the power was measured with wideband signal integration over both component carriers.

In applying the power measurement procedures of KDB 941225 D05A for DL CA to qualify for UL SAR test exclusion, power measurement is required only for the subset in each row with the largest combination of frequency bands and CCs

Maximum output power measurement is required for each UL CA configuration for the required test channels described in KDB 941225 D05. The required test channel should be associated with the UL PCC. For channels at the ends of a frequency band, the SCC and subsequent CCs are added to the side within the transmission band. Otherwise, the CCs should be added alternatively to either side of the PCC.

7C ANT13

DSI2/3										
UL LTE CA Class	PCC					SCC				Power
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	
CA 7C	20M	21350	3350	1	99	20M	3152	1	0	16
CA 7C	20M	21350	3350	1	99	15M	3179	1	0	16
CA 7C	20M	21350	3350	1	99	10M	3206	1	0	16
CA 7C	20M	20850	2850	1	99	20M	3048	1	0	16
CA 7C	20M	20850	2850	1	99	15M	3021	1	0	16
CA 7C	20M	20850	2850	1	99	10M	2994	1	0	16
CA 7C	15M	21375	3375	1	74	15M	3225	1	0	16
CA 7C	15M	20825	2825	1	74	15M	2975	1	0	16
CA 7C	15M	20825	2825	1	74	10M	2945	1	0	16
CA 7C	20M	21350	3350	1	0	20M	3152	1	99	16
CA 7C	20M	21350	3350	1	0	15M	3179	1	74	16
CA 7C	20M	21350	3350	1	0	10M	3206	1	49	16
CA 7C	20M	20850	2850	1	0	20M	3048	1	99	16
CA 7C	20M	20850	2850	1	0	15M	3021	1	74	16
CA 7C	20M	20850	2850	1	0	10M	2994	1	49	16
CA 7C	15M	21375	3375	1	0	15M	3225	1	74	16
CA 7C	15M	20825	2825	1	0	15M	2975	1	74	16
CA 7C	15M	20825	2825	1	0	10M	2945	1	49	16

DSI4										
UL LTE CA Class	PCC					SCC				Power
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	
CA 7C	20M	21350	3350	1	99	20M	3152	1	0	23.5
CA 7C	20M	21350	3350	1	99	15M	3179	1	0	23.5
CA 7C	20M	21350	3350	1	99	10M	3206	1	0	23.5
CA 7C	20M	20850	2850	1	99	20M	3048	1	0	23.5
CA 7C	20M	20850	2850	1	99	15M	3021	1	0	23.5
CA 7C	20M	20850	2850	1	99	10M	2994	1	0	23.5
CA 7C	15M	21375	3375	1	74	15M	3225	1	0	23.5
CA 7C	15M	20825	2825	1	74	15M	2975	1	0	23.5
CA 7C	15M	20825	2825	1	74	10M	2945	1	0	23.5
CA 7C	20M	21350	3350	1	0	20M	3152	1	99	23.5
CA 7C	20M	21350	3350	1	0	15M	3179	1	74	23.5
CA 7C	20M	21350	3350	1	0	10M	3206	1	49	23.5
CA 7C	20M	20850	2850	1	0	20M	3048	1	99	23.5
CA 7C	20M	20850	2850	1	0	15M	3021	1	74	23.5
CA 7C	20M	20850	2850	1	0	10M	2994	1	49	23.5
CA 7C	15M	21375	3375	1	0	15M	3225	1	74	23.5
CA 7C	15M	20825	2825	1	0	15M	2975	1	74	23.5
CA 7C	15M	20825	2825	1	0	10M	2945	1	49	23.5

DSI8/9/10										
UL LTE CA Class	PCC					SCC				Power
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	
CA 7C	20M	21350	3350	1	99	20M	3152	1	0	18.5
CA 7C	20M	21350	3350	1	99	15M	3179	1	0	18.5
CA 7C	20M	21350	3350	1	99	10M	3206	1	0	18.5
CA 7C	20M	20850	2850	1	99	20M	3048	1	0	18.5
CA 7C	20M	20850	2850	1	99	15M	3021	1	0	18.5
CA 7C	20M	20850	2850	1	99	10M	2994	1	0	18.5
CA 7C	15M	21375	3375	1	74	15M	3225	1	0	18.5
CA 7C	15M	20825	2825	1	74	15M	2975	1	0	18.5
CA 7C	15M	20825	2825	1	74	10M	2945	1	0	18.5
CA 7C	20M	21350	3350	1	0	20M	3152	1	99	18.5
CA 7C	20M	21350	3350	1	0	15M	3179	1	74	18.5
CA 7C	20M	21350	3350	1	0	10M	3206	1	49	18.5
CA 7C	20M	20850	2850	1	0	20M	3048	1	99	18.5
CA 7C	20M	20850	2850	1	0	15M	3021	1	74	18.5
CA 7C	20M	20850	2850	1	0	10M	2994	1	49	18.5
CA 7C	15M	21375	3375	1	0	15M	3225	1	74	18.5
CA 7C	15M	20825	2825	1	0	15M	2975	1	74	18.5
CA 7C	15M	20825	2825	1	0	10M	2945	1	49	18.5

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DSI2/3										
UL LTE CA Class	PCC					SCC				Power
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	
CA 7C	20M	21350	3350	1	99	20M	3152	1	0	24
CA 7C	20M	21350	3350	1	99	15M	3179	1	0	24
CA 7C	20M	21350	3350	1	99	10M	3206	1	0	24
CA 7C	20M	20850	2850	1	99	20M	3048	1	0	24
CA 7C	20M	20850	2850	1	99	15M	3021	1	0	24
CA 7C	20M	20850	2850	1	99	10M	2994	1	0	24
CA 7C	15M	21375	3375	1	74	15M	3225	1	0	24
CA 7C	15M	20825	2825	1	74	15M	2975	1	0	24
CA 7C	15M	20825	2825	1	74	10M	2945	1	0	24
CA 7C	20M	21350	3350	1	0	20M	3152	1	99	24
CA 7C	20M	21350	3350	1	0	15M	3179	1	74	24
CA 7C	20M	21350	3350	1	0	10M	3206	1	49	24
CA 7C	20M	20850	2850	1	0	20M	3048	1	99	24
CA 7C	20M	20850	2850	1	0	15M	3021	1	74	24
CA 7C	20M	20850	2850	1	0	10M	2994	1	49	24
CA 7C	15M	21375	3375	1	0	15M	3225	1	74	24
CA 7C	15M	20825	2825	1	0	15M	2975	1	74	24
CA 7C	15M	20825	2825	1	0	10M	2945	1	49	24

DSI4										
UL LTE CA Class	PCC					SCC				Power
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	
CA 7C	20M	21350	3350	1	99	20M	3152	1	0	22
CA 7C	20M	21350	3350	1	99	15M	3179	1	0	22
CA 7C	20M	21350	3350	1	99	10M	3206	1	0	22
CA 7C	20M	20850	2850	1	99	20M	3048	1	0	22
CA 7C	20M	20850	2850	1	99	15M	3021	1	0	22
CA 7C	20M	20850	2850	1	99	10M	2994	1	0	22
CA 7C	15M	21375	3375	1	74	15M	3225	1	0	22
CA 7C	15M	20825	2825	1	74	15M	2975	1	0	22
CA 7C	15M	20825	2825	1	74	10M	2945	1	0	22
CA 7C	20M	21350	3350	1	0	20M	3152	1	99	22
CA 7C	20M	21350	3350	1	0	15M	3179	1	74	22
CA 7C	20M	21350	3350	1	0	10M	3206	1	49	22
CA 7C	20M	20850	2850	1	0	20M	3048	1	99	22
CA 7C	20M	20850	2850	1	0	15M	3021	1	74	22
CA 7C	20M	20850	2850	1	0	10M	2994	1	49	22
CA 7C	15M	21375	3375	1	0	15M	3225	1	74	22
CA 7C	15M	20825	2825	1	0	15M	2975	1	74	22
CA 7C	15M	20825	2825	1	0	10M	2945	1	49	22

DSI8/9/10										
UL LTE CA Class	PCC					SCC				Power
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	
CA 7C	20M	21350	3350	1	99	20M	3152	1	0	21
CA 7C	20M	21350	3350	1	99	15M	3179	1	0	21
CA 7C	20M	21350	3350	1	99	10M	3206	1	0	21
CA 7C	20M	20850	2850	1	99	20M	3048	1	0	21
CA 7C	20M	20850	2850	1	99	15M	3021	1	0	21
CA 7C	20M	20850	2850	1	99	10M	2994	1	0	21
CA 7C	15M	21375	3375	1	74	15M	3225	1	0	21
CA 7C	15M	20825	2825	1	74	15M	2975	1	0	21
CA 7C	15M	20825	2825	1	74	10M	2945	1	0	21
CA 7C	20M	21350	3350	1	0	20M	3152	1	99	21
CA 7C	20M	21350	3350	1	0	15M	3179	1	74	21
CA 7C	20M	21350	3350	1	0	10M	3206	1	49	21
CA 7C	20M	20850	2850	1	0	20M	3048	1	99	21
CA 7C	20M	20850	2850	1	0	15M	3021	1	74	21
CA 7C	20M	20850	2850	1	0	10M	2994	1	49	21
CA 7C	15M	21375	3375	1	0	15M	3225	1	74	21
CA 7C	15M	20825	2825	1	0	15M	2975	1	74	21
CA 7C	15M	20825	2825	1	0	10M	2945	1	49	21

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UL LTE CA Class	DSI2/3									
	PCC				SCC				Power	
	PCC Bandwidth	UL channel	RB	RB OFFSET	SCC Bandwidth	channel	RB	RB OFFSET	tune up	conducted power (dBm)
CA 38C	20M	38150	1	99	20M	37952	1	0	19	14.03
CA 38C	20M	37850	1	99	20M	38048	1	0	19	17.93
CA 38C	15M	38175	1	74	15M	38025	1	0	19	14.38
CA 38C	15M	37825	1	74	15M	37975	1	0	19	18.1
CA 38C	20M	38150	1	0	20M	37952	1	99	19	18.03
CA 38C	20M	37850	1	0	20M	38048	1	99	19	13.82
CA 38C	15M	38175	1	0	15M	38025	1	74	19	18.14
CA 38C	15M	37825	1	0	15M	37975	1	74	19	14.21

DSI4											
UL LTE CA Class	PCC				SCC				Power		
	PCC Bandwidth	channel	RB	RB OFFSET	SCC Bandwidth	channel	RB	RB OFFSET	tune up	conducted power (dBm)	
CA 38C	20M	38150	1	99	20M	37952	1	0	24	14.04	
CA 38C	20M	37850	1	99	20M	38048	1	0	24	22.9	
CA 38C	15M	38175	1	74	15M	38025	1	0	24	14.39	
CA 38C	15M	37825	1	74	15M	37975	1	0	24	23.09	
CA 38C	20M	38150	1	0	20M	37952	1	99	24	22.98	
CA 38C	20M	37850	1	0	20M	38048	1	99	24	13.84	
CA 38C	15M	38175	1	0	15M	38025	1	74	24	23.14	
CA 38C	15M	37825	1	0	15M	37975	1	74	24	14.16	

DSI8/9/10										
UL LTE CA Class	PCC				SCC				Power	
	PCC Bandwidth	channel	RB	RB OFFSET	SCC Bandwidth	channel	RB	RB OFFSET	tune up	conducted power (dBm)
CA 38C	20M	38150	1	99	20M	37952	1	0	22.5	12.79
CA 38C	20M	37850	1	99	20M	38048	1	0	22.5	19.5
CA 38C	15M	38175	1	74	15M	38025	1	0	22.5	13.1
CA 38C	15M	37825	1	74	15M	37975	1	0	22.5	19.68
CA 38C	20M	38150	1	0	20M	37952	1	99	22.5	19.58
CA 38C	20M	37850	1	0	20M	38048	1	99	22.5	12.62
CA 38C	15M	38175	1	0	15M	38025	1	74	22.5	19.7
CA 38C	15M	37825	1	0	15M	37975	1	74	22.5	12.91

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DSI2/3										
UL LTE CA Class	PCC				SCC				Power	
	PCC Bandwidth	channel	RB	RB OFFSET	SCC Bandwidth	channel	RB	RB OFFSET	tune up	conducted power (dBm)
CA 38C	20M	38150	1	99	20M	37952	1	0	24	14.23
CA 38C	20M	37850	1	99	20M	38048	1	0	24	23.08
CA 38C	15M	38175	1	74	15M	38025	1	0	24	14.58
CA 38C	15M	37825	1	74	15M	37975	1	0	24	23.28
CA 38C	20M	38150	1	0	20M	37952	1	99	24	23.19
CA 38C	20M	37850	1	0	20M	38048	1	99	24	14.02
CA 38C	15M	38175	1	0	15M	38025	1	74	24	23.34
CA 38C	15M	37825	1	0	15M	37975	1	74	24	14.41

DSI4											
UL LTE CA Class	PCC				SCC				Power		
	PCC Bandwidth	channel	RB	RB OFFSET	SCC Bandwidth	channel	RB	RB OFFSET	tune up	conducted	power (dBm)
CA 38C	20M	38150	1	99	20M	37952	1	0	24		12.54
CA 38C	20M	37850	1	99	20M	38048	1	0	24		20.35
CA 38C	15M	38175	1	74	15M	38025	1	0	24		12.85
CA 38C	15M	37825	1	74	15M	37975	1	0	24		20.53
CA 38C	20M	38150	1	0	20M	37952	1	99	24		20.44
CA 38C	20M	37850	1	0	20M	38048	1	99	24		12.35
CA 38C	15M	38175	1	0	15M	38025	1	74	24		20.61
CA 38C	15M	37825	1	0	15M	37975	1	74	24		12.72

DSI8/9/10										
UL LTE CA Class	PCC				SCC				Power	
	PCC Bandwidth	channel	RB	RB OFFSET	SCC Bandwidth	channel	RB	RB OFFSET	tune up	conducted power (dBm)
CA 38C	20M	38150	1	99	20M	37952	1	0	24	11.43
CA 38C	20M	37850	1	99	20M	38048	1	0	24	18.54
CA 38C	15M	38175	1	74	15M	38025	1	0	24	11.7
CA 38C	15M	37825	1	74	15M	37975	1	0	24	18.68
CA 38C	20M	38150	1	0	20M	37952	1	99	24	18.59
CA 38C	20M	37850	1	0	20M	38048	1	99	24	11.26
CA 38C	15M	38175	1	0	15M	38025	1	74	24	18.73
CA 38C	15M	37825	1	0	15M	37975	1	74	24	11.57

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DS12/3										
UL LTE CA Class	PCC				SCC				Power	
	PCC Bandwidth	channel	RB	RB OFFSET	SCC Bandwidth	channel	RB	RB OFFSET	tune up	conducted power (dBm)
CA 41C	20M	41490	1	99	20M	41292	1	0	17.5	13.92
CA 41C	20M	41490	1	99	15M	41319	1	0	17.5	14.08
CA 41C	20M	41490	1	99	10M	41346	1	0	17.5	14.07
CA 41C	20M	41490	1	99	5M	41373	1	0	17.5	14.08
CA 41C	20M	39750	1	99	20M	39948	1	0	17.5	16.24
CA 41C	20M	39750	1	99	15M	39921	1	0	17.5	16.27
CA 41C	20M	39750	1	99	10M	39894	1	0	17.5	16.14
CA 41C	20M	39750	1	99	5M	39867	1	0	17.5	16.13
CA 41C	15M	41515	1	74	15M	41365	1	0	17.5	14.24
CA 41C	15M	41515	1	74	10M	41395	1	0	17.5	14.16
CA 41C	15M	39725	1	74	10M	39845	1	0	17.5	16.34
CA 41C	20M	41490	1	0	20M	41292	1	99	17.5	16.31
CA 41C	20M	41490	1	0	15M	41319	1	74	17.5	16.39
CA 41C	20M	41490	1	0	10M	41346	1	49	17.5	16.25
CA 41C	20M	41490	1	0	5M	41373	1	24	17.5	16.22
CA 41C	20M	39750	1	0	20M	39948	1	99	17.5	13.72
CA 41C	20M	39750	1	0	15M	39921	1	74	17.5	13.93
CA 41C	20M	39750	1	0	10M	39894	1	49	17.5	13.9
CA 41C	20M	39750	1	0	5M	39867	1	24	17.5	14.05
CA 41C	15M	41515	1	0	15M	41365	1	74	17.5	16.46
CA 41C	15M	41515	1	0	10M	41395	1	49	17.5	16.34
CA 41C	15M	39725	1	0	10M	39845	1	49	17.5	14.08

DS14										
UL LTE CA Class	PCC				SCC				Power	
	PCC Bandwidth	channel	RB	RB OFFSET	SCC Bandwidth	channel	RB	RB OFFSET	tune up	conducted power (dBm)
CA 41C	20M	41490	1	99	20M	41292	1	0	24	13.92
CA 41C	20M	41490	1	99	15M	41319	1	0	24	14.09
CA 41C	20M	41490	1	99	10M	41346	1	0	24	14.09
CA 41C	20M	41490	1	99	5M	41373	1	0	24	14.1
CA 41C	20M	39750	1	99	20M	39948	1	0	24	22.74
CA 41C	20M	39750	1	99	15M	39921	1	0	24	22.81
CA 41C	20M	39750	1	99	10M	39894	1	0	24	22.63
CA 41C	20M	39750	1	99	5M	39867	1	0	24	22.62
CA 41C	15M	41515	1	74	15M	41365	1	0	24	14.22
CA 41C	15M	41515	1	74	10M	41395	1	0	24	14.17
CA 41C	15M	39725	1	74	10M	39845	1	0	24	22.87
CA 41C	20M	41490	1	0	20M	41292	1	99	24	22.79
CA 41C	20M	41490	1	0	15M	41319	1	74	24	22.88
CA 41C	20M	41490	1	0	10M	41346	1	49	24	22.69
CA 41C	20M	41490	1	0	5M	41373	1	24	24	22.65
CA 41C	20M	39750	1	0	20M	39948	1	99	24	13.69
CA 41C	20M	39750	1	0	15M	39921	1	74	24	13.91
CA 41C	20M	39750	1	0	10M	39894	1	49	24	13.88
CA 41C	20M	39750	1	0	5M	39867	1	24	24	14.05
CA 41C	15M	41515	1	0	15M	41365	1	74	24	22.98
CA 41C	15M	41515	1	0	10M	41395	1	49	24	22.81
CA 41C	15M	39725	1	0	10M	39845	1	49	24	14.05

DS18/9/10										
UL LTE CA Class	PCC				SCC				Power	
	PCC Bandwidth	channel	RB	RB OFFSET	SCC Bandwidth	channel	RB	RB OFFSET	tune up	conducted power (dBm)
CA 41C	20M	41490	1	99	20M	41292	1	0	22	13.41
CA 41C	20M	41490	1	99	15M	41319	1	0	22	13.53
CA 41C	20M	41490	1	99	10M	41346	1	0	22	13.65
CA 41C	20M	41490	1	99	5M	41373	1	0	22	13.58
CA 41C	20M	39750	1	99	20M	39948	1	0	22	19.89
CA 41C	20M	39750	1	99	15M	39921	1	0	22	19.96
CA 41C	20M	39750	1	99	10M	39894	1	0	22	19.81
CA 41C	20M	39750	1	99	5M	39867	1	0	22	19.82
CA 41C	15M	41515	1	74	15M	41365	1	0	22	13.66
CA 41C	15M	41515	1	74	10M	41395	1	0	22	13.6
CA 41C	15M	39725	1	74	10M	39845	1	0	22	20.04
CA 41C	20M	41490	1	0	20M	41292	1	99	22	19.95
CA 41C	20M	41490	1	0	15M	41319	1	74	22	20.07
CA 41C	20M	41490	1	0	10M	41346	1	49	22	19.91
CA 41C	20M	41490	1	0	5M	41373	1	24	22	19.89
CA 41C	20M	39750	1	0	20M	39948	1	99	22	13.18
CA 41C	20M	39750	1	0	15M	39921	1	74	22	13.39
CA 41C	20M	39750	1	0	10M	39894	1	49	22	13.34
CA 41C	20M	39750	1	0	5M	39867	1	24	22	13.47
CA 41C	15M	41515	1	0	15M	41365	1	74	22	20.16
CA 41C	15M	41515	1	0	10M	41395	1	49	22	19.99
CA 41C	15M	39725	1	0	10M	39845	1	49	22	13.54

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DSI2/3/4/8/9/10										
UL LTE CA Class	PCC				SCC				Power	
	PCC Bandwidth	channel	RB	RB OFFSET	SCC Bandwidth	channel	RB	RB OFFSET	tune up	conducted power (dBm)
CA 41C	20M	41490	1	99	20M	41292	1	0	24	14.16
CA 41C	20M	41490	1	99	15M	41319	1	0	24	14.33
CA 41C	20M	41490	1	99	10M	41346	1	0	24	14.29
CA 41C	20M	41490	1	99	5M	41373	1	0	24	14.32
CA 41C	20M	39750	1	99	20M	39948	1	0	24	23.28
CA 41C	20M	39750	1	99	15M	39921	1	0	24	23.33
CA 41C	20M	39750	1	99	10M	39894	1	0	24	23.15
CA 41C	20M	39750	1	99	5M	39867	1	0	24	23.13
CA 41C	15M	41515	1	74	15M	41365	1	0	24	14.46
CA 41C	15M	41515	1	74	10M	41395	1	0	24	14.37
CA 41C	15M	39725	1	74	10M	39845	1	0	24	23.24
CA 41C	20M	41490	1	0	20M	41292	1	99	24	23.14
CA 41C	20M	41490	1	0	15M	41319	1	74	24	23.27
CA 41C	20M	41490	1	0	10M	41346	1	49	24	23.11
CA 41C	20M	41490	1	0	5M	41373	1	24	24	23.05
CA 41C	20M	39750	1	0	20M	39948	1	99	24	13.93
CA 41C	20M	39750	1	0	15M	39921	1	74	24	14.19
CA 41C	20M	39750	1	0	10M	39894	1	49	24	14.14
CA 41C	20M	39750	1	0	5M	39867	1	24	24	14.3
CA 41C	15M	41515	1	0	15M	41365	1	74	24	23.37
CA 41C	15M	41515	1	0	10M	41395	1	49	24	23.2
CA 41C	15M	39725	1	0	10M	39845	1	49	24	14.34

LTE Carrier Aggregation Conducted Power (Downlink)

Uplink maximum output power is measured with downlink carrier aggregation active, using the channel with highest measured maximum output power when downlink carrier aggregation is inactive. SAR test is not required since maximum output power when downlink carrier aggregation active is not more than ¼ dB higher than the maximum output power measured when downlink carrier aggregation inactive.

Maximum Output Powers

ANT13 DSI2/3

DL LTE CA Class	PCC					SCC		Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	tune up	conducted power (dBm)
CA 7C	15M	21375	3350	36	0	15M	3225	16	15
CA 38C	20M	37850	37850	1	50	20M	38048	19	18.15
CA 41C	15M	41515	41515	1	37	15M	41365	17.5	16.56
CA 4A-4A	20M	20050	2050	1	0	20M	2300	16.5	15.5
CA 7A-7A	10M	21400	3400	25	0	20M	2850	16	15.08
CA 41A-41A	15M	39725	39725	1	74	15M	41515	17.5	16.53
CA 2A-5A	5M	19175	1175	1	24	10M	2525	15.5	14.51
CA 2A-28A	5M	19175	1175	1	24	20M	9460	15.5	14.55
CA 2A-66A	5M	19175	1175	1	24	20M	66786	15.5	14.55
CA 4A-5A	5M	19975	1975	1	12	10M	2525	16.5	15.54
CA 4A-7A	5M	19975	1975	1	12	20M	3100	16.5	15.52
CA 4A-28A	5M	19975	1975	1	12	20M	9460	16.5	15.56
CA 5A-1A	10M	20450	2450	25	0	20M	300	20	18.93
CA 5A-2A	10M	20450	2450	25	0	20M	900	20	18.87
CA 5A-3A	10M	20450	2450	25	0	20M	1575	20	18.87
CA 5A-7A	10M	20450	2450	25	0	20M	3100	20	18.84
CA 5A-41A	10M	20450	2450	25	0	20M	40620	20	18.84
CA 7A-1A	10M	21100	3100	1	24	20M	300	16	15.06
CA 7A-3A	10M	21100	3100	1	24	20M	1575	16	15.02
CA 7A-5A	10M	21100	3100	1	24	10M	2525	16	15.04
CA 7A-8A	10M	21100	3100	1	24	10M	3625	16	15.03
CA 7A-28A	10M	21100	3100	1	24	20M	9460	16	15.03
CA 38A-1A	20M	37850	37850	1	50	20M	300	19	18.17
CA 38A-3A	20M	37850	37850	1	50	20M	1575	19	18.24
CA 38A-8A	20M	37850	37850	1	50	10M	3625	19	18.24
CA 38A-28A	20M	37850	37850	1	50	20M	9460	19	18.18
CA 38A-41A	20M	37850	37850	1	50	20M	40620	19	18.18
CA 41A-1A	5M	40148	40148	1	12	20M	300	17.5	16.92
CA 41A-3A	5M	40148	40148	1	12	20M	1575	17.5	16.89
CA 41A-5A	5M	40148	40148	1	12	10M	2525	17.5	16.9
CA 41A-8A	5M	40148	40148	1	12	10M	3625	17.5	16.96
CA 41A-28A	5M	40148	40148	1	12	20M	9460	17.5	16.89



ANT13 DSI4

DL LTE CA Class	PCC					SCC		Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	tune up	conducted power (dBm)
CA 7C	15M	21375	3350	1	37	15M	3225	23.5	22.66
CA 38C	20M	37850	37850	1	50	20M	38048	24	23.12
CA 41C	15M	41515	41515	1	37	15M	41365	24	22.9
CA 4A-4A	20M	20050	2050	1	50	20M	2300	24	22.91
CA 7A-7A	10M	21400	3400	1	0	20M	2850	23.5	22.7
CA 41A-41A	15M	39725	39725	1	74	15M	41515	24	22.96
CA 2A-5A	10M	18900	900	1	24	10M	2525	24	22.99
CA 2A-28A	10M	18900	900	1	24	20M	9460	24	22.95
CA 2A-66A	10M	18900	900	1	24	20M	66786	24	22.96
CA 4A-5A	20M	20050	2050	1	50	10M	2525	24	23
CA 4A-7A	20M	20050	2050	1	50	20M	3100	24	23.02
CA 4A-28A	20M	20050	2050	1	50	20M	9460	24	23.02
CA 5A-1A	10M	20450	2450	1	24	20M	300	24.5	23.33
CA 5A-2A	10M	20450	2450	1	24	20M	900	24.5	23.25
CA 5A-3A	10M	20450	2450	1	24	20M	1575	24.5	23.25
CA 5A-7A	10M	20450	2450	1	24	20M	3100	24.5	23.31
CA 5A-41A	10M	20450	2450	1	24	20M	40620	24.5	23.32
CA 7A-1A	5M	21100	3100	1	24	20M	300	23.5	22.69
CA 7A-3A	5M	21100	3100	1	24	20M	1575	23.5	22.66
CA 7A-5A	5M	21100	3100	1	24	10M	2525	23.5	22.66
CA 7A-8A	5M	21100	3100	1	24	10M	3625	23.5	22.67
CA 7A-28A	5M	21100	3100	1	24	20M	9460	23.5	22.72
CA 38A-1A	5M	38000	38000	1	12	20M	300	24	23.22
CA 38A-3A	5M	38000	38000	1	12	20M	1575	24	23.14
CA 38A-8A	5M	38000	38000	1	12	10M	3625	24	23.22
CA 38A-28A	5M	38000	38000	1	12	20M	9460	24	23.26
CA 38A-41A	5M	38000	38000	1	12	20M	40620	24	23.26
CA 41A-1A	5M	40148	40148	1	12	20M	300	24	23.33
CA 41A-3A	5M	40148	40148	1	12	20M	1575	24	23.34
CA 41A-5A	5M	40148	40148	1	12	10M	2525	24	23.37
CA 41A-8A	5M	40148	40148	1	12	10M	3625	24	23.41
CA 41A-28A	5M	40148	40148	1	12	20M	9460	24	23.39

ANT13 DSI8/9/10

DL LTE CA Class	PCC					SCC		Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	tune up	conducted power (dBm)
CA 7C	15M	21375	3350	36	0	15M	3225	18.5	17.39
CA 38C	20M	37850	37850	1	50	20M	38048	22.5	21.51
CA 41C	15M	41515	41515	1	37	15M	41365	22	20.32
CA 4A-4A	20M	20050	2050	50	0	20M	2300	18.5	17.52
CA 7A-7A	10M	21400	3400	25	0	20M	2850	18.5	17.37
CA 41A-41A	15M	39725	39725	1	74	15M	41515	22	20.29
CA 2A-5A	5M	18900	900	12	0	10M	2525	18.5	17.44
CA 2A-28A	5M	18900	900	12	0	20M	9460	18.5	17.48
CA 2A-66A	5M	18900	900	12	0	20M	66786	18.5	17.47
CA 4A-5A	20M	20050	2050	50	0	10M	2525	18.5	17.56
CA 4A-7A	20M	20050	2050	50	0	20M	3100	18.5	17.51
CA 4A-28A	20M	20050	2050	50	0	20M	9460	18.5	17.56
CA 7A-1A	10M	21100	3100	1	24	20M	300	18.5	17.34
CA 7A-3A	10M	21100	3100	1	24	20M	1575	18.5	17.38
CA 7A-5A	10M	21100	3100	1	24	10M	2525	18.5	17.36
CA 7A-8A	10M	21100	3100	1	24	10M	3625	18.5	17.39
CA 7A-28A	10M	21100	3100	1	24	20M	9460	18.5	17.34
CA 38A-1A	5M	38000	38000	1	12	20M	300	22.5	18.86
CA 38A-3A	5M	38000	38000	1	12	20M	1575	22.5	18.86
CA 38A-8A	5M	38000	38000	1	12	10M	3625	22.5	18.88
CA 38A-28A	5M	38000	38000	1	12	20M	9460	22.5	18.85
CA 38A-41A	5M	38000	38000	1	12	20M	40620	22.5	18.89
CA 41A-1A	5M	40148	40148	1	12	20M	300	22	20.35
CA 41A-3A	5M	40148	40148	1	12	20M	1575	22	20.31
CA 41A-5A	5M	40148	40148	1	12	10M	2525	22	20.35
CA 41A-8A	5M	40148	40148	1	12	10M	3625	22	20.36
CA 41A-28A	5M	40148	40148	1	12	20M	9460	22	20.35



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ANT31/41 DSI2

DL LTE CA Class	PCC					SCC		Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	tune up	conducted power (dBm)
CA 7C	15M	21375	3350	1	37	15M	3225	24	23.21
CA 38C	20M	37850	37850	1	50	20M	38048	24	23.1
CA 41C	15M	41515	41515	1	37	15M	41365	24	23.2
CA 4A-4A	20M	20050	2050	1	0	20M	2300	24.8	23.66
CA 7A-7A	10M	21400	3400	1	24	20M	2850	24	23.36
CA 41A-41A	15M	39725	39725	1	37	15M	41515	24	23.12
CA 2A-5A	20M	18900	900	1	50	10M	2525	24.8	23.45
CA 2A-28A	20M	18900	900	1	50	20M	9460	24.8	23.55
CA 2A-66A	20M	18900	900	1	50	20M	66786	24.8	23.5
CA 4A-5A	5M	19975	1975	1	12	10M	2525	24.8	23.73
CA 4A-7A	5M	19975	1975	1	12	20M	3100	24.8	23.74
CA 4A-28A	5M	19975	1975	1	12	20M	9460	24.8	23.73
CA 5A-1A	10M	20450	2450	1	24	20M	300	24.5	23.23
CA 5A-2A	10M	20450	2450	1	24	20M	900	24.5	23.23
CA 5A-3A	10M	20450	2450	1	24	20M	1575	24.5	23.19
CA 5A-7A	10M	20450	2450	1	24	20M	3100	24.5	23.18
CA 5A-41A	10M	20450	2450	1	24	20M	40620	24.5	23.16
CA 7A-1A	5M	21425	3425	1	12	20M	300	24	23.35
CA 7A-3A	5M	21425	3425	1	12	20M	1575	24	23.27
CA 7A-5A	5M	21425	3425	1	12	10M	2525	24	23.27
CA 7A-8A	5M	21425	3425	1	12	10M	3625	24	23.27
CA 7A-28A	5M	21425	3425	1	12	20M	9460	24	23.27
CA 38A-1A	10M	38000	38000	1	0	20M	300	24	23.32
CA 38A-3A	10M	38000	38000	1	0	20M	1575	24	23.22
CA 38A-8A	10M	38000	38000	1	0	10M	3625	24	23.29
CA 38A-28A	10M	38000	38000	1	0	20M	9460	24	23.24
CA 38A-41A	10M	38000	38000	1	0	20M	40620	24	23.23
CA 41A-1A	5M	40620	40620	1	12	20M	300	24	23.34
CA 41A-3A	5M	40620	40620	1	12	20M	1575	24	23.43
CA 41A-5A	5M	40620	40620	1	12	10M	2525	24	23.4
CA 41A-8A	5M	40620	40620	1	12	10M	3625	24	23.36
CA 41A-28A	5M	40620	40620	1	12	20M	9460	24	23.33

ANT31/41 DSI4

DL LTE CA Class	PCC					SCC		Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	tune up	conducted power (dBm)
CA 7C	15M	21375	3350	1	37	15M	3225	22	21.28
CA 66C	20M	132072	66536	50	50	20M	33734	21.8	20.75
CA 4A-4A	20M	20050	2050	1	50	20M	2300	21.8	20.74
CA 7A-7A	10M	21400	3400	1	24	20M	2850	22	21.33
CA 2A-5A	5M	18900	900	1	12	10M	2525	23.3	21.97
CA 2A-28A	5M	18900	900	1	12	20M	9460	23.3	21.99
CA 2A-66A	5M	18900	900	1	12	20M	66786	23.3	22.08
CA 4A-5A	10M	20000	2000	1	49	10M	2525	21.8	20.8
CA 4A-7A	10M	20000	2000	1	49	20M	3100	21.8	20.8
CA 4A-28A	10M	20000	2000	1	49	20M	9460	21.8	20.83
CA 7A-1A	5M	21425	3425	1	12	20M	300	22	21.31
CA 7A-3A	5M	21425	3425	1	12	20M	1575	22	21.3
CA 7A-5A	5M	21425	3425	1	12	10M	2525	22	21.3
CA 7A-8A	5M	21425	3425	1	12	10M	3625	22	21.3
CA 7A-28A	5M	21425	3425	1	12	20M	9460	22	21.32

ANT31/41 DSI8/9/10

DL LTE CA Class	PCC					SCC		Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	tune up	conducted power (dBm)
CA 7C	15M	21375	3350	1	37	15M	3225	21	19.26
CA 4A-4A	20M	20050	2050	1	0	20M	2300	20.5	19.68
CA 7A-7A	10M	21400	3400	25	0	20M	2850	21	19.27
CA 2A-5A	20M	18900	900	50	0	10M	2525	21.5	20.59
CA 2A-28A	20M	18900	900	50	0	20M	9460	21.5	20.58
CA 2A-66A	20M	18900	900	50	0	20M	66786	21.5	20.56
CA 4A-5A	10M	20000	2000	25	25	10M	2525	20.5	19.7
CA 4A-7A	10M	20000	2000	25	25	20M	3100	20.5	19.81
CA 4A-28A	10M	20000	2000	25	25	20M	9460	20.5	19.71
CA 7A-1A	20M	21350	3350	50	25	20M	300	21	19.28
CA 7A-3A	20M	21350	3350	50	25	20M	1575	21	19.22
CA 7A-5A	20M	21350	3350	50	25	10M	2525	21	19.23
CA 7A-8A	20M	21350	3350	50	25	10M	3625	21	19.2
CA 7A-28A	20M	21350	3350	50	25	20M	9460	21	19.19

LTE Carrier Aggregation 4x4 MIMO RF Conduction Powers

This device supports downlink 4x4 MIMO operations for some LTE bands.

Per May 2017 TCB Workshop Notes, SAR for 4x4 DL MIMO was not needed since the maximum average output power in 4x4 DL MIMO mode was not more than 0.25 dB higher than the maximum output power with 4x4 DL MIMO inactive. Additionally, SAR for 4x4 MIMO Downlink Carrier Aggregation was not needed since the maximum average output power in 4x4 MIMO Downlink Carrier Aggregation mode was not more than 0.25 dB higher than the maximum output power with 4x4 MIMO Downlink and downlink carrier aggregation inactive.

Maximum Output Powers

ANT13 DSI2/3

DL TE CA Class	PCC					PCC					SCC					SCC					Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	PCC Bandwidth	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	SCC Bandwidth	DL channel	tune up	conducted power (dBm)							
CA 7C-7C	15M	21375	3350	36	0	15M	3225	36	0	15M	3350	15M	3225	16	14.94							
CA 38C-38C	20M	37850	37850	1	50	20M	38048	1	50	20M	37850	20M	38048	19	18.02							
CA 41C-41C	15M	41515	41515	1	37	15M	41365	1	37	15M	41515	15M	41365	17.5	16.43							
CA 4A*4A-4A*4A	20M	20050	2050	1	0	20M	2300	1	0	20M	2050	20M	2300	16.5	15.37							
CA 7A*7A-7A*7A	10M	21400	3400	25	0	20M	2850	25	0	10M	3400	20M	2850	16	15.05							
CA 41A*41A-41A*41A	15M	39725	39725	1	74	15M	41515	1	74	15M	39725	15M	41515	17.5	16.38							
CA 2A*2A-5A*5A	5M	19175	1175	1	24	20M	700	1	0	10M	2450	10M	2600	15.5	14.44							
CA 4A*4A-2A*2A	20M	20050	2050	1	0	20M	2300	1	0	5M	1175	20M	700	16.5	15.41							
CA 4A*4A-5A*5A	20M	20050	2050	1	0	20M	2300	1	0	10M	2450	10M	2600	16.5	15.35							
CA 4A*4A-7A*7A	20M	20050	2050	1	0	20M	2300	1	0	10M	3400	20M	2850	16.5	15.49							
CA 5A*5A-1A*1A	10M	20450	2450	25	0	10M	2600	25	0	20M	250	20M	500	20	18.82							
CA 5A*5A-2A*2A	10M	20450	2450	25	0	10M	2600	25	0	5M	1175	20M	700	20	18.65							
CA 5A*5A-3A*3A	10M	20450	2450	25	0	10M	2600	25	0	20M	1300	20M	1850	20	18.78							
CA 5A*5A-7A*7A	10M	20450	2450	25	0	10M	2600	25	0	20M	3400	20M	2850	20	18.6							
CA 5A*5A-41A*41A	10M	20450	2450	25	0	10M	2600	25	0	15M	39725	15M	41515	20	18.68							
CA 7A*7A-1A*1A	10M	21400	3400	25	0	20M	2850	25	0	20M	250	20M	500	16	14.9							
CA 7A*7A-3A*3A	10M	21400	3400	25	0	20M	2850	25	0	20M	1300	20M	1850	16	14.99							
CA 7A*7A-5A*5A	10M	21400	3400	25	0	20M	2850	25	0	10M	2450	10M	2600	16	14.85							
CA 41A*41A-1A*1A	15M	39725	39725	1	74	15M	41515	1	74	20M	250	20M	500	17.5	16.86							
CA 41A*41A-3A*3A	15M	39725	39725	1	74	15M	41515	1	74	20M	1300	20M	1850	17.5	16.7							
CA 41A*41A-5A*5A	15M	39725	39725	1	74	15M	41515	1	74	10M	2450	10M	2600	17.5	16.79							

ANT13 DSI4

DL TE CA Class	PCC					PCC					SCC					SCC					Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	PCC Bandwidth	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	SCC Bandwidth	DL channel	tune up	conducted power (dBm)							
CA 7C-7C	15M	21375	3350	1	37	15M	3225	1	37	15M	3350	15M	3225	23.5	22.45							
CA 38C-38C	20M	37850	37850	1	50	20M	38048	1	50	20M	37850	20M	38048	24	22.9							
CA 41C-41C	15M	41515	41515	1	37	15M	41365	1	37	15M	41515	15M	41365	24	22.8							
CA 4A*4A-4A*4A	20M	20050	2050	1	50	20M	2300	1	50	20M	2050	20M	2300	24	22.74							
CA 7A*7A-7A*7A	10M	21400	3400	1	0	20M	2850	1	0	10M	3400	20M	2850	23.5	22.56							
CA 41A*41A-41A*41A	15M	39725	39725	1	74	15M	41515	1	74	15M	39725	15M	41515	24	22.67							
CA 2A*2A-5A*5A	5M	19175	1175	1	24	20M	700	1	0	10M	2450	10M	2600	24	21.97							
CA 4A*4A-5A*5A	20M	20050	2050	1	50	20M	2300	1	50	10M	2450	10M	2600	24	22.82							
CA 4A*4A-7A*7A	20M	20050	2050	1	50	20M	2300	1	50	20M	250	20M	500	24.5	23.13							
CA 5A*5A-1A*1A	10M	20450	2450	1	24	10M	2600	1	0	5M	1175	20M	700	24.5	23							
CA 5A*5A-3A*3A	10M	20450	2450	1	24	10M	2600	1	0	20M	1300	20M	1850	24.5	23.11							
CA 5A*5A-7A*7A	10M	20450	2450	1	24	10M	2600	1	0	10M	3400	20M	2850	24.5	23.01							
CA 5A*5A-41A*41A	10M	20450	2450	1	24	10M	2600	1	0	15M	39725	15M	41515	24.5	23.09							
CA 7A*7A-1A*1A	10M	21400	3400	1	0	20M	2850	1	0	20M	250	20M	500	23.5	22.55							
CA 7A*7A-3A*3A	10M	21400	3400	1	0	20M	2850	1	0	20M	1300	20M	1850	23.5	22.35							
CA 7A*7A-5A*5A	10M	21400	3400	1	0	20M	2850	1	0	10M	2450	10M	2600	23.5	22.36							
CA 41A*41A-1A*1A	15M	39725	39725	1	74	15M	41515	1	74	20M	250	20M	500	24	23.14							
CA 41A*41A-3A*3A	15M	39725	39725	1	74	15M	41515	1	74	20M	1300	20M	1850	24	23.09							
CA 41A*41A-5A*5A	15M	39725	39725	1	74	15M	41515	1	74	10M	2450	10M	2600	24	23.31							

ANT13 DSI8/9/10

DL TE CA Class	PCC					PCC					SCC					SCC					Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	PCC Bandwidth	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	tune up	conducted power (dBm)	
CA 7C-7C	15M	21375	3350	36	0	15M	3225	36	0	15M	3350	15M	3225	18.5	17.33							
CA 38C-38C	20M	37850	37850	1	50	20M	38048	1	50	20M	37850	20M	38048	22.5	19.65							
CA 41C-41C	15M	41515	41515	1	37	15M	41365	1	37	15M	41515	15M	41365	22	19.48							
CA 4A*4A-4A*4A	20M	20050	2050	50	0	20M	2300	50	0	20M	2050	20M	2300	18.5	17.4							
CA 7A*7A-7A*7A	10M	21400	3400	25	0	20M	2850	1	0	10M	3400	20M	2850	18.5	17.28							
CA 41A*41A-41A*41A	15M	39725	39725	1	74	15M	41515	1	74	15M	39725	15M	41515	22	19.6							
CA 2A*2A-5A*5A	5M	18900	900	12	0	10M	2525	1	0	10M	2450	10M	2600	18.5	17.29							
CA 4A*4A-5A*5A	20M	20050	2050	50	0	20M	2300	50	0	10M	2450	10M	2600	18.5	17.36							
CA 4A*4A-7A*7A	20M	20050	2050	50	0	20M	2300	50	0	10M	3400	20M	2850	18.5	17.34							
CA 7A*7A-1A*1A	10M	21400	3400	25	0	20M	2850	1	0	20M	250	20M	500	18.5	17.25							
CA 7A*7A-3A*3A	10M	21400	3400	25	0	20M	2850	1	0	20M	1300	20M	1850	18.5	17.46							
CA 7A*7A-5A*5A	10M	21400	3400	25	0	20M	2850	1	0	10M	2450	10M	2600	18.5	17.34							
CA 41A*41A-1A*1A	15M	39725	39725	1	74	15M	41515	1	74	20M	250	20M	500	22	19.96							
CA 41A*41A-3A*3A	15M	39725	39725	1	74	15M	41515	1	74	20M	1300	20M	1850	22	19.88							
CA 41A*41A-5A*5A	15M	39725	39725	1	74	15M	41515	1	74	10M	2450	10M	2600	22	19.96							

ANT31/41 DSI2/3

DL LTE CA Class	PCC					PCC					SCC					SCC					Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	PCC Bandwidth	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	UL channel	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	tune up	conducted power (dBm)	
CA 7C-7C	15M	21375	3350	1	37	15M	3225	1	37	15M	3350	15M	3225	1	37	15M	3350	15M	3225	24	23.06	
CA 38C-38C	20M	37850	37850	1	50	20M	38048	1	50	20M	37850	20M	38048	1	50	20M	37850	20M	38048	24	23.02	
CA 41C-41C	15M	41515	41515	1	37	15M	41365	1	37	15M	41515	15M	41365	1	37	15M	41515	15M	41365	24	23.15	
CA 4A*1A-5A*1A	20M	20050	2050	1	0	20M	2300	1	0	20M	2050	20M	2300	1	0	20M	2050	20M	2300	24.8	23.5	
CA 7A*7A-7A*7A	10M	21400	3400	1	24	20M	2850	1	0	10M	3400	20M	2850	1	0	10M	3400	20M	2850	24	23.09	
CA 41A*11A-41A*11A	15M	39725	39725	1	37	15M	41515	1	37	15M	39725	15M	41515	1	37	15M	39725	15M	41515	24	22.96	
CA 2A*2A-5A*5A	5M	19175	1175	1	50	20M	700	1	0	10M	2450	10M	2600	1	0	10M	2450	10M	2600	24.8	23.3	
CA 4A*1A-5A*5A	20M	20050	2050	1	0	20M	2300	1	0	10M	2450	10M	2600	1	0	10M	2450	10M	2600	24.8	23.62	
CA 4A*1A-7A*7A	20M	20050	2050	1	0	20M	2300	1	0	10M	3400	20M	2850	1	0	10M	3400	20M	2850	24.8	23.56	
CA 5A*5A-1A*1A	10M	20450	2450	1	24	10M	2600	1	0	20M	250	20M	500	1	0	20M	250	20M	500	24.5	23.03	
CA 5A*5A-2A*2A	10M	20450	2450	1	24	10M	2600	1	0	5M	1175	20M	700	1	0	5M	1175	20M	700	24.5	23.07	
CA 5A*5A-3A*3A	10M	20450	2450	1	24	10M	2600	1	0	20M	1300	20M	1850	1	0	20M	1300	20M	1850	24.5	22.98	
CA 5A*5A-7A*7A	10M	20450	2450	1	24	10M	2600	1	0	10M	3400	20M	2850	1	0	10M	3400	20M	2850	24.5	22.85	
CA 5A*5A-41A*41A	10M	20450	2450	1	24	10M	2600	1	0	15M	39725	15M	41515	1	37	15M	39725	15M	41515	24.5	23.04	
CA 7A*7A-1A*1A	10M	21400	3400	1	24	20M	2850	1	0	20M	250	20M	500	1	0	20M	250	20M	500	24	23.14	
CA 7A*7A-3A*3A	10M	21400	3400	1	24	20M	2850	1	0	20M	1300	20M	1850	1	0	20M	1300	20M	1850	24	23.13	
CA 7A*7A-5A*5A	10M	21400	3400	1	24	20M	2850	1	0	10M	2450	10M	2600	1	0	10M	2450	10M	2600	24	23	
CA 41A*41A-1A*1A	15M	39725	39725	1	37	20M	250	1	0	20M	250	20M	500	1	0	20M	250	20M	500	24	23.11	
CA 41A*41A-3A*3A	15M	39725	39725	1	37	15M	41515	1	37	20M	1300	20M	1850	1	0	20M	1300	20M	1850	24	23.32	
CA 41A*41A-5A*5A	15M	39725	39725	1	37	15M	41515	1	37	10M	2450	10M	2600	1	0	10M	2450	10M	2600	24	23.1	

ANT31/41 DSI4

DL LTE CA Class	PCC					PCC					SCC					SCC					Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	PCC Bandwidth	DL channel	UL RB	UL RB OFFSET	PCC Bandwidth	DL channel	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	tune up	conducted power (dBm)	
CA 7C*7C	15M	21375	3350	1	37	15M	3225	1	37	15M	3350	15M	3225	22		15M	3350	15M	3225	22	21.04	
CA 4A*1A-4A*1A	20M	20050	2050	1	50	20M	2300	1	50	20M	2050	20M	2300	21.8		20M	2050	20M	2300	21.8	20.68	
CA 7A*7A-7A*7A	10M	21400	3400	1	24	20M	2850	1	0	10M	3400	20M	2850	22		10M	3400	20M	2850	22	21.12	
CA 2A*2A-5A*5A	5M	19175	1175	1	12	20M	700	1	0	10M	2450	10M	2600	23.3		10M	2450	10M	2600	23.3	21.82	
CA 4A*1A-5A*5A	20M	20050	2050	1	50	20M	2300	1	50	10M	2450	10M	2600	21.8		10M	2450	10M	2600	21.8	20.56	
CA 4A*1A-7A*7A	20M	20050	2050	1	50	20M	2300	1	50	10M	3400	20M	2850	21.8		10M	3400	20M	2850	21.8	20.57	
CA 7A*7A-1A*1A	10M	21400	3400	1	24	20M	2850	1	0	20M	250	20M	500	22		20M	250	20M	500	22	21.09	
CA 7A*7A-5A*5A	10M	21400	3400	1	24	20M	2850	1	0	20M	1300	20M	1850	22		20M	1300	20M	1850	22	21.23	
CA 7A*7A-3A*3A	10M	21400	3400	1	24	20M	2850	1	0	10M	2450	10M	2600	22		10M	2450	10M	2600	22	21.26	

ANT31/41 DSI8/9/10

DL LTE CA Class	PCC					PCC					SCC					SCC					Power	
	PCC Bandwidth	UL channel	DL channel	UL RB	UL RB OFFSET	PCC Bandwidth	DL channel	UL RB	UL RB OFFSET	PCC Bandwidth	DL channel	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	SCC Bandwidth	DL channel	UL RB	UL RB OFFSET	tune up	conducted power (dBm)	
CA 7C*7C	15M	21375	3350	1	37	15M	3225	1	37	15M	3350	15M	3225	1	37	15M	3350	15M	3225	21	19.82	
CA 4A*1A-4A*1A	20M	20050	2050	1	0	20M	2300	1	0	20M	2050	20M	2300	1	0	20M	2050	20M	2300	20.5	19.64	
CA 7A*7A-7A*7A	10M	21400	3400	25	0	20M	2850	1	0	10M	3400	20M	2850	1	0	10M	3400	20M	2850	21	19.27	
CA 2A*2A-5A*5A	5M	19175	1175	50	0	20M	700	1	0	10M	2450	10M	2600	1	0	10M	2450	10M	2600	21.5	20.42	
CA 4A*1A-5A*5A	20M	20050	2050	1	0	20M	2300	1	0	10M	2450	10M	2600	1	0	10M	2450	10M	2600	20.5	19.7	
CA 4A*1A-7A*7A	20M	20050	2050	1	0	20M	2300	1	0	10M	3400	20M	2850	1	0	10M	3400	20M	2850	20.5	19.63	
CA 7A*7A-1A*1A	10M	21400	3400	25	0	20M	2850	1	0	20M	250	20M	500	1	0	20M	250	20M	500	21	19.25	
CA 7A*7A-3A*3A	10M	21400	3400	25	0	20M	2850	1	0	20M	1300	20M	1850	1	0	20M	1300	20M	1850	21	19.21	
CA 7A*7A-5A*5A	10M	21400	3400	25	0	20M	2850	1	0	10M	2450	10M	2600	1	0	10M	2450	10M	2600	21	19.29	

11.5 NR 5G Measurement result

According to April 2015 TCB workshop, SAR test exclusion can be applied for testing overlapping 5G NR(FR1) bands as follows:

- The maximum output power, including tolerance, for the smaller band must be $\leq$ the larger band to qualify for the SAR test exclusion.
- The channel bandwidth and other operating parameters for the smaller band must be fully supported by the larger band.

Due to test setup limitations, SAR testing for NR was performed using Factory Test Mode software to establish the connection and perform SAR with 100% transmission.

Uplink RB allocations were used to Table 6.1-1 of the 3GPP TS 138.521-1:

Channel Bandwidth	SCS(kHz)	OFDM	RB allocation							
			Edge_Full_Left	Edge_Full_Right	Edge_1RB_Left	Edge_1RB_Right	Outer_Full	Inner_Full	Inner_1RB_Left	Inner_1RB_Right
5MHz	15	DFT-s	2@0	2@23	1@0	1@24	25@0	12@6	1@1	1@23
		CP	2@0	2@23	1@0	1@24	25@0	13@6	1@1	1@23
	30	DFT-s	2@0	2@9	1@0	1@10	10@0	5@2 ¹	1@1	1@9
		CP	2@0	2@9	1@0	1@10	11@0	5@2 ¹	1@1	1@9
	60	DFT-s	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
		CP	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
10MHz	15	DFT-s	2@0	2@50	1@0	1@51	50@0	25@12	1@1	1@50
		CP	2@0	2@50	1@0	1@51	52@0	26@13	1@1	1@50
	30	DFT-s	2@0	2@22	1@0	1@23	24@0	12@6	1@1	1@22
		CP	2@0	2@22	1@0	1@23	24@0	12@6	1@1	1@22
	60	DFT-s	2@0	2@9	1@0	1@10	10@0	5@2 ¹	1@1	1@9
		CP	2@0	2@9	1@0	1@10	11@0	5@2 ¹	1@1	1@9
15MHz	15	DFT-s	2@0	2@77	1@0	1@78	75@0	36@18	1@1	1@77
		CP	2@0	2@77	1@0	1@78	79@0	39@19 ¹	1@1	1@77
	30	DFT-s	2@0	2@36	1@0	1@37	36@0	18@9	1@1	1@36
		CP	2@0	2@36	1@0	1@37	38@0	19@9	1@1	1@36
	60	DFT-s	2@0	2@16	1@0	1@17	18@0	9@4	1@1	1@16
		CP	2@0	2@16	1@0	1@17	18@0	9@4	1@1	1@16
20MHz	15	DFT-s	2@0	2@104	1@0	1@105	100@0	50@25	1@1	1@104
		CP	2@0	2@104	1@0	1@105	106@0	53@26	1@1	1@104
	30	DFT-s	2@0	2@49	1@0	1@50	50@0	25@12	1@1	1@49
		CP	2@0	2@49	1@0	1@50	51@0	25@12 ¹	1@1	1@49
	60	DFT-s	2@0	2@22	1@0	1@23	24@0	12@6	1@1	1@22
		CP	2@0	2@22	1@0	1@23	24@0	12@6	1@1	1@22
25MHz	15	DFT-s	2@0	2@131	1@0	1@132	128@0	64@32	1@1	1@131
		CP	2@0	2@131	1@0	1@132	133@0	67@33	1@1	1@131
	30	DFT-s	2@0	2@63	1@0	1@64	64@0	32@16	1@1	1@63
		CP	2@0	2@63	1@0	1@64	65@0	33@16	1@1	1@63
	60	DFT-s	2@0	2@29	1@0	1@30	30@0	15@7 ¹	1@1	1@29
		CP	2@0	2@29	1@0	1@30	31@0	15@7 ¹	1@1	1@29
30MHz	15	DFT-s	2@0	2@158	1@0	1@159	160@0	80@40	1@1	1@158
		CP	2@0	2@158	1@0	1@159	160@0	80@40	1@1	1@158
	30	DFT-s	2@0	2@76	1@0	1@77	75@0	36@18	1@1	1@76
		CP	2@0	2@76	1@0	1@77	78@0	39@19	1@1	1@76
	60	DFT-s	2@0	2@36	1@0	1@37	36@0	18@9	1@1	1@36
		CP	2@0	2@36	1@0	1@37	38@0	19@9	1@1	1@36
40MHz	15	DFT-s	2@0	2@214	1@0	1@215	216@0	108@54	1@1	1@214
		CP	2@0	2@214	1@0	1@215	216@0	108@54	1@1	1@214
	30	DFT-s	2@0	2@104	1@0	1@105	100@0	50@25	1@1	1@104
		CP	2@0	2@104	1@0	1@105	106@0	53@26	1@1	1@104
	60	DFT-s	2@0	2@49	1@0	1@50	50@0	25@12	1@1	1@49
		CP	2@0	2@49	1@0	1@50	51@0	25@12 ¹	1@1	1@49
50MHz	15	DFT-s	2@0	2@268	1@0	1@269	270@0	135@67	1@1	1@268
		CP	2@0	2@268	1@0	1@269	270@0	135@67	1@1	1@268
	30	DFT-s	2@0	2@131	1@0	1@132	128@0	64@32	1@1	1@131
		CP	2@0	2@131	1@0	1@132	133@0	67@33	1@1	1@131
	60	DFT-s	2@0	2@63	1@0	1@64	64@0	32@16	1@1	1@63
		CP	2@0	2@63	1@0	1@64	65@0	33@16	1@1	1@63
60MHz	15	DFT-s	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
		CP	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30	DFT-s	2@0	2@160	1@0	1@161	162@0	81@40	1@1	1@160
		CP	2@0	2@160	1@0	1@161	162@0	81@40	1@1	1@160
	60	DFT-s	2@0	2@77	1@0	1@78	75@0	36@18	1@1	1@77
		CP	2@0	2@77	1@0	1@78	79@0	39@19 ¹	1@1	1@77
80MHz	15	DFT-s	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
		CP	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

	30	DFT-s	2@0	2@215	1@0	1@216	216@0	108@54	1@1	1@215
		CP	2@0	2@215	1@0	1@216	217@0	109@54	1@1	1@215
	60	DFT-s	2@0	2@105	1@0	1@106	100@0	50@25	1@1	1@105
		CP	2@0	2@105	1@0	1@106	107@0	53@26 ¹	1@1	1@105
90MHz	15	DFT-s	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
		CP	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30	DFT-s	2@0	2@243	1@0	1@244	240@0	120@60	1@1	1@243
		CP	2@0	2@243	1@0	1@244	245@0	123@61	1@1	1@243
	60	DFT-s	2@0	2@119	1@0	1@120	120@0	60@30	1@1	1@119
		CP	2@0	2@119	1@0	1@120	121@0	61@30	1@1	1@119
100MHz	15	DFT-s	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
		CP	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30	DFT-s	2@0	2@271	1@0	1@272	270@0	135@67	1@1	1@271
		CP	2@0	2@271	1@0	1@272	273@0	137@68	1@1	1@271
	60	DFT-s	2@0	2@133	1@0	1@134	135@0	64@32	1@1	1@133
		CP	2@0	2@133	1@0	1@134	135@0	67@33 ¹	1@1	1@133

Note 1: The allocated RB number L_{RB} is $\text{ceil}(N_{RB}/2) - 1$ in order to meet Inner RB allocation definition ($RB_{start,Low} \leq RB_{start} \leq RB_{start,High}$) described in subclause 6.2.2 of TS 38.101-1 [2].

3GPP MPR for NR:

Table 6.2.2.3-1: Maximum Power Reduction (MPR) for Power 3

Modulation	MPR (dB)		
	Edge RB allocations	Outer RB allocations	Inner RB allocations
DFT-s-OFDM PI/2 BPSK	$\leq 3.5^1$	$\leq 1.2^1$	$\leq 0.2^1$
	$\leq 0.5^2$		0 ²
DFT-s-OFDM QPSK	≤ 1		0
DFT-s-OFDM 16 QAM	≤ 2		≤ 1
DFT-s-OFDM 64 QAM		≤ 2.5	
DFT-s-OFDM 256 QAM		≤ 4.5	
CP-OFDM QPSK	≤ 3		≤ 1.5
CP-OFDM 16 QAM	≤ 3		≤ 2
CP-OFDM 64 QAM		≤ 3.5	
CP-OFDM 256 QAM		≤ 6.5	

NOTE 1: Applicable for UE operating in TDD mode with PI/2 BPSK modulation and UE indicates support for UE capability *powerBoosting-pi2BPSK* and if the IE *powerBoostPi2BPSK* is set to 1 and 40 % or less slots in radio frame are used for UL transmission for bands n40, n41, n77, n78 and n79. The reference power of 0dB MPR is 26dBm.

NOTE 2: Applicable for UE operating in FDD mode, or in TDD mode in bands other than n40, n41, n77, n78 and n79 and if the IE *powerBoostPi2BPSK* is set to 0 and if more than 40% of slots in radio frame are used for UL transmission for bands n40, n41, n77, n78 and n79.

Table 6.2.2-2 Maximum power reduction (MPR) for power class 2

Modulation		MPR (dB)		
		Edge RB allocations	Outer RB allocations	Inner RB allocations
DFT-s-OFDM	PI/2 BPSK	≤ 3.5	≤ 0.5	0
	QPSK	≤ 3.5	≤ 1	0
	16 QAM	≤ 3.5	≤ 2	≤ 1
	64 QAM	≤ 3.5	≤ 2.5	
	256 QAM		≤ 4.5	
CP-OFDM	QPSK	≤ 3.5	≤ 3	≤ 1.5
	16 QAM	≤ 3.5	≤ 3	≤ 2
	64 QAM		≤ 3.5	
	256 QAM		≤ 6.5	

N5(ANT13 DSI2)

Test Freq Description	5G-n5							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n5
High	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	846.5	169300	20.5	19.37
Middle	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	836.5	167300	20.5	19.40
Low	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	826.5	165300	20.5	19.71
High	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	839	167800	20.5	19.37
Middle	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	836.5	167300	20.5	19.36
Low	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	834	166800	20.5	19.41
Low	15	5	DFT-s-OFDM PI/2 BPSK1	Inner_Full	12_6	826.5	165300	20.5	19.50
Low	15	5	DFT-s-OFDM 16QAM	Inner_Full	12_6	826.5	165300	20.5	19.49
Low	15	5	DFT-s-OFDM 64QAM	Inner_Full	12_6	826.5	165300	20.5	19.46
Low	15	5	DFT-s-OFDM 256QAM	Inner_Full	12_6	826.5	165300	20.5	19.51
Low	15	5	CP-OFDM QPSK	Inner_Full	13_6	826.5	165300	20.5	19.50
Low	15	5	CP-OFDM 16QAM	Inner_Full	13_6	826.5	165300	20.5	19.60
Low	15	5	CP-OFDM 64QAM	Inner_Full	13_6	826.5	165300	20.5	19.54
Low	15	5	CP-OFDM 256QAM	Inner_Full	13_6	826.5	165300	20.5	16.48
Low	15	5	DFT-s-OFDM QPSK	Edge_Full_Right	2_23	826.5	165300	20.5	19.33
Low	15	5	DFT-s-OFDM QPSK	Edge_Full_Left	2_0	826.5	165300	20.5	19.34
Low	15	5	DFT-s-OFDM QPSK	Edge_1RB_Right	1_24	826.5	165300	20.5	19.64
Low	15	5	DFT-s-OFDM QPSK	Edge_1RB_Left	1_0	826.5	165300	20.5	19.61
Low	15	5	DFT-s-OFDM QPSK	Inner_1RB_Right	1_23	826.5	165300	20.5	19.62
Low	15	5	DFT-s-OFDM QPSK	Inner_1RB_Left	1_1	826.5	165300	20.5	19.67
Low	15	5	DFT-s-OFDM QPSK	Outer_Full	25_0	826.5	165300	20.5	19.50
Low	15	10	DFT-s-OFDM QPSK	Inner_Full	25_12	829	165800	20.5	19.58
Low	15	15	DFT-s-OFDM QPSK	Inner_Full	36_18	831.5	166300	20.5	19.60

N5(ANT13 DSI4/10)

Test Freq Description	5G-n5							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n5
High	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	846.5	169300	24.00	22.84
Middle	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	836.5	167300	24.00	22.99
Low	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	826.5	165300	24.00	23.09
High	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	839	167800	24.00	23.01
Middle	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	836.5	167300	24.00	23.02
Low	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	834	166800	24.00	23.05
Low	15	5	DFT-s-OFDM PI/2 BPSK1	Inner_Full	12_6	826.5	165300	24.00	23.01
Low	15	5	DFT-s-OFDM 16QAM	Inner_Full	12_6	826.5	165300	23.50	22.07
Low	15	5	DFT-s-OFDM 64QAM	Inner_Full	12_6	826.5	165300	21.50	20.57
Low	15	5	DFT-s-OFDM 256QAM	Inner_Full	12_6	826.5	165300	19.50	18.57
Low	15	5	CP-OFDM QPSK	Inner_Full	13_6	826.5	165300	22.50	21.60
Low	15	5	CP-OFDM 16QAM	Inner_Full	13_6	826.5	165300	22.00	21.16
Low	15	5	CP-OFDM 64QAM	Inner_Full	13_6	826.5	165300	21.50	19.57
Low	15	5	CP-OFDM 256QAM	Inner_Full	13_6	826.5	165300	17.50	16.51
Low	15	5	DFT-s-OFDM QPSK	Edge_Full_Right	2_23	826.5	165300	23.00	22.50
Low	15	5	DFT-s-OFDM QPSK	Edge_Full_Left	2_0	826.5	165300	23.00	22.51
Low	15	5	DFT-s-OFDM QPSK	Edge_1RB_Right	1_24	826.5	165300	23.00	22.46
Low	15	5	DFT-s-OFDM QPSK	Edge_1RB_Left	1_0	826.5	165300	23.00	22.45
Low	15	5	DFT-s-OFDM QPSK	Inner_1RB_Right	1_23	826.5	165300	24.00	23.03
Low	15	5	DFT-s-OFDM QPSK	Inner_1RB_Left	1_1	826.5	165300	24.00	22.94
Low	15	5	DFT-s-OFDM QPSK	Outer_Full	25_0	826.5	165300	24.00	22.55
Low	15	10	DFT-s-OFDM QPSK	Inner_Full	25_12	829	165800	24.00	22.86
Low	15	15	DFT-s-OFDM QPSK	Inner_Full	36_18	831.5	166300	24.00	23.03

N5(ANT41 DS12/4/10)

Test Freq Description	5G-n5							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n5
High	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	846.5	169300	24.00	22.91
Middle	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	836.5	167300	24.00	22.95
Low	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	826.5	165300	24.00	23.06
High	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	839	167800	24.00	22.92
Middle	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	836.5	167300	24.00	22.94
Low	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	834	166800	24.00	22.97
Low	15	5	DFT-s-OFDM PI/2 BPSK1	Inner_Full	12_6	826.5	165300	24.00	23.05
Low	15	5	DFT-s-OFDM 16QAM	Inner_Full	12_6	826.5	165300	23.50	22.21
Low	15	5	DFT-s-OFDM 64QAM	Inner_Full	12_6	826.5	165300	21.50	20.68
Low	15	5	DFT-s-OFDM 256QAM	Inner_Full	12_6	826.5	165300	19.50	18.70
Low	15	5	CP-OFDM QPSK	Inner_Full	13_6	826.5	165300	22.50	21.72
Low	15	5	CP-OFDM 16QAM	Inner_Full	13_6	826.5	165300	22.00	21.29
Low	15	5	CP-OFDM 64QAM	Inner_Full	13_6	826.5	165300	21.50	19.71
Low	15	5	CP-OFDM 256QAM	Inner_Full	13_6	826.5	165300	17.50	16.66
Low	15	5	DFT-s-OFDM QPSK	Edge_Full_Right	2_23	826.5	165300	23.00	22.19
Low	15	5	DFT-s-OFDM QPSK	Edge_Full_Left	2_0	826.5	165300	23.00	22.18
Low	15	5	DFT-s-OFDM QPSK	Edge_1RB_Right	1_24	826.5	165300	23.00	22.14
Low	15	5	DFT-s-OFDM QPSK	Edge_1RB_Left	1_0	826.5	165300	23.00	22.15
Low	15	5	DFT-s-OFDM QPSK	Inner_1RB_Right	1_23	826.5	165300	24.00	22.93
Low	15	5	DFT-s-OFDM QPSK	Inner_1RB_Left	1_1	826.5	165300	24.00	22.99
Low	15	5	DFT-s-OFDM QPSK	Outer_Full	25_0	826.5	165300	24.00	22.23
Low	15	10	DFT-s-OFDM QPSK	Inner_Full	25_12	829	165800	24.00	22.83
Low	15	15	DFT-s-OFDM QPSK	Inner_Full	36_18	831.5	166300	24.00	22.96

N7(ANT11 DSI2/10)

Test Freq Description	5G-n7							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n7
High	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2567.5	513500	19.30	18.43
Middle	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2535	507000	19.30	18.31
Low	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2502.5	500500	19.30	18.39
High	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2560	512000	19.30	18.44
Middle	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2535	507000	19.30	18.32
Low	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2510	502000	19.30	18.38
High	15	20	DFT-s-OFDM PI/2 BPSK1	Inner_Full	50_25	2560	512000	19.30	18.41
High	15	20	DFT-s-OFDM 16QAM	Inner_Full	50_25	2560	512000	19.30	18.43
High	15	20	DFT-s-OFDM 64QAM	Inner_Full	50_25	2560	512000	19.30	18.42
High	15	20	DFT-s-OFDM 256QAM	Inner_Full	50_25	2560	512000	19.30	18.42
High	15	20	CP-OFDM QPSK	Inner_Full	53_26	2560	512000	19.30	18.40
High	15	20	CP-OFDM 16QAM	Inner_Full	53_26	2560	512000	19.30	18.43
High	15	20	CP-OFDM 64QAM	Inner_Full	53_26	2560	512000	19.30	18.41
High	15	20	CP-OFDM 256QAM	Inner_Full	53_26	2560	512000	18.00	17.00
High	15	20	DFT-s-OFDM QPSK	Edge_1RB_Right	1_105	2560	512000	19.30	18.23
High	15	20	DFT-s-OFDM QPSK	Edge_1RB_Left	1_0	2560	512000	19.30	18.14
High	15	20	DFT-s-OFDM QPSK	Edge_Full_Right	2_104	2560	512000	19.30	18.27
High	15	20	DFT-s-OFDM QPSK	Edge_Full_Left	2_0	2560	512000	19.30	18.22
High	15	20	DFT-s-OFDM QPSK	Inner_1RB_Right	1_104	2560	512000	19.30	18.22
High	15	20	DFT-s-OFDM QPSK	Inner_1RB_Left	1_1	2560	512000	19.30	18.15
High	15	20	DFT-s-OFDM QPSK	Outer_Full	100_0	2560	512000	19.30	18.42
High	15	10	DFT-s-OFDM QPSK	Inner_Full	25_12	2565	513000	19.30	18.19
High	15	15	DFT-s-OFDM QPSK	Inner_Full	36_18	2562.5	512500	19.30	18.39

N7(ANT11 DSI4)

Test Freq Description	5G-n7							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n7
High	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2567.5	513500	23.30	22.32
Middle	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2535	507000	23.30	22.24
Low	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2502.5	500500	23.30	22.29
High	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2560	512000	23.30	22.35
Middle	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2535	507000	23.30	22.27
Low	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2510	502000	23.30	22.31
High	15	20	DFT-s-OFDM PI/2 BPSK1	Inner_Full	50_25	2560	512000	23.30	22.44
High	15	20	DFT-s-OFDM 16QAM	Inner_Full	50_25	2560	512000	23.30	22.34
High	15	20	DFT-s-OFDM 64QAM	Inner_Full	50_25	2560	512000	22.00	20.81
High	15	20	DFT-s-OFDM 256QAM	Inner_Full	50_25	2560	512000	20.00	18.82
High	15	20	CP-OFDM QPSK	Inner_Full	53_26	2560	512000	23.30	21.87
High	15	20	CP-OFDM 16QAM	Inner_Full	53_26	2560	512000	22.50	21.29
High	15	20	CP-OFDM 64QAM	Inner_Full	53_26	2560	512000	21.00	19.78
High	15	20	CP-OFDM 256QAM	Inner_Full	53_26	2560	512000	18.00	16.79
High	15	20	DFT-s-OFDM PI/2 BPSK1	Edge_1RB_Right	1_105	2560	512000	23.30	22.21
High	15	20	DFT-s-OFDM PI/2 BPSK1	Edge_1RB_Left	1_0	2560	512000	23.30	22.12
High	15	20	DFT-s-OFDM PI/2 BPSK1	Edge_Full_Right	2_104	2560	512000	23.30	22.26
High	15	20	DFT-s-OFDM PI/2 BPSK1	Edge_Full_Left	2_0	2560	512000	23.30	22.21
High	15	20	DFT-s-OFDM PI/2 BPSK1	Inner_1RB_Right	1_104	2560	512000	23.30	22.27
High	15	20	DFT-s-OFDM PI/2 BPSK1	Inner_1RB_Left	1_1	2560	512000	23.30	22.19
High	15	20	DFT-s-OFDM PI/2 BPSK1	Outer_Full	100_0	2560	512000	23.30	22.39
High	15	10	DFT-s-OFDM PI/2 BPSK1	Inner_Full	25_12	2565	513000	23.30	22.29
High	15	15	DFT-s-OFDM PI/2 BPSK1	Inner_Full	36_18	2562.5	512500	23.30	22.43

N7(ANT13 DSI2)

