TEST REPORT

Applicant	:	Sonim Technologies, Inc.
Address of Applicant	:	6836 Bee Cave Road, Building 1, Suite 279, Austin, Texas 78746, USA
Product Name	:	Rugged Smart Phone
Model No.	:	RS60
Sample No.	:	E20090007-01#09 E20090007-01#10
Standards	:	FCC 47 CFR § 2.1093 IEEE Std1528-2013 ANSI C95.1-2005 RSS-102 Issue 5 March 2015
Date of Receipt	:	2021-01-18
Date of Test	:	2021-01-18 ~ 2021-02-16
Date of Issue	:	2021-04-09

Remark:

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

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1 General Information

1.1 Testing Laboratory

Company Name	ICAS Testing Technology Service (Shanghai) Co., Ltd.
Address	No.1298 Pingan Rd, Minhang District, Shanghai, China
Telephone	0086 21-51682999
Fax	0086 21-54711112
Homepage	www.icasiso.com

1.2 Details of Application

Company Name	Sonim Technologies, Inc.
Address	6836 Bee Cave Road, Building 1, Suite 279, Austin, Texas 78746, USA
Contact Person	Avena.Xu
Telephone	1-650-378-8100
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1.3 Details of EUT

Product Name	Rugged Smart Phone
Brand Name	Sonim
Model No.	RS60
FCC ID	WYPRS60
ISED	8090A-RS60
Serial Number	015850000001942 015850000002015
HW Version	V1.0
SW Version	60.0.0-01-10.0.0-00.01.01
Mode of Operation	GSM/GPRS/EDGE 850/1900; WCDMA/HSDPA/HSUPA Band II/IV/V; LTE FDD Band 2/4/5/7/12/13/14/25/26/66; LTE TDD Band 38/41; WLAN 802.11b/g/n(HT20) for 2.4GHz; WLAN 802.11a/n(HT20/HT40)/ac(VHT20/VHT40/VHT80) for 5.2GHz and 5.8GHz; Bluetooth 4.2 dual mode
Duty Cycle	8.3 for GPRS/EDGE 1Tx Slot, 4.15 for GPRS/EDGE 2Tx Slot, 2.77 for GPRS/EDGE 3Tx Slot, 2.075 for GPRS/EDGE4Tx Slot; 1 for WCDMA/CDMA/LTE FDD/WLAN/Bluetooth; 0.633 for LTE TDD
Modulation Type	GMSK for GSM/GPRS and 8PSK for EGPRS; QPSK for WCDMA/CDMA;QPSK/16QAM for LTE; DSSS/OFDM for WLAN 2.4GHz

	and OFDM for WLAN 5.2GHz/5.8GHz;GFSK/8DPSK/Π/4DQPSK for Bluetooth
Antenna Type	Internal Antenna
Antenna Gain	GSM/GPRS/EDGE 850: 1.45 dBi GSM/GPRS/EDGE 1900: 2.76 dBi WCDMA/HSDPA/HSUPA Band II: 2.76 dBi WCDMA/HSDPA/HSUPA Band IV: 2.51 dBi WCDMA/HSDPA/HSUPA Band V: 1.45 dBi LTE FDD Band 2: 2.76 dBi LTE FDD Band 4: 2.51 dBi LTE FDD Band 5: 1.45 dBi LTE FDD Band 7: 3.87 dBi LTE FDD Band 12: -0.02 dBi LTE FDD Band 13: 1.05 dBi LTE FDD Band 25: 2.76 dBi LTE FDD Band 66: 2.51 dBi LTE FDD Band 38: 3.87 dBi LTE FDD Band 41: 3.87 dBi BT/WLAN 2.4G:3.23dBi WLAN5G:3.29dBi
Power Supply	DC 3.8V by Lithium ion polymer battery
Device Category	Portable Device
Exposure Category	General Population/Uncontrolled Exposure
EUT Type	Production Unit
Power Reduction	Supported

1.4 Identification of Auxiliary Equipment

AEID	Description	Model	Manufacturer	Type
AE1	Battery (made by SJY Energy)	BA7800S	Shen Zhen Sai JIao Yang Energy & Science Technology Co., Ltd.	8000mAh

1.5 Special Accessories and Auxiliary Equipment

Description	Model	Manufacturer	Type
Earphone	N/A	MC3	N/A

1.6 The Highest Reported SAR Values

Band	Reported 1g SAR (W/Kg)		
	Head	Body-Worn	Hotspot
PCE	0.365	1.385	1.385
DTS	0.196	0.119	0.119
NII	0.051	0.044	0.044
Bluetooth	0.136	0.035	0.035
Simultaneous Head SAR	0.561		
Simultaneous Body SAR	1.504		

1.7 Test Methodology

The tests documented in this report were performed in accordance with FCC 47 CFR § 2.1093, IEEE Std 1528-2013, the following FCC Published RF exposure KDB procedures, and TCB workshop updates:

☒	KDB 248227 D01 802.11 WLAN SAR v02r02
☒	KDB 447498 D01 General RF Exposure Guidance v06
☐	KDB 447498 D02 SAR Procedures for Dongle Xmtr v02r01
☐	KDB 615223 D01 802.16e WiMax SAR Guidance v01r01
☐	KDB 616217 D04 SAR for laptop and tablets v01r02
☐	KDB 643646 D01 SAR Test for PTT Radios v01r03
☐	KDB 648474 D03 Wireless Chargers Battery Cover v01r04
☒	KDB 648474 D04, Handset SAR v01r03
☐	KDB 680106 D01 RF Exposure Wireless Charging Apps v02
☒	KDB 865664 D01 SAR Measurement 100 MHz to 6 GHz v01r04
☒	KDB 941225 D01 3G SAR Procedures v03r01
☒	KDB 941225 D05 SAR for LTE Devices v02r05
☒	KDB 941225 D06 Hot Spot SAR v02r01
☐	KDB 941225 D07 UMPC Mini Tablet v01r02

Note(s):

All test items were verified and recorded according to the standards and without any addition/deviation/exclusion during the test.

1.8 SAR Limits

The limits to be used for evaluation are based generally on criteria published by the American National Standards Institute (ANSI) for localized specific absorption rate (“SAR”) in Section 4.2 of “IEEE Standard for Safety Levels with Respect to Human Exposure to Radio Frequency Electromagnetic Fields, 3 kHz to 300 GHz,” ANSI/IEEE C95.1-1992,

 These criteria for SAR evaluation are similar to those recommended by the National Council on Radiation Protection and Measurements (NCRP) in “Biological Effects and Exposure Criteria for Radiofrequency Electromagnetic Fields,” NCRP Report No. 86, Section 17.4.5. SAR is a measure of the rate of energy absorption due to exposure to an RF transmitting source. SAR values have been related to threshold levels for potential biological hazards. The criteria to be used are specified in paragraphs (d)(1) and (d)(2) of this section and shall apply for portable devices transmitting in the frequency range from 100 kHz to 6 GHz. Portable devices that transmit at frequencies above 6 GHz are to be evaluated in terms of the MPE limits specified in §1.1310 of this chapter. Measurements and calculations to demonstrate compliance with MPE field strength or power density limits for devices operating above 6 GHz should be made at a minimum distance of 5 cm from the radiating source.

1) The SAR limits for occupational/controlled exposure are 0.4 W/kg, as averaged over the whole body, and a peak spatial-average SAR of 8 W/kg, averaged over any 1 gram of tissue (defined as a tissue volume in the shape of a cube). Exceptions are the parts of the human body treated as extremities, such as hands, wrists, feet, ankles, and pinnae, where the peak spatial-average SAR limit for occupational/controlled exposure is 20 W/kg, averaged over any 10 grams of tissue (defined as a tissue volume in the shape of a cube). Exposure may be averaged over a time period not to exceed 6 minutes to determine compliance with occupational/controlled SAR limits.
2) The SAR limits for general population/uncontrolled exposure are 0.08 W/kg, as averaged over the whole body, and a peak spatial-average SAR of 1.6 W/kg, averaged over any 1 gram of tissue (defined as a tissue volume in the shape of a cube). Exceptions are the parts of the human body treated as extremities, such as hands, wrists, feet, ankles, and pinnae, where the peak spatial-average SAR limit is 4 W/kg, averaged over any 10 grams of tissue (defined as a tissue volume in the shape of a cube). Exposure may be averaged over a time period not to exceed 30 minutes to determine compliance with general population/uncontrolled SAR limits.

Exposure Limits	**FCC 1g SAR Limit (W/Kg)**	
	General Population/Uncontrolled Exposure	**Occupational/Controlled Exposure**
Spatial Average (averaged over the whole body)	0.08	0.4
Spatial Peak (averaged over any 1g of tissue)	1.6	8.0
Spatial Peak (hands/wrists/feet/ankles averaged over 10 g)	4.0	20.0

2 Test Environment

2.1 Environmental conditions

Temperature (°C)	18-25
Humidity (%RH)	40-65
Barometric Pressure (mbar)	960-1060
Ambient noise & Reflection（W/kg）	< 0.012

2.2 Equipment List

Dielectric Property Measurements

Name of Equipment	Manufacturer	Model	Serial No.	Cal. Due Date
Network Analyzer	Anritsu	MS46121A	1618412	2021-08-18
Material Measurement Probe System	Poseidon	MMP	/	N/A

System Check

Name of Equipment	Manufacturer	Model	Serial No.	Cal. Due Date
Signal Generator	Agilent	SMB 100	114400	2021-06-08
Power Meter	Agilent	NRP2	106036	2021-06-08
Power Sensor	Agilent	NRP8S	103592	2021-06-08
Amplifier	Mini-Circuits	ZVE-8G+	S0N560400742	2021-07-16
Amplifier	Mini-Circuits	ZHL-42+	SN784901545	2021-07-16
DC Power Supply	ACPOWER	ADC-0800025-15	D215010003	2021-03-19
E-Field Probe	SPEAG	EX3DV4	7475	2021-10-28
Data Acquisition Electronics	SPEAG	DAE4	787	2021-09-29
Dipole	SPEAG	D2450V2	723	2023-02-16
Dipole	SPEAG	D2600V2	1142	2023-02-16
Dipole	SPEAG	D5GHzV2	1061	2023-02-16
Dipole	SPEAG	D1900V2	5d092	2023-02-17
Dipole	SPEAG	D2100V2	1053	2023-02-17
Dipole	SPEAG	D2300V2	1040	2023-02-17
Dipole	SPEAG	D900V2	1d055	2023-02-18
Dipole	SPEAG	D1800V2	2d148	2023-02-18
Dipole	SPEAG	D750V3	1055	2023-02-19

Dipole	SPEAG	D835V2	4d061	2023-02-19

Other

Name of Equipment	Manufacturer	Model	Serial No.	Cal. Due Date
Base Station Simulator	R & S	CMW500	150835	2021-08-18
Base Station Simulator	R & S	CMW500	116333	2021-08-24
Robot	SPEAG	TX90 XL	F07/564YA1/A/01	N/A
Phantom	SPEAG	SAM	TP-1641	N/A
Phantom	SPEAG	SAM	TP-1642	N/A