Test Freq Description	5G-n7							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n7
High	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2567.5	513500	17.30	15.80
Middle	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2535	507000	17.30	15.45
Low	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2502.5	500500	17.30	15.57
High	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2560	512000	17.30	15.81
Middle	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2535	507000	17.30	15.49
Low	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2510	502000	17.30	15.60
High	15	20	DFT-s-OFDM PI/2 BPSK1	Inner_Full	50_25	2560	512000	17.30	15.73
High	15	20	DFT-s-OFDM 16QAM	Inner_Full	50_25	2560	512000	17.30	15.78
High	15	20	DFT-s-OFDM 64QAM	Inner_Full	50_25	2560	512000	17.30	15.69
High	15	20	DFT-s-OFDM 256QAM	Inner_Full	50_25	2560	512000	17.30	15.76
High	15	20	CP-OFDM QPSK	Inner_Full	53_26	2560	512000	17.30	15.79
High	15	20	CP-OFDM 16QAM	Inner_Full	53_26	2560	512000	17.30	15.77
High	15	20	CP-OFDM 64QAM	Inner_Full	53_26	2560	512000	17.30	15.73
High	15	20	CP-OFDM 256QAM	Inner_Full	53_26	2560	512000	17.30	15.76
High	15	20	DFT-s-OFDM QPSK	Edge_1RB_Right	1_105	2560	512000	17.30	15.61
High	15	20	DFT-s-OFDM QPSK	Edge_1RB_Left	1_0	2560	512000	17.30	15.49
High	15	20	DFT-s-OFDM QPSK	Edge_Full_Right	2_104	2560	512000	17.30	15.71
High	15	20	DFT-s-OFDM QPSK	Edge_Full_Left	2_0	2560	512000	17.30	15.51
High	15	20	DFT-s-OFDM QPSK	Inner_1RB_Right	1_104	2560	512000	17.30	15.63
High	15	20	DFT-s-OFDM QPSK	Inner_1RB_Left	1_1	2560	512000	17.30	15.52
High	15	20	DFT-s-OFDM QPSK	Outer_Full	100_0	2560	512000	17.30	15.77
High	15	10	DFT-s-OFDM QPSK	Inner_Full	25_12	2565	513000	17.30	15.65
High	15	15	DFT-s-OFDM QPSK	Inner_Full	36_18	2562.5	512500	17.30	15.74

N7(ANT13 DSI4)

Test Freq Description	5G-n7							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n7
High	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2567.5	513500	23.30	21.80
Middle	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2535	507000	23.30	21.59
Low	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2502.5	500500	23.30	21.66
High	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2560	512000	23.30	21.82
Middle	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2535	507000	23.30	21.63
Low	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2510	502000	23.30	21.69
High	15	20	DFT-s-OFDM PI/2 BPSK1	Inner_Full	50_25	2560	512000	23.30	21.85
High	15	20	DFT-s-OFDM 16QAM	Inner_Full	50_25	2560	512000	23.30	21.77
High	15	20	DFT-s-OFDM 64QAM	Inner_Full	50_25	2560	512000	21.50	20.31
High	15	20	DFT-s-OFDM 256QAM	Inner_Full	50_25	2560	512000	19.50	18.28
High	15	20	CP-OFDM QPSK	Inner_Full	53_26	2560	512000	22.50	21.32
High	15	20	CP-OFDM 16QAM	Inner_Full	53_26	2560	512000	21.50	20.76
High	15	20	CP-OFDM 64QAM	Inner_Full	53_26	2560	512000	20.50	19.26
High	15	20	CP-OFDM 256QAM	Inner_Full	53_26	2560	512000	17.50	16.33
High	15	20	DFT-s-OFDM PI/2 BPSK1	Edge_1RB_Right	1_105	2560	512000	23.30	21.72
High	15	20	DFT-s-OFDM PI/2 BPSK1	Edge_1RB_Left	1_0	2560	512000	23.30	21.48
High	15	20	DFT-s-OFDM PI/2 BPSK1	Edge_Full_Right	2_104	2560	512000	23.30	21.74
High	15	20	DFT-s-OFDM PI/2 BPSK1	Edge_Full_Left	2_0	2560	512000	23.30	21.60
High	15	20	DFT-s-OFDM PI/2 BPSK1	Inner_1RB_Right	1_104	2560	512000	23.30	21.73
High	15	20	DFT-s-OFDM PI/2 BPSK1	Inner_1RB_Left	1_1	2560	512000	23.30	21.57
High	15	20	DFT-s-OFDM PI/2 BPSK1	Outer_Full	100_0	2560	512000	23.30	21.86
High	15	20	CP-OFDM QPSK	Outer_Full	106_0	2560	512000	23.30	21.35
High	15	10	DFT-s-OFDM PI/2 BPSK1	Outer_Full	50_0	2565	513000	23.30	21.65
High	15	15	DFT-s-OFDM PI/2 BPSK1	Outer_Full	75_0	2562.5	512500	23.30	21.80

N7(ANT13 DSI10)

Test Freq Description	5G-n7							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n7
High	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2567.5	513500	16.30	14.91
Middle	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2535	507000	16.30	14.76
Low	15	5	DFT-s-OFDM QPSK	Inner_Full	12_6	2502.5	500500	16.30	14.85
High	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2560	512000	16.30	14.92
Middle	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2535	507000	16.30	14.69
Low	15	20	DFT-s-OFDM QPSK	Inner_Full	50_25	2510	502000	16.30	14.77
High	15	20	DFT-s-OFDM PI/2 BPSK1	Inner_Full	50_25	2560	512000	16.30	14.89
High	15	20	DFT-s-OFDM 16QAM	Inner_Full	50_25	2560	512000	16.30	14.90
High	15	20	DFT-s-OFDM 64QAM	Inner_Full	50_25	2560	512000	16.30	14.90
High	15	20	DFT-s-OFDM 256QAM	Inner_Full	50_25	2560	512000	16.30	14.90
High	15	20	CP-OFDM QPSK	Inner_Full	53_26	2560	512000	16.30	14.94
High	15	20	CP-OFDM 16QAM	Inner_Full	53_26	2560	512000	16.30	14.90
High	15	20	CP-OFDM 64QAM	Inner_Full	53_26	2560	512000	16.30	14.89
High	15	20	CP-OFDM 256QAM	Inner_Full	53_26	2560	512000	15.30	13.85
High	15	20	CP-OFDM QPSK	Edge_1RB_Right	1_105	2560	512000	16.30	14.69
High	15	20	CP-OFDM QPSK	Edge_1RB_Left	1_0	2560	512000	16.30	14.57
High	15	20	CP-OFDM QPSK	Edge_Full_Right	2_104	2560	512000	16.30	14.73
High	15	20	CP-OFDM QPSK	Edge_Full_Left	2_0	2560	512000	16.30	14.68
High	15	20	CP-OFDM QPSK	Inner_1RB_Right	1_104	2560	512000	16.30	14.68
High	15	20	CP-OFDM QPSK	Inner_1RB_Left	1_1	2560	512000	16.30	14.60
High	15	20	CP-OFDM QPSK	Outer_Full	100_0	2560	512000	16.30	14.93
High	15	10	CP-OFDM QPSK	Outer_Full	50_0	2565	513000	16.30	14.64
High	15	15	CP-OFDM QPSK	Outer_Full	75_0	2562.5	512500	16.30	14.89

N41(ANT11 DSI2)

Test Freq Description	5G-n41							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n41
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2685	537000	19.40	18.84
Middle1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2639	527799	19.40	18.65
Middle2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2592.99	518598	19.40	18.52
Middle3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2555.02	509406	19.40	18.50
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2501.01	500205	19.40	18.33
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2640	528000	19.40	18.55
Middle1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2616.495	523299	19.40	18.44
Middle2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2592.99	518598	19.40	18.39
Middle3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2569.5	513900	19.40	18.34
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2546.01	509202	19.40	18.30
High	30	10	DFT-s-OFDM PI/2 BPSK1	Inner_Full	12_6	2685	537000	19.40	18.69
High	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	2685	537000	19.40	18.74
High	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	2685	537000	19.40	18.71
High	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	2685	537000	19.40	18.73
High	30	10	CP-OFDM QPSK	Inner_Full	12_6	2685	537000	19.40	18.70
High	30	10	CP-OFDM 16QAM	Inner_Full	12_6	2685	537000	19.40	18.86
High	30	10	CP-OFDM 64QAM	Inner_Full	12_6	2685	537000	19.40	18.77
High	30	10	CP-OFDM 256QAM	Inner_Full	12_6	2685	537000	19.40	18.25
High	30	10	CP-OFDM 16QAM	Edge_Full_Right	2_22	2685	537000	19.40	18.70
High	30	10	CP-OFDM 16QAM	Edge_Full_Left	2_0	2685	537000	19.40	18.78
High	30	10	CP-OFDM 16QAM	Edge_1RB_Right	1_23	2685	537000	19.40	19.02
High	30	10	CP-OFDM 16QAM	Edge_1RB_Left	1_0	2685	537000	19.40	19.03
High	30	10	CP-OFDM 16QAM	Inner_1RB_Right	1_22	2685	537000	19.40	19.08
High	30	10	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2685	537000	19.40	19.09
High	30	10	CP-OFDM 16QAM	Outer_Full	24_0	2685	537000	19.40	18.91
High	30	15	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2682.48	536496	19.40	19.03
High	30	20	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2679.99	535998	19.40	18.96
High	30	30	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2674.98	534996	19.40	18.75
High	30	40	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2670	534000	19.40	18.42
High	30	50	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2664.99	532998	19.40	18.63
High	30	60	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2659.98	531996	19.40	18.52
High	30	70	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2655	531000	19.40	18.36
High	30	80	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2649.99	529998	19.40	18.20
High	30	90	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2644.98	528996	19.40	18.16
High	30	10	DFT-s-OFDM 16QAM	Inner_1RB_Left	1_1	2685	537000	19.40	18.99

N41(ANT11 DSI4)

Test Freq Description	5G-n41							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n41
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2685	537000	24.40	23.98
Middle1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2639	527799	24.40	23.87
Middle2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2592.99	518598	24.40	23.79
Middle3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2555.02	509406	24.40	23.79
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2501.01	500205	24.40	23.69
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2640	528000	24.40	23.70
Middle1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2616.495	523299	24.40	23.64
Middle2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2592.99	518598	24.40	23.61
Middle3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2569.5	513900	24.40	23.58
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2546.01	509202	24.40	23.55
High	30	10	DFT-s-OFDM PI/2 BPSK1	Inner_Full	12_6	2685	537000	24.40	24.09
High	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	2685	537000	24.40	23.89
High	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	2685	537000	23.50	22.61
High	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	2685	537000	21.50	20.78
High	30	10	CP-OFDM QPSK	Inner_Full	12_6	2685	537000	24.40	23.50
High	30	10	CP-OFDM 16QAM	Inner_Full	12_6	2685	537000	24.00	23.27
High	30	10	CP-OFDM 64QAM	Inner_Full	12_6	2685	537000	22.50	21.71
High	30	10	CP-OFDM 256QAM	Inner_Full	12_6	2685	537000	19.50	18.80
High	30	10	DFT-s-OFDM PI/2 BPSK1	Edge_Full_Right	2_22	2685	537000	24.00	23.55
High	30	10	DFT-s-OFDM PI/2 BPSK1	Edge_Full_Left	2_0	2685	537000	24.00	23.49
High	30	10	DFT-s-OFDM PI/2 BPSK1	Edge_1RB_Right	1_23	2685	537000	24.00	23.43
High	30	10	DFT-s-OFDM PI/2 BPSK1	Edge_1RB_Left	1_0	2685	537000	24.00	23.45
High	30	10	DFT-s-OFDM PI/2 BPSK1	Inner_1RB_Right	1_22	2685	537000	24.40	23.84
High	30	10	DFT-s-OFDM PI/2 BPSK1	Inner_1RB_Left	1_1	2685	537000	24.40	23.85
High	30	10	DFT-s-OFDM PI/2 BPSK1	Outer_Full	24_0	2685	537000	24.40	23.58
High	30	15	DFT-s-OFDM PI/2 BPSK1	Inner_Full	18_9	2682.48	536496	24.40	24.00
High	30	20	DFT-s-OFDM PI/2 BPSK1	Inner_Full	25_12	2679.99	535998	24.40	23.97
High	30	30	DFT-s-OFDM PI/2 BPSK1	Inner_Full	36_18	2674.98	534996	24.40	23.84
High	30	40	DFT-s-OFDM PI/2 BPSK1	Inner_Full	50_25	2670	534000	24.40	23.66
High	30	50	DFT-s-OFDM PI/2 BPSK1	Inner_Full	64_32	2664.99	532998	24.40	23.78
High	30	60	DFT-s-OFDM PI/2 BPSK1	Inner_Full	81_40	2659.98	531996	24.40	23.72
High	30	70	DFT-s-OFDM PI/2 BPSK1	Inner_Full	90_45	2655	531000	24.40	23.61
High	30	80	DFT-s-OFDM PI/2 BPSK1	Inner_Full	108_54	2649.99	529998	24.40	23.53
High	30	90	DFT-s-OFDM PI/2 BPSK1	Inner_Full	120_60	2644.98	528996	24.40	23.50
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2685	537000	24.40	23.98

N41(ANT11 DSI10)

Test Freq Description	5G-n41							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n41
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2685	537000	17.90	17.44
Middle1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2639	527799	17.90	17.23
Middle2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2592.99	518598	17.90	17.07
Middle3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2555.02	509406	17.90	17.06
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2501.01	500205	17.90	16.87
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2640	528000	17.90	17.12
Middle1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2616.495	523299	17.90	17.00
Middle2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2592.99	518598	17.90	16.93
Middle3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2569.5	513900	17.90	16.88
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2546.01	509202	17.90	16.84
High	30	10	DFT-s-OFDM PI/2 BPSK1	Inner_Full	12_6	2685	537000	17.90	17.36
High	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	2685	537000	17.90	17.42
High	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	2685	537000	17.90	17.38
High	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	2685	537000	17.90	17.41
High	30	10	CP-OFDM QPSK	Inner_Full	12_6	2685	537000	17.90	17.37
High	30	10	CP-OFDM 16QAM	Inner_Full	12_6	2685	537000	17.90	17.55
High	30	10	CP-OFDM 64QAM	Inner_Full	12_6	2685	537000	17.90	17.44
High	30	10	CP-OFDM 256QAM	Inner_Full	12_6	2685	537000	17.90	16.87
High	30	10	CP-OFDM 16QAM	Edge_Full_Right	2_22	2685	537000	17.90	17.22
High	30	10	CP-OFDM 16QAM	Edge_Full_Left	2_0	2685	537000	17.90	17.31
High	30	10	CP-OFDM 16QAM	Edge_1RB_Right	1_23	2685	537000	17.90	17.58
High	30	10	CP-OFDM 16QAM	Edge_1RB_Left	1_0	2685	537000	17.90	17.59
High	30	10	CP-OFDM 16QAM	Inner_1RB_Right	1_22	2685	537000	17.90	17.65
High	30	10	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2685	537000	17.90	17.66
High	30	10	CP-OFDM 16QAM	Outer_Full	24_0	2685	537000	17.90	17.46
High	30	15	CP-OFDM 16QAM	Inner_Full	1_1	2682.48	536496	17.90	17.59
High	30	20	CP-OFDM 16QAM	Inner_Full	1_1	2679.99	535998	17.90	17.52
High	30	30	CP-OFDM 16QAM	Inner_Full	1_1	2674.98	534996	17.90	17.27
High	30	40	CP-OFDM 16QAM	Inner_Full	1_1	2670	534000	17.90	16.91
High	30	50	CP-OFDM 16QAM	Inner_Full	1_1	2664.99	532998	17.90	17.15
High	30	60	CP-OFDM 16QAM	Inner_Full	1_1	2659.98	531996	17.90	17.03
High	30	70	CP-OFDM 16QAM	Inner_Full	1_1	2655	531000	17.90	16.84
High	30	80	CP-OFDM 16QAM	Inner_Full	1_1	2649.99	529998	17.90	16.66
High	30	90	CP-OFDM 16QAM	Inner_Full	1_1	2644.98	528996	17.90	16.62
High	30	10	DFT-s-OFDM 16QAM	Inner_1RB_Left	1_1	2685	537000	17.90	17.57

N41(ANT13 DSI2/10)

Test Freq Description	5G-n41							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n41
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2685	537000	15.50	14.77
Middle1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2639	527799	15.50	14.44
Middle2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2592.99	518598	15.50	14.20
Middle3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2555.02	509406	15.50	13.95
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2501.01	500205	15.50	13.82
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2640	528000	15.50	14.32
Middle1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2616.495	523299	15.50	14.20
Middle2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2592.99	518598	15.50	14.11
Middle3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2569.5	513900	15.50	13.98
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2546.01	509202	15.50	13.88
High	30	10	DFT-s-OFDM PI/2 BPSK1	Inner_Full	12_6	2685	537000	15.50	14.74
High	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	2685	537000	15.50	14.79
High	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	2685	537000	15.50	14.76
High	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	2685	537000	15.50	14.78
High	30	10	CP-OFDM QPSK	Inner_Full	12_6	2685	537000	15.50	14.71
High	30	10	CP-OFDM 16QAM	Inner_Full	12_6	2685	537000	15.50	14.83
High	30	10	CP-OFDM 64QAM	Inner_Full	12_6	2685	537000	15.50	14.78
High	30	10	CP-OFDM 256QAM	Inner_Full	12_6	2685	537000	15.50	14.71
High	30	10	CP-OFDM 16QAM	Edge_Full_Right	2_22	2685	537000	15.50	14.44
High	30	10	CP-OFDM 16QAM	Edge_Full_Left	2_0	2685	537000	15.50	14.55
High	30	10	CP-OFDM 16QAM	Edge_1RB_Right	1_23	2685	537000	15.50	14.86
High	30	10	CP-OFDM 16QAM	Edge_1RB_Left	1_0	2685	537000	15.50	14.89
High	30	10	CP-OFDM 16QAM	Inner_1RB_Right	1_22	2685	537000	15.50	14.95
High	30	10	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2685	537000	15.50	14.96
High	30	10	CP-OFDM 16QAM	Outer_Full	24_0	2685	537000	15.50	14.73
High	30	15	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2682.48	536496	15.50	14.88
High	30	20	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2679.99	535998	15.50	14.79
High	30	30	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2674.98	534996	15.50	14.49
High	30	40	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2670	534000	15.50	14.07
High	30	50	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2664.99	532998	15.50	14.33
High	30	60	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2659.98	531996	15.50	14.20
High	30	70	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2655	531000	15.50	13.96
High	30	80	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2649.99	529998	15.50	13.77
High	30	90	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2644.98	528996	15.50	13.71
High	30	10	DFT-s-OFDM 16QAM	Inner_1RB_Left	1_1	2685	537000	15.50	14.81

N41(ANT13 DSI4)

Test Freq Description	5G-n41							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n41
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2685	537000	22.00	21.36
Middle1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2639	527799	22.00	21.16
Middle2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2592.99	518598	22.00	21.03
Middle3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2555.02	509406	22.00	20.88
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	2501.01	500205	22.00	20.79
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2640	528000	22.00	21.09
Middle1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2616.495	523299	22.00	21.02
Middle2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2592.99	518598	22.00	20.97
Middle3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2569.5	513900	22.00	20.91
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	2546.01	509202	22.00	20.83
High	30	10	DFT-s-OFDM PI/2 BPSK1	Inner_Full	12_6	2685	537000	22.00	21.40
High	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	2685	537000	22.00	21.36
High	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	2685	537000	22.00	21.34
High	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	2685	537000	19.50	18.83
High	30	10	CP-OFDM QPSK	Inner_Full	12_6	2685	537000	22.00	21.30
High	30	10	CP-OFDM 16QAM	Inner_Full	12_6	2685	537000	22.00	21.50
High	30	10	CP-OFDM 64QAM	Inner_Full	12_6	2685	537000	21.50	20.86
High	30	10	CP-OFDM 256QAM	Inner_Full	12_6	2685	537000	19.50	18.86
High	30	10	CP-OFDM 16QAM	Edge_Full_Right	2_22	2685	537000	22.00	21.17
High	30	10	CP-OFDM 16QAM	Edge_Full_Left	2_0	2685	537000	22.00	21.21
High	30	10	CP-OFDM 16QAM	Edge_1RB_Right	1_23	2685	537000	22.00	21.42
High	30	10	CP-OFDM 16QAM	Edge_1RB_Left	1_0	2685	537000	22.00	21.39
High	30	10	CP-OFDM 16QAM	Inner_1RB_Right	1_22	2685	537000	22.00	21.49
High	30	10	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2685	537000	22.00	21.54
High	30	10	CP-OFDM 16QAM	Outer_Full	24_0	2685	537000	22.00	21.41
High	30	15	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2682.48	536496	22.00	21.42
High	30	20	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2679.99	535998	22.00	21.38
High	30	30	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2674.98	534996	22.00	21.20
High	30	40	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2670	534000	22.00	20.94
High	30	50	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2664.99	532998	22.00	21.10
High	30	60	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2659.98	531996	22.00	21.02
High	30	70	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2655	531000	22.00	20.88
High	30	80	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2649.99	529998	22.00	20.77
High	30	90	CP-OFDM 16QAM	Inner_1RB_Left	1_1	2644.98	528996	22.00	20.74
High	30	10	DFT-s-OFDM 16QAM	Inner_1RB_Left	1_1	2685	537000	22.00	21.43

N78 (ANT11 DSI2)

Test Freq Description	5G-n78							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n78
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3795	653000	16.00	14.50
Middle-1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3672.495	644833	16.00	14.70
Middle-2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3549.99	636666	16.00	14.71
Middle-3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3427.5	628500	16.00	14.80
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3305.01	620334	16.00	14.98
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3750	650000	16.00	14.53
Middle-1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3649.995	643333	16.00	14.69
Middle-2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3549.99	636666	16.00	14.66
Middle-3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3450	628667	16.00	14.69
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3350.01	623334	16.00	14.94
Low	30	10	DFT-s-OFDM PI/2 BPSK	Inner_Full	12_6	3305.01	620334	16.00	14.95
Low	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	16.00	14.96
Low	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	16.00	14.93
Low	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	16.00	14.95
Low	30	10	CP-OFDM QPSK	Inner_Full	12_6	3305.01	620334	16.00	14.92
Low	30	10	CP-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	16.00	14.97
Low	30	10	CP-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	16.00	14.96
Low	30	10	CP-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	16.00	14.90
Low	30	10	CP-OFDM 16QAM	Edge_1RB_Right	1_23	3305.01	620334	16.00	15.10
Low	30	10	CP-OFDM 16QAM	Edge_1RB_Left	1_0	3305.01	620334	16.00	15.08
Low	30	10	CP-OFDM 16QAM	Edge_Full_Right	2_22	3305.01	620334	16.00	14.78
Low	30	10	CP-OFDM 16QAM	Edge_Full_Left	2_0	3305.01	620334	16.00	14.80
Low	30	10	CP-OFDM 16QAM	Inner_1RB_Right	1_22	3305.01	620334	16.00	15.15
Low	30	10	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3305.01	620334	16.00	15.11
Low	30	10	CP-OFDM 16QAM	Outer_Full	24_0	3305.01	620334	16.00	15.01
Low	30	15	CP-OFDM 16QAM	Inner_1RB_Right	1_36	3307.5	620500	16.00	14.94
Low	30	20	CP-OFDM 16QAM	Inner_1RB_Right	1_49	3310.02	620668	16.00	14.97
Low	30	25	CP-OFDM 16QAM	Inner_1RB_Right	1_63	3312.51	620834	16.00	14.88
Low	30	30	CP-OFDM 16QAM	Inner_1RB_Right	1_76	3315	621000	16.00	14.96
Low	30	40	CP-OFDM 16QAM	Inner_1RB_Right	1_104	3320.01	621334	16.00	14.89
Low	30	50	CP-OFDM 16QAM	Inner_1RB_Right	1_131	3325.02	621668	16.00	14.90
Low	30	60	CP-OFDM 16QAM	Inner_1RB_Right	1_160	3330	622000	16.00	14.99
Low	30	70	CP-OFDM 16QAM	Inner_1RB_Right	1_188	3335.01	622334	16.00	14.93
Low	30	80	CP-OFDM 16QAM	Inner_1RB_Right	1_215	3340.02	622668	16.00	14.95
Low	30	90	CP-OFDM 16QAM	Inner_1RB_Right	1_243	3345	623000	16.00	14.92
Low	30	10	DFT-s-OFDM 16QAM	Inner_1RB_Right	1_22	3305.01	620334	16.00	15.07

N78 (ANT11 DSI4)

Test Freq Description	5G-n78							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n78
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3795	653000	23.50	22.25
Middle-1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3672.495	644833	23.50	22.53
Middle-2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3549.99	636666	23.50	22.57
Middle-3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3427.5	628500	23.50	22.69
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3305.01	620334	23.50	22.89
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3750	650000	23.50	22.32
Middle-1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3649.995	643333	23.50	22.49
Middle-2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3549.99	636666	23.50	22.52
Middle-3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3450	628667	23.50	22.53
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3350.01	623334	23.50	22.85
Low	30	10	DFT-s-OFDM PI/2 BPSK	Inner_Full	12_6	3305.01	620334	23.50	22.92
Low	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	23.50	22.91
Low	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	22.50	21.57
Low	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	20.50	19.56
Low	30	10	CP-OFDM QPSK	Inner_Full	12_6	3305.01	620334	23.50	22.56
Low	30	10	CP-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	23.50	22.21
Low	30	10	CP-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	21.50	20.57
Low	30	10	CP-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	18.50	17.42
Low	30	10	DFT-s-OFDM PI/2 BPSK	Edge_1RB_Right	1_23	3305.01	620334	23.50	22.22
Low	30	10	DFT-s-OFDM PI/2 BPSK	Edge_1RB_Left	1_0	3305.01	620334	23.50	22.21
Low	30	10	DFT-s-OFDM PI/2 BPSK	Edge_Full_Right	2_22	3305.01	620334	23.50	22.28
Low	30	10	DFT-s-OFDM PI/2 BPSK	Edge_Full_Left	2_0	3305.01	620334	23.50	22.25
Low	30	10	DFT-s-OFDM PI/2 BPSK	Inner_1RB_Right	1_22	3305.01	620334	23.50	22.81
Low	30	10	DFT-s-OFDM PI/2 BPSK	Inner_1RB_Left	1_1	3305.01	620334	23.50	22.81
Low	30	10	DFT-s-OFDM PI/2 BPSK	Outer_Full	24_0	3305.01	620334	23.50	22.38
Low	30	15	DFT-s-OFDM PI/2 BPSK	Inner_Full	18_9	3307.5	620500	23.50	22.93
Low	30	20	DFT-s-OFDM PI/2 BPSK	Inner_Full	25_12	3310.02	620668	23.50	22.83
Low	30	25	DFT-s-OFDM PI/2 BPSK	Inner_Full	32_16	3312.51	620834	23.50	22.94
Low	30	30	DFT-s-OFDM PI/2 BPSK	Inner_Full	36_18	3315	621000	23.50	22.89
Low	30	40	DFT-s-OFDM PI/2 BPSK	Inner_Full	50_25	3320.01	621334	23.50	22.88
Low	30	50	DFT-s-OFDM PI/2 BPSK	Inner_Full	64_32	3325.02	621668	23.50	22.97
Low	30	60	DFT-s-OFDM PI/2 BPSK	Inner_Full	80_40	3330	622000	23.50	22.88
Low	30	70	DFT-s-OFDM PI/2 BPSK	Inner_Full	94_47	3335.01	622334	23.50	22.82
Low	30	80	DFT-s-OFDM PI/2 BPSK	Inner_Full	108_54	3340.02	622668	23.50	22.86
Low	30	90	DFT-s-OFDM PI/2 BPSK	Inner_Full	120_60	3345	623000	23.50	22.84
Low	30	50	CP-OFDM QPSK	Inner_Full	64_32	3325.02	621668	23.50	22.57

N78 (ANT11 DSI10)

Test Freq Description	5G-n78							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n78
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3795	653000	16.50	14.93
Middle-1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3672.495	644833	16.50	14.98
Middle-2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3549.99	636666	16.50	15.23
Middle-3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3427.5	628500	16.50	15.29
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3305.01	620334	16.50	15.49
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3750	650000	16.50	14.92
Middle-1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3649.995	643333	16.50	14.98
Middle-2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3549.99	636666	16.50	15.23
Middle-3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3450	628667	16.50	15.23
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3350.01	623334	16.50	15.37
Low	30	10	DFT-s-OFDM PI/2 BPSK	Inner_Full	12_6	3305.01	620334	16.50	15.40
Low	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	16.50	15.38
Low	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	16.50	15.35
Low	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	16.50	15.37
Low	30	10	CP-OFDM QPSK	Inner_Full	12_6	3305.01	620334	16.50	15.34
Low	30	10	CP-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	16.50	15.55
Low	30	10	CP-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	16.50	15.38
Low	30	10	CP-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	16.00	14.80
Low	30	10	CP-OFDM 16QAM	Edge_1RB_Right	1_23	3305.01	620334	16.50	15.58
Low	30	10	CP-OFDM 16QAM	Edge_1RB_Left	1_0	3305.01	620334	16.50	15.58
Low	30	10	CP-OFDM 16QAM	Edge_Full_Right	2_22	3305.01	620334	16.50	15.29
Low	30	10	CP-OFDM 16QAM	Edge_Full_Left	2_0	3305.01	620334	16.50	15.33
Low	30	10	CP-OFDM 16QAM	Inner_1RB_Right	1_22	3305.01	620334	16.50	15.63
Low	30	10	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3305.01	620334	16.50	15.64
Low	30	10	CP-OFDM 16QAM	Outer_Full	24_0	3305.01	620334	16.50	15.56
Low	30	15	CP-OFDM 16QAM	Inner_Full	18_9	3307.5	620500	16.50	15.54
Low	30	20	CP-OFDM 16QAM	Inner_Full	25_12	3310.02	620668	16.50	15.52
Low	30	25	CP-OFDM 16QAM	Inner_Full	32_16	3312.51	620834	16.50	15.52
Low	30	30	CP-OFDM 16QAM	Inner_Full	36_18	3315	621000	16.50	15.51
Low	30	40	CP-OFDM 16QAM	Inner_Full	50_25	3320.01	621334	16.50	15.44
Low	30	50	CP-OFDM 16QAM	Inner_Full	64_32	3325.02	621668	16.50	15.43
Low	30	60	CP-OFDM 16QAM	Inner_Full	80_40	3330	622000	16.50	15.51
Low	30	70	CP-OFDM 16QAM	Inner_Full	94_47	3335.01	622334	16.50	15.46
Low	30	80	CP-OFDM 16QAM	Inner_Full	108_54	3340.02	622668	16.50	15.43
Low	30	90	CP-OFDM 16QAM	Inner_Full	120_60	3345	623000	16.50	15.39
Low	30	10	DFT-s-OFDM 16QAM	Inner_1RB_Left	1_1	3305.01	620334	16.50	15.59

N78 (ANT12 DSI2)

Test Freq Description	5G-n78							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n78
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3795	653000	18.00	16.46
Middle-1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3672.495	644833	18.00	16.50
Middle-2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3549.99	636666	18.00	16.73
Middle-3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3427.5	628500	18.00	16.79
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3305.01	620334	18.00	16.97
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3750	650000	18.00	16.42
Middle-1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3649.995	643333	18.00	16.48
Middle-2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3549.99	636666	18.00	16.72
Middle-3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3450	628667	18.00	16.72
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3350.01	623334	18.00	16.84
Low	30	10	DFT-s-OFDM PI/2 BPSK	Inner_Full	12_6	3305.01	620334	18.00	16.93
Low	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	18.00	16.91
Low	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	18.00	16.88
Low	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	18.00	16.90
Low	30	10	CP-OFDM QPSK	Inner_Full	12_6	3305.01	620334	18.00	16.87
Low	30	10	CP-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	18.00	17.06
Low	30	10	CP-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	18.00	16.91
Low	30	10	CP-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	18.00	16.39
Low	30	10	CP-OFDM 16QAM	Edge_1RB_Right	1_23	3305.01	620334	18.00	17.09
Low	30	10	CP-OFDM 16QAM	Edge_1RB_Left	1_0	3305.01	620334	18.00	17.08
Low	30	10	CP-OFDM 16QAM	Edge_Full_Right	2_22	3305.01	620334	18.00	16.82
Low	30	10	CP-OFDM 16QAM	Edge_Full_Left	2_0	3305.01	620334	18.00	16.85
Low	30	10	CP-OFDM 16QAM	Inner_1RB_Right	1_22	3305.01	620334	18.00	17.12
Low	30	10	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3305.01	620334	18.00	17.13
Low	30	10	CP-OFDM 16QAM	Outer_Full	24_0	3305.01	620334	18.00	17.06
Low	30	15	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3307.5	620500	18.00	17.04
Low	30	20	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3310.02	620668	18.00	17.02
Low	30	25	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3312.51	620834	18.00	17.01
Low	30	30	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3315	621000	18.00	17.05
Low	30	40	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3320.01	621334	18.00	16.95
Low	30	50	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3325.02	621668	18.00	16.94
Low	30	60	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3330	622000	18.00	17.01
Low	30	70	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3335.01	622334	18.00	16.92
Low	30	80	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3340.02	622668	18.00	16.94
Low	30	90	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3345	623000	18.00	16.91
Low	30	10	DFT-s-OFDM 16QAM	Inner_1RB_Left	1_1	3305.01	620334	18.00	16.96

N78 (ANT12 DSI4)

Test Freq Description	5G-n78							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n78
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3795	653000	20.00	18.49
Middle-1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3672.495	644833	20.00	18.56
Middle-2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3549.99	636666	20.00	18.79
Middle-3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3427.5	628500	20.00	18.85
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3305.01	620334	20.00	19.00
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3750	650000	20.00	18.48
Middle-1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3649.995	643333	20.00	18.57
Middle-2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3549.99	636666	20.00	18.77
Middle-3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3450	628667	20.00	18.73
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3350.01	623334	20.00	18.93
Low	30	10	DFT-s-OFDM PI/2 BPSK	Inner_Full	12_6	3305.01	620334	20.00	18.99
Low	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	20.00	18.96
Low	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	20.00	18.90
Low	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	19.00	17.91
Low	30	10	CP-OFDM QPSK	Inner_Full	12_6	3305.01	620334	20.00	18.89
Low	30	10	CP-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	20.00	19.11
Low	30	10	CP-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	20.00	18.93
Low	30	10	CP-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	17.00	15.64
Low	30	10	CP-OFDM 16QAM	Edge_1RB_Right	1_23	3305.01	620334	20.00	19.04
Low	30	10	CP-OFDM 16QAM	Edge_1RB_Left	1_0	3305.01	620334	20.00	19.02
Low	30	10	CP-OFDM 16QAM	Edge_Full_Right	2_22	3305.01	620334	20.00	18.78
Low	30	10	CP-OFDM 16QAM	Edge_Full_Left	2_0	3305.01	620334	20.00	18.84
Low	30	10	CP-OFDM 16QAM	Inner_1RB_Right	1_22	3305.01	620334	20.00	19.17
Low	30	10	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3305.01	620334	20.00	19.11
Low	30	10	CP-OFDM 16QAM	Outer_Full	24_0	3305.01	620334	20.00	19.04
Low	30	15	CP-OFDM 16QAM	Inner_1RB_Right	1_36	3307.5	620500	20.00	19.00
Low	30	20	CP-OFDM 16QAM	Inner_1RB_Right	1_49	3310.02	620668	20.00	18.94
Low	30	25	CP-OFDM 16QAM	Inner_1RB_Right	1_63	3312.51	620834	20.00	18.94
Low	30	30	CP-OFDM 16QAM	Inner_1RB_Right	1_76	3315	621000	20.00	18.88
Low	30	40	CP-OFDM 16QAM	Inner_1RB_Right	1_104	3320.01	621334	20.00	18.73
Low	30	50	CP-OFDM 16QAM	Inner_1RB_Right	1_131	3325.02	621668	20.00	18.91
Low	30	60	CP-OFDM 16QAM	Inner_1RB_Right	1_160	3330	622000	20.00	18.71
Low	30	70	CP-OFDM 16QAM	Inner_1RB_Right	1_188	3335.01	622334	20.00	18.42
Low	30	80	CP-OFDM 16QAM	Inner_1RB_Right	1_215	3340.02	622668	20.00	18.35
Low	30	90	CP-OFDM 16QAM	Inner_1RB_Right	1_243	3345	623000	20.00	18.51
Low	30	10	DFT-s-OFDM 16QAM	Inner_1RB_Right	1_22	3305.01	620334	20.00	19.12

N78 (ANT12 DSI10)

Test Freq Description	5G-n78							Tune up	Power Results (dBm)
	SCS (kHz)	NR BW (MHz)	Modulation	RB allocation		NR Test Freq. (MHz)	NR Test CH.		n78
High	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3795	653000	18.50	16.96
Middle-1	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3672.495	644833	18.50	17.01
Middle-2	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3549.99	636666	18.50	17.23
Middle-3	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3427.5	628500	18.50	17.28
Low	30	10	DFT-s-OFDM QPSK	Inner_Full	12_6	3305.01	620334	18.50	17.46
High	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3750	650000	18.50	16.95
Middle-1	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3649.995	643333	18.50	17.01
Middle-2	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3549.99	636666	18.50	17.23
Middle-3	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3450	628667	18.50	17.23
Low	30	100	DFT-s-OFDM QPSK	Inner_Full	135_67	3350.01	623334	18.50	17.35
Low	30	10	DFT-s-OFDM PI/2 BPSK	Inner_Full	12_6	3305.01	620334	18.50	17.45
Low	30	10	DFT-s-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	18.50	17.44
Low	30	10	DFT-s-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	18.50	17.40
Low	30	10	DFT-s-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	18.50	17.43
Low	30	10	CP-OFDM QPSK	Inner_Full	12_6	3305.01	620334	18.50	17.39
Low	30	10	CP-OFDM 16QAM	Inner_Full	12_6	3305.01	620334	18.50	17.58
Low	30	10	CP-OFDM 64QAM	Inner_Full	12_6	3305.01	620334	18.50	17.44
Low	30	10	CP-OFDM 256QAM	Inner_Full	12_6	3305.01	620334	18.50	16.93
Low	30	10	CP-OFDM 16QAM	Edge_1RB_Right	1_23	3305.01	620334	18.50	17.58
Low	30	10	CP-OFDM 16QAM	Edge_1RB_Left	1_0	3305.01	620334	18.50	17.58
Low	30	10	CP-OFDM 16QAM	Edge_Full_Right	2_22	3305.01	620334	18.50	17.31
Low	30	10	CP-OFDM 16QAM	Edge_Full_Left	2_0	3305.01	620334	18.50	17.35
Low	30	10	CP-OFDM 16QAM	Inner_1RB_Right	1_22	3305.01	620334	18.50	17.61
Low	30	10	CP-OFDM 16QAM	Inner_1RB_Left	1_1	3305.01	620334	18.50	17.62
Low	30	10	CP-OFDM 16QAM	Outer_Full	24_0	3305.01	620334	18.50	17.55
Low	30	15	CP-OFDM 16QAM	Inner_Full	19_9	3307.5	620500	18.50	17.53
Low	30	20	CP-OFDM 16QAM	Inner_Full	25_12	3310.02	620668	18.50	17.51
Low	30	25	CP-OFDM 16QAM	Inner_Full	32_16	3312.51	620834	18.50	17.51
Low	30	30	CP-OFDM 16QAM	Inner_Full	36_18	3315	621000	18.50	17.50
Low	30	40	CP-OFDM 16QAM	Inner_Full	53_26	3320.01	621334	18.50	17.44
Low	30	50	CP-OFDM 16QAM	Inner_Full	67_33	3325.02	621668	18.50	17.43
Low	30	60	CP-OFDM 16QAM	Inner_Full	81_40	3330	622000	18.50	17.50
Low	30	70	CP-OFDM 16QAM	Inner_Full	94_47	3335.01	622334	18.50	17.46
Low	30	80	CP-OFDM 16QAM	Inner_Full	109_54	3340.02	622668	18.50	17.43
Low	30	90	CP-OFDM 16QAM	Inner_Full	123_61	3345	623000	18.50	17.40
Low	30	10	DFT-s-OFDM 16QAM	Inner_1RB_Left	1_1	3305.01	620334	18.50	17.54

11.6 Wi-Fi and BT Measurement result

When the same transmission mode configurations have the same maximum output power on the same channel for the 802.11 a/n/ac/ax modes, the channel in the lower order/sequence 802.11 mode (i.e. a, n, ac then ax) is selected. Therefore the SAR measurements performed for the 802.11n/ac modes, as the lowest order modulation, cover 802.11ax modes.

When the specified maximum output power is the same for both UNII 1 and UNII 2A, begin SAR measurements in UNII 2A with the channel with the highest measured output power. If the reported SAR for UNII 2A is ≤ 1.2 W/kg, SAR is not required for UNII 1; otherwise treat the remaining bands separately and test them independently for SAR.

According to KDB 248227 D01, simultaneous SAR provisions in KDB 447498 D01 apply to determine simultaneous transmission SAR test exclusion for Wi-Fi MIMO. If the sum of 1-g single transmission chain SAR measurements is < 1.6 W/kg and/or the MIMO output power is equal or less than a single chain, then no additional SAR measurements for simultaneously at the specified maximum output power of MIMO operation.

When antennas are spatially separated to the extent that SAR distributions do not overlap and can be treated independently, SAR compliance for simultaneous transmission is determined separately for each individual antenna.

WIFI Tune up

Mode	Band	Full power& Body Standalone transmission	Head(Receiver on)	Body(Receiver off)
			Standalone&Simultaneous transmission WWAN+WLAN2.4G/5G	Simultaneous transmission WWAN+WLAN2.4G/5G
		Power reduce Level 1	Power reduce Level 2	Power reduce Level 3
2.4G	802.11b CH1-11	20.0	14.3	15
	802.11g CH1-11	18	12	13
	802.11nHT20 CH1-11	17	11	12
	802.11nHT40 CH3-11	15	9	10
5G B1 (5.15-5.25GHz)	802.11a CH36-48	19.0	12.0	14.5
	802.11nHT20 CH36-48	18	11	13.5
	802.11nHT40 CH38-46	17.5	10.5	13
	802.11acVHT20 CH36-48	17.5	10.5	13
	802.11acVHT40 CH38-46	17	10	12.5
	802.11acVHT80 CH42	15	8	10.5

5G B2 (5.25-5.35GHz)	802.11a CH52-64	19	12	14.5
	802.11nHT20 CH52-64	18	11	13.5
	802.11nHT40 CH54-62	17.5	10.5	13
	802.11acVHT20 CH52-64	17.5	10.5	13
	802.11acVHT40 CH54-62	17	10	12.5
	802.11acVHT80 CH58	15	8	10.5
5G B3(5.47-5.725GHz)	802.11a CH100-144	19	14.5	17.5
	802.11nHT20 CH100-140	18	13.5	16.5
	802.11nHT40 CH102-134	17.5	13	16
	802.11acVHT20 CH100-140	17.5	13	16
	802.11acVHT40 CH102-134	17	12.5	15.5
	802.11acVHT80 CH106-122	15	10.5	13.5
5G B4(5.725-5.85GHz)	802.11a CH149-165	19	14.5	17.5
	802.11nHT20 CH149-165	18	13.5	16.5
	802.11nHT40 CH151-159	17.5	13	16
	802.11acVHT20 CH149-165	17.5	13	16
	802.11acVHT40 CH151-159	17	12.5	15.5
	802.11acVHT80 CH155	15	10.5	13.5

The maximum output power for WiFi 2.4G – Head(receiver on)

802.11b	Channel\data rate	1Mbps
WLAN2450	11(2462MHz)	14.16
	6(2437(MHz)	14.22
	1(2412MHz)	14.05
	TUNE UP	14.30
802.11g	Channel\data rate	6Mbps
WLAN2450	11(2462MHz)	11.51
	6(2437(MHz)	11.62
	1(2412MHz)	11.63
	TUNE UP	12.00
802.11n-20MHz	Channel\data rate	MCS0
WLAN2450	11(2462MHz)	10.43
	6(2437(MHz)	10.56
	1(2412MHz)	10.57
	TUNE UP	11.00
802.11n-40MHz	Channel\data rate	MCS0
WLAN2450	9(2452MHz)	7.70
	6(2437(MHz)	7.71
	3(2422MHz)	7.29
	TUNE UP	9.00

The maximum output power for WiFi 2.4G - Body(receiver off-standalone)

802.11b	Channel\data rate	1Mbps
WLAN2450	11(2462MHz)	19.50
	6(2437(MHz)	19.52
	1(2412MHz)	19.48
	Tune up	20.00
802.11g	Channel\data rate	6Mbps
WLAN2450	11(2462MHz)	17.14
	6(2437(MHz)	17.19
	1(2412MHz)	17.21
	Tune up	18.00
802.11n-20MHz	Channel\data rate	MCS0
WLAN2450	11(2462MHz)	16.24
	6(2437(MHz)	16.26
	1(2412MHz)	16.18
	Tune up	17.00
802.11n-40MHz	Channel\data rate	MCS0
WLAN2450	9(2452MHz)	13.75
	6(2437(MHz)	13.67
	3(2422MHz)	13.42
	TUNE UP	15.00

The maximum output power for WiFi 2.4G - Body(receiver off- simultaneous transmission)

802.11b	Channel\data rate	1Mbps
WLAN2450	11(2462MHz)	14.66
	6(2437(MHz)	14.67
	1(2412MHz)	14.64
	Tune up	15.00
802.11g	Channel\data rate	6Mbps
WLAN2450	11(2462MHz)	12.41
	6(2437(MHz)	12.42
	1(2412MHz)	12.46
	Tune up	13.00
802.11n-20MHz	Channel\data rate	MCS0
WLAN2450	11(2462MHz)	11.25
	6(2437(MHz)	11.31
	1(2412MHz)	11.34
	Tune up	12.00
802.11n-40MHz	Channel\data rate	MCS0
WLAN2450	9(2452MHz)	8.83
	6(2437(MHz)	8.90
	3(2422MHz)	8.25
	TUNE UP	10.00

The maximum output power for WiFi 5G- Head(receiver on)

802.11a(dBm)	
Channel\data rate	6Mbps
36(5180 MHz)	10.08
40(5200 MHz)	10.14
44(5220 MHz)	10.36
48(5240 MHz)	10.68
Tune up	12.00
52(5260 MHz)	10.82
56(5280 MHz)	10.61
60(5300 MHz)	10.33
64(5320 MHz)	10.12
Tune up	12.00
100(5500 MHz)	12.68
104(5520 MHz)	12.74
108(5540 MHz)	12.92
112(5560 MHz)	13.32
116(5580 MHz)	13.68
120(5600 MHz)	13.96
124(5620 MHz)	13.95
128(5640 MHz)	13.92
132(5660 MHz)	13.88
136(5680 MHz)	14.02
140(5700 MHz)	14.06
144(5720 MHz)	14.15
Tune up	14.50
149(5745 MHz)	13.21
153(5765 MHz)	13.50
157(5785 MHz)	13.42
161(5805 MHz)	13.45
165(5825 MHz)	13.42
Tune up	14.50

The maximum output power for WiFi 5G- Body(receiver off-standalone)

802.11a(dBm)	
Channel\data rate	6Mbps
36(5180 MHz)	17.08
40(5200 MHz)	17.26
44(5220 MHz)	17.42
48(5240 MHz)	17.77
Tune up	19.00
52(5260 MHz)	17.82
56(5280 MHz)	17.55
60(5300 MHz)	17.27
64(5320 MHz)	17.06
Tune up	19.00
100(5500 MHz)	17.10
104(5520 MHz)	17.08
108(5540 MHz)	17.11
112(5560 MHz)	17.56
116(5580 MHz)	18.20
120(5600 MHz)	18.14
124(5620 MHz)	18.44
128(5640 MHz)	18.11
132(5660 MHz)	18.16
136(5680 MHz)	18.12
140(5700 MHz)	18.28
144(5720 MHz)	18.55
Tune up	19.00
149(5745 MHz)	17.85
153(5765 MHz)	18.04
157(5785 MHz)	17.95
161(5805 MHz)	18.01
165(5825 MHz)	17.87
Tune up	19.00

The maximum output power for WiFi 5G - Body(receiver off- simultaneous transmission)

802.11a(dBm)	
Channel\data rate	6Mbps
36(5180 MHz)	12.55
40(5200 MHz)	12.75
44(5220 MHz)	13.02
48(5240 MHz)	13.26
Tune up	14.50
52(5260 MHz)	13.38
56(5280 MHz)	13.22
60(5300 MHz)	12.97
64(5320 MHz)	12.68
Tune up	14.50
100(5500 MHz)	15.83
104(5520 MHz)	15.82
108(5540 MHz)	16.18
112(5560 MHz)	16.52
116(5580 MHz)	16.94
120(5600 MHz)	17.06
124(5620 MHz)	17.13
128(5640 MHz)	17.03
132(5660 MHz)	16.98
136(5680 MHz)	17.04
140(5700 MHz)	17.28
144(5720 MHz)	17.32
Tune up	17.50
149(5745 MHz)	16.42
153(5765 MHz)	16.58
157(5785 MHz)	16.54
161(5805 MHz)	16.48
165(5825 MHz)	16.49
Tune up	17.50

The average conducted power for BT is as following:

Mode	GFSK			EDR2M-4_DQPSK			EDR3M-8DPSK		
Channel	Channel 0	Channel 39	Channel 78	Channel 0	Channel 39	Channel 78	Channel 0	Channel 39	Channel 78
power	9.35	9.71	10.16	8.49	8.68	9.18	8.47	8.68	9.22
Tune up	11	11	11	9.5	9.5	9.5	9.5	9.5	9.5

12 Antenna Location

12.1 Transmit Antenna Separation Distances

The detail for transmit antenna separation distances is described in the additional document:

Appendix to test report No.I21Z62218-SEM01

The photos of SAR test

12.2 SAR Measurement Positions

According to the KDB941225 D06 Hot Spot SAR v01, the edges with less than 2.5 cm distance to the antennas need to be tested for SAR.

SAR measurement positions						
Mode	Front	Rear	Left edge	Right edge	Top edge	Bottom edge
ANT13	Yes	Yes	Yes	No	Yes	No
ANT31	Yes	Yes	No	Yes	No	Yes
ANT41	Yes	Yes	Yes	No	No	Yes
ANT22	Yes	Yes	No	Yes	Yes	No
ANT12	Yes	Yes	Yes	No	Yes	No
ANT11	Yes	Yes	Yes	No	Yes	No

12.3 Standalone SAR Test Exclusion Considerations

Standalone 1-g head or body SAR evaluation by measurement or numerical simulation is not required when the corresponding SAR Exclusion Threshold condition, listed below, is satisfied.

The 1-g SAR test exclusion threshold for 100 MHz to 6 GHz at test separation distances ≤ 50 mm are determined by:

$$\left[\frac{(\text{max. power of channel, including tune-up tolerance, mW})}{(\text{min. test separation distance, mm})} \right] \cdot [\sqrt{f(\text{GHz})}] \leq 3.0$$
 for 1-g SAR, where

- $f(\text{GHz})$ is the RF channel transmit frequency in GHz
- Power and distance are rounded to the nearest mW and mm before calculation
- The result is rounded to one decimal place for comparison

Standalone SAR test exclusion considerations

Band/Mode	F(GHz)	Position	SAR test exclusion threshold(mW)	RF output power		SAR test exclusion
				dBm	mW	
Bluetooth	2.441	Head	9.60	11	12.59	No
		Body	19.20	11	12.59	Yes
2.4GHz WLAN	2.45	Head	9.58	14.3	26.92	No
		Body	19.17	20	100.00	No
5GHz WLAN	5.2	Head	6.58	12	15.85	No
		Body	13.16	19	79.43	No
	5.3	Head	6.52	12	15.85	No
		Body	13.03	19	79.43	No
	5.6	Head	6.34	14.5	28.18	No
		Body	12.68	19	79.43	No
	5.8	Head	6.23	14.5	28.18	No
		Body	12.46	19	79.43	No

13 SAR Test Result

Note:

KDB 447498 D01 General RF Exposure Guidance:

For WWAN: Reported SAR(W/kg)= Measured SAR(W/kg)*Tune-up Scaling Factor

For BT/WLAN: Reported SAR(W/kg)= Measured SAR(W/kg)* Duty Cycle scaling factor * Tune-up scaling factor

Testing of other required channels within the operating mode of a frequency band is not required when the reported 1-g or 10-g SAR for the mid-band or highest output power channel is:

≤ 0.8 W/kg or 2.0 W/kg, for 1-g or 10-g respectively, when the transmission band is ≤ 100 MHz

≤ 0.6 W/kg or 1.5 W/kg, for 1-g or 10-g respectively, when the transmission band is between 100 MHz and 200 MHz

≤ 0.4 W/kg or 1.0 W/kg, for 1-g or 10-g respectively, when the transmission band is ≥ 200 MHz

KDB 648474 D04 Handset SAR:

With headset attached, when the reported SAR for body-worn accessory, measured without a headset connected to the handset, is > 1.2 W/kg, the highest reported SAR configuration for that wireless mode and frequency band should be repeated for that body-worn accessory with a headset attached to the handset.

KDB 941225 D01 SAR test for 3G devices:

When the maximum output power and tune-up tolerance specified for production units in a secondary mode is $\leq \frac{1}{4}$ dB higher than the primary mode or when the highest reported SAR of the primary mode is scaled by the ratio of specified maximum output power and tune-up tolerance of secondary to primary mode and the adjusted SAR is ≤ 1.2 W/kg, SAR measurement is not required for the secondary mode.

KDB 941225 D05 SAR for LTE Devices:

SAR test reduction is applied using the following criteria:

Start with the largest channel bandwidth and measure SAR for QPSK with 1 RB, and 50% RB allocation, using the RB offset and required test channel combination with the highest maximum output power among RB offsets at the upper edge, middle and lower edge of each required test channel.

When the reported SAR is > 0.8 W/kg, testing for other Channels is performed at the highest output power level for 1RB, and 50% RB configuration for that channel.

Testing for 100% RB configuration is performed at the highest output power level for 100% RB configuration across the Low, Mid and High Channel when the highest reported SAR for 1 RB and 50% RB are > 0.8 W/kg. Testing for the remaining required channels is not needed because the reported SAR for 100% RB Allocation < 1.45 W/kg.

Testing for 16-QAM modulation is not required because the reported SAR for QPSK is < 1.45 W/Kg and its output power is not more than 0.5 dB higher than that of QPSK.

Testing for the other channel bandwidths is not required because the reported SAR for the highest channel bandwidth is < 1.45 W/Kg and its output power is not more than 0.5 dB higher than that of the highest channel bandwidth.

For LTE bands that do not support at least three non-overlapping channels in certain channel bandwidths, test the available non-overlapping channels instead. When a device supports overlapping channel assignment in a channel bandwidth configuration, the middle channel of the

group of overlapping channels should be selected for testing; therefore, the requirement for H, M and L channels may not fully apply.

KDB 941225 D06 Hot Spot SAR:

The hotspot mode and body-worn accessory SAR test configurations may overlap for handsets. When the same wireless mode transmission configurations for voice and data are required for SAR measurements, the more conservative configuration with a smaller separation distance should be tested for the overlapping SAR configurations. This typically applies to the back and front surfaces of a handset when SAR is required for both hotspot mode and body-worn accessory exposure conditions.

KDB 248227 D01 SAR meas for 802.11:

SAR test reduction for 802.11 Wi-Fi transmission mode configurations are considered separately for DSSS and OFDM. An initial test position is determined to reduce the number of tests required for certain exposure configurations with multiple test positions. An initial test configuration is determined for each frequency band and aggregated band according to maximum output power, channel bandwidth, wireless mode configurations and other operating parameters to streamline the measurement requirements. For 2.4 GHz DSSS, either the initial test position or DSSS procedure is applied to reduce the number of SAR tests; these are mutually exclusive. For OFDM, an initial test position is only applicable to next to the ear, UMPC mini-tablet and hotspot mode configurations, which is tested using the initial test configuration to facilitate test reduction. For other exposure conditions with a fixed test position, SAR test reduction is determined using only the initial test configuration.

To determine the initial test position, Area Scans were performed to determine the position with the Maximum Value of SAR (measured). The position that produced the highest Maximum Value of SAR is considered the worst case position; thus used as the initial test position.

The multiple test positions require SAR measurements in head, hotspot mode or UMPC mini-tablet configurations may be reduced according to the highest reported SAR determined using the initial test position(s) by applying the DSSS or OFDM SAR measurement procedures in the required wireless mode test configuration(s). The initial test position(s) is measured using the highest measured maximum output power channel in the required wireless mode test configuration(s).

When the reported SAR for the initial test position is:

$\leq 0.4 \text{ W/kg}$, further SAR measurement is not required for the other test positions in that exposure configuration and wireless mode combination within the frequency band or aggregated band. DSSS and OFDM configurations are considered separately according to the required SAR procedures.
 $> 0.4 \text{ W/kg}$, SAR is repeated using the same wireless mode test configuration tested in the initial test position to measure the subsequent next closet/smallest test separation distance and maximum coupling test position, on the highest maximum output power channel, until the reported SAR is $\leq 0.8 \text{ W/kg}$ or all required test positions are tested.

- For subsequent test positions with equivalent test separation distance or when exposure is dominated by coupling conditions, the position for maximum coupling condition should be tested.
- When it is unclear, all equivalent conditions must be tested.

For all positions/configurations tested using the initial test position and subsequent test positions, when the reported SAR is $> 0.8 \text{ W/kg}$, measure the SAR for these positions/configurations on the subsequent next highest measured output power channel(s) until the reported SAR is $\leq 1.2 \text{ W/kg}$ or all required test channels are considered.

•The additional power measurements required for this step should be limited to those necessary for identifying subsequent highest output power channels to apply the test reduction.

When the specified maximum output power is the same for both UNII 1 and UNII 2A, begin SAR measurements in UNII 2A with the channel with the highest measured output power. If the reported SAR for UNII 2A is ≤ 1.2 W/kg, SAR is not required for UNII 1; otherwise treat the remaining bands separately and test them independently for SAR.

When the specified maximum output power is different between UNII 1 and UNII 2A, begin SAR with the band that has the higher specified maximum output. If the highest reported SAR for the band with the highest specified power is ≤ 1.2 W/kg, testing for the band with the lower specified output power is not required; otherwise test the remaining bands independently for SAR.

Duty Cycle

Mode	Duty Cycle
Speech for GSM	1:8.3
GPRS&EGPRS 1 Slot	1:8.3
GPRS&EGPRS 2 Slot	1:4
GPRS&EGPRS 3 Slot	1:2.67
GPRS&EGPRS 4 Slot	1:2
WCDMA&LTE FDD	1:1
TDD PC3	1:1.58

Ambient Temperature: 21.5-23.5 °C Liquid Temperature: 21.5-23.5 °C

The evaluation of multi-SIM cards:

We'll perform the head measurement in all bands with the primary SIM depending on the evaluation of multi-SIM cards and retest on highest value point with other SIM. Then, repeat the measurement in the Body test.

Frequency		Side	Test Position	SIM cards	SAR(1g) (W/kg)	Power Drift(dB)
MHz	Ch.					
836.6	190	Left	Cheek	S1	0.1	-0.03
836.6	190	Left	Cheek	S2	0.095	0.11

Note: According to the values in the above table, the **S1** is the primary SIM card.

We'll perform the head measurement with the **S1** and retest on highest value point with others.

Frequency		Test Position	Spacing (mm)	SIM cards	SAR(1g) (W/kg)	Power Drift(dB)
MHz	Ch.					
836.6	190	Front	10	S1	0.307	-0.07
836.6	190	Front	10	S2	0.298	0.05

Note: According to the values in the above table, the **S1** is the primary SIM card.

We'll perform the body measurement with the **S1** and retest on highest value point with others.

Note

S2: SIM2

13.1 SAR results for 2/3/4G

ANT13 Head

ANT	RF Exposure Conditions	Frequency Band	Channel Number	Frequency (MHz)	Mode/RB	Test Position	Distance	Figure No./Note	EUT Measured Power (dBm)	Tune up (dBm)	Measured SAR 1g (W/kg)	Reported SAR 1g (W/kg)	Measured SAR 10g (W/kg)	Reported SAR 10g (W/kg)	Power Drift
13	Head	CDMABC0	384	836.52	SO55	Cheek Left	0mm	\	18.46	19.5	0.252	0.32	0.137	0.17	0.07
13	Head	CDMABC0	384	836.52	SO55	Tilt Left	0mm	\	18.46	19.5	0.256	0.32	0.139	0.18	-0.08
13	Head	CDMABC0	384	836.52	SO55	Cheek Right	0mm	\	18.46	19.5	0.274	0.35	0.150	0.19	0.08
13	Head	CDMABC0	777	848.31	SO55	Tilt Right	0mm	\	18.40	19.5	0.321	0.41	0.174	0.22	0.09
13	Head	CDMABC0	384	836.52	SO55	Tilt Right	0mm	Fig.A-1	18.46	19.5	0.332	0.42	0.181	0.23	0.11
13	Head	CDMABC0	1013	824.7	SO55	Tilt Right	0mm	\	18.36	19.5	0.304	0.39	0.166	0.22	0.10
13	Head	GSM850	190	836.6	GSM	Cheek Left	0mm	\	25.11	26.2	0.100	0.13	0.067	0.09	-0.03
13	Head	GSM850	190	836.6	GSM	Tilt Left	0mm	\	25.11	26.2	0.099	0.13	0.060	0.08	-0.05
13	Head	GSM850	251	848.8	GSM	Cheek Right	0mm	\	25.04	26.2	0.105	0.14	0.064	0.08	0.12
13	Head	GSM850	190	836.6	GSM	Cheek Right	0mm	\	25.11	26.2	0.123	0.16	0.076	0.10	-0.19
13	Head	GSM850	128	824.2	GSM	Cheek Right	0mm	Fig.A-2	24.93	26.2	0.133	0.18	0.081	0.11	0.09
13	Head	GSM850	190	836.6	GSM	Tilt Right	0mm	\	25.11	26.2	0.107	0.14	0.059	0.08	-0.04
13	Head	GSM1900	661	1880	GSM	Cheek Left	0mm	\	23.09	23.8	0.224	0.26	0.113	0.13	-0.10
13	Head	GSM1900	661	1880	GSM	Tilt Left	0mm	\	23.09	23.8	0.266	0.31	0.130	0.15	-0.14
13	Head	GSM1900	661	1880	GSM	Cheek Right	0mm	\	23.09	23.8	0.280	0.33	0.133	0.16	0.10
13	Head	GSM1900	810	1909.8	GSM	Tilt Right	0mm	\	22.90	23.8	0.348	0.43	0.152	0.19	0.04
13	Head	GSM1900	661	1880	GSM	Tilt Right	0mm	Fig.A-3	23.09	23.8	0.374	0.44	0.168	0.20	0.14
13	Head	GSM1900	512	1850.2	GSM	Tilt Right	0mm	\	23.08	23.8	0.373	0.44	0.165	0.19	-0.15
13	Head	WCDMA1900	9400	1880	RMC	Cheek Left	0mm	\	14.03	15.5	0.383	0.54	0.191	0.27	-0.01
13	Head	WCDMA1900	9400	1880	RMC	Tilt Left	0mm	\	14.03	15.5	0.461	0.65	0.229	0.32	0.16
13	Head	WCDMA1900	9400	1880	RMC	Cheek Right	0mm	\	14.03	15.5	0.419	0.59	0.197	0.28	-0.03
13	Head	WCDMA1900	9538	1907.6	RMC	Tilt Right	0mm	\	13.85	15.5	0.523	0.76	0.238	0.35	-0.06
13	Head	WCDMA1900	9400	1880	RMC	Tilt Right	0mm	Fig.A-4	14.03	15.5	0.552	0.77	0.253	0.35	-0.08
13	Head	WCDMA1900	9262	1852.4	RMC	Tilt Right	0mm	\	13.70	15.5	0.505	0.76	0.224	0.34	0.05
13	Head	WCDMA1900	9400	1880	RMC	Tilt Right	0mm	S2	14.03	15.5	0.542	0.76	0.244	0.34	0.16
13	Head	WCDMA1700	1413	1732.6	RMC	Cheek Left	0mm	\	14.68	16	0.390	0.53	0.200	0.27	0.13
13	Head	WCDMA1700	1413	1732.6	RMC	Tilt Left	0mm	\	14.68	16	0.472	0.64	0.235	0.32	0.14
13	Head	WCDMA1700	1413	1732.6	RMC	Cheek Right	0mm	\	14.68	16	0.427	0.58	0.211	0.29	0.12
13	Head	WCDMA1700	1513	1752.6	RMC	Tilt Right	0mm	Fig.A-5	14.72	16	0.561	0.75	0.256	0.34	0.12
13	Head	WCDMA1700	1413	1732.6	RMC	Tilt Right	0mm	\	14.68	16	0.499	0.68	0.229	0.31	-0.15
13	Head	WCDMA1700	1312	1712.4	RMC	Tilt Right	0mm	\	14.83	16	0.448	0.59	0.205	0.27	0.16
13	Head	WCDMA 850	4183	836.6	RMC	Cheek Left	0mm	\	18.81	20	0.151	0.20	0.099	0.13	0.14
13	Head	WCDMA 850	4183	836.6	RMC	Tilt Left	0mm	\	18.81	20	0.140	0.18	0.084	0.11	0.06
13	Head	WCDMA 850	4233	846.6	RMC	Cheek Right	0mm	Fig.A-6	18.67	20	0.180	0.24	0.113	0.15	0.08
13	Head	WCDMA 850	4183	836.6	RMC	Cheek Right	0mm	\	18.81	20	0.165	0.22	0.102	0.13	0.05
13	Head	WCDMA 850	4132	826.4	RMC	Cheek Right	0mm	\	18.92	20	0.179	0.23	0.112	0.14	-0.02
13	Head	WCDMA 850	4183	836.6	RMC	Tilt Right	0mm	\	18.81	20	0.163	0.21	0.091	0.12	0.04
13	Head	LTE Band2	18700	1860	1RB-Middle	Cheek Left	0mm	\	14.46	15.5	0.337	0.43	0.165	0.21	0.17
13	Head	LTE Band2	18700	1860	1RB-Middle	Tilt Left	0mm	\	14.46	15.5	0.442	0.56	0.208	0.26	0.13
13	Head	LTE Band2	18700	1860	1RB-Middle	Cheek Right	0mm	\	14.46	15.5	0.433	0.55	0.211	0.27	0.05
13	Head	LTE Band2	18700	1860	1RB-Middle	Tilt Right	0mm	\	14.46	15.5	0.518	0.66	0.234	0.30	0.02
13	Head	LTE Band2	18700	1860	50RB-High	Cheek Left	0mm	\	14.52	15.5	0.367	0.46	0.176	0.22	-0.17
13	Head	LTE Band2	18700	1860	50RB-High	Tilt Left	0mm	\	14.52	15.5	0.438	0.55	0.205	0.26	-0.03
13	Head	LTE Band2	18700	1860	50RB-High	Cheek Right	0mm	\	14.52	15.5	0.435	0.55	0.214	0.27	0.17
13	Head	LTE Band2	18700	1860	50RB-High	Tilt Right	0mm	Fig.A-7	14.52	15.5	0.528	0.66	0.239	0.30	0.04
13	Head	LTE Band4	20050	1720	1RB-Low	Cheek Left	0mm	\	15.62	16.5	0.279	0.34	0.141	0.17	-0.16
13	Head	LTE Band4	20050	1720	1RB-Low	Tilt Left	0mm	\	15.62	16.5	0.318	0.39	0.161	0.20	0.09
13	Head	LTE Band4	20050	1720	1RB-Low	Cheek Right	0mm	\	15.62	16.5	0.382	0.47	0.183	0.22	-0.06
13	Head	LTE Band4	20050	1720	1RB-Low	Tilt Right	0mm	\	15.62	16.5	0.458	0.56	0.209	0.26	0.07
13	Head	LTE Band4	20050	1720	50RB-Low	Cheek Left	0mm	\	15.61	16.5	0.287	0.35	0.143	0.18	0.09
13	Head	LTE Band4	20050	1720	50RB-Low	Tilt Left	0mm	\	15.61	16.5	0.334	0.41	0.166	0.20	0.13
13	Head	LTE Band4	20050	1720	50RB-Low	Cheek Right	0mm	\	15.61	16.5	0.382	0.47	0.184	0.23	0.03
13	Head	LTE Band4	20050	1720	50RB-Low	Tilt Right	0mm	Fig.A-8	15.61	16.5	0.465	0.57	0.212	0.26	0.17



13	Head	LTE Band5	20450	829	1RB-Middle	Cheek Left	0mm	\	18.96	20	0.172	0.22	0.111	0.14	-0.10
13	Head	LTE Band5	20450	829	1RB-Middle	Tilt Left	0mm	\	18.96	20	0.152	0.19	0.089	0.11	-0.07
13	Head	LTE Band5	20450	829	1RB-Middle	Cheek Right	0mm	Fig.A-9	18.96	20	0.189	0.24	0.117	0.15	0.01
13	Head	LTE Band5	20450	829	1RB-Middle	Tilt Right	0mm	\	18.96	20	0.183	0.23	0.097	0.12	-0.03
13	Head	LTE Band5	20450	829	25RB-Low	Cheek Left	0mm	\	19.02	20	0.173	0.22	0.111	0.14	-0.03
13	Head	LTE Band5	20450	829	25RB-Low	Tilt Left	0mm	\	19.02	20	0.144	0.18	0.085	0.11	0.06
13	Head	LTE Band5	20450	829	25RB-Low	Cheek Right	0mm	\	19.02	20	0.182	0.23	0.113	0.14	0.03
13	Head	LTE Band5	20450	829	25RB-Low	Tilt Right	0mm	\	19.02	20	0.174	0.22	0.092	0.12	0.15
13	Head	LTE Band7	21350	2560	1RB-Middle	Cheek Left	0mm	\	14.86	16	0.194	0.25	0.098	0.13	0.13
13	Head	LTE Band7	21350	2560	1RB-Middle	Tilt Left	0mm	\	14.86	16	0.280	0.36	0.131	0.17	0.02
13	Head	LTE Band7	21350	2560	1RB-Middle	Cheek Right	0mm	\	14.86	16	0.295	0.38	0.142	0.18	0.09
13	Head	LTE Band7	21350	2560	1RB-Middle	Tilt Right	0mm	\	14.86	16	0.394	0.51	0.176	0.23	-0.04
13	Head	LTE Band7	21350	2560	50RB-Middle	Cheek Left	0mm	\	14.95	16	0.203	0.26	0.103	0.13	0.04
13	Head	LTE Band7	21350	2560	50RB-Middle	Tilt Left	0mm	\	14.95	16	0.283	0.36	0.132	0.17	0.02
13	Head	LTE Band7	21350	2560	50RB-Middle	Cheek Right	0mm	\	14.95	16	0.293	0.37	0.142	0.18	-0.13
13	Head	LTE Band7	21350	2560	50RB-Middle	Tilt Right	0mm	Fig.A-10	14.95	16	0.404	0.51	0.180	0.23	0.05
13	Head	LTE Band715M	21375	2562.5	1RB-Low	Tilt Right	0mm	UL CA	14.73	16	0.376	0.50	0.163	0.22	0.13
13	Head	LTE Band12	23060	704	1RB-High	Cheek Left	0mm	\	20.54	21.5	0.126	0.16	0.079	0.10	-0.03
13	Head	LTE Band12	23060	704	1RB-High	Tilt Left	0mm	\	20.54	21.5	0.116	0.14	0.068	0.08	0.02
13	Head	LTE Band12	23060	704	1RB-High	Cheek Right	0mm	\	20.54	21.5	0.135	0.17	0.081	0.10	-0.05
13	Head	LTE Band12	23060	704	1RB-High	Tilt Right	0mm	\	20.54	21.5	0.169	0.21	0.089	0.11	-0.14
13	Head	LTE Band12	23060	704	25RB-High	Cheek Left	0mm	\	20.48	21.5	0.118	0.15	0.073	0.09	-0.02
13	Head	LTE Band12	23060	704	25RB-High	Tilt Left	0mm	\	20.48	21.5	0.121	0.15	0.070	0.09	-0.11
13	Head	LTE Band12	23060	704	25RB-High	Cheek Right	0mm	\	20.48	21.5	0.138	0.17	0.082	0.10	-0.12
13	Head	LTE Band12	23060	704	25RB-High	Tilt Right	0mm	Fig.A-11	20.48	21.5	0.175	0.22	0.092	0.12	0.09
13	Head	LTE Band38	37850	2580	1RB-Middle	Cheek Left	0mm	\	18.33	19	0.219	0.26	0.113	0.13	-0.18
13	Head	LTE Band38	37850	2580	1RB-Middle	Tilt Left	0mm	\	18.33	19	0.313	0.37	0.142	0.17	-0.06
13	Head	LTE Band38	37850	2580	1RB-Middle	Cheek Right	0mm	\	18.33	19	0.415	0.48	0.198	0.23	-0.13
13	Head	LTE Band38	37850	2580	1RB-Middle	Tilt Right	0mm	Fig.A-12	18.33	19	0.513	0.60	0.226	0.26	0.09
13	Head	LTE Band38	37850	2580	50RB-Low	Cheek Left	0mm	\	18.27	19	0.231	0.27	0.116	0.14	-0.01
13	Head	LTE Band38	37850	2580	50RB-Low	Tilt Left	0mm	\	18.27	19	0.315	0.37	0.143	0.17	0.12
13	Head	LTE Band38	37850	2580	50RB-Low	Cheek Right	0mm	\	18.27	19	0.398	0.47	0.187	0.22	0.18
13	Head	LTE Band38	37850	2580	50RB-Low	Tilt Right	0mm	\	18.27	19	0.504	0.60	0.220	0.26	-0.15
13	Head	LTE Band38 15M	38175	2612.5	1RB-Low	Tilt Right	0mm	UL CA	18.14	19	0.489	0.60	0.212	0.26	0.13
13	Head	LTE Band41	41055	2636.5	1RB-Middle	Cheek Left	0mm	\	16.62	17.5	0.160	0.20	0.083	0.10	-0.01
13	Head	LTE Band41	41055	2636.5	1RB-Middle	Tilt Left	0mm	\	16.62	17.5	0.202	0.25	0.094	0.12	-0.06
13	Head	LTE Band41	41055	2636.5	1RB-Middle	Cheek Right	0mm	\	16.62	17.5	0.310	0.38	0.144	0.18	-0.12
13	Head	LTE Band41	41055	2636.5	1RB-Middle	Tilt Right	0mm	\	16.62	17.5	0.309	0.38	0.139	0.17	0.14
13	Head	LTE Band41	41055	2636.5	50RB-Low	Cheek Left	0mm	\	16.63	17.5	0.193	0.24	0.099	0.12	0.18
13	Head	LTE Band41	41055	2636.5	50RB-Low	Tilt Left	0mm	\	16.63	17.5	0.211	0.26	0.099	0.12	0.18
13	Head	LTE Band41	41055	2636.5	50RB-Low	Cheek Right	0mm	\	16.63	17.5	0.308	0.38	0.144	0.18	-0.18
13	Head	LTE Band41	41055	2636.5	50RB-Low	Tilt Right	0mm	Fig.A-13	16.63	17.5	0.311	0.38	0.140	0.17	0.06
13	Head	LTE Band41 15M	41515	2682.5	1RB-Low	Tilt Right	0mm	UL CA	16.46	17.5	0.294	0.37	0.132	0.17	0.09

ANT13 Body

ANT	RF Exposure Conditions	Frequency Band	Channel Number	Frequency (MHz)	Mode/RB	Test Position	Distance	Figure No./Note	EUT Measured Power (dBm)	Tune up (dBm)	Measured SAR 1g (W/kg)	Reported SAR 1g (W/kg)	Measured SAR 10g (W/kg)	Reported SAR 10g (W/kg)	Power Drift
13	Body	CDMABC0	384	836.52	SO32	Front	10mm	\	19.94	21	0.144	0.18	0.094	0.12	0.06
13	Body	CDMABC0	777	848.31	SO32	Rear	10mm	\	19.87	21	0.140	0.18	0.091	0.12	0.05
13	Body	CDMABC0	384	836.52	SO32	Rear	10mm	Fig.A-14	19.94	21	0.166	0.21	0.108	0.14	-0.02
13	Body	CDMABC0	1013	824.7	SO32	Rear	10mm	\	19.83	21	0.110	0.14	0.072	0.09	0.11
13	Body	CDMABC0	384	836.52	SO32	Left	10mm	\	19.94	21	<0.01	<0.01	<0.01	<0.01	/
13	Body	CDMABC0	384	836.52	SO32	Right	10mm	\	19.94	21	0.090	0.11	0.059	0.07	0.09
13	Body	CDMABC0	384	836.52	SO32	Top	10mm	\	19.94	21	0.130	0.17	0.085	0.11	0.08
13	Body	GSM850	190	836.6	GPRS(2TX)	Front	10mm	\	31.25	31.7	0.307	0.34	0.206	0.23	-0.07
13	Body	GSM850	251	848.8	GPRS(2TX)	Rear	10mm	\	31.25	31.7	0.359	0.40	0.241	0.27	-0.07
13	Body	GSM850	190	836.6	GPRS(2TX)	Rear	10mm	Fig.A-15	31.25	31.7	0.387	0.43	0.251	0.28	-0.07
13	Body	GSM850	128	824.2	GPRS(2TX)	Rear	10mm	\	31.03	31.7	0.344	0.40	0.232	0.27	-0.03
13	Body	GSM850	190	836.6	GPRS(2TX)	Left	10mm	\	31.25	31.7	0.159	0.18	0.101	0.11	-0.09
13	Body	GSM850	190	836.6	GPRS(2TX)	Right	10mm	\	31.25	31.7	0.116	0.13	0.078	0.09	0.02
13	Body	GSM850	190	836.6	GPRS(2TX)	Top	10mm	\	31.25	31.7	0.253	0.28	0.150	0.17	-0.05
13	Body	GSM850	190	836.6	EGPRS(2TX)	Rear	10mm	\	31.26	31.7	0.363	0.40	0.235	0.26	-0.06
13	Body	GSM1900	661	1880	GPRS(2TX)	Front	10mm	\	23.93	24.8	0.206	0.25	0.104	0.13	0.15
13	Body	GSM1900	661	1880	GPRS(2TX)	Rear	10mm	\	23.93	24.8	0.234	0.29	0.121	0.15	0.07
13	Body	GSM1900	661	1880	GPRS(2TX)	Left	10mm	\	23.93	24.8	0.048	0.06	0.027	0.03	-0.06
13	Body	GSM1900	661	1880	GPRS(2TX)	Right	10mm	\	23.93	24.8	<0.01	<0.01	<0.01	<0.01	/
13	Body	GSM1900	810	1909.8	GPRS(2TX)	Top	10mm	\	23.75	24.8	0.416	0.53	0.208	0.26	-0.06
13	Body	GSM1900	661	1880	GPRS(2TX)	Top	10mm	\	23.93	24.8	0.323	0.39	0.152	0.19	-0.14
13	Body	GSM1900	512	1850.2	GPRS(2TX)	Top	10mm	Fig.A-16	23.91	24.8	0.450	0.55	0.232	0.28	0.07
13	Body	GSM1900	512	1850.2	EGPRS(2TX)	Top	10mm	\	23.90	24.8	0.425	0.52	0.206	0.25	0.01
13	Body	GSM1900	661	1880	GPRS(2TX)	Front	15mm	\	27.90	28.8	0.381	0.47	0.213	0.26	-0.01
13	Body	GSM1900	810	1909.8	GPRS(2TX)	Rear	15mm	Fig.A-17	27.77	28.8	0.462	0.59	0.257	0.33	0.15
13	Body	GSM1900	661	1880	GPRS(2TX)	Rear	15mm	\	27.90	28.8	0.440	0.54	0.247	0.30	0.10
13	Body	GSM1900	512	1850.2	GPRS(2TX)	Rear	15mm	\	27.95	28.8	0.456	0.55	0.253	0.31	0.19
13	Body	GSM1900	810	1909.8	EGPRS(2TX)	Rear	15mm	\	27.72	28.8	0.456	0.58	0.251	0.32	-0.08
13	Body	WCDMA1900	9400	1880	RMC	Front	10mm	\	16.57	18	0.195	0.27	0.105	0.15	-0.04
13	Body	WCDMA1900	9400	1880	RMC	Rear	10mm	\	16.57	18	0.237	0.33	0.126	0.18	0.16
13	Body	WCDMA1900	9400	1880	RMC	Left	10mm	\	16.57	18	0.049	0.07	0.029	0.04	0.11
13	Body	WCDMA1900	9400	1880	RMC	Right	10mm	\	16.57	18	<0.01	<0.01	<0.01	<0.01	/
13	Body	WCDMA1900	9538	1907.6	RMC	Top	10mm	\	16.40	18	0.360	0.52	0.177	0.26	-0.09
13	Body	WCDMA1900	9400	1880	RMC	Top	10mm	Fig.A-18	16.57	18	0.404	0.56	0.204	0.28	0.04
13	Body	WCDMA1900	9262	1852.4	RMC	Top	10mm	\	16.27	18	0.328	0.49	0.160	0.24	0.07
13	Body	WCDMA1900	9400	1880	RMC	Front	15mm	\	21.48	23	0.224	0.32	0.135	0.19	-0.14
13	Body	WCDMA1900	9538	1907.6	RMC	Rear	15mm	\	21.32	23	0.268	0.39	0.159	0.23	-0.07
13	Body	WCDMA1900	9400	1880	RMC	Rear	15mm	Fig.A-19	21.48	23	0.284	0.40	0.167	0.24	0.01
13	Body	WCDMA1900	9262	1852.4	RMC	Rear	15mm	\	21.22	23	0.261	0.39	0.153	0.23	0.10
13	Body	WCDMA1700	1413	1732.6	RMC	Front	10mm	\	16.25	17.5	0.141	0.19	0.078	0.10	0.15
13	Body	WCDMA1700	1413	1732.6	RMC	Rear	10mm	\	16.25	17.5	0.146	0.19	0.081	0.11	0.10
13	Body	WCDMA1700	1413	1732.6	RMC	Left	10mm	\	16.25	17.5	<0.01	<0.01	<0.01	<0.01	/
13	Body	WCDMA1700	1413	1732.6	RMC	Right	10mm	\	16.25	17.5	<0.01	<0.01	<0.01	<0.01	/
13	Body	WCDMA1700	1513	1752.6	RMC	Top	10mm	Fig.A-20	16.27	17.5	0.287	0.38	0.147	0.20	-0.06
13	Body	WCDMA1700	1413	1732.6	RMC	Top	10mm	\	16.25	17.5	0.247	0.33	0.130	0.17	-0.15
13	Body	WCDMA1700	1312	1712.4	RMC	Top	10mm	\	16.30	17.5	0.212	0.28	0.110	0.15	0.16
13	Body	WCDMA1700	1413	1732.6	RMC	Front	15mm	\	23.04	24	0.300	0.37	0.176	0.22	0.16
13	Body	WCDMA1700	1513	1752.6	RMC	Rear	15mm	Fig.A-21	23.07	24	0.402	0.50	0.234	0.29	0.04
13	Body	WCDMA1700	1413	1732.6	RMC	Rear	15mm	\	23.04	24	0.347	0.43	0.201	0.25	0.00
13	Body	WCDMA1700	1312	1712.4	RMC	Rear	15mm	\	23.17	24	0.305	0.37	0.178	0.22	-0.08
13	Body	WCDMA 850	4183	836.6	RMC	Front	10mm	\	22.94	24.5	0.180	0.26	0.118	0.17	0.01
13	Body	WCDMA 850	4233	846.6	RMC	Rear	10mm	\	22.82	24.5	0.212	0.31	0.144	0.21	-0.18
13	Body	WCDMA 850	4183	836.6	RMC	Rear	10mm	Fig.A-22	22.94	24.5	0.228	0.33	0.147	0.21	0.06
13	Body	WCDMA 850	4132	826.4	RMC	Rear	10mm	\	23.00	24.5	0.215	0.30	0.144	0.20	0.15
13	Body	WCDMA 850	4183	836.6	RMC	Left	10mm	\	22.94	24.5	0.104	0.15	0.065	0.09	0.11
13	Body	WCDMA 850	4183	836.6	RMC	Right	10mm	\	22.94	24.5	0.051	0.07	0.034	0.05	-0.15
13	Body	WCDMA 850	4183	836.6	RMC	Top	10mm	\	22.94	24.5	0.159	0.23	0.090	0.13	-0.12
13	Body	LTE Band2	18700	1860	1RB-Middle	Front	10mm	\	17.48	18.5	0.206	0.26	0.107	0.14	-0.08
13	Body	LTE Band2	18700	1860	1RB-Middle	Rear	10mm	\	17.48	18.5	0.227	0.29	0.120	0.15	-0.19
13	Body	LTE Band2	18700	1860	1RB-Middle	Left	10mm	\	17.48	18.5	0.047	0.06	0.028	0.04	-0.13
13	Body	LTE Band2	18700	1860	1RB-Middle	Right	10mm	\	17.48	18.5	<0.01	<0.01	<0.01	<0.01	/
13	Body	LTE Band2	18700	1860	1RB-Middle	Top	10mm	\	17.48	18.5	0.368	0.47	0.186	0.24	-0.10
13	Body	LTE Band2	18700	1860	50RB-High	Front	10mm	\	17.52	18.5	0.199	0.25	0.106	0.13	-0.01
13	Body	LTE Band2	18700	1860	50RB-High	Rear	10mm	\	17.52	18.5	0.204	0.26	0.112	0.14	0.18
13	Body	LTE Band2	18700	1860	50RB-High	Left	10mm	\	17.52	18.5	0.052	0.07	0.031	0.04	0.02
13	Body	LTE Band2	18700	1860	50RB-High	Right	10mm	\	17.52	18.5	<0.01	<0.01	<0.01	<0.01	/
13	Body	LTE Band2	18700	1860	50RB-High	Top	10mm	Fig.A-23	17.52	18.5	0.408	0.51	0.208	0.26	0.02
13	Body	LTE Band2	18900	1880	1RB-Middle	Front	15mm	\	22.09	23	0.341	0.42	0.190	0.23	-0.02
13	Body	LTE Band2	18900	1880	1RB-Middle	Rear	15mm	Fig.A-24	22.09	23	0.379	0.47	0.216	0.27	-0.09
13	Body	LTE Band2	18900	1880	50RB-Low	Front	15mm	\	22.10	23	0.330	0.41	0.184	0.23	-0.17
13	Body	LTE Band2	18900	1880	50RB-Low	Rear	15mm	\	22.10	23	0.372	0.46	0.211	0.26	-0.14

13	Body	LTE Band4	20050	1720	1RB-Middle	Front	10mm	\	17.67	18.5	0.178	0.22	0.096	0.12	0.15
13	Body	LTE Band4	20050	1720	1RB-Middle	Rear	10mm	\	17.67	18.5	0.175	0.21	0.099	0.12	-0.04
13	Body	LTE Band4	20050	1720	1RB-Middle	Left	10mm	\	17.67	18.5	0.046	0.06	0.027	0.03	-0.08
13	Body	LTE Band4	20050	1720	1RB-Middle	Right	10mm	\	17.67	18.5	<0.01	<0.01	<0.01	<0.01	/
13	Body	LTE Band4	20050	1720	1RB-Middle	Top	10mm	Fig.A-25	17.67	18.5	0.343	0.42	0.175	0.21	-0.02
13	Body	LTE Band4	20050	1720	50RB-Low	Front	10mm	\	17.73	18.5	0.171	0.20	0.091	0.11	-0.10
13	Body	LTE Band4	20050	1720	50RB-Low	Rear	10mm	\	17.73	18.5	0.175	0.21	0.098	0.12	-0.16
13	Body	LTE Band4	20050	1720	50RB-Low	Left	10mm	\	17.73	18.5	0.040	0.05	0.023	0.03	0.11
13	Body	LTE Band4	20050	1720	50RB-Low	Right	10mm	\	17.73	18.5	<0.01	<0.01	<0.01	<0.01	/
13	Body	LTE Band4	20050	1720	50RB-Low	Top	10mm	\	17.73	18.5	0.312	0.37	0.156	0.19	0.17
13	Body	LTE Band4	20050	1720	1RB-Middle	Front	15mm	\	23.21	24	0.455	0.55	0.256	0.31	0.03
13	Body	LTE Band4	20050	1720	1RB-Middle	Rear	15mm	Fig.A-26	23.21	24	0.496	0.59	0.280	0.34	0.01
13	Body	LTE Band4	20050	1720	50RB-Middle	Front	15mm	\	22.16	23	0.361	0.44	0.206	0.25	-0.14
13	Body	LTE Band4	20050	1720	50RB-Middle	Rear	15mm	\	22.16	23	0.392	0.48	0.221	0.27	-0.08
13	Body	LTE Band5	20450	829	1RB-Middle	Front	10mm	\	23.43	24.5	0.150	0.19	0.095	0.12	-0.17
13	Body	LTE Band5	20450	829	1RB-Middle	Rear	10mm	Fig.A-27	23.43	24.5	0.166	0.21	0.108	0.14	0.10
13	Body	LTE Band5	20450	829	1RB-Middle	Left	10mm	\	23.43	24.5	0.069	0.09	0.042	0.05	0.14
13	Body	LTE Band5	20450	829	1RB-Middle	Right	10mm	\	23.43	24.5	0.051	0.07	0.033	0.04	-0.14
13	Body	LTE Band5	20450	829	1RB-Middle	Top	10mm	\	23.43	24.5	0.162	0.21	0.088	0.11	-0.14
13	Body	LTE Band5	20450	829	25RB-Low	Front	10mm	\	22.48	23.5	0.117	0.15	0.073	0.09	-0.09
13	Body	LTE Band5	20450	829	25RB-Low	Rear	10mm	\	22.48	23.5	0.137	0.17	0.085	0.11	0.01
13	Body	LTE Band5	20450	829	25RB-Low	Left	10mm	\	22.48	23.5	0.046	0.06	0.027	0.03	-0.11
13	Body	LTE Band5	20450	829	25RB-Low	Right	10mm	\	22.48	23.5	0.050	0.06	0.034	0.04	0.07
13	Body	LTE Band5	20450	829	25RB-Low	Top	10mm	\	22.48	23.5	0.096	0.12	0.051	0.06	0.09
13	Body	LTE Band7	21350	2560	1RB-High	Front	10mm	\	17.33	18	0.131	0.15	0.066	0.08	-0.17
13	Body	LTE Band7	21350	2560	1RB-High	Rear	10mm	\	17.33	18	0.235	0.27	0.106	0.12	-0.18
13	Body	LTE Band7	21350	2560	1RB-High	Left	10mm	\	17.33	18	0.123	0.14	0.061	0.07	0.02
13	Body	LTE Band7	21350	2560	1RB-High	Right	10mm	\	17.33	18	<0.01	<0.01	<0.01	<0.01	/
13	Body	LTE Band7	21350	2560	1RB-High	Top	10mm	Fig.A-28	17.33	18	0.385	0.45	0.158	0.18	-0.08
13	Body	LTE Band7	21350	2560	50RB-Middle	Front	10mm	\	17.39	18	0.136	0.16	0.066	0.08	0.15
13	Body	LTE Band7	21350	2560	50RB-Middle	Rear	10mm	\	17.39	18	0.252	0.29	0.109	0.13	0.12
13	Body	LTE Band7	21350	2560	50RB-Middle	Left	10mm	\	17.39	18	0.123	0.14	0.060	0.07	0.03
13	Body	LTE Band7	21350	2560	50RB-Middle	Right	10mm	\	17.39	18	0.038	0.04	0.009	0.01	-0.17
13	Body	LTE Band7	21350	2560	50RB-Middle	Top	10mm	\	17.39	18	0.353	0.41	0.149	0.17	-0.05
13	Body	LTE Band715M	21375	2562.5	1RB-Low	Top	10mm	UL CA	17.11	18	0.362	0.44	0.138	0.17	0.02
13	Body	LTE Band7	21350	2560	1RB-Middle	Front	15mm	\	22.49	23.5	0.327	0.41	0.163	0.21	0.01
13	Body	LTE Band7	21350	2560	1RB-Middle	Rear	15mm	Fig.A-29	22.49	23.5	0.553	0.70	0.258	0.33	0.08
13	Body	LTE Band7	21350	2560	50RB-Low	Front	15mm	\	22.02	22.5	0.294	0.33	0.145	0.16	0.10
13	Body	LTE Band7	21350	2560	50RB-Low	Rear	15mm	\	22.02	22.5	0.459	0.51	0.215	0.24	-0.02
13	Body	LTE Band7	21350	2560	1RB-Middle	Rear	15mm	S2	22.49	23.5	0.545	0.69	0.251	0.32	0.11
13	Body	LTE Band715M	21375	2562.5	1RB-Low	Rear	15mm	UL CA	22.49	23.5	0.538	0.68	0.242	0.31	0.08
13	Body	LTE Band12	23060	704	1RB-Low	Front	10mm	\	23.50	24.5	0.084	0.11	0.067	0.08	0.06
13	Body	LTE Band12	23060	704	1RB-Low	Rear	10mm	Fig.A-30	23.50	24.5	0.111	0.14	0.088	0.11	0.03
13	Body	LTE Band12	23060	704	1RB-Low	Left	10mm	\	23.50	24.5	0.044	0.06	0.031	0.04	0.13
13	Body	LTE Band12	23060	704	1RB-Low	Right	10mm	\	23.50	24.5	0.055	0.07	0.039	0.05	-0.08
13	Body	LTE Band12	23060	704	1RB-Low	Top	10mm	\	23.50	24.5	0.102	0.13	0.053	0.07	0.08
13	Body	LTE Band12	23060	704	25RB-Middle	Front	10mm	\	22.55	24.5	0.072	0.11	0.057	0.09	-0.03
13	Body	LTE Band12	23060	704	25RB-Middle	Rear	10mm	\	22.55	24.5	0.083	0.13	0.061	0.10	-0.05
13	Body	LTE Band12	23060	704	25RB-Middle	Left	10mm	\	22.55	24.5	0.039	0.06	0.027	0.04	-0.02
13	Body	LTE Band12	23060	704	25RB-Middle	Right	10mm	\	22.55	24.5	<0.01	<0.01	<0.01	<0.01	/
13	Body	LTE Band12	23060	704	25RB-Middle	Top	10mm	\	22.55	24.5	0.086	0.13	0.044	0.07	0.13
13	Body	LTE Band38	37850	2580	1RB-Low	Front	10mm	\	19.89	20.5	0.095	0.11	0.052	0.06	-0.05
13	Body	LTE Band38	37850	2580	1RB-Low	Rear	10mm	\	19.89	20.5	0.158	0.18	0.078	0.09	-0.04
13	Body	LTE Band38	37850	2580	1RB-Low	Left	10mm	\	19.89	20.5	0.108	0.12	0.057	0.07	0.01
13	Body	LTE Band38	37850	2580	1RB-Low	Right	10mm	\	19.89	20.5	<0.01	<0.01	<0.01	<0.01	/
13	Body	LTE Band38	37850	2580	1RB-Low	Top	10mm	\	19.89	20.5	0.233	0.27	0.100	0.12	0.11
13	Body	LTE Band38	37850	2580	50RB-Low	Front	10mm	\	19.84	20.5	0.098	0.11	0.050	0.06	-0.10
13	Body	LTE Band38	37850	2580	50RB-Low	Rear	10mm	\	19.84	20.5	0.170	0.20	0.085	0.10	0.02
13	Body	LTE Band38	37850	2580	50RB-Low	Left	10mm	\	19.84	20.5	0.104	0.12	0.054	0.06	-0.08
13	Body	LTE Band38	37850	2580	50RB-Low	Right	10mm	\	19.84	20.5	<0.01	<0.01	<0.01	<0.01	/
13	Body	LTE Band38	37850	2580	50RB-Low	Top	10mm	Fig.A-31	19.84	20.5	0.241	0.28	0.106	0.12	-0.02
13	Body	LTE Band38 15M	38175	2612.5	1RB-Low	Top	10mm	UL CA	19.70	20.5	0.230	0.28	0.092	0.11	0.04
13	Body	LTE Band38	38150	2610	1RB-Middle	Front	15mm	\	23.28	24	0.212	0.25	0.113	0.13	0.13
13	Body	LTE Band38	38150	2610	1RB-Middle	Rear	15mm	Fig.A-32	23.28	24	0.327	0.39	0.157	0.19	0.04
13	Body	LTE Band38	38150	2610	50RB-Low	Front	15mm	\	22.17	23	0.162	0.20	0.087	0.11	0.04
13	Body	LTE Band38	38150	2610	50RB-Low	Rear	15mm	\	22.17	23	0.259	0.31	0.125	0.15	0.09
13	Body	LTE Band38 15M	38175	2612.5	1RB-Low	Rear	15mm	UL CA	23.14	24	0.312	0.38	0.145	0.18	0.13
13	Body	LTE Band41	41490	2680	1RB-Middle	Front	10mm	\	20.31	21	0.061	0.07	0.033	0.04	0.04
13	Body	LTE Band41	41490	2680	1RB-Middle	Rear	10mm	\	20.31	21	0.108	0.13	0.051	0.06	-0.12
13	Body	LTE Band41	41490	2680	1RB-Middle	Left	10mm	\	20.31	21	0.078	0.09	0.039	0.05	-0.15
13	Body	LTE Band41	41490	2680	1RB-Middle	Right	10mm	\	20.31	21	0.018	0.02	0.005	0.01	0.13
13	Body	LTE Band41	41490	2680	1RB-Middle	Top	10mm	Fig.A-33	20.31	21	0.133	0.16	0.056	0.07	-0.12
13	Body	LTE Band41	41490	2680	50RB-Low	Front	10mm	\	20.30	21	0.066	0.08	0.035	0.04	-0.01
13	Body	LTE Band41	41490	2680	50RB-Low	Rear	10mm	\	20.30	21	0.116	0.14	0.052	0.06	-0.08
13	Body	LTE Band41	41490	2680	50RB-Low	Left	10mm	\	20.30	21	0.066	0.08	0.033	0.04	0.19
13	Body	LTE Band41	41490	2680	50RB-Low	Right	10mm	\	20.30	21	0.016	0.02	0.004	0.00	-0.17
13	Body	LTE Band41	41490	2680	50RB-Low	Top	10mm	\	20.30	21	0.127	0.15	0.054	0.06	-0.18
13	Body	LTE Band41 15M	41515	2682.5	1RB-Low	Top	10mm	UL CA	20.16	21	0.124	0.15	0.049	0.06	0.05
13	Body	LTE Band41	41055	2636.5	1RB-Middle	Front	15mm	\	23.14	24	0.226	0.28	0.122	0.15	-0.19
13	Body	LTE Band41	41055	2636.5	1RB-Middle	Rear	15mm	Fig.A-34	23.14	24	0.298	0.36	0.144	0.18	0.07
13	Body	LTE Band41	41055	2636.5	50RB-Middle	Front	15mm	\	22.09	23	0.174	0.21	0.096	0.12	-0.18
13	Body	LTE Band41	41055	2636.5	50RB-Middle	Rear	15mm	\	22.09	23	0.238	0.29	0.115	0.14	0.19
13	Body	LTE Band41 15M	41515	2682.5	1RB-Low	Rear	15mm	UL CA	22.98	24	0.279	0.35	0.128	0.16	0.07

ANT31/41 Head

ANT	RF Exposure Conditions	Frequency Band	Channel Number	Frequency (MHz)	Mode/RB	Test Position	Distance	Figure No./Note	EUT Measured Power (dBm)	Tune up (dBm)	Measured SAR 1g (W/kg)	Reported SAR 1g (W/kg)	Measured SAR 10g (W/kg)	Reported SAR 10g (W/kg)	Power Drift
41	Head	CDMABC0	777	848.31	SO55	Cheek Left	0mm	Fig.A-35	19.95	21	0.168	0.21	0.135	0.17	-0.16
41	Head	CDMABC0	384	836.52	SO55	Cheek Left	0mm	\	19.98	21	0.155	0.20	0.125	0.16	0.11
41	Head	CDMABC0	1013	824.7	SO55	Cheek Left	0mm	\	19.87	21	0.129	0.17	0.104	0.13	0.09
41	Head	CDMABC0	384	836.52	SO55	Tilt Left	0mm	\	19.98	21	0.085	0.11	0.069	0.09	0.06
41	Head	CDMABC0	384	836.52	SO55	Cheek Right	0mm	\	19.98	21	0.128	0.16	0.103	0.13	-0.08
41	Head	CDMABC0	384	836.52	SO55	Tilt Right	0mm	\	19.98	21	0.066	0.08	0.053	0.07	0.09
41	Head	GSM850	251	848.8	GSM	Cheek Left	0mm	\	32.34	33.7	0.200	0.27	0.140	0.19	0.10
41	Head	GSM850	190	836.6	GSM	Cheek Left	0mm	Fig.A-36	32.51	33.7	0.212	0.28	0.167	0.22	0.09
41	Head	GSM850	128	824.2	GSM	Cheek Left	0mm	\	32.44	33.7	0.127	0.17	0.100	0.13	-0.10
41	Head	GSM850	190	836.6	GSM	Tilt Left	0mm	\	32.51	33.7	0.109	0.14	0.087	0.11	-0.12
41	Head	GSM850	190	836.6	GSM	Cheek Right	0mm	\	32.51	33.7	0.159	0.21	0.122	0.16	0.00
41	Head	GSM850	190	836.6	GSM	Tilt Right	0mm	\	32.51	33.7	0.070	0.09	0.057	0.07	-0.15
31	Head	GSM1900	810	1909.8	GSM	Cheek Left	0mm	\	29.69	31	0.067	0.09	0.043	0.06	0.09
31	Head	GSM1900	661	1880	GSM	Cheek Left	0mm	\	29.80	31	0.089	0.12	0.056	0.07	-0.02
31	Head	GSM1900	512	1850.2	GSM	Cheek Left	0mm	Fig.A-37	30.02	31	0.099	0.12	0.061	0.08	0.06
31	Head	GSM1900	661	1880	GSM	Tilt Left	0mm	\	29.80	31	<0.01	<0.01	<0.01	<0.01	/
31	Head	GSM1900	661	1880	GSM	Cheek Right	0mm	\	29.80	31	0.070	0.09	0.044	0.06	0.02
31	Head	GSM1900	661	1880	GSM	Tilt Right	0mm	\	29.80	31	0.072	0.09	0.043	0.06	0.14
31	Head	WCDMA1900	9538	1907.6	RMC	Cheek Left	0mm	\	23.01	24.7	0.116	0.17	0.075	0.11	-0.19
31	Head	WCDMA1900	9400	1880	RMC	Cheek Left	0mm	Fig.A-38	23.32	24.7	0.173	0.24	0.108	0.15	0.03
31	Head	WCDMA1900	9262	1852.4	RMC	Cheek Left	0mm	\	23.10	24.7	0.154	0.22	0.099	0.14	0.19
31	Head	WCDMA1900	9400	1880	RMC	Tilt Left	0mm	\	23.32	24.7	0.046	0.06	0.029	0.04	-0.10
31	Head	WCDMA1900	9400	1880	RMC	Cheek Right	0mm	\	23.32	24.7	0.099	0.14	0.066	0.09	-0.05
31	Head	WCDMA1900	9400	1880	RMC	Tilt Right	0mm	\	23.32	24.7	0.077	0.11	0.047	0.06	-0.12
31	Head	WCDMA1700	1513	1752.6	RMC	Cheek Left	0mm	Fig.A-39	23.70	24.7	0.266	0.33	0.171	0.22	0.03
31	Head	WCDMA1700	1413	1732.6	RMC	Cheek Left	0mm	\	23.59	24.7	0.245	0.32	0.156	0.20	-0.18
31	Head	WCDMA1700	1312	1712.4	RMC	Cheek Left	0mm	\	23.68	24.7	0.179	0.23	0.115	0.15	0.14
31	Head	WCDMA1700	1413	1732.6	RMC	Tilt Left	0mm	\	23.59	24.7	0.083	0.11	0.053	0.07	-0.06
31	Head	WCDMA1700	1413	1732.6	RMC	Cheek Right	0mm	\	23.59	24.7	0.158	0.20	0.106	0.14	0.04
31	Head	WCDMA1700	1413	1732.6	RMC	Tilt Right	0mm	\	23.59	24.7	0.114	0.15	0.067	0.09	0.19
41	Head	WCDMA 850	4233	846.6	RMC	Cheek Left	0mm	Fig.A-40	23.61	25	0.246	0.34	0.194	0.27	-0.01
41	Head	WCDMA 850	4183	836.6	RMC	Cheek Left	0mm	\	23.72	25	0.237	0.32	0.187	0.25	0.01
41	Head	WCDMA 850	4132	826.4	RMC	Cheek Left	0mm	\	23.82	25	0.205	0.27	0.161	0.21	-0.02
41	Head	WCDMA 850	4183	836.6	RMC	Tilt Left	0mm	\	23.72	25	0.141	0.19	0.113	0.15	-0.08
41	Head	WCDMA 850	4183	836.6	RMC	Cheek Right	0mm	\	23.72	25	0.147	0.20	0.114	0.15	0.03
41	Head	WCDMA 850	4183	836.6	RMC	Tilt Right	0mm	\	23.72	25	0.054	0.07	0.044	0.06	0.07
31	Head	LTE Band2	18900	1880	1RB-Middle	Cheek Left	0mm	Fig.A-41	23.82	24.8	0.170	0.21	0.106	0.13	-0.06
31	Head	LTE Band2	18900	1880	1RB-Middle	Tilt Left	0mm	\	23.82	24.8	0.084	0.11	0.050	0.06	0.07
31	Head	LTE Band2	18900	1880	1RB-Middle	Cheek Right	0mm	\	23.82	24.8	0.157	0.20	0.097	0.12	-0.08
31	Head	LTE Band2	18900	1880	1RB-Middle	Tilt Right	0mm	\	23.82	24.8	0.136	0.17	0.076	0.10	-0.13
31	Head	LTE Band2	18900	1880	50RB-Low	Cheek Left	0mm	\	22.78	23.8	0.141	0.18	0.088	0.11	0.01
31	Head	LTE Band2	18900	1880	50RB-Low	Tilt Left	0mm	\	22.78	23.8	0.070	0.09	0.043	0.05	0.06
31	Head	LTE Band2	18900	1880	50RB-Low	Cheek Right	0mm	\	22.78	23.8	0.127	0.16	0.078	0.10	0.03
31	Head	LTE Band2	18900	1880	50RB-Low	Tilt Right	0mm	\	22.78	23.8	0.100	0.13	0.055	0.07	-0.02
31	Head	LTE Band4	20300	1745	1RB-Middle	Cheek Left	0mm	\	23.98	24.8	0.177	0.21	0.128	0.15	-0.02
31	Head	LTE Band4	20300	1745	1RB-Middle	Tilt Left	0mm	\	23.98	24.8	0.064	0.08	0.045	0.05	-0.10
31	Head	LTE Band4	20300	1745	1RB-Middle	Cheek Right	0mm	Fig.A-42	23.98	24.8	0.190	0.23	0.125	0.15	-0.04
31	Head	LTE Band4	20300	1745	1RB-Middle	Tilt Right	0mm	\	23.98	24.8	0.112	0.14	0.079	0.10	-0.11
31	Head	LTE Band4	20300	1745	50RB-Middle	Cheek Left	0mm	\	22.90	23.8	0.142	0.17	0.102	0.13	0.15
31	Head	LTE Band4	20300	1745	50RB-Middle	Tilt Left	0mm	\	22.90	23.8	0.045	0.06	0.033	0.04	-0.09
31	Head	LTE Band4	20300	1745	50RB-Middle	Cheek Right	0mm	\	22.90	23.8	0.149	0.18	0.097	0.12	-0.19
31	Head	LTE Band4	20300	1745	50RB-Middle	Tilt Right	0mm	\	22.90	23.8	0.099	0.12	0.069	0.08	0.15

41	Head	LTE Band5	20450	829	1RB-Middle	Cheek Left	0mm	Fig.A-43	23.46	24.5	0.207	0.26	0.163	0.21	0.03
41	Head	LTE Band5	20450	829	1RB-Middle	Tilt Left	0mm	\	23.46	24.5	0.115	0.15	0.093	0.12	0.07
41	Head	LTE Band5	20450	829	1RB-Middle	Cheek Right	0mm	\	23.46	24.5	0.156	0.20	0.121	0.15	0.02
41	Head	LTE Band5	20450	829	1RB-Middle	Tilt Right	0mm	\	23.46	24.5	0.080	0.10	0.066	0.08	-0.14
41	Head	LTE Band5	20450	829	25RB-Middle	Cheek Left	0mm	\	22.40	23.5	0.161	0.21	0.127	0.16	-0.07
41	Head	LTE Band5	20450	829	25RB-Middle	Tilt Left	0mm	\	22.40	23.5	0.088	0.11	0.071	0.09	0.02
41	Head	LTE Band5	20450	829	25RB-Middle	Cheek Right	0mm	\	22.40	23.5	0.125	0.16	0.096	0.12	0.14
41	Head	LTE Band5	20450	829	25RB-Middle	Tilt Right	0mm	\	22.40	23.5	0.063	0.08	0.051	0.07	-0.15
31	Head	LTE Band7	21350	2560	1RB-Middle	Cheek Left	0mm	\	23.42	24	0.169	0.19	0.097	0.11	-0.09
31	Head	LTE Band7	21350	2560	1RB-Middle	Tilt Left	0mm	\	23.42	24	0.088	0.10	0.051	0.06	-0.19
31	Head	LTE Band7	21350	2560	1RB-Middle	Cheek Right	0mm	Fig.A-44	23.42	24	0.265	0.30	0.146	0.17	0.03
31	Head	LTE Band7	21350	2560	1RB-Middle	Tilt Right	0mm	\	23.42	24	0.127	0.15	0.067	0.08	-0.02
31	Head	LTE Band7	21350	2560	50RB-Low	Cheek Left	0mm	\	22.45	23	0.121	0.14	0.068	0.08	-0.08
31	Head	LTE Band7	21350	2560	50RB-Low	Tilt Left	0mm	\	22.45	23	0.071	0.08	0.041	0.05	-0.06
31	Head	LTE Band7	21350	2560	50RB-Low	Cheek Right	0mm	\	22.45	23	0.218	0.25	0.122	0.14	-0.17
31	Head	LTE Band7	21350	2560	50RB-Low	Tilt Right	0mm	\	22.45	23	0.104	0.12	0.054	0.06	0.16
31	Head	LTE Band715M	21375	2562.5	1RB-Low	Cheek Right	0mm	UL CA	22.84	24	0.228	0.30	0.124	0.16	0.15
41	Head	LTE Band12	23060	704	1RB-High	Cheek Left	0mm	Fig.A-45	23.68	24.5	0.129	0.16	0.104	0.13	0.03
41	Head	LTE Band12	23060	704	1RB-High	Tilt Left	0mm	\	23.68	24.5	0.069	0.08	0.057	0.07	0.11
41	Head	LTE Band12	23060	704	1RB-High	Cheek Right	0mm	\	23.68	24.5	0.109	0.13	0.087	0.11	-0.18
41	Head	LTE Band12	23060	704	1RB-High	Tilt Right	0mm	\	23.68	24.5	<0.01	<0.01	<0.01	<0.01	/
41	Head	LTE Band12	23060	704	25RB-Low	Cheek Left	0mm	\	22.77	23.5	0.089	0.11	0.073	0.09	0.01
41	Head	LTE Band12	23060	704	25RB-Low	Tilt Left	0mm	\	22.77	23.5	0.049	0.06	0.041	0.05	-0.11
41	Head	LTE Band12	23060	704	25RB-Low	Cheek Right	0mm	\	22.77	23.5	0.083	0.10	0.067	0.08	-0.03
41	Head	LTE Band12	23060	704	25RB-Low	Tilt Right	0mm	\	22.77	23.5	<0.01	<0.01	<0.01	<0.01	/
31	Head	LTE Band38	37850	2580	1RB-Middle	Cheek Left	0mm	\	23.62	24	0.087	0.09	0.050	0.05	-0.17
31	Head	LTE Band38	37850	2580	1RB-Middle	Tilt Left	0mm	\	23.62	24	0.061	0.07	0.033	0.04	0.05
31	Head	LTE Band38	37850	2580	1RB-Middle	Cheek Right	0mm	Fig.A-46	23.62	24	0.161	0.18	0.087	0.09	0.05
31	Head	LTE Band38	37850	2580	1RB-Middle	Tilt Right	0mm	\	23.62	24	0.095	0.10	0.048	0.05	-0.10
31	Head	LTE Band38	37850	2580	50RB-Low	Cheek Left	0mm	\	22.52	23	0.069	0.08	0.040	0.04	-0.01
31	Head	LTE Band38	37850	2580	50RB-Low	Tilt Left	0mm	\	22.52	23	0.052	0.06	0.029	0.03	0.01
31	Head	LTE Band38	37850	2580	50RB-Low	Cheek Right	0mm	\	22.52	23	0.126	0.14	0.067	0.07	0.04
31	Head	LTE Band38	37850	2580	50RB-Low	Tilt Right	0mm	\	22.52	23	0.075	0.08	0.039	0.04	0.12
31	Head	LTE Band38 15M	38175	2612.5	1RB-Low	Cheek Right	0mm	UL CA	23.34	24	0.146	0.17	0.069	0.08	0.11
31	Head	LTE Band41	41490	2680	1RB-Middle	Cheek Left	0mm	\	23.55	24	0.105	0.12	0.062	0.07	-0.08
31	Head	LTE Band41	41490	2680	1RB-Middle	Tilt Left	0mm	\	23.55	24	0.072	0.08	0.039	0.04	-0.08
31	Head	LTE Band41	41490	2680	1RB-Middle	Cheek Right	0mm	Fig.A-47	23.55	24	0.209	0.23	0.112	0.12	0.05
31	Head	LTE Band41	41490	2680	1RB-Middle	Tilt Right	0mm	\	23.55	24	0.100	0.11	0.053	0.06	-0.07
31	Head	LTE Band41	41490	2680	50RB-Low	Cheek Left	0mm	\	22.49	23	0.078	0.09	0.046	0.05	-0.15
31	Head	LTE Band41	41490	2680	50RB-Low	Tilt Left	0mm	\	22.49	23	0.051	0.06	0.028	0.03	0.04
31	Head	LTE Band41	41490	2680	50RB-Low	Cheek Right	0mm	\	22.49	23	0.163	0.18	0.087	0.10	-0.07
31	Head	LTE Band41	41490	2680	50RB-Low	Tilt Right	0mm	\	22.49	23	0.084	0.09	0.044	0.05	-0.01
31	Head	LTE Band41 15M	41515	2682.5	1RB-Low	Cheek Right	0mm	UL CA	23.37	24	0.189	0.22	0.106	0.12	0.06

ANT31/41 Body

ANT	RF Exposure Conditions	Frequency Band	Channel Number	Frequency (MHz)	Mode/RB	Test Position	Distance	Figure No./Note	EUT Measured Power (dBm)	Tune up (dBm)	Measured SAR 1g (W/kg)	Reported SAR 1g (W/kg)	Measured SAR 10g (W/kg)	Reported SAR 10g (W/kg)	Power Drift
41	Body	CDMABC0	384	836.52	SO32	Front	10mm	\	19.92	21	0.180	0.23	0.114	0.15	0.08
41	Body	CDMABC0	777	848.31	SO32	Rear	10mm	Fig.A-48	19.95	21	0.304	0.39	0.192	0.24	-0.05
41	Body	CDMABC0	384	836.52	SO32	Rear	10mm	\	19.92	21	0.285	0.37	0.180	0.23	0.06
41	Body	CDMABC0	1013	824.7	SO32	Rear	10mm	\	19.87	21	0.228	0.30	0.144	0.19	0.07
41	Body	CDMABC0	384	836.52	SO32	Left	10mm	\	19.92	21	0.153	0.20	0.097	0.12	-0.09
41	Body	CDMABC0	384	836.52	SO32	Right	10mm	\	19.92	21	0.088	0.11	0.055	0.07	0.09
41	Body	CDMABC0	384	836.52	SO32	Bottom	10mm	\	19.92	21	0.106	0.14	0.067	0.09	0.05
41	Body	GSM850	190	836.6	GPRS(2TX)	Front	10mm	\	30.85	31.2	0.188	0.20	0.122	0.13	0.01
41	Body	GSM850	251	848.8	GPRS(2TX)	Rear	10mm	Fig.A-49	30.64	31.2	0.404	0.46	0.262	0.30	0.09
41	Body	GSM850	190	836.6	GPRS(2TX)	Rear	10mm	\	30.85	31.2	0.306	0.33	0.199	0.22	0.15
41	Body	GSM850	128	824.2	GPRS(2TX)	Rear	10mm	\	30.88	31.2	0.198	0.21	0.130	0.14	0.11
41	Body	GSM850	190	836.6	GPRS(2TX)	Left	10mm	\	30.85	31.2	0.216	0.23	0.114	0.12	0.00
41	Body	GSM850	190	836.6	GPRS(2TX)	Right	10mm	\	30.85	31.2	<0.01	<0.01	<0.01	<0.01	/
41	Body	GSM850	190	836.6	GPRS(2TX)	Bottom	10mm	\	30.85	31.2	0.104	0.11	0.069	0.07	0.10
41	Body	GSM850	251	848.8	EGPRS(2TX)	Rear	10mm	\	30.65	31.2	0.401	0.45	0.257	0.29	0.01
41	Body	GSM850	190	836.6	GPRS(2TX)	Front	15mm	\	31.39	31.7	0.237	0.25	0.149	0.16	0.15
41	Body	GSM850	251	848.8	GPRS(2TX)	Rear	15mm	Fig.A-50	31.23	31.7	0.509	0.57	0.319	0.36	-0.15
41	Body	GSM850	190	836.6	GPRS(2TX)	Rear	15mm	\	31.39	31.7	0.386	0.41	0.242	0.26	-0.04
41	Body	GSM850	128	824.2	GPRS(2TX)	Rear	15mm	\	31.34	31.7	0.250	0.27	0.158	0.17	-0.11
41	Body	GSM850	251	848.8	EGPRS(2TX)	Rear	15mm	\	31.21	31.7	0.499	0.56	0.303	0.34	-0.06
31	Body	GSM1900	661	1880	GPRS(2TX)	Front	10mm	\	25.34	26.5	0.090	0.12	0.055	0.07	-0.10
31	Body	GSM1900	661	1880	GPRS(2TX)	Rear	10mm	\	25.34	26.5	0.177	0.23	0.109	0.14	0.08
31	Body	GSM1900	661	1880	GPRS(2TX)	Left	10mm	\	25.34	26.5	<0.01	<0.01	<0.01	<0.01	/
31	Body	GSM1900	661	1880	GPRS(2TX)	Right	10mm	\	25.34	26.5	0.033	0.04	0.019	0.02	0.10
31	Body	GSM1900	810	1909.8	GPRS(2TX)	Bottom	10mm	\	25.28	26.5	0.188	0.25	0.113	0.15	-0.10
31	Body	GSM1900	661	1880	GPRS(2TX)	Bottom	10mm	\	25.34	26.5	0.197	0.26	0.116	0.15	-0.06
31	Body	GSM1900	512	1850.2	GPRS(2TX)	Bottom	10mm	Fig.A-51	25.63	26.5	0.291	0.36	0.167	0.20	0.03
31	Body	GSM1900	512	1850.2	EGPRS(2TX)	Bottom	10mm	\	25.68	26.5	0.285	0.34	0.159	0.19	-0.09
31	Body	GSM1900	661	1880	GPRS(2TX)	Front	15mm	\	27.01	28	0.078	0.10	0.051	0.06	-0.04
31	Body	GSM1900	810	1909.8	GPRS(2TX)	Rear	15mm	\	26.91	28	0.144	0.19	0.089	0.11	-0.09
31	Body	GSM1900	661	1880	GPRS(2TX)	Rear	15mm	\	27.01	28	0.154	0.19	0.097	0.12	0.13
31	Body	GSM1900	512	1850.2	GPRS(2TX)	Rear	15mm	Fig.A-52	27.27	28	0.202	0.24	0.125	0.15	0.09
31	Body	GSM1900	512	1850.2	EGPRS(2TX)	Rear	15mm	\	27.24	28	0.193	0.23	0.122	0.15	-0.05
31	Body	WCDMA1900	9400	1880	RMC	Front	10mm	\	20.03	21.2	0.100	0.13	0.073	0.10	0.05
31	Body	WCDMA1900	9538	1880	RMC	Rear	10mm	\	19.73	21.2	0.198	0.28	0.139	0.19	0.08
31	Body	WCDMA1900	9400	1880	RMC	Rear	10mm	\	20.03	21.2	0.193	0.25	0.141	0.18	0.06
31	Body	WCDMA1900	9262	1880	RMC	Rear	10mm	Fig.A-53	19.83	21.2	0.242	0.33	0.149	0.20	0.19
31	Body	WCDMA1900	9400	1880	RMC	Left	10mm	\	20.03	21.2	0.027	0.04	0.019	0.02	0.02
31	Body	WCDMA1900	9400	1880	RMC	Right	10mm	\	20.03	21.2	0.034	0.04	0.021	0.03	0.12
31	Body	WCDMA1900	9400	1880	RMC	Bottom	10mm	\	20.03	21.2	0.163	0.21	0.107	0.14	0.15
31	Body	WCDMA1900	9400	1880	RMC	Front	15mm	\	20.70	22.2	0.115	0.16	0.074	0.10	-0.12
31	Body	WCDMA1900	9538	1907.6	RMC	Rear	15mm	Fig.A-54	20.57	22.2	0.226	0.33	0.140	0.20	0.14
31	Body	WCDMA1900	9400	1880	RMC	Rear	15mm	\	20.70	22.2	0.221	0.31	0.133	0.19	0.19
31	Body	WCDMA1900	9262	1852.4	RMC	Rear	15mm	\	20.64	22.2	0.223	0.32	0.137	0.20	0.05
31	Body	WCDMA1700	1413	1732.6	RMC	Front	10mm	\	19.16	20.2	0.187	0.24	0.119	0.15	0.07
31	Body	WCDMA1700	1413	1732.6	RMC	Rear	10mm	\	19.16	20.2	0.337	0.43	0.205	0.26	0.00
31	Body	WCDMA1700	1413	1732.6	RMC	Left	10mm	\	19.16	20.2	<0.01	<0.01	<0.01	<0.01	/
31	Body	WCDMA1700	1413	1732.6	RMC	Right	10mm	\	19.16	20.2	0.095	0.12	0.053	0.07	-0.05
31	Body	WCDMA1700	1513	1752.6	RMC	Bottom	10mm	Fig.A-55	19.21	20.2	0.398	0.50	0.227	0.29	-0.04
31	Body	WCDMA1700	1413	1732.6	RMC	Bottom	10mm	\	19.16	20.2	0.355	0.45	0.206	0.26	0.00
31	Body	WCDMA1700	1312	1712.4	RMC	Bottom	10mm	\	19.18	20.2	0.315	0.40	0.178	0.23	0.10
31	Body	WCDMA1700	1413	1732.6	RMC	Front	15mm	\	20.18	21.2	0.132	0.17	0.082	0.10	-0.12
31	Body	WCDMA1700	1513	1752.6	RMC	Rear	15mm	Fig.A-56	20.28	21.2	0.262	0.32	0.163	0.20	0.03
31	Body	WCDMA1700	1413	1732.6	RMC	Rear	15mm	\	20.18	21.2	0.246	0.31	0.153	0.19	0.19
31	Body	WCDMA1700	1312	1712.4	RMC	Rear	15mm	\	20.22	21.2	0.224	0.28	0.139	0.17	0.12
41	Body	WCDMA 850	4183	836.6	RMC	Front	10mm	\	23.72	25	0.238	0.32	0.153	0.21	-0.10
41	Body	WCDMA 850	4233	846.6	RMC	Rear	10mm	Fig.A-57	23.61	25	0.393	0.54	0.246	0.34	-0.03
41	Body	WCDMA 850	4183	836.6	RMC	Rear	10mm	\	23.72	25	0.360	0.48	0.222	0.30	0.08
41	Body	WCDMA 850	4132	826.4	RMC	Rear	10mm	\	23.82	25	0.319	0.42	0.200	0.26	0.04
41	Body	WCDMA 850	4183	836.6	RMC	Left	10mm	\	23.72	25	0.246	0.33	0.143	0.19	-0.02
41	Body	WCDMA 850	4183	836.6	RMC	Right	10mm	\	23.72	25	<0.01	<0.01	<0.01	<0.01	/
41	Body	WCDMA 850	4183	836.6	RMC	Bottom	10mm	\	23.72	25	0.044	0.06	0.029	0.04	-0.04
31	Body	LTE Band2	18900	1880	1RB-Middle	Front	10mm	\	20.87	21.8	0.202	0.25	0.125	0.15	-0.19
31	Body	LTE Band2	18900	1880	1RB-Middle	Rear	10mm	\	20.87	21.8	0.311	0.39	0.224	0.28	-0.19
31	Body	LTE Band2	18900	1880	1RB-Middle	Left	10mm	\	20.87	21.8	<0.01	<0.01	<0.01	<0.01	/
31	Body	LTE Band2	18900	1880	1RB-Middle	Right	10mm	\	20.87	21.8	0.054	0.07	0.022	0.03	0.00
31	Body	LTE Band2	18900	1880	1RB-Middle	Bottom	10mm	\	20.87	21.8	0.342	0.42	0.198	0.25	-0.01
31	Body	LTE Band2	18900	1880	50RB-Low	Front	10mm	\	20.91	21.8	0.194	0.24	0.122	0.15	-0.08
31	Body	LTE Band2	18900	1880	50RB-Low	Rear	10mm	Fig.A-58	20.91	21.8	0.395	0.48	0.240	0.29	0.10
31	Body	LTE Band2	18900	1880	50RB-Low	Left	10mm	\	20.91	21.8	<0.01	<0.01	<0.01	<0.01	/
31	Body	LTE Band2	18900	1880	50RB-Low	Right	10mm	\	20.91	21.8	0.057	0.07	0.032	0.04	-0.18
31	Body	LTE Band2	18900	1880	50RB-Low	Bottom	10mm	\	20.91	21.8	0.306	0.38	0.185	0.23	0.02
31	Body	LTE Band2	18900	1880	1RB-Middle	Front	15mm	\	22.26	23.3	0.139	0.18	0.086	0.11	0.02
31	Body	LTE Band2	18900	1880	1RB-Middle	Rear	15mm	\	22.26	23.3	0.245	0.31	0.148	0.19	-0.19
31	Body	LTE Band2	18900	1880	50RB-Low	Front	15mm	\	22.31	23.3	0.133	0.17	0.081	0.10	-0.02
31	Body	LTE Band2	18900	1880	50RB-Low	Rear	15mm	Fig.A-59	22.31	23.3	0.248	0.31	0.152	0.19	-0.02

31	Body	LTE Band4	20300	1745	1RB-Middle	Front	10mm	\	20.01	20.8	0.257	0.31	0.154	0.18	0.12
31	Body	LTE Band4	20300	1745	1RB-Middle	Rear	10mm	Fig.A-60	20.01	20.8	0.441	0.53	0.263	0.32	0.17
31	Body	LTE Band4	20300	1745	1RB-Middle	Left	10mm	\	20.01	20.8	0.041	0.05	0.025	0.03	0.08
31	Body	LTE Band4	20300	1745	1RB-Middle	Right	10mm	\	20.01	20.8	0.107	0.13	0.060	0.07	-0.01
31	Body	LTE Band4	20300	1745	1RB-Middle	Bottom	10mm	\	20.01	20.8	0.376	0.45	0.202	0.24	0.17
31	Body	LTE Band4	20300	1745	50RB-High	Front	10mm	\	20.03	20.8	0.261	0.31	0.157	0.19	-0.01
31	Body	LTE Band4	20300	1745	50RB-High	Rear	10mm	\	20.03	20.8	0.428	0.51	0.255	0.30	0.18
31	Body	LTE Band4	20300	1745	50RB-High	Left	10mm	\	20.03	20.8	<0.01	<0.01	<0.01	<0.01	/
31	Body	LTE Band4	20300	1745	50RB-High	Right	10mm	\	20.03	20.8	0.139	0.17	0.079	0.09	-0.15
31	Body	LTE Band4	20300	1745	50RB-High	Bottom	10mm	\	20.03	20.8	0.402	0.48	0.227	0.27	0.03
31	Body	LTE Band4	20300	1745	1RB-Middle	Front	15mm	\	21.09	21.8	0.123	0.14	0.077	0.09	-0.05
31	Body	LTE Band4	20300	1745	1RB-Middle	Rear	15mm	Fig.A-61	21.09	21.8	0.210	0.25	0.131	0.15	0.07
31	Body	LTE Band4	20300	1745	50RB-Middle	Front	15mm	\	21.10	21.8	0.124	0.15	0.078	0.09	0.01
31	Body	LTE Band4	20300	1745	50RB-Middle	Rear	15mm	\	21.10	21.8	0.205	0.24	0.123	0.14	0.13
41	Body	LTE Band5	20450	829	1RB-Middle	Front	10mm	\	23.46	24.5	0.146	0.19	0.094	0.12	0.16
41	Body	LTE Band5	20450	829	1RB-Middle	Rear	10mm	Fig.A-62	23.46	24.5	0.234	0.30	0.146	0.19	0.01
41	Body	LTE Band5	20450	829	1RB-Middle	Left	10mm	\	23.46	24.5	0.151	0.19	0.092	0.12	-0.15
41	Body	LTE Band5	20450	829	1RB-Middle	Right	10mm	\	23.46	24.5	0.042	0.05	0.029	0.04	0.12
41	Body	LTE Band5	20450	829	1RB-Middle	Bottom	10mm	\	23.46	24.5	0.079	0.10	0.049	0.06	0.00
41	Body	LTE Band5	20450	829	25RB-Middle	Front	10mm	\	22.40	23.5	0.111	0.14	0.073	0.09	-0.04
41	Body	LTE Band5	20450	829	25RB-Middle	Rear	10mm	\	22.40	23.5	0.179	0.23	0.112	0.14	0.08
41	Body	LTE Band5	20450	829	25RB-Middle	Left	10mm	\	22.40	23.5	0.102	0.13	0.057	0.07	0.16
41	Body	LTE Band5	20450	829	25RB-Middle	Right	10mm	\	22.40	23.5	<0.01	<0.01	<0.01	<0.01	/
41	Body	LTE Band5	20450	829	25RB-Middle	Bottom	10mm	\	22.40	23.5	0.063	0.08	0.040	0.05	0.02
31	Body	LTE Band7	21350	2560	1RB-High	Front	10mm	\	19.34	20	0.149	0.17	0.083	0.10	0.14
31	Body	LTE Band7	21350	2560	1RB-High	Rear	10mm	\	19.34	20	0.198	0.23	0.106	0.12	0.06
31	Body	LTE Band7	21350	2560	1RB-High	Left	10mm	\	19.34	20	<0.01	<0.01	<0.01	<0.01	/
31	Body	LTE Band7	21350	2560	1RB-High	Right	10mm	\	19.34	20	0.074	0.09	0.039	0.05	-0.13
31	Body	LTE Band7	21350	2560	1RB-High	Bottom	10mm	\	19.34	20	0.084	0.10	0.047	0.05	-0.17
31	Body	LTE Band7	21350	2560	50RB-Low	Front	10mm	\	19.37	20	0.151	0.17	0.085	0.10	0.06
31	Body	LTE Band7	21350	2560	50RB-Low	Rear	10mm	Fig.A-63	19.37	20	0.221	0.26	0.113	0.13	-0.07
31	Body	LTE Band7	21350	2560	50RB-Low	Left	10mm	\	19.37	20	0.042	0.05	0.012	0.01	-0.10
31	Body	LTE Band7	21350	2560	50RB-Low	Right	10mm	\	19.37	20	0.067	0.08	0.037	0.04	-0.03
31	Body	LTE Band7	21350	2560	50RB-Low	Bottom	10mm	\	19.37	20	0.085	0.10	0.046	0.05	-0.19
31	Body	LTE Band7 15M	21375	2562.5	1RB-Low	Rear	10mm	UL CA	18.97	20	0.197	0.25	0.101	0.13	0.08
31	Body	LTE Band7	21350	2560	1RB-Middle	Front	15mm	\	21.29	22	0.087	0.10	0.049	0.06	0.03
31	Body	LTE Band7	21350	2560	1RB-Middle	Rear	15mm	\	21.29	22	0.114	0.13	0.061	0.07	0.03
31	Body	LTE Band7	21350	2560	50RB-Low	Front	15mm	\	21.38	22	0.090	0.10	0.050	0.06	-0.06
31	Body	LTE Band7	21350	2560	50RB-Low	Rear	15mm	Fig.A-64	21.38	22	0.125	0.14	0.068	0.08	0.06
31	Body	LTE Band7 15M	21375	2562.5	1RB-Low	Rear	15mm	UL CA	20.79	22	0.102	0.13	0.055	0.07	0.07
41	Body	LTE Band12	23060	704	1RB-Low	Front	10mm	\	23.68	24.5	0.088	0.11	0.067	0.08	-0.12
41	Body	LTE Band12	23060	704	1RB-Low	Rear	10mm	Fig.A-65	23.68	24.5	0.125	0.15	0.082	0.10	0.03
41	Body	LTE Band12	23060	704	1RB-Low	Left	10mm	\	23.68	24.5	0.085	0.10	0.065	0.08	0.05
41	Body	LTE Band12	23060	704	1RB-Low	Right	10mm	\	23.68	24.5	0.073	0.09	0.052	0.06	0.18
41	Body	LTE Band12	23060	704	1RB-Low	Bottom	10mm	\	23.68	24.5	0.055	0.07	0.035	0.04	-0.19
41	Body	LTE Band12	23060	704	25RB-Low	Front	10mm	\	22.77	23.5	0.076	0.09	0.058	0.07	0.19
41	Body	LTE Band12	23060	704	25RB-Low	Rear	10mm	\	22.77	23.5	0.103	0.12	0.068	0.08	-0.04
41	Body	LTE Band12	23060	704	25RB-Low	Left	10mm	\	22.77	23.5	0.082	0.10	0.061	0.07	-0.15
41	Body	LTE Band12	23060	704	25RB-Low	Right	10mm	\	22.77	23.5	0.056	0.07	0.040	0.05	0.05
41	Body	LTE Band12	23060	704	25RB-Low	Bottom	10mm	\	22.77	23.5	0.034	0.04	0.021	0.02	-0.08
31	Body	LTE Band38	37850	2580	1RB-Middle	Front	10mm	\	19.11	19.5	0.060	0.07	0.034	0.04	-0.13
31	Body	LTE Band38	37850	2580	1RB-Middle	Rear	10mm	Fig.A-66	19.11	19.5	0.085	0.09	0.044	0.05	0.05
31	Body	LTE Band38	37850	2580	1RB-Middle	Left	10mm	\	19.11	19.5	<0.01	<0.01	<0.01	<0.01	/
31	Body	LTE Band38	37850	2580	1RB-Middle	Right	10mm	\	19.11	19.5	0.038	0.04	0.020	0.02	-0.07
31	Body	LTE Band38	37850	2580	1RB-Middle	Bottom	10mm	\	19.11	19.5	0.034	0.04	0.018	0.02	0.09
31	Body	LTE Band38	37850	2580	50RB-Middle	Front	10mm	\	19.09	19.5	0.056	0.06	0.030	0.03	0.13
31	Body	LTE Band38	37850	2580	50RB-Middle	Rear	10mm	\	19.09	19.5	0.077	0.08	0.040	0.04	0.18
31	Body	LTE Band38	37850	2580	50RB-Middle	Left	10mm	\	19.09	19.5	<0.01	<0.01	<0.01	<0.01	/
31	Body	LTE Band38	37850	2580	50RB-Middle	Right	10mm	\	19.09	19.5	0.057	0.06	0.031	0.03	0.04
31	Body	LTE Band38	37850	2580	50RB-Middle	Bottom	10mm	\	19.09	19.5	0.036	0.04	0.018	0.02	-0.15
31	Body	LTE Band38 15M	38175	2612.5	1RB-Low	Rear	10mm	UL CA	18.73	19.5	0.071	0.08	0.036	0.04	0.14
31	Body	LTE Band38	37850	2580	1RB-Middle	Front	15mm	\	20.96	21.5	0.047	0.05	0.025	0.03	-0.01
31	Body	LTE Band38	37850	2580	1RB-Middle	Rear	15mm	Fig.A-67	20.96	21.5	0.057	0.06	0.030	0.03	-0.09
31	Body	LTE Band38	37850	2580	50RB-Middle	Front	15mm	\	20.92	21.5	0.045	0.05	0.024	0.03	0.16
31	Body	LTE Band38	37850	2580	50RB-Middle	Rear	15mm	\	20.92	21.5	0.056	0.06	0.029	0.03	0.07
31	Body	LTE Band38 15M	38175	2612.5	1RB-Low	Rear	15mm	UL CA	20.61	21.5	0.045	0.06	0.023	0.03	0.06
31	Body	LTE Band41	41490	2680	1RB-Middle	Front	10mm	\	23.55	24	0.351	0.39	0.193	0.21	-0.16
31	Body	LTE Band41	41490	2680	1RB-Middle	Rear	10mm	Fig.A-68	23.55	24	0.466	0.52	0.237	0.26	0.13
31	Body	LTE Band41	41490	2680	1RB-Middle	Left	10mm	\	23.55	24	0.043	0.05	0.013	0.01	0.13
31	Body	LTE Band41	41490	2680	1RB-Middle	Right	10mm	\	23.55	24	0.284	0.32	0.155	0.17	-0.11
31	Body	LTE Band41	41490	2680	1RB-Middle	Bottom	10mm	\	23.55	24	0.141	0.16	0.075	0.08	0.07
31	Body	LTE Band41	41490	2680	50RB-Low	Front	10mm	\	22.49	23	0.264	0.30	0.148	0.17	0.10
31	Body	LTE Band41	41490	2680	50RB-Low	Rear	10mm	\	22.49	23	0.365	0.41	0.187	0.21	0.17
31	Body	LTE Band41	41490	2680	50RB-Low	Left	10mm	\	22.49	23	<0.01	<0.01	<0.01	<0.01	/
31	Body	LTE Band41	41490	2680	50RB-Low	Right	10mm	\	22.49	23	0.256	0.29	0.146	0.16	-0.17
31	Body	LTE Band41	41490	2680	50RB-Low	Bottom	10mm	\	22.49	23	0.105	0.12	0.056	0.06	-0.19
31	Body	LTE Band41 15M	41515	2682.5	1RB-Low	Rear	10mm	UL CA	23.37	24	0.443	0.51	0.219	0.25	0.17

13.2 SAR results for 5G NR

Head

ANT	RF Exposure Conditions	Frequency Band	Channel Number	Frequency (MHz)	Mode/RB	Test Position	Distance	Figure No./Note	EUT Measured Power (dBm)	Tune up (dBm)	Measured SAR 1g (W/kg)	Reported SAR 1g (W/kg)	Measured SAR 10g (W/kg)	Reported SAR 10g (W/kg)	Power Drift
13	Head	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 19.5dB	Cheek Left	0mm	\	19.71	20.5	0.198	0.24	0.083	0.10	-0.08
13	Head	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 19.5dB	Tilt Left	0mm	\	19.71	20.5	0.209	0.25	0.081	0.10	0.07
13	Head	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 19.5dB	Cheek Right	0mm	\	19.71	20.5	0.196	0.24	0.077	0.09	0.09
13	Head	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 19.5dB	Tilt Right	0mm	Fig.A-69	19.71	20.5	0.245	0.29	0.079	0.10	0.14
13	Head	N5	165300	826.5	15k 5M CP-OFDM 16QAM 13RB-6 19.5dB	Tilt Right	0mm	\	19.60	20.5	0.238	0.29	0.083	0.10	0.11
41	Head	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Cheek Left	0mm	Fig.A-70	23.06	24	0.182	0.23	0.144	0.18	0.12
41	Head	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Tilt Left	0mm	\	23.06	24	0.124	0.15	0.098	0.12	-0.17
41	Head	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Cheek Right	0mm	\	23.06	24	0.125	0.16	0.096	0.12	-0.06
41	Head	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Tilt Right	0mm	\	23.06	24	0.090	0.11	0.070	0.09	-0.04
41	Head	N5	165300	826.5	15k 5M CP-OFDM QPSK 13RB-6 23dB	Cheek Left	0mm	\	21.72	22.5	0.133	0.16	0.103	0.12	0.09
11	Head	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 18dB	Cheek Left	0mm	\	18.44	19.3	0.120	0.15	0.055	0.07	0.14
11	Head	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 18dB	Tilt Left	0mm	\	18.44	19.3	0.057	0.07	0.026	0.03	-0.09
11	Head	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 18dB	Cheek Right	0mm	Fig.A-71	18.44	19.3	0.333	0.41	0.134	0.16	0.02
11	Head	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 18dB	Tilt Right	0mm	\	18.44	19.3	0.097	0.12	0.044	0.05	0.15
11	Head	N7	512000	2560	15k 20M CP-OFDM QPSK 50RB-25 18dB	Cheek Right	0mm	\	18.40	19.3	0.328	0.40	0.130	0.16	0.19
13	Head	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 16dB	Cheek Left	0mm	\	15.81	17.3	0.180	0.25	0.087	0.12	-0.12
13	Head	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 16dB	Tilt Left	0mm	\	15.81	17.3	0.294	0.41	0.133	0.19	-0.06
13	Head	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 16dB	Cheek Right	0mm	\	15.81	17.3	0.318	0.45	0.150	0.21	0.17
13	Head	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 16dB	Tilt Right	0mm	Fig.A-72	15.81	17.3	0.489	0.69	0.215	0.30	-0.01
13	Head	N7	512000	2560	15k 20M CP-OFDM QPSK 53RB-26 16dB	Tilt Right	0mm	\	15.79	17.3	0.481	0.68	0.208	0.29	0.16
11	Head	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 18dB	Cheek Left	0mm	\	19.09	19.4	0.183	0.20	0.068	0.07	0.10
11	Head	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 18dB	Tilt Left	0mm	\	19.09	19.4	0.016	0.02	0.006	0.01	-0.12
11	Head	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 18dB	Cheek Right	0mm	Fig.A-73	19.09	19.4	0.661	0.71	0.244	0.26	-0.06
11	Head	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 18dB	Tilt Right	0mm	\	19.09	19.4	0.088	0.09	0.032	0.03	0.06
11	Head	N41	537000	2685	30k 10M DFT-s-OFDM 16QAM 1RB-1 18dB	Cheek Right	0mm	\	18.99	19.4	0.570	0.63	0.210	0.23	0.06
13	Head	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 14.5dB	Cheek Left	0mm	\	14.96	15.5	0.297	0.34	0.148	0.17	-0.08
13	Head	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 14.5dB	Tilt Left	0mm	\	14.96	15.5	0.213	0.24	0.100	0.11	-0.18
13	Head	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 14.5dB	Cheek Right	0mm	Fig.A-74	14.96	15.5	0.374	0.42	0.178	0.20	0.05
13	Head	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 14.5dB	Tilt Right	0mm	\	14.96	15.5	0.365	0.41	0.158	0.18	-0.09
13	Head	N41	537000	2685	30k 10M DFT-s-OFDM 16QAM 1RB-1 14.5dB	Cheek Right	0mm	\	14.81	15.5	0.346	0.41	0.148	0.17	0.05
11	Head	N78	647000	3705	30k 10M CP-OFDM 16QAM 1RB-22 14dB	Cheek Left	0mm	\	15.15	16	0.142	0.17	0.067	0.08	0.08
11	Head	N78	647000	3705	30k 10M CP-OFDM 16QAM 1RB-22 14dB	Tilt Left	0mm	\	15.15	16	0.057	0.07	0.028	0.03	0.03
11	Head	N78	647000	3705	30k 10M CP-OFDM 16QAM 1RB-22 14dB	Cheek Right	0mm	Fig.A-75	15.15	16	0.484	0.59	0.182	0.22	-0.04
11	Head	N78	647000	3705	30k 10M CP-OFDM 16QAM 1RB-22 14dB	Tilt Right	0mm	\	15.15	16	0.131	0.16	0.061	0.07	-0.13
11	Head	N78	647000	3705	30k 10M DFT-s-OFDM 16QAM 1RB-22 14dB	Cheek Right	0mm	\	15.07	16	0.425	0.53	0.161	0.20	-0.18
12	Head	N78	647000	3705	30k 10M CP-OFDM 16QAM 12RB6 17dB	Cheek Left	0mm	\	17.13	18	0.129	0.16	0.055	0.07	-0.11
12	Head	N78	647000	3705	30k 10M CP-OFDM 16QAM 12RB6 17dB	Tilt Left	0mm	\	17.13	18	0.122	0.15	0.050	0.06	0.13
12	Head	N78	647000	3705	30k 10M CP-OFDM 16QAM 12RB6 17dB	Cheek Right	0mm	\	17.13	18	0.248	0.30	0.102	0.12	0.13
12	Head	N78	647000	3705	30k 10M CP-OFDM 16QAM 12RB6 17dB	Tilt Right	0mm	Fig.A-76	17.13	18	0.272	0.33	0.107	0.13	0.07
12	Head	N78	647000	3705	30k 10M DFT-s-OFDM 16QAM 12RB-6 17dB	Tilt Right	0mm	\	16.96	18	0.258	0.33	0.098	0.12	-0.15

Body

ANT	RF Exposure Conditions	Frequency Band	Channel Number	Frequency (MHz)	Mode/RB	Test Position	Distance	Figure No./Note	EUT Measured Power (dBm)	Tune up (dBm)	Measured SAR 1g (W/kg)	Reported SAR 1g (W/kg)	Measured SAR 10g (W/kg)	Reported SAR 10g (W/kg)	Power Drift
13	Body	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Front	10mm	\	23.09	24	0.150	0.18	0.067	0.08	0.07
13	Body	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Rear	10mm	Fig.A-77	23.09	24	0.191	0.24	0.085	0.10	-0.01
13	Body	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Left	10mm	\	23.09	24	0.076	0.09	0.034	0.04	0.05
13	Body	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Top	10mm	\	23.09	24	0.166	0.20	0.068	0.08	-0.03
13	Body	N5	165300	826.5	15k 5M CP-OFDM QPSK 13RB-6 23dB	Rear	10mm	\	21.60	22.5	0.122	0.15	0.055	0.07	0.04
41	Body	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Front	10mm	\	23.06	24	0.138	0.17	0.089	0.11	-0.14
41	Body	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Rear	10mm	Fig.A-78	23.06	24	0.237	0.29	0.150	0.19	-0.02
41	Body	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Left	10mm	\	23.06	24	0.133	0.17	0.086	0.11	0.07
41	Body	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Right	10mm	\	23.06	24	<0.01	<0.01	<0.01	<0.01	/
41	Body	N5	165300	826.5	15k 5M DFT-s-OFDM QPSK 12RB-6 23dB	Bottom	10mm	\	23.06	24	0.039	0.05	0.026	0.03	0.00
41	Body	N5	165300	826.5	15k 5M CP-OFDM QPSK 13RB-6 23dB	Rear	10mm	\	21.72	22.5	0.170	0.20	0.108	0.13	-0.19
11	Body	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 18dB	Front	10mm	\	18.44	19.3	0.082	0.10	0.038	0.05	0.03
11	Body	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 18dB	Rear	10mm	\	18.44	19.3	0.194	0.24	0.086	0.10	0.00
11	Body	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 18dB	Left	10mm	Fig.A-79	18.44	19.3	0.243	0.30	0.100	0.12	0.01
11	Body	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 18dB	Top	10mm	\	18.44	19.3	<0.01	<0.01	<0.01	<0.01	/
11	Body	N7	512000	2560	15k 20M CP-OFDM QPSK 50RB-25 18dB	Left	10mm	\	18.40	19.3	0.238	0.29	0.095	0.12	-0.18
11	Body	N7	512000	2560	15k 20M DFT-s-OFDM PI/2 BPSK1 50RB-25 22dB	Front	15mm	\	22.44	23.3	0.131	0.16	0.064	0.08	0.19
11	Body	N7	512000	2560	15k 20M DFT-s-OFDM PI/2 BPSK1 50RB-25 22dB	Rear	15mm	Fig.A-80	22.44	23.3	0.268	0.33	0.130	0.16	0.01
11	Body	N7	512000	2560	15k 20M CP-OFDM QPSK 53RB-26 22dB	Rear	15mm	\	21.87	23.3	0.235	0.33	0.113	0.16	-0.07
13	Body	N7	512000	2560	15k 20M CP-OFDM QPSK 53RB-26 15dB	Front	10mm	\	14.94	16.3	0.106	0.14	0.051	0.07	0.17
13	Body	N7	512000	2560	15k 20M CP-OFDM QPSK 53RB-26 15dB	Rear	10mm	Fig.A-81	14.94	16.3	0.208	0.28	0.090	0.12	-0.09
13	Body	N7	512000	2560	15k 20M CP-OFDM QPSK 53RB-26 15dB	Left	10mm	\	14.94	16.3	0.078	0.11	0.038	0.05	0.13
13	Body	N7	512000	2560	15k 20M CP-OFDM QPSK 53RB-26 15dB	Top	10mm	\	14.94	16.3	0.152	0.21	0.061	0.08	0.01
13	Body	N7	512000	2560	15k 20M DFT-s-OFDM QPSK 50RB-25 15dB	Rear	10mm	\	14.92	16.3	0.199	0.27	0.083	0.11	-0.02
13	Body	N7	512000	2560	15k 20M DFT-s-OFDM PI/2 BPSK1 100RB-0 22dB	Front	15mm	\	21.86	23.3	0.262	0.37	0.138	0.19	-0.12
13	Body	N7	512000	2560	15k 20M DFT-s-OFDM PI/2 BPSK1 100RB-0 22dB	Rear	15mm	Fig.A-82	21.86	23.3	0.473	0.66	0.228	0.32	0.04
13	Body	N7	512000	2560	15k 20M CP-OFDM QPSK 106RB-0 22dB	Rear	15mm	\	21.35	23.3	0.288	0.45	0.138	0.22	0.14
11	Body	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 16.5dB	Front	10mm	\	17.66	17.9	0.098	0.10	0.045	0.05	-0.03
11	Body	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 16.5dB	Rear	10mm	\	17.66	17.9	0.189	0.20	0.085	0.09	0.08
11	Body	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 16.5dB	Left	10mm	Fig.A-83	17.66	17.9	0.343	0.36	0.140	0.15	-0.04
11	Body	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 16.5dB	Top	10mm	\	17.66	17.9	<0.01	<0.01	<0.01	<0.01	/
11	Body	N41	537000	2685	30k 10M DFT-s-OFDM 16QAM 1RB-1 16.5dB	Left	10mm	\	17.57	17.9	0.310	0.33	0.129	0.14	-0.14
11	Body	N41	537000	2685	30k 10M DFT-s-OFDM PI/2 BPSK1 12RB-6 23dB	Front	15mm	\	24.09	24.4	0.249	0.27	0.118	0.13	-0.16
11	Body	N41	537000	2685	30k 10M DFT-s-OFDM PI/2 BPSK1 12RB-6 23dB	Rear	15mm	Fig.A-84	24.09	24.4	0.514	0.55	0.241	0.26	0.07
11	Body	N41	537000	2685	30k 10M CP-OFDM QPSK 12RB-6 23dB	Rear	15mm	\	23.50	24.4	0.409	0.50	0.191	0.23	0.10
13	Body	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 21dB	Front	10mm	\	21.54	22	0.496	0.55	0.258	0.29	0.06
13	Body	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 21dB	Rear	10mm	\	21.54	22	0.661	0.73	0.313	0.35	-0.09
13	Body	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 21dB	Left	10mm	\	21.54	22	0.588	0.65	0.293	0.33	-0.19
13	Body	N41	537000	2685	30k 10M CP-OFDM 16QAM 1RB-1 21dB	Top	10mm	Fig.A-85	21.54	22	0.662	0.74	0.283	0.31	0.08
13	Body	N41	537000	2685	30k 10M DFT-s-OFDM 16QAM 1RB-1 21dB	Top	10mm	\	21.43	22	0.542	0.62	0.232	0.26	-0.14
11	Body	N78	647000	3705	30k 10M CP-OFDM 16QAM 1RB-1 14.5dB	Front	10mm	\	15.64	16.5	0.137	0.17	0.054	0.07	0.13
11	Body	N78	647000	3705	30k 10M CP-OFDM 16QAM 1RB-1 14.5dB	Rear	10mm	\	15.64	16.5	0.087	0.11	0.035	0.04	0.04
11	Body	N78	647000	3705	30k 10M CP-OFDM 16QAM 1RB-1 14.5dB	Left	10mm	Fig.A-86	15.64	16.5	0.331	0.40	0.111	0.14	-0.08
11	Body	N78	647000	3705	30k 10M CP-OFDM 16QAM 1RB-1 14.5dB	Top	10mm	\	15.64	16.5	0.038	0.05	0.015	0.02	0.16
11	Body	N78	647000	3705	30k 10M DFT-s-OFDM 16QAM 1RB-1 14.5dB	Left	10mm	\	15.59	16.5	0.285	0.35	0.099	0.12	-0.07
11	Body	N78	621668	3325.02	30k 50M DFT-s-OFDM PI/2 BPSK1 64RB-32 22dB	Front	15mm	\	22.92	23.5	0.229	0.26	0.091	0.10	-0.01
11	Body	N78	621668	3325.02	30k 50M DFT-s-OFDM PI/2 BPSK1 64RB-32 22dB	Rear	15mm	Fig.A-87	22.92	23.5	0.349	0.40	0.144	0.16	0.08
11	Body	N78	621668	3325.02	30k 50M CP-OFDM QPSK 64RB-32 22dB	Rear	15mm	\	22.57	23.5	0.308	0.38	0.125	0.15	-0.19
12	Body	N78	647000	3705	30k 10M CP-OFDM 16QAM 12RB-6 17.5dB	Front	10mm	\	17.62	18.5	0.082	0.10	0.034	0.04	0.11
12	Body	N78	647000	3705	30k 10M CP-OFDM 16QAM 12RB-6 17.5dB	Rear	10mm	Fig.A-88	17.62	18.5	0.132	0.16	0.049	0.06	0.09
12	Body	N78	647000	3705	30k 10M CP-OFDM 16QAM 12RB-6 17.5dB	Left	10mm	\	17.62	18.5	0.077	0.09	0.030	0.04	0.00
12	Body	N78	647000	3705	30k 10M CP-OFDM 16QAM 12RB-6 17.5dB	Top	10mm	\	17.62	18.5	0.117	0.14	0.037	0.05	0.16
12	Body	N78	647000	3705	30k 10M DFT-s-OFDM 16QAM 12RB-6 17.5dB	Rear	10mm	\	17.54	18.5	0.128	0.16	0.046	0.06	-0.11
12	Body	N78	647000	3705	30k 10M CP-OFDM 16QAM 1RB-22 19dB	Front	15mm	\	19.17	20	0.051	0.06	0.020	0.02	-0.19
12	Body	N78	647000	3705	30k 10M CP-OFDM 16QAM 1RB-22 19dB	Rear	15mm	Fig.A-89	19.17	20	0.052	0.06	0.019	0.02	0.09
12	Body	N78	647000	3705	30k 10M DFT-s-OFDM 16QAM 1RB-22 19dB	Rear	15mm	\	19.12	20	0.043	0.05	0.016	0.02	0.13

13.3 SAR results for WLAN

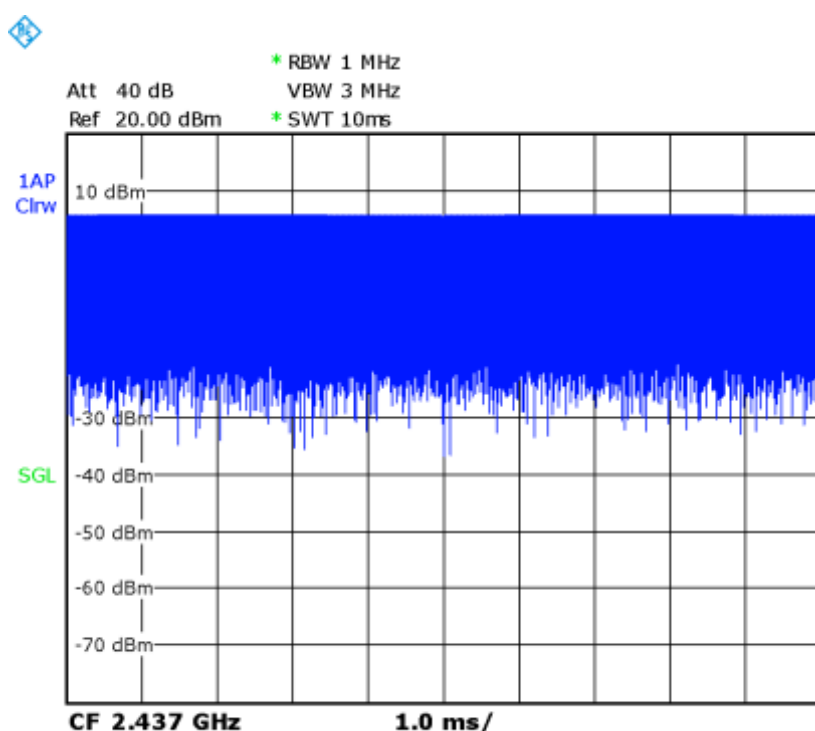
The maximum output power specified for production units are determined for all applicable 802.11 transmission modes in each standalone and aggregated frequency band. Maximum output power is measured for the highest maximum output power configuration(s) in each frequency band according to the default power measurement procedures.