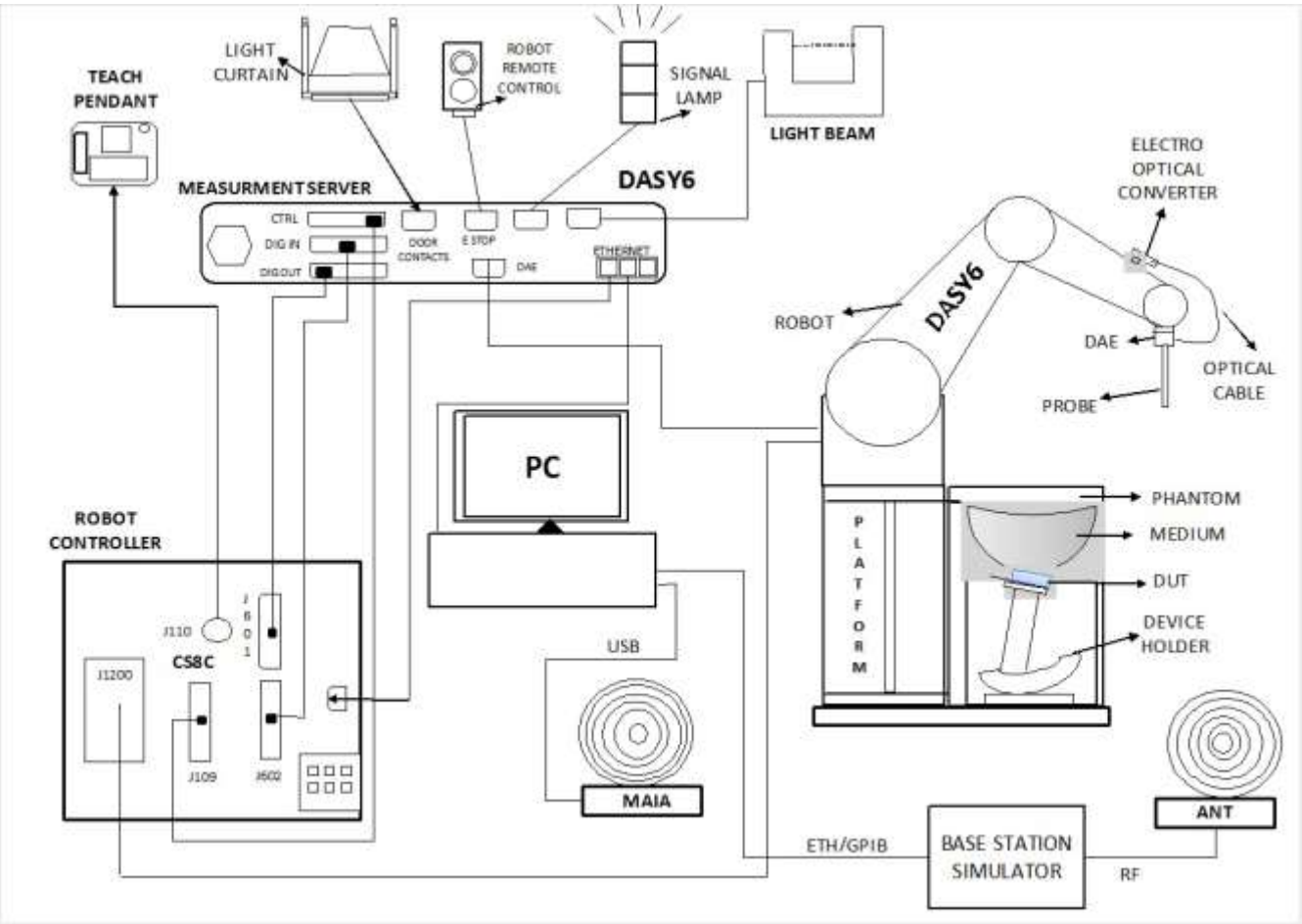
2.3 Measurement Uncertainty

Source of Uncertainty	Tol. (±%)	Prob. Dist.	Div.	c_i (1 g)	c_i (10 g)	1 g u_i (±%)	10 g u_i (±%)	v_i
Measurement System								
Probe Calibration (k=1)	4.7	N	1	1	1	4.7	4.7	∞
Axial isotropy	1.2	R	√3	1	1	0.69	0.69	∞
Hemispherical isotropy	3.2	R	√3	1	1	1.85	1.85	∞
Boundary Effect	7.4	R	√3	1	1	4.27	4.27	∞
Linearity	0.9	R	√3	1	1	0.52	0.52	∞
System Detection Limit	1	R	√3	1	1	0.6	0.6	∞
Readout Electronics	0.3	N	1	1	1	0.3	0.3	∞
Response Time	0	R	√3	1	1	0	0	∞
Integration Time	0	R	√3	1	1	0	0	∞
RF Ambient Condition - Noise	1	R	√3	1	1	0.6	0.6	∞
RF Ambient Condition - Reflections	1	R	√3	1	1	0.6	0.6	∞
Probe Positioner Mechanical Tolerance	0.8	R	√3	1	1	0.5	0.5	∞
Probe Positioning with respect to Phantom Shell	9.9	R	√3	1	1	5.7	5.7	∞
Extrapolation, Interpolation, and Integration Algorithms for Max. SAR Evaluation	4	R	√3	1	1	2.3	2.3	∞
Test Sample Related								
Test Sample Positioning	2.9	N	1	1	1	2.9	2.9	8
Device Holder Uncertainty	3.5	N	1	1	1	3.5	3.5	∞
Drift of Output Power	5	R	√3	1	1	2.9	2.9	∞

SAR scaling	2.18	R	√3	1	1	1.26	1.26	∞
Phantom and Setup								
Phantom Uncertainty (shape & thickness tolerance)	4	R	√3	1	1	2.3	2.3	∞
Uncertainty in SAR correction fordeviations in permittivity andconductivity	1.2	N	1	1	0.84	1.2	1.01	∞
Liquid Conductivity (target)	5	R	√3	0.64	0.43	1.85	1.24	∞
Liquid Conductivity (meas.)	2.93	N	1	0.64	0.43	1.88	1.26	9
Liquid Permittivity (target)	5	R	√3	0.6	0.49	1.73	1.41	∞
Liquid Permittivity (meas.)	5.9	N	1	0.6	0.49	3.54	2.89	9
Combined Uncertainty		RSS	$u_c = \sqrt{\sum_{i=1}^{m} c_i^2 \cdot u_i^2}$			11.37	11.12	
Combined Uncertainty (coverage factor=2)		k=2	$u_e = 2u_c$			22.73	22.24	

3 SAR Measurement System

The DASY6 system for performing compliance tests consists of the following items:



- A standard high precision 6-axis robot with controller, teach pendant and software. An arm extension for accommodating the data acquisition electronics (DAE).
- An isotropic Field probe optimized and calibrated for the targeted measurement.
- A data acquisition electronics (DAE) which performs the signal amplification, signal multiplexing, AD-conversion, offset measurements, mechanical surface detection, collision detection, etc. The unit is battery powered with standard or rechargeable batteries. The signal is optically transmitted to the EOC.
- The Electro-optical converter (EOC) performs the conversion from optical to electrical signals for the digital communication to the DAE. To use optical surface detection, a special version of the EOC is required. The EOC signal is transmitted to the measurement server.
- The function of the measurement server is to perform the time critical tasks such as signal filtering, control of the robot operation and fast movement interrupts.
- The Light Beam used is for probe alignment. This improves the (absolute) accuracy of the probe positioning.
- A computer running Win7 professional operating system and the DASY6 software.
- Remote control and teach pendant as well as additional circuitry for robot safety such as warning lamps, etc.
- The phantom, the device holder and other accessories according to the targeted measurement

3.1 DASY6 Measurement Server

The DASY6 measurement server is based on a PC/104 CPU board with a 400MHz intel ULV Celeron, 128MB chip-disk and 128MB RAM. The necessary circuits for communication with the DAE4 electronics box, as well as the 16 bit AD converter system for optical detection and digital I/O inter face are contained on the DASY6 I/O board, which is directly connected to the PC/104 bus of the CPU board.

The measurement server performs all real-time data evaluation of field measurements and surface detection, controls robot movements and handles safety operation. The PC operating system cannot interfere with these time critical processes. All connections are supervised by a watchdog, and disconnection of any of the cables to the measurement server will automatically disarm the robot and disable all program-controlled robot movements. Furthermore, the measurement server is equipped with an expansion port which is reserved for future applications. Please note that this expansion port does not have a standardized pinout, and therefore only devices provided by SPEAG can be connected. Devices from any other supplier could seriously damage the measurement server.

3.2 Data Acquisition Electronics

The data acquisition electronics (DAE4) consist of a highly sensitive electrometer-grade preamplifier with auto-zeroing, a channel and gain-switching multiplexer, a fast 16 bit AD-converter and a command decoder with a control logic unit. Transmission to the measurement server is accomplished through an optical downlink for data and status information, as well as an optical uplink for commands and the clock.

The mechanical probe mounting device includes two different sensor systems for frontal and sideways probe contacts. They are used for mechanical surface detection and probe collision detection.

The input impedance of both the DAE4 as well as of the DAE3 box is 200MOhm; the inputs are symmetrical and floating. Common mode rejection is above 80 dB.

3.3 EX3DV4 E-Field Probe

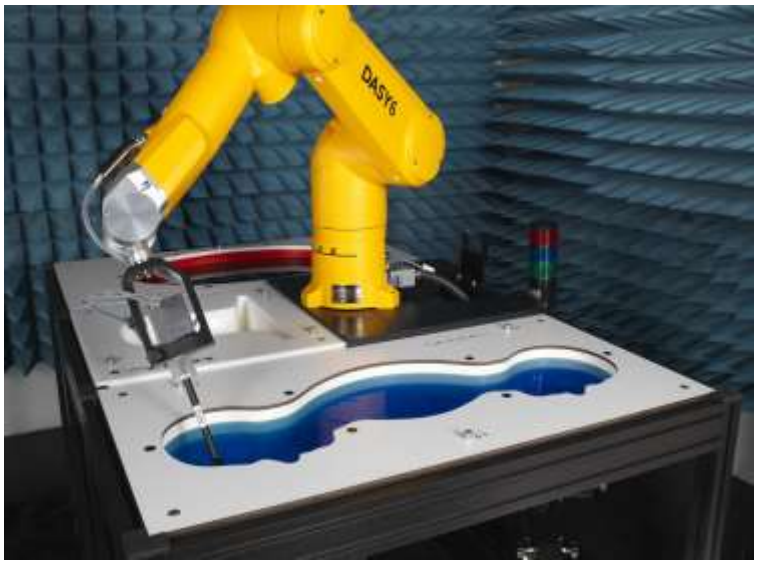
Construction	Symmetrical design with triangular core
	Built-in shielding against static charges
	PEEK enclosure material (resistant to organic solvents, e.g., DGBE)
Frequency	10 MHz to > 6 GHz
	Linearity: ± 0.2 dB
	(30 MHz to 6 GHz)

Directivity	± 0.3 dB in HSL (rotation around probe axis) ± 0.5 dB in tissue material (rotation normal to probe axis)
Dynamic Range	10 μW/g to > 100 mW/g Linearity: ± 0.2dB (noise: typically < 1 μW/g)
Dimensions	Overall length: 330 mm (Tip: 20 mm) Tip diameter: 2.5 mm (Body: 12 mm) Typical distance from probe tip to dipole centers: 1 mm
Application	High precision dosimetric measurements in any exposure scenario (e.g., very strong gradient fields). Only probe which enables compliance testing for frequencies up to 6 GHz with precision of better 30%.

3.4 SAM Phantom

The SAM-Twin phantom (shown in front of DASY6) is a fiberglass shell phantom with shell thickness 2 mm, except in the ear region where the thickness is increased to 6 mm. The phantom has three measurement areas:

- Left hand
- Right hand
- Flat phantom



The phantom table for the DASY systems based on the TX90XL and RX160L robots have the size of 100 x 50 x 85 cm (L x W x H). These tables are reinforced for mounting of the robot onto the table. For easy dislocation these tables have fork lift cut outs at the bottom. The bottom plate contains three pairs of bolts for locking the device holder. The device holder positions are adjusted to the standard measurement positions in the three sections. Only one device holder is necessary if two phantoms are used (e.g., for different liquids)

A white cover is provided to cover the phantom during off-periods to prevent water evaporation and changes in the liquid parameters. Free space scans of devices on top of this phantom cover are possible.

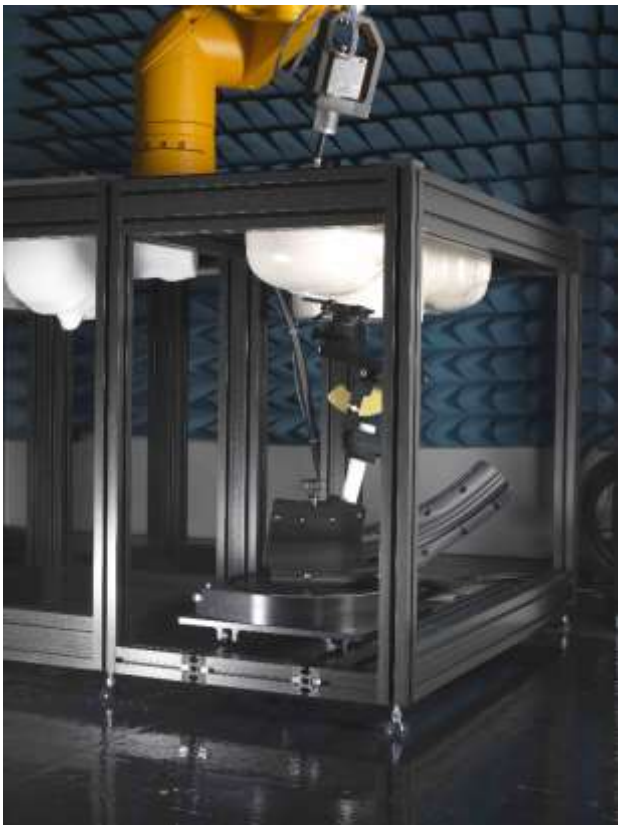
Three reference marks are provided on the phantom counter. These reference marks are used to teach the absolute phantom position relative to the robot.

3.5 Device Holder for SAM Twin Phantom

The SAR in the phantom is approximately inversely proportional to the square of the distance between the source and the liquid surface. For a source at 5mm distance, a positioning uncertainty of ±0.5mm would produce a SAR uncertainty of ±20%. Accurate device positioning is therefore crucial for accurate and repeatable measurements. The positions in which the devices must be measured are defined by the standards.

The DASY device holder is designed to cope with the different positions given in the standard. It has two scales for device rotation (with respect to the body axis) and device inclination (with respect to the line between the ear reference points). The rotation centers for both scales is the ear reference point (ERP). Thus the device needs no repositioning when changing the angles.

The DASY device holder is constructed of low-loss POM material having the following dielectric parameters: relative permittivity =3 and loss tangent =0.02. The amount of dielectric material has been reduced in the closest vicinity of the device, since measurements have suggested that the influence of the clamp on the test results could thus be lowered



4 SAR Measurement Procedures

4.1 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. The minimum distance of probe sensors to surface is 2 mm / 4 mm. This distance cannot be smaller than the Distance of sensor calibration points to probe tip as defined in the probe properties.

4.2 Area Scan Procedures

The Area Scan is used as a fast scan in two dimensions to find the area of high field values before running a detailed measurement around the hot spot.Before starting the area scan a grid spacing of 15 mm x 15 mm is set. During the scan the distance of the probe to the phantom remains unchanged. After finishing area scan, the field maxima within a range of 2 dB will be ascertained.

	≤ 3 GHz	> 3 GHz
Maximum distance from closest measurement point (geometric center of probe sensors) to phantom surface	5 mm ± 1 mm	$½ \cdot \delta \cdot \ln(2)$ mm ± 0.5 mm
Maximum probe angle from probe axis to phantom surface normal at the measurement location	30° ± 1°	20° ± 1°
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 ≤ the corresponding x or y dimension of the test device with at least one measurement point on the test device.	

4.3 Zoom Scan Procedures

Zoom Scans are used to estimate the peak spatial SAR values within a cubic averaging volume containing 1 g and 10 g of simulated tissue. The default Zoom Scan is done by 7x7x7 points within a cube whose base is centered around the maxima found in the preceding area scan.

Maximum zoom scan spatial resolution: Δx_{Zoom}, Δy_{Zoom}			≤ 2 GHz: ≤ 8 mm 2 – 3 GHz: ≤ 5 mm*	3 – 4 GHz: ≤ 5 mm* 4 – 6 GHz: ≤ 4 mm*
Maximum zoom scan spatial resolution, normal to phantom surface	uniform grid: $\Delta z_{Zoom}(n)$		≤ 5 mm	3 – 4 GHz: ≤ 4 mm 4 – 5 GHz: ≤ 3 mm 5 – 6 GHz: ≤ 2 mm
	graded grid	$\Delta z_{Zoom}(1)$: between 1st two points closest to phantom surface	≤ 4 mm	3 – 4 GHz: ≤ 3 mm 4 – 5 GHz: ≤ 2.5 mm 5 – 6 GHz: ≤ 2 mm
		$\Delta z_{Zoom}(n>1)$: between subsequent points	≤ 1.5·$\Delta z_{Zoom}(n-1)$ mm	
Minimum zoom scan volume	x, y, z		≥ 30 mm	3 – 4 GHz: ≥ 28 mm 4 – 5 GHz: ≥ 25 mm 5 – 6 GHz: ≥ 22 mm

Note: δ is the penetration depth of a plane-wave at normal incidence to the tissue medium; see IEEE Std 1528-2013 for details.