When the same transmission mode configurations have the same maximum output power on the same channel for the 802.11 a/g/n/ac/ax modes, the channel in the lower order/sequence 802.11 mode (i.e. a, g, n ac then ax) is selected.

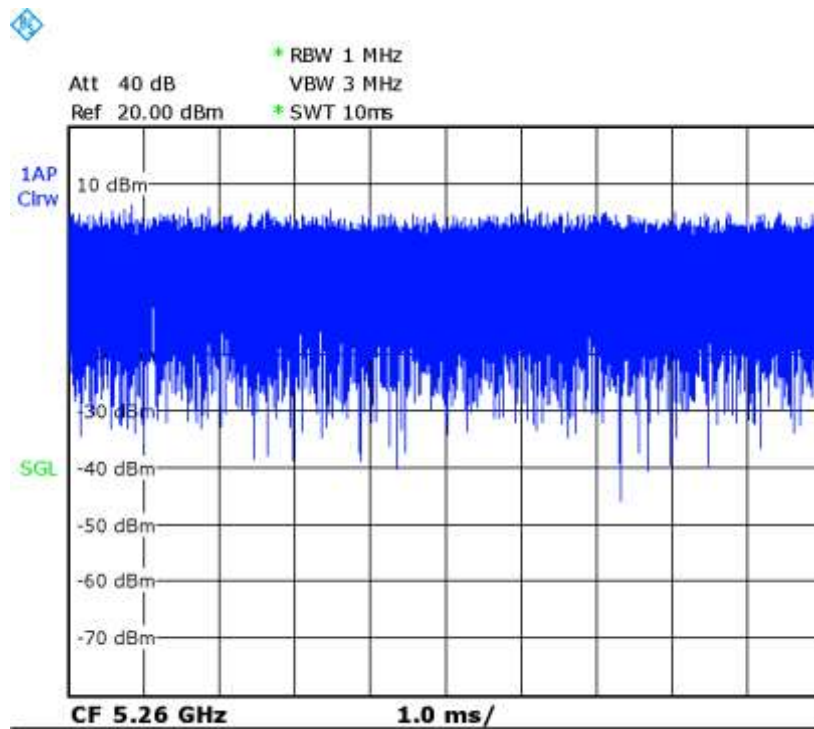
SAR Test reduction was applied from KDB 248227 guidance, when the same maximum power is specified for multiple transmission modes in a frequency band, the largest channel bandwidth, lowest order modulation, lowest data rate and lowest order 802.11a/g/n/ac mode is used for SAR measurement, on the highest measured output power channel in the initial test configuration, for each frequency band. Additional output power measurements were not deemed necessary.

Duty factor plot

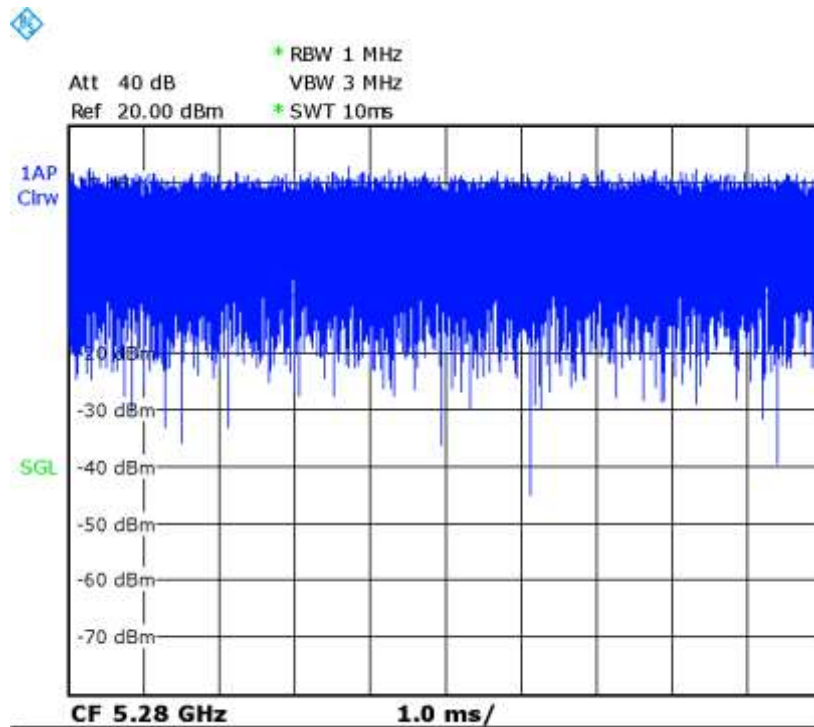
CH6



CH52



CH56



WLAN 2.4G

Test Position	Frequency Band	Channel Number	Frequency (MHz)	Mode/RB	Test Position	Distance	Figure No./Note	EUT Measured Power (dBm)	Tune up (dBm)	Duty Cycle	Measured SAR 1g (W/kg)	Reported SAR 1g (W/kg)	Measured SAR 10g (W/kg)	Reported SAR 10g (W/kg)	Power Drift
Head	WLAN 2.4G	6	2437	11b	Cheek Left	0mm		14.22	14.3	100%	0.185	0.19	0.082	0.08	0.06
Head	WLAN 2.4G	6	2437	11b	Tilt Left	0mm	Fig.A-90	14.22	14.3	100%	0.202	0.21	0.090	0.09	-0.05
Head	WLAN 2.4G	6	2437	11b	Cheek Right	0mm	\	14.22	14.3	100%	0.071	0.07	0.032	0.03	0.03
Head	WLAN 2.4G	6	2437	11b	Tilt Right	0mm	\	14.22	14.3	100%	0.116	0.12	0.051	0.05	0.05
Body	WLAN 2.4G	6	2437	11b	Front	10mm	\	19.52	20	100%	0.264	0.30	0.126	0.14	0.09
Body	WLAN 2.4G	6	2437	11b	Rear	10mm	Fig.A-91	19.52	20	100%	0.353	0.39	0.168	0.19	-0.19
Body	WLAN 2.4G	6	2437	11b	Right	10mm	\	19.52	20	100%	0.233	0.26	0.111	0.12	-0.11
Body	WLAN 2.4G	6	2437	11b	Top	10mm		19.52	20	100%	0.247	0.28	0.118	0.13	0.15
Body	WLAN 2.4G	6	2437	11b	Front	10mm	\	14.67	15	100%	0.075	0.08	0.036	0.04	0.05
Body	WLAN 2.4G	6	2437	11b	Rear	10mm	Fig.A-92	14.67	15	100%	0.117	0.13	0.055	0.06	0.03
Body	WLAN 2.4G	6	2437	11b	Right	10mm	\	14.67	15	100%	0.073	0.08	0.034	0.04	0.08
Body	WLAN 2.4G	6	2437	11b	Top	10mm	\	14.67	15	100%	0.085	0.09	0.040	0.04	-0.04

WLAN 5G

Test Position	Frequency Band	Channel Number	Frequency (MHz)	Mode/RB	Test Position	Distance	Figure No./Note	EUT Measured Power (dBm)	Tune up (dBm)	Duty Cycle	Measured SAR 1g (W/kg)	Reported SAR 1g (W/kg)	Measured SAR 10g (W/kg)	Reported SAR 10g (W/kg)	Power Drift
Head	WLAN 5G	52	5260	11a 6M 10dB	Cheek Left	0mm	\	10.82	12	100%	0.247	0.32	0.061	0.08	0.05
Head	WLAN 5G	52	5260	11a 6M 10dB	Tilt Left	0mm	Fig.A-93	10.82	12	100%	0.341	0.45	0.084	0.11	-0.02
Head	WLAN 5G	52	5260	11a 6M 10dB	Cheek Right	0mm	\	10.82	12	100%	0.099	0.13	0.024	0.03	0.04
Head	WLAN 5G	52	5260	11a 6M 10dB	Tilt Right	0mm	\	10.82	12	100%	0.170	0.22	0.042	0.05	0.07
Head	WLAN 5G	144	5720	11a 6M 12.5dB	Cheek Left	0mm	\	14.15	14.5	100%	0.250	0.27	0.062	0.07	-0.06
Head	WLAN 5G	144	5720	11a 6M 12.5dB	Tilt Left	0mm	\	14.15	14.5	100%	0.210	0.23	0.052	0.06	0.09
Head	WLAN 5G	144	5720	11a 6M 12.5dB	Cheek Right	0mm	\	14.15	14.5	100%	0.119	0.13	0.029	0.03	0.05
Head	WLAN 5G	144	5720	11a 6M 12.5dB	Tilt Right	0mm	\	14.15	14.5	100%	0.120	0.13	0.030	0.03	-0.11
Head	WLAN 5G	153	5765	11a 6M 12.5dB	Cheek Left	0mm	\	13.5	14.5	100%	0.276	0.35	0.068	0.09	0.04
Head	WLAN 5G	153	5765	11a 6M 12.5dB	Tilt Left	0mm	\	13.5	14.5	100%	0.260	0.33	0.064	0.08	0.09
Head	WLAN 5G	153	5765	11a 6M 12.5dB	Cheek Right	0mm	\	13.5	14.5	100%	0.106	0.13	0.026	0.03	0.12
Head	WLAN 5G	153	5765	11a 6M 12.5dB	Tilt Right	0mm	\	13.5	14.5	100%	0.127	0.16	0.031	0.04	0.03
Body	WLAN 5G	52	5260	11a 6M 17dB	Front	10mm	\	17.82	19	100%	0.228	0.30	0.078	0.10	0.06
Body	WLAN 5G	52	5260	11a 6M 17dB	Rear	10mm	\	17.82	19	100%	0.361	0.47	0.123	0.16	0.08
Body	WLAN 5G	52	5260	11a 6M 17dB	Right	10mm	\	17.82	19	100%	0.339	0.44	0.116	0.15	0.05
Body	WLAN 5G	52	5260	11a 6M 17dB	Top	10mm	\	17.82	19	100%	0.676	0.89	0.231	0.30	-0.08
Body	WLAN 5G	56	5280	11a 6M 17dB	Top	10mm	Fig.A-94	17.55	19	100%	0.697	0.97	0.239	0.33	0.05
Body	WLAN 5G	144	5720	11a 6M 17dB	Front	10mm	\	18.55	19	100%	0.183	0.20	0.063	0.07	0.06
Body	WLAN 5G	144	5720	11a 6M 17dB	Rear	10mm	\	18.55	19	100%	0.150	0.17	0.051	0.06	0.11
Body	WLAN 5G	144	5720	11a 6M 17dB	Right	10mm	\	18.55	19	100%	0.219	0.24	0.075	0.08	-0.09
Body	WLAN 5G	144	5720	11a 6M 17dB	Top	10mm	\	18.55	19	100%	0.302	0.33	0.103	0.11	0.08
Body	WLAN 5G	153	5765	11a 6M 17dB	Front	10mm	\	18.04	19	100%	0.192	0.24	0.066	0.08	0.04
Body	WLAN 5G	153	5765	11a 6M 17dB	Rear	10mm	\	18.04	19	100%	0.140	0.18	0.048	0.06	0.09
Body	WLAN 5G	153	5765	11a 6M 17dB	Right	10mm	\	18.04	19	100%	0.187	0.23	0.064	0.08	-0.12
Body	WLAN 5G	153	5765	11a 6M 17dB	Top	10mm	\	18.04	19	100%	0.184	0.23	0.063	0.08	0.06
Body	WLAN 5G	52	5260	11a 6M 12.5dB	Front	10mm	\	13.38	14.5	100%	0.057	0.07	0.019	0.02	0.05
Body	WLAN 5G	52	5260	11a 6M 12.5dB	Rear	10mm	\	13.38	14.5	100%	0.087	0.11	0.029	0.04	0.06
Body	WLAN 5G	52	5260	11a 6M 12.5dB	Right	10mm	\	13.38	14.5	100%	0.077	0.10	0.026	0.03	0.04
Body	WLAN 5G	52	5260	11a 6M 12.5dB	Top	10mm	Fig.A-95	13.38	14.5	100%	0.238	0.31	0.080	0.10	-0.03
Body	WLAN 5G	144	5720	11a 6M 15.5dB	Front	10mm	\	17.32	17.5	100%	0.096	0.10	0.032	0.03	0.08
Body	WLAN 5G	144	5720	11a 6M 15.5dB	Rear	10mm	\	17.32	17.5	100%	0.099	0.10	0.033	0.03	0.07
Body	WLAN 5G	144	5720	11a 6M 15.5dB	Right	10mm	\	17.32	17.5	100%	0.119	0.12	0.040	0.04	-0.06
Body	WLAN 5G	144	5720	11a 6M 15.5dB	Top	10mm	\	17.32	17.5	100%	0.125	0.13	0.042	0.04	0.09
Body	WLAN 5G	153	5765	11a 6M 15.5dB	Front	10mm	\	16.58	17.5	100%	0.130	0.16	0.044	0.05	0.13
Body	WLAN 5G	153	5765	11a 6M 15.5dB	Rear	10mm	\	16.58	17.5	100%	0.102	0.13	0.034	0.04	0.08
Body	WLAN 5G	153	5765	11a 6M 15.5dB	Right	10mm	\	16.58	17.5	100%	0.117	0.14	0.039	0.05	-0.08
Body	WLAN 5G	153	5765	11a 6M 15.5dB	Top	10mm	\	16.58	17.5	100%	0.152	0.19	0.051	0.06	0.05

13.4 SAR results for BT

Test Position	Frequency Band	Channel Number	Frequency (MHz)	Mode/RB	Test Position	Distance	Figure No./Note	EUT Measured Power (dBm)	Tune up (dBm)	Measured SAR 1g (W/kg)	Reported SAR 1g (W/kg)	Measured SAR 10g (W/kg)	Reported SAR 10g (W/kg)	Power Drift
Head	BT	78	2480	GFSK	Cheek Left	0mm	Fig.A-96	10.16	11	0.092	0.11	0.041	0.05	0.09
Head	BT	78	2480	GFSK	Tilt Left	0mm	\	10.16	11	0.074	0.09	0.033	0.04	0.13
Head	BT	78	2480	GFSK	Cheek Right	0mm	\	10.16	11	0.035	0.04	0.016	0.02	-0.07
Head	BT	78	2480	GFSK	Tilt Right	0mm	\	10.16	11	0.025	<0.01	0.011	<0.01	/
Body	BT	78	2480	GFSK	Front	10mm	\	10.16	11	<0.01	<0.01	<0.01	<0.01	/
Body	BT	78	2480	GFSK	Rear	10mm	Fig.A-97	10.16	11	0.023	0.03	0.011	0.01	0.02
Body	BT	78	2480	GFSK	Right	10mm	\	10.16	11	<0.01	<0.01	<0.01	<0.01	/
Body	BT	78	2480	GFSK	Top	10mm	\	10.16	11	<0.01	<0.01	<0.01	<0.01	/

13.5 SAR results for Phablet

According to the KDB648474 D04, for smart phones, with a display diagonal dimension > 15.0 cm or an overall diagonal dimension > 16.0 cm, that can provide similar mobile web access and multimedia support found in mini-tablets or UMPC mini-tablets and support voice calls next to the ear, unless it is confirmed otherwise through KDB inquiries, the following phablet procedures should be applied to evaluate SAR compliance for each applicable wireless modes and frequency band. Devices marketed as phablets, regardless of form factors and operating characteristics must be tested as a phablet to determine SAR compliance.

1. The normally required head and body-worn accessory SAR test procedures for handsets, including hotspot mode, must be applied.
2. The UMPC mini-tablet procedures must also be applied to test the SAR of all surfaces and edges with an antenna located at ≤ 25 mm from that surface or edge, in direct contact with a flat phantom, for 10-g extremity SAR according to the body-equivalent tissue dielectric parameters in KDB Publication 865664 D01 to address interactive hand use exposure conditions. When hotspot mode applies, 10-g extremity SAR is required only for the surfaces and edges with hotspot mode 1-g reported SAR > 1.2 W/kg; however, when power reduction applies to hotspot mode the measured SAR must be scaled to the maximum output power, including tolerance, allowed for phablet modes to compare with the 1.2 W/kg SAR test reduction threshold. The normal tablet procedures in KDB Publication 616217 are required when the overall diagonal dimension of the device is > 20.0 cm. Hotspot mode SAR is not required when normal tablet procedures are applied. Extremity 10-g SAR is also not required for the front (top) surface of larger form factor full size tablets. The more conservative normal tablet SAR results can be used to support phablet mode 10-g extremity SAR.
3. The simultaneous transmission operating configurations applicable to voice and data transmissions for both phone and mini-tablet modes must be taken into consideration separately for 1-g and 10-g SAR to determine the simultaneous transmission SAR test exclusion and measurement requirements for the relevant wireless modes and exposure conditions

For the device of this project, the display diagonal dimension is 170.349 cm (> 15.0 cm) and the overall diagonal dimension is 174.45 cm (> 16.0 cm), so this device is a phone as “phablet”.

According to the requirement of the clause 2 mentioned above, 10-g extremity SAR is not required for this project because all 1-g reported SAR < 1.2 W/kg (including tolerance and power reduction with hotspot mode).

14 SAR Measurement Variability

SAR measurement variability must be assessed for each frequency band, which is determined by the SAR probe calibration point and tissue-equivalent medium used for the device measurements. When both head and body tissue-equivalent media are required for SAR measurements in a frequency band, the variability measurement procedures should be applied to the tissue medium with the highest measured SAR, using the highest measured SAR configuration for that tissue-equivalent medium.

The following procedures are applied to determine if repeated measurements are required.

- 1) Repeated measurement is not required when the original highest measured SAR is < 0.80 W/kg; steps 2) through 4) do not apply.
- 2) When the original highest measured SAR is ≥ 0.80 W/kg, repeat that measurement once.
- 3) Perform a second repeated measurement only if the ratio of largest to smallest SAR for the original and first repeated measurements is > 1.20 or when the original or repeated measurement is ≥ 1.45 W/kg ($\sim 10\%$ from the 1-g SAR limit).
- 4) Perform a third repeated measurement only if the original, first or second repeated measurement is ≥ 1.5 W/kg and the ratio of largest to smallest SAR for the original, first and second repeated measurements is > 1.20 .

15 Evaluation of Simultaneous

15.1 Introduction

The following procedures adopted from “FCC SAR Considerations for Cell Phones with Multiple Transmitters” are applicable to handsets with built-in unlicensed transmitters such as WLAN and Bluetooth devices which may simultaneously transmit with the licensed transmitter. KDB 447498 D01 provides two procedures for determining simultaneous transmission SAR test exclusion: Sum of SAR and SAR to Peak Location Ratio (SPLSR)

15.1.1 Sum of SAR

To qualify for simultaneous transmission SAR test exclusion based upon Sum of SAR the sum of the reported standalone SARs for all simultaneously transmitting antennas shall be below the applicable standalone SAR limit. If the sum of the SARs is above the applicable limit then simultaneous transmission SAR test exclusion may still apply if the requirements of the SAR to Peak Location Ratio (SPLSR) evaluation are met.

15.1.2 SAR to Peak Location Ratio (SPLSR)

KDB 447498 D01 General RF Exposure Guidance explains how to calculate the SAR to Peak Location Ratio (SPLSR) between pairs of simultaneously transmitting antennas:

$$SPLSR = (SAR1 + SAR2)^{1.5} / Ri$$

Where:

SAR1 is the highest reported or estimated SAR for the first of a pair of simultaneous transmitting antennas, in a specific test operating mode and exposure condition.

SAR2 is the highest reported or estimated SAR for the second of a pair of simultaneous transmitting antennas, in the same test operating mode and exposure condition as the first .

Ri is the separation distance between the pair of simultaneous transmitting antennas. When the SAR is measured, for both antennas in the pair, it is determined by the actual x, y and z coordinates in the 1-g SAR for each SAR peak location, based on the extrapolated and interpolated result in the zoom scan measurement, using the formula of

$$[(x1-x2)^2 + (y1-y2)^2 + (z1-z2)^2]$$

In order for a pair of simultaneous transmitting antennas with the sum of 1-g SAR > 1.6 W/kg to qualify for exemption from Simultaneous Transmission SAR measurements, it has to satisfy the condition of:

$$(SAR1 + SAR2)^{1.5} / Ri \leq 0.04$$

When an individual antenna transmits at on two bands simultaneously, the sum of the highest reported SAR for the frequency bands should be used to determine *SAR1* or *SAR2*. When SPLSR is necessary, the smallest distance between the peak SAR locations for the antenna pair with respect to the peaks from each antenna should be used.

15.2 Simultaneous Transmission Capabilities

The simultaneous transmission possibilities for this device are listed as below:

Capable Transmit Configurations	Head	Body-worn	Hotspot
WWAN+WLAN2.4G	Yes	Yes	Yes
WWAN+WLAN5G	Yes	Yes	Yes
WWAN+BT	Yes	Yes	Yes
WWAN+WLAN5G+BT	Yes	Yes	Yes

Note:

- The reported SAR summation is calculated based on the same configuration and test position.
- For the devices edges with antennas more than 2.5 cm from edge are not required to be evaluated for SAR, we determined the SAR of this edges were less than 0.01. For the convenience of simultaneous transmission calculation, all SAR values less than or equal to 0.01 are uniformly written as 0.00

15.3 SAR Simultaneous Transmission Analysis

The sum of reported SAR values for 2/3/4G ANT13+WiFi+BT

reported SAR 1g (W/kg)																			
Head		CDMA BC0	GSM850	GSM1900	WCDMA 1900	WCDMA 1700	WCDMA 850	LTE Band2	LTE Band4	LTE Band5	LTE Band7	LTE Band12	LTE Band38	LTE Band41	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WiFi5G+BT
Cheek	L	0.32	0.13	0.26	0.54	0.53	0.20	0.46	0.35	0.22	0.26	0.16	0.27	0.24	0.19	0.35	0.11	0.73	1.00
	L	0.32	0.13	0.31	0.65	0.64	0.18	0.56	0.41	0.19	0.36	0.15	0.37	0.26	0.21	0.45	0.09	0.86	1.19
	R	0.35	0.18	0.33	0.59	0.58	0.24	0.55	0.47	0.24	0.38	0.17	0.48	0.38	0.07	0.13	0.04	0.66	0.76
	R	0.42	0.14	0.44	0.77	0.75	0.21	0.66	0.57	0.23	0.51	0.22	0.60	0.38	0.12	0.22	0.00	0.89	0.99
Body		CDMA BC0	GSM850	GSM1900	WCDMA 1900	WCDMA 1700	WCDMA 850	LTE Band2	LTE Band4	LTE Band5	LTE Band7	LTE Band12	LTE Band38	LTE Band41	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WiFi5G+BT
Front	10mm	0.18	0.34	0.25	0.27	0.19	0.26	0.26	0.22	0.19	0.16	0.11	0.11	0.08	0.08	0.16	0.00	0.42	0.43
	10mm	0.21	0.43	0.29	0.33	0.19	0.33	0.29	0.21	0.21	0.29	0.14	0.20	0.14	0.13	0.13	0.03	0.56	0.49
	10mm	0.00	0.18	0.06	0.07	0.00	0.15	0.07	0.06	0.09	0.14	0.06	0.12	0.09	0.00	0.00	0.00	0.18	0.15
	10mm	0.11	0.13	0.00	0.00	0.00	0.07	0.00	0.07	0.04	0.07	0.00	0.02	0.08	0.14	0.00	0.00	0.21	0.22
Bottom	10mm	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
	10mm	0.17	0.28	0.55	0.56	0.38	0.23	0.51	0.42	0.21	0.45	0.13	0.28	0.16	0.09	0.31	0.00	0.65	0.87
Body		CDMA BC0	GSM850	GSM1900	WCDMA 1900	WCDMA 1700	WCDMA 850	LTE Band2	LTE Band4	LTE Band5	LTE Band7	LTE Band12	LTE Band38	LTE Band41	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WiFi5G+BT
Front	15mm	0.18	0.34	0.47	0.32	0.37	0.26	0.42	0.55	0.19	0.41	0.11	0.25	0.28	0.08	0.16	0.00	0.63	0.71
	15mm	0.21	0.43	0.59	0.40	0.50	0.33	0.47	0.59	0.21	0.70	0.14	0.39	0.36	0.13	0.13	0.03	0.83	0.86

The sum of reported SAR values for 2/3/4G ANT31/41+WiFi+BT

reported SAR 1g (W/kg)																			
Head		CDMA BC0	GSM850	GSM1900	WCDMA 1900	WCDMA 1700	WCDMA 850	LTE Band2	LTE Band4	LTE Band5	LTE Band7	LTE Band12	LTE Band38	LTE Band41	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WiFi5G+BT
Cheek	L	0.21	0.28	0.12	0.24	0.33	0.34	0.21	0.21	0.26	0.19	0.16	0.09	0.12	0.19	0.35	0.11	0.53	0.80
	L	0.11	0.14	0.00	0.06	0.11	0.19	0.11	0.08	0.15	0.10	0.08	0.07	0.08	0.21	0.45	0.09	0.40	0.75
	R	0.16	0.21	0.09	0.14	0.20	0.20	0.20	0.23	0.20	0.30	0.13	0.18	0.23	0.07	0.13	0.04	0.37	0.47
	R	0.08	0.09	0.09	0.11	0.15	0.07	0.17	0.14	0.10	0.15	0.00	0.10	0.11	0.12	0.22	0.00	0.29	0.39
Body		CDMA BC0	GSM850	GSM1900	WCDMA 1900	WCDMA 1700	WCDMA 850	LTE Band2	LTE Band4	LTE Band5	LTE Band7	LTE Band12	LTE Band38	LTE Band41	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WiFi5G+BT
Front	10mm	0.23	0.20	0.12	0.13	0.24	0.32	0.25	0.31	0.19	0.17	0.11	0.07	0.39	0.08	0.16	0.00	0.47	0.55
	10mm	0.39	0.46	0.23	0.33	0.43	0.54	0.48	0.53	0.30	0.26	0.15	0.09	0.52	0.13	0.13	0.03	0.67	0.70
	10mm	0.20	0.23	0.00	0.04	0.00	0.33	0.00	0.05	0.19	0.05	0.10	0.00	0.05	0.00	0.00	0.00	0.33	0.33
	10mm	0.11	0.00	0.04	0.04	0.12	0.00	0.07	0.17	0.05	0.09	0.09	0.06	0.32	0.08	0.14	0.00	0.40	0.46
Bottom	10mm	0.14	0.11	0.36	0.21	0.50	0.06	0.42	0.48	0.10	0.10	0.07	0.04	0.16	0.00	0.00	0.00	0.50	0.50
	10mm														0.09	0.31	0.00	0.09	0.40
Body		CDMA BC0	GSM850	GSM1900	WCDMA 1900	WCDMA 1700	WCDMA 850	LTE Band2	LTE Band4	LTE Band5	LTE Band7	LTE Band12	LTE Band38	LTE Band41	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WiFi5G+BT
Front	15mm	0.23	0.25	0.10	0.16	0.17	0.32	0.18	0.15	0.19	0.10	0.11	0.05	0.39	0.08	0.16	0.00	0.47	0.55
	15mm	0.39	0.57	0.24	0.33	0.32	0.54	0.31	0.25	0.30	0.14	0.15	0.06	0.52	0.13	0.13	0.03	0.70	0.70

The sum of reported SAR values for NR SA+WiFi+BT

reported SAR 1g (W/kg)														
Head		N5 ANT13	N5 ANT41	N7 ANT11	N7 ANT13	N41 ANT11	N41 ANT13	N78 ANT11	N78 ANT12	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WiFi5G+BT
Cheek	L	0.24	0.23	0.15	0.25	0.20	0.34	0.17	0.16	0.19	0.35	0.11	0.53	0.80
Tilt	L	0.25	0.15	0.07	0.41	0.02	0.24	0.07	0.15	0.21	0.45	0.09	0.62	0.95
Cheek	R	0.24	0.16	0.41	0.45	0.71	0.42	0.59	0.30	0.07	0.13	0.04	0.78	0.88
Tilt	R	0.29	0.11	0.12	0.69	0.09	0.41	0.16	0.33	0.12	0.22	0.00	0.81	0.91
Body		N5 ANT13	N5 ANT41	N7 ANT11	N7 ANT13	N41 ANT11	N41 ANT13	N78 ANT11	N78 ANT12	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WiFi5G+BT
Front	10mm	0.18	0.17	0.10	0.14	0.10	0.55	0.17	0.10	0.08	0.16	0.00	0.63	0.71
Rear	10mm	0.24	0.29	0.24	0.28	0.20	0.73	0.11	0.16	0.13	0.13	0.03	0.86	0.89
Left	10mm	0.09	0.17	0.30	0.11	0.36	0.65	0.40	0.09	0.00	0.00	0.00	0.65	0.65
Right	10mm		0.00							0.08	0.14	0.00	0.08	0.14
Bottom	10mm		0.05							0.00	0.00		0.05	0.05
Top	10mm	0.20		0.00	0.21	0.00	0.74	0.05	0.14	0.09	0.31	0.00	0.83	1.05
Body		N5 ANT13	N5 ANT41	N7 ANT11	N7 ANT13	N41 ANT11	N41 ANT13	N78 ANT11	N78 ANT12	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WiFi5G+BT
Front	15mm	0.18	0.17	0.16	0.37	0.27	0.55	0.26	0.06	0.08	0.16	0.00	0.63	0.71
Rear	15mm	0.24	0.29	0.33	0.66	0.55	0.73	0.40	0.06	0.13	0.13	0.03	0.86	0.89

The sum of reported SAR values for NR NSA

N5 ANT41+LTE

reported SAR 1g (W/kg)						
Head		N5 ANT41	LTE Band7 ANT13	LTE Band7 ANT31	N5 ANT41+B7 ANT13	N5 ANT41+B7 ANT31
Cheek	L	0.23	0.26	0.19	0.49	0.42
Tilt	L	0.15	0.36	0.10	0.51	0.25
Cheek	R	0.16	0.38	0.30	0.54	0.46
Tilt	R	0.11	0.51	0.15	0.62	0.26
Body		N5 ANT41	LTE Band7 ANT13	LTE Band7 ANT31	N5 ANT41+B7 ANT13	N5 ANT41+B7 ANT31
Front	10mm	0.17	0.16	0.17	0.33	0.34
Rear	10mm	0.29	0.29	0.26	0.58	0.55
Left	10mm	0.17	0.14	0.05	0.31	0.22
Right	10mm	0.00	0.04	0.09	0.04	0.09
Bottom	10mm	0.05	0.00	0.10	0.05	0.15
Top	10mm	0.00	0.45	0.00	0.45	0.00
Body		N5 ANT41	LTE Band7 ANT13	LTE Band7 ANT31	N5 ANT41+B7 ANT13	N5 ANT41+B7 ANT31
Front	15mm	0.17	0.41	0.10	0.58	0.27
Rear	15mm	0.29	0.70	0.14	0.99	0.43

N41+LTE

reported SAR 1g (W/kg)						
Head		N41 ANT11	N41 ANT13	LTE Band5 ANT41	N41 ANT11+B5 ANT41	N41 ANT13+B5 ANT41
Cheek	L	0.20	0.34	0.26	0.46	0.60
Tilt	L	0.02	0.24	0.15	0.17	0.39
Cheek	R	0.71	0.42	0.20	0.91	0.62
Tilt	R	0.09	0.41	0.10	0.19	0.51
Body		N41 ANT11	N41 ANT13	LTE Band5 ANT41	N41 ANT11+B5 ANT41	N41 ANT13+B5 ANT41
Front	10mm	0.10	0.55	0.19	0.29	0.74
Rear	10mm	0.20	0.73	0.30	0.50	1.03
Left	10mm	0.36	0.65	0.19	0.55	0.84
Right	10mm	0.00	0.00	0.05	0.05	0.05
Bottom	10mm	0.00	0.00	0.10	0.10	0.10
Top	10mm	0.00	0.74	0.00	0.00	0.74
Body		N41 ANT11	N41 ANT13	LTE Band5 ANT41	N41 ANT11+B5 ANT41	N41 ANT13+B5 ANT41
Front	15mm	0.27	0.55	0.19	0.46	0.74
Rear	15mm	0.55	0.73	0.30	0.85	1.03

N78 ANT11+LTE

reported SAR 1g (W/kg)												
Head		N78 ANT11	LTE Band5 ANT41	LTE Band7 ANT13	LTE Band7 ANT31	LTE Band41 ANT13	LTE Band41 ANT31	N78 ANT11+B 5 ANT41	N78 ANT11+B 7 ANT13	N78 ANT11+B 7 ANT31	N78 ANT11+B 41 ANT13	N78 ANT11+B4 1 ANT31
Cheek	L	0.17	0.26	0.26	0.19	0.24	0.12	0.43	0.43	0.36	0.41	0.29
Tilt	L	0.07	0.15	0.36	0.10	0.26	0.08	0.22	0.43	0.17	0.33	0.15
Cheek	R	0.59	0.20	0.38	0.30	0.38	0.23	0.79	0.97	0.89	0.97	0.82
Tilt	R	0.16	0.10	0.51	0.15	0.38	0.11	0.26	0.67	0.31	0.54	0.27
Body		N78 ANT11	LTE Band5 ANT41	LTE Band7 ANT13	LTE Band7 ANT31	LTE Band41 ANT13	LTE Band41 ANT31	N78 ANT11+B 5 ANT41	N78 ANT11+B 7 ANT13	N78 ANT11+B 7 ANT31	N78 ANT11+B 41 ANT13	N78 ANT11+B4 1 ANT31
Front	10mm	0.17	0.19	0.16	0.17	0.08	0.39	0.36	0.33	0.34	0.25	0.56
Rear	10mm	0.11	0.30	0.29	0.26	0.14	0.52	0.41	0.40	0.37	0.25	0.63
Left	10mm	0.40	0.19	0.14	0.05	0.09	0.05	0.59	0.54	0.45	0.49	0.45
Right	10mm	0.00	0.05	0.04	0.09	0.02	0.32	0.05	0.04	0.09	0.02	0.32
Bottom	10mm	0.00	0.10	0.00	0.10	0.00	0.16	0.10	0.00	0.10	0.00	0.16
Top	10mm	0.05	0.00	0.45	0.00	0.16	0.00	0.05	0.50	0.05	0.21	0.05
Body		N78 ANT11	LTE Band5 ANT41	LTE Band7 ANT13	LTE Band7 ANT31	LTE Band41 ANT13	LTE Band41 ANT31	N78 ANT11+B 5 ANT41	N78 ANT11+B 7 ANT13	N78 ANT11+B 7 ANT31	N78 ANT11+B 41 ANT13	N78 ANT11+B4 1 ANT31
Front	15mm	0.26	0.19	0.41	0.10	0.28	0.39	0.45	0.67	0.36	0.54	0.65
Rear	15mm	0.40	0.30	0.70	0.14	0.36	0.52	0.70	1.10	0.54	0.76	0.92

N78 ANT12+LTE

reported SAR 1g (W/kg)												
Head		N78 ANT12	LTE Band5 ANT41	LTE Band7 ANT13	LTE Band7 ANT31	LTE Band41 ANT13	LTE Band41 ANT31	N78 ANT12+B 5 ANT41	N78 ANT12+B 7 ANT13	N78 ANT12+B 7 ANT31	N78 ANT12+B 41 ANT13	N78 ANT12+B4 1 ANT31
Cheek	L	0.16	0.26	0.26	0.19	0.24	0.12	0.42	0.42	0.35	0.40	0.28
Tilt	L	0.15	0.15	0.36	0.10	0.26	0.08	0.30	0.51	0.25	0.41	0.23
Cheek	R	0.30	0.20	0.38	0.30	0.38	0.23	0.50	0.68	0.60	0.68	0.53
Tilt	R	0.33	0.10	0.51	0.15	0.38	0.11	0.43	0.84	0.48	0.71	0.44
Body		N78 ANT12	LTE Band5 ANT41	LTE Band7 ANT13	LTE Band7 ANT31	LTE Band41 ANT13	LTE Band41 ANT31	N78 ANT12+B 5 ANT41	N78 ANT12+B 7 ANT13	N78 ANT12+B 7 ANT31	N78 ANT12+B 41 ANT13	N78 ANT12+B4 1 ANT31
Front	10mm	0.10	0.19	0.16	0.17	0.08	0.39	0.29	0.26	0.27	0.18	0.49
Rear	10mm	0.16	0.30	0.29	0.26	0.14	0.52	0.46	0.45	0.42	0.30	0.68
Left	10mm	0.09	0.19	0.14	0.05	0.09	0.05	0.28	0.23	0.14	0.18	0.14
Right	10mm	0.00	0.05	0.04	0.09	0.02	0.32	0.05	0.04	0.09	0.02	0.32
Bottom	10mm	0.00	0.10	0.00	0.10	0.00	0.16	0.10	0.00	0.10	0.00	0.16
Top	10mm	0.14	0.00	0.45	0.00	0.16	0.00	0.14	0.59	0.14	0.30	0.14
Body		N78 ANT12	LTE Band5 ANT41	LTE Band7 ANT13	LTE Band7 ANT31	LTE Band41 ANT13	LTE Band41 ANT31	N78 ANT12+B 5 ANT41	N78 ANT12+B 7 ANT13	N78 ANT12+B 7 ANT31	N78 ANT12+B 41 ANT13	N78 ANT12+B4 1 ANT31
Front	15mm	0.06	0.19	0.41	0.10	0.28	0.39	0.25	0.47	0.16	0.34	0.45
Rear	15mm	0.06	0.30	0.70	0.14	0.36	0.52	0.36	0.76	0.20	0.42	0.58

The sum of reported SAR values for NR NSA+WIFI+BT

N5 ANT41+LTE+WIFI+BT

reported SAR 1g (W/kg)								
Head		N5 ANT41+B7 ANT13	N5 ANT41+B7 ANT31	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Cheek	L	0.49	0.42	0.19	0.35	0.13	0.68	0.97
Tilt	L	0.51	0.25	0.21	0.45	0.10	0.72	1.06
Cheek	R	0.54	0.46	0.07	0.13	0.05	0.61	0.72
Tilt	R	0.62	0.26	0.12	0.22	0.00	0.74	0.84
Body		N5 ANT41+B7 ANT13	N5 ANT41+B7 ANT31	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Front	10mm	0.33	0.34	0.08	0.16	0.00	0.42	0.50
Rear	10mm	0.58	0.55	0.13	0.13	0.03	0.71	0.74
Left	10mm	0.31	0.22	0.00	0.00	0.00	0.31	0.31
Right	10mm	0.04	0.09	0.08	0.14	0.00	0.17	0.23
Bottom	10mm	0.05	0.15	0.00	0.00	0.00	0.15	0.15
Top	10mm	0.45	0.00	0.09	0.31	0.00	0.54	0.76
Body		N5 ANT41+B7 ANT13	N5 ANT41+B7 ANT31	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Front	15mm	0.58	0.27	0.08	0.16	0.00	0.66	0.74
Rear	15mm	0.99	0.43	0.13	0.13	0.03	1.12	1.15

N41 +LTE+WIFI+BT

reported SAR 1g (W/kg)								
Head		N41 ANT11+B5 ANT41	N41 ANT13+B5 ANT41	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Cheek	L	0.46	0.60	0.19	0.35	0.11	0.79	1.06
Tilt	L	0.17	0.39	0.21	0.45	0.09	0.60	0.93
Cheek	R	0.91	0.62	0.07	0.13	0.04	0.98	1.08
Tilt	R	0.19	0.51	0.12	0.22	0.00	0.63	0.73
Body		N41 ANT11+B5 ANT41	N41 ANT13+B5 ANT41	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Front	10mm	0.29	0.74	0.08	0.16	0.00	0.82	0.90
Rear	10mm	0.50	1.03	0.13	0.13	0.03	1.16	1.19
Left	10mm	0.55	0.84	0.00	0.00	0.00	0.84	0.84
Right	10mm	0.05	0.05	0.08	0.14	0.00	0.13	0.19
Bottom	10mm	0.10	0.10	0.00	0.00	0.00	0.10	0.10
Top	10mm	0.00	0.74	0.09	0.31	0.00	0.83	1.05
Body		N41 ANT11+B5 ANT41	N41 ANT13+B5 ANT41	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Front	15mm	0.46	0.74	0.08	0.16	0.00	0.82	0.90
Rear	15mm	0.85	1.03	0.13	0.13	0.03	1.16	1.19

N78 ANT11+LTE+WIFI+BT

reported SAR 1g (W/kg)											
Head		N78 ANT11+B 5 ANT41	N78 ANT11+B 7 ANT13	N78 ANT11+B 7 ANT31	N78 ANT11+B 41 ANT13	N78 ANT11+B4 1 ANT31	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Cheek	L	0.43	0.43	0.36	0.41	0.29	0.19	0.35	0.11	0.62	0.89
Tilt	L	0.22	0.43	0.17	0.33	0.15	0.21	0.45	0.09	0.64	0.97
Cheek	R	0.79	0.97	0.89	0.97	0.82	0.07	0.13	0.04	1.04	1.14
Tilt	R	0.26	0.67	0.31	0.54	0.27	0.12	0.22	0.00	0.79	0.89
Body		N78 ANT11+B 5 ANT41	N78 ANT11+B 7 ANT13	N78 ANT11+B 7 ANT31	N78 ANT11+B 41 ANT13	N78 ANT11+B4 1 ANT31	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Front	10mm	0.36	0.33	0.34	0.25	0.56	0.08	0.16	0.00	0.64	0.72
Rear	10mm	0.41	0.40	0.37	0.25	0.63	0.13	0.13	0.03	0.76	0.79
Left	10mm	0.59	0.54	0.45	0.49	0.45	0.00	0.00	0.00	0.59	0.59
Right	10mm	0.05	0.04	0.09	0.02	0.32	0.08	0.14	0.00	0.40	0.46
Bottom	10mm	0.10	0.00	0.10	0.00	0.16	0.00	0.00	0.00	0.16	0.16
Top	10mm	0.05	0.50	0.05	0.21	0.05	0.09	0.31	0.00	0.59	0.81
Body		N78 ANT11+B 5 ANT41	N78 ANT11+B 7 ANT13	N78 ANT11+B 7 ANT31	N78 ANT11+B 41 ANT13	N78 ANT11+B4 1 ANT31	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Front	15mm	0.45	0.67	0.36	0.54	0.65	0.08	0.16	0.00	0.75	0.83
Rear	15mm	0.70	1.10	0.54	0.76	0.92	0.13	0.13	0.03	1.23	1.26

N78 ANT12+LTE +WIFI+BT

reported SAR 1g (W/kg)											
Head		N78 ANT12+B 5 ANT41	N78 ANT12+B 7 ANT13	N78 ANT12+B 7 ANT31	N78 ANT12+B 41 ANT13	N78 ANT12+B4 1 ANT31	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Cheek	L	0.42	0.42	0.35	0.40	0.28	0.19	0.35	0.11	0.61	0.88
Tilt	L	0.30	0.51	0.25	0.41	0.23	0.21	0.45	0.09	0.72	1.05
Cheek	R	0.50	0.68	0.60	0.68	0.53	0.07	0.13	0.04	0.75	0.85
Tilt	R	0.43	0.84	0.48	0.71	0.44	0.12	0.22	0.00	0.96	1.06
Body		N78 ANT12+B 5 ANT41	N78 ANT12+B 7 ANT13	N78 ANT12+B 7 ANT31	N78 ANT12+B 41 ANT13	N78 ANT12+B4 1 ANT31	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Front	10mm	0.29	0.26	0.27	0.18	0.49	0.08	0.16	0.00	0.57	0.65
Rear	10mm	0.46	0.45	0.42	0.30	0.68	0.13	0.13	0.03	0.81	0.84
Left	10mm	0.28	0.23	0.14	0.18	0.14	0.00	0.00	0.00	0.28	0.28
Right	10mm	0.05	0.04	0.09	0.02	0.32	0.08	0.14	0.00	0.40	0.46
Bottom	10mm	0.10	0.00	0.10	0.00	0.16	0.00	0.00	0.00	0.16	0.16
Top	10mm	0.14	0.59	0.14	0.30	0.14	0.09	0.31	0.00	0.68	0.90
Body		N78 ANT12+B 5 ANT41	N78 ANT12+B 7 ANT13	N78 ANT12+B 7 ANT31	N78 ANT12+B 41 ANT13	N78 ANT12+B4 1 ANT31	2.4G	5G	BT	Cellular+WiFi2.4G	Cellular+WIFI5G+BT
Front	15mm	0.25	0.47	0.16	0.34	0.45	0.08	0.16	0.00	0.55	0.63
Rear	15mm	0.36	0.76	0.20	0.42	0.58	0.13	0.13	0.03	0.89	0.92

15.4 Conclusion

According to the above tables, the highest simultaneous transmission reported SAR values is **1.26W/kg (1g)**. The sum of reported SAR values is <1.6W/kg. So the simultaneous transmission SAR with volume scans is not required.

16 Measurement Uncertainty

Per KDB 865664 D01 SAR Measurement 100 MHz to 6 GHz, when the highest measured 1-g SAR within a frequency band is < 1.5 W/kg and the measured 10-g SAR within a frequency band is < 3.75 W/kg. The expanded SAR measurement uncertainty must be $\leq 30\%$, for a confidence interval of $k = 2$. If these conditions are met, extensive SAR measurement uncertainty analysis described in IEEE Std 1528-2013 is not required in SAR reports submitted for equipment approval.

Therefore, the measurement uncertainty is not required.

17 MAIN TEST INSTRUMENTS

No.	Name	Type	Serial Number	Calibration Date	Valid Period
01	Network analyzer	E5071C	MY46110673	January 14, 2021	One year
02	Power meter	NRP2	106276	May 11, 2021	One year
03	Power sensor	NRP6A	101369		
04	Signal Generator	E4438C	MY49070393	May 14, 2021	One Year
05	Amplifier	60S1G4	0331848	No Calibration Requested	
06	BTS	CMW500	159890	January 25 2021	One year
07	BTS	CMW500	166370	June 25, 2021	One year
08	E-field Probe	SPEAG EX3DV4	7517	February 03, 2021	One year
09	DAE	SPEAG DAE4	1525	September 01 2021	One year
10	Dipole Validation Kit	SPEAG D750V3	1017	July 12,,2021	One year
11	Dipole Validation Kit	SPEAG D835V2	4d069	July 12,,2021	One year
12	Dipole Validation Kit	SPEAG D1750V2	1003	July 12, 2021	One year
13	Dipole Validation Kit	SPEAG D1900V2	5d101	July 15,2021	One year
14	Dipole Validation Kit	SPEAG D2450V2	853	July 26,2021	One year
15	Dipole Validation Kit	SPEAG D2600V2	1012	July 26,2021	One year
16	Dipole Validation Kit	SPEAG D3500V2	1016	June 21,2021	One year
17	Dipole Validation Kit	SPEAG D3700V2	1004	June 21,2021	One year
18	Dipole Validation Kit	SPEAG D5GHzV2	1060	June 22,2021	One year

END OF REPORT BODY

ANNEX A Graph Results

CDMA BC0 Head ANT13

Date/Time: 12/23/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used: $f = 848.31$ MHz; $\sigma = 0.934$ S/m; $\epsilon_r = 43.956$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, CDMA BC0 (0) Frequency: 848.31 MHz Duty Cycle: 1:1

Probe: EX3DV4 – SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.437 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 16.04 V/m; Power Drift = 0.11 dB

Peak SAR (extrapolated) = 0.860 W/kg

SAR(1 g) = 0.332 W/kg; SAR(10 g) = 0.181 W/kg

Maximum value of SAR (measured) = 0.595 W/kg

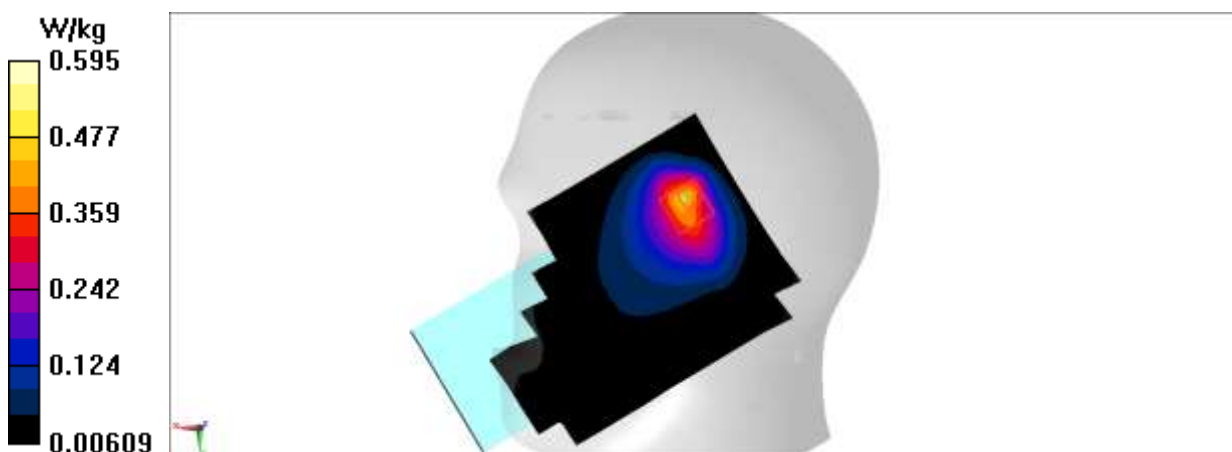


Fig A.1

GSM850 Head ANT13

Date/Time: 12/23/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used: $f = 825 \text{ MHz}$; $\sigma = 0.912 \text{ S/m}$; $\epsilon_r = 44.229$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 850 (0) Frequency: 824.2 MHz Duty Cycle: 1:8.30042

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.217 W/kg

Zoom Scan (6x5x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 10.31 V/m; Power Drift = 0.09 dB

Peak SAR (extrapolated) = 0.271 W/kg

SAR(1 g) = 0.133 W/kg; SAR(10 g) = 0.081 W/kg

Maximum value of SAR (measured) = 0.206 W/kg

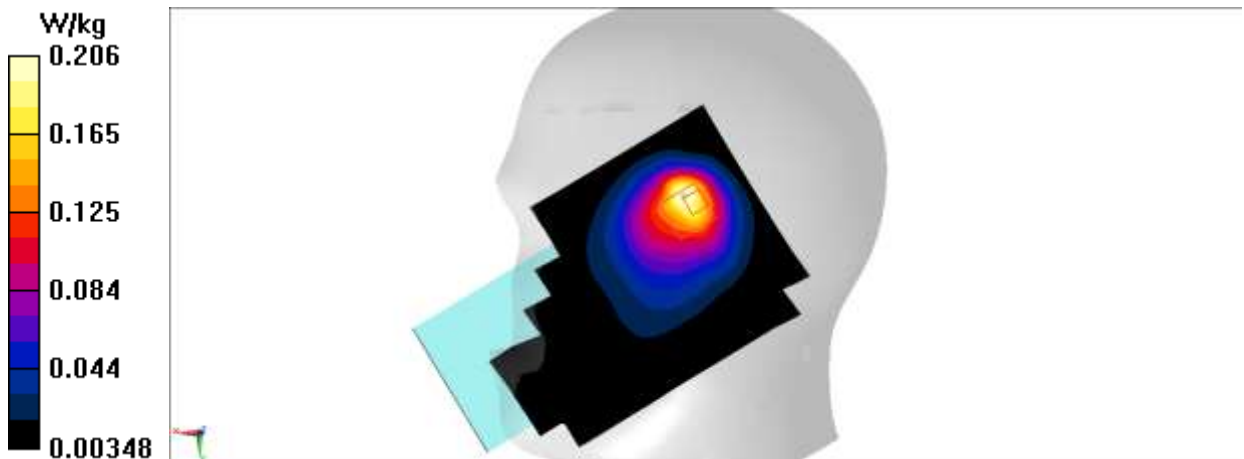


Fig A.2

GSM1900 Head ANT13

Date/Time: 12/28/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used: $f = 1880$ MHz; $\sigma = 1.454$ S/m; $\epsilon_r = 41.822$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 1900 (0) Frequency: 1880 MHz Duty Cycle: 1:8.30042

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.463 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 7.913 V/m; Power Drift = 0.14 dB

Peak SAR (extrapolated) = 0.748 W/kg

SAR(1 g) = 0.374 W/kg; SAR(10 g) = 0.168 W/kg

Maximum value of SAR (measured) = 0.635 W/kg

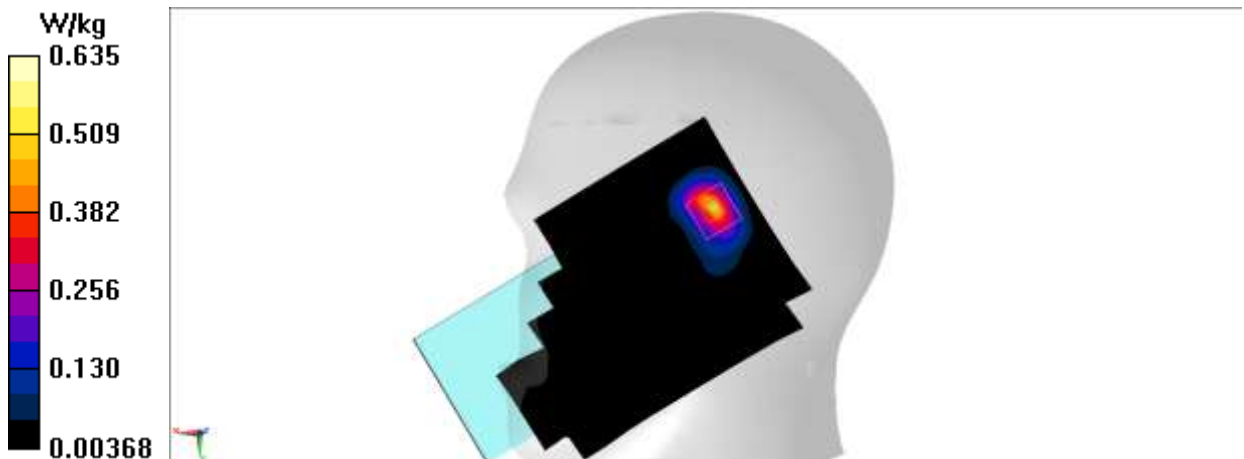


Fig A.3

WCDMA1900 Head ANT13

Date/Time: 12/28/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used: $f = 1880$ MHz; $\sigma = 1.454$ S/m; $\epsilon_r = 41.822$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1900 (0) Frequency: 1880 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.776 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 9.588 V/m; Power Drift = -0.08 dB

Peak SAR (extrapolated) = 1.11 W/kg

SAR(1 g) = 0.552 W/kg; SAR(10 g) = 0.253 W/kg

Maximum value of SAR (measured) = 0.910 W/kg

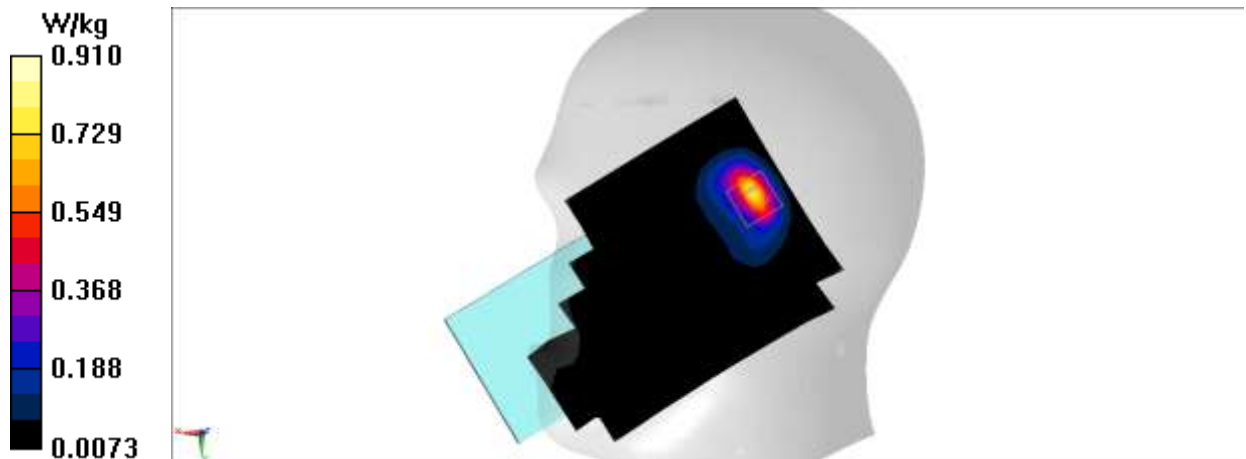


Fig A.4

WCDMA1700 Head ANT13

Date/Time: 12/28/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used (interpolated): $f = 1752.6$ MHz; $\sigma = 1.347$ S/m; $\epsilon_r = 41.647$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1700 Band4 (0) Frequency: 1752.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.800 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 8.271 V/m; Power Drift = 0.12 dB

Peak SAR (extrapolated) = 1.17 W/kg

SAR(1 g) = 0.561 W/kg; SAR(10 g) = 0.256 W/kg

Maximum value of SAR (measured) = 0.950 W/kg

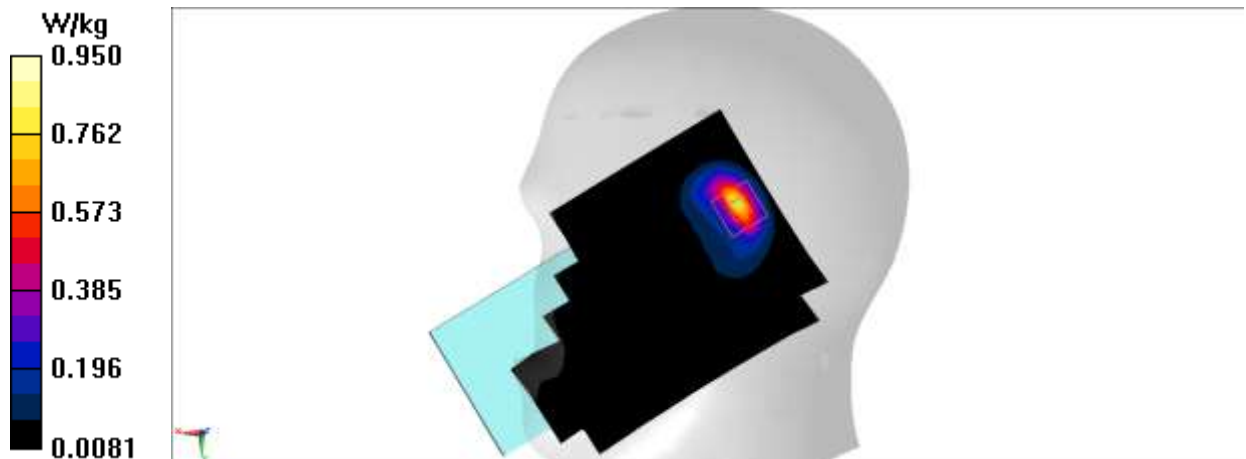


Fig A.5

WCDMA850 Head ANT13

Date/Time: 12/23/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used (interpolated): $f = 846.6$ MHz; $\sigma = 0.926$ S/m; $\epsilon_r = 44.038$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 850 (0) Frequency: 846.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500$ mm, $dy=1.500$ mm

Maximum value of SAR (interpolated) = 0.274 W/kg

Zoom Scan (6x6x7)/Cube 0: Measurement grid: $dx=8$ mm, $dy=8$ mm, $dz=5$ mm

Reference Value = 12.25 V/m; Power Drift = 0.08 dB

Peak SAR (extrapolated) = 0.357 W/kg

SAR(1 g) = 0.180 W/kg; SAR(10 g) = 0.113 W/kg

Maximum value of SAR (measured) = 0.267 W/kg

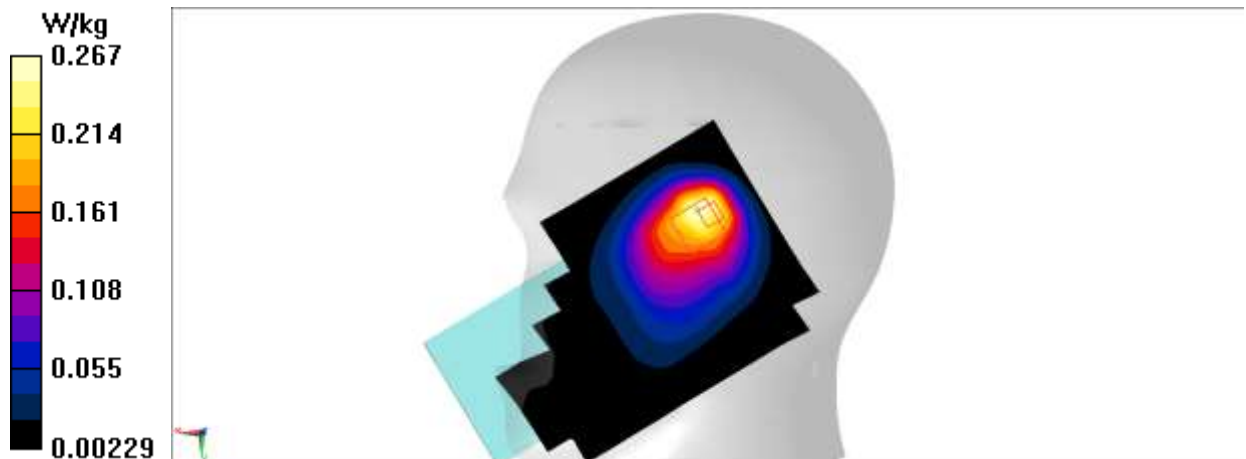


Fig A.6

LTE Band2 Head ANT13

Date/Time: 12/28/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used: $f = 1860$ MHz; $\sigma = 1.441$ S/m; $\epsilon_r = 41.907$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band2(20MB) (0) Frequency: 1860 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500$ mm, $dy=1.500$ mm

Maximum value of SAR (interpolated) = 0.852 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8$ mm, $dy=8$ mm, $dz=5$ mm

Reference Value = 6.507 V/m; Power Drift = 0.04 dB

Peak SAR (extrapolated) = 1.09 W/kg

SAR(1 g) = 0.528 W/kg; SAR(10 g) = 0.239 W/kg

Maximum value of SAR (measured) = 0.887 W/kg

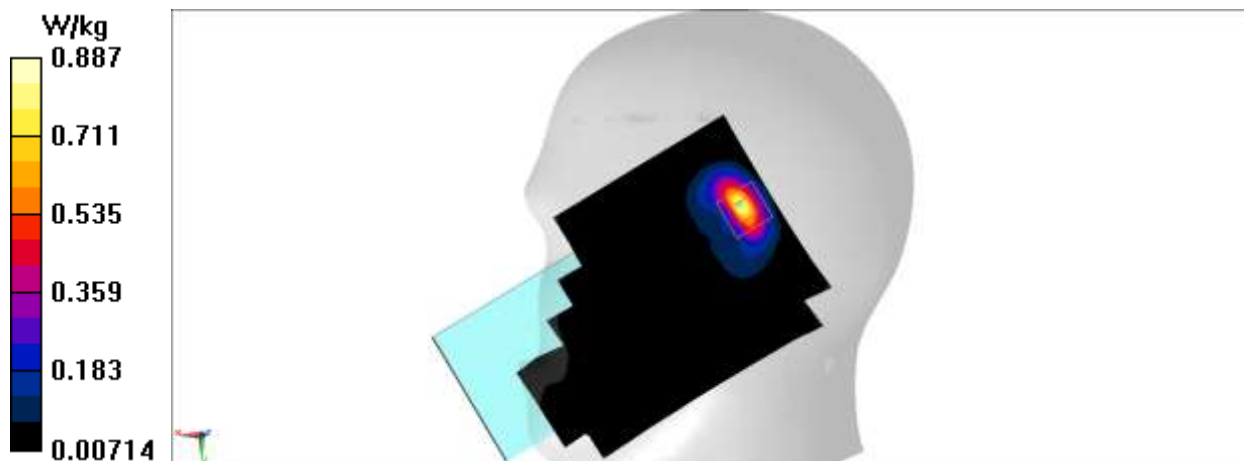


Fig A.7

LTE Band4 Head ANT13

Date/Time: 12/28/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used: $f = 1720$ MHz; $\sigma = 1.325$ S/m; $\epsilon_r = 41.741$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band4 (0) Frequency: 1720 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.748 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 6.647 V/m; Power Drift = 0.17 dB

Peak SAR (extrapolated) = 0.982 W/kg

SAR(1 g) = 0.465 W/kg; SAR(10 g) = 0.212 W/kg

Maximum value of SAR (measured) = 0.785 W/kg

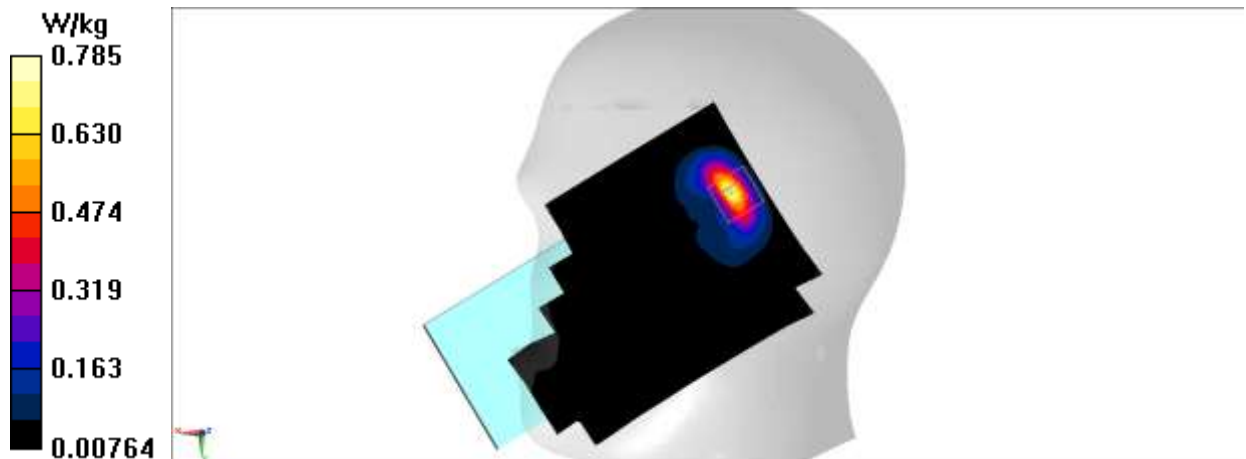


Fig A.8

LTE Band5 Head ANT13

Date/Time: 12/23/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used (interpolated): $f = 829 \text{ MHz}$; $\sigma = 0.912 \text{ S/m}$; $\epsilon_r = 44.206$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band5 (0) Frequency: 829 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.319 W/kg