* When zoom scan is required and the *reported* SAR from the *area scan based 1-g SAR estimation* procedures of KDB Publication 447498 is ≤ 1.4 W/kg, ≤ 8 mm, ≤ 7 mm and ≤ 5 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.

4.4 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 Power Reference Measurement.

4.5 Position of the wireless device in relation to the phantom

Two imaginary lines on the handset were established: the vertical centerline and the horizontal line. The test device was placed in a normal operating position with the “test device reference point” located along the “vertical centerline” on the front of the device aligned to the “ear reference point” (see Figure 1). The “test device reference point” was than located at the same level as the center of the ear reference point. The test device was positioned so that the “vertical centerline” was bisecting the front surface of the handset at it’s top and bottom edges, positioning the “ear reference point” on the outer surface of the both the left and right head phantoms on the ear reference point.

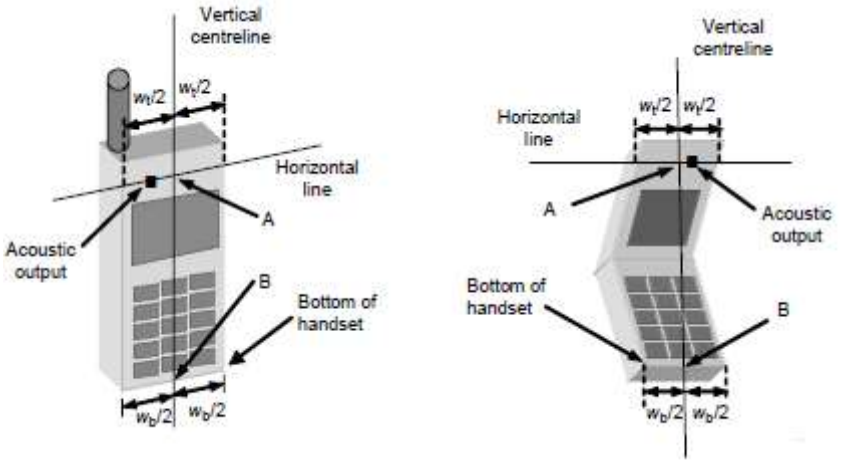


Figure 1 Handset Vertical Center & Horizontal Line Reference Points

4.6 Definition for Touch and Tilt

The cheek position is established in points a) to i) as follows.

a) Ready the handset for talk operation, if necessary. For example, for handsets with a cover piece (flip cover), open the cover. If the device can also be used with the cover closed,both configurations shall be tested.

b) Define two imaginary lines on the handset, the vertical centreline and the horizontal line,for the handset in vertical orientation as shown in Figures 1. The verticalcentreline passes through two points on the front side of the handset: the midpoint of the width wt of the handset at the level of the acoustic output (point A in Figures 1), and the midpoint of the width wb of the bottom of the handset (point B). The horizontal line is perpendicular to the vertical centreline and passes through the centre of the acoustic output (see Figures 1). The two lines intersect at point A. Note that for many handsets, point A coincides with the centre of the acoustic output. However, the acoustic output may be located elsewhere on the horizontal line. Also note that the vertical centreline is not necessarily parallel to the front face of the handset (see Figure 1), especially for clam-shell handsets, handsets with flip cover pieces, and other irregularly shaped handsets.

c) Position the handset close to the surface of the phantom such that point A is on the (virtual) extension of the line passing through points RE and LE on the phantom (see Figure 2). The plane defined by the vertical centreline and the horizontal line of the device must be parallel to the sagittal plane of the phantom.

d) Translate the handset towards the phantom along the line passing through RE and LE until the handset touches the ear.

e) Rotate the handset around the (virtual) LE-RE Line until the DUT vertical centreline is in the reference plane.

f) Rotate the device around its vertical centreline until the plane defined by the DUT vertical centreline and horizontal line is parallel to the N-F Line, then translate the handset towards the phantom along the LE-RE line until DUT point A touches the ear at the ERP.

g) While keeping point A on the line passing through RE and LE and maintaining the handset in contact with the pinna, rotate the handset about the line N-F until any point on the handset is in contact with a phantom point below the pinna (cheek) (see Figure 2). The physical angles of rotation shall be documented. While keeping DUT point A in contact with the ERP, rotate the handset around a line perpendicular to the plane defined by the DUT vertical centreline and horizontal line and passing through DUT point A, until the DUT vertical centreline is in the reference plane.

h) Verify that the cheek position is correct as follows:

— the N-F line is in the plane defined by the DUT vertical centreline and horizontal line,

— DUT point A touches the pinna at the ERP, and

— the DUT vertical centreline is in the reference plane.

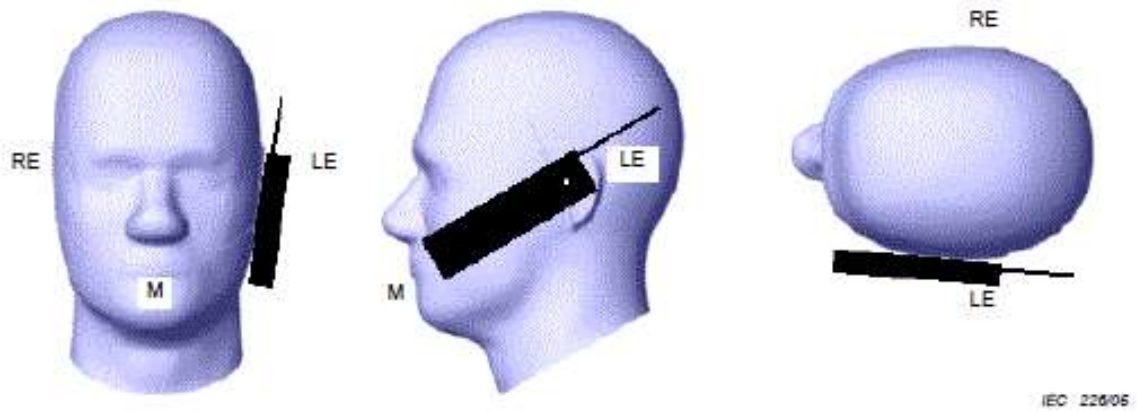


Figure 2 Cheek position of the wireless device on the left side of SAM

The tilt position is established in points a) to d) as follows.

a) Repeat steps a) to i) of above section to place the device in the cheek position (see Figure 2).

b) While maintaining the orientation of the device, retract the device parallel to the reference plane far enough away from the phantom to enable a rotation of the device by 15°.

c) Rotate the device around the horizontal line by 15° (see Figure 3).

d) While maintaining the orientation of the handset, move the handset towards the phantom on a line passing through RE and LE until any part of the handset touches the ear. The tilt position is obtained when the contact is on the pinna. If the contact is at any location other than the pinna, e.g., the antenna with the back of the phantom head, the angle of the handset shall be reduced. In this case, the tilt position is obtained if any part of the handset is in contact with the pinna as well as a second part of the handset is in contact with the phantom, e.g., the antenna with the back of the head.

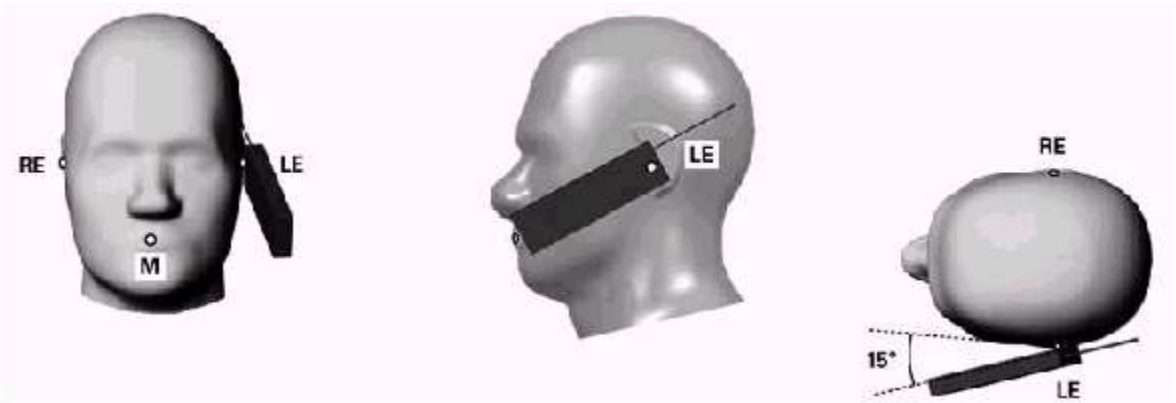


Figure 3 Tilt position of the wireless device on the left side of SAM

4.7 Definition for Body-Worn Accessory Configurations

Body-Worn operation configurations are tested with the belt-clips and holsters attached to the device and positioned against a flat phantom in a normal use configuration. A device with a headset output is tested with a headset connected to the device.

Accessories for Body-Worn operation configurations are divided into two categories: those that do not contain metallic components and those that do contain metallic components. When multiple accessories that do not contain metallic components are supplied with the device, the device is tested with only the accessory that dictates the closest spacing to the body. Then multiple accessories that contain metallic components are supplied with the device, the device is tested with each accessory that contains a unique metallic component. If multiple accessories share an identical metallic component (i.e. the same metallic belt-clip used with different holsters with no other metallic components) only the accessory that dictates the closest spacing to the body is tested.

Body-Worn accessories may not always be supplied of available as options for some devices intended to be authorized for Body-Worn use. In this case, a test configuration where a separation distances between the back of the device and the flat phantom is used. Test position spacing was documented.

4.8 Definition for Wireless Router Configurations

Some battery-operated handsets have the capability to transmit and receive user data through simultaneous transmission of WLAN simultaneously with a separate licensed transmitter. The FCC has provided guidance in FCC KDB Publication 941225 D06 v02r01 where SAR test considerations for handsets (L x W ≥ 9 cm x 5 cm) are based on a composite test separation distance of 10 mm from the front, back and edges of the device containing transmitting antennas within 2.5 cm of their edges, determined from general mixed use conditions for this type of devices. Since the hotspot SAR results may overlap with the Body-Worn accessory SAR requirements, the more conservative configurations can be considered, thus excluding some Body-Worn accessory SAR tests.

When the user enables the personal wireless router functions for the handset, actual operations include simultaneous transmission of both the WLAN transmitter and another licensed transmitter. Both transmitters often do not transmit at the same transmitting frequency and thus cannot be evaluated for SAR under actual use conditions due to the limitations of the SAR assessment probes. Therefore, SAR must be evaluated for each frequency transmission and mode separately and spatially summed with the WLAN transmitter according to FCC KDB Publication 447498 D01v06 publication procedures. The “Portable Hotspot” feature on the handset was NOT activated during SAR assessments, to ensure the SAR measurements were evaluated for a single transmission frequency RF signal at a time.

4.9 Dielectric Property Measurements

The dielectric properties for this simulant fluid were measured by using the Dielectric Probe in conjunction with Network Analyzer(300 kHz - 6 GHz) by using a procedure detailed in KDB 865664 D01v01r04.

Dielectric properties of the tissue-equivalent liquid

Target Frequency	Head		Body	
(MHz)	ε_r	σ (S/m)	ε_r	σ (S/m)
150	52.3	0.76	61.9	0.80
300	45.3	0.87	58.2	0.92
450	43.5	0.87	56.7	0.94
835	41.5	0.90	55.2	0.97
900	41.5	0.97	55.0	1.05
915	41.5	0.98	55.0	1.06
1450	40.5	1.20	54.0	1.30
1610	40.3	1.29	53.8	1.40
1800 – 2000	40.0	1.40	53.3	1.52
2450	39.2	1.80	52.7	1.95
3000	38.5	2.40	52.0	2.73
5800	35.3	5.27	48.2	6.00

(ε_r = relative permittivity, σ = conductivity and ρ = 1000 kg/m^3)

Dielectric Property Measurements Results

Frequency	Target Tissue		Measured Tissue		Limit (±5% Dev.)		Temp (℃)	Test Date
	ε_r	σ(s/m)	ε_r	σ(s/m)	ε_r	σ(s/m)		
704 Head	41.90	0.89	42.849	0.913	2.26%	2.58%	21.5	2021-01-23
711 Head	41.90	0.89	42.845	0.911	2.26%	2.36%	21.5	2021-01-23
750 Head	41.90	0.89	42.838	0.910	2.24%	2.25%	21.5	2021-01-23
782 Head	41.68	0.90	42.747	0.863	2.56%	-3.82%	21.5	2021-01-23
793 Head	41.68	0.90	43.546	0.875	4.47%	-2.48%	21.5	2021-01-23
819 Head	41.56	0.90	42.531	0.882	2.35%	-1.89%	21.5	2021-01-31
824.2 Head	41.56	0.90	42.535	0.883	2.36%	-1.78%	21.5	2021-01-31
826.4 Head	41.54	0.90	42.592	0.911	2.52%	1.33%	21.5	2021-01-31
829 Head	41.53	0.90	42.469	0.916	2.26%	1.89%	21.5	2021-01-31
831.5 Head	41.53	0.90	43.156	0.914	3.91%	1.67%	21.5	2021-01-31
835 Head	41.50	0.90	42.619	0.916	2.70%	1.78%	21.5	2021-01-31
836.5 Head	41.50	0.90	42.213	0.935	1.72%	3.89%	21.5	2021-01-31
836.6 Head	41.50	0.90	42.266	0.933	1.85%	3.67%	21.5	2021-01-31
841.5 Head	41.50	0.91	42.642	0.941	2.75%	3.41%	21.5	2021-01-31
844 Head	41.50	0.91	42.757	0.943	3.03%	3.63%	21.5	2021-01-31
846.6 Head	41.50	0.91	42.794	0.943	3.12%	3.40%	21.5	2021-01-31
848.8 Head	41.50	0.92	42.803	0.937	3.14%	2.40%	21.5	2021-01-31
1712.4 Head	40.14	1.34	41.886	1.405	4.35%	4.69%	21.5	2021-01-28