Zoom Scan (6x5x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 12.59 V/m; Power Drift = 0.01 dB

Peak SAR (extrapolated) = 0.377 W/kg

SAR(1 g) = 0.189 W/kg; SAR(10 g) = 0.117 W/kg

Maximum value of SAR (measured) = 0.289 W/kg

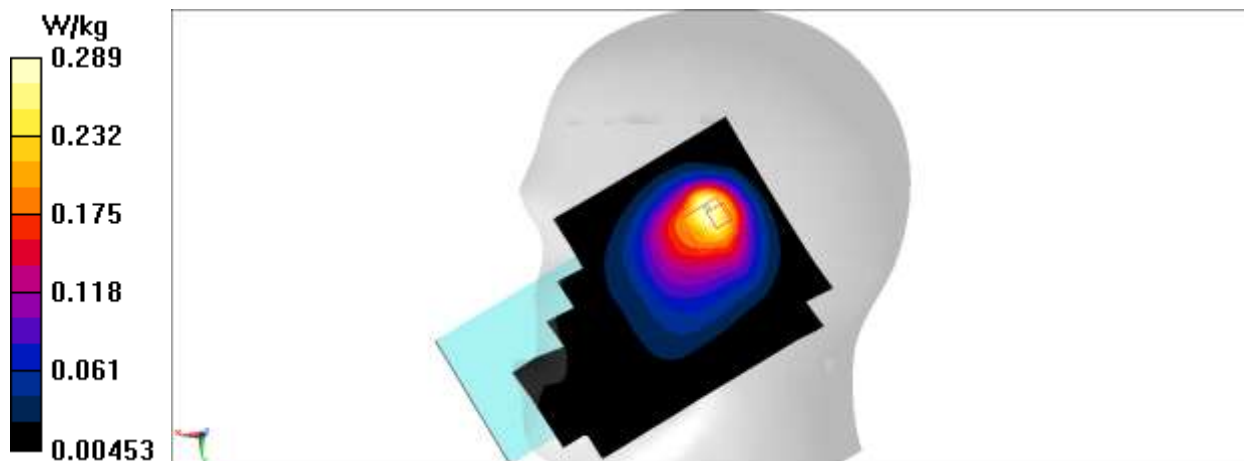


Fig A.9

LTE Band7 Head ANT13

Date/Time: 12/27/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.961$ S/m; $\epsilon_r = 38.569$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band7-20M (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.765 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 4.687 V/m; Power Drift = 0.05 dB

Peak SAR (extrapolated) = 0.906 W/kg

SAR(1 g) = 0.404 W/kg; SAR(10 g) = 0.180 W/kg

Maximum value of SAR (measured) = 0.672 W/kg

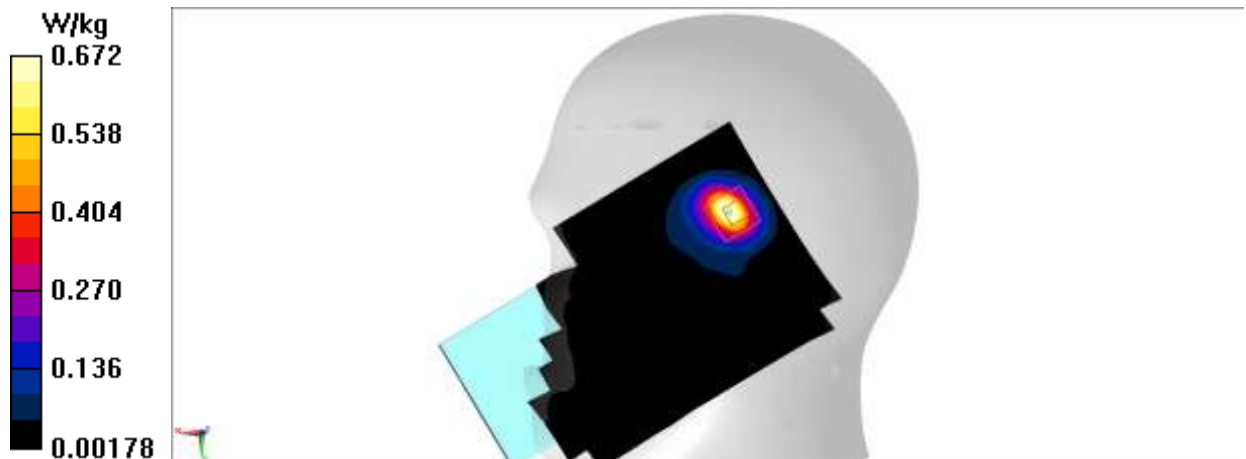


Fig A.10

LTE Band12 Head ANT13

Date/Time: 12/28/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used (interpolated): $f = 704 \text{ MHz}$; $\sigma = 0.848 \text{ S/m}$; $\epsilon_r = 44.441$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band12 (0) Frequency: 704 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.81, 9.81, 9.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.262 W/kg

Zoom Scan (6x6x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 12.41 V/m; Power Drift = 0.09 dB

Peak SAR (extrapolated) = 0.472 W/kg

SAR(1 g) = 0.175 W/kg; SAR(10 g) = 0.092 W/kg

Maximum value of SAR (measured) = 0.329 W/kg

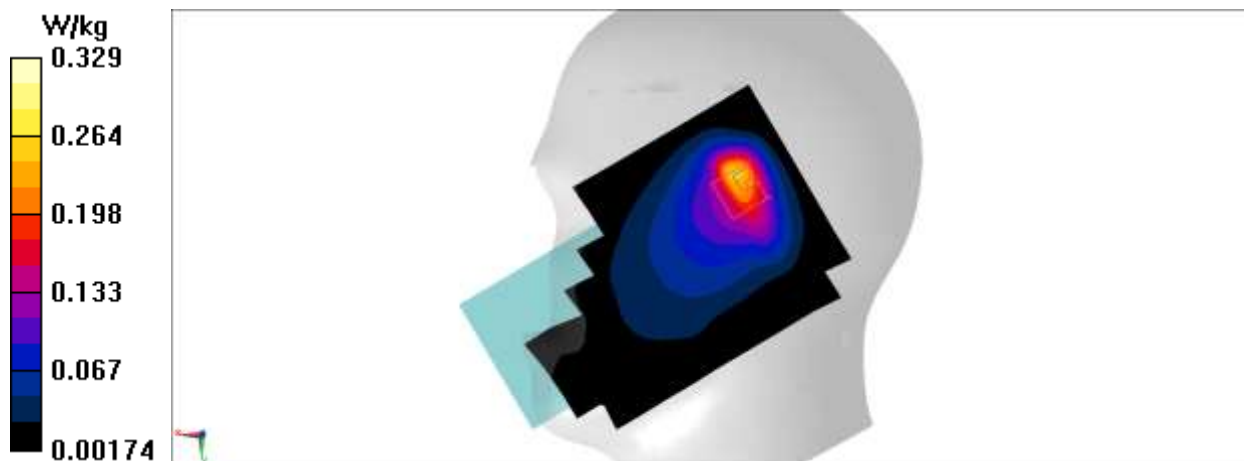


Fig A.11

LTE Band38 Head ANT13

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2580$ MHz; $\sigma = 1.946$ S/m; $\epsilon_r = 40.33$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band38 20M (0) Frequency: 2580 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.979 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 3.312 V/m; Power Drift = 0.09 dB

Peak SAR (extrapolated) = 1.18 W/kg

SAR(1 g) = 0.513 W/kg; SAR(10 g) = 0.226 W/kg

Maximum value of SAR (measured) = 0.895 W/kg

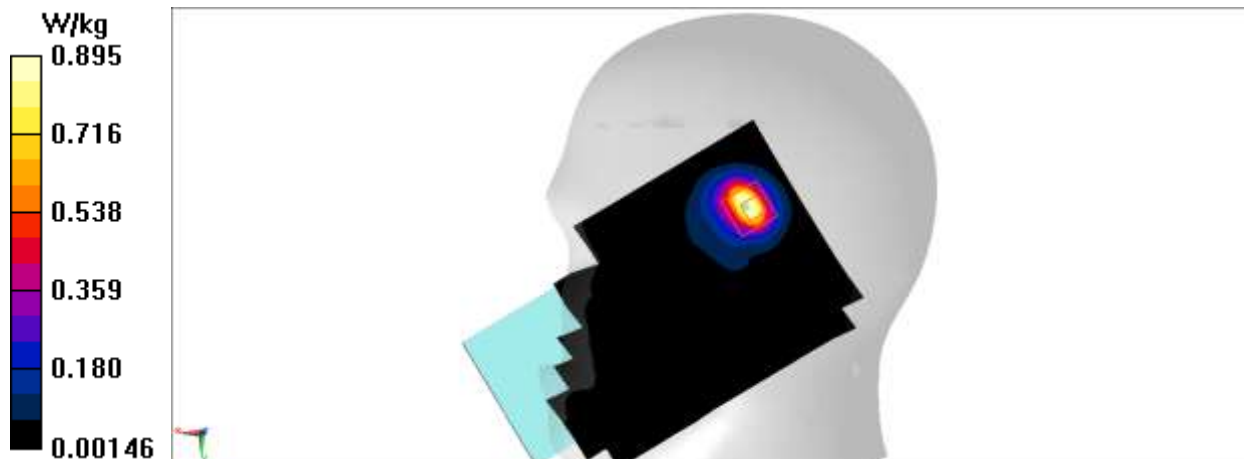


Fig A.12

LTE Band41 Head ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 2636.5$ MHz; $\sigma = 2.051$ S/m; $\epsilon_r = 37.983$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band41 (0) Frequency: 2636.5 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.603 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.995 V/m; Power Drift = 0.06 dB

Peak SAR (extrapolated) = 0.728 W/kg

SAR(1 g) = 0.311 W/kg; SAR(10 g) = 0.140 W/kg

Maximum value of SAR (measured) = 0.536 W/kg

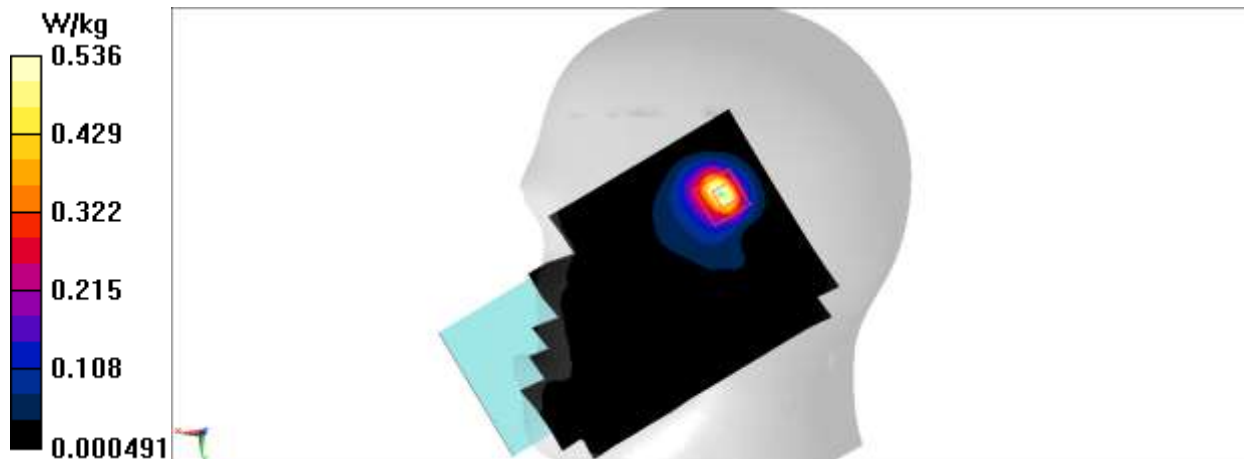


Fig A.13

CDMA BC0 Body ANT13

Date/Time: 12/23/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used: $f = 836.52$ MHz; $\sigma = 0.922$ S/m; $\epsilon_r = 44.136$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, CDMA BC0 (0) Frequency: 836.52 MHz Duty Cycle: 1:1

Probe: EX3DV4 – SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.242 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 11.08 V/m; Power Drift = -0.02 dB

Peak SAR (extrapolated) = 0.284 W/kg

SAR(1 g) = 0.166 W/kg; SAR(10 g) = 0.108 W/kg

Maximum value of SAR (measured) = 0.236 W/kg

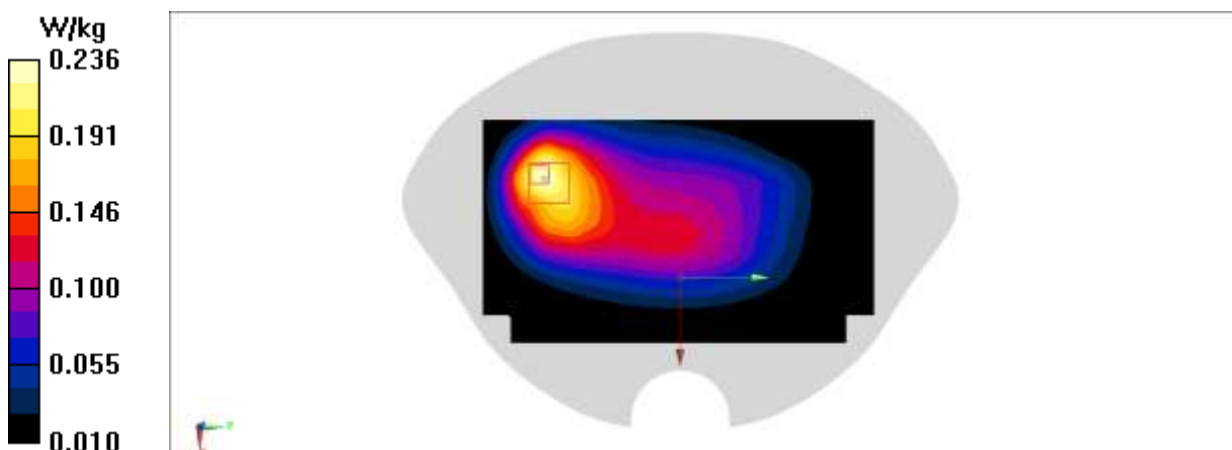


Fig A.14

GSM850 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 836.6$ MHz; $\sigma = 0.862$ S/m; $\epsilon_r = 43.773$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 850 GPRS-2 (0) Frequency: 836.6 MHz Duty Cycle: 1:4.00037

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.553 W/kg

Zoom Scan (6x6x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 15.45 V/m; Power Drift = -0.07 dB

Peak SAR (extrapolated) = 0.651 W/kg

SAR(1 g) = 0.387 W/kg; SAR(10 g) = 0.251 W/kg

Maximum value of SAR (measured) = 0.547 W/kg

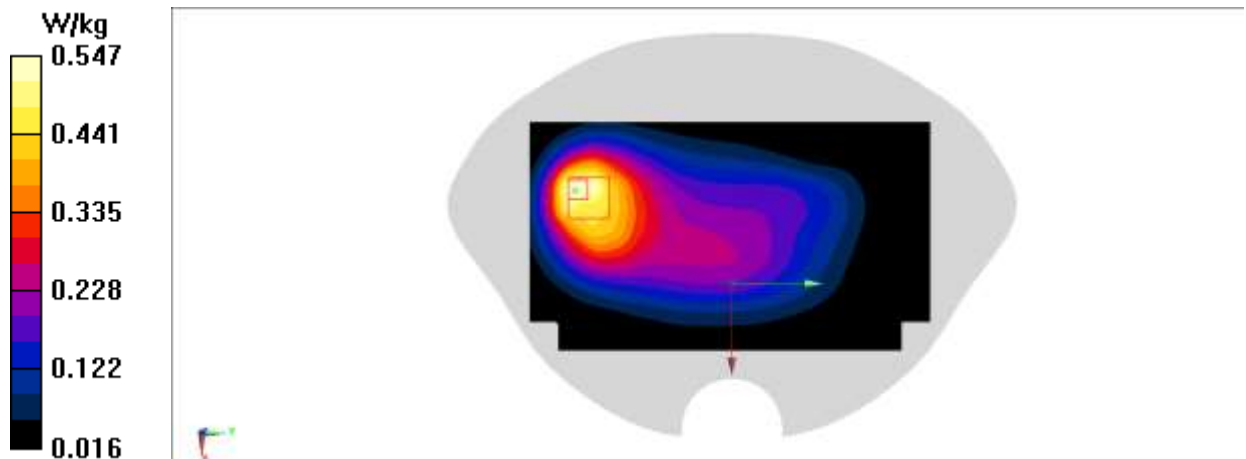


Fig A.15

GSM1900 Body ANT13

Date/Time: 1/6/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 1850.2$ MHz; $\sigma = 1.387$ S/m; $\epsilon_r = 39.531$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C

Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 1900 GPRS-2 (0) Frequency: 1850.2 MHz Duty Cycle: 1:4.00037

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.649 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 16.70 V/m; Power Drift = 0.07 dB

Peak SAR (extrapolated) = 0.792 W/kg

SAR(1 g) = 0.450 W/kg; SAR(10 g) = 0.232 W/kg

Maximum value of SAR (measured) = 0.679 W/kg

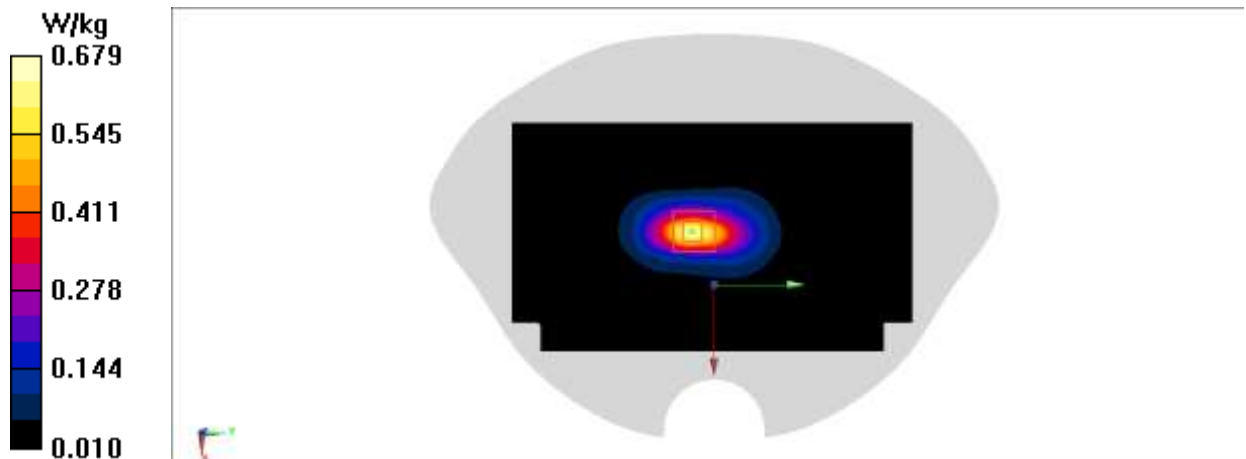


Fig A.16

GSM1900 Body ANT13

Date/Time: 12/30/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1910$ MHz; $\sigma = 1.382$ S/m; $\epsilon_r = 41.653$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 1900 GPRS-2 (0) Frequency: 1909.8 MHz Duty Cycle: 1:4.00037

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.654 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 4.340 V/m; Power Drift = 0.15 dB

Peak SAR (extrapolated) = 0.792 W/kg

SAR(1 g) = 0.462 W/kg; SAR(10 g) = 0.257 W/kg

Maximum value of SAR (measured) = 0.681 W/kg

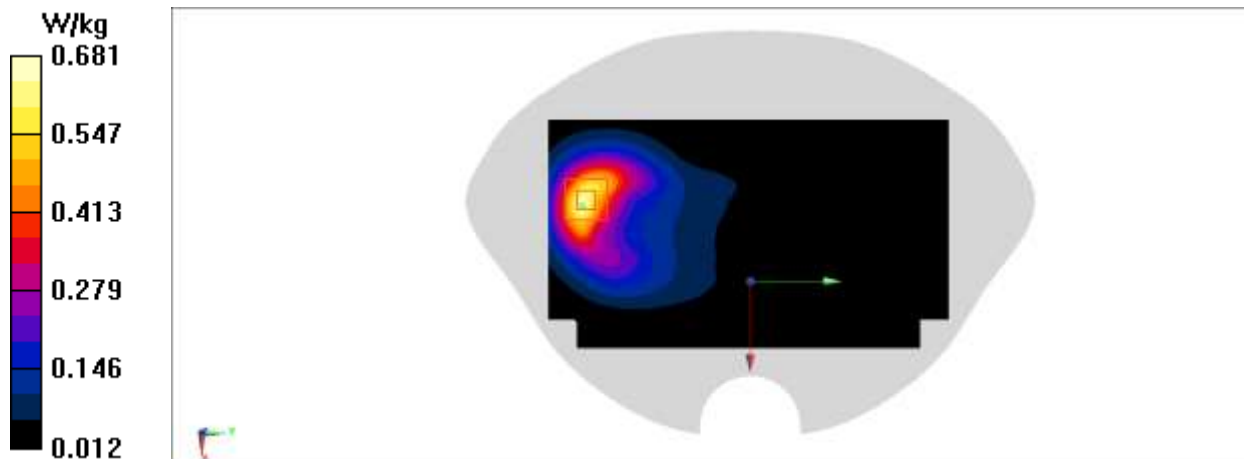


Fig A.17

WCDMA1900 Body ANT13

Date/Time: 12/30/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1880$ MHz; $\sigma = 1.359$ S/m; $\epsilon_r = 41.69$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1900 (0) Frequency: 1880 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.616 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 7.931 V/m; Power Drift = 0.04 dB

Peak SAR (extrapolated) = 0.747 W/kg

SAR(1 g) = 0.404 W/kg; SAR(10 g) = 0.204 W/kg

Maximum value of SAR (measured) = 0.631 W/kg

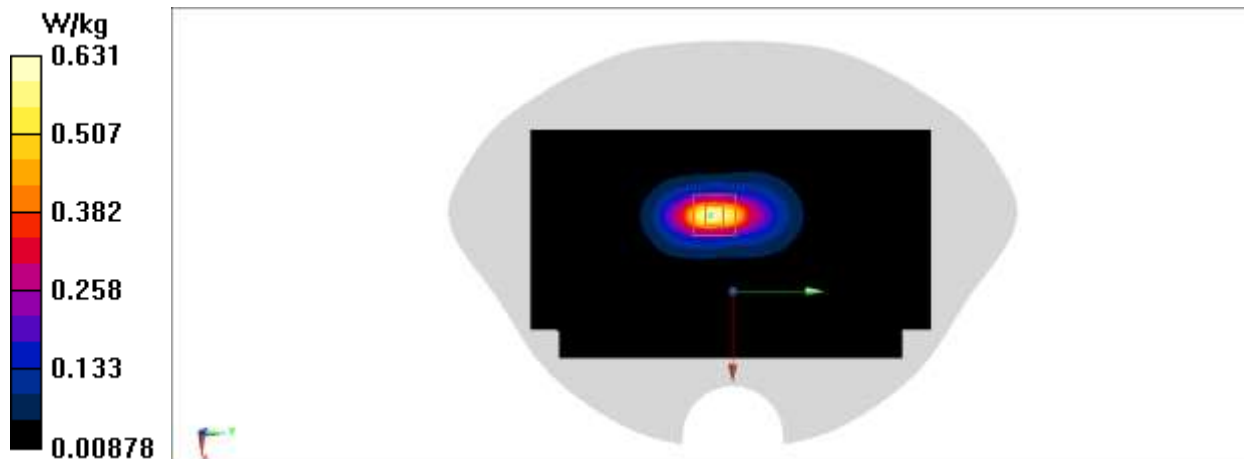


Fig A.18

WCDMA1900 Body ANT13

Date/Time: 12/30/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1880 \text{ MHz}$; $\sigma = 1.359 \text{ S/m}$; $\epsilon_r = 41.69$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1900 (0) Frequency: 1880 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.405 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 4.366 V/m; Power Drift = 0.01dB

Peak SAR (extrapolated) = 0.468 W/kg

SAR(1 g) = 0.284 W/kg; SAR(10 g) = 0.167 W/kg

Maximum value of SAR (measured) = 0.404 W/kg

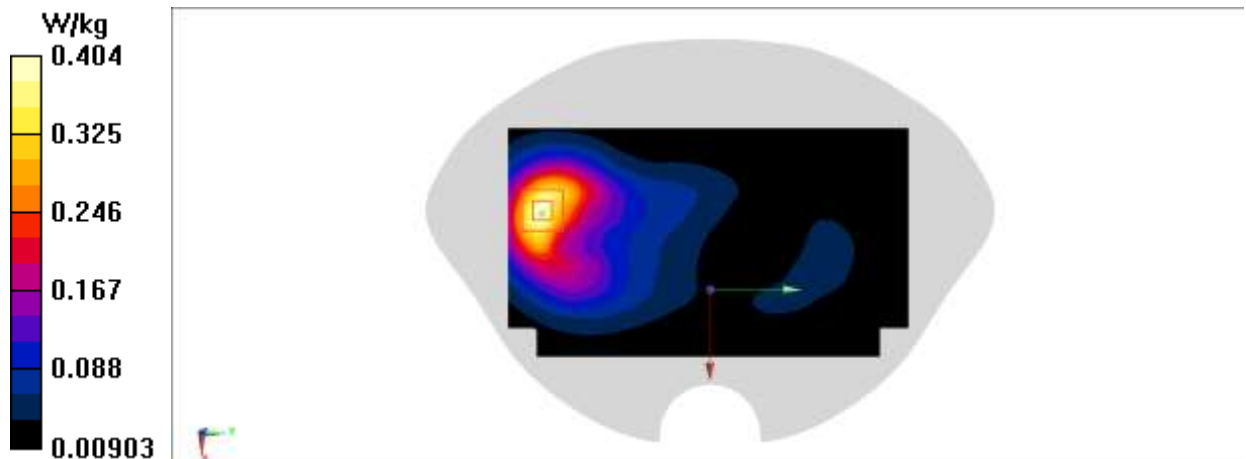


Fig A.19

WCDMA1700 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 1752.6$ MHz; $\sigma = 1.338$ S/m; $\epsilon_r = 41.888$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1700 Band4 (0) Frequency: 1752.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.437 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 13.80 V/m; Power Drift = -0.06 dB

Peak SAR (extrapolated) = 0.519 W/kg

SAR(1 g) = 0.287 W/kg; SAR(10 g) = 0.147 W/kg

Maximum value of SAR (measured) = 0.441 W/kg

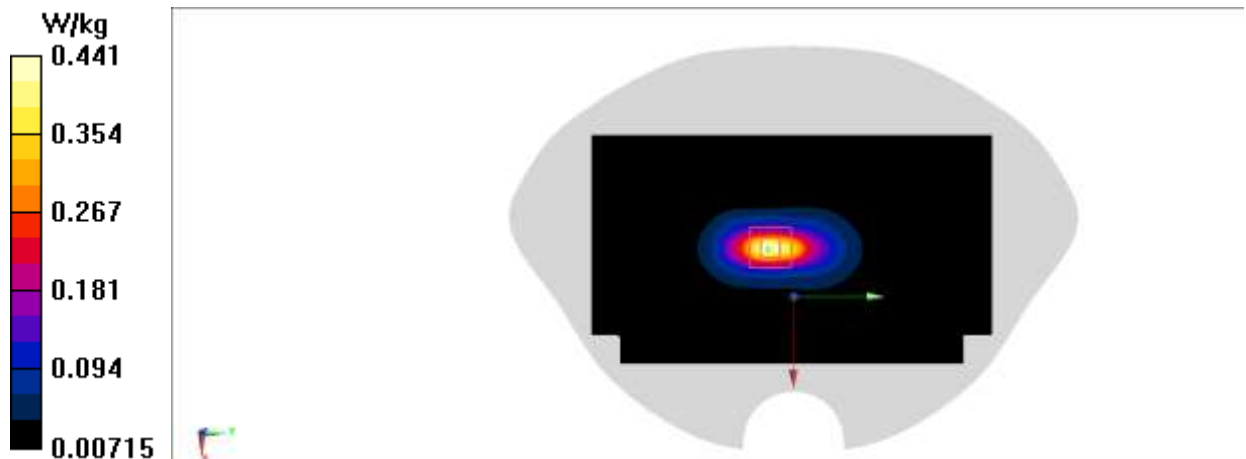


Fig A.20

WCDMA1700 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 1752.6$ MHz; $\sigma = 1.338$ S/m; $\epsilon_r = 41.888$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1700 Band4 (0) Frequency: 1752.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.578 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 4.983 V/m; Power Drift = 0.04 dB

Peak SAR (extrapolated) = 0.681 W/kg

SAR(1 g) = 0.402 W/kg; SAR(10 g) = 0.234 W/kg

Maximum value of SAR (measured) = 0.574 W/kg

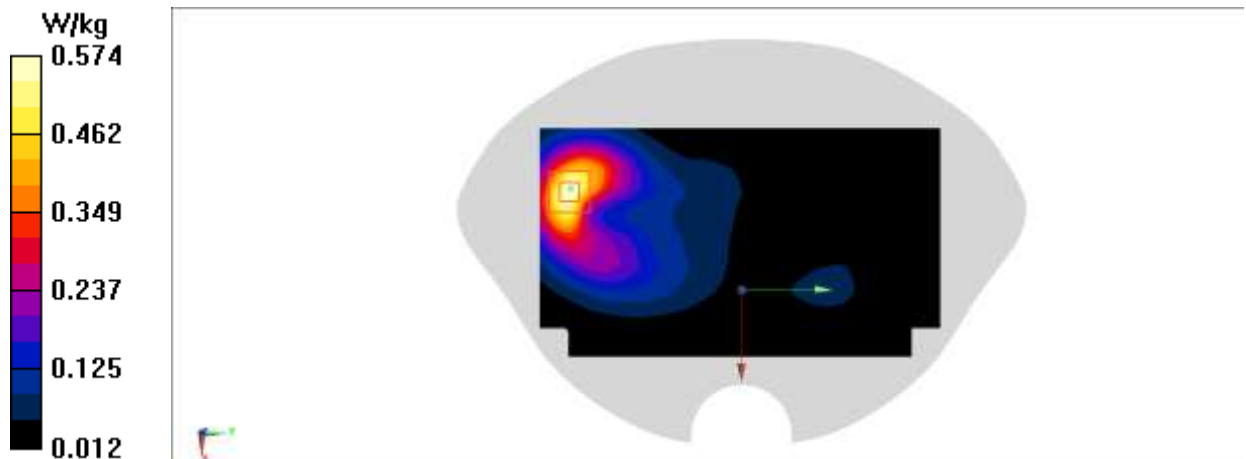


Fig A.21

WCDMA850 Body ANT13

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 836.6$ MHz; $\sigma = 0.836$ S/m; $\epsilon_r = 43.854$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 850 (0) Frequency: 836.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.323 W/kg

Zoom Scan (6x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 11.48 V/m; Power Drift = 0.06 dB

Peak SAR (extrapolated) = 0.403 W/kg

SAR(1 g) = 0.228 W/kg; SAR(10 g) = 0.147 W/kg

Maximum value of SAR (measured) = 0.328 W/kg

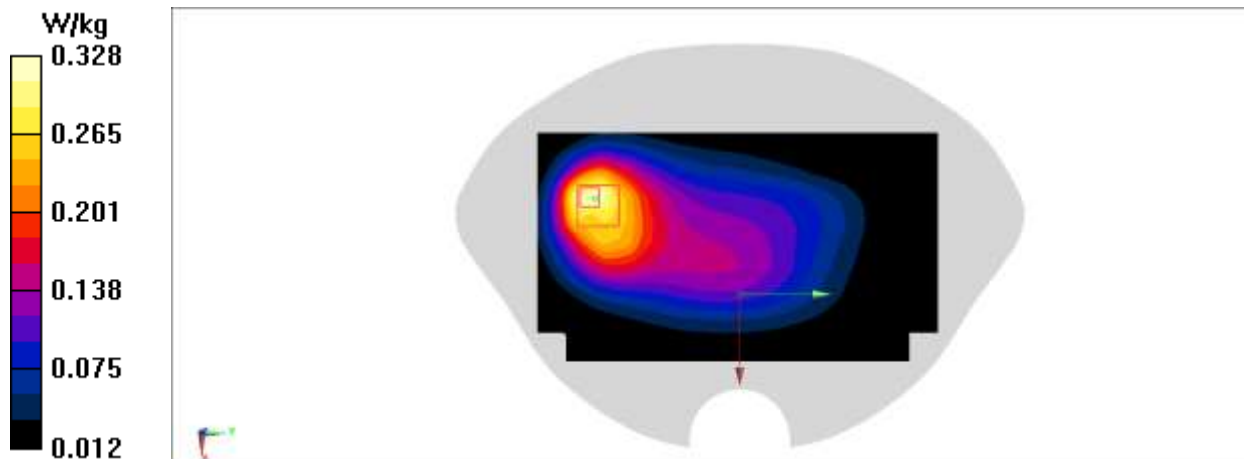


Fig A.22

LTE Band2 Body ANT13

Date/Time: 12/30/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1860$ MHz; $\sigma = 1.346$ S/m; $\epsilon_r = 41.712$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band2(20MB) (0) Frequency: 1860 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.559 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 14.80 V/m; Power Drift = 0.02 dB

Peak SAR (extrapolated) = 0.733 W/kg

SAR(1 g) = 0.408 W/kg; SAR(10 g) = 0.208 W/kg

Maximum value of SAR (measured) = 0.612 W/kg

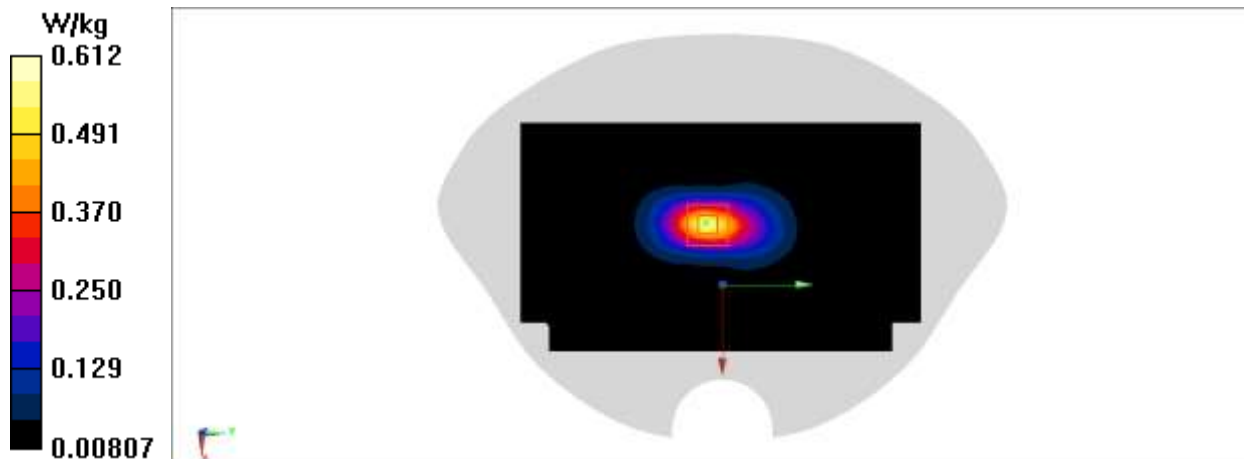


Fig A.23

LTE Band2 Body ANT13

Date/Time: 12/28/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1880$ MHz; $\sigma = 1.422$ S/m; $\epsilon_r = 41.80$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band2(20MB) (0) Frequency: 1880 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.541 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 5.057 V/m; Power Drift = -0.09 dB

Peak SAR (extrapolated) = 0.636 W/kg

SAR(1 g) = 0.379 W/kg; SAR(10 g) = 0.216 W/kg

Maximum value of SAR (measured) = 0.546 W/kg

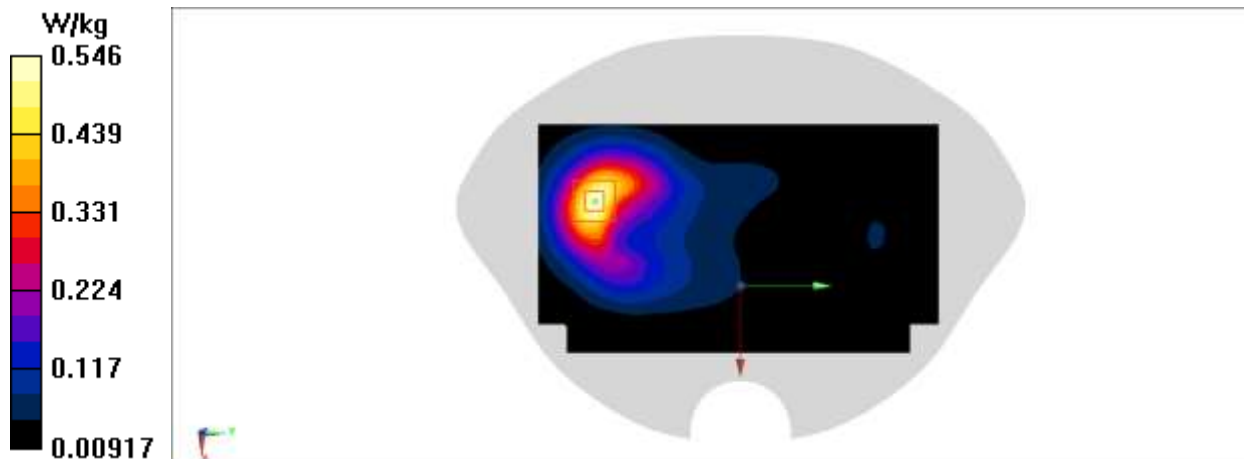


Fig A.24

LTE Band4 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1720$ MHz; $\sigma = 1.317$ S/m; $\epsilon_r = 41.958$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band4 (0) Frequency: 1720 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.488 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 13.69 V/m; Power Drift = -0.02 dB

Peak SAR (extrapolated) = 0.621 W/kg

SAR(1 g) = 0.343 W/kg; SAR(10 g) = 0.175 W/kg

Maximum value of SAR (measured) = 0.528 W/kg

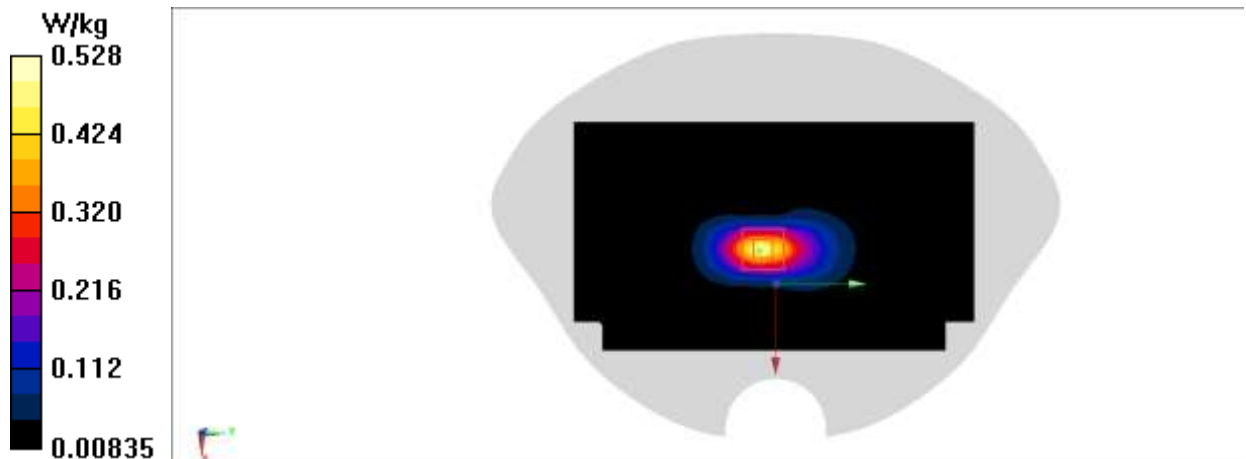


Fig A.25

LTE Band4 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1720$ MHz; $\sigma = 1.317$ S/m; $\epsilon_r = 41.958$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band4 (0) Frequency: 1720 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.652 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 5.907 V/m; Power Drift = 0.01 dB

Peak SAR (extrapolated) = 0.851 W/kg

SAR(1 g) = 0.496 W/kg; SAR(10 g) = 0.280 W/kg

Maximum value of SAR (measured) = 0.728 W/kg

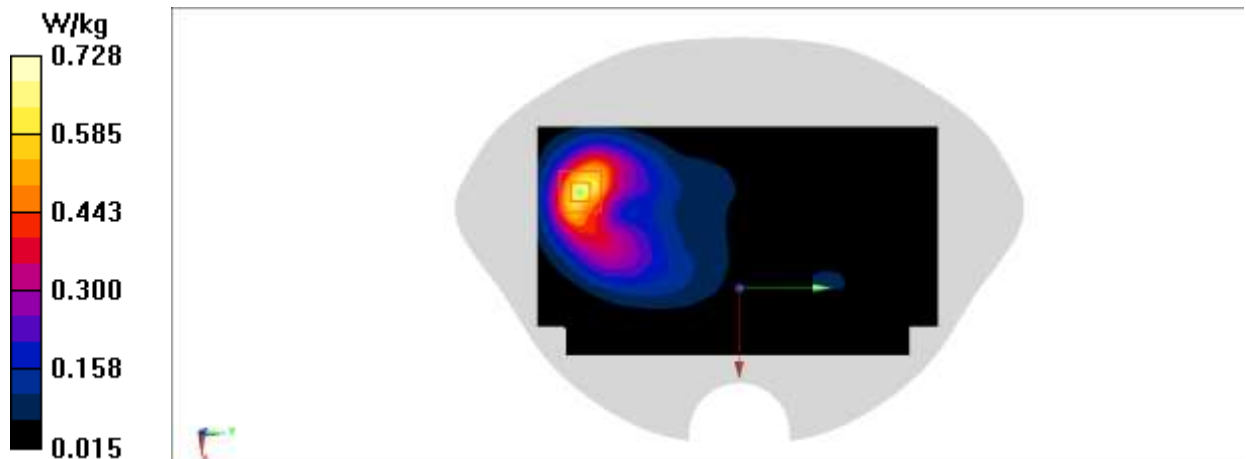


Fig A.26

LTE Band5 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 829 \text{ MHz}$; $\sigma = 0.855 \text{ S/m}$; $\epsilon_r = 43.871$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band5 (0) Frequency: 829 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.240 W/kg

Zoom Scan (6x5x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 10.87 V/m; Power Drift = 0.10 dB

Peak SAR (extrapolated) = 0.282 W/kg

SAR(1 g) = 0.166 W/kg; SAR(10 g) = 0.108 W/kg

Maximum value of SAR (measured) = 0.229 W/kg

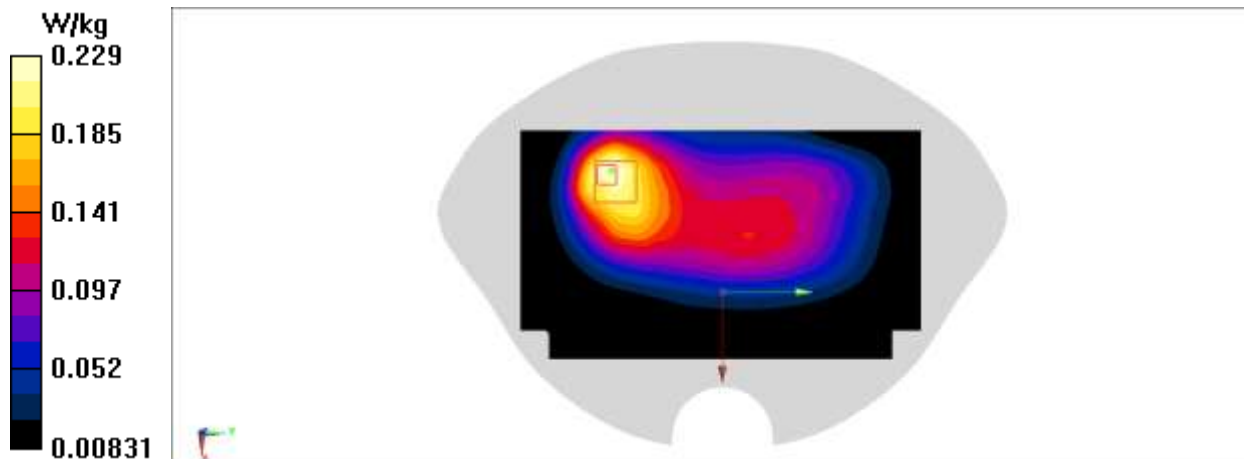


Fig A.27

LTE Band7 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.979$ S/m; $\epsilon_r = 38.159$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band7-20M (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.628 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 10.23 V/m; Power Drift = -0.08 dB

Peak SAR (extrapolated) = 0.738 W/kg

SAR(1 g) = 0.358 W/kg; SAR(10 g) = 0.158 W/kg

Maximum value of SAR (measured) = 0.601 W/kg

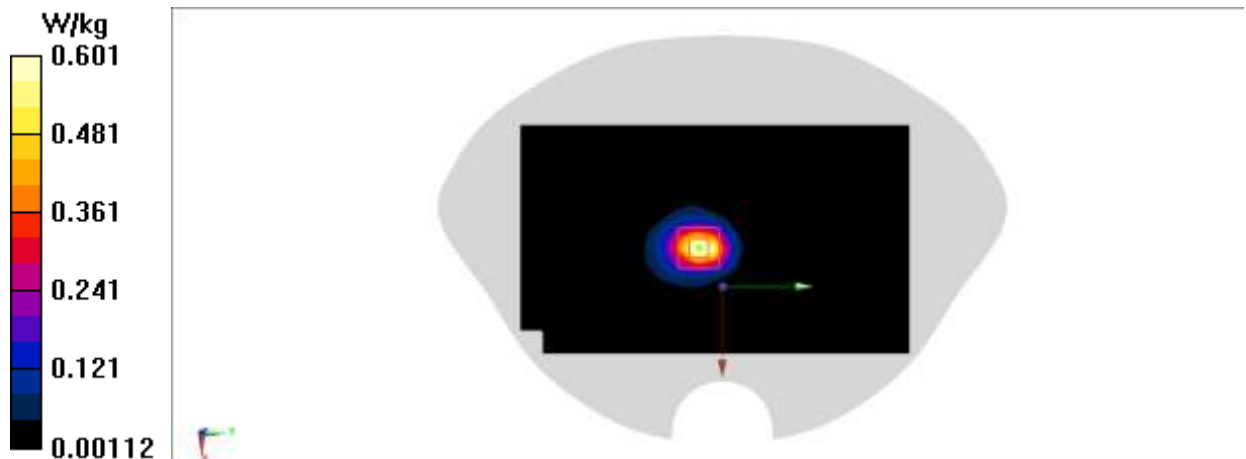


Fig A.28

LTE Band7 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.979$ S/m; $\epsilon_r = 38.159$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band7-20M (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.857 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 3.112 V/m; Power Drift = 0.08 dB

Peak SAR (extrapolated) = 1.02 W/kg

SAR(1 g) = 0.553 W/kg; SAR(10 g) = 0.258 W/kg

Maximum value of SAR (measured) = 0.843 W/kg

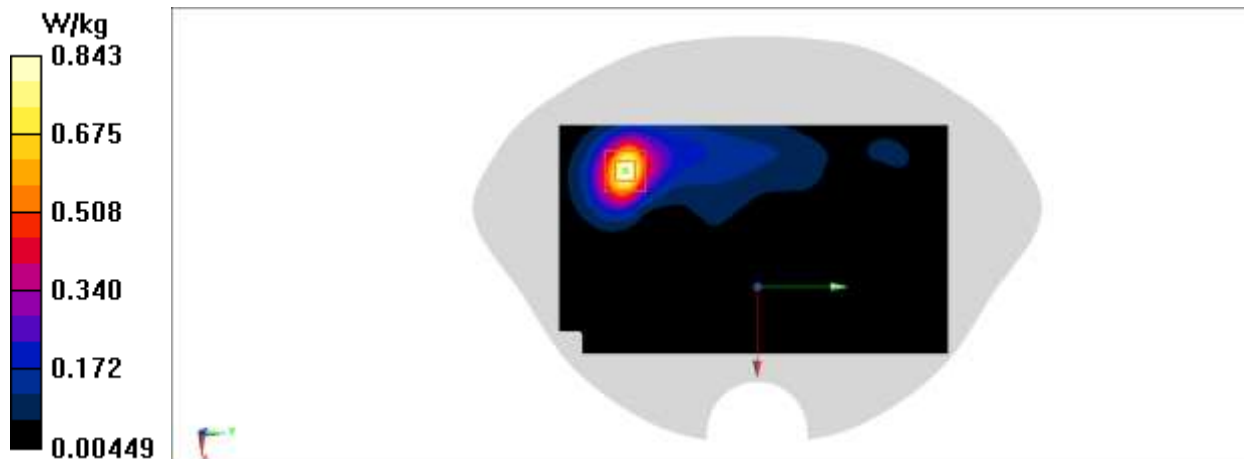


Fig A.29

LTE Band12 Body ANT13

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 704 \text{ MHz}$; $\sigma = 0.808 \text{ S/m}$; $\epsilon_r = 44.542$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band12 (0) Frequency: 704 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.81, 9.81, 9.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.133 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 11.19 V/m; Power Drift = 0.03 dB

Peak SAR (extrapolated) = 0.143 W/kg

SAR(1 g) = 0.111 W/kg; SAR(10 g) = 0.088 W/kg

Maximum value of SAR (measured) = 0.132 W/kg

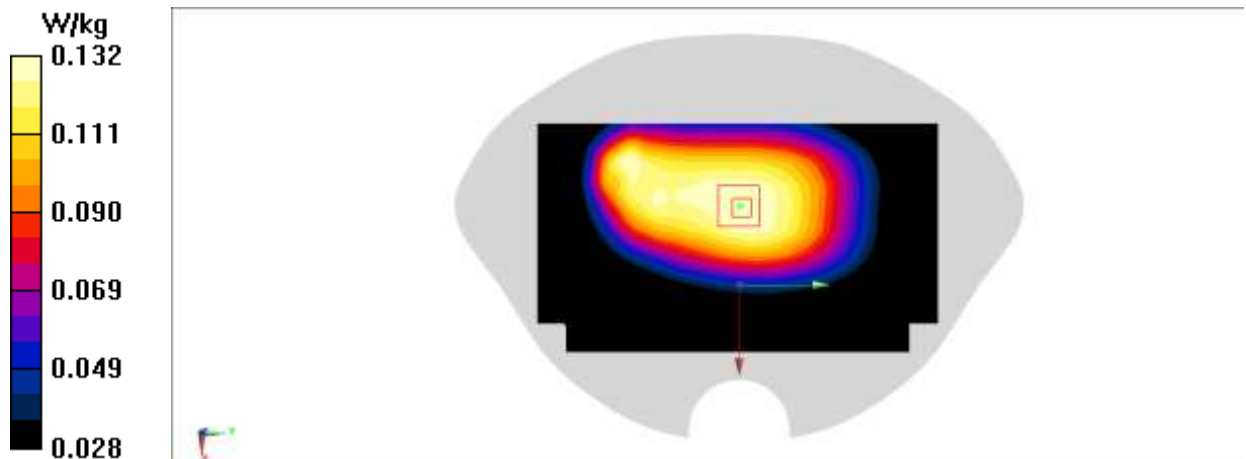


Fig A.30

LTE Band38 Body ANT13

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2580$ MHz; $\sigma = 1.948$ S/m; $\epsilon_r = 40.339$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band38 20M (0) Frequency: 2580 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.427 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 7.899 V/m; Power Drift = -0.02 dB

Peak SAR (extrapolated) = 0.494 W/kg

SAR(1 g) = 0.241 W/kg; SAR(10 g) = 0.106 W/kg

Maximum value of SAR (measured) = 0.401 W/kg

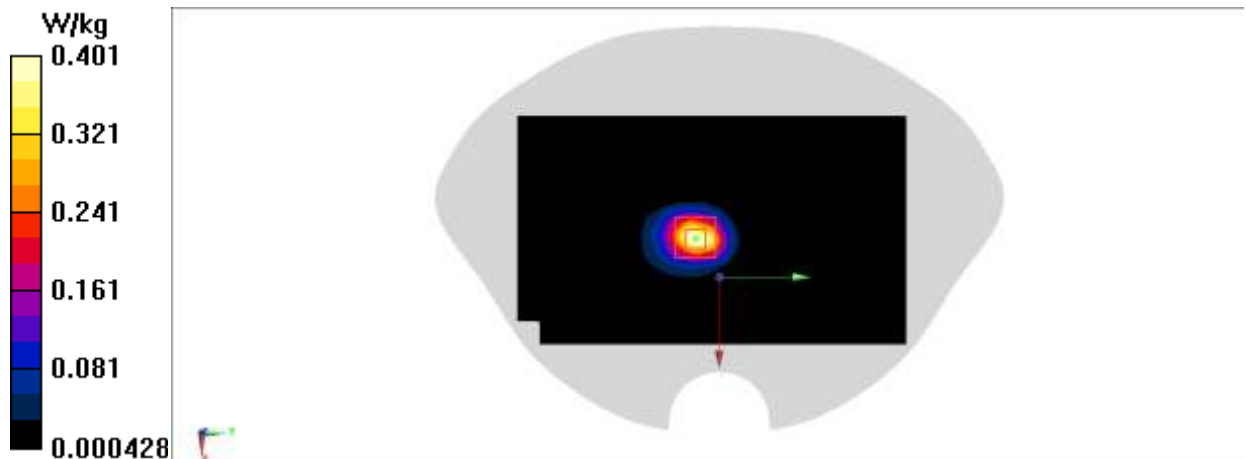


Fig A.31

LTE Band38 Body ANT13

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2610$ MHz; $\sigma = 1.975$ S/m; $\epsilon_r = 40.251$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band38 20M (0) Frequency: 2610 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.515 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 3.489 V/m; Power Drift = 0.04 dB

Peak SAR (extrapolated) = 0.653 W/kg

SAR(1 g) = 0.327 W/kg; SAR(10 g) = 0.157 W/kg

Maximum value of SAR (measured) = 0.532 W/kg

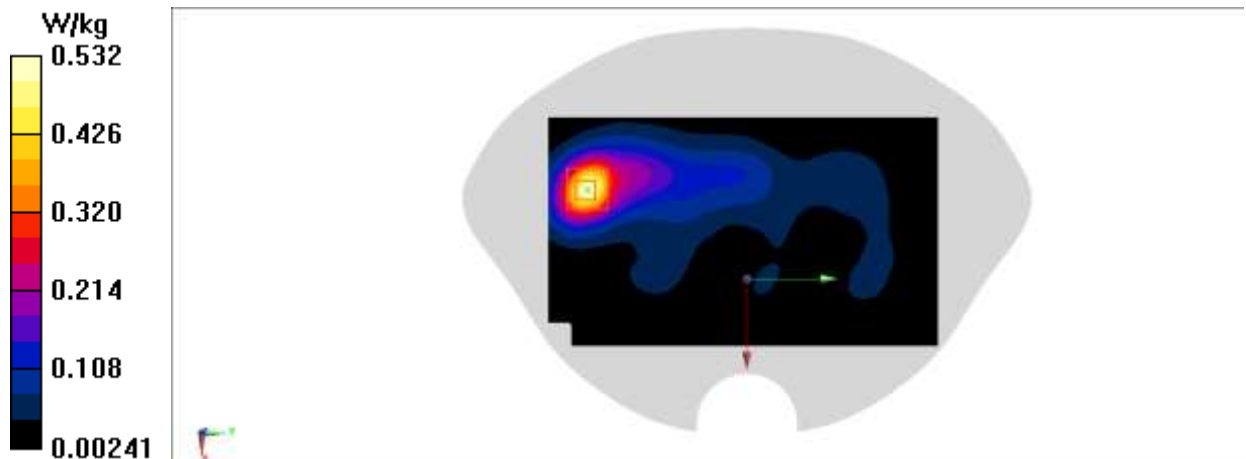


Fig A.32

LTE Band41 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2680$ MHz; $\sigma = 2.091$ S/m; $\epsilon_r = 37.843$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band41 (0) Frequency: 2680 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.231 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 5.255 V/m; Power Drift = -0.12 dB

Peak SAR (extrapolated) = 0.290 W/kg

SAR(1 g) = 0.133 W/kg; SAR(10 g) = 0.056 W/kg

Maximum value of SAR (measured) = 0.231 W/kg

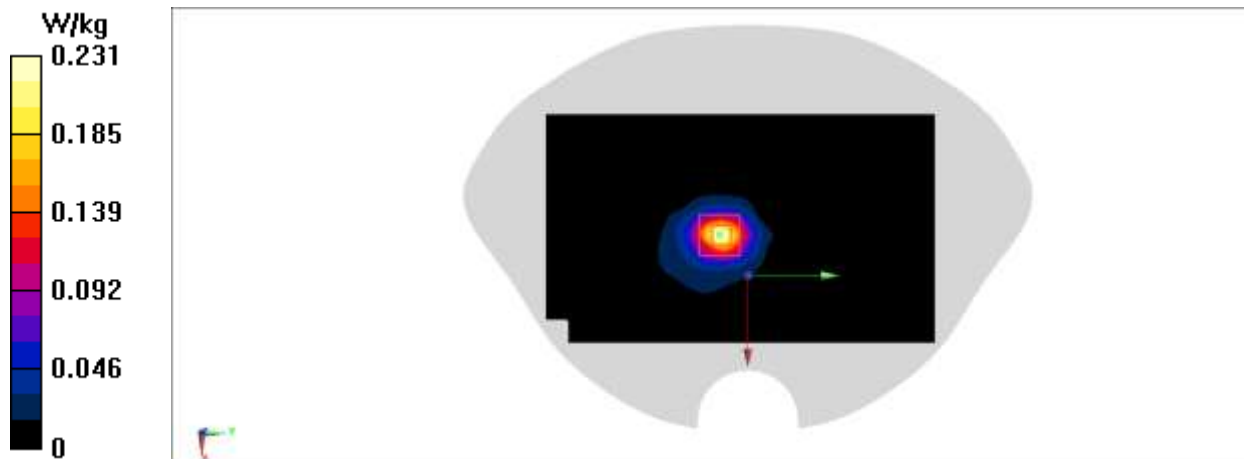


Fig A.33

LTE Band41 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 2636.5$ MHz; $\sigma = 2.051$ S/m; $\epsilon_r = 37.983$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band41 (0) Frequency: 2636.5 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.476 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 3.841 V/m; Power Drift = 0.07 dB

Peak SAR (extrapolated) = 0.602 W/kg

SAR(1 g) = 0.298 W/kg; SAR(10 g) = 0.144 W/kg

Maximum value of SAR (measured) = 0.480 W/kg

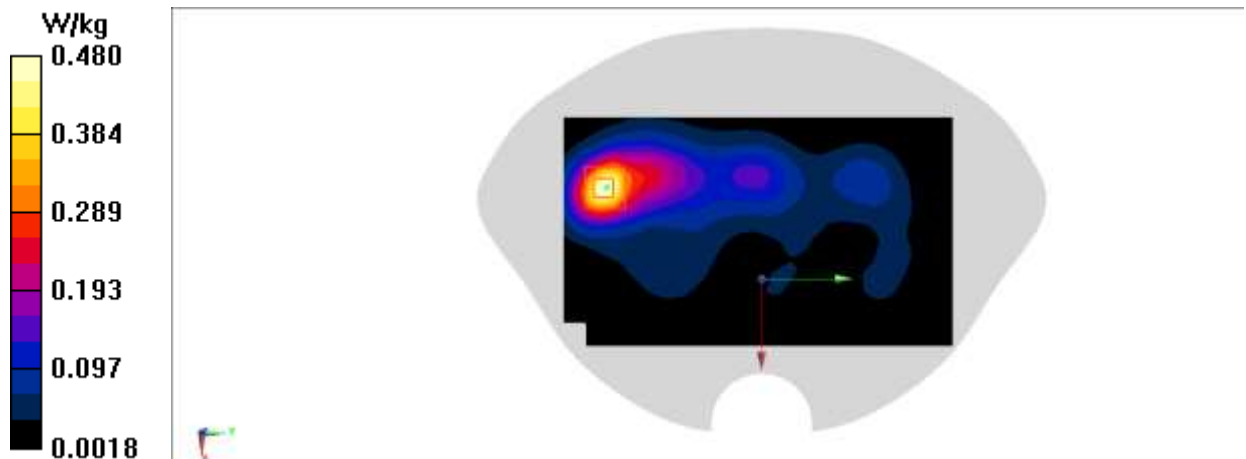


Fig A.34

CDMA BC0 Head ANT41

Date/Time: 12/23/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used: $f = 848.31$ MHz; $\sigma = 0.934$ S/m; $\epsilon_r = 43.956$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, CDMA BC0 (0) Frequency: 848.31 MHz Duty Cycle: 1:1

Probe: EX3DV4 – SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.201 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 4.268 V/m; Power Drift = -0.16 dB

Peak SAR (extrapolated) = 0.215 W/kg

SAR(1 g) = 0.168 W/kg; SAR(10 g) = 0.135 W/kg

Maximum value of SAR (measured) = 0.198 W/kg

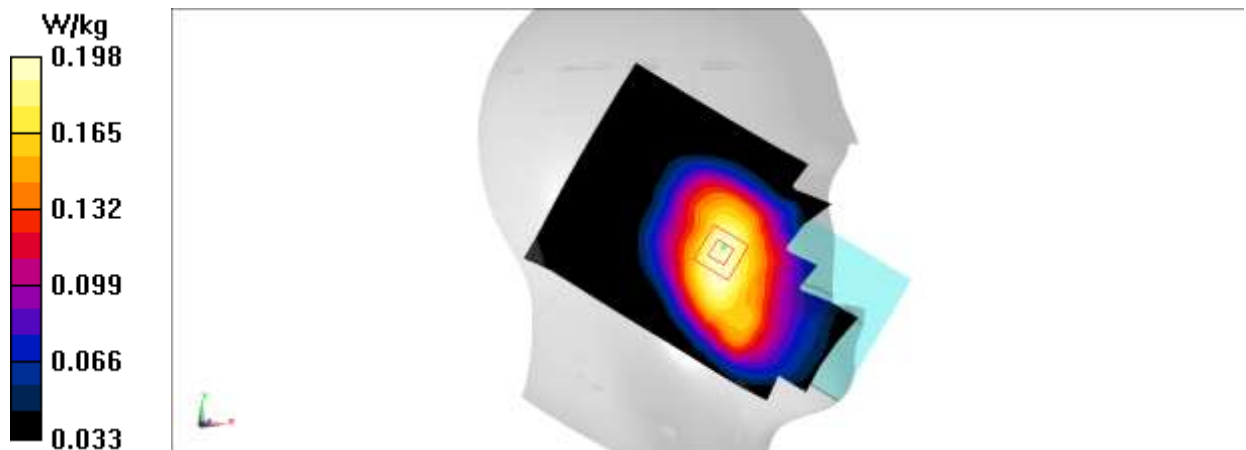


Fig A.35

GSM850 Head ANT41

Date/Time: 1/7/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 836.6$ MHz; $\sigma = 0.842$ S/m; $\epsilon_r = 43.519$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 850 (0) Frequency: 836.6 MHz Duty Cycle: 1:8.30042

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.249 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 4.226 V/m; Power Drift = 0.09 dB

Peak SAR (extrapolated) = 0.273 W/kg

SAR(1 g) = 0.212 W/kg; SAR(10 g) = 0.167 W/kg

Maximum value of SAR (measured) = 0.250 W/kg

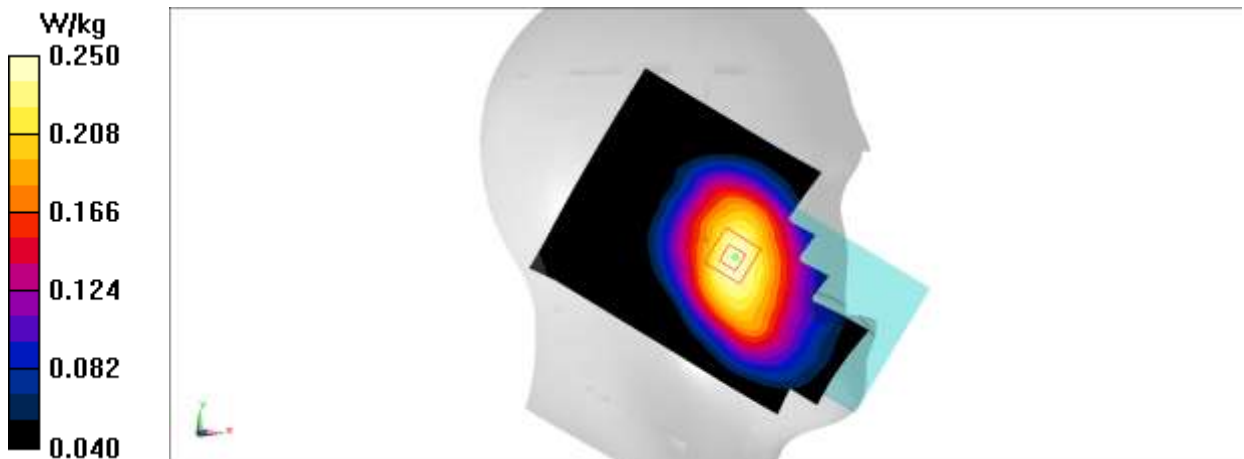


Fig A.36

GSM1900 Head ANT31

Date/Time: 1/6/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 1850.2$ MHz; $\sigma = 1.395$ S/m; $\epsilon_r = 39.447$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C

Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 1900 (0) Frequency: 1850.2 MHz Duty Cycle: 1:8.30042

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.130 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 2.450 V/m; Power Drift = 0.06 dB

Peak SAR (extrapolated) = 0.153 W/kg

SAR(1 g) = 0.099 W/kg; SAR(10 g) = 0.061 W/kg

Maximum value of SAR (measured) = 0.133 W/kg

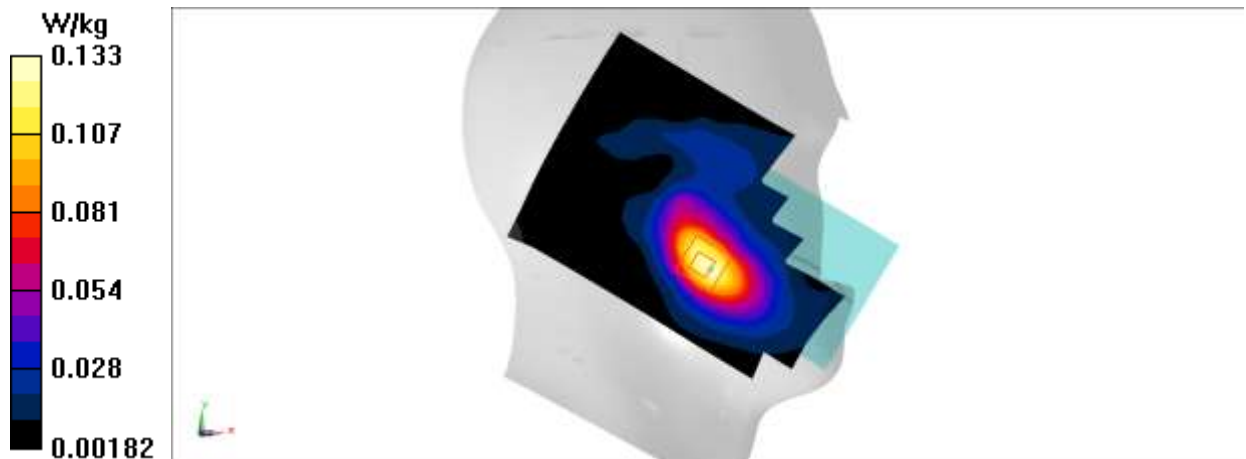


Fig A.37

WCDMA1900 Head ANT31

Date/Time: 1/4/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1880$ MHz; $\sigma = 1.428$ S/m; $\epsilon_r = 39.323$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1900 (0) Frequency: 1880 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500$ mm, $dy=1.500$ mm

Maximum value of SAR (interpolated) = 0.236 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8$ mm, $dy=8$ mm, $dz=5$ mm

Reference Value = 4.559 V/m; Power Drift = 0.03 dB

Peak SAR (extrapolated) = 0.269 W/kg

SAR(1 g) = 0.173 W/kg; SAR(10 g) = 0.108 W/kg

Maximum value of SAR (measured) = 0.237 W/kg

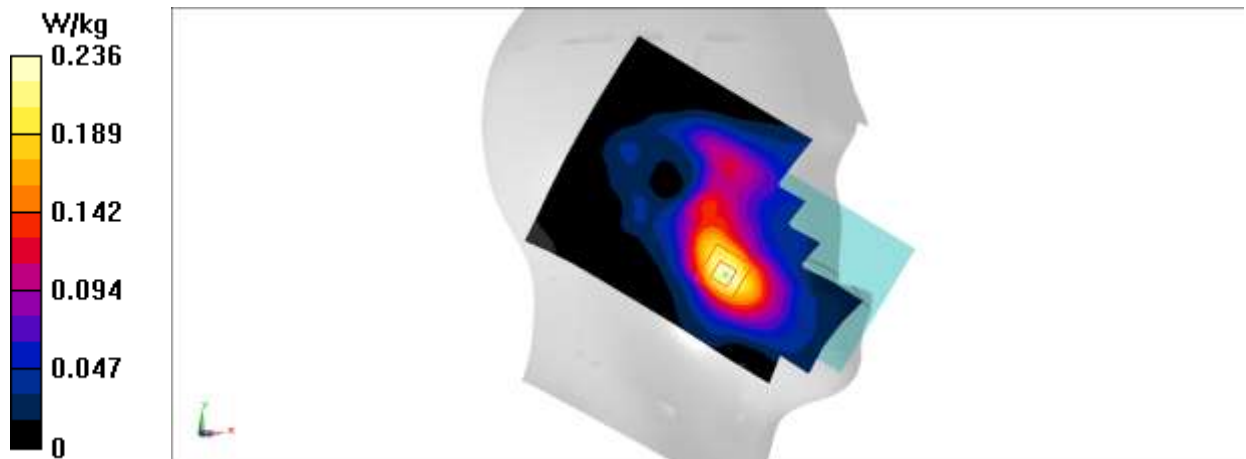


Fig A.38

WCDMA1700 Head ANT31

Date/Time: 12/30/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 1752.6$ MHz; $\sigma = 1.338$ S/m; $\epsilon_r = 42.024$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C

Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1700 Band4 (0) Frequency: 1752.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.360 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 3.893 V/m; Power Drift = 0.03 dB

Peak SAR (extrapolated) = 0.410 W/kg

SAR(1 g) = 0.266 W/kg; SAR(10 g) = 0.171 W/kg

Maximum value of SAR (measured) = 0.358 W/kg

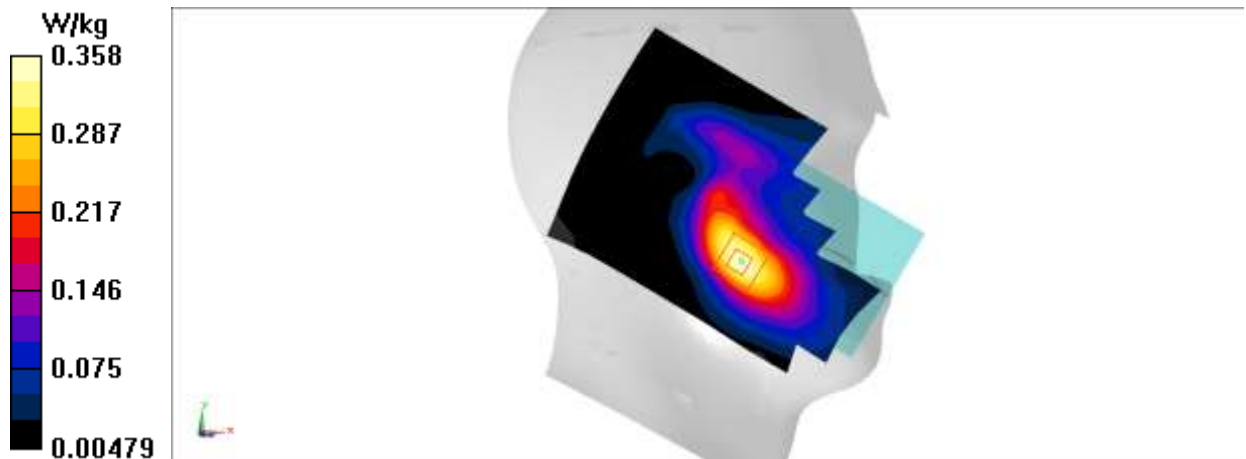


Fig A.39

WCDMA850 Head ANT41

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 846.6$ MHz; $\sigma = 0.845$ S/m; $\epsilon_r = 43.724$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 850 (0) Frequency: 846.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.295 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 5.150 V/m; Power Drift = -0.01 dB