1720 Head	40.13	1.35	41.749	1.413	4.04%	4.36%	21.5	2021-01-28
1732.5 Head	40.11	1.36	41.077	1.387	2.42%	1.91%	21.5	2021-01-28
1732.6 Head	40.11	1.36	41.077	1.387	2.42%	1.91%	21.5	2021-01-28
1745 Head	40.08	1.37	41.167	1.378	2.71%	0.58%	21.5	2021-01-28
1752.6 Head	40.08	1.37	41.072	1.422	2.48%	3.80%	21.5	2021-01-28
1770 Head	40.08	1.37	40.892	1.388	2.03%	1.31%	21.5	2021-01-28
1800 Head	40.00	1.40	41.885	1.387	4.71%	-0.93%	21.5	2021-01-28
1850.2 Head	40.00	1.40	41.377	1.383	3.44%	-1.21%	21.5	2021-01-21
1852.4 Head	40.00	1.40	41.425	1.431	3.56%	2.21%	21.5	2021-01-21
1860 Head	40.00	1.40	41.324	1.432	3.31%	2.29%	21.5	2021-01-21
1880 Head	40.00	1.40	41.252	1.427	3.13%	1.93%	21.5	2021-01-21
1882.5 Head	40.00	1.40	41.542	1.425	3.86%	1.79%	21.5	2021-01-21
1900 Head	40.00	1.40	41.326	1.433	3.32%	2.36%	21.5	2021-01-21
1905 Head	40.00	1.40	40.974	1.443	2.43%	3.07%	21.5	2021-01-21
1907.6 Head	40.00	1.40	40.982	1.452	2.46%	3.71%	21.5	2021-01-21
2412 Head	39.27	1.77	38.757	1.713	-1.30%	-3.06%	21.5	2021-02-03
2441 Head	39.22	1.79	38.895	1.726	-0.82%	-3.36%	21.5	2021-02-03
2450 Head	39.20	1.80	38.906	1.729	-0.75%	-3.94%	21.5	2021-02-03
2510 Head	39.13	1.87	40.714	1.942	4.06%	4.07%	21.5	2021-01-29
2535 Head	39.09	1.89	40.805	1.969	4.38%	4.01%	21.5	2021-01-29
2560 Head	39.09	1.92	40.817	1.958	4.42%	1.98%	21.5	2021-01-29
2600 Head	39.00	1.96	40.573	2.032	4.03%	3.67%	21.5	2021-01-29
2610 Head	39.00	1.96	40.569	2.033	4.00%	3.51%	21.5	2021-01-29
2680 Head	39.00	1.96	40.573	2.032	4.03%	3.67%	21.5	2021-01-29
5200 Head	36.00	4.66	34.555	4.840	-3.99%	3.86%	21.5	2021-02-04
5220 Head	35.99	4.66	35.256	4.509	-2.03%	-3.14%	21.5	2021-02-04
5800 Head	35.30	5.27	34.935	5.149	-1.03%	-2.30%	21.5	2021-02-04
5825 Head	35.27	5.30	34.754	5.151	-1.45%	-2.72%	21.5	2021-02-04

4.10 SAR System Verification

The purpose of the system check is to verify that the system operates within its specifications at the decice test frequency. The system check is simple check of repeatability to make sure that the system works correctly at the time of the compliance test.

A system check measurement was made following the determination of the dielectric parameters of the simulates, using the dipole validation kit. A power level of 250 mW was supplied to the dipole antenna, which was placed under the flat section of the twin SAM phantom.

System check results have to be equal or near the values determined during dipole calibration with the relevant liquids and test system (±10 %).

System check is performed regularly on all frequency bands where tests are performed with the DASY6 system.

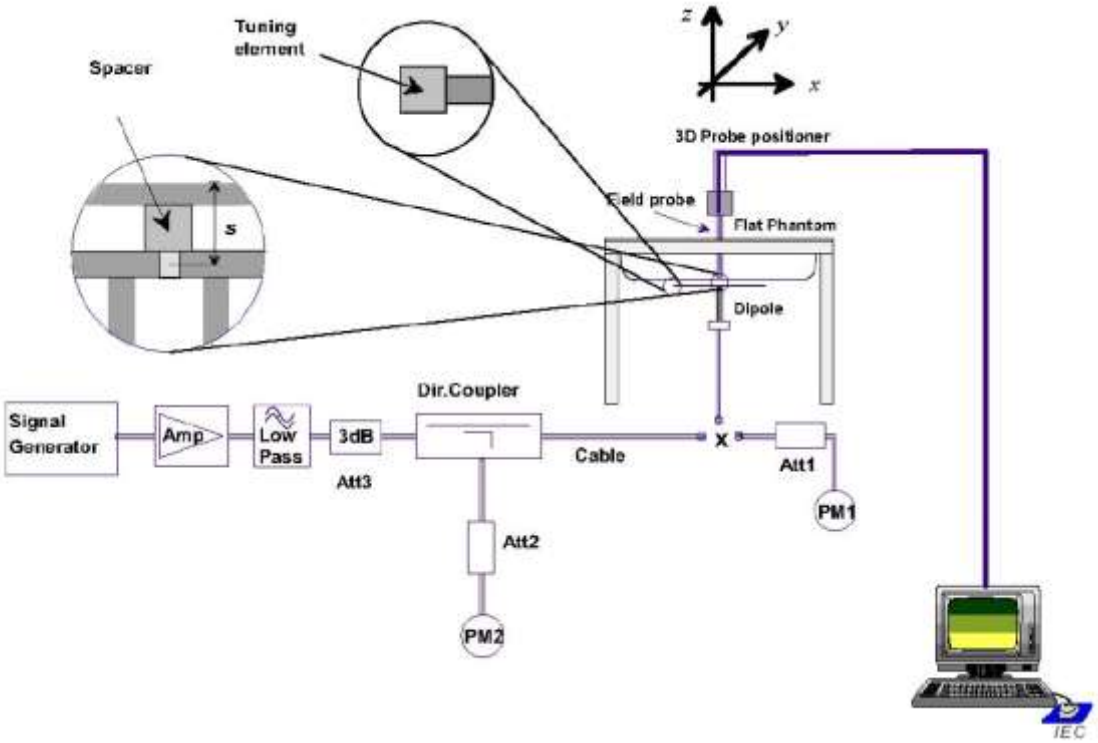


Figure 4 System Check Set-up

System Verification Results

Frequency & Tissue Type	1W Target (W/Kg)		250mW Measured (W/Kg)		1W Normalized (W/Kg)		Temp (℃)	1g Limit (±10% Dev.)	Test Date
	1g SAR	10g SAR	1g SAR	10g SAR	1g SAR	10g SAR			
750 Head	8.55	5.64	2.16	1.39	8.64	5.56	21.5	1.05%	2021-01-23
835 Head	9.47	6.19	2.34	1.49	9.36	5.96	21.5	-1.16%	2021-01-31
1800 Head	39.30	20.40	9.070	4.71	36.28	18.84	21.5	-7.68%	2021-01-28
1900 Head	39.90	20.40	9.800	5.00	39.20	20.00	21.5	-1.75%	2021-01-21
2450 Head	51.90	23.80	13.000	5.97	52.00	23.88	21.5	0.19%	2021-02-03
2600 Head	55.60	24.50	13.90	6.20	55.60	24.80	21.5	0.00%	2021-01-29

Frequency & Tissue Type	1W Target (W/Kg)		100mW Measured (W/Kg)		1W Normalized (W/Kg)		Temp (℃)	1g Limit (±10% Dev.)	Test Date
	1g SAR	10g SAR	1g SAR	10g SAR	1g SAR	10g SAR			
5200 Head	73.90	20.70	7.530	2.16	75.30	21.60	21.5	1.89%	2021-02-04
5800 Head	76.90	21.40	8.140	2.29	81.40	22.90	21.5	5.85%	2021-02-04

Note(s):

1. Target Values used from the calibration certificate by SPEAG and CTTL in collaboration with SPEAG.

5 SAR Measurement Procedure

5.1 Conducted Power Measurement

Conducted power measurements were performed using a base station simulator under digital average power. The handset was placed into a simulated call using a base station simulator in shielded chamber. SAR measurements were taken with a fully charged battery. In order to verify that the device was tested and maintained at full power, this was configured with the base station simulator. The SAR measurement Software calculates a reference point at the start and end of the test to check for power drifts. If conducted power deviations of more than 5 % occurred, the tests were repeated.

5.2 GSM Test Configuration

SAR test for GSM band, a communication link is set up with a System Simulator (SS) by air link. The power level is set to “5” for GSM 850, set to “0” for GSM 1900. Since the GPRS class is 12 for this EUT, it has at most 4 timeslots in uplink and at most 4 timeslots in downlink, the maximum total timeslots is 5. The EDGE class is 12 for this EUT, it has at most 4 timeslots in uplink and at most 4 timeslots in downlink, the maximum total timeslots is 5.
SAR test reduction for GPRS and EDGE modes is determined by the source-based time-averaged output power specified for production units, including tune-up tolerance. The data 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. GSM voice and GPRS data use GMSK, which is a constant amplitude modulation with minimal peak to average power difference within the time-slot burst. For EDGE, GMSK is used for MCS 1 – MCS 4 and 8-PSK is used for MCS 5 – MCS 9; where 8-PSK has an inherently higher peak-to-average power ratio. The GMSK and 8-PSK EDGE configurations are considered separately for SAR compliance. The GMSK EDGE configurations are grouped with GPRS and considered with respect to time-averaged maximum output power to determine compliance. The 3G SAR test reduction procedure is applied to 8-PSK EDGE with GMSK GPRS/EDGE as the primary mode.

5.3 UMTS Test Configuration

Output power Verification

Maximum output power is verified on the High, Middle and Low channel according to the procedures described in section 5.2 of 3GPP TS 34. 121, using the appropriate RMC or AMR with TPC(transmit power control) set to all up bits for WCDMA/HSDPA or applying the required inner loop power control procedures to the maximum output power while HSUPA is active. Results for all applicable physical channel configuration (DPCCH, DPDCHn and spreading codes, HSDPA, HSPA) should be tabulated in the SAR report. All configuration that are not supported by the DUT or can not be measured due to technical or equipment limitations should be clearly identified

Head SAR

SAR for head exposure configurations in voice mode is measured using a 12.2kbps RMC with TPC bits configured to all up bits. SAR in AMR configurations is not required when the maximum average output of each RF channel for 12.2kbps AMR is less than 1/4 dB higher than that measured in 12.2 kbps RMC. Otherwise, SAR is measured on the maximum output channel in 12.2kbps AMR with a 3.4 kbps SRB(Signaling radio bearer) using the exposure

configuration that results in the highest SAR in 12.2kbps RMC for that RF channel.

Body-Worn Accessory SAR

SAR for body exposure configurations in voice and data modes is measured using 12.2kbps RMC with TPC bits configured to all up bits. SAR for other spreading codes and multiple DPDCHn, when supported by the DUT, are not required when the maximum average output of each RF channel, for each spreading code and DPDCHn configuration, are less than 1/4 dB higher than those measured in 12.2kbps RMC. Otherwise, SAR is measured on the maximum output channel with an applicable RMC configuration for the corresponding spreading code or DPDCHn using the exposure configuration that results in the highest SAR with 12.2 kbps RMC. When more than 2 DPDCHn are supported by the DUT, it may be necessary to configure additional DPDCHn for a DUT using FTM (Factory Test Mode) or other chipset based test approaches with parameters similar to those used in 384 kbps and 768 kbps RMC.

HSDPA Test Configuration

SAR for body exposure configurations is measured according to the 'Body SAR Measurements' procedures of that section. In addition,body SAR is also measured for HSDPA when the maximum average output of each RF channel with HSDPA active is at least ¼ dB higher than that measured without HSDPA using 12.2 kbps RMC or the maximum SAR for 12.2 kbps RMC is above 75% of the SAR limit. Body SAR for HSDPA is measured using an FRC with H-Set 1 in Sub-test 1 and a 12.2 kbps RMC configured in Test Loop Mode 1, using the highest body SAR configuration in 12.2 kbps RMC without HSDPA.

HSDPA should be configured according to the UE category of a test device.The number of HSDSCH/ HS-PDSCHs, HARQ processes, minimum inter-TTI interval, transport block sizes and RV coding sequence are defined by the H-set. To maintain a consistent test configuration and stable transmission conditions, QPSK is used in the H-set for SAR testing. HS-DPCCH should be configured with a CQI feedback cycle of 4 ms with a CQI repetition factor of 2 to maintain a constant rate of active CQI slots. DPCCH and DPDCH gain factors(βc, βd), and HS-DPCCH power offset parameters (ΔACK, ΔNACK, ΔCQI) should be set according to values indicated in the Table below. The CQI value is determined by the UE category, transport block size, number of HS-PDSCHs and modulation used in the H-set.

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

Note 1: Δ_{ACK}, Δ_{NACK} and $\Delta_{CQI} = 8 \Leftrightarrow A_{hs} = \beta_{hs}/\beta_c = 30/15 \Leftrightarrow \beta_{hs} = 30/15 * \beta_c$
Note 2: CM = 1 for β_c/β_d =12/15, β_{hs}/β_c=24/15.
Note 3: For subtest 2 the β_c/β_d ratio of 12/15 for the TFC during the measurement period (TF1, TF0) is achieved by setting the signaled gain factors for the reference TFC (TF1, TF1) to β_c = 11/15 and β_d = 15/15.