Peak SAR (extrapolated) = 0.321 W/kg

SAR(1 g) = 0.246 W/kg; SAR(10 g) = 0.194 W/kg

Maximum value of SAR (measured) = 0.296 W/kg

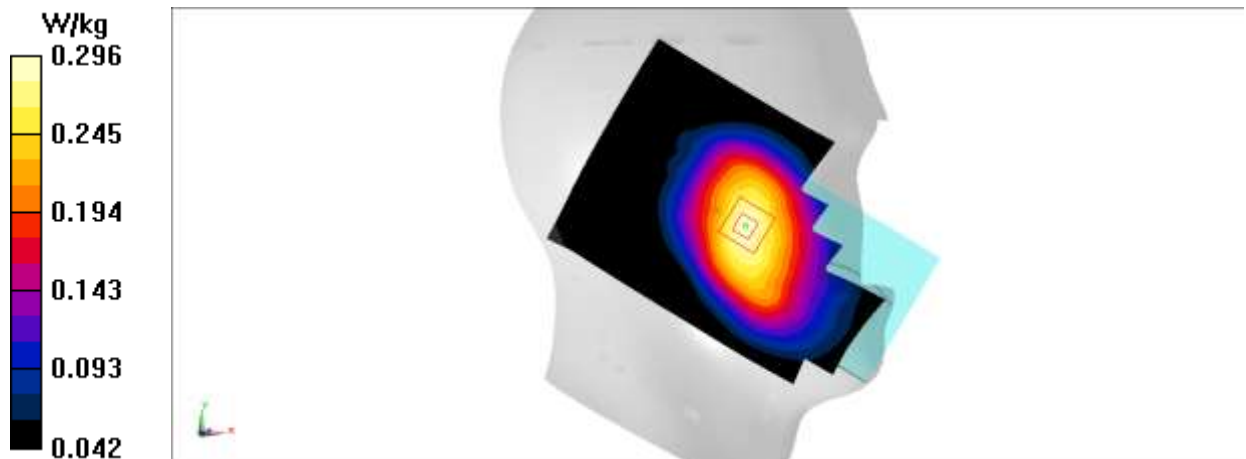


Fig A.40

LTE Band2 Head ANT31

Date/Time: 1/4/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1880$ MHz; $\sigma = 1.432$ S/m; $\epsilon_r = 39.463$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band2(20MB) (0) Frequency: 1880 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.236 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 4.435 V/m; Power Drift = -0.06 dB

Peak SAR (extrapolated) = 0.263 W/kg

SAR(1 g) = 0.170 W/kg; SAR(10 g) = 0.106 W/kg

Maximum value of SAR (measured) = 0.232 W/kg

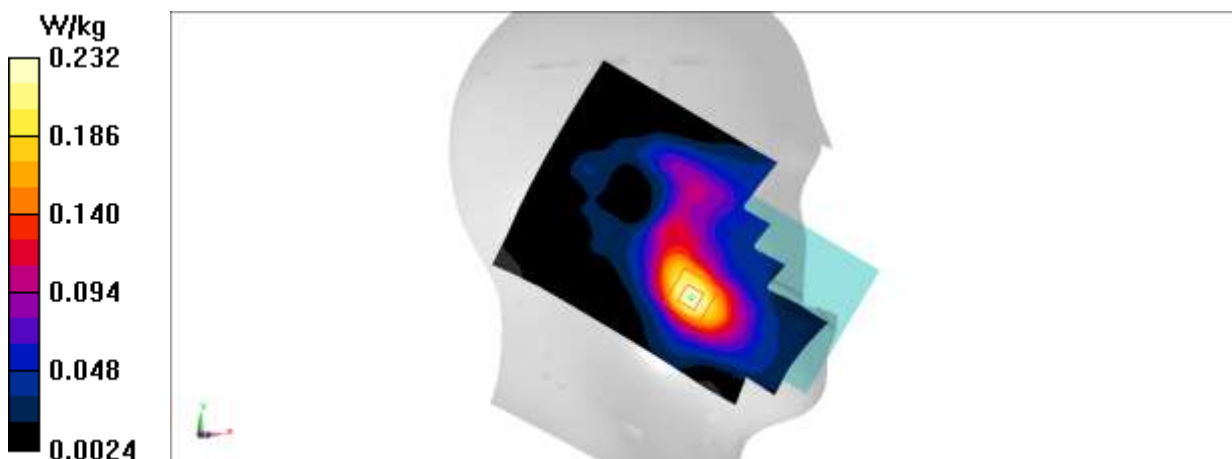


Fig A.41

LTE Band4 Head ANT31

Date/Time: 12/30/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1745$ MHz; $\sigma = 1.326$ S/m; $\epsilon_r = 42.069$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band4 (0) Frequency: 1745 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.267 W/kg

Zoom Scan (6x6x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 5.221 V/m; Power Drift = -0.04 dB

Peak SAR (extrapolated) = 0.290 W/kg

SAR(1 g) = 0.190 W/kg; SAR(10 g) = 0.125 W/kg

Maximum value of SAR (measured) = 0.245 W/kg

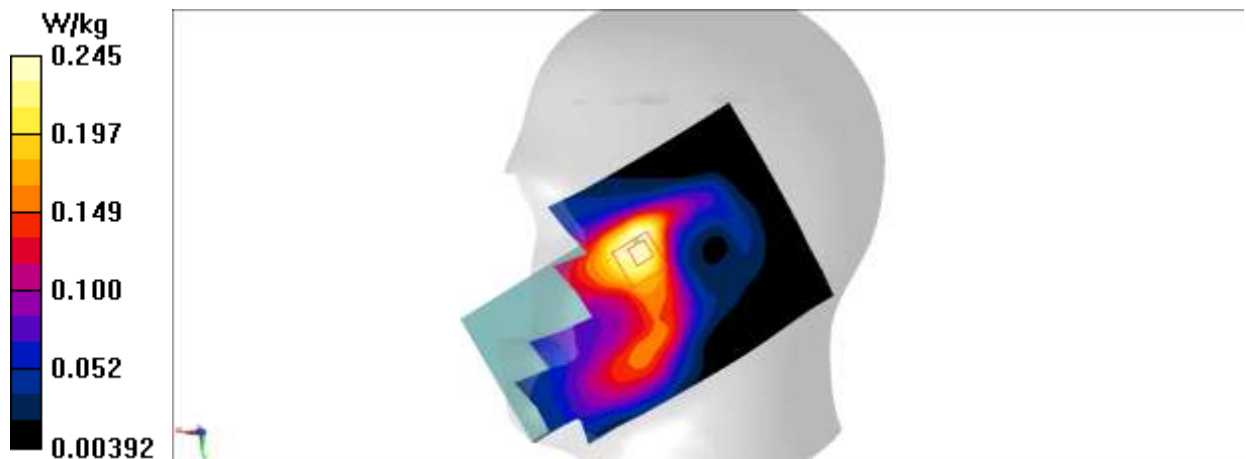


Fig A.42

LTE Band5 Head ANT41

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 829 \text{ MHz}$; $\sigma = 0.837 \text{ S/m}$; $\epsilon_r = 43.779$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band5 (0) Frequency: 829 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.249 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 4.268 V/m; Power Drift = 0.03 dB

Peak SAR (extrapolated) = 0.271 W/kg

SAR(1 g) = 0.207 W/kg; SAR(10 g) = 0.163 W/kg

Maximum value of SAR (measured) = 0.249 W/kg

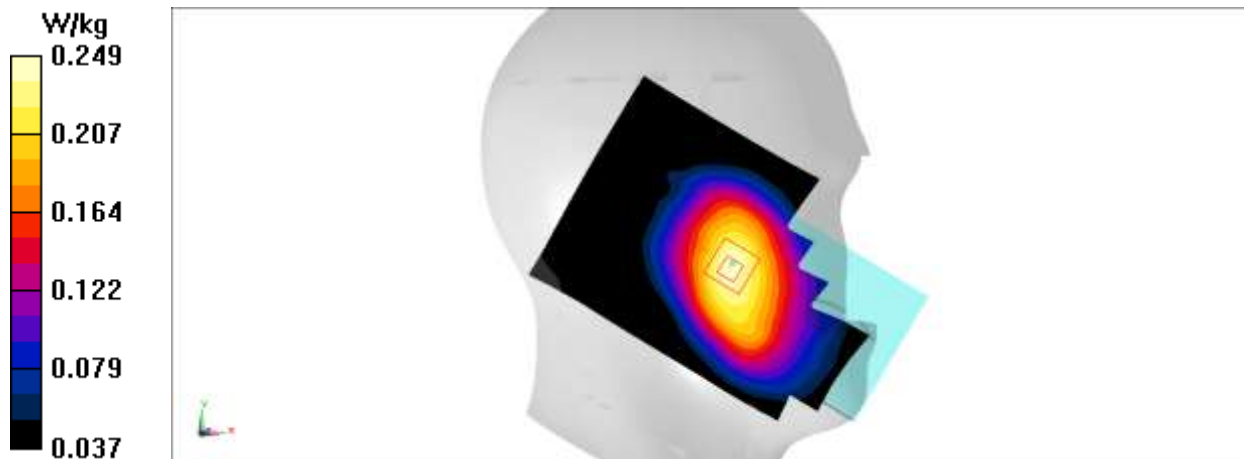


Fig A.43

LTE Band7 Head ANT31

Date/Time: 1/4/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.911$ S/m; $\epsilon_r = 39.98$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band7-20M (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.407 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.464 V/m; Power Drift = 0.03 dB

Peak SAR (extrapolated) = 0.440 W/kg

SAR(1 g) = 0.265 W/kg; SAR(10 g) = 0.146 W/kg

Maximum value of SAR (measured) = 0.375 W/kg

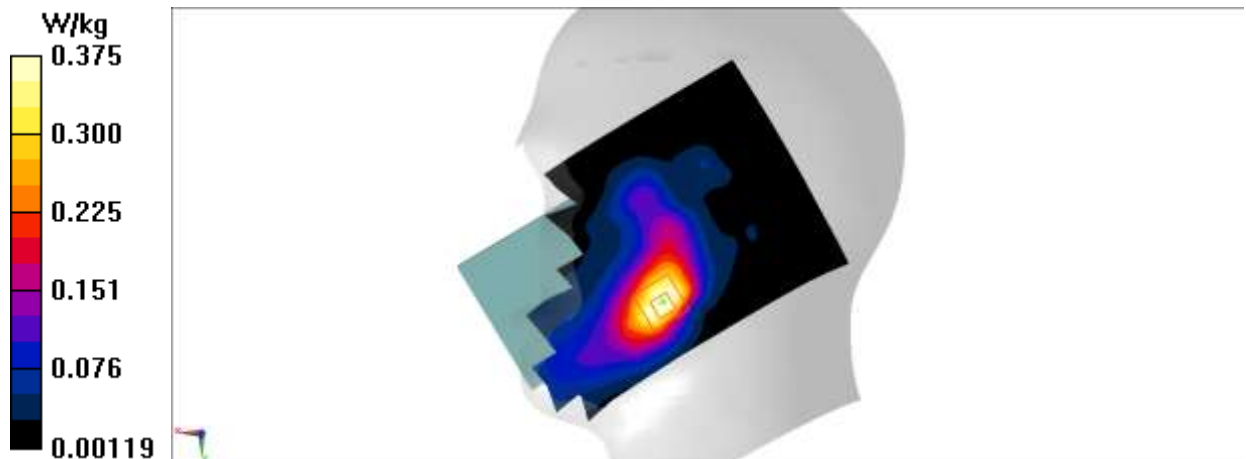


Fig A.44

LTE Band12 Head ANT41

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 704 \text{ MHz}$; $\sigma = 0.808 \text{ S/m}$; $\epsilon_r = 44.542$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band12 (0) Frequency: 704 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.81, 9.81, 9.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.149 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 3.715 V/m; Power Drift = 0.03dB

Peak SAR (extrapolated) = 0.165 W/kg

SAR(1 g) = 0.129 W/kg; SAR(10 g) = 0.104 W/kg

Maximum value of SAR (measured) = 0.151 W/kg

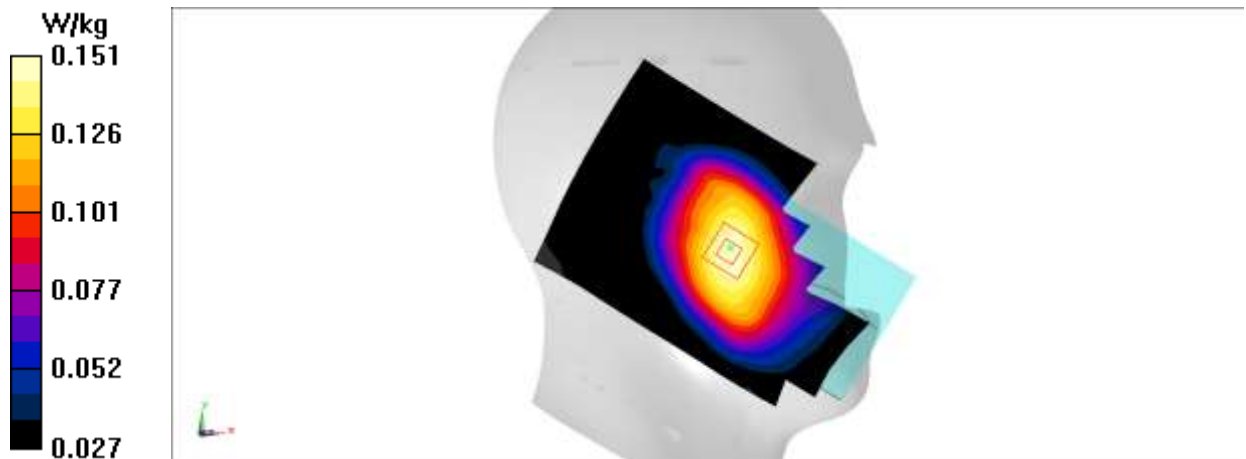


Fig A.45

LTE Band38 Head ANT31

Date/Time: 1/10/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2580$ MHz; $\sigma = 1.946$ S/m; $\epsilon_r = 40.33$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band38 20M (0) Frequency: 2580 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (91x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.236 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.132 V/m; Power Drift = 0.05 dB

Peak SAR (extrapolated) = 0.275 W/kg

SAR(1 g) = 0.161 W/kg; SAR(10 g) = 0.087 W/kg

Maximum value of SAR (measured) = 0.236 W/kg

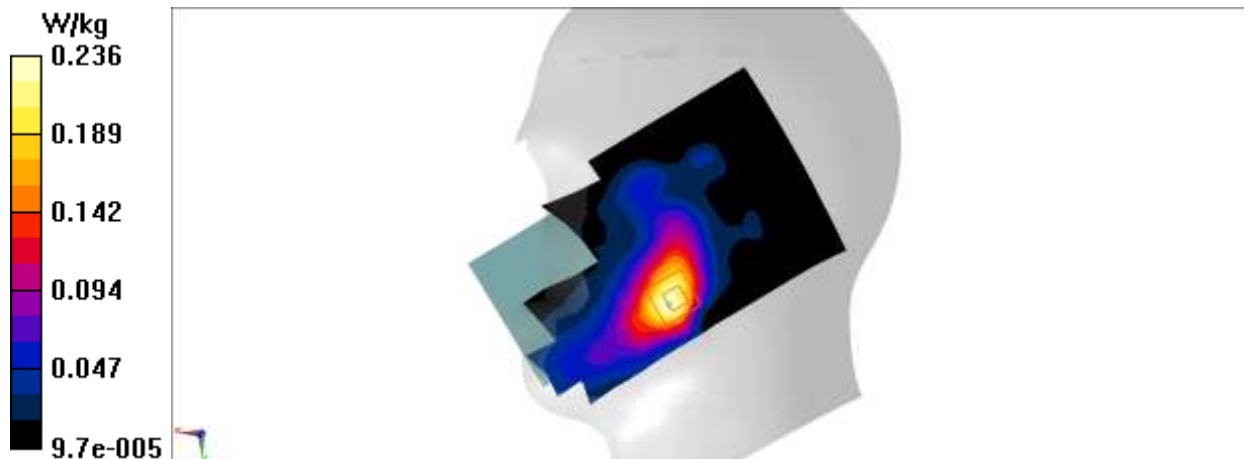


Fig A.46

LTE Band41 Head ANT31

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2680$ MHz; $\sigma = 2.09$ S/m; $\epsilon_r = 37.887$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band41 (0) Frequency: 2680 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (91x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.313 W/kg

Zoom Scan (7x8x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.281 V/m; Power Drift = 0.05 dB

Peak SAR (extrapolated) = 0.364 W/kg

SAR(1 g) = 0.209 W/kg; SAR(10 g) = 0.112 W/kg

Maximum value of SAR (measured) = 0.303 W/kg

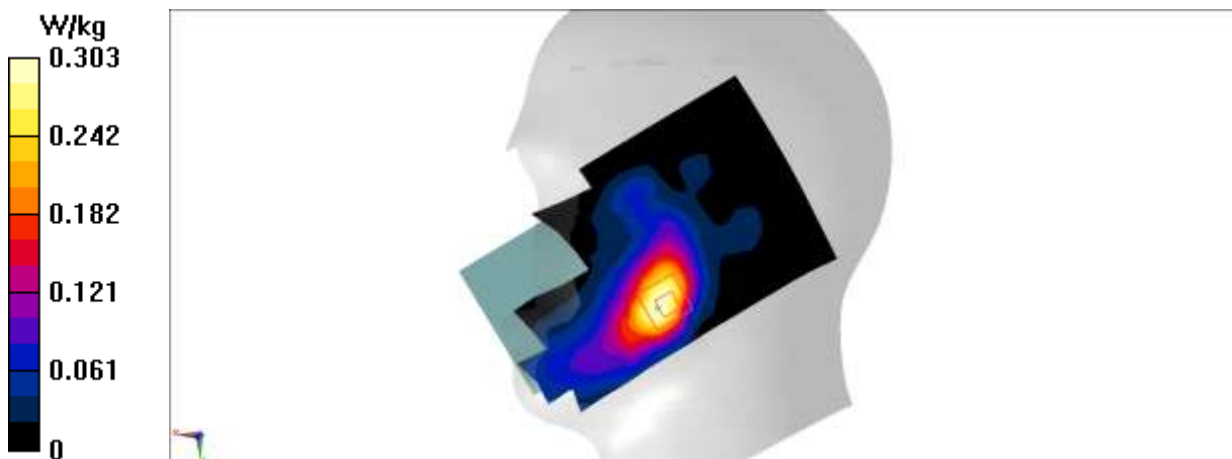


Fig A.47

CDMA BC0 Body ANT41

Date/Time: 12/23/2021

Electronics: DAE4 Sn1525

Medium: H700-6000

Medium parameters used: $f = 848.31$ MHz; $\sigma = 0.934$ S/m; $\epsilon_r = 43.956$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, CDMA BC0 (0) Frequency: 848.31 MHz Duty Cycle: 1:1

Probe: EX3DV4 – SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.440 W/kg

Zoom Scan (6x6x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 12.82 V/m; Power Drift = -0.05 dB

Peak SAR (extrapolated) = 0.504 W/kg

SAR(1 g) = 0.304 W/kg; SAR(10 g) = 0.192 W/kg

Maximum value of SAR (measured) = 0.427 W/kg

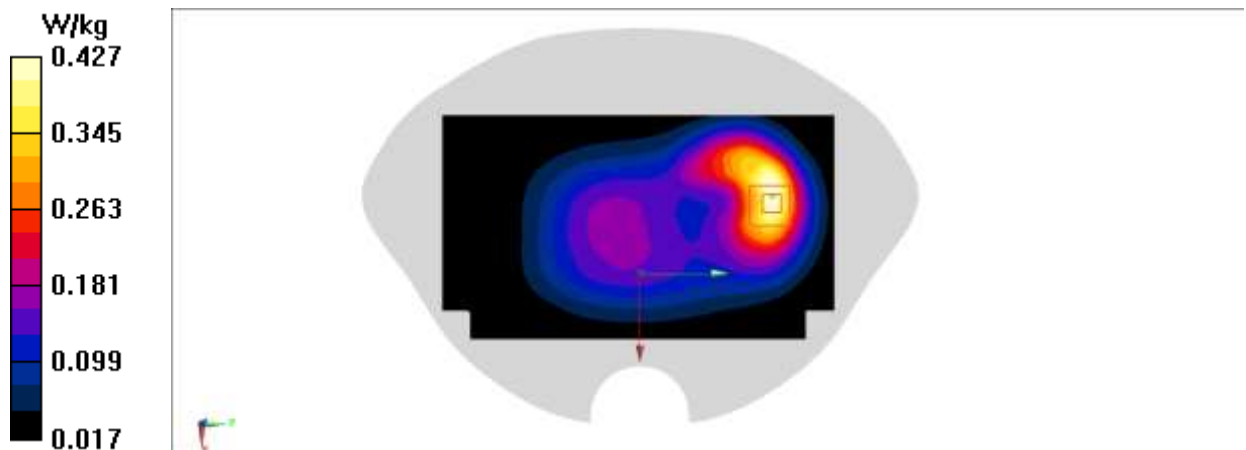


Fig A.48

GSM850 Body ANT41

Date/Time: 1/7/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 848.8$ MHz; $\sigma = 0.856$ S/m; $\epsilon_r = 43.329$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C

Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 850 GPRS-2 (0) Frequency: 848.8 MHz Duty Cycle: 1:4.00037

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500$ mm, $dy=1.500$ mm

Maximum value of SAR (interpolated) = 0.572 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8$ mm, $dy=8$ mm, $dz=5$ mm

Reference Value = 16.86 V/m; Power Drift = 0.09 dB

Peak SAR (extrapolated) = 0.653 W/kg

SAR(1 g) = 0.404 W/kg; SAR(10 g) = 0.262 W/kg

Maximum value of SAR (measured) = 0.557 W/kg

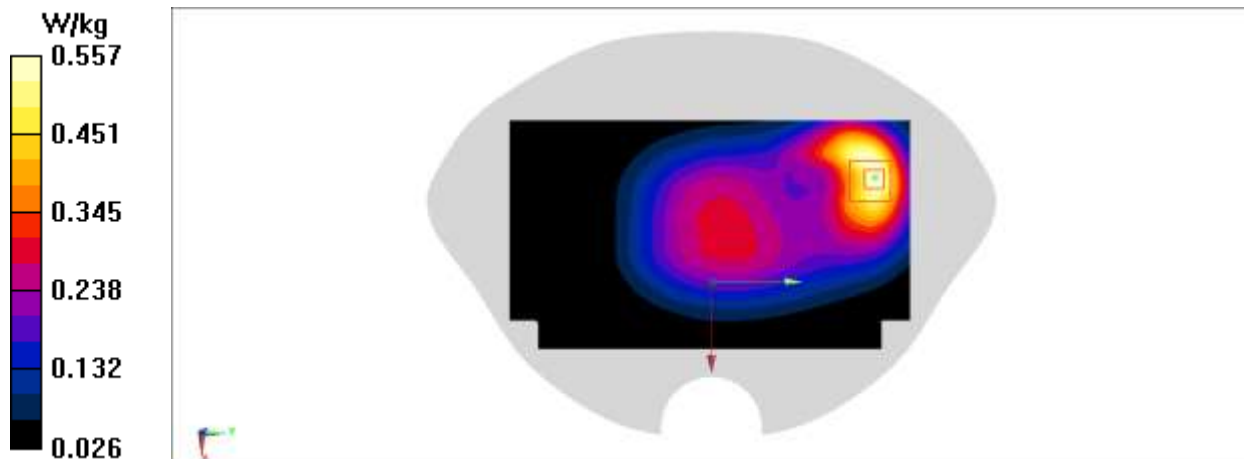


Fig A.49

GSM850 Body ANT41

Date/Time: 1/7/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 848.8$ MHz; $\sigma = 0.856$ S/m; $\epsilon_r = 43.329$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C

Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 850 GPRS-2 (0) Frequency: 848.8 MHz Duty Cycle: 1:4.00037

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.735 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 17.33 V/m; Power Drift = -0.15 dB

Peak SAR (extrapolated) = 0.868 W/kg

SAR(1 g) = 0.509 W/kg; SAR(10 g) = 0.319 W/kg.

Maximum value of SAR (measured) = 0.714 W/kg

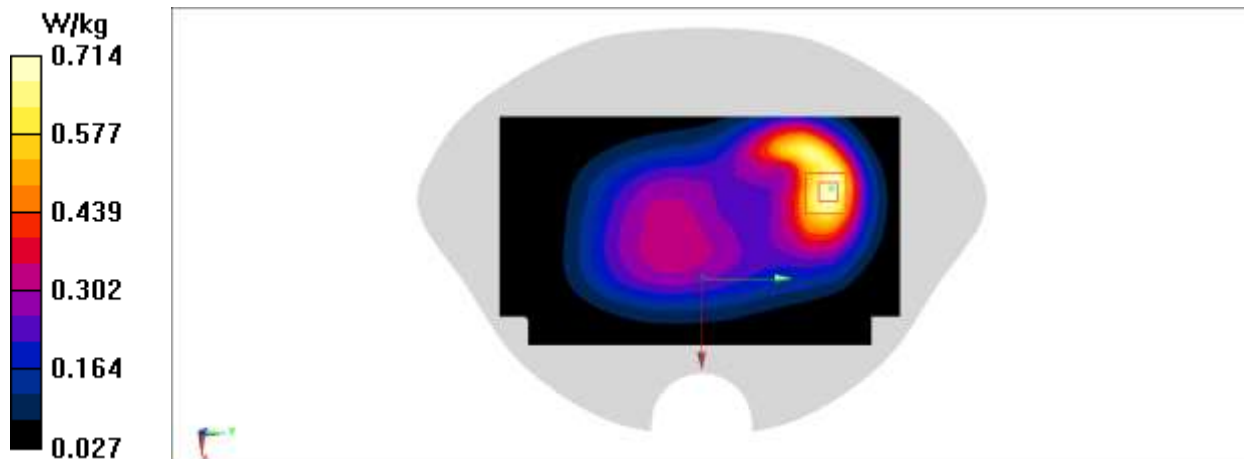


Fig A.50

GSM1900 Body ANT31

Date/Time: 1/6/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 1850.2$ MHz; $\sigma = 1.383$ S/m; $\epsilon_r = 39.33$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C

Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 1900 GPRS-2 (0) Frequency: 1850.2 MHz Duty Cycle: 1:4.00037

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.442 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 7.070 V/m; Power Drift = 0.03 dB

Peak SAR (extrapolated) = 0.501 W/kg

SAR(1 g) = 0.291 W/kg; SAR(10 g) = 0.167 W/kg

Maximum value of SAR (measured) = 0.422 W/kg

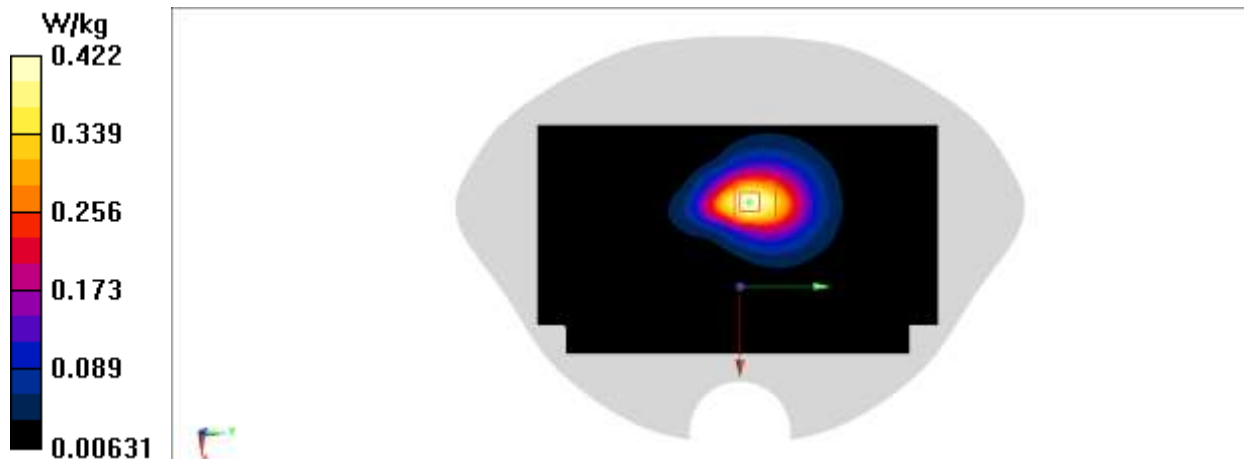


Fig A.51

GSM1900 Body ANT31

Date/Time: 1/6/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 1850.2$ MHz; $\sigma = 1.383$ S/m; $\epsilon_r = 39.33$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, GSM 1900 GPRS-2 (0) Frequency: 1850.2 MHz Duty Cycle: 1:4.00037

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500$ mm, $dy=1.500$ mm

Maximum value of SAR (interpolated) = 0.288 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8$ mm, $dy=8$ mm, $dz=5$ mm

Reference Value = 7.355 V/m; Power Drift = 0.09dB

Peak SAR (extrapolated) = 0.329 W/kg

SAR(1 g) = 0.202 W/kg; SAR(10 g) = 0.125 W/kg

Maximum value of SAR (measured) = 0.280 W/kg

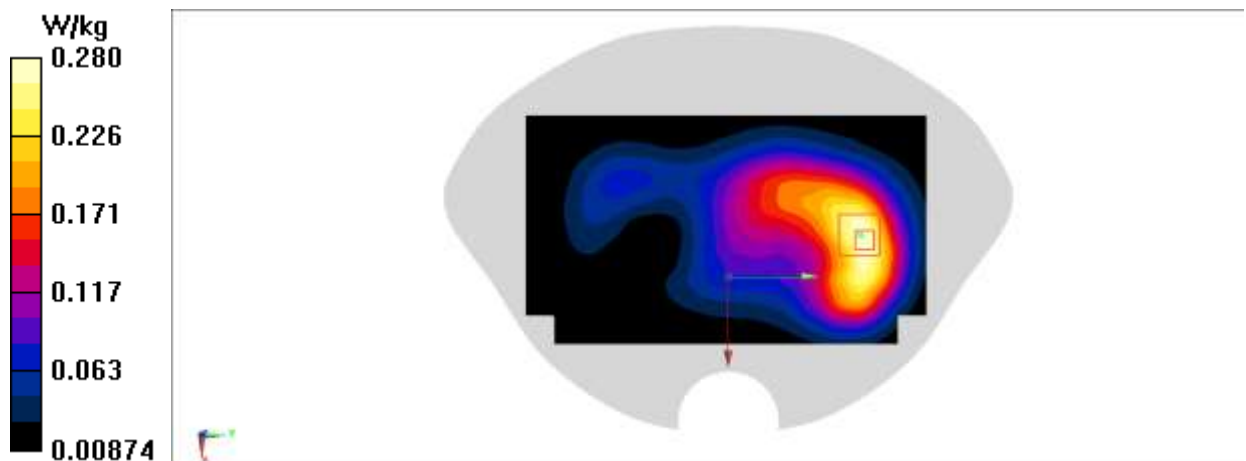


Fig A.52

WCDMA1900 Body ANT31

Date/Time: 1/4/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1880$ MHz; $\sigma = 1.432$ S/m; $\epsilon_r = 39.463$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1900 (0) Frequency: 1880 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.329 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 6.574 V/m; Power Drift = 0.19 dB

Peak SAR (extrapolated) = 0.397 W/kg

SAR(1 g) = 0.242 W/kg; SAR(10 g) = 0.149 W/kg

Maximum value of SAR (measured) = 0.338 W/kg

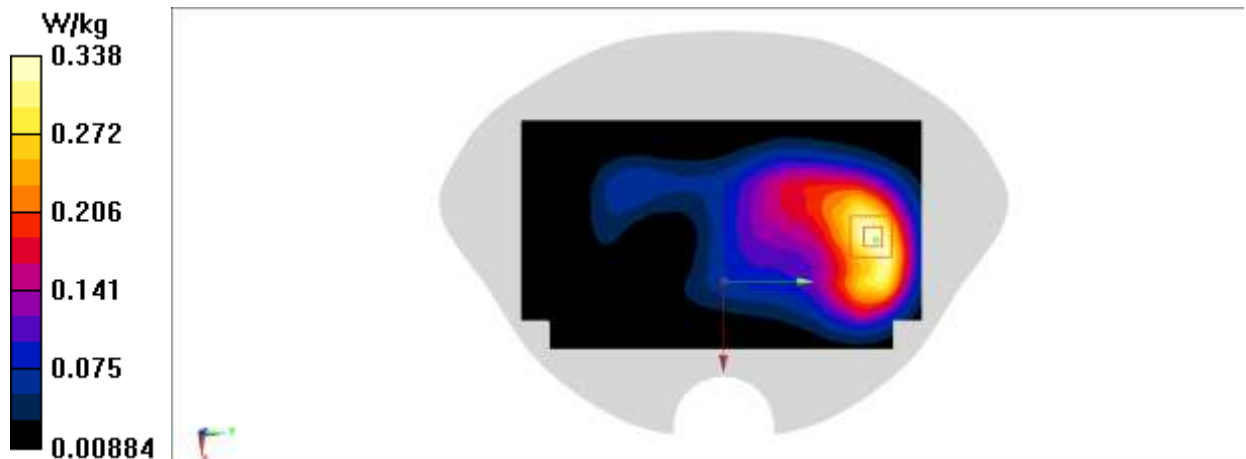


Fig A.53

WCDMA1900 Body ANT31

Date/Time: 1/4/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 1907.6 \text{ MHz}$; $\sigma = 1.448 \text{ S/m}$; $\epsilon_r = 39.343$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1900 (0) Frequency: 1907.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.319 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 7.959 V/m; Power Drift = 0.14 dB

Peak SAR (extrapolated) = 0.366 W/kg

SAR(1 g) = 0.226 W/kg; SAR(10 g) = 0.140 W/kg

Maximum value of SAR (measured) = 0.315 W/kg

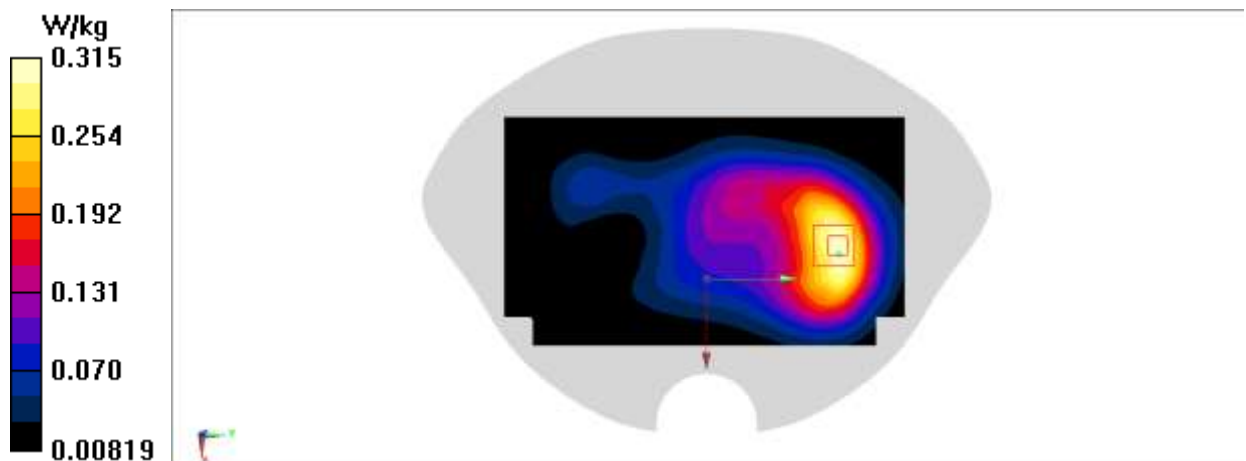


Fig A.54

WCDMA1700 Body ANT31

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 1752.6$ MHz; $\sigma = 1.336$ S/m; $\epsilon_r = 42.162$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1700 Band4 (0) Frequency: 1752.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500$ mm, $dy=1.500$ mm

Maximum value of SAR (interpolated) = 0.598 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8$ mm, $dy=8$ mm, $dz=5$ mm

Reference Value = 10.89 V/m; Power Drift = -0.04 dB

Peak SAR (extrapolated) = 0.676 W/kg

SAR(1 g) = 0.398 W/kg; SAR(10 g) = 0.227 W/kg

Maximum value of SAR (measured) = 0.575 W/kg

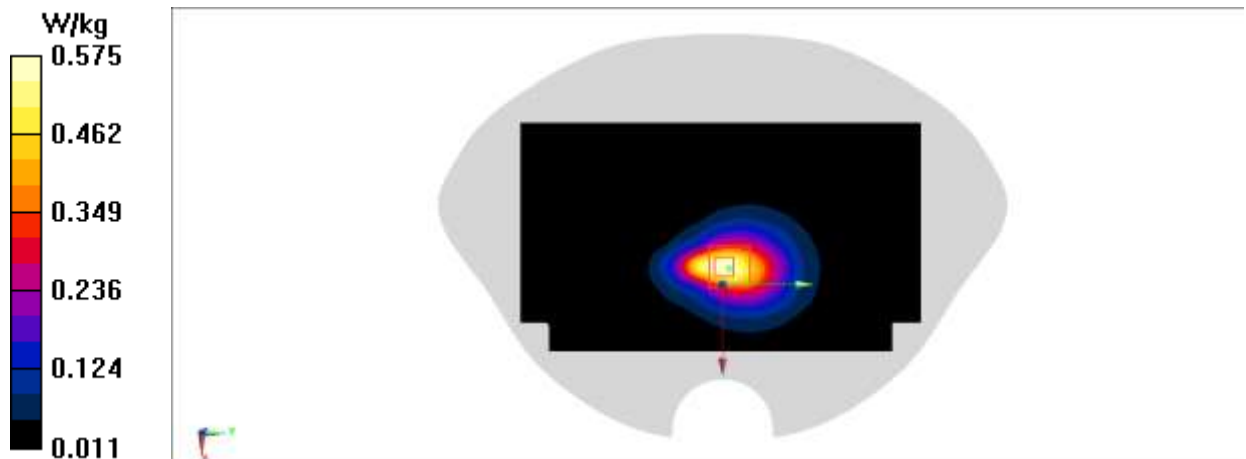


Fig A.55

WCDMA1700 Body ANT31

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 1752.6$ MHz; $\sigma = 1.336$ S/m; $\epsilon_r = 42.162$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C

Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 1700 Band4 (0) Frequency: 1752.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500$ mm, $dy=1.500$ mm

Maximum value of SAR (interpolated) = 0.366 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8$ mm, $dy=8$ mm, $dz=5$ mm

Reference Value = 7.440 V/m; Power Drift = 0.03 dB

Peak SAR (extrapolated) = 0.418 W/kg

SAR(1 g) = 0.262 W/kg; SAR(10 g) = 0.163 W/kg

Maximum value of SAR (measured) = 0.358 W/kg

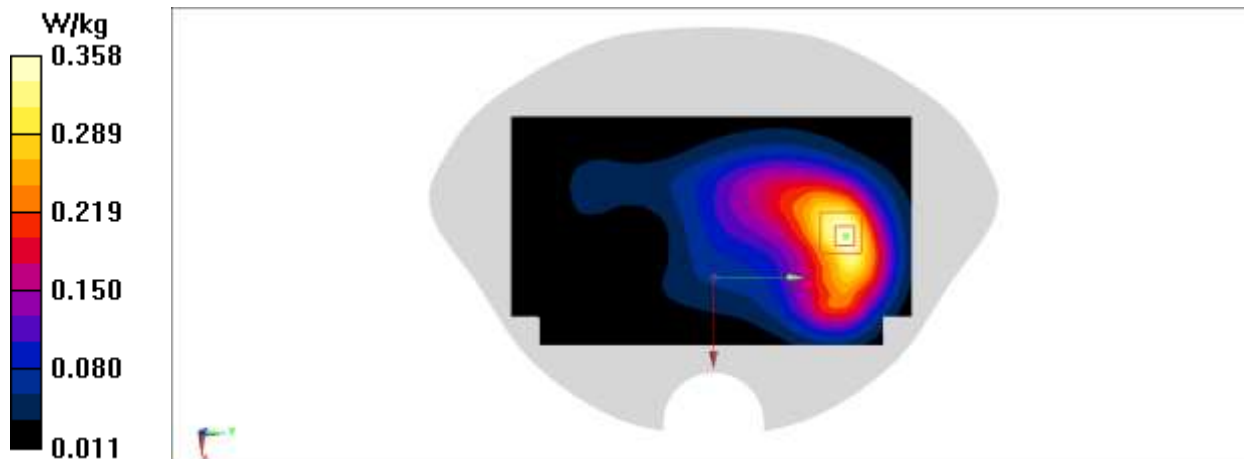


Fig A.56

WCDMA850 Body ANT41

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 846.6$ MHz; $\sigma = 0.845$ S/m; $\epsilon_r = 43.724$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WCDMA 850 (0) Frequency: 846.6 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.555 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 14.50 V/m; Power Drift = -0.03 dB

Peak SAR (extrapolated) = 0.667 W/kg

SAR(1 g) = 0.393 W/kg; SAR(10 g) = 0.246 W/kg

Maximum value of SAR (measured) = 0.561 W/kg

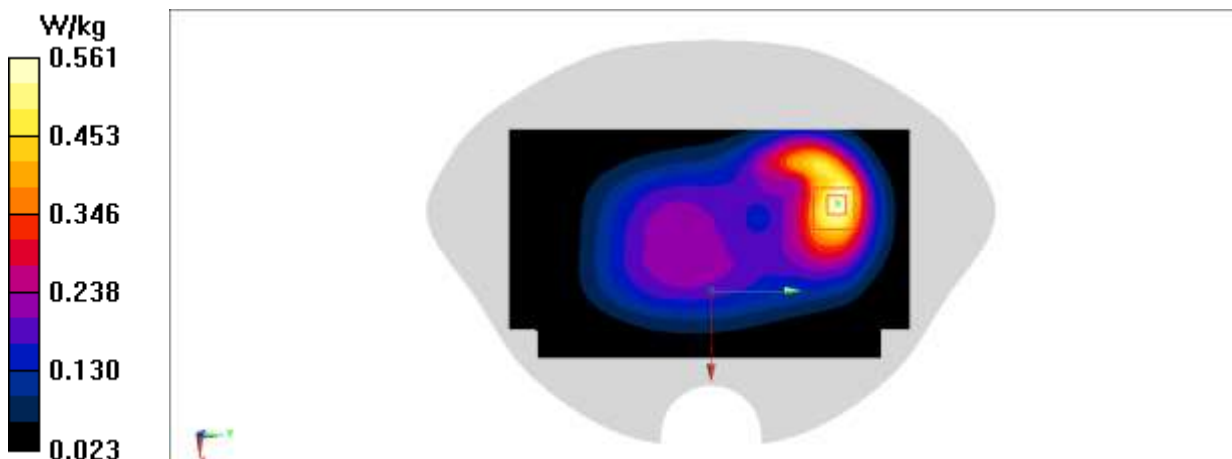


Fig A.57

LTE Band2 Body ANT31

Date/Time: 1/4/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1880$ MHz; $\sigma = 1.432$ S/m; $\epsilon_r = 39.463$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band2(20MB) (0) Frequency: 1880 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.574 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 8.795 V/m; Power Drift = 0.10 dB

Peak SAR (extrapolated) = 0.640 W/kg

SAR(1 g) = 0.395 W/kg; SAR(10 g) = 0.240 W/kg

Maximum value of SAR (measured) = 0.553 W/kg

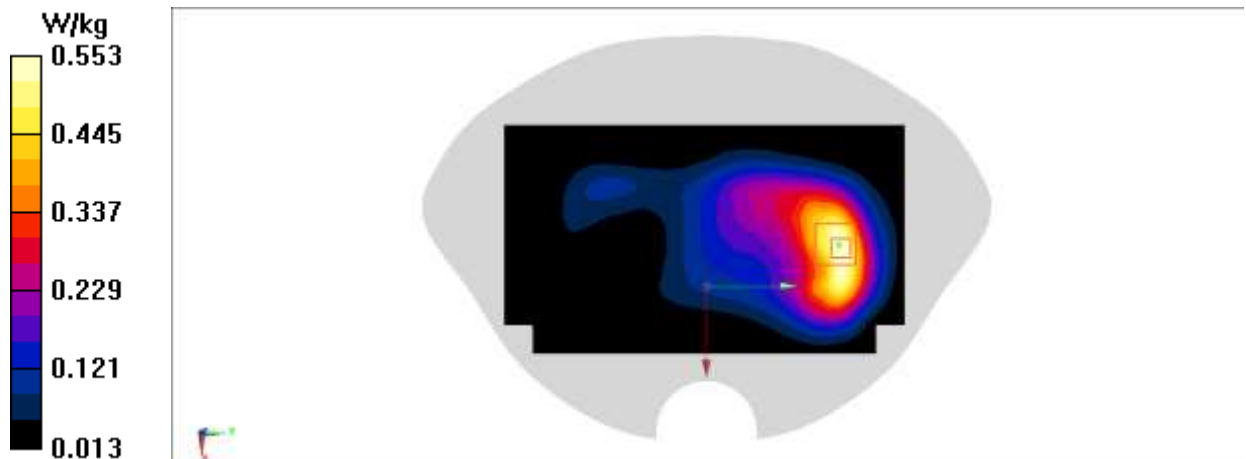


Fig A.58

LTE Band2 Body ANT31

Date/Time: 1/7/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1880$ MHz; $\sigma = 1.332$ S/m; $\epsilon_r = 38.927$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band2(20MB) (0) Frequency: 1880 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.81, 7.81, 7.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.339 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 5.974 V/m; Power Drift = -0.02 dB

Peak SAR (extrapolated) = 0.407 W/kg

SAR(1 g) = 0.248 W/kg; SAR(10 g) = 0.152 W/kg

Maximum value of SAR (measured) = 0.343 W/kg

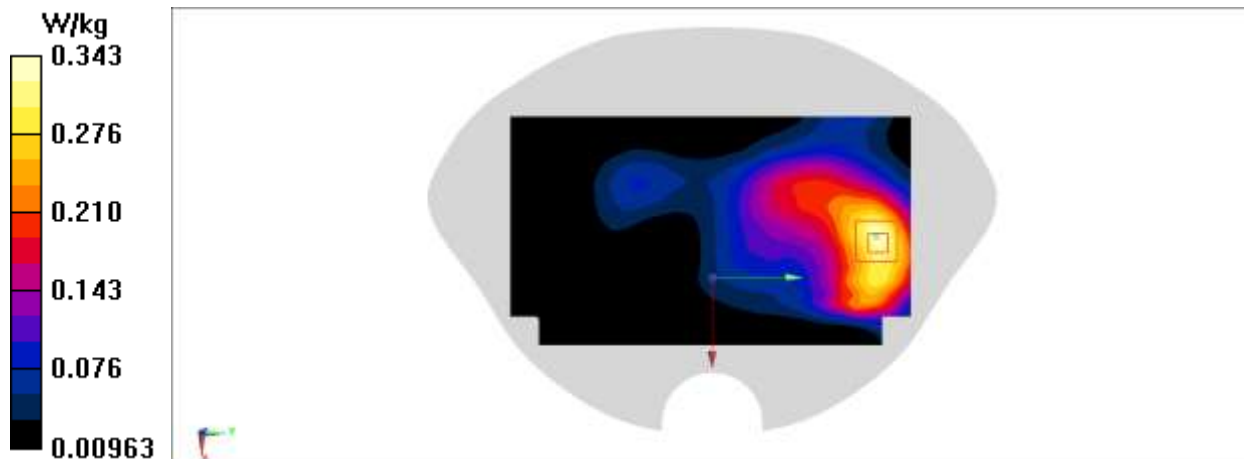


Fig A.59

LTE Band4 Body ANT31

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1745$ MHz; $\sigma = 1.332$ S/m; $\epsilon_r = 42.179$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band4 (0) Frequency: 1745 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.626 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 7.549 V/m; Power Drift = 0.17 dB

Peak SAR (extrapolated) = 0.725 W/kg

SAR(1 g) = 0.441 W/kg; SAR(10 g) = 0.263 W/kg

Maximum value of SAR (measured) = 0.607 W/kg

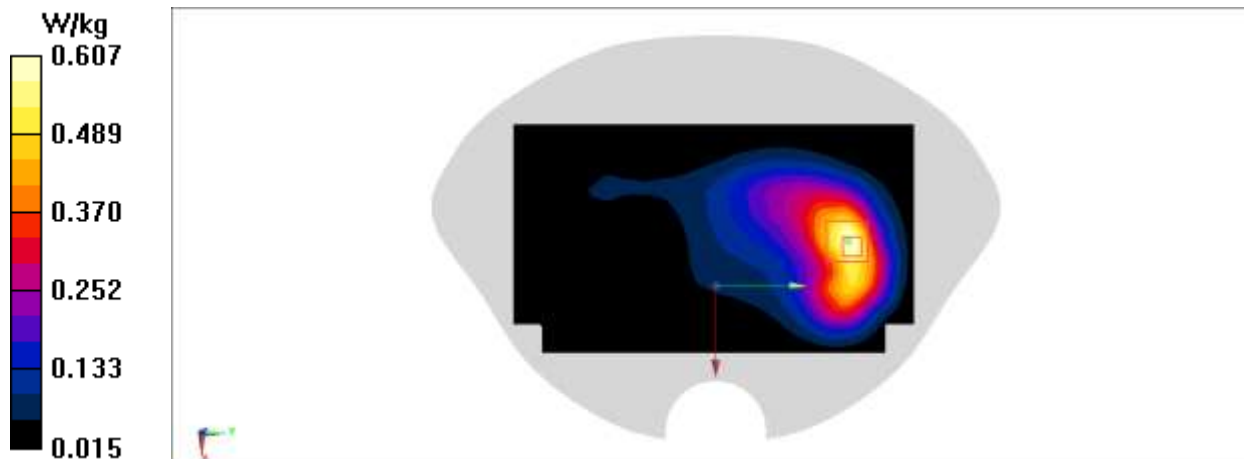


Fig A.60

LTE Band4 Body ANT31

Date/Time: 1/5/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 1745$ MHz; $\sigma = 1.325$ S/m; $\epsilon_r = 41.223$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band4 (0) Frequency: 1745 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(8.22, 8.22, 8.22); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.298 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 4.642 V/m; Power Drift = 0.07dB

Peak SAR (extrapolated) = 0.346 W/kg

SAR(1 g) = 0.210 W/kg; SAR(10 g) = 0.131 W/kg

Maximum value of SAR (measured) = 0.291 W/kg

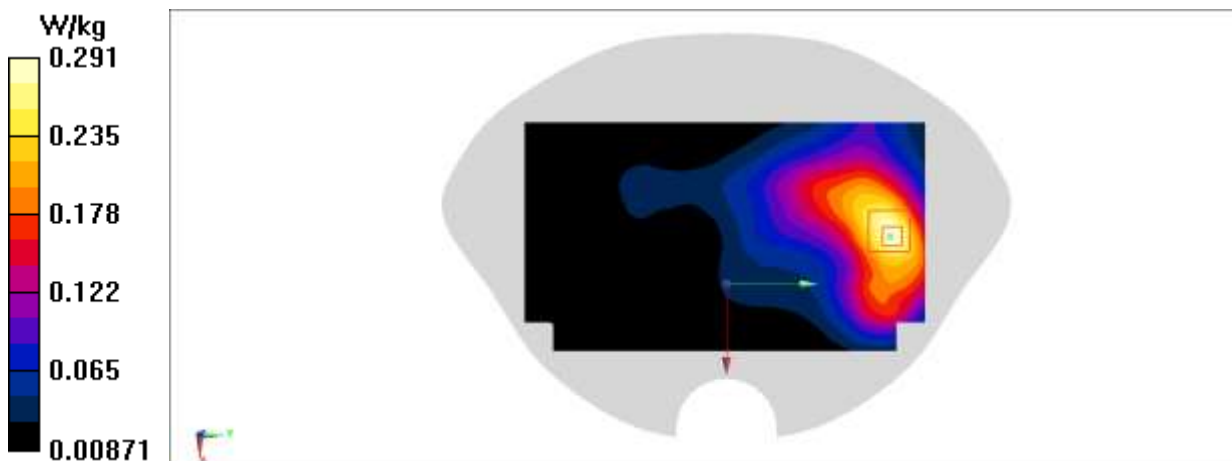


Fig A.61

LTE Band5 Body ANT41

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 829 \text{ MHz}$; $\sigma = 0.837 \text{ S/m}$; $\epsilon_r = 43.779$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band5 (0) Frequency: 829 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.336 W/kg

Zoom Scan (6x6x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 12.02 V/m; Power Drift = 0.01 dB

Peak SAR (extrapolated) = 0.377 W/kg

SAR(1 g) = 0.234 W/kg; SAR(10 g) = 0.146 W/kg

Maximum value of SAR (measured) = 0.327 W/kg

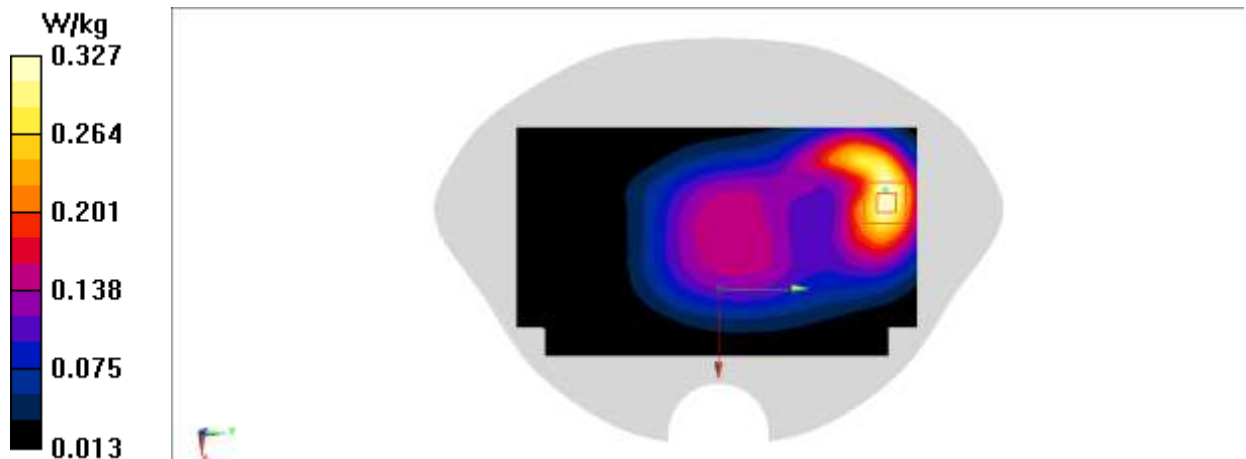


Fig A.62

LTE Band7 Body ANT31

Date/Time: 1/4/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.911$ S/m; $\epsilon_r = 39.98$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band7-20M (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.348 W/kg

Zoom Scan (7x8x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 4.741 V/m; Power Drift = -0.07 dB

Peak SAR (extrapolated) = 0.409 W/kg

SAR(1 g) = 0.221 W/kg; SAR(10 g) = 0.113 W/kg

Maximum value of SAR (measured) = 0.342 W/kg

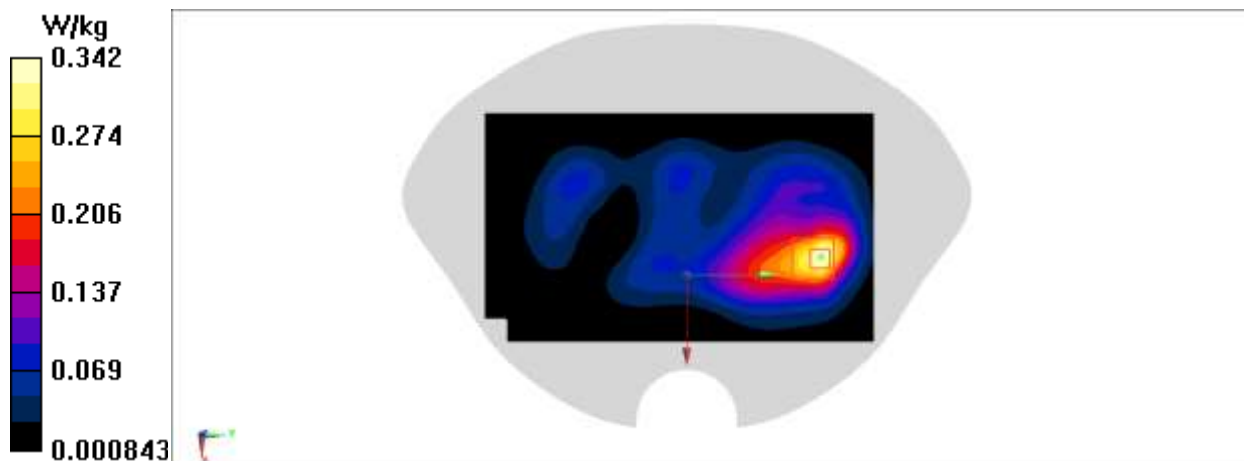


Fig A.63

LTE Band7 Body ANT31

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.929$ S/m; $\epsilon_r = 40.374$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band7-20M (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.198 W/kg

Zoom Scan (7x8x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 4.623 V/m; Power Drift = 0.06 dB

Peak SAR (extrapolated) = 0.240 W/kg

SAR(1 g) = 0.125 W/kg; SAR(10 g) = 0.068 W/kg

Maximum value of SAR (measured) = 0.195 W/kg

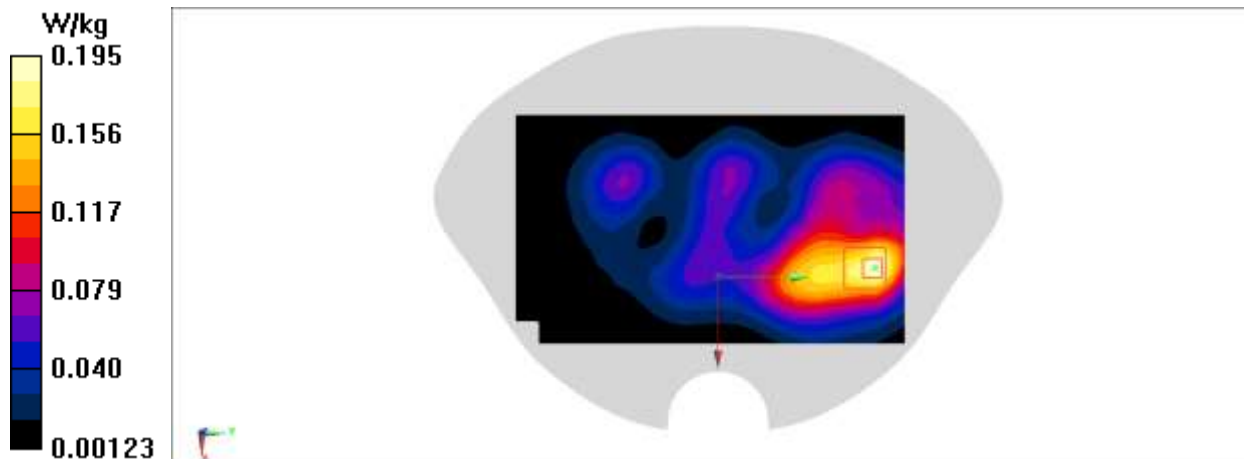


Fig A.64

LTE Band12 Body ANT41

Date/Time: 12/31/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 704 \text{ MHz}$; $\sigma = 0.808 \text{ S/m}$; $\epsilon_r = 44.542$; $\rho = 1000 \text{ kg/m}^3$

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band12 (0) Frequency: 704 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.81, 9.81, 9.81); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) = 0.180 W/kg

Zoom Scan (6x6x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 12.39 V/m; Power Drift = 0.03 dB

Peak SAR (extrapolated) = 0.214 W/kg

SAR(1 g) = 0.125 W/kg; SAR(10 g) = 0.082 W/kg

Maximum value of SAR (measured) = 0.175 W/kg

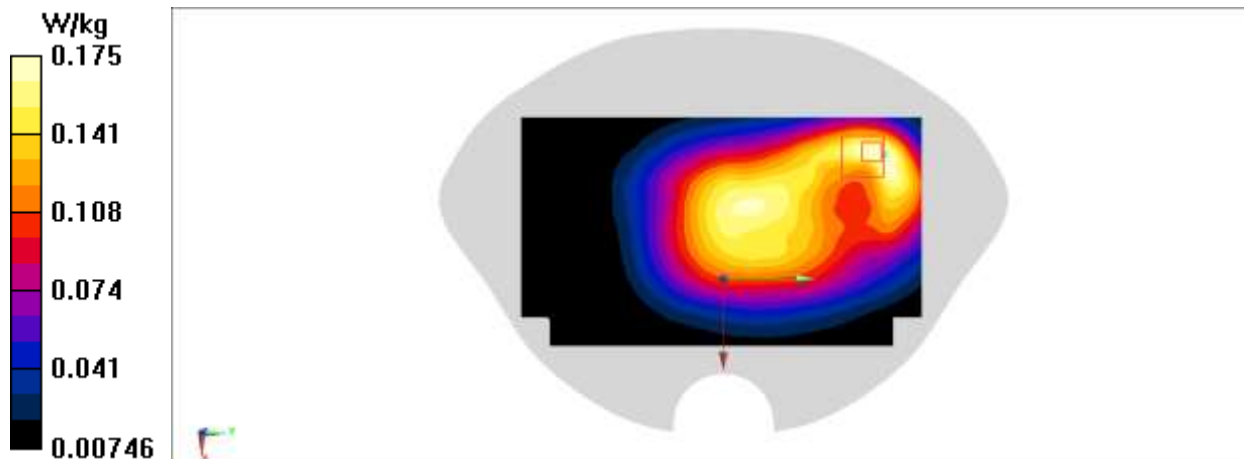


Fig A.65

LTE Band38 Body ANT31

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2580$ MHz; $\sigma = 1.946$ S/m; $\epsilon_r = 40.33$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band38 20M (0) Frequency: 2580 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.133 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.214 V/m; Power Drift = 0.05 dB

Peak SAR (extrapolated) = 0.158 W/kg

SAR(1 g) = 0.085 W/kg; SAR(10 g) = 0.044 W/kg

Maximum value of SAR (measured) = 0.133 W/kg

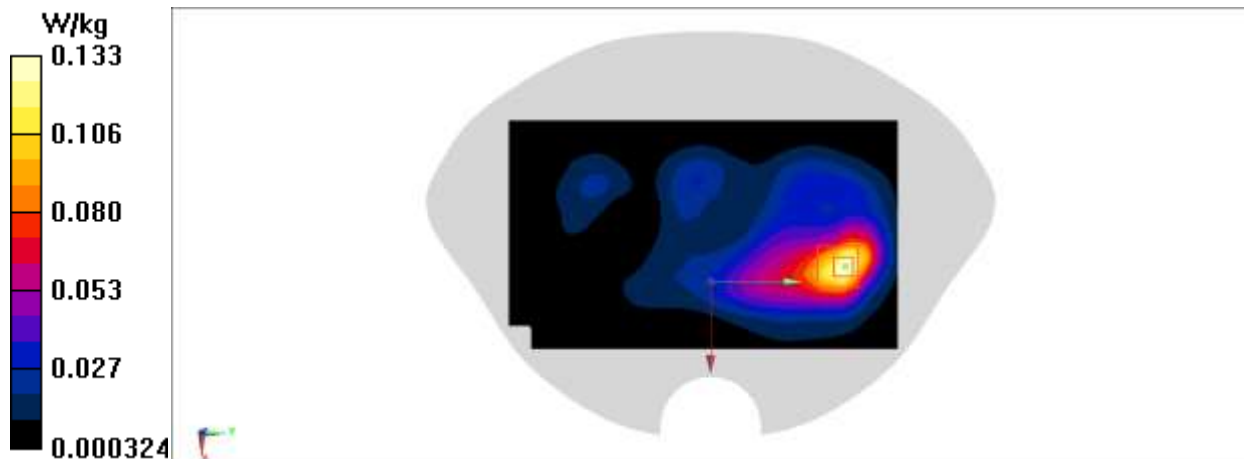


Fig A.66

LTE Band38 Body ANT31

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2580$ MHz; $\sigma = 1.946$ S/m; $\epsilon_r = 40.33$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band38 20M (0) Frequency: 2580 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.0895 W/kg

Zoom Scan (7x8x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.835 V/m; Power Drift = -0.09 dB

Peak SAR (extrapolated) = 0.109 W/kg

SAR(1 g) = 0.057 W/kg; SAR(10 g) = 0.030 W/kg

Maximum value of SAR (measured) = 0.0878 W/kg

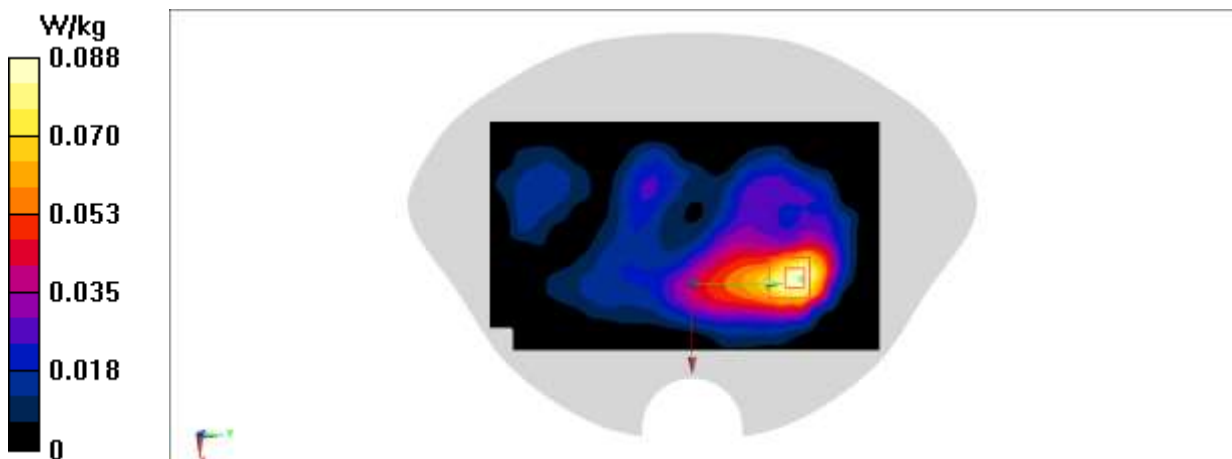


Fig A.67

LTE Band41 Body ANT31

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2680$ MHz; $\sigma = 2.09$ S/m; $\epsilon_r = 37.887$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, LTE Band41 (0) Frequency: 2680 MHz Duty Cycle: 1:1.5787

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.749 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 5.379 V/m; Power Drift = 0.13 dB

Peak SAR (extrapolated) = 0.914 W/kg

SAR(1 g) = 0.466 W/kg; SAR(10 g) = 0.237 W/kg

Maximum value of SAR (measured) = 0.725 W/kg

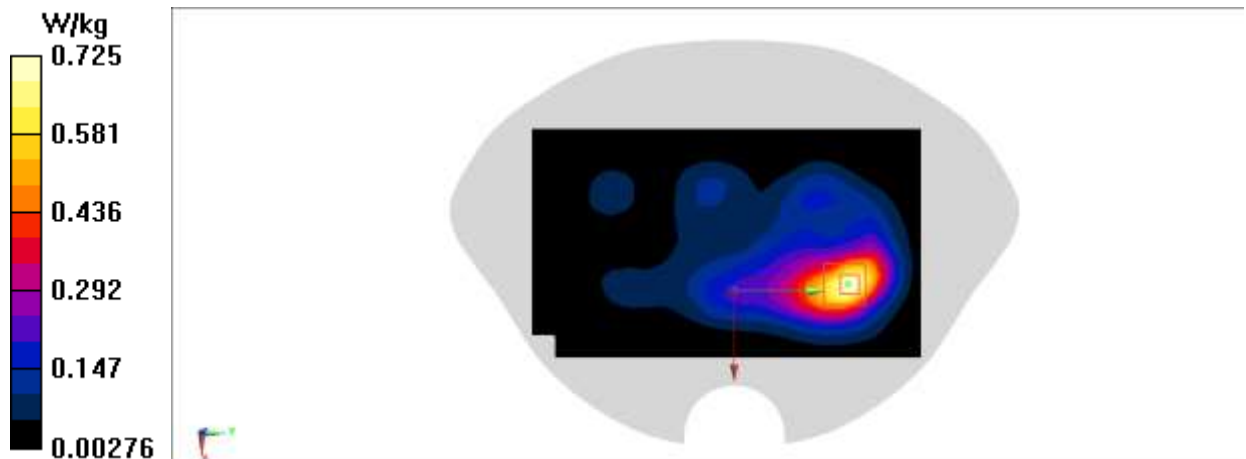


Fig A.68

N5 Head ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 826.5$ MHz; $\sigma = 0.854$ S/m; $\epsilon_r = 43.879$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n5 (0) Frequency: 826.5 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.554 W/kg

Zoom Scan (6x6x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 13.21 V/m; Power Drift = 0.14 dB

Peak SAR (extrapolated) = 0.648 W/kg

SAR(1 g) = 0.245 W/kg; SAR(10 g) = 0.128 W/kg

Maximum value of SAR (measured) = 0.461 W/kg

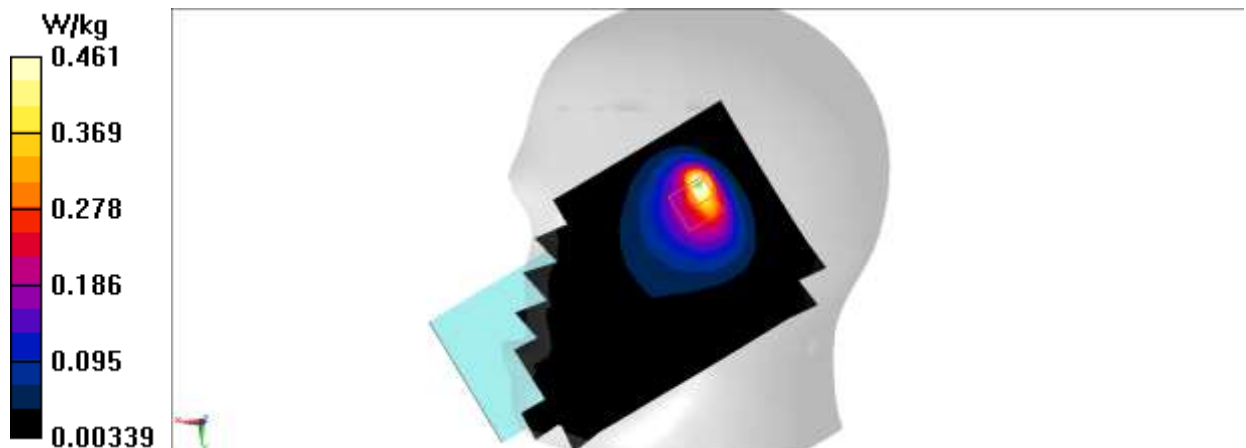


Fig A.69

N5 Head ANT41

Date/Time: 1/7/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 826.5$ MHz; $\sigma = 0.837$ S/m; $\epsilon_r = 43.551$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n5 (0) Frequency: 826.5 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x141x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.218 W/kg

Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 4.567 V/m; Power Drift = 0.12 dB

Peak SAR (extrapolated) = 0.238 W/kg

SAR(1 g) = 0.182 W/kg; SAR(10 g) = 0.144 W/kg

Maximum value of SAR (measured) = 0.217 W/kg

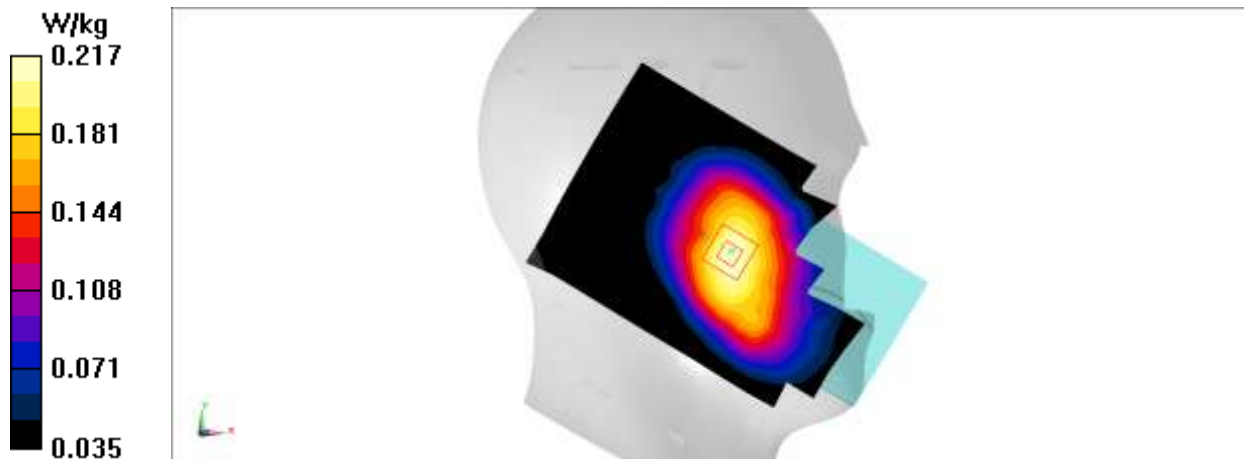


Fig A.70

N7 Head ANT11

Date/Time: 1/6/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.842$ S/m; $\epsilon_r = 39.534$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.664 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 3.523 V/m; Power Drift = 0.02 dB

Peak SAR (extrapolated) = 0.807 W/kg

SAR(1 g) = 0.333 W/kg; SAR(10 g) = 0.134 W/kg

Maximum value of SAR (measured) = 0.616 W/kg

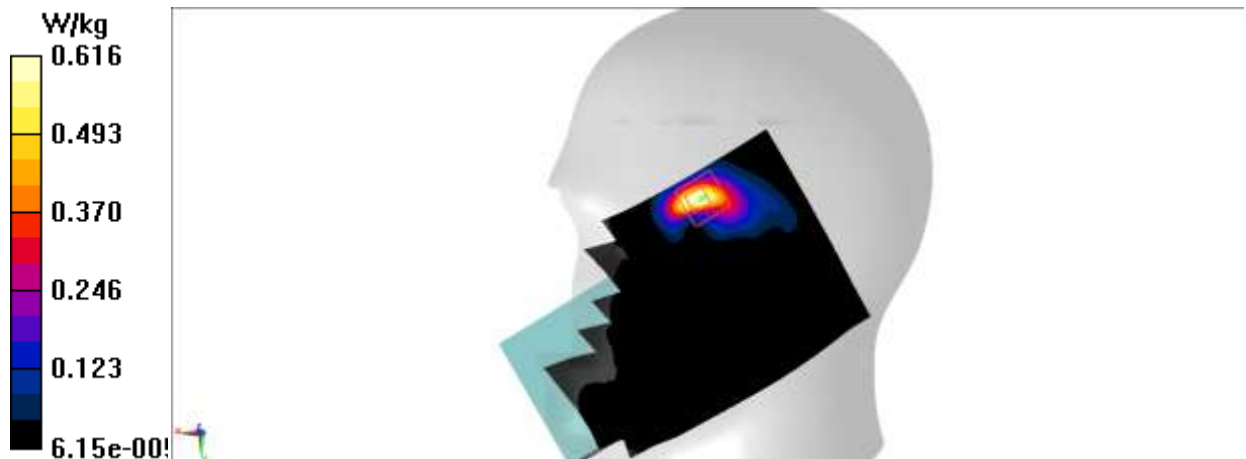


Fig A.71

N7 Head ANT13

Date/Time: 1/6/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.842$ S/m; $\epsilon_r = 39.534$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.875 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 3.075 V/m; Power Drift = -0.01 dB