HSUPA Test Configuration

Body SAR is also measured for HSPA when the maximum average output of each RF channel with HSPA active is at least ¼ dB higher than that measured without HSPA using 12.2 kbps RMC or the maximum SAR for 12.2 kbps RMC is above 75% of the SAR limit. Body SAR for HSPA is measured with E-DCH Sub-test 5, using H-Set 1 and QPSK for FRC and a 12.2 kbps RMC configured in Test Loop Mode 1 with power control algorithm 2, according to the highest body SAR configuration in 12.2 kbps RMC without HSPA.

Due to inner loop power control requirements in HSPA, a commercial communication test set should be used for the output power and SAR tests. The 12.2 kbps RMC, FRC H-set 1 and E- DCH configurations for HSPA should be

configured according to the β values indicated below as well as other applicable procedures described in the 'WCDMA Handset' and 'Release 5 HSDPA Data Devices' sections of 3 G device.

Sub-test	β_c	β_d	β_d (SF)	β_c/β_d	β_{hs}[1]	β_{ec}	β_{ed}	β_{ed} (SF)	β_{ed} (codes)	CM[2] (dB)	MPR (dB)	AG[4] Index	E-TFCI
1	11/15[3]	15/15[3]	64	11/15[3]	22/15	209/225	1039/225	4	1	1.0	0.0	20	75
2	6/15	15/15	64	6/15	12/15	12/15	94/75	4	1	3.0	2.0	12	67
3	15/15	9/15	64	15/9	30/15	30/15	β_{ed1}: 47/15 β_{ed2}: 47/15	4	2	2.0	1.0	15	92
4	2/15	15/15	64	2/15	4/15	2/15	56/75	4	1	3.0	2.0	17	71
5	15/15[4]	15/15[4]	64	15/15[4]	30/15	24/15	134/15	4	1	1.0	0.0	21	81

Note 1: Δ_{ACK}, Δ_{NACK} and $\Delta_{CQI} = 8 \Leftrightarrow A_{hs} = \beta_{hs}/\beta_c = 30/15 \Leftrightarrow \beta_{hs} = 30/15 * \beta_c$.
Note 2: CM = 1 for β_c/β_d =12/15, β_{hs}/β_c=24/15. For all other combinations of DPDCH, DPCCH, HS- DPCCH, E-DPDCH and E-DPCCH the MPR is based on the relative CM difference.
Note 3: For subtest 1 the β_c/β_d ratio of 11/15 for the TFC during the measurement period (TF1, TF0) is achieved by setting the signaled gain factors for the reference TFC (TF1, TF1) to β_c = 10/15 and β_d = 15/15.
Note 4: For subtest 5 the β_c/β_d ratio of 15/15 for the TFC during the measurement period (TF1, TF0) is achieved by setting the signaled gain factors for the reference TFC (TF1, TF1) to β_c = 14/15 and β_d = 15/15.
Note 5: Testing UE using E-DPDCH Physical Layer category 1 Sub-test 3 is not required according to TS 25.306 Table 5.1g.
Note 6: β_{ed} cannot be set directly; it is set by Absolute Grant Value.

HSPA, HSPA+ and DC-HSDPA Test Configuration

SAR test exclusion for HSPA, HSPA+ and DC-HSDPA is determined according to the following:

a) The HSPA procedures are applied to configure 3GPP Rel. 6 HSPA devices in the required sub-test mode(s) to determine SAR test exclusion.

b) SAR is required for Rel. 7 HSPA+ when SAR is required for Rel. 6 HSPA; otherwise, the 3G SAR test reduction procedure is applied to (uplink) HSPA+ with 12.2 kbps RMC as the primary mode.36 Power is measured for HSPA+ that supports uplink 16 QAM according to configurations in Table C.11.1.4 of 3GPP TS 34.121-1 to determine SAR test reduction.

c) SAR is required for Rel. 8 DC-HSDPA when SAR is required for Rel. 5 HSDPA; otherwise, the 3G SAR test reduction procedure is applied to DC-HSDPA with 12.2 kbps RMC as the primary mode. Power is measured for DC-HSDPA according to the H-Set 12, FRC configuration in Table C.8.1.12 of 3GPP TS 34.121-1 to determine SAR test reduction. A primary and a secondary serving HS-DSCH Cell are required to perform the power measurement and for the results to be acceptable.

d) Regardless of whether a PAG is required, the following information must be verified and included in the SAR report for devices supporting HSPA, HSPA+ or DC-HSDPA:

1) The output power measurement results and applicable release version(s) of 3GPP TS 34.121.

i) Power measurement difficulties due to test equipment setup or availability must be resolved between the grantee and its test lab.

2) The power measurement results are in agreement with the individual device implementation and specifications. When Enhanced MPR (E-MPR) applies, the normal MPR targets may be modified according to the Cubic Metric (CM) measured by the device, which must be taken into consideration.

3) The UE category, operating parameters, such as theβand △values used to configure the device for testing, power setback procedures described in 3GGPP TS 34.121 for the power measurements, and HSPA/HSPA+

channel conditions (active and stable) for the entire duration of the measurement according to the required E-TFCI and AG index values.

e) When SAR measurement is required, the test configurations, procedures and power measurement results must be clearly described to confirm that the required test parameters are used, including E-TFCI and AG index stability and output power conditions.

5.4 CDMA Test Configuration

Output power Verification

Maximum output power is verified on the high, middle and low channels according to procedures in section 4.4.5.2 of 3GPP2 C.S0011/TIA-98-E. Results for at least steps 3, 4 and 10 of the power measurement procedures are required in the SAR report. Steps 3 and 4 are measured using Loopback Service Option SO55 with power control bits in “All Up” condition. TDSO/SO32 may be used instead of SO55 for step 4. Step 10 is measured using TDSO/SO32 with power control bits in the “Bits Hold” condition (i.e. alternative Up/Down Bits). All power measurements defined in C.S0011/TIA-98-E that are inapplicable to the handset or cannot be measured due to technical or equipment limitations must be clearly identified in the test report.

Head SAR

SAR for next to the ear head exposure is measured in RC3 with the handset configured to transmit at full rate in SO55. The 3G SAR test reduction procedure is applied to RC1 with RC3 as the primary mode; otherwise, SAR is required for the channel with maximum measured output in RC1 using the head exposure configuration that results in the highest reported SAR in RC3.

Body-Worn Accessory SAR

Body-Worn accessory SAR is measured in RC3 with the handset configured in TDSO/SO32 to transmit at full rate on FCH only with all other code channels disabled. The Body-Worn accessory procedures in KDB Publication 447498 D01 are applied. The 3G SAR test reduction procedure is applied to the multiple code channel configuration (FCH+SCHn), with FCH only as the primary mode. Otherwise, SAR is required for multiple code channel configuration (FCH + SCHn), with FCH at full rate and SCH0 enabled at 9600 bps, using the highest reported SAR configuration for FCH only. When multiple code channels are enabled, the transmitter output can shift by more than 0.5 dB and may lead to higher SAR drifts and SCH dropouts.

The 3G SAR test reduction procedure is applied to Body-Worn accessory SAR in RC1 with RC3 as the primary mode.Otherwise, SAR is required for RC1, with SO55 and full rate, using the highest reported SAR configuration for Body-Worn accessory exposure in RC3.

1x Ev-Do Test Configuration

For handsets with Ev-Do capabilities, the 3G SAR test reduction procedure is applied to Ev-Do Rev. 0 with 1x RTT RC3 as the primary mode to determine Body-Worn accessory test requirements. Otherwise, Body-Worn accessory SAR is required for Rev. 0, at 153.6 kbps, using the highest reported SAR configuration for Body-Worn accessory exposure in RC3.

The 3G SAR test reduction procedure is applied separately to Rev. A and Rev. B, with Rev. 0 as the primary mode to determine Body-Worn accessory SAR test requirements. When SAR is not required for Rev. 0, the 3G SAR test reduction is applied with 1x RTT RC3 as the primary mode. Otherwise, SAR is required for Rev. A or Rev. B, with a

Reverse Data Channel payload size of 4096 bits and a Termination Target of 16 slots defined for Subtype 2 and 3 Physical Layer configurations, using the highest reported SAR configuration for Body-Worn accessory exposure in Rev. 0 or RC3, as appropriate.
A Forward Traffic Channel data rate corresponding to the 2-slot version of 307.2 kbps with ACK Channel transmitting in all slots is configured in the downlink for Rev. 0, Rev. A and Rev. B.

5.5 LTE Test Configuration

QPSK with 1 RB allocation

Start with the largest channel bandwidth then 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.

QPSK with 50% RB allocation

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

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 above two sections 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.

Other channel bandwidth standalone SAR test requirements

For the other channel bandwidths used by the device in a frequency band, apply all the procedures required for the largest channel bandwidth in above sections to determine the channels and RB configurations that need SAR testing, then only measure SAR when the highest maximum output power of a configuration requiring testing in the smaller channel bandwidth is > ½ dB higher than the equivalent channel configurations in the largest channel bandwidth configuration, or the reported SAR of a configuration for the largest channel bandwidth is > 1.45 W/kg. The equivalent channel configuration for the RB allocation, RB offset and modulation, etc., is determined for the smaller channel bandwidth according to the same number of RB allocated in the largest channel bandwidth. For example, 50 RB in 10 MHz channel bandwidth does not apply to 5 MHz channel bandwidth; therefore, this cannot be tested in the smaller channel bandwidth. However, 50% RB allocation in 10 MHz channel bandwidth is equivalent to 100% RB allocation in 5 MHz channel bandwidth; therefore, these are the equivalent configurations to be compared to determine the specific channel and configuration in the smaller channel bandwidth that need SAR testing.

5.6 WLAN Test Configuration

The SAR measurement and test reduction procedures are structured according to either the DSSS or OFDM transmission mode configurations used in each standalone frequency band and aggregated band. For devices that operate in exposure configurations that require multiple test positions, additional SAR test reduction may be applied.

The maximum output power specified for production units, including tune-up tolerance, are used to determine initial SAR test requirements for the 802.11 transmission modes in a frequency band. SAR is measured using the highest measured maximum output power channel for the initial test configuration. SAR measurement and test reduction for the remaining 802.11 modes and test channels are determined according to measured or specified maximum output power and reported SAR of the initial measurements. The general test reduction and SAR measurement approaches are summarized in the following:

1) 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. Channels with measured maximum output power within ¼ dB are considered to have the same maximum output.
2) For OFDM transmission configurations in the 2.4 GHz and 5 GHz bands, an “initial test configuration” is first determined for each standalone and aggregated frequency band according to the maximum output power and tune-up tolerance specified for production units.
   a. 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.
   b. SAR is measured for OFDM configurations using the initial test configuration procedures. Additional frequency band specific SAR test reduction may be considered for individual frequency bands
   c. Depending on the reported SAR of the highest maximum output power channel tested in the initial test configuration, SAR test reduction may apply to subsequent highest output channels in the initial test configuration to reduce the number of SAR measurements.
3) The Initial test configuration does not apply to DSSS. The 2.4 GHz band SAR test requirements and 802.11b DSSS procedures are used to establish the transmission configurations required for SAR measurement.
4) An “initial test position”is applied to further reduce the number of SAR tests for devices operating in next to the ear, UMPC mini-tablet or hotspot mode exposure configurations that require multiple test positions .

a. SAR is measured for 802.11b according to the 2.4 GHz DSSS procedure using the exposure condition established by the initial test position.

b. SAR is measured for 2.4 GHz and 5 GHz OFDM configurations using the initial test configuration. 802.11b/g/n operating modes are tested independently according to the service requirements in each frequency band. 802.11b/g/n modes are tested on the maximum average output channel.

5) The Initial test position does not apply to devices that require a fixed exposure test position. SAR is measured in a fixed exposure test position for these devices in 802.11b according to the 2.4 GHz DSSS procedure or in 2.4 GHz and 5 GHz OFDM configurations using the initial test configuration procedures .
6) The “subsequent test configuration”procedures are applied to determine if additional SAR measurements are required for the remaining OFDM transmission modes that have not been tested in the initial test configuration.

SAR test exclusion is determined according to reported SAR in the initial test configuration and maximum output power specified or measured for these other OFDM configurations.

2.4 GHz and 5GHz SAR Procedures

Separate SAR procedures are applied to DSSS and OFDM configurations in the 2.4 GHz band to simplify DSSS test requirements. For 802.11b DSSS SAR measurements, DSSS SAR procedure applies to fixed exposure test position and initial test position procedure applies to multiple exposure test positions. When SAR measurement is required for an OFDM configuration, the initial test configuration, subsequent test configuration and initial test position procedures are applied. The SAR test exclusion requirements for 802.11g/n OFDM configurations are described in section 5.2.2.

1. 802.11b DSSS SAR Test Requirements

SAR is measured for 2.4 GHz 802.11b DSSS using either a fixed test position or, when applicable, the initial test position procedure. SAR test reduction is determined according to the following:

a. When the reported SAR of the highest measured maximum output power channel (section 3.1) for the exposure configuration is ≤ 0.8 W/kg, no further SAR testing is required for 802.11b DSSS in that exposure configuration.

b. When the reported SAR is > 0.8 W/kg, SAR is required for that exposure configuration using the next highest measured output power channel. When any reported SAR is > 1.2 W/kg, SAR is required for the third channel; i.e., all channels require testing.

2. 2.4 GHz 802.11g/n OFDM SAR Test Exclusion Requirements

When SAR measurement is required for 2.4 GHz 802.11g/n OFDM configurations, the measurement and test reduction procedures for OFDM are applied (section 5.3). SAR is not required for the following 2.4 GHz OFDM conditions.

a. When KDB Publication 447498 SAR test exclusion applies to the OFDM configuration

b. When the highest reported SAR for DSSS is adjusted by the ratio of OFDM to DSSS specified maximum output power and the adjusted SAR is ≤ 1.2 W/kg.

3. SAR Test Requirements for OFDM Configurations

When SAR measurement is required for 802.11 a/g/n/ac OFDM configurations, each standalone and frequency aggregated band is considered separately for SAR test reduction. When the same transmitter and antenna(s) are used for U-NII-1 and U-NII-2A bands, additional SAR test reduction applies. When band gap channels between U-NII-2C band and 5.8 GHz U-NII-3 or §15.247 band are supported, the highest maximum output power transmission mode configuration and maximum output power channel across the bands must be used to determine SAR test reduction, according to the initial test configuration and subsequent test configuration requirements.20 In applying the initial test configuration and subsequent test configuration procedures, the 802.11 transmission configuration with the highest specified maximum output power and the channel within a test configuration with the highest measured maximum output power should be clearly distinguished to apply the procedures.