Peak SAR (extrapolated) = 1.10 W/kg

SAR(1 g) = 0.489 W/kg; SAR(10 g) = 0.215 W/kg

Maximum value of SAR (measured) = 0.830 W/kg

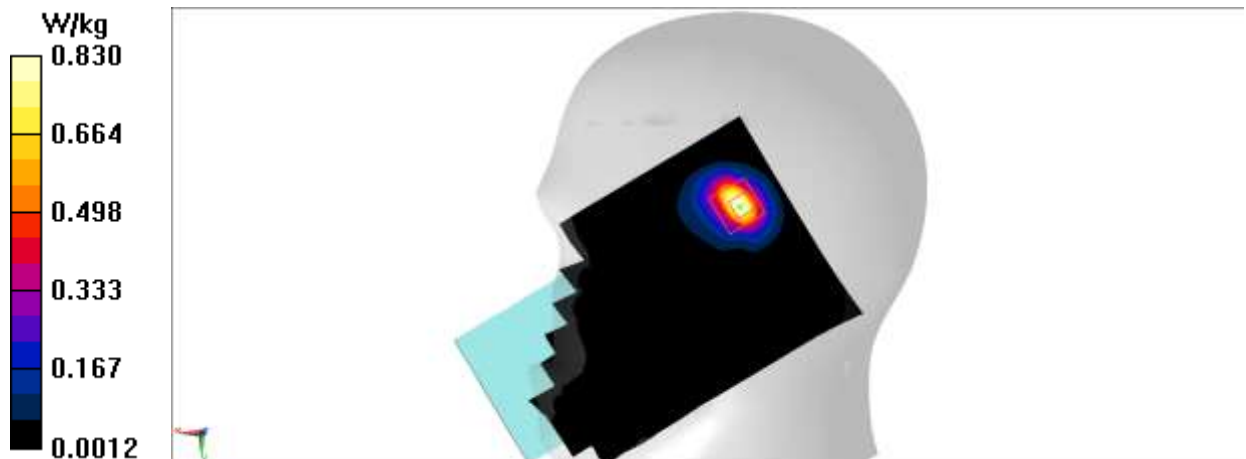


Fig A.72

N41 Head ANT11

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2685$ MHz; $\sigma = 2.045$ S/m; $\epsilon_r = 40.126$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2685 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 1.15 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 3.982 V/m; Power Drift = -0.06 dB

Peak SAR (extrapolated) = 1.69 W/kg

SAR(1 g) = 0.661 W/kg; SAR(10 g) = 0.244 W/kg

Maximum value of SAR (measured) = 1.17 W/kg

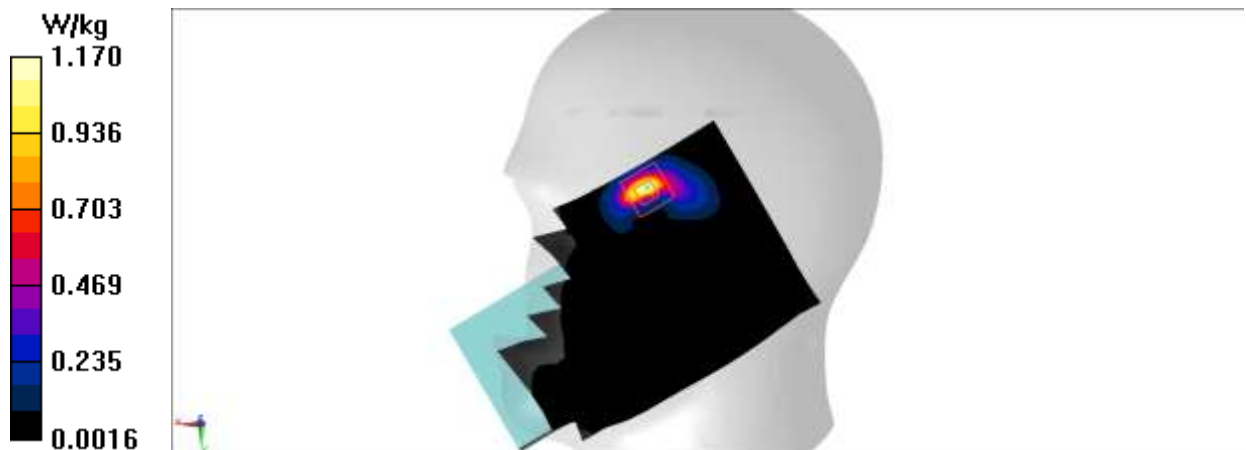


Fig A.73

N41 Head ANT13

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2685$ MHz; $\sigma = 2.045$ S/m; $\epsilon_r = 40.126$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2685 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.627 W/kg

Zoom Scan (7x8x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 5.353 V/m; Power Drift = 0.05 dB

Peak SAR (extrapolated) = 0.811 W/kg

SAR(1 g) = 0.374 W/kg; SAR(10 g) = 0.178 W/kg

Maximum value of SAR (measured) = 0.632 W/kg

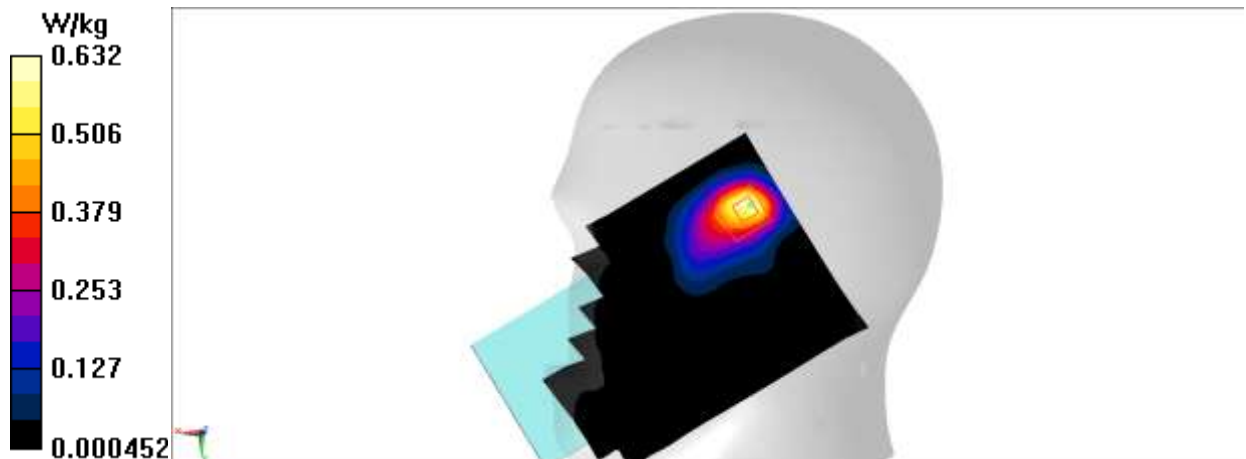


Fig A.74

N78 Head ANT11

Date/Time: 1/11/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 3705$ MHz; $\sigma = 3.05$ S/m; $\epsilon_r = 37.603$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n78 (0) Frequency: 3705 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(6.40, 6.40, 6.40); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.911 W/kg

Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.598 V/m; Power Drift = -0.04 dB

Peak SAR (extrapolated) = 1.42 W/kg

SAR(1 g) = 0.484 W/kg; SAR(10 g) = 0.182 W/kg

Maximum value of SAR (measured) = 1.01 W/kg

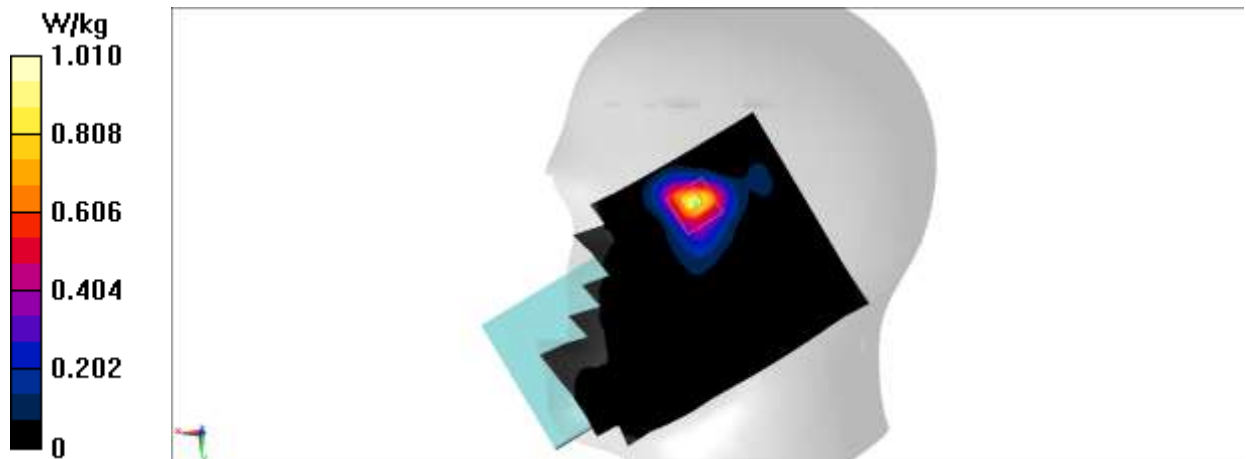


Fig A.75

N78 Head ANT12

Date/Time: 1/11/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 3705$ MHz; $\sigma = 3.05$ S/m; $\epsilon_r = 37.603$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n78 (0) Frequency: 3705 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(6.40, 6.40, 6.40); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.880 W/kg

Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 3.997 V/m; Power Drift = 0.07 dB

Peak SAR (extrapolated) = 0.971 W/kg

SAR(1 g) = 0.272 W/kg; SAR(10 g) = 0.107 W/kg

Maximum value of SAR (measured) = 0.664 W/kg

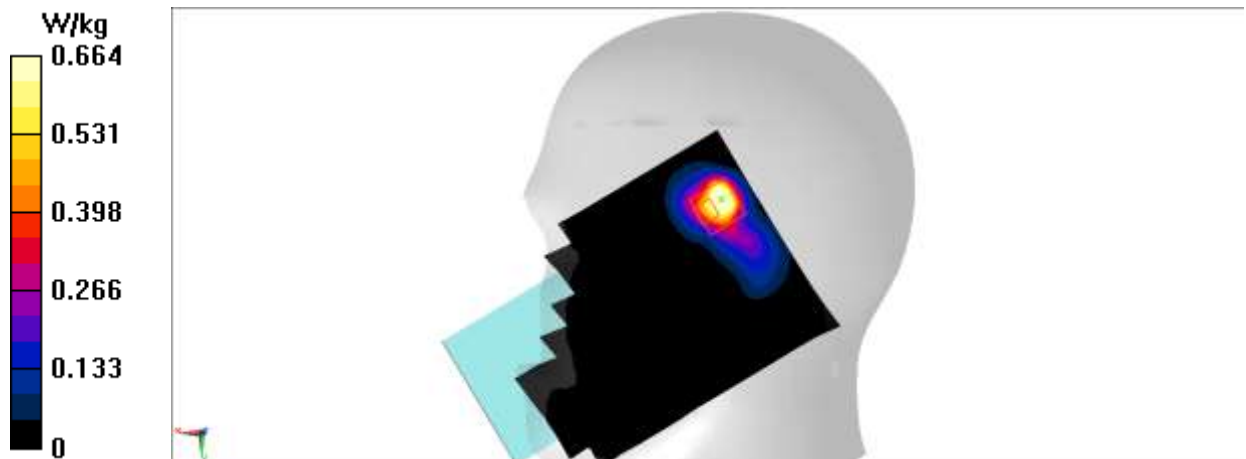


Fig A.76

N5 Body ANT13

Date/Time: 12/29/2021

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 826.5$ MHz; $\sigma = 0.854$ S/m; $\epsilon_r = 43.879$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n5 (0) Frequency: 826.5 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x131x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.287 W/kg

Zoom Scan (5x6x7)/Cube 0: Measurement grid: dx=8mm, dy=8mm, dz=5mm

Reference Value = 11.97 V/m; Power Drift = -0.01 dB

Peak SAR (extrapolated) = 0.343 W/kg

SAR(1 g) = 0.191 W/kg; SAR(10 g) = 0.124 W/kg

Maximum value of SAR (measured) = 0.272 W/kg

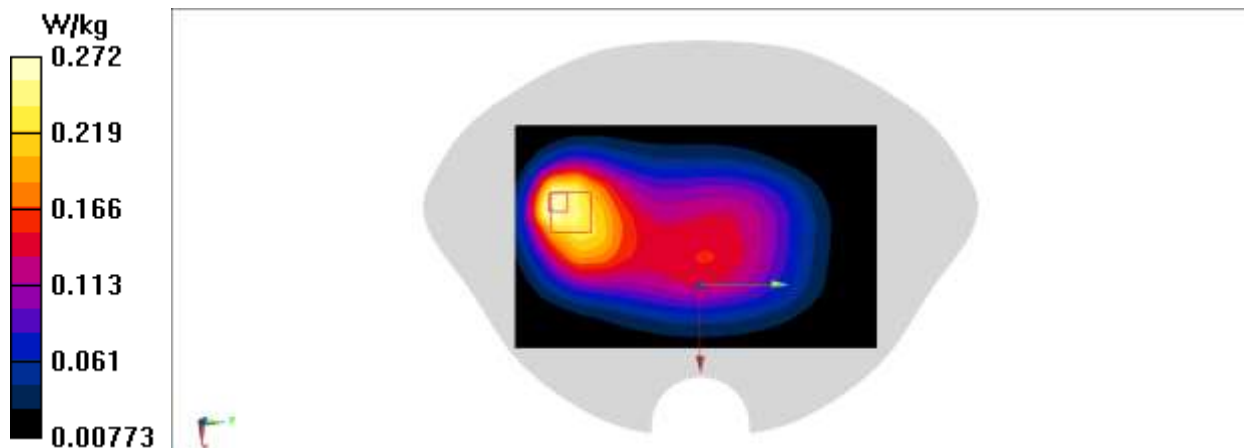


Fig A.77

N5 Body ANT41

Date/Time: 1/7/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 826.5$ MHz; $\sigma = 0.837$ S/m; $\epsilon_r = 43.551$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C

Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n5 (0) Frequency: 826.5 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(9.40, 9.40, 9.40); Calibrated: 2/3/2021

Area Scan (81x131x1): Interpolated grid: $dx=1.500$ mm, $dy=1.500$ mm

Maximum value of SAR (interpolated) = 0.335 W/kg

Zoom Scan (6x6x7)/Cube 0: Measurement grid: $dx=8$ mm, $dy=8$ mm, $dz=5$ mm

Reference Value = 12.45 V/m; Power Drift = -0.02 dB

Peak SAR (extrapolated) = 0.388 W/kg

SAR(1 g) = 0.237 W/kg; SAR(10 g) = 0.150 W/kg

Maximum value of SAR (measured) = 0.328 W/kg

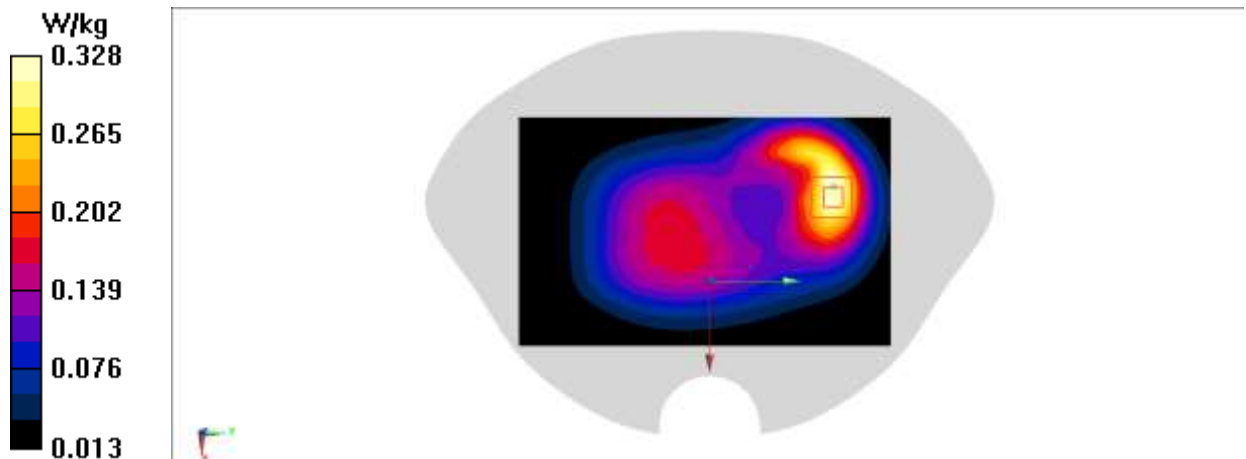


Fig A.78

N7 Body ANT11

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.905$ S/m; $\epsilon_r = 39.914$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.423 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 4.767 V/m; Power Drift = 0.01 dB

Peak SAR (extrapolated) = 0.534 W/kg

SAR(1 g) = 0.243 W/kg; SAR(10 g) = 0.100 W/kg

Maximum value of SAR (measured) = 0.429 W/kg

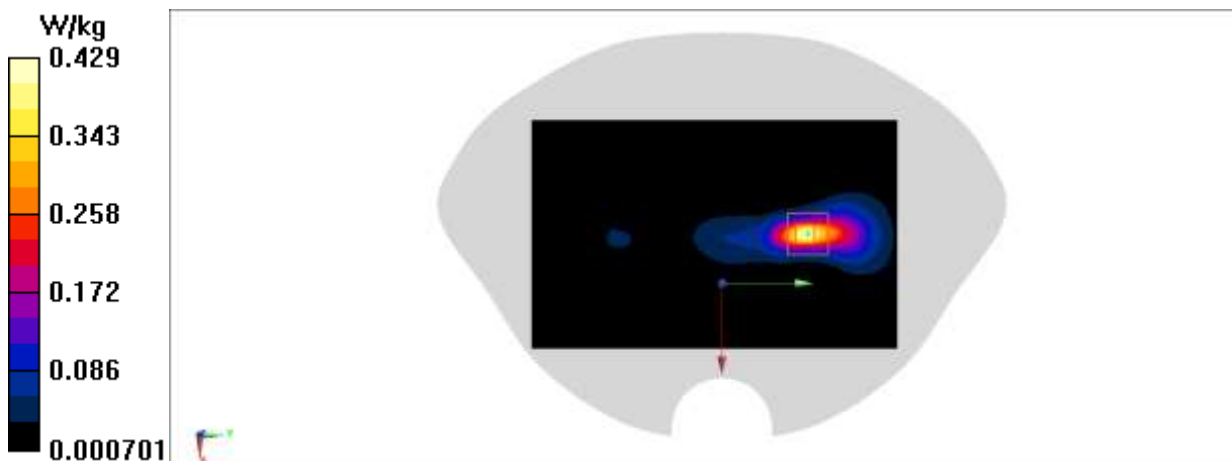


Fig A.79

N7 Body ANT11

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.905$ S/m; $\epsilon_r = 39.914$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.432 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.840 V/m; Power Drift = 0.01 dB

Peak SAR (extrapolated) = 0.534 W/kg

SAR(1 g) = 0.268 W/kg; SAR(10 g) = 0.130 W/kg

Maximum value of SAR (measured) = 0.433 W/kg

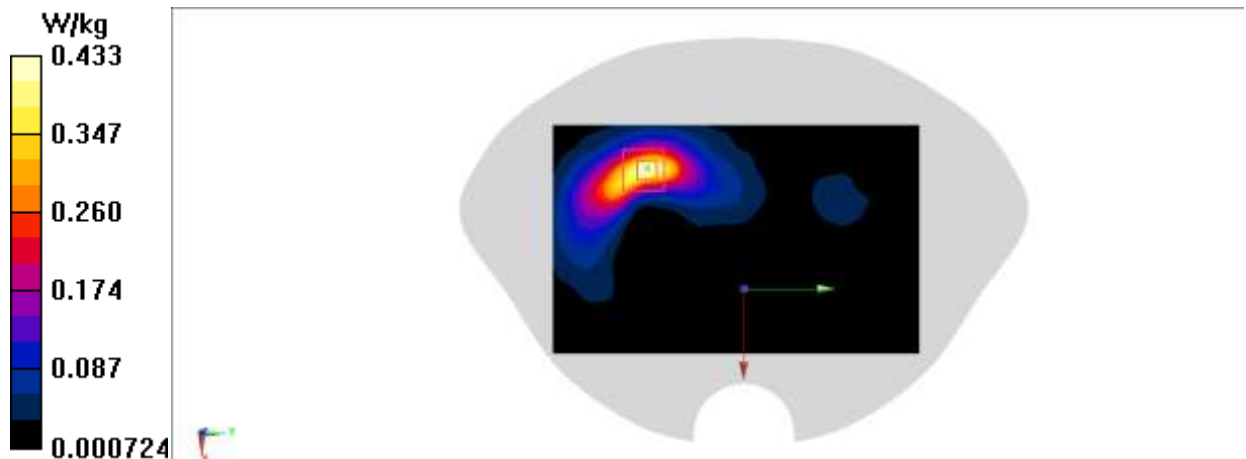


Fig A.80

N7 Body ANT13

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.905$ S/m; $\epsilon_r = 39.914$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.358 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.170 V/m; Power Drift = -0.09 dB

Peak SAR (extrapolated) = 0.437 W/kg

SAR(1 g) = 0.208 W/kg; SAR(10 g) = 0.090 W/kg

Maximum value of SAR (measured) = 0.352 W/kg

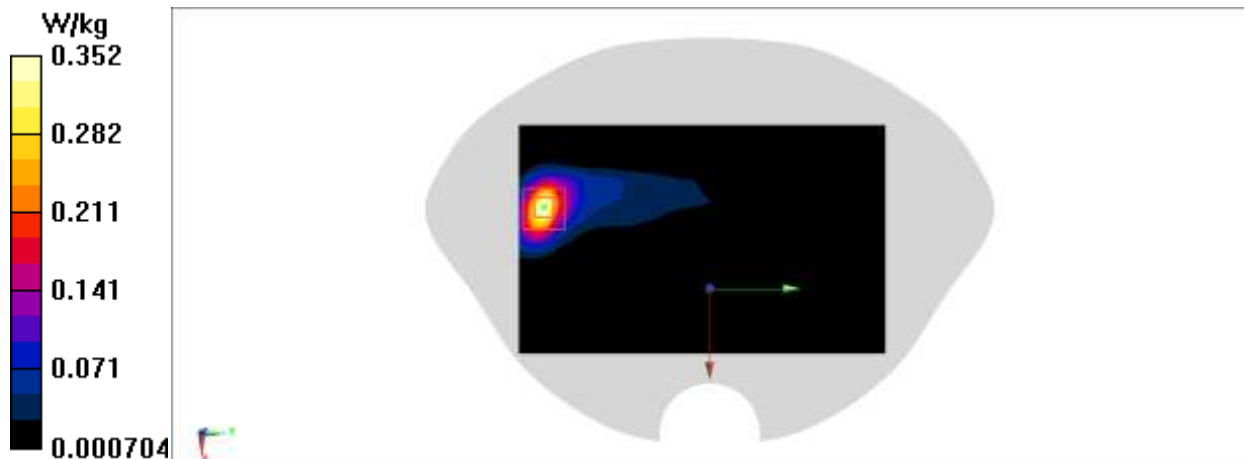


Fig A.81

N7 Body ANT13

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2560$ MHz; $\sigma = 1.905$ S/m; $\epsilon_r = 39.914$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2560 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.779 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 4.597 V/m; Power Drift = 0.04 dB

Peak SAR (extrapolated) = 0.920 W/kg

SAR(1 g) = 0.473 W/kg; SAR(10 g) = 0.228 W/kg

Maximum value of SAR (measured) = 0.753 W/kg

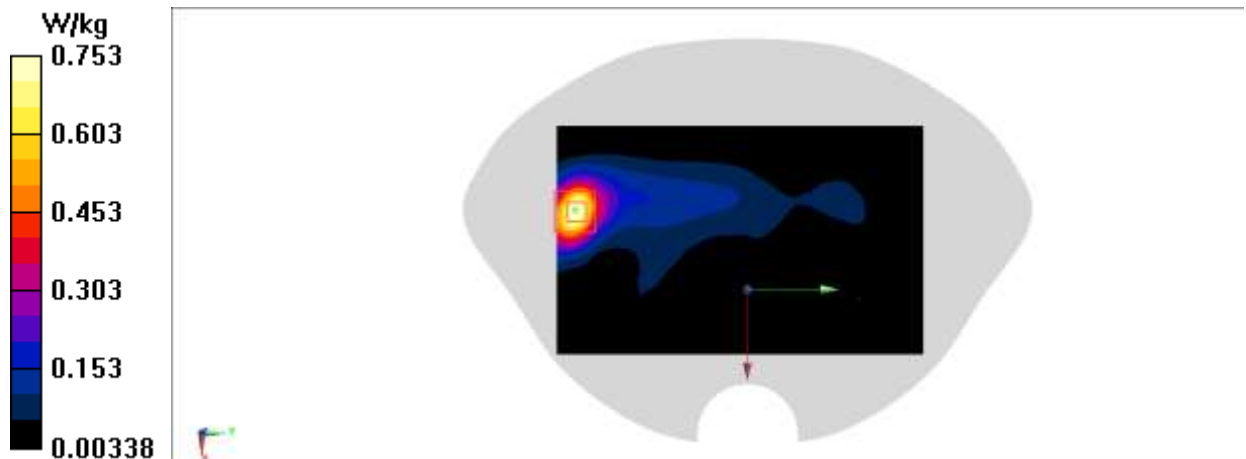


Fig A.82

N41 Body ANT11

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2685$ MHz; $\sigma = 2.045$ S/m; $\epsilon_r = 40.126$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2685 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.660 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 4.469 V/m; Power Drift = -0.04 dB

Peak SAR (extrapolated) = 0.746 W/kg

SAR(1 g) = 0.343 W/kg; SAR(10 g) = 0.140 W/kg

Maximum value of SAR (measured) = 0.598 W/kg

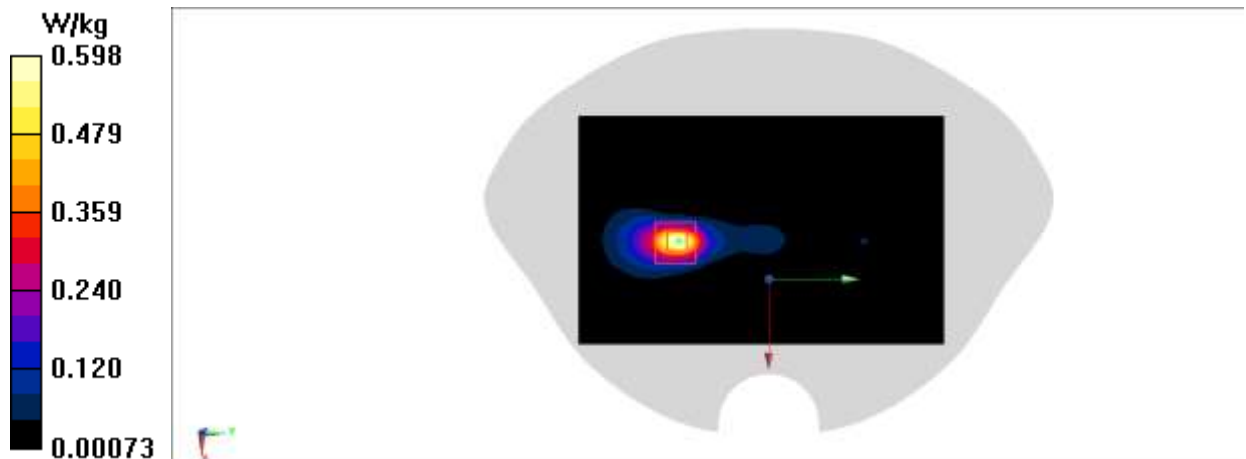


Fig A.83

N41 Body ANT11

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2685$ MHz; $\sigma = 2.045$ S/m; $\epsilon_r = 40.126$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2685 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.862 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 3.558 V/m; Power Drift = 0.07 dB

Peak SAR (extrapolated) = 1.05 W/kg

SAR(1 g) = 0.514 W/kg; SAR(10 g) = 0.241 W/kg

Maximum value of SAR (measured) = 0.846 W/kg

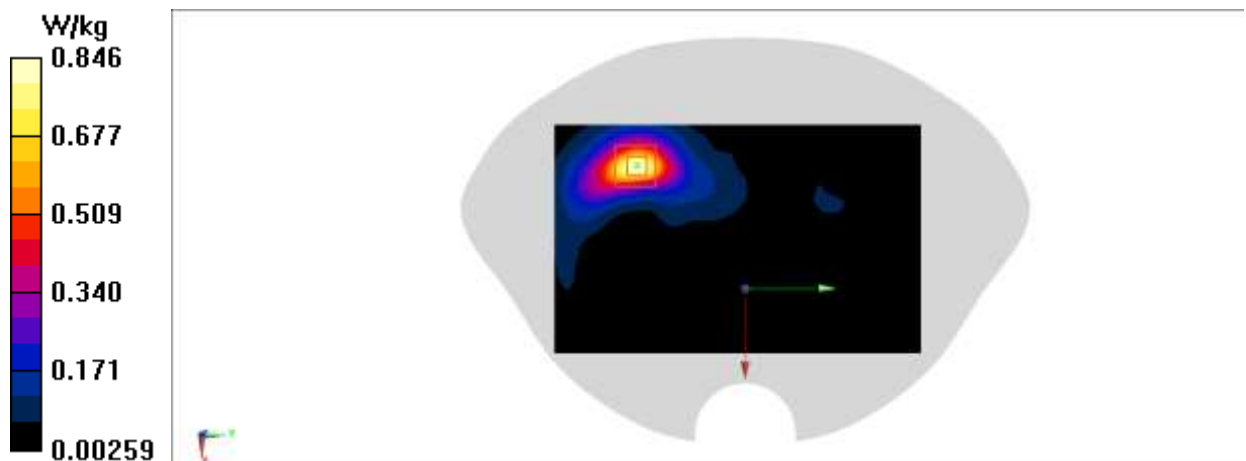


Fig A.84

N41 Body ANT13

Date/Time: 1/10/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2685$ MHz; $\sigma = 2.045$ S/m; $\epsilon_r = 40.126$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n7 (0) Frequency: 2685 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.10, 7.10, 7.10); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 1.15 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 5.523 V/m; Power Drift = 0.08dB

Peak SAR (extrapolated) = 1.44 W/kg

SAR(1 g) = 0.662 W/kg; SAR(10 g) = 0.283 W/kg

Maximum value of SAR (measured) = 1.14 W/kg

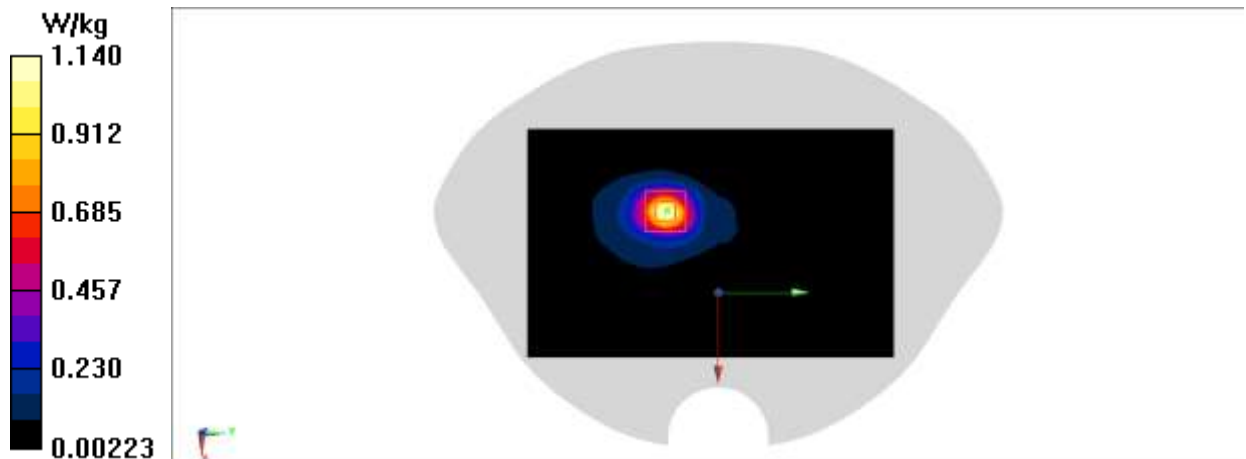


Fig A.85

N78 Body ANT11

Date/Time: 1/11/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 3705$ MHz; $\sigma = 3.05$ S/m; $\epsilon_r = 37.603$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n78 (0) Frequency: 3705 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(6.40, 6.40, 6.40); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.668 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.934 V/m; Power Drift = -0.08 dB

Peak SAR (extrapolated) = 0.978 W/kg

SAR(1 g) = 0.331 W/kg; SAR(10 g) = 0.111 W/kg

Maximum value of SAR (measured) = 0.683 W/kg

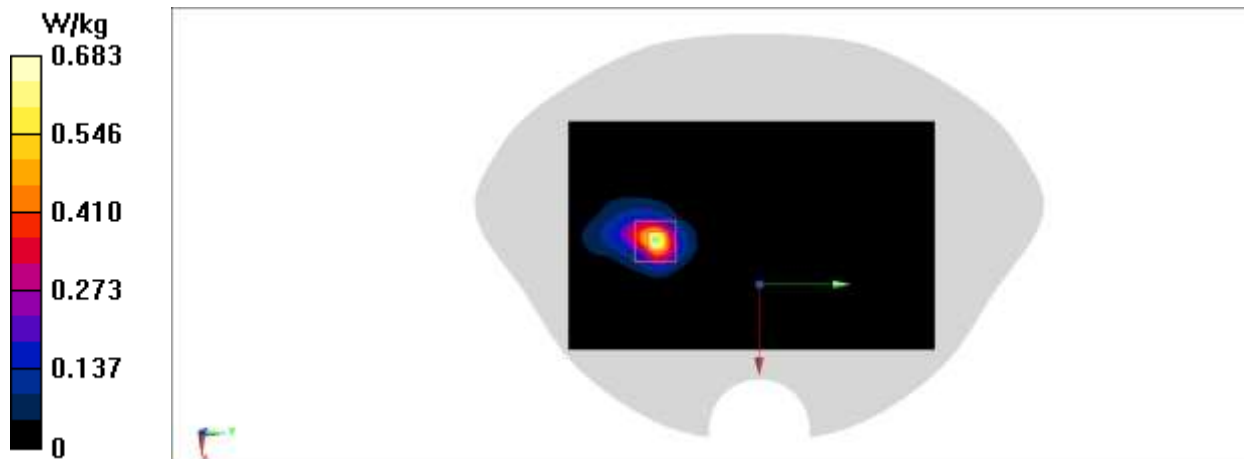


Fig A.86

N78 Body ANT11

Date/Time: 1/11/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used (interpolated): $f = 3325.02$ MHz; $\sigma = 2.806$ S/m; $\epsilon_r = 37.74$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n78 (0) Frequency: 3325.02 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(6.90, 6.90, 6.90); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.675 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.748 V/m; Power Drift = 0.08 dB

Peak SAR (extrapolated) = 0.961 W/kg

SAR(1 g) = 0.349 W/kg; SAR(10 g) = 0.144 W/kg

Maximum value of SAR (measured) = 0.684 W/kg

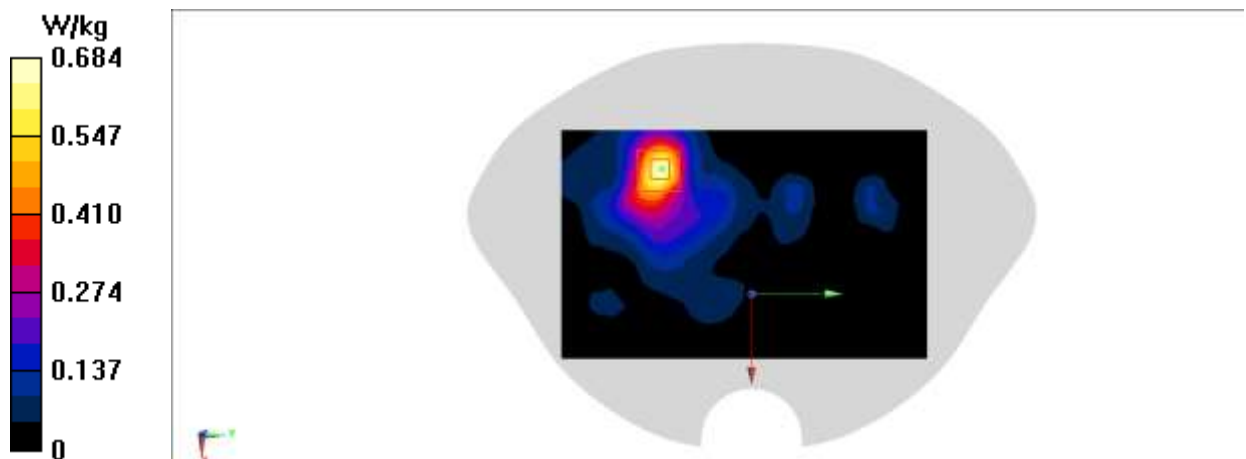


Fig A.87

N78 Body ANT12

Date/Time: 1/11/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 3705$ MHz; $\sigma = 3.05$ S/m; $\epsilon_r = 37.603$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n78 (0) Frequency: 3705 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(6.40, 6.40, 6.40); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.264 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 0 V/m; Power Drift = 0.09 dB

Peak SAR (extrapolated) = 0.434 W/kg

SAR(1 g) = 0.132 W/kg; SAR(10 g) = 0.049 W/kg

Maximum value of SAR (measured) = 0.287 W/kg

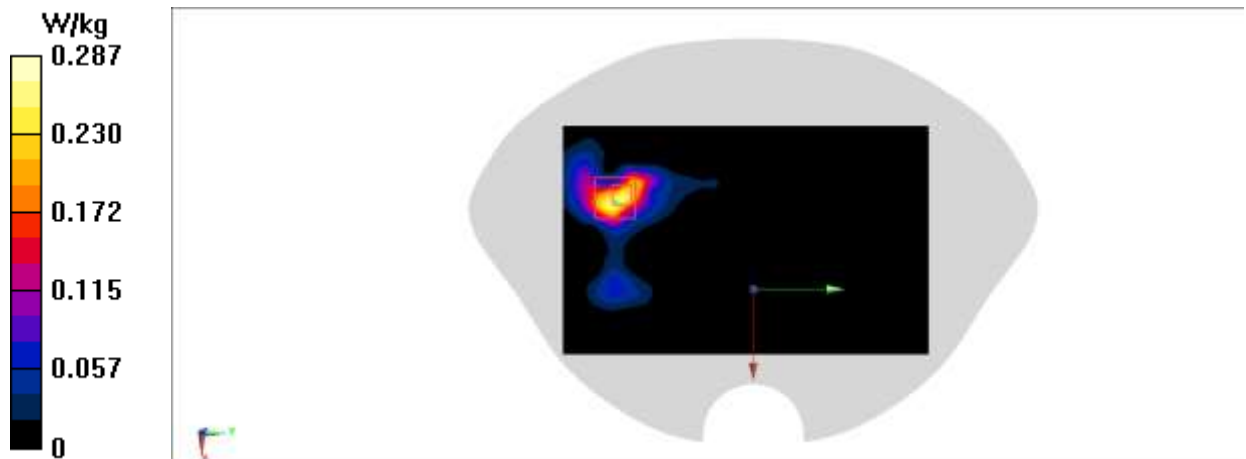


Fig A.88

N78 Body ANT12

Date/Time: 1/11/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 3705$ MHz; $\sigma = 3.05$ S/m; $\epsilon_r = 37.603$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, 5G n78 (0) Frequency: 3705 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(6.40, 6.40, 6.40); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.210 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 0 V/m; Power Drift = 0.09 dB

Peak SAR (extrapolated) = 0.162 W/kg

SAR(1 g) = 0.052 W/kg; SAR(10 g) = 0.019 W/kg

Maximum value of SAR (measured) = 0.113 W/kg

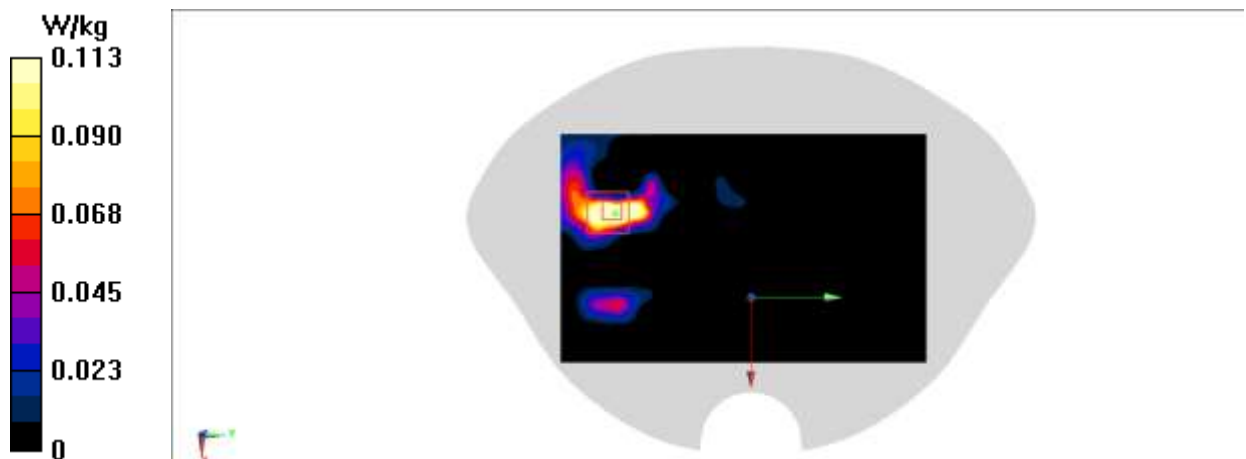


Fig A.89

WIFI2.4G Head

Date/Time: 1/24/2022

Electronics: DAE4 Sn1525

Medium: H680-6000M

Medium parameters used (interpolated): $f = 2437$ MHz; $\sigma = 1.85$ S/m; $\epsilon_r = 38.372$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WLan 2450 (0) Frequency: 2437 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.34, 7.34, 7.34); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.349 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 6.377 V/m; Power Drift = -0.05 dB

Peak SAR (extrapolated) = 0.420 W/kg

SAR(1 g) = 0.202 W/kg; SAR(10 g) = 0.090 W/kg

Maximum value of SAR (measured) = 0.332 W/kg

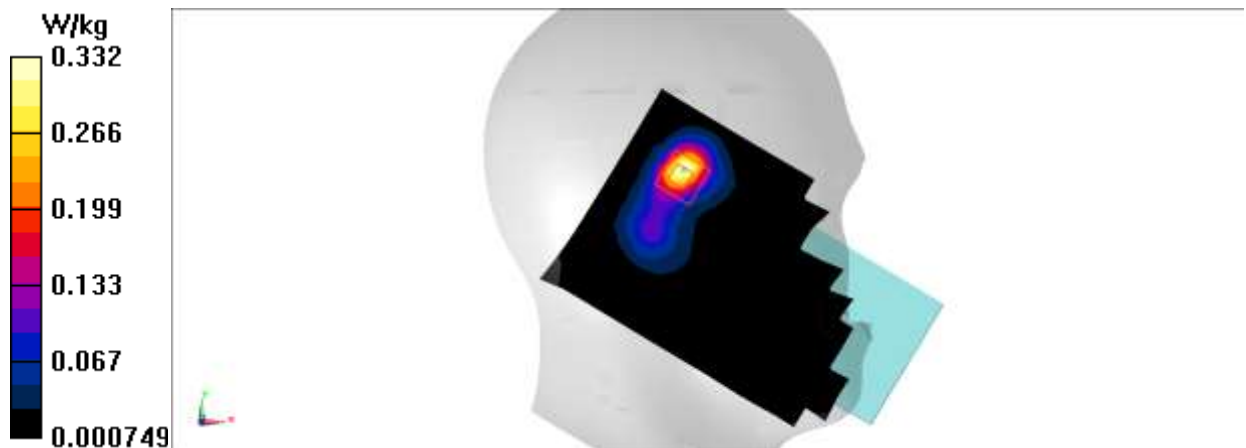


Fig A.90

WIFI2.4G Body

Date/Time: 1/24/2022

Electronics: DAE4 Sn1525

Medium: H680-6000M

Medium parameters used (interpolated): $f = 2437$ MHz; $\sigma = 1.85$ S/m; $\epsilon_r = 38.372$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WLan 2450 (0) Frequency: 2437 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.34, 7.34, 7.34); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.615 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 4.254 V/m; Power Drift = -0.19 dB

Peak SAR (extrapolated) = 0.754 W/kg

SAR(1 g) = 0.353 W/kg; SAR(10 g) = 0.168 W/kg

Maximum value of SAR (measured) = 0.589 W/kg

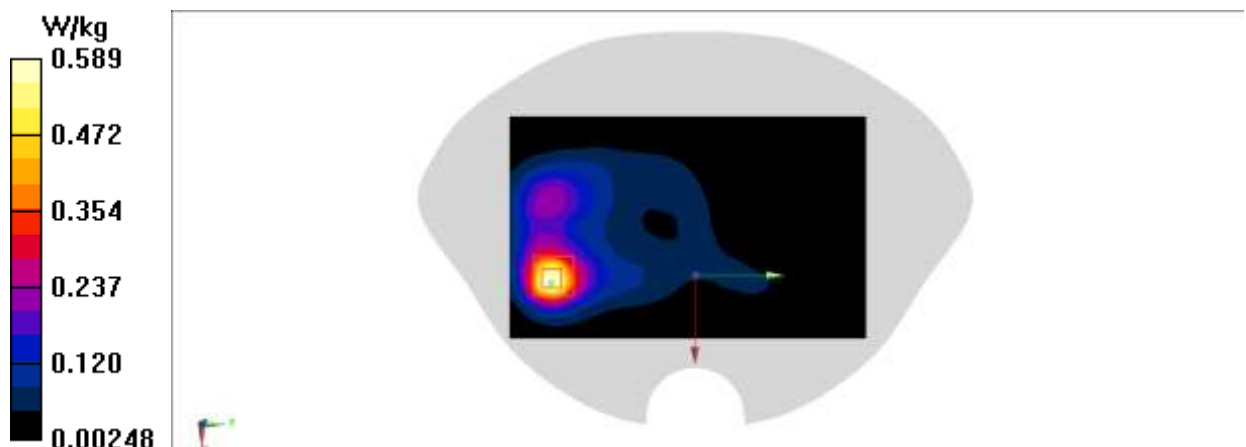


Fig A.91

WIFI2.4G Body

Date/Time: 1/24/2022

Electronics: DAE4 Sn1525

Medium: H680-6000M

Medium parameters used (interpolated): $f = 2437$ MHz; $\sigma = 1.85$ S/m; $\epsilon_r = 38.372$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WLan 2450 (0) Frequency: 2437 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.34, 7.34, 7.34); Calibrated: 2/3/2021

Area Scan (101x161x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.208 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 2.928 V/m; Power Drift = 0.03 dB

Peak SAR (extrapolated) = 0.256 W/kg

SAR(1 g) = 0.117 W/kg; SAR(10 g) = 0.055 W/kg

Maximum value of SAR (measured) = 0.201 W/kg

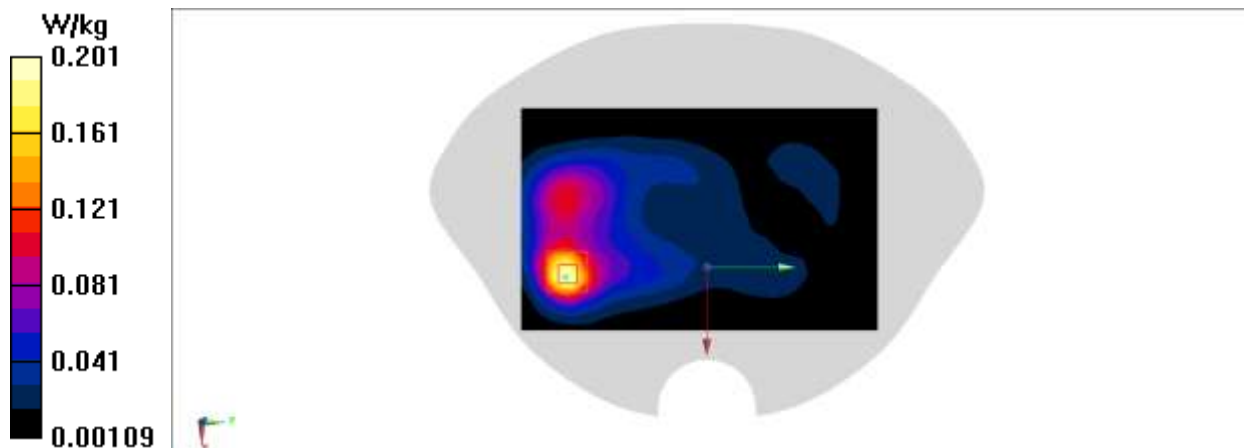


Fig A.92

WIFI5G Head

Date/Time: 1/26/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 5260$ MHz; $\sigma = 4.819$ S/m; $\epsilon_r = 34.808$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, Wlan 11a (0) Frequency: 5260 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(5.42, 5.42, 5.42); Calibrated: 2/3/2021

Area Scan (111x201x1): Interpolated grid: dx=1.000 mm, dy=1.000 mm

Maximum value of SAR (interpolated) = 1.20 W/kg

Zoom Scan (9x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm

Reference Value = 2.729 V/m; Power Drift = -0.02 dB

Peak SAR (extrapolated) = 1.74 W/kg

SAR(1 g) = 0.341 W/kg; SAR(10 g) = 0.084 W/kg

Maximum value of SAR (measured) = 0.975 W/kg

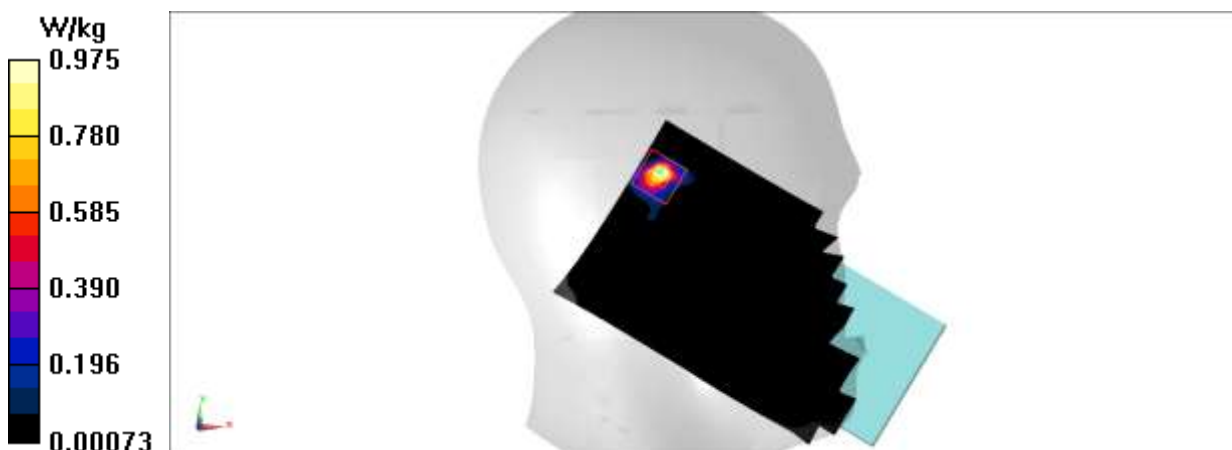


Fig A.93

WIFI5G Body

Date/Time: 1/26/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 5280$ MHz; $\sigma = 4.839$ S/m; $\epsilon_r = 34.784$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, WLan 11a (0) Frequency: 5280 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(5.42, 5.42, 5.42); Calibrated: 2/3/2021

Area Scan (101x191x1): Interpolated grid: dx=1.000 mm, dy=1.000 mm

Maximum value of SAR (interpolated) = 1.60 W/kg

Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm

Reference Value = 5.543 V/m; Power Drift = 0.05 dB

Peak SAR (extrapolated) = 2.74 W/kg

SAR(1 g) = 0.697 W/kg; SAR(10 g) = 0.239 W/kg

Maximum value of SAR (measured) = 1.61 W/kg

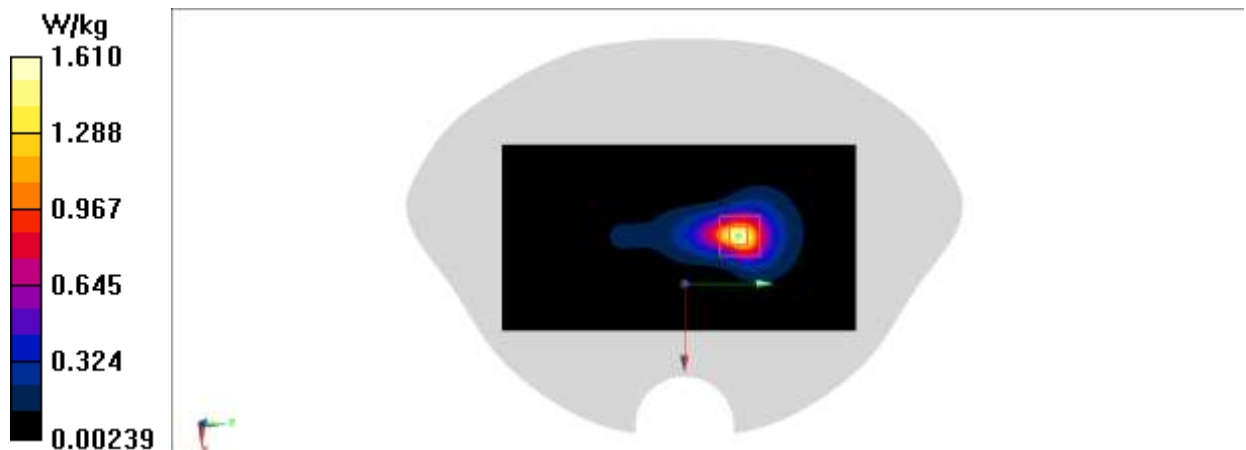


Fig A.94

WIFI5G Body

Date/Time: 1/26/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 5260$ MHz; $\sigma = 4.819$ S/m; $\epsilon_r = 34.808$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, Wlan 11a (0) Frequency: 5260 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(5.42, 5.42, 5.42); Calibrated: 2/3/2021

Area Scan (101x191x1): Interpolated grid: dx=1.000 mm, dy=1.000 mm

Maximum value of SAR (interpolated) = 0.554 W/kg

Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm

Reference Value = 3.038 V/m; Power Drift = -0.03 dB

Peak SAR (extrapolated) = 0.972 W/kg

SAR(1 g) = 0.238 W/kg; SAR(10 g) = 0.080 W/kg

Maximum value of SAR (measured) = 0.555 W/kg

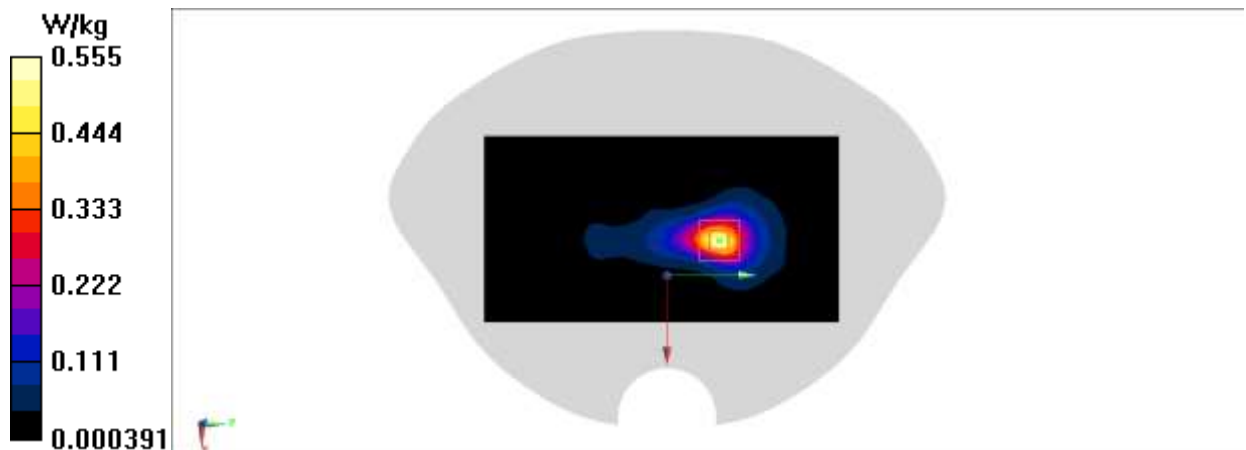


Fig A.95

BT Head

Date/Time: 1/24/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2480$ MHz; $\sigma = 1.887$ S/m; $\epsilon_r = 38.275$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, Bluetooth2 (0) Frequency: 2480 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.34, 7.34, 7.34); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.188 W/kg

Zoom Scan (8x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 3.684 V/m; Power Drift = 0.09 dB

Peak SAR (extrapolated) = 0.201 W/kg

SAR(1 g) = 0.092 W/kg; SAR(10 g) = 0.041 W/kg

Maximum value of SAR (measured) = 0.157 W/kg

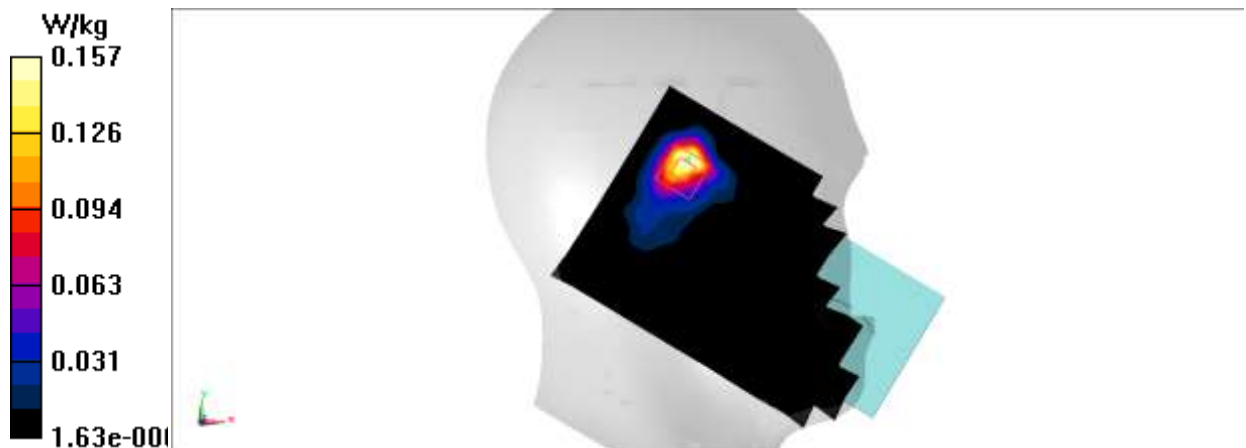


Fig A.96

BT Body

Date/Time: 1/24/2022

Electronics: DAE4 Sn1525

Medium: H700-6000M

Medium parameters used: $f = 2480$ MHz; $\sigma = 1.887$ S/m; $\epsilon_r = 38.275$; $\rho = 1000$ kg/m³

Ambient Temperature: 22.8°C Liquid Temperature: 22.3°C

Communication System: UID 0, Bluetooth2 (0) Frequency: 2480 MHz Duty Cycle: 1:1

Probe: EX3DV4 - SN7517 ConvF(7.34, 7.34, 7.34); Calibrated: 2/3/2021

Area Scan (101x171x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Maximum value of SAR (interpolated) = 0.0423 W/kg

Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 0.9280 V/m; Power Drift = 0.02 dB

Peak SAR (extrapolated) = 0.0530 W/kg

SAR(1 g) = 0.023 W/kg; SAR(10 g) = 0.011 W/kg

Maximum value of SAR (measured) = 0.0393 W/kg

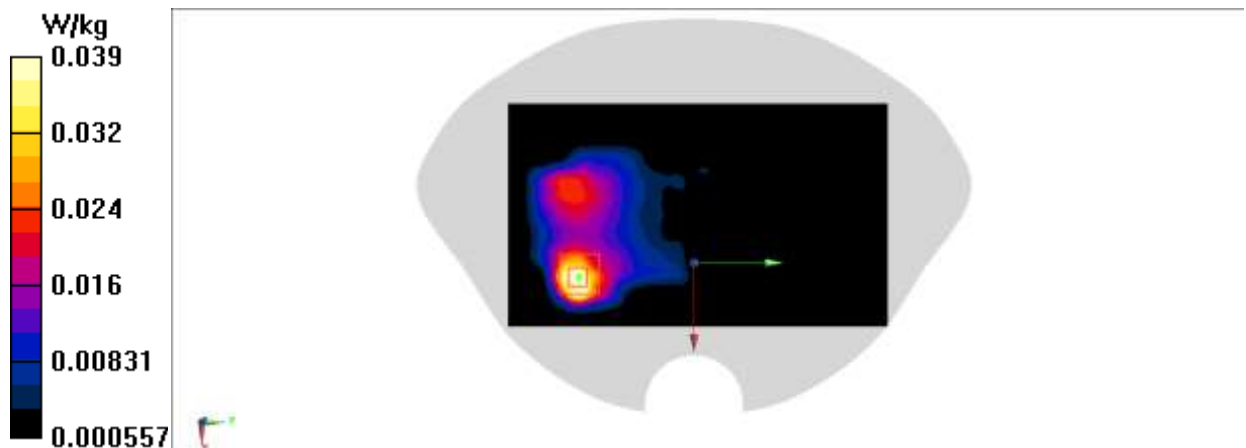
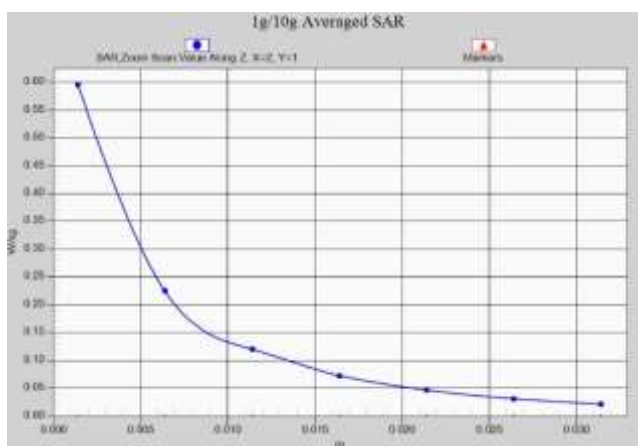
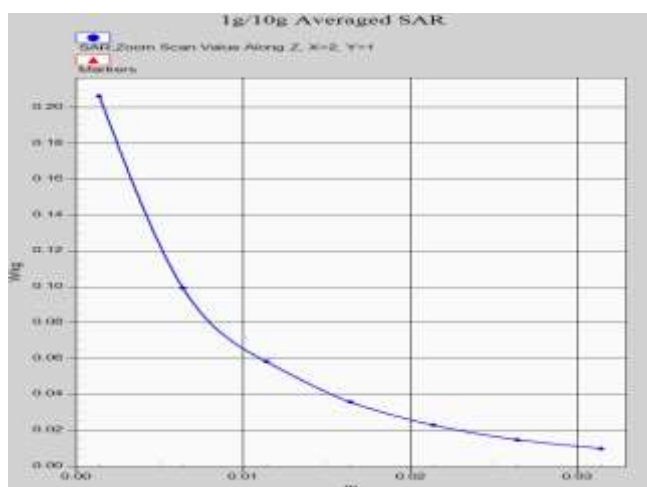


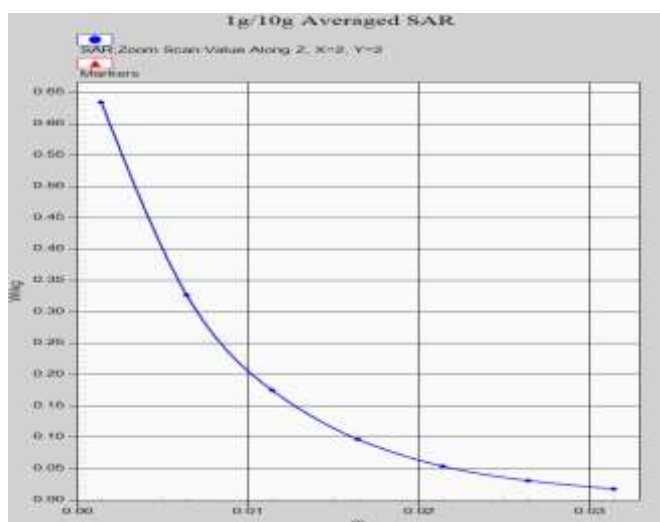
Fig A.97



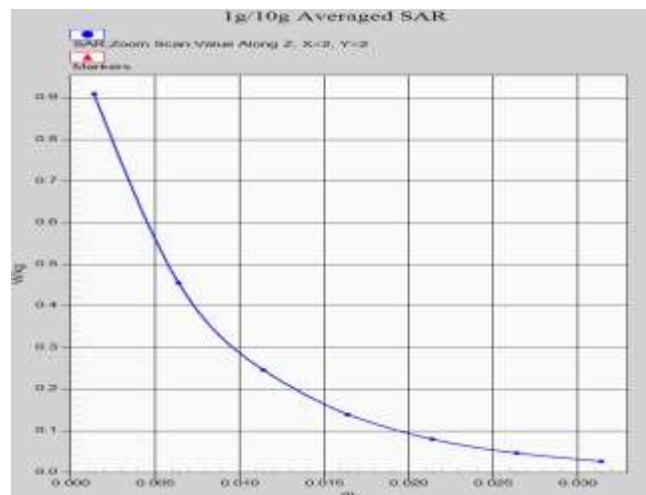
Z-Scan at power reference point (CDMA BC0 ANT13)



Z-Scan at power reference point (GSM850 ANT13)



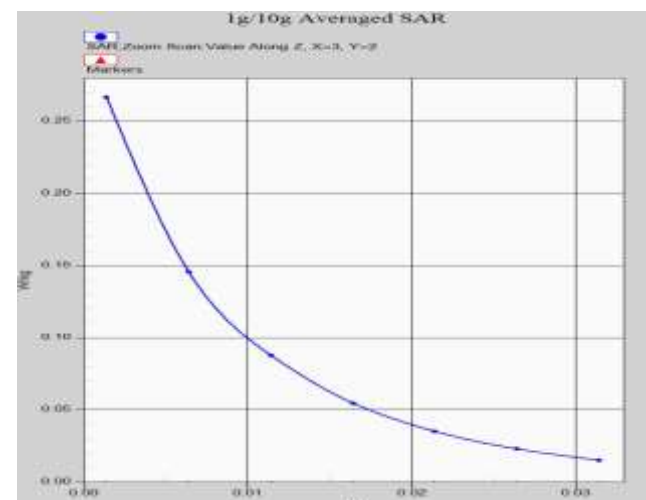
Z-Scan at power reference point (GSM1900 ANT13)



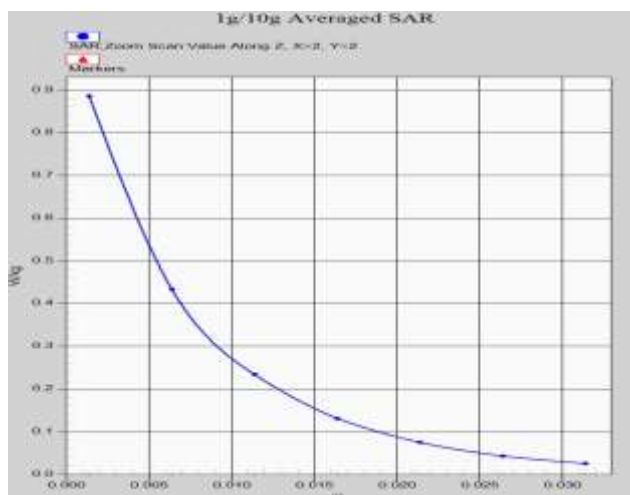
Z-Scan at power reference point (WCDMA1900 ANT13)



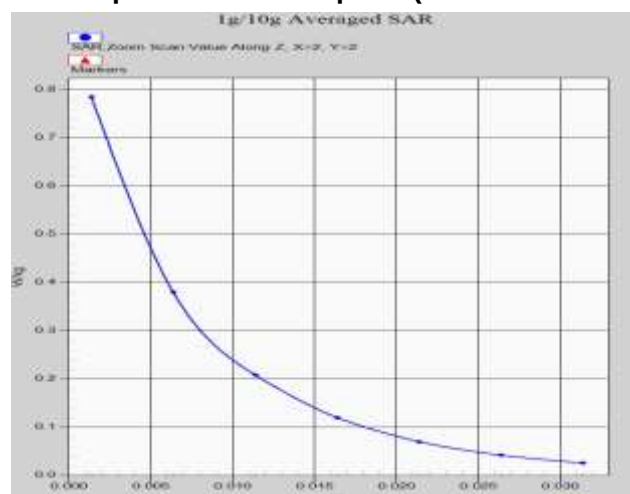
Z-Scan at power reference point (WCDMA1700 ANT13)



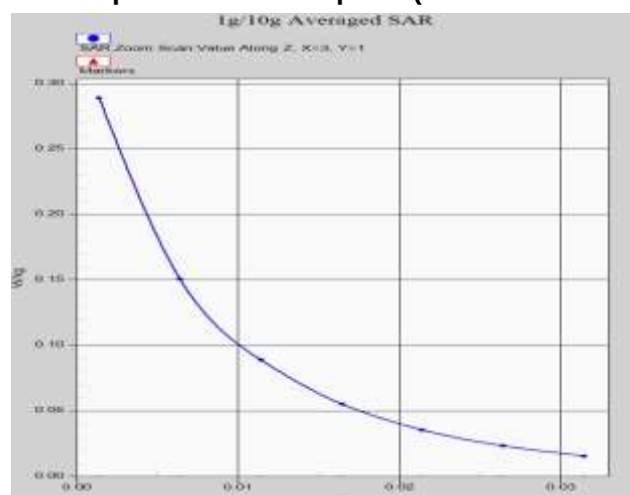
Z-Scan at power reference point (WCDMA850 ANT13)



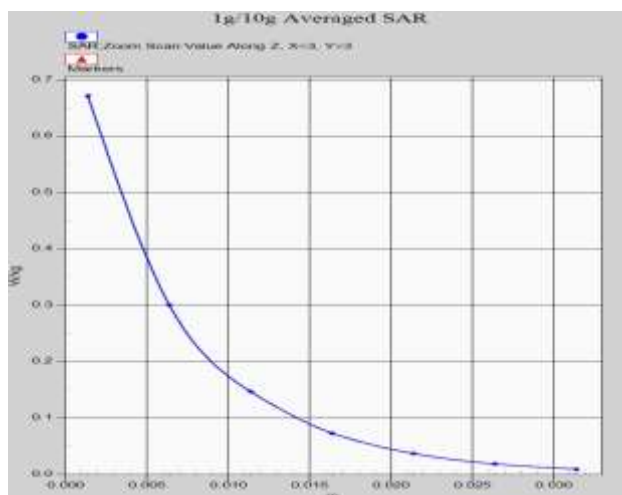
Z-Scan at power reference point (LTE Band2 ANT13)



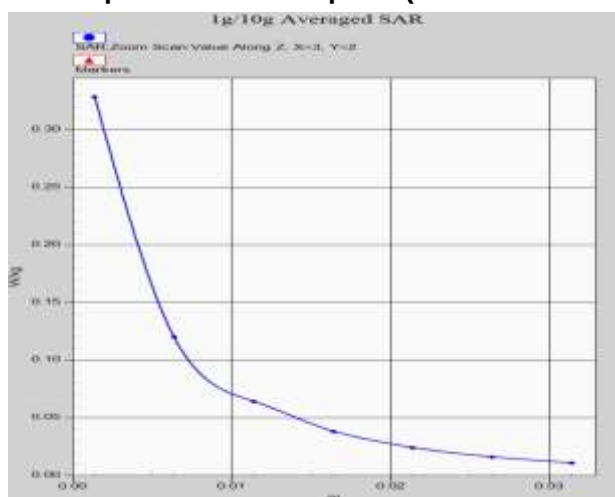
Z-Scan at power reference point (LTE Band4 ANT13)



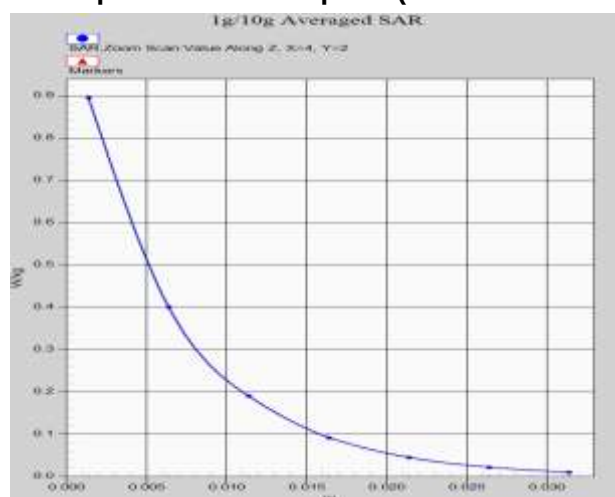
Z-Scan at power reference point (LTE Band5 ANT13)