4. OFDM Transmission Mode SAR Test Configuration and Channel Selection Requirements

The initial test configuration for 2.4 GHz and 5 GHz OFDM transmission modes is determined by the 802.11 configuration with the highest maximum output power specified for production units, including tune-up tolerance, in each standalone and aggregated frequency band. SAR for the initial test configuration is measured using the highest maximum output power channel determined by the default power measurement procedures (section 4)

When multiple configurations in a frequency band have the same specified maximum output power, the initial test configuration is determined according to the following steps applied sequentially.

a. The largest channel bandwidth configuration is selected among the multiple configurations with the same specified maximum output power.

b. If multiple configurations have the same specified maximum output power and largest channel bandwidth, the lowest

order modulation among the largest channel bandwidth configurations is selected.
c. If multiple configurations have the same specified maximum output power, largest channel bandwidth and lowest order modulation, the lowest data rate configuration among these configurations is selected.
d. When multiple transmission modes (802.11a/g/n/ac) have the same specified maximum output power, largest channel bandwidth, lowest order modulation and lowest data rate, the lowest order 802.11 mode is selected; i.e., 802.11a is chosen over 802.11n then 802.11ac or 802.11g is chosen over 802.11n.
After an initial test configuration is determined, if multiple test channels have the same measured maximum output power, the channel chosen for SAR measurement is determined according to the following. These channel selection procedures apply to both the initial test configuration and subsequent test configuration(s), with respect to the default power measurement procedures or additional power measurements required for further SAR test reduction. The same procedures also apply to subsequent highest output power channel(s) selection.
a. Channels with measured maximum output power within ¼ dB of each other are considered to have the same maximum output.
b. When there are multiple test channels with the same measured maximum output power, the channel closest to mid-band frequency is selected for SAR measurement.
c. When there are multiple test channels with the same measured maximum output power and equal separation from mid-band frequency; for example, high and low channels or two mid-band channels, the higher frequency (number) channel is selected for SAR measurement. Initial Test Configuration Procedures
An initial test configuration is determined for OFDM transmission modes according to the channel bandwidth, modulation and data rate combination(s) with the highest maximum output power specified for production units in each standalone and aggregated frequency band. SAR is measured using the highest measured maximum output power channel. For configurations with the same specified or measured maximum output power, additional transmission mode and test channel selection procedures are required (see section 5.3.2). SAR test reduction of subsequent highest output test channels is based on the reported SAR of the initial test configuration. For next to the ear, hotspot mode and UMC mini-tablet exposure configurations where multiple test positions are required, the initial test position procedure is applied to minimize the number of test positions required for SAR measurement using the initial test configuration transmission mode.23 For fixed exposure conditions that do not have multiple SAR test positions, SAR is measured in the transmission mode determined by the initial test configuration. When the reported SAR of the initial test configuration is > 0.8 W/kg, SAR measurement is required for the subsequent next highest measured output power channel(s) in the initial test configuration until the reported SAR is ≤ 1.2 W/kg or all required channels are tested.
5. Subsequent Test Configuration Procedures
SAR measurement requirements for the remaining 802.11 transmission mode configurations that have not been tested in the initial test configuration are determined separately for each standalone and aggregated frequency band, in each exposure condition, according to the maximum output power specified for production units. The initial test position procedure is applied to next to the ear, UMPC mini-tablet and hotspot mode configurations.
When the same maximum output power is specified for multiple transmission modes, the procedures in section 5.3.2 are applied to determine the test configuration. Additional power measurements may be required to determine if SAR measurements are required for subsequent highest output power channels in a subsequent test configuration. The subsequent test configuration and SAR measurement procedures are described in the following.
a. When SAR test exclusion provisions of KDB Publication 447498 are applicable and SAR measurement is not required for the initial test configuration, SAR is also not required for the next highest maximum output power transmission mode subsequent test configuration(s) in that frequency band or aggregated band and exposure

configuration.

b. When the highest reported SAR for the initial test configuration (when applicable, include subsequent highest output channels), according to the initial test position or fixed exposure position requirements, is adjusted by the ratio of the subsequent test configuration to initial test configuration specified maximum output power and the adjusted SAR is ≤ 1.2 W/kg, SAR is not required for that subsequent test configuration.

c. The number of channels in the initial test configuration and subsequent test configuration can be different due to differences in channel bandwidth. When SAR measurement is required for a subsequent test configuration and the channel bandwidth is smaller than that in the initial test configuration, all channels in the subsequent test configuration that overlap with the larger bandwidth channel tested in the initial test configuration should be used to determine the highest maximum output power channel. This step requires additional power measurement to identify the highest maximum output power channel in the subsequent test configuration to determine SAR test reduction.

1). SAR should first be measured for the channel with highest measured output power in the subsequent test configuration.

2). SAR for subsequent highest measured maximum output power channels in the subsequent test configuration is required only when the reported SAR of the preceding higher maximum output power channel(s) in the subsequent test configuration is > 1.2 W/kg or until all required channels are tested.

a) For channels with the same measured maximum output power, SAR should be measured using the channel closest to the center frequency of the larger channel bandwidth channel in the initial test configuration.

d. SAR measurements for the remaining highest specified maximum output power OFDM transmission mode configurations that have not been tested in the initial test configuration (highest maximum output) or subsequent test configuration(s) (subsequent next highest maximum output power) is determined by applying the subsequent test configuration procedures in this section to the remaining configurations according to the following:

1) replace “subsequent test configuration” with “next subsequent test configuration” (i.e., subsequent next highest specified maximum output power configuration)

2) replace “initial test configuration” with “all tested higher output power configurations.

5.7 Measurement Variability

Per FCC KDB Publication 865664 D01, SAR measurement variability was assessed for each frequency band, which was determined by the SAR probe calibration point and tissue-equivalent medium used for the device measurements. When both head and body tissue-equivalent media were required for SAR measurements in a frequency band, the variability measurement procedures were applied to the tissue medium with the highest measured SAR, using the highest measured SAR configuration for that tissue-equivalent medium. These additional measurements were repeated after the completion of all measurements requiring the same head or body tissue-equivalent medium in a frequency band. The test device was returned to ambient conditions (normal room temperature) with the battery fully charged before it was re-mounted on the device holder for the repeated measurement(s) to minimize any unexpected variations in the repeated results.

SAR Measurement Variability was assessed using the following procedures for each frequency band:

1) When the original highest measured SAR is ≥ 0.80 W/kg, the measurement was repeated once.

2) A second repeated measurement was preformed only if the ratio of largest to smallest SAR for the original and first repeated measurements was > 1.20 or when the original or repeated measurement was ≥ 1.45 W/kg (~ 10% from the 1-g SAR limit).

3) A third repeated measurement was performed only if the original, first or second repeated measurement was ≥ 1.5 W/kg and the ratio of largest to smallest SAR for the original, first and second repeated measurements is > 1.20.
4) Repeated measurements are not required when the original highest measured SAR is < 0.80 W/kg

5.8 Measured and Reported SAR

Per FCC KDB Publication 447498 D01v06, When SAR is not measured at the maximum power level allowed for production units, the results must be scaled to the maximum tune-up tolerance limit according to the power applied to the individual channels tested to determine compliance. For simultaneous transmission, the measured aggregate SAR must be scaled according to the sum of the differences between the maximum tune-up tolerance and actual power used to test each transmitter. When SAR is measured at or scaled to the maximum tune-up tolerance limit, the results are referred to as reported SAR. Test highest reported SAR results are identified on the grant of equipment authorization according to procedures in KDB 690783 D01v01r03.

6 Test Results

6.1 Conducted Power Results

Conducted Power Measurement Results for GPRS/EDGE

GSM 850		Burst Conducted Power (dBm)			/	Average Power (dBm)		
		Channel				Channel		
		Low	Mid	High		Low	Mid	High
GSM		33.72	**33.80**	33.71	/	/	/	/
GPRS	1 TX slot	30.31	30.34	30.23	**-9.03 dB**	21.28	21.31	21.20
	2 TX slot	30.26	30.29	30.18	**-6.02 dB**	24.24	24.27	24.16
	3 TX slot	30.21	30.25	30.14	**-4.26 dB**	25.95	25.99	25.88
	4 TX slot	30.17	30.21	30.10	**-3.01 dB**	27.16	**27.20**	27.09
EDGE	1 TX slot	23.49	23.76	23.46	**-9.03 dB**	14.46	14.73	14.43
	2 TX slot	23.44	23.62	23.36	**-6.02 dB**	17.42	17.60	17.34
	3 TX slot	23.55	23.56	23.38	**-4.26 dB**	19.29	19.30	19.12
	4 TX slot	23.46	23.51	23.54	**-3.01 dB**	20.45	20.50	**20.53**

GSM 1900		Burst Conducted Power (dBm)			/	Average Power (dBm)		
		Channel				Channel		
		Low	Mid	High		Low	Mid	High
GSM		**30.16**	29.93	29.97	/	/	/	/
GPRS	1 TX slot	26.74	26.25	26.37	**-9.03 dB**	17.71	17.22	17.34
	2 TX slot	26.68	26.18	26.31	**-6.02 dB**	20.66	20.16	20.29
	3 TX slot	26.63	26.13	26.26	**-4.26 dB**	22.37	21.87	22.00
	4 TX slot	26.59	26.09	26.22	**-3.01 dB**	**23.58**	23.08	23.21
EDGE	1 TX slot	21.61	21.03	20.92	**-9.03 dB**	12.58	12.00	11.89
	2 TX slot	21.69	20.96	21.02	**-6.02 dB**	15.67	14.94	15.00
	3 TX slot	21.43	20.85	20.80	**-4.26 dB**	17.17	16.59	16.54
	4 TX slot	21.50	20.90	20.91	**-3.01 dB**	**18.49**	17.89	17.90

Note(s):

1. Division Factors
   To average the power, the division factor is as follows:
   1TX-slot = 1 transmit time slot out of 8 time slots=> conducted power divided by (8/1) => -9.03dB
   2TX-slots = 2 transmit time slots out of 8 time slots=> conducted power divided by (8/2) => -6.02dB
   3TX-slots = 3 transmit time slots out of 8 time slots=> conducted power divided by (8/3) => -4.26dB
   4TX-slots = 4 transmit time slots out of 8 time slots=> conducted power divided by (8/4) => -3.01dB
2. According to the conducted power as above, the GPRS/EDGE measurements are performed with 4Tx slot for GPRS 850 and GPRS1900.

3. SAR is not required for EDGE mode because its output power is less than that of GPRS Mode

Conducted Power Measurement Results for WCDMA/HSDPA/HSPUA

WCDMA Band II	Mode	Conducted Power (dBm)		
		Channel		
		Low	Mid	High
RMC	12.2 kbps	22.88	23.06	**23.22**
HSDPA	Sub - Test 1	21.95	22.09	22.31
	Sub - Test 2	21.96	22.12	22.33
	Sub - Test 3	21.47	21.61	21.84
	Sub - Test 4	21.47	21.62	21.83
HSUPA	Sub - Test 1	22.00	22.13	22.16
	Sub - Test 2	19.96	20.12	20.14
	Sub - Test 3	21.01	21.16	21.15
	Sub - Test 4	19.96	19.96	20.13
	Sub - Test 5	21.99	21.98	22.13

WCDMA Band IV	Mode	Conducted Power (dBm)		
		Channel		
		Low	Mid	High
RMC	12.2 kbps	**22.90**	22.86	22.79
HSDPA	Sub - Test 1	21.91	21.87	21.83
	Sub - Test 2	21.93	21.87	21.82
	Sub - Test 3	21.43	21.37	21.33
	Sub - Test 4	21.40	21.35	21.32
HSUPA	Sub - Test 1	21.95	21.94	21.88
	Sub - Test 2	19.84	19.91	19.81
	Sub - Test 3	20.87	20.86	20.88
	Sub - Test 4	19.92	19.86	19.82
	Sub - Test 5	21.86	21.92	21.85

WCDMA Band V	Mode	Conducted Power (dBm)		
		Channel		
		Low	Mid	High
RMC	12.2 kbps	23.95	24.02	**24.18**
HSDPA	Sub - Test 1	22.95	23.03	23.16
	Sub - Test 2	23.04	23.02	23.17

	Sub - Test 3	22.55	22.53	22.66
	Sub - Test 4	22.54	22.54	22.65
HSUPA	**Sub - Test 1**	23.06	23.04	23.17
	Sub - Test 2	21.06	21.06	21.17
	Sub - Test 3	22.07	22.06	22.20
	Sub - Test 4	21.03	20.99	21.18
	Sub - Test 5	23.09	23.10	23.21

Conducted power measurement results for LTE

FDD LTE Band 2							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	18700	18900	19100	18700	18900	19100
20MHz	1 (RB_Pos:0)	23.27	23.46	23.37	22.77	22.83	22.84
	1 (RB_Pos:49)	23.16	23.29	23.25	22.63	22.22	22.78
	1 (RB_Pos:99)	**23.53**	23.39	23.29	22.92	22.74	22.72
	50 (RB_Pos:0)	22.01	22.25	**22.47**	21.05	21.20	21.43
	50 (RB_Pos:24)	22.15	22.22	22.41	21.12	21.19	21.36
	50 (RB_Pos:49)	22.21	22.21	22.34	21.19	21.23	21.32
	100 (RB_Pos:0)	22.07	22.20	**22.40**	21.13	21.37	21.41
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	18675	18900	19125	18675	18900	19125
15MHz	1 (RB_Pos:0)	23.18	23.31	23.48	21.94	22.88	22.82
	1 (RB_Pos:37)	22.96	23.12	23.13	21.75	22.58	22.47
	1 (RB_Pos:74)	23.38	23.41	23.47	22.09	22.91	22.76
	36 (RB_Pos:0)	21.90	22.15	22.32	20.89	21.20	21.25
	36 (RB_Pos:18)	21.84	22.17	22.23	20.94	21.26	21.23
	36 (RB_Pos:37)	22.01	22.26	22.19	21.11	21.34	21.34
	75 (RB_Pos:0)	21.97	22.43	22.34	21.00	21.44	21.29
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	18650	18900	19150	18650	18900	19150
10MHz	1 (RB_Pos:0)	23.14	23.63	23.47	22.06	23.15	22.61
	1 (RB_Pos:24)	22.93	23.33	23.29	21.87	22.90	22.23
	1 (RB_Pos:49)	23.25	23.60	23.50	22.16	23.08	22.58
	25 (RB_Pos:0)	22.06	22.51	22.40	21.06	21.57	21.52
	25 (RB_Pos:12)	22.03	22.46	22.48	21.06	21.55	21.60
	25 (RB_Pos:24)	22.06	22.50	22.46	21.15	21.59	21.59