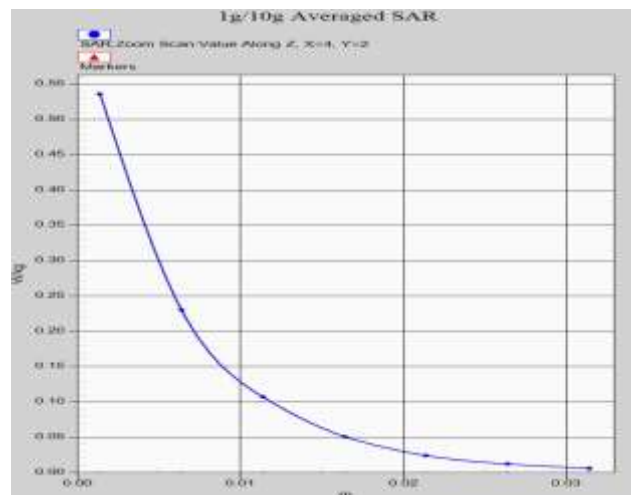
Z-Scan at power reference point (LTE Band7 ANT13)



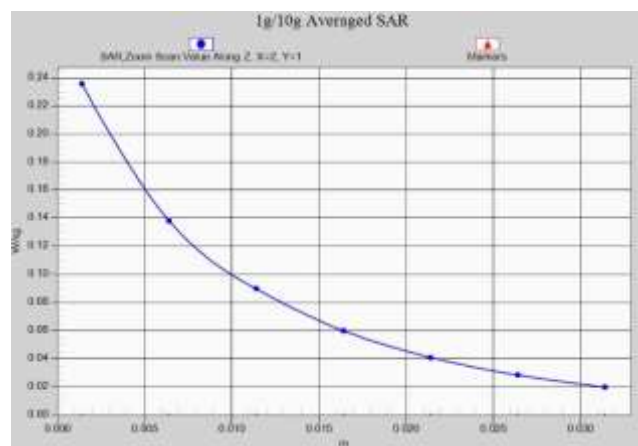
Z-Scan at power reference point (LTE Band12 ANT13)



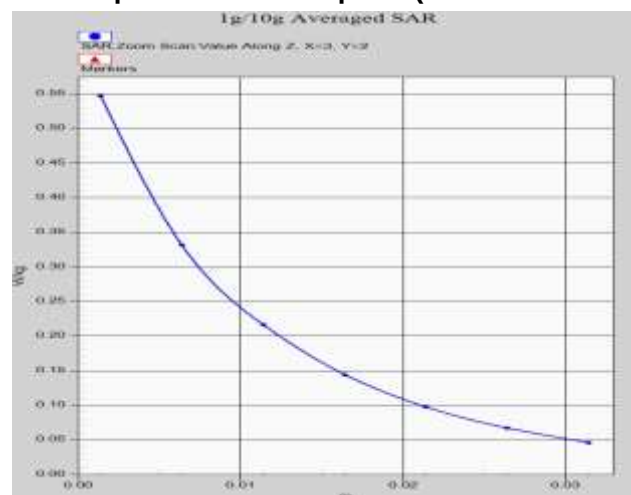
Z-Scan at power reference point (LTE Band38 ANT13)



Z-Scan at power reference point (LTE Band41 ANT13)



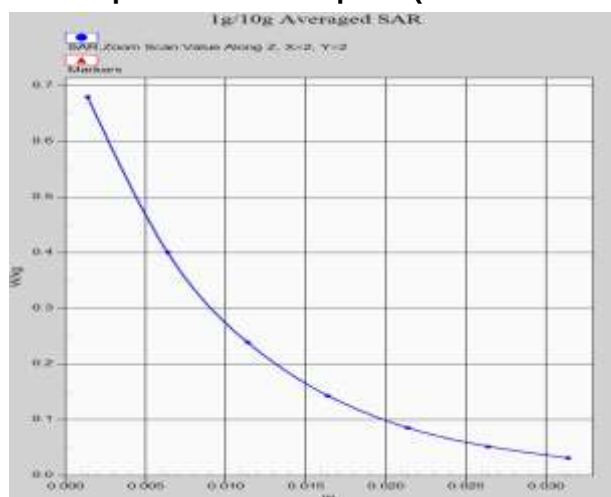
Z-Scan at power reference point (CDMA BC0 ANT13)



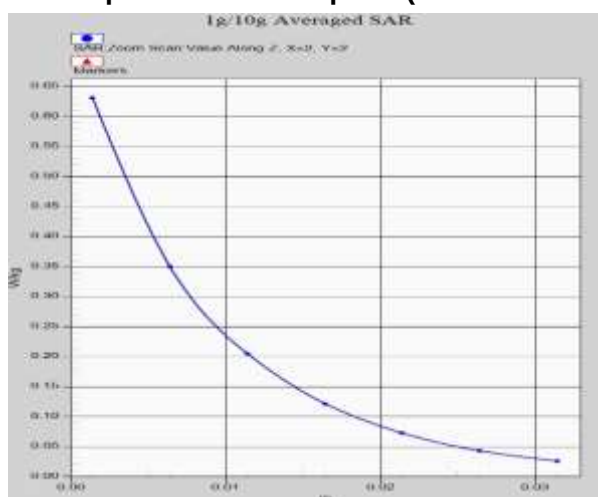
Z-Scan at power reference point (GSM850 ANT13)



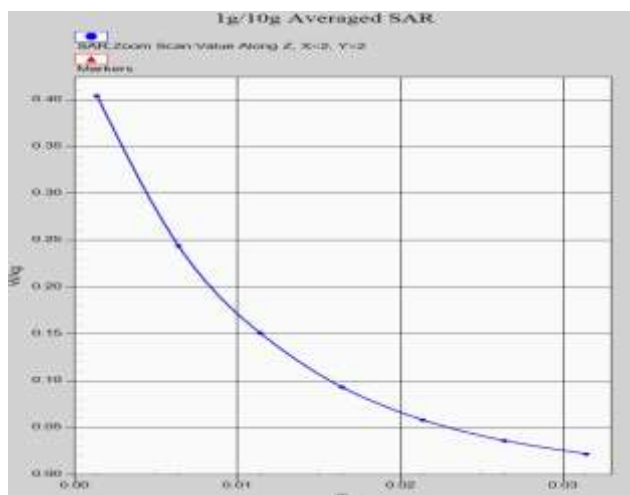
Z-Scan at power reference point (GSM1900 ANT13)



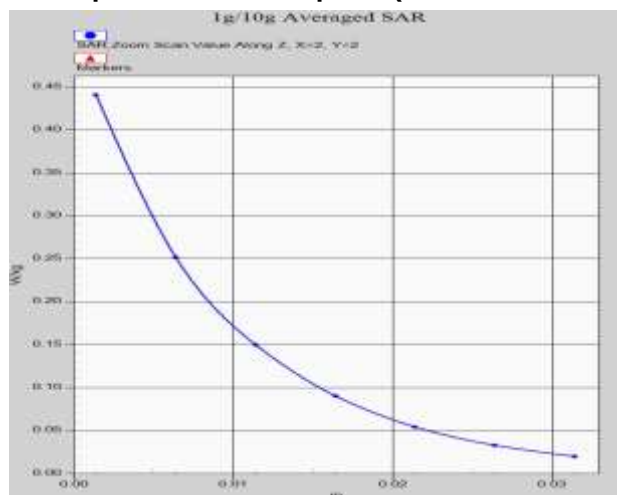
Z-Scan at power reference point (GSM1900 ANT13)



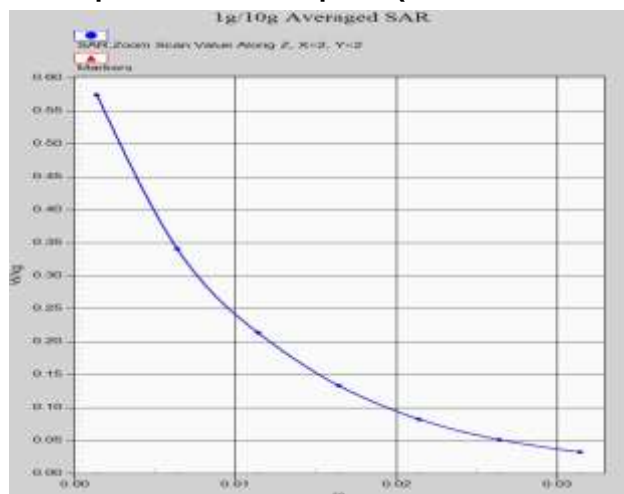
Z-Scan at power reference point (WCDMA1900 ANT13)



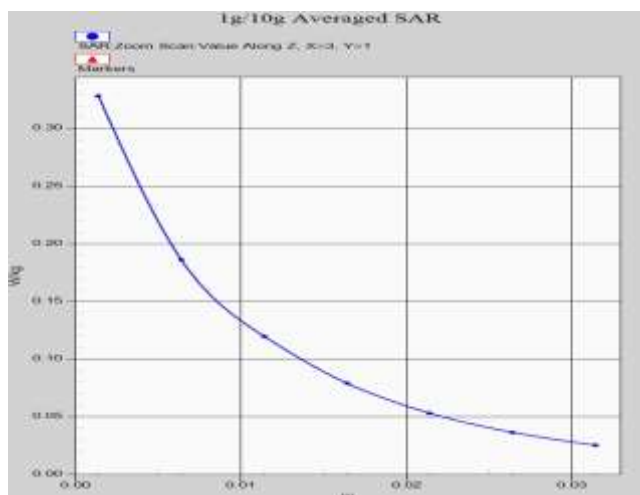
Z-Scan at power reference point (WCDMA1900 ANT13)



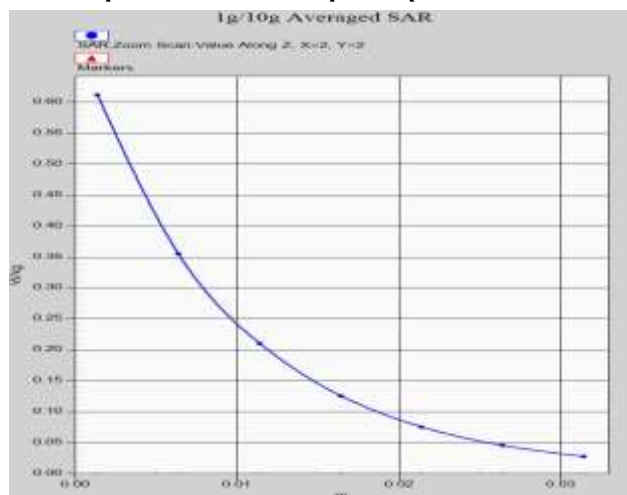
Z-Scan at power reference point (WCDMA1700 ANT13)



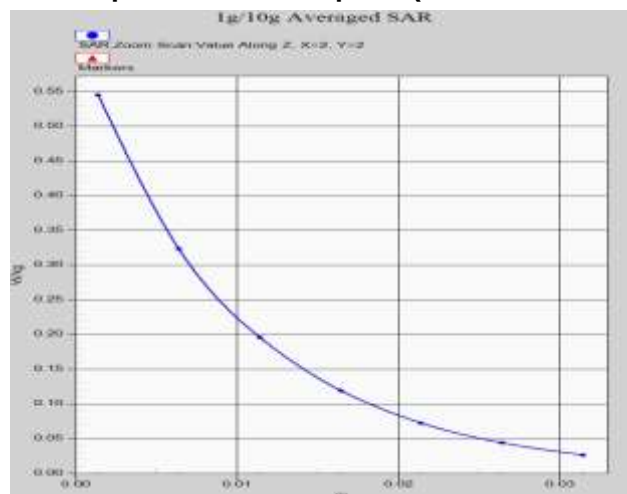
Z-Scan at power reference point (WCDMA1700 ANT13)



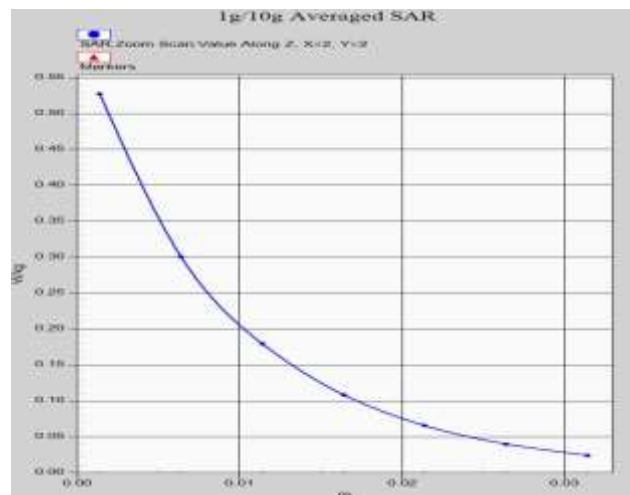
Z-Scan at power reference point (WCDMA850 ANT13)



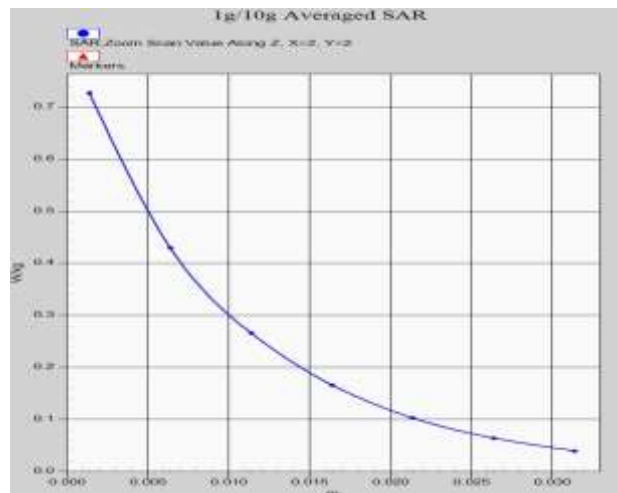
Z-Scan at power reference point (LTE Band2 ANT13)



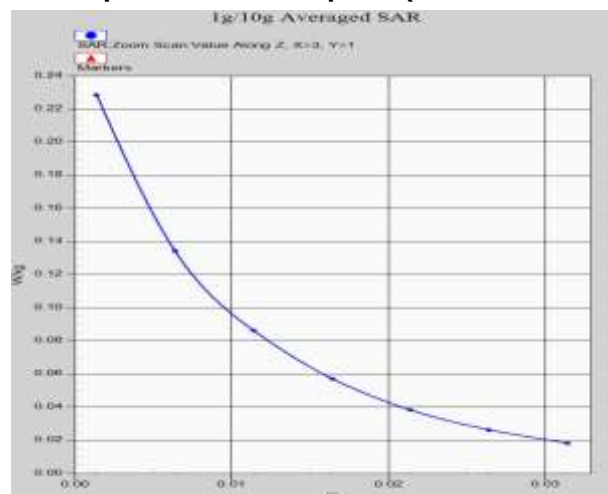
Z-Scan at power reference point (LTE Band2 ANT13)



Z-Scan at power reference point (LTE Band4 ANT13)



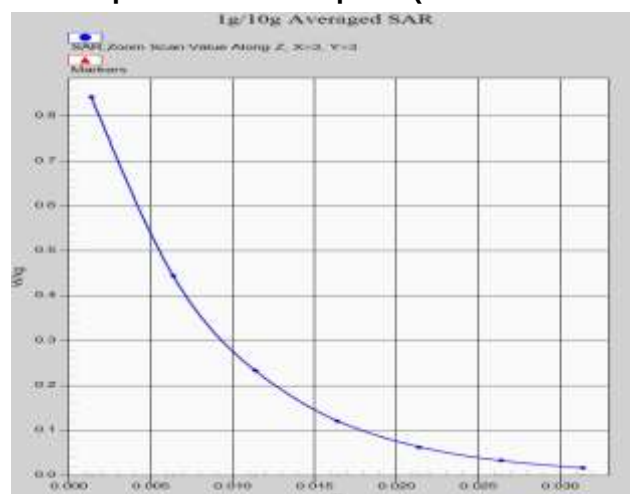
Z-Scan at power reference point (LTE Band4 ANT13)



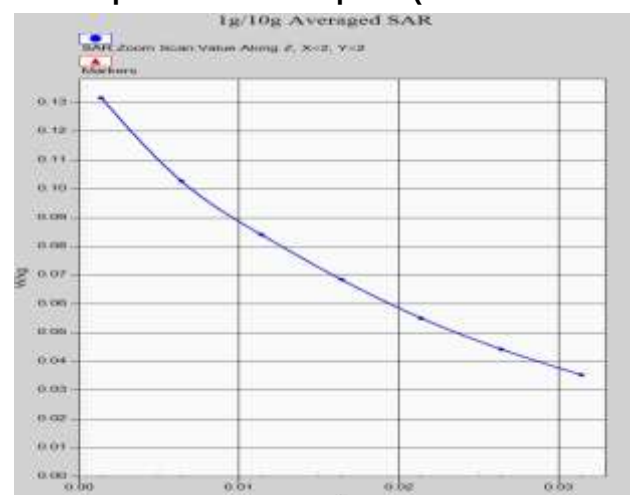
Z-Scan at power reference point (LTE Band5 ANT13)



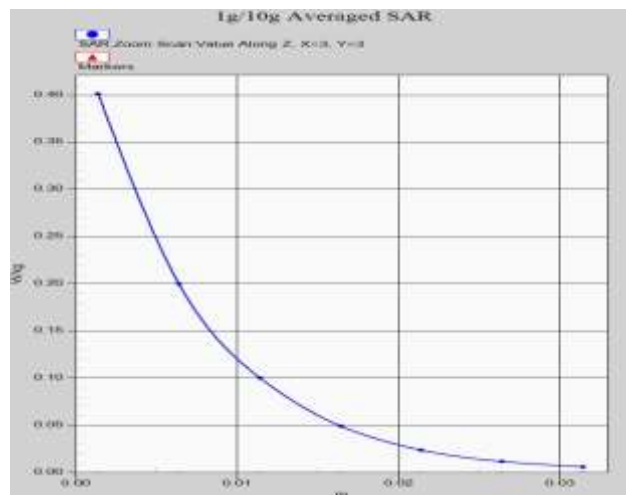
Z-Scan at power reference point (LTE Band7 ANT13)



Z-Scan at power reference point (LTE Band7 ANT13)



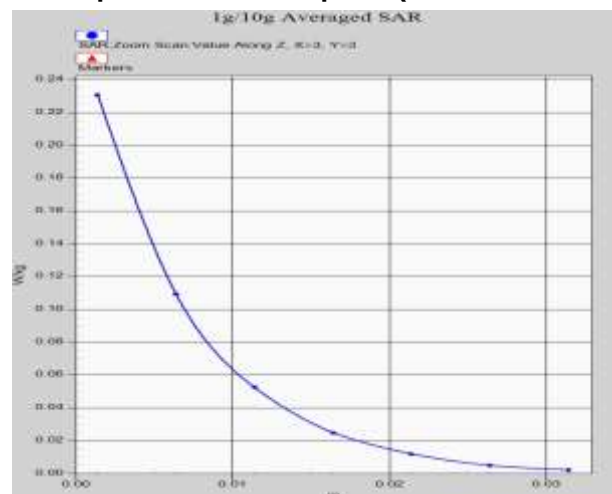
Z-Scan at power reference point (LTE Band12 ANT13)



Z-Scan at power reference point (LTE Band38 ANT13)



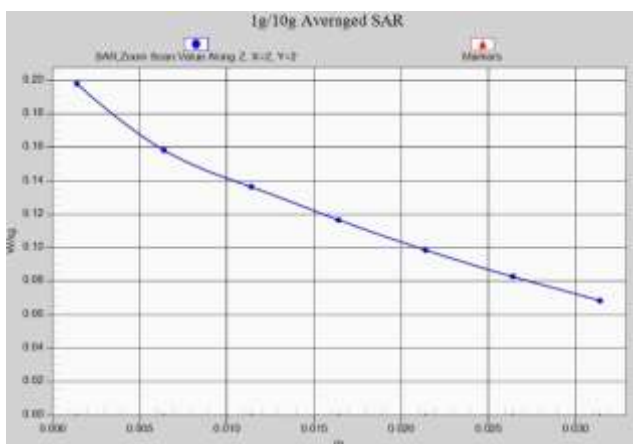
Z-Scan at power reference point (LTE Band38 ANT13)



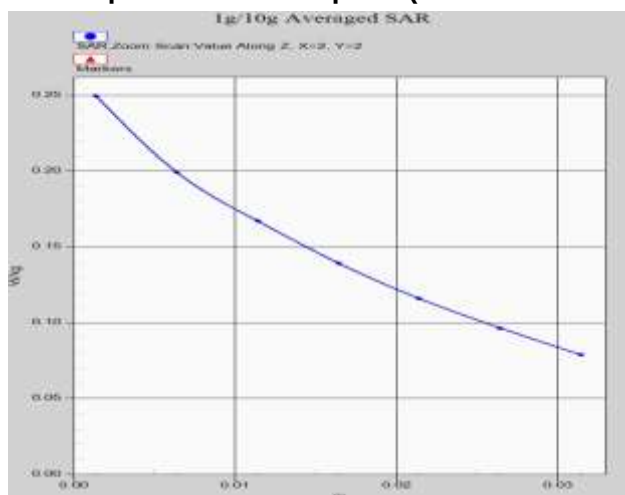
Z-Scan at power reference point (LTE Band41 ANT13)



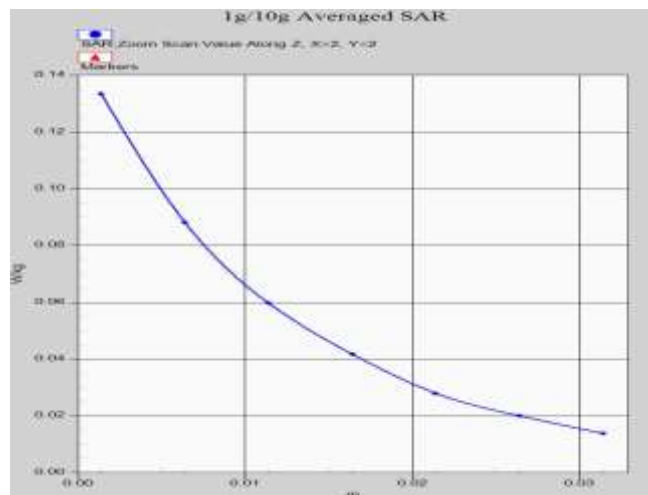
Z-Scan at power reference point (LTE Band41 ANT13)



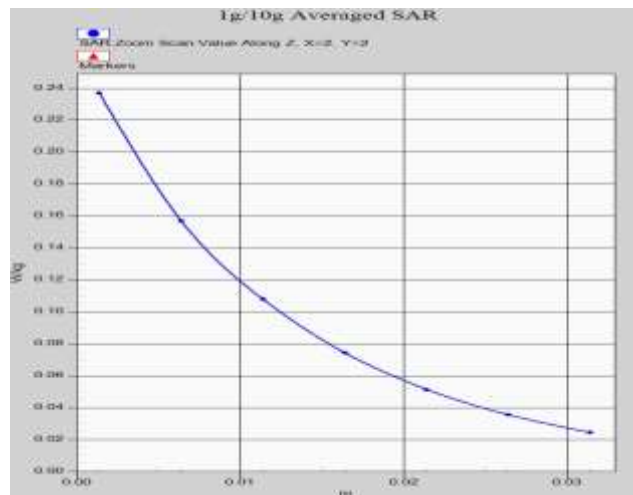
Z-Scan at power reference point (CDMA BC0 ANT41)



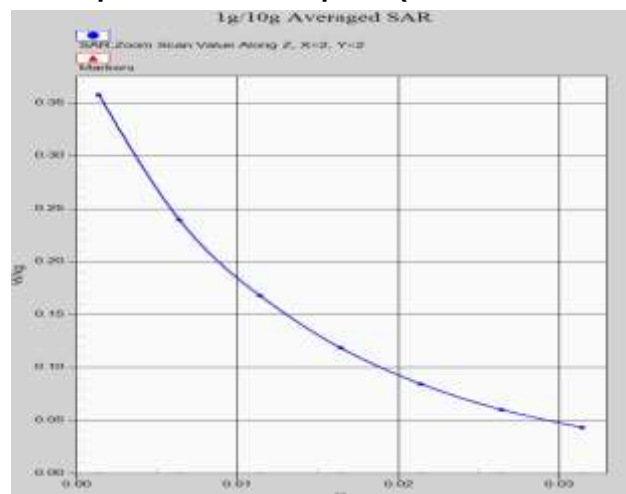
Z-Scan at power reference point (GSM850 ANT41)



Z-Scan at power reference point (GSM1900 ANT31)



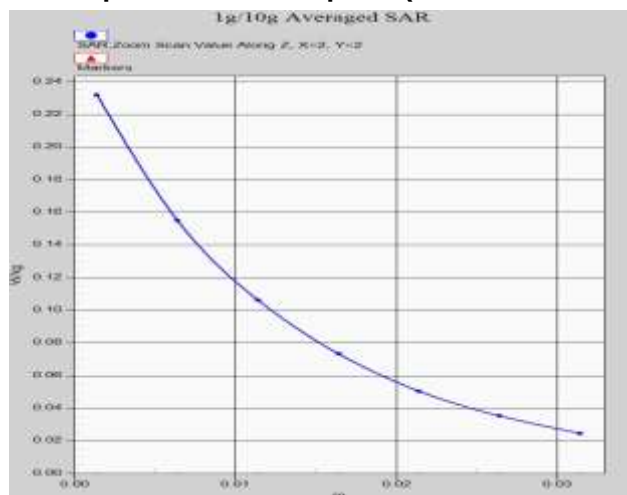
Z-Scan at power reference point (WCDMA1900 ANT31)



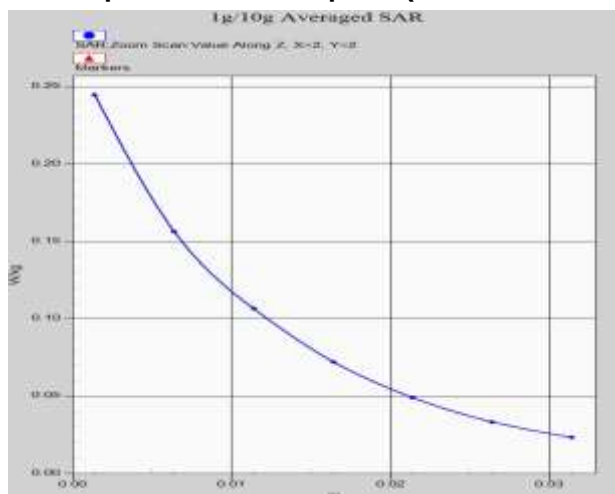
Z-Scan at power reference point (WCDMA1700 ANT31)



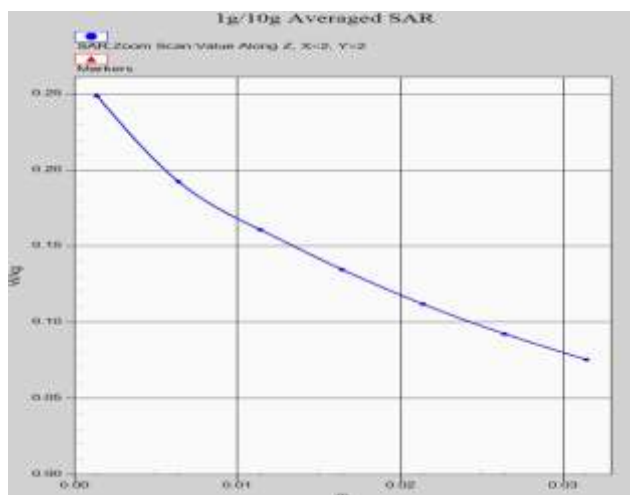
Z-Scan at power reference point (WCDMA850 ANT41)



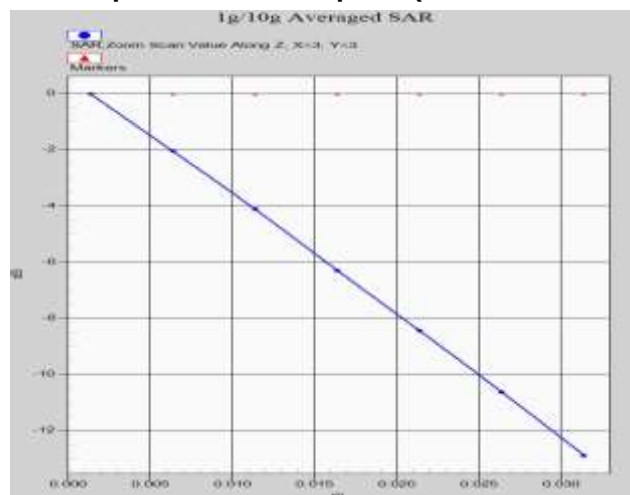
Z-Scan at power reference point (LTE Band2 ANT31)



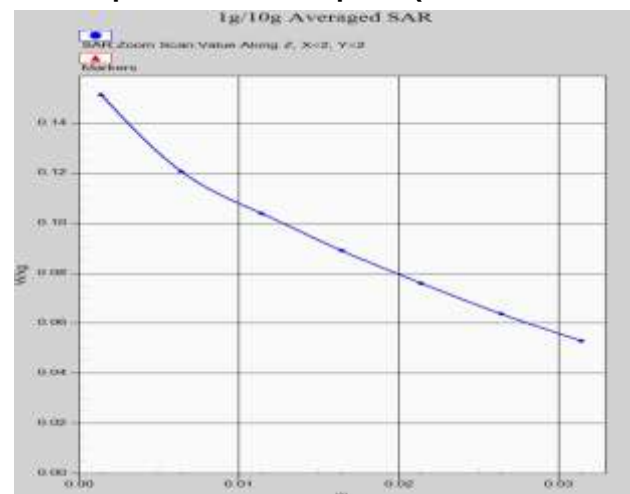
Z-Scan at power reference point (LTE Band4 ANT31)



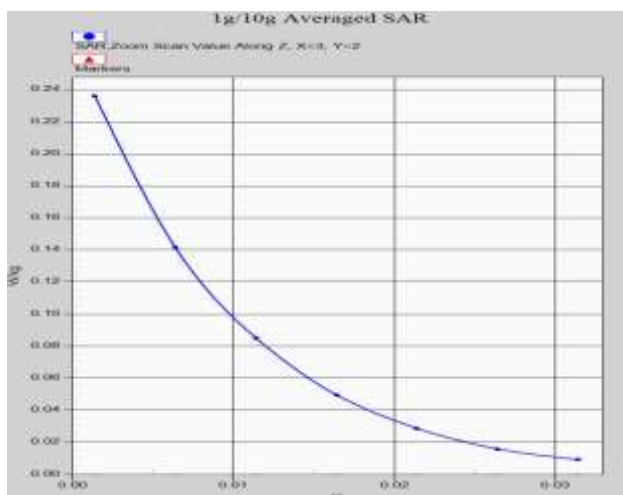
Z-Scan at power reference point (LTE Band5 ANT41)



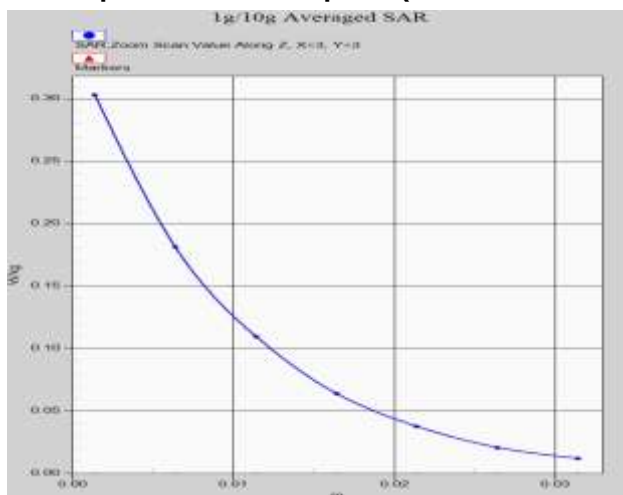
Z-Scan at power reference point (LTE Band7 ANT31)



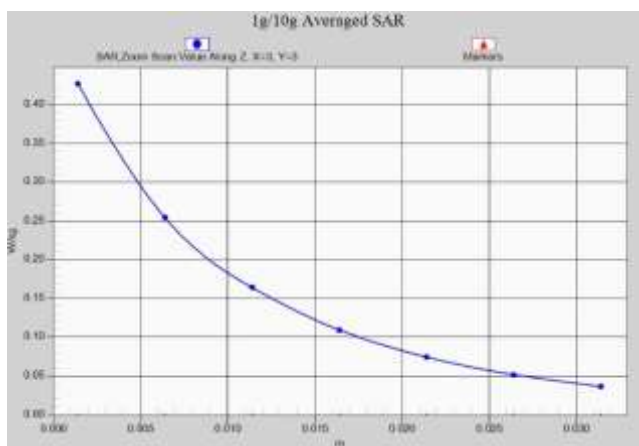
Z-Scan at power reference point (LTE Band12 ANT41)



Z-Scan at power reference point (LTE Band38 ANT31)



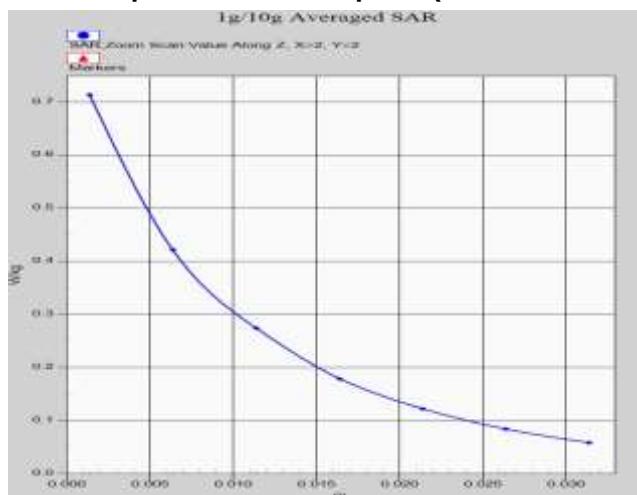
Z-Scan at power reference point (LTE Band41 ANT31)



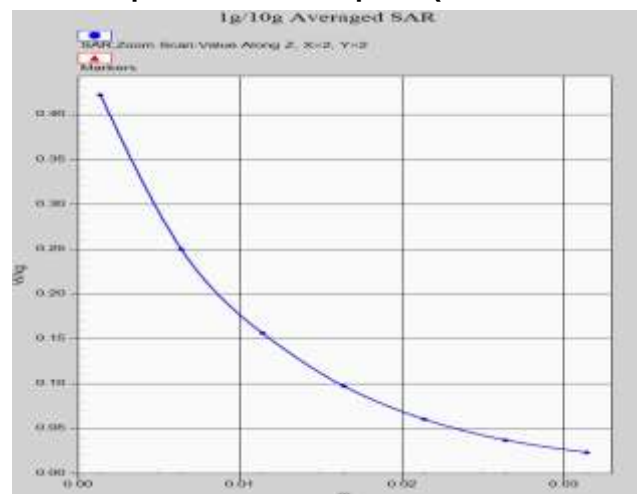
Z-Scan at power reference point (CDMA BC0 ANT41)



Z-Scan at power reference point (GSM850 ANT41)



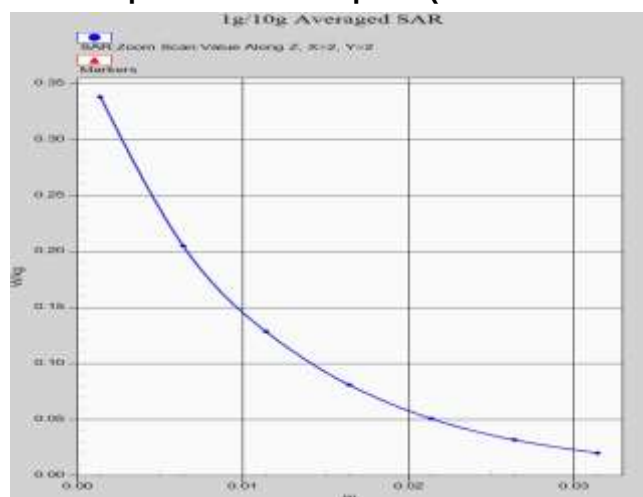
Z-Scan at power reference point (GSM850 ANT41)



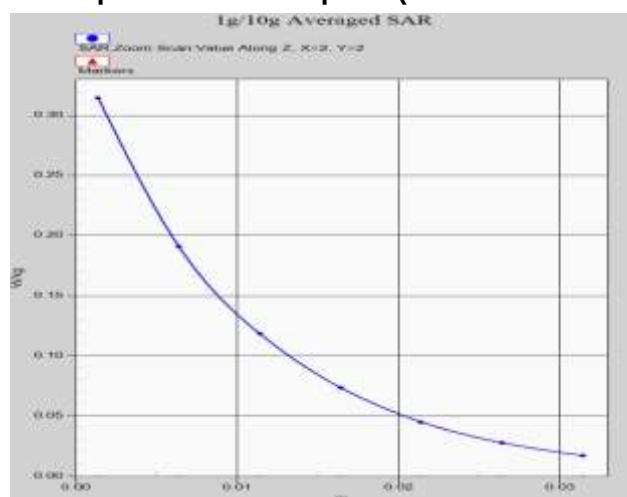
Z-Scan at power reference point (GSM1900 ANT31)



Z-Scan at power reference point (GSM1900 ANT31)



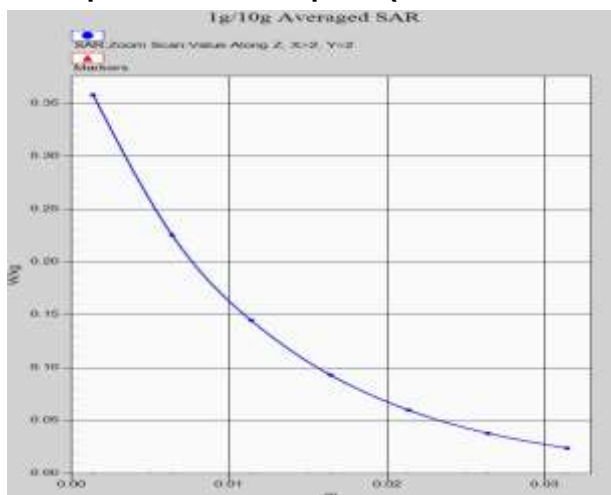
Z-Scan at power reference point (WCDMA1900 ANT31)



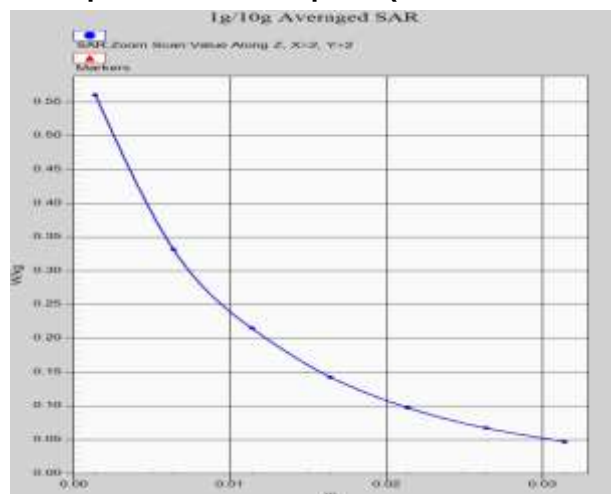
Z-Scan at power reference point (WCDMA1900 ANT31)



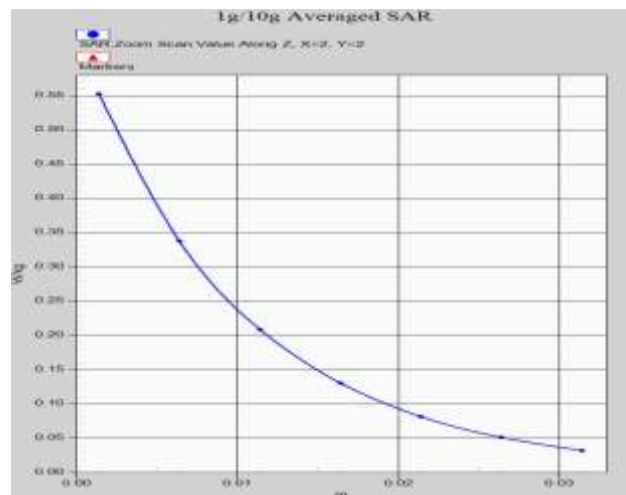
Z-Scan at power reference point (WCDMA1700 ANT31)



Z-Scan at power reference point (WCDMA1700 ANT31)



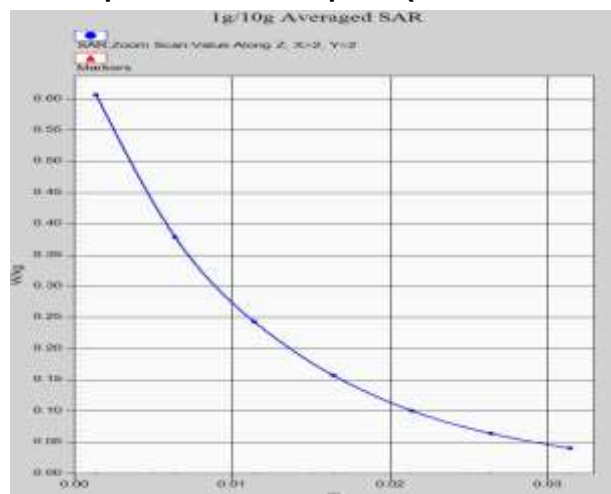
Z-Scan at power reference point (WCDMA850 ANT41)



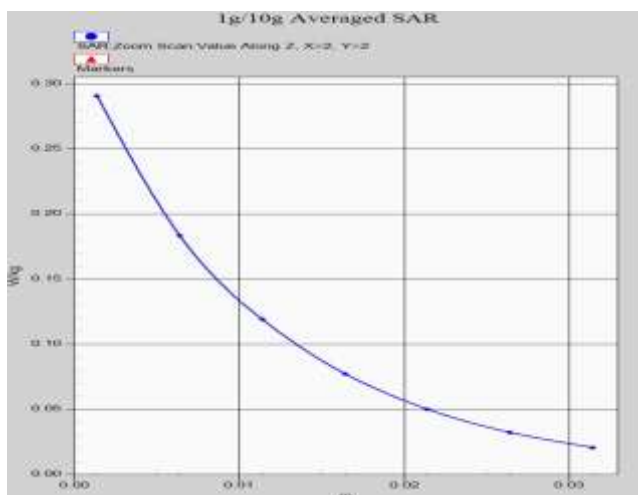
Z-Scan at power reference point (LTE Band2 ANT31)



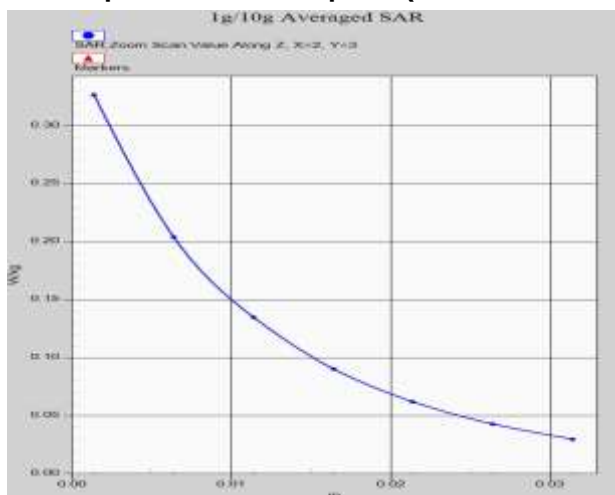
Z-Scan at power reference point (LTE Band2 ANT31)



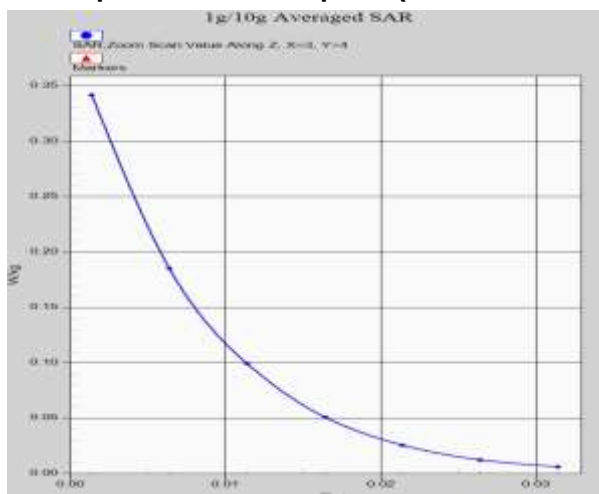
Z-Scan at power reference point (LTE Band4 ANT31)



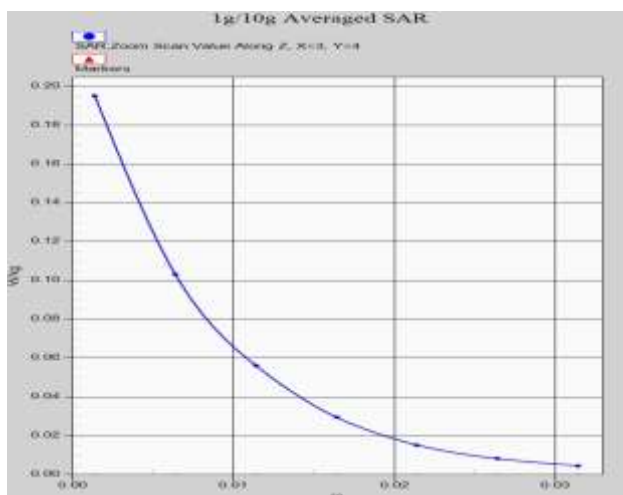
Z-Scan at power reference point (LTE Band4 ANT31)



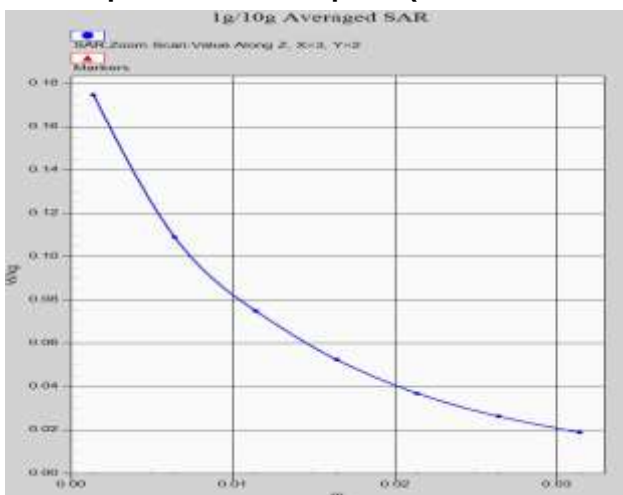
Z-Scan at power reference point (LTE Band5 ANT41)



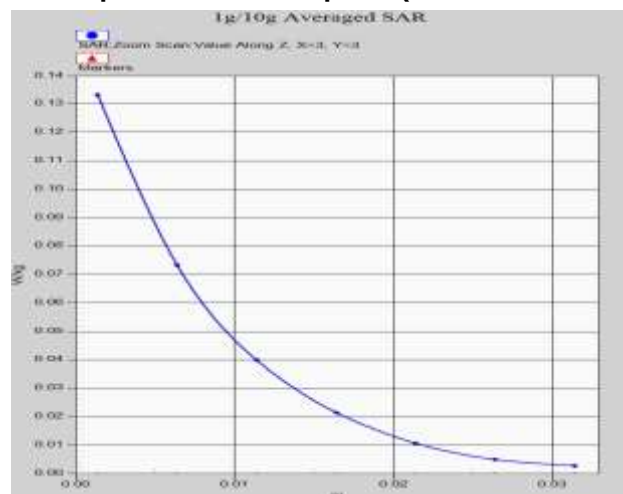
Z-Scan at power reference point (LTE Band7 ANT31)



Z-Scan at power reference point (LTE Band7 ANT31)



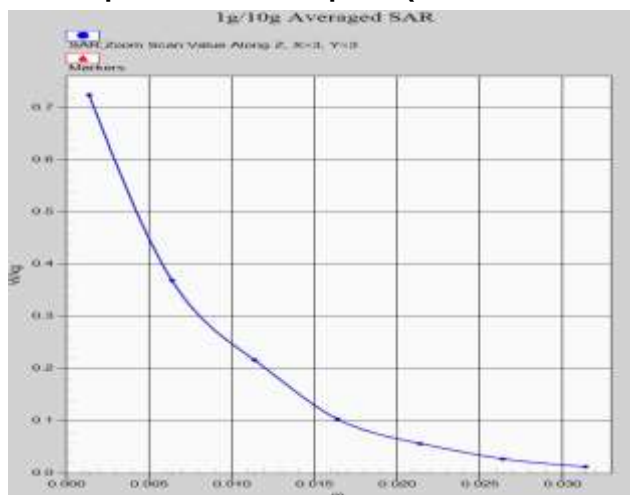
Z-Scan at power reference point (LTE Band12 ANT41)



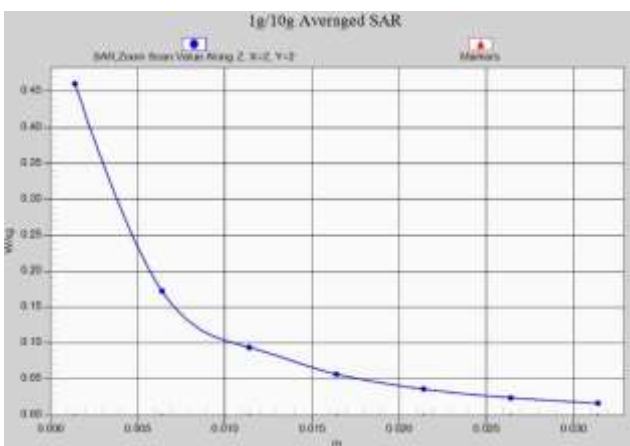
Z-Scan at power reference point (LTE Band38 ANT31)



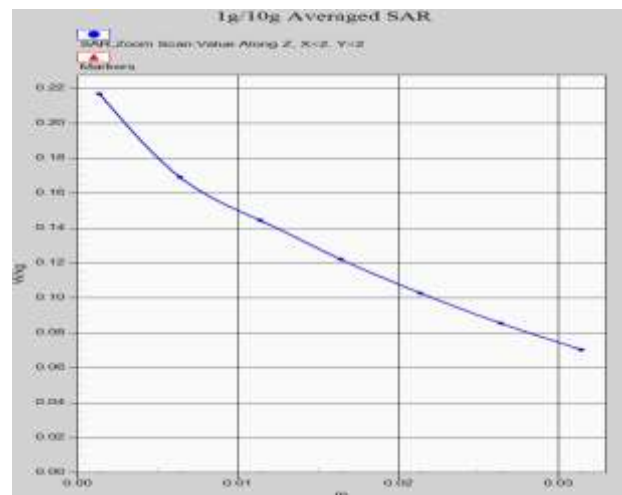
Z-Scan at power reference point (LTE Band38 ANT31)



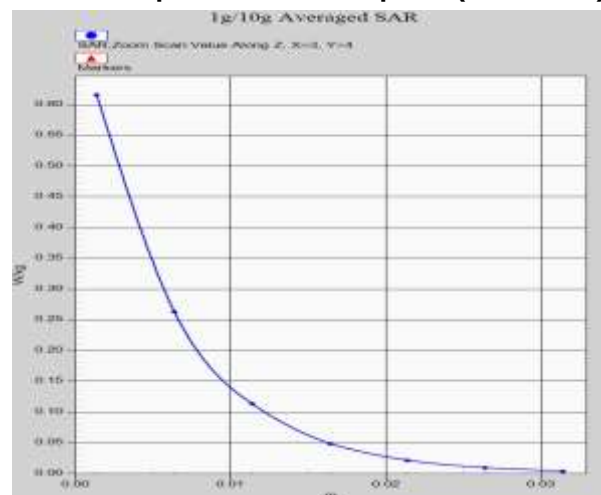
Z-Scan at power reference point (LTE Band41 ANT31)



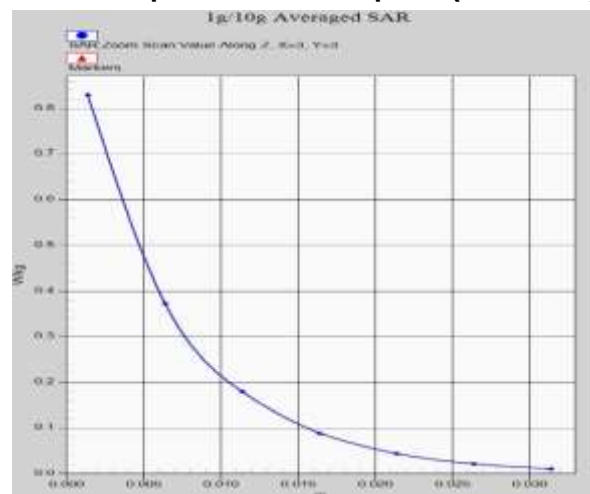
Z-Scan at power reference point (N5 ANT13)



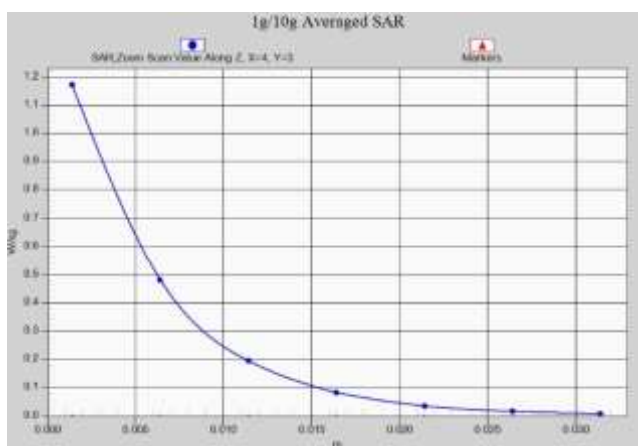
Z-Scan at power reference point (N5 ANT41)



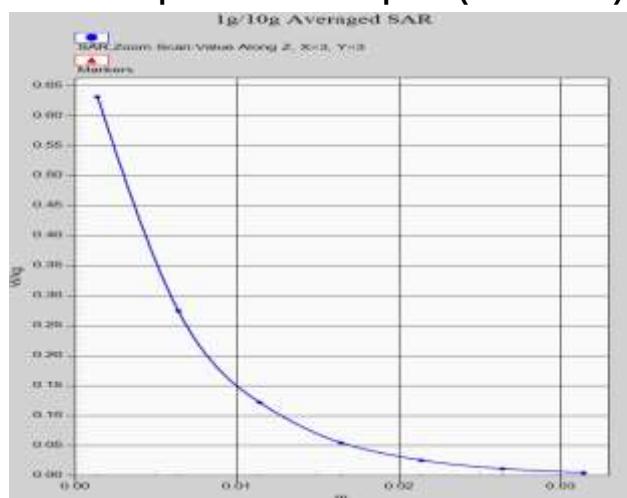
Z-Scan at power reference point (N7 ANT11)



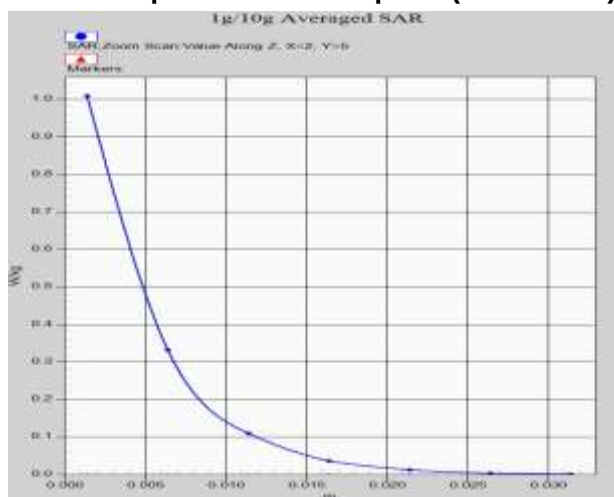
Z-Scan at power reference point (N7 ANT13)



Z-Scan at power reference point (N41 ANT11)



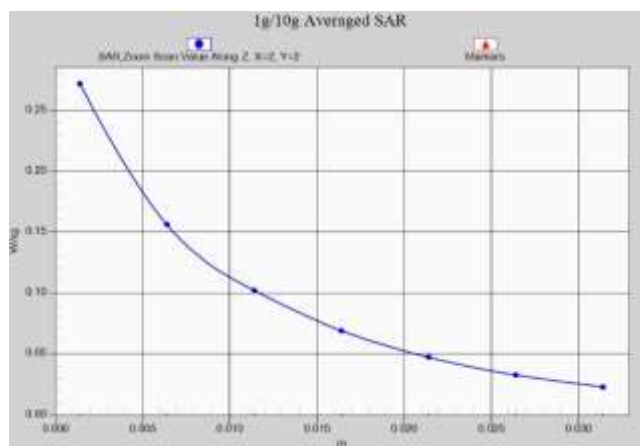
Z-Scan at power reference point (N41 ANT13)



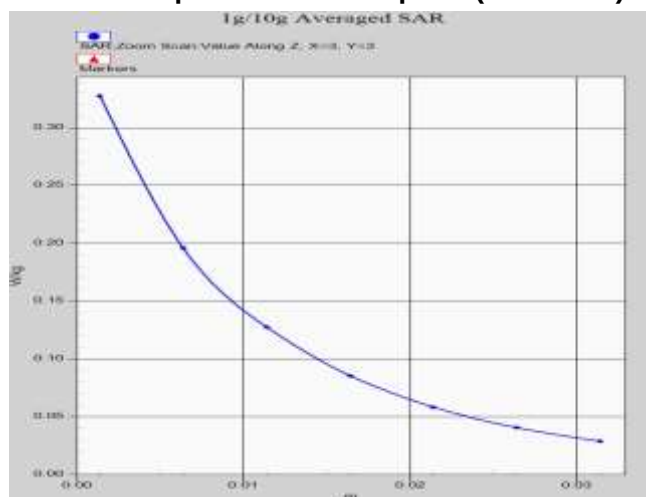
Z-Scan at power reference point (N78 ANT11)



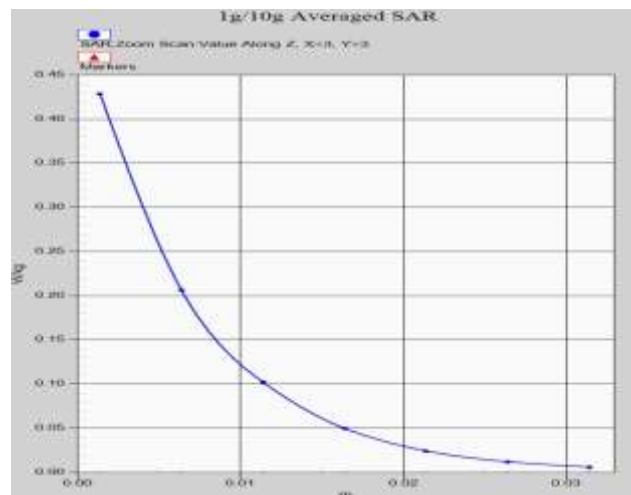
Z-Scan at power reference point (N78 ANT12)



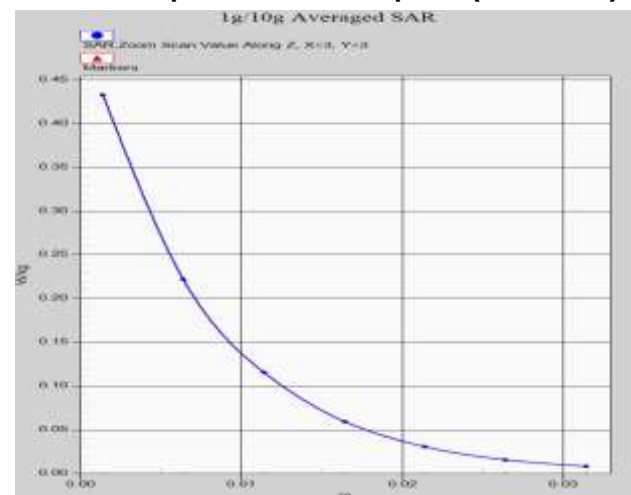
Z-Scan at power reference point (N5 ANT13)



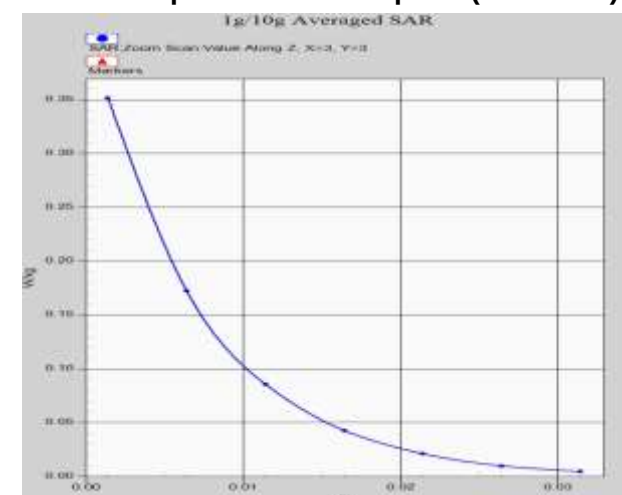
Z-Scan at power reference point (N5 ANT41)



Z-Scan at power reference point (N7 ANT11)



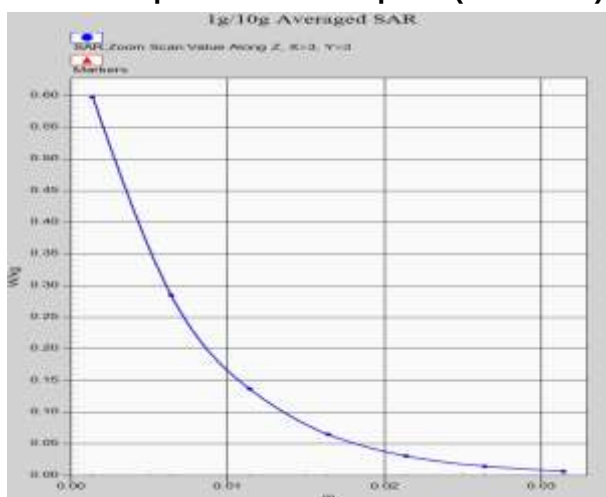
Z-Scan at power reference point (N7 ANT11)



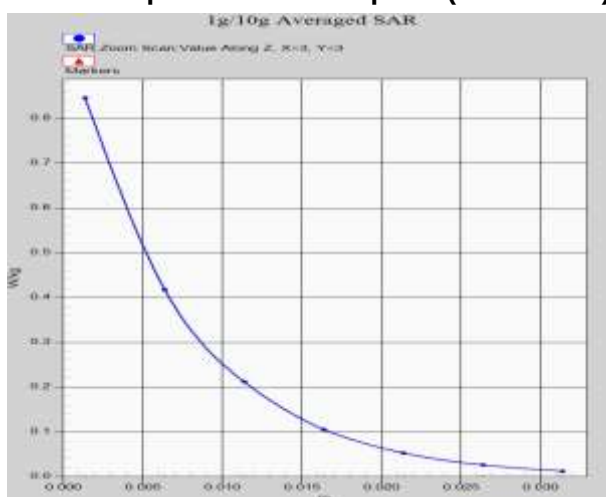
Z-Scan at power reference point (N7 ANT13)



Z-Scan at power reference point (N7 ANT13)



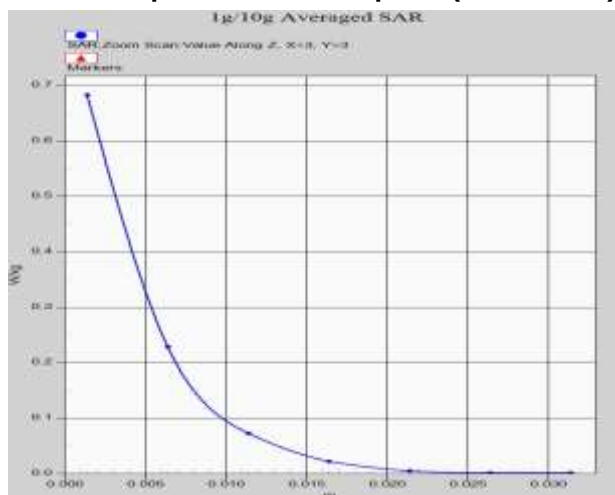
Z-Scan at power reference point (N41 ANT11)



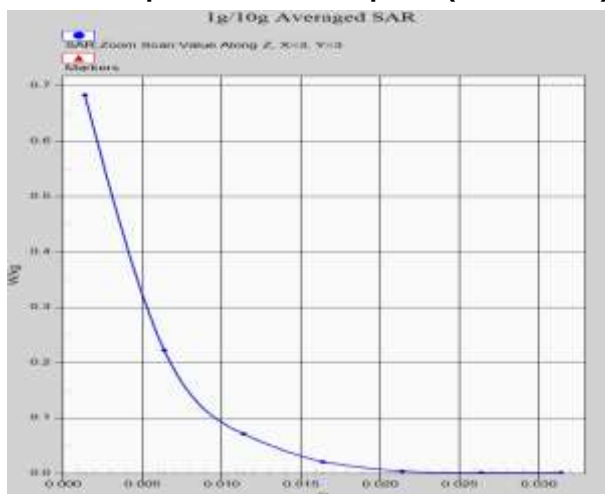
Z-Scan at power reference point (N41 ANT11)



Z-Scan at power reference point (N41 ANT13)



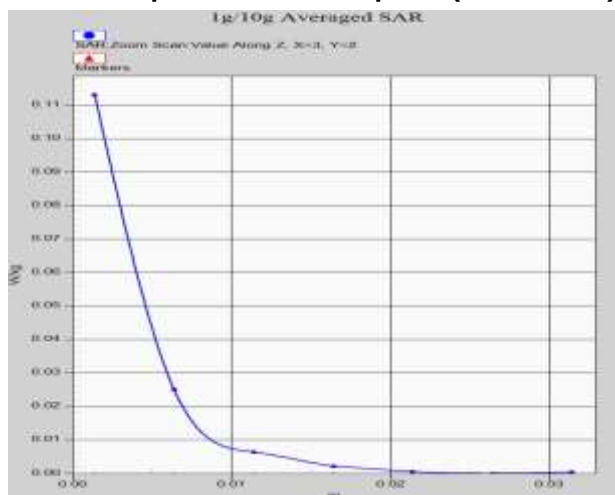
Z-Scan at power reference point (N78 ANT11)



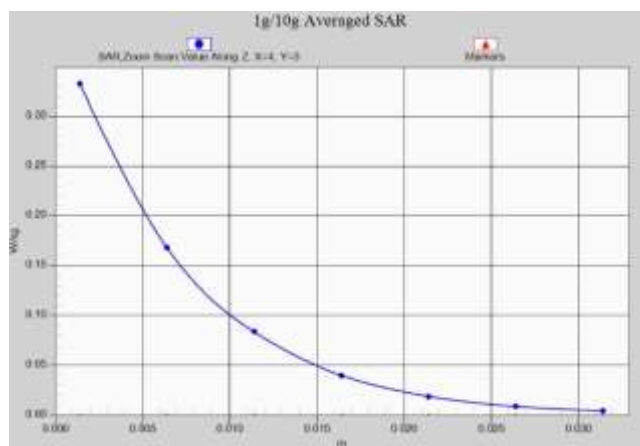
Z-Scan at power reference point (N78 ANT11)



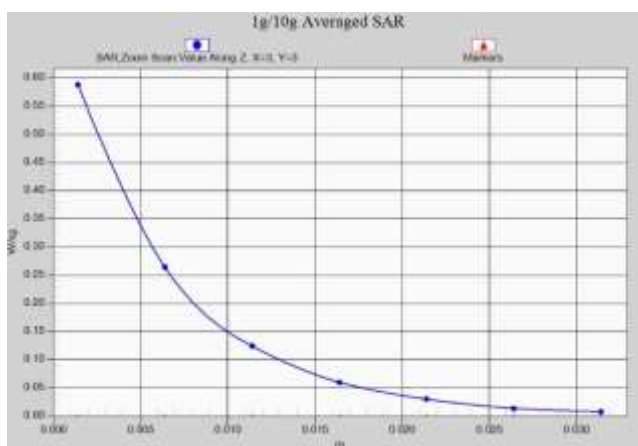
Z-Scan at power reference point (N78 ANT12)



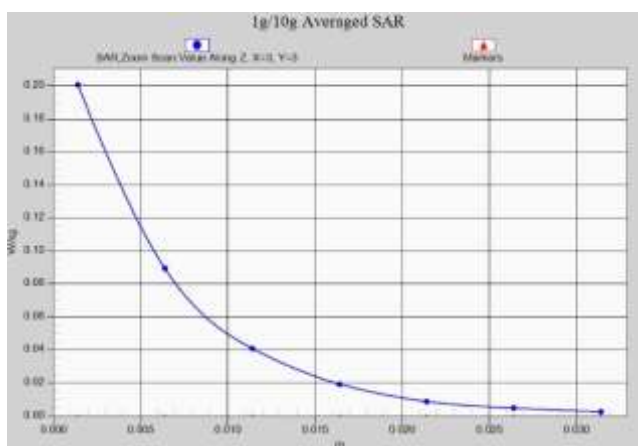
Z-Scan at power reference point (N78 ANT12)



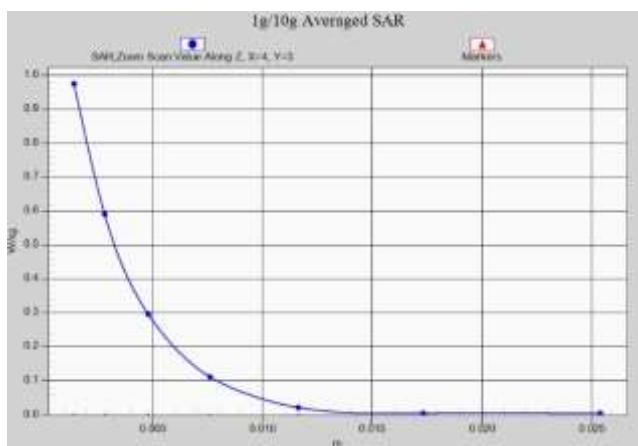
Z-Scan at power reference point (WIFI2.4G)



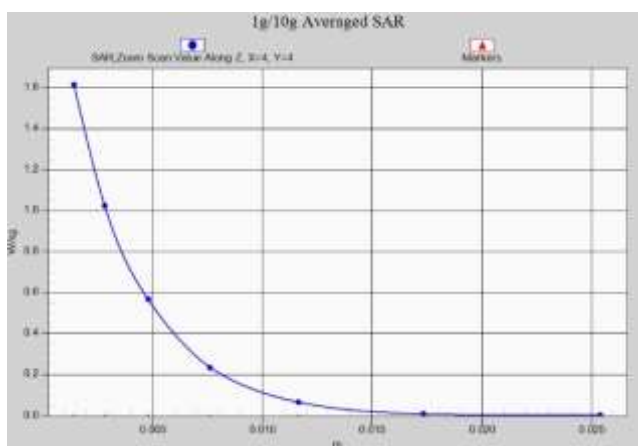
Z-Scan at power reference point (WIFI2.4G)



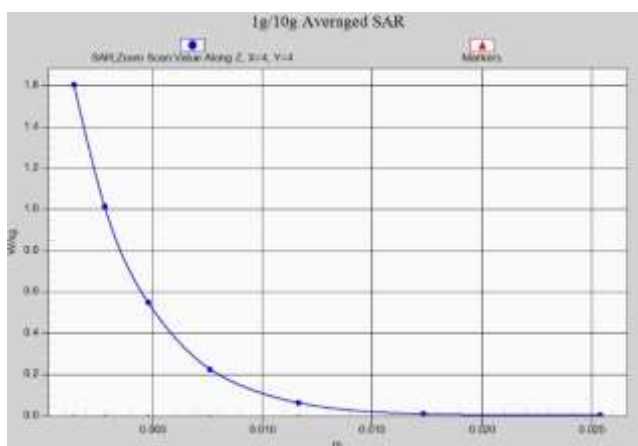
Z-Scan at power reference point (WIFI2.4G)



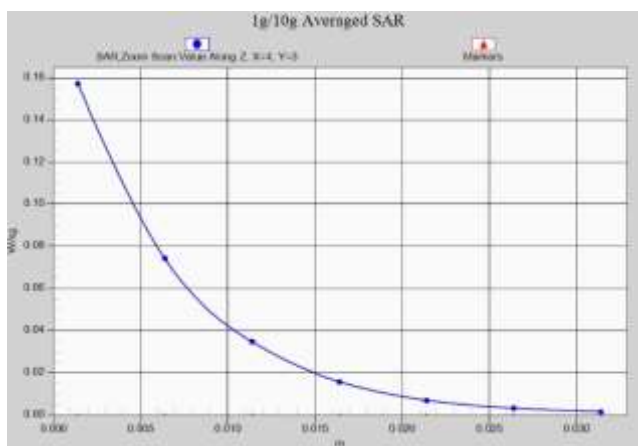
Z-Scan at power reference point (WIFI5G)



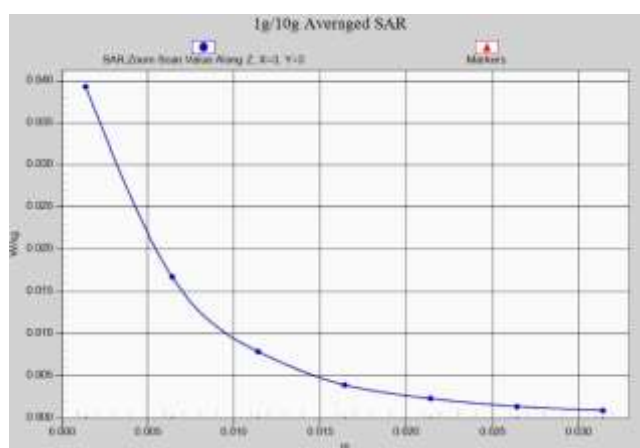
Z-Scan at power reference point (WIFI5G)



Z-Scan at power reference point (WIFI5G)



Z-Scan at power reference point (BT)



Z-Scan at power reference point (BT)