	50 (RB_Pos:0)	22.01	22.52	22.43	20.99	21.51	21.45
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	18625	18900	19175	18625	18900	19175
5MHz	1 (RB_Pos:0)	23.09	23.62	23.35	22.38	23.02	22.65
	1 (RB_Pos:12)	22.97	23.51	23.27	22.19	22.93	22.46
	1 (RB_Pos:24)	22.90	23.41	23.24	22.17	22.87	22.45
	12 (RB_Pos:0)	22.05	22.49	22.47	21.16	21.66	21.54
	12 (RB_Pos:6)	21.98	22.47	22.39	21.08	21.63	21.52
	12 (RB_Pos:11)	22.01	22.39	22.31	21.08	21.54	21.38
	25 (RB_Pos:0)	22.01	22.46	22.31	21.09	21.50	21.38
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	18615	18900	19185	18615	18900	19185
3MHz	1 (RB_Pos:0)	22.96	23.45	23.35	21.90	23.03	22.43
	1 (RB_Pos:7)	22.93	23.48	23.30	21.91	23.00	22.40
	1 (RB_Pos:14)	22.91	23.34	23.21	21.79	22.92	22.29
	8 (RB_Pos:0)	22.01	22.41	22.31	21.17	21.62	21.45
	8 (RB_Pos:4)	22.00	22.46	22.29	21.13	21.70	21.41
	8 (RB_Pos:7)	22.00	22.40	22.29	21.11	21.59	21.36
	15 (RB_Pos:0)	22.00	22.40	22.32	21.02	21.54	21.30
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	18607	18900	19193	18607	18900	19193
1.4MHz	1 (RB_Pos:0)	22.74	23.26	23.14	22.34	22.81	22.20
	1 (RB_Pos: 2)	22.76	23.32	23.20	22.39	22.86	22.19
	1 (RB_Pos:5)	22.87	23.22	23.07	22.31	22.79	22.33
	3 (RB_Pos:0)	22.82	23.22	23.18	22.14	22.51	22.45
	3 (RB_Pos:1)	22.84	23.24	23.23	22.03	22.50	22.49
	3 (RB_Pos:2)	22.83	23.14	23.18	22.03	22.37	22.42
	6 (RB_Pos:0)	21.96	22.30	22.17	21.15	21.32	21.50

FDD LTE Band 4							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	20050	20175	20300	20050	20175	20300
20MHz	1 (RB_Pos:0)	**22.82**	22.80	22.73	22.24	22.20	22.16
	1 (RB_Pos:49)	22.73	22.69	22.45	22.06	22.15	21.92
	1 (RB_Pos:99)	22.81	22.69	22.79	22.23	22.06	22.11

	50 (RB_Pos:0)	21.72	21.61	21.61	20.76	20.65	20.64
	50 (RB_Pos:24)	21.67	21.69	21.60	20.70	20.74	20.57
	50 (RB_Pos:49)	**21.73**	21.66	21.73	20.78	20.64	20.72
	100 (RB_Pos:0)	**21.75**	21.65	21.62	20.74	20.69	20.64
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	20025	20175	20325	20025	20175	20325
15MHz	1 (RB_Pos:0)	22.90	22.95	22.81	21.85	22.38	22.24
	1 (RB_Pos:37)	22.61	22.60	22.54	21.56	22.08	22.00
	1 (RB_Pos:74)	22.88	22.79	22.96	21.89	22.18	22.34
	36 (RB_Pos:0)	21.65	21.67	21.55	20.70	20.73	20.63
	36 (RB_Pos:18)	21.70	21.68	21.62	20.75	20.76	20.61
	36 (RB_Pos:37)	21.76	21.76	21.67	20.84	20.75	20.71
	75 (RB_Pos:0)	21.68	21.68	21.59	20.74	20.75	20.64
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	20000	20175	20350	20000	20175	20350
10MHz	1 (RB_Pos:0)	23.06	23.05	22.84	21.97	22.43	21.90
	1 (RB_Pos:24)	22.75	22.79	22.64	21.68	22.19	21.64
	1 (RB_Pos:49)	22.98	22.91	22.91	21.96	22.33	21.91
	25 (RB_Pos:0)	21.91	21.88	21.64	20.93	20.93	20.69
	25 (RB_Pos:12)	21.89	21.84	21.65	20.89	20.89	20.79
	25 (RB_Pos:24)	21.87	21.80	21.64	20.90	20.82	20.74
	50 (RB_Pos:0)	21.86	21.90	21.73	20.88	20.92	20.71
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	19975	20175	20375	19975	20175	20375
5MHz	1 (RB_Pos:0)	22.86	22.93	22.80	22.38	22.06	21.89
	1 (RB_Pos:12)	22.77	22.82	22.66	22.32	21.86	21.75
	1 (RB_Pos:24)	22.78	22.70	22.62	22.31	21.85	21.80
	12 (RB_Pos:0)	21.82	21.85	21.61	21.04	20.92	20.73
	12 (RB_Pos:6)	21.83	21.83	21.62	21.02	20.88	20.67
	12 (RB_Pos:11)	21.85	21.79	21.71	21.08	20.87	20.76
	25 (RB_Pos:0)	21.82	21.75	21.61	20.93	20.80	20.63
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	19965	20175	20385	19965	20175	20385
3MHz	1 (RB_Pos:0)	22.85	22.90	22.60	21.79	22.29	21.70
	1 (RB_Pos:7)	22.83	22.82	22.67	21.69	22.25	21.76
	1 (RB_Pos:14)	22.75	22.65	22.58	21.70	22.06	21.67

	8 (RB_Pos:0)	21.87	21.76	21.63	21.02	20.85	20.67
	8 (RB_Pos:4)	21.81	21.78	21.71	20.93	20.90	20.71
	8 (RB_Pos:7)	21.83	21.76	21.67	20.96	20.87	20.69
	15 (RB_Pos:0)	21.79	21.82	21.68	20.87	20.82	20.70
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	19957	20175	20393	19957	20175	20393
1.4MHz	1 (RB_Pos:0)	22.76	22.76	22.60	21.75	22.13	21.66
	1 (RB_Pos: 2)	22.72	22.80	22.66	21.91	22.20	21.77
	1 (RB_Pos:5)	22.71	22.76	22.61	21.81	22.15	21.66
	3 (RB_Pos:0)	22.72	22.80	22.72	21.76	21.95	21.79
	3 (RB_Pos:1)	22.78	22.80	22.75	21.90	21.98	21.77
	3 (RB_Pos:2)	22.75	22.81	22.68	21.89	21.92	21.72
	6 (RB_Pos:0)	21.74	21.80	21.71	20.98	20.72	20.84

FDD LTE Band 5							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	20450	20525	20600	20450	20525	20600
10MHz	1 (RB_Pos:0)	24.02	23.94	24.11	23.31	23.41	23.10
	1 (RB_Pos:24)	23.76	23.71	23.82	23.04	23.20	22.89
	1 (RB_Pos:49)	**24.14**	24.05	24.11	23.23	23.50	23.07
	25 (RB_Pos:0)	22.92	22.91	22.95	21.95	21.95	22.09
	25 (RB_Pos:12)	**23.00**	22.91	22.97	22.00	21.94	22.10
	25 (RB_Pos:24)	22.99	22.89	22.92	21.94	21.97	22.07
	50 (RB_Pos:0)	**23.02**	22.93	22.99	21.93	21.94	22.07
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	20425	20525	20625	20425	20525	20625
5MHz	1 (RB_Pos:0)	23.96	23.78	23.99	23.10	23.02	23.41
	1 (RB_Pos:12)	23.85	23.75	24.00	23.00	22.99	23.42
	1 (RB_Pos:24)	23.79	23.74	23.81	23.03	22.99	23.31
	12 (RB_Pos:0)	22.94	22.90	22.90	21.97	21.97	22.09
	12 (RB_Pos:6)	22.85	22.86	22.88	21.91	21.93	21.98
	12 (RB_Pos:11)	22.90	22.86	22.80	21.90	21.92	21.92
	25 (RB_Pos:0)	22.83	22.81	22.90	21.83	21.91	21.97
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	20415	20525	20635	20415	20525	20635

3MHz	1 (RB_Pos:0)	23.94	23.78	23.90	22.80	23.30	22.90
	1 (RB_Pos:7)	23.98	23.75	23.84	22.83	23.23	22.88
	1 (RB_Pos:14)	23.80	23.74	23.81	22.64	23.24	22.80
	8 (RB_Pos:0)	22.95	22.90	22.88	22.05	21.99	22.01
	8 (RB_Pos:4)	23.01	22.85	22.82	22.13	21.98	21.94
	8 (RB_Pos:7)	22.95	22.88	22.89	22.07	22.01	21.94
	15 (RB_Pos:0)	22.97	22.84	22.81	21.96	21.91	21.85
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	20407	20525	20643	20407	20525	20643
1.4MHz	1 (RB_Pos:0)	23.76	23.76	23.82	22.98	23.20	22.83
	1 (RB_Pos: 2)	23.84	23.75	23.83	22.99	23.23	22.74
	1 (RB_Pos:5)	23.75	23.76	23.79	22.95	23.23	22.83
	3 (RB_Pos:0)	23.80	23.65	23.79	22.90	23.01	23.01
	3 (RB_Pos:1)	23.79	23.78	23.81	22.85	22.98	23.07
	3 (RB_Pos:2)	23.82	23.68	23.74	22.87	22.93	22.96
	6 (RB_Pos:0)	22.84	22.77	22.79	21.95	21.73	22.02

FDD LTE Band 7							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	20850	21100	21350	20850	21100	21350
20MHz	1 (RB_Pos:0)	21.58	22.70	22.54	21.15	22.02	21.91
	1 (RB_Pos:49)	22.69	**22.75**	22.60	22.31	22.08	22.07
	1 (RB_Pos:99)	22.59	22.64	22.60	22.15	22.01	22.08
	50 (RB_Pos:0)	21.81	21.67	21.73	20.82	20.78	20.70
	50 (RB_Pos:24)	21.92	21.75	21.82	20.93	20.80	20.80
	50 (RB_Pos:49)	**21.93**	21.68	21.73	20.85	20.67	20.70
	100 (RB_Pos:0)	**21.87**	21.69	21.77	21.03	20.73	20.73
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	20825	21100	21375	20825	21100	21375
15MHz	1 (RB_Pos:0)	21.67	22.57	22.60	20.57	21.97	21.98
	1 (RB_Pos:37)	22.26	22.61	22.71	21.21	22.10	22.06
	1 (RB_Pos:74)	22.57	22.62	22.63	21.78	22.11	22.03
	36 (RB_Pos:0)	21.81	21.68	21.72	20.87	20.80	20.69
	36 (RB_Pos:18)	21.83	21.70	21.89	20.95	20.86	20.82
	36 (RB_Pos:37)	21.79	21.66	21.76	20.93	20.75	20.74
	75 (RB_Pos:0)	21.91	21.67	21.73	20.87	20.75	20.76

Bandwidth (MHz)	RB Set	Power (dBm)					
		QPSK			16QAM		
	Channel	20800	21100	21400	20800	21100	21400
10MHz	1 (RB_Pos:0)	21.26	22.82	22.99	20.22	22.26	22.06
	1 (RB_Pos:24)	21.72	22.59	22.79	20.71	22.06	21.81
	1 (RB_Pos:49)	22.20	22.58	22.89	21.16	22.07	21.96
	25 (RB_Pos:0)	21.49	21.77	21.97	20.60	20.83	21.07
	25 (RB_Pos:12)	21.65	21.72	21.87	20.75	20.78	20.93
	25 (RB_Pos:24)	21.73	21.78	21.86	20.81	20.84	20.95
	50 (RB_Pos:0)	21.74	21.74	21.91	20.70	20.80	20.94
Bandwidth (MHz)	RB Set	Power (dBm)					
		QPSK			16QAM		
	Channel	20775	21100	21425	20775	21100	21425
5MHz	1 (RB_Pos:0)	21.44	22.83	22.87	20.65	22.28	22.05
	1 (RB_Pos:12)	21.55	22.68	22.80	20.78	22.20	21.98
	1 (RB_Pos:24)	21.43	22.62	22.78	20.71	22.22	21.96
	12 (RB_Pos:0)	21.49	21.69	21.95	20.67	20.85	21.01
	12 (RB_Pos:6)	21.52	21.72	21.91	20.71	20.84	20.96
	12 (RB_Pos:11)	21.50	21.73	21.85	20.68	20.83	20.91
	25 (RB_Pos:0)	21.48	21.71	21.88	20.61	20.80	20.73

FDD LTE Band 12							
Bandwidth (MHz)	RB Set	Power (dBm)					
		QPSK			16QAM		
	Channel	23060	23095	23130	23060	23095	23130
10MHz	1 (RB_Pos:0)	**24.29**	24.27	24.15	23.25	23.21	23.52
	1 (RB_Pos:24)	23.91	23.84	23.92	22.83	22.90	23.31
	1 (RB_Pos:49)	24.10	24.08	23.95	23.09	22.97	23.32
	25 (RB_Pos:0)	22.97	23.02	**23.04**	22.15	22.09	22.10
	25 (RB_Pos:12)	23.01	22.99	22.98	22.00	21.94	22.00
	25 (RB_Pos:24)	23.04	23.04	22.91	22.01	21.96	21.96
	50 (RB_Pos:0)	**23.13**	23.03	23.09	21.98	21.91	22.15
Bandwidth (MHz)	RB Set	Power (dBm)					
		QPSK			16QAM		
	Channel	23035	23095	23155	23035	23095	23155
5MHz	1 (RB_Pos:0)	23.95	24.01	23.75	23.14	23.51	22.97
	1 (RB_Pos:12)	23.89	23.93	23.78	23.09	23.42	22.94
	1 (RB_Pos:24)	23.84	23.95	23.64	23.10	23.43	22.84
	12 (RB_Pos:0)	23.01	23.00	22.80	22.19	22.09	21.87

	12 (RB_Pos:6)	22.92	22.92	22.75	21.99	22.01	21.71
	12 (RB_Pos:11)	22.87	22.85	22.67	21.90	22.04	21.69
	25 (RB_Pos:0)	22.85	22.90	22.78	21.87	21.94	21.78
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	23025	23095	23165	23025	23095	23165
3MHz	1 (RB_Pos:0)	23.79	23.87	23.77	22.89	22.92	23.18
	1 (RB_Pos:7)	23.80	23.86	23.73	22.84	22.83	23.15
	1 (RB_Pos:14)	23.77	23.77	23.70	22.80	22.74	23.12
	8 (RB_Pos:0)	22.82	22.81	22.84	21.88	21.99	21.81
	8 (RB_Pos:4)	22.74	22.96	22.81	21.80	22.03	21.71
	8 (RB_Pos:7)	22.70	22.95	22.80	21.75	21.98	21.80
	15 (RB_Pos:0)	22.69	22.93	22.85	21.72	21.91	21.82
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	23017	23095	23173	23017	23095	23173
1.4MHz	1 (RB_Pos:0)	23.75	23.73	23.71	22.84	23.22	22.78
	1 (RB_Pos: 2)	23.83	23.83	23.71	22.87	23.25	22.74
	1 (RB_Pos:5)	23.78	23.79	23.69	22.91	23.19	22.76
	3 (RB_Pos:0)	23.80	23.69	23.78	22.82	23.03	22.94
	3 (RB_Pos:1)	23.82	23.82	23.81	22.86	22.98	22.88
	3 (RB_Pos:2)	23.81	23.76	23.74	22.83	22.96	22.80
	6 (RB_Pos:0)	22.71	22.80	22.68	22.10	21.75	21.81

FDD LTE Band 13							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	--	23230	--	--	23230	--
10MHz	1 (RB_Pos:0)	--	**24.02**	--	--	23.84	--
	1 (RB_Pos:24)	--	23.77	--	--	23.20	--
	1 (RB_Pos:49)	--	23.93	--	--	23.55	--
	25 (RB_Pos:0)	--	**22.89**	--	--	21.93	--
	25 (RB_Pos:12)	--	22.89	--	--	21.94	--
	25 (RB_Pos:24)	--	22.84	--	--	21.89	--
	50 (RB_Pos:0)	--	**22.88**	--	--	21.83	--
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	23205	23230	23255	23205	23230	23255
5MHz	1 (RB_Pos:0)	23.82	23.80	23.88	22.89	22.92	23.41

	1 (RB_Pos:12)	23.80	23.83	23.83	22.87	22.99	23.29
	1 (RB_Pos:24)	23.80	23.75	23.77	22.89	22.94	23.24
	12 (RB_Pos:0)	22.79	22.79	22.78	21.86	21.94	21.95
	12 (RB_Pos:6)	22.76	22.80	22.74	21.81	21.95	21.96
	12 (RB_Pos:11)	22.82	22.77	22.75	21.88	21.86	21.91
	25 (RB_Pos:0)	22.82	22.85	22.83	21.80	21.90	21.90

FDD LTE Band 14							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	--	23330	--	--	23330	--
10MHz	1 (RB_Pos:0)	--	**23.48**	--	--	22.38	--
	1 (RB_Pos:24)	--	23.07	--	--	22.04	--
	1 (RB_Pos:49)	--	23.17	--	--	22.09	--
	25 (RB_Pos:0)	--	**22.15**	--	--	21.19	--
	25 (RB_Pos:12)	--	22.08	--	--	21.14	--
	25 (RB_Pos:24)	--	22.11	--	--	21.21	--
	50 (RB_Pos:0)	--	**22.14**	--	--	21.17	--
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	23305	23330	23355	23305	23330	23355
5MHz	1 (RB_Pos:0)	23.13	23.18	23.14	22.37	22.31	22.61
	1 (RB_Pos:12)	23.15	23.10	23.11	22.38	22.29	22.64
	1 (RB_Pos:24)	23.07	23.11	23.12	22.31	22.33	22.62
	12 (RB_Pos:0)	22.26	22.07	22.12	21.35	21.17	21.29
	12 (RB_Pos:6)	22.18	22.20	22.18	21.24	21.24	21.22
	12 (RB_Pos:11)	22.02	22.24	22.15	21.09	21.20	21.25
	25 (RB_Pos:0)	22.03	22.06	22.19	21.08	21.16	21.24

FDD LTE Band 25							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26140	26365	26590	26140	26365	26590
20MHz	1 (RB_Pos:0)	22.83	23.11	23.04	22.37	22.51	22.47
	1 (RB_Pos:49)	22.79	23.04	**23.15**	22.42	22.41	22.51
	1 (RB_Pos:99)	22.77	22.75	22.83	22.27	22.13	22.22
	50 (RB_Pos:0)	21.85	21.96	22.13	20.88	20.94	21.09
	50 (RB_Pos:24)	21.87	21.99	**22.19**	20.94	20.96	21.24

	50 (RB_Pos:49)	21.77	21.90	22.04	20.86	20.90	21.03
	100 (RB_Pos:0)	21.75	**21.83**	21.64	20.84	21.01	20.71
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26115	26365	26615	26115	26365	26615
15MHz	1 (RB_Pos:0)	22.91	23.15	23.24	21.94	22.56	22.70
	1 (RB_Pos:37)	22.73	22.92	23.07	21.74	22.33	22.45
	1 (RB_Pos:74)	22.95	23.10	22.80	21.95	22.47	22.28
	36 (RB_Pos:0)	21.84	21.95	22.00	20.87	21.01	21.10
	36 (RB_Pos:18)	21.91	21.97	22.03	20.88	21.00	21.16
	36 (RB_Pos:37)	21.80	22.01	22.17	20.94	21.04	21.16
	75 (RB_Pos:0)	21.75	22.06	22.08	20.83	21.03	21.22
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26090	26365	26640	26090	26365	26640
10MHz	1 (RB_Pos:0)	23.16	23.28	23.41	22.14	22.73	22.48
	1 (RB_Pos:24)	23.06	23.12	23.29	22.04	22.55	22.30
	1 (RB_Pos:49)	23.04	23.32	22.48	22.05	22.67	21.59
	25 (RB_Pos:0)	22.04	22.18	22.35	21.13	21.21	21.36
	25 (RB_Pos:12)	22.06	22.16	22.21	21.06	21.24	21.32
	25 (RB_Pos:24)	22.07	22.10	22.23	21.07	21.20	21.43
	50 (RB_Pos:0)	22.13	22.22	22.32	21.10	21.23	21.35
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26065	26365	26665	26065	26365	26665
5MHz	1 (RB_Pos:0)	23.17	23.29	23.44	22.70	22.45	22.54
	1 (RB_Pos:12)	23.08	23.21	23.31	22.62	22.32	22.49
	1 (RB_Pos:24)	23.08	23.15	22.53	22.58	22.32	21.80
	12 (RB_Pos:0)	22.11	22.25	22.47	21.25	21.39	21.44
	12 (RB_Pos:6)	22.06	22.20	22.49	21.19	21.32	21.42
	12 (RB_Pos:11)	22.09	22.18	22.46	21.21	21.24	21.41
	25 (RB_Pos:0)	22.11	22.17	22.30	21.20	21.24	21.41
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26055	26365	26675	26055	26365	26675
3MHz	1 (RB_Pos:0)	23.10	23.22	23.27	22.54	22.25	22.20
	1 (RB_Pos:7)	23.01	23.16	23.21	22.45	22.16	22.21
	1 (RB_Pos:14)	23.07	23.12	22.63	22.40	22.12	21.65
	8 (RB_Pos:0)	22.08	22.13	22.27	21.17	21.21	21.45
	8 (RB_Pos:4)	22.13	22.19	22.32	21.18	21.21	21.50

	8 (RB_Pos:7)	22.08	22.12	22.29	21.12	21.12	21.45
	15 (RB_Pos:0)	22.07	22.20	22.29	21.13	21.09	21.33
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26047	26365	26683	26047	26365	26683
1.4MHz	1 (RB_Pos:0)	23.00	23.10	23.10	22.03	22.19	22.51
	1 (RB_Pos: 2)	23.07	23.10	22.88	22.08	22.22	22.30
	1 (RB_Pos:5)	22.98	23.08	22.70	22.05	22.21	22.13
	3 (RB_Pos:0)	22.96	23.15	22.95	22.19	22.17	22.24
	3 (RB_Pos:1)	23.03	23.19	22.83	22.21	22.17	22.10
	3 (RB_Pos:2)	22.98	23.12	22.72	22.19	22.17	21.98
	6 (RB_Pos:0)	22.02	22.11	22.29	21.20	21.28	21.29

FDD LTE Band 26 Part22							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26865	26915	26965	26865	26915	26965
15MHz	1 (RB_Pos:0)	23.46	23.41	**23.69**	23.44	22.33	22.80
	1 (RB_Pos:37)	23.14	23.06	23.29	23.16	22.06	22.49
	1 (RB_Pos:74)	23.60	23.51	23.60	23.46	22.54	22.81
	36 (RB_Pos:0)	22.45	22.45	**22.50**	22.50	21.45	21.47
	36 (RB_Pos:18)	22.18	22.21	22.38	22.26	21.26	21.24
	36 (RB_Pos:37)	22.15	22.10	22.27	22.08	21.07	21.13
	75 (RB_Pos:0)	22.30	22.28	**22.50**	22.31	21.34	21.36
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26840	26915	26990	26840	26915	26990
10MHz	1 (RB_Pos:0)	23.39	23.37	23.45	22.45	22.77	22.40
	1 (RB_Pos:24)	23.08	23.07	23.16	22.10	22.49	22.24
	1 (RB_Pos:49)	23.38	23.48	23.27	22.25	22.84	22.32
	25 (RB_Pos:0)	22.25	22.25	22.26	21.27	21.32	21.34
	25 (RB_Pos:12)	22.25	22.18	22.27	21.26	21.22	21.36
	25 (RB_Pos:24)	22.27	22.30	22.23	21.27	21.31	21.28
	50 (RB_Pos:0)	22.31	22.26	22.35	21.26	21.27	21.32
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26815	26915	27015	26815	26915	27015
5MHz	1 (RB_Pos:0)	23.19	23.22	23.34	22.32	22.73	22.30
	1 (RB_Pos:12)	23.17	23.11	23.22	22.35	22.63	22.23

	1 (RB_Pos:24)	23.12	23.17	23.13	22.37	22.64	22.16
	12 (RB_Pos:0)	22.21	22.21	22.25	21.31	21.38	21.28
	12 (RB_Pos:6)	22.20	22.19	22.20	21.31	21.28	21.17
	12 (RB_Pos:11)	22.18	22.21	22.17	21.28	21.34	21.07
	25 (RB_Pos:0)	22.21	22.15	22.21	21.23	21.23	21.09
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26805	26915	27025	26805	26915	27025
3MHz	1 (RB_Pos:0)	23.17	23.11	23.11	22.03	22.56	22.15
	1 (RB_Pos:7)	23.22	23.07	23.04	22.10	22.54	22.16
	1 (RB_Pos:14)	23.15	23.17	22.97	22.03	22.55	22.01
	8 (RB_Pos:0)	22.20	22.20	22.13	21.28	21.20	21.19
	8 (RB_Pos:4)	22.22	22.19	22.13	21.27	21.21	21.18
	8 (RB_Pos:7)	22.17	22.14	22.04	21.26	21.22	21.11
	15 (RB_Pos:0)	22.22	22.18	22.12	21.20	21.21	21.07
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26797	26915	27033	26797	26915	27033
1.4MHz	1 (RB_Pos:0)	23.13	23.03	23.01	22.13	22.14	22.38
	1 (RB_Pos: 2)	23.14	23.05	22.98	22.19	22.21	22.44
	1 (RB_Pos:5)	23.07	23.01	22.94	22.22	22.18	22.36
	3 (RB_Pos:0)	23.10	23.02	22.99	22.25	22.16	22.22
	3 (RB_Pos:1)	23.20	23.12	23.03	22.32	22.18	22.23
	3 (RB_Pos:2)	23.16	23.01	22.95	22.26	22.15	22.15
	6 (RB_Pos:0)	22.15	22.11	22.06	21.33	21.28	20.95

FDD LTE Band 26 Part90							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	--	26740	--	--	26740	--
10MHz	1 (RB_Pos:0)	--	**23.29**	--	--	22.30	--
	1 (RB_Pos:24)	--	23.04	--	--	22.09	--
	1 (RB_Pos:49)	--	23.28	--	--	22.37	--
	25 (RB_Pos:0)	--	22.16	--	--	21.17	--
	25 (RB_Pos:12)	--	**22.18**	--	--	21.21	--
	25 (RB_Pos:24)	--	22.16	--	--	21.22	--
	50 (RB_Pos:0)	--	**22.22**	--	--	21.18	--
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		

	Channel	26715	26740	26765	26715	26740	26765
5MHz	1 (RB_Pos:0)	23.16	23.14	23.10	22.22	22.62	22.26
	1 (RB_Pos:12)	23.13	23.08	23.07	22.28	22.61	22.22
	1 (RB_Pos:24)	23.14	23.11	23.06	22.24	22.59	22.24
	12 (RB_Pos:0)	22.12	22.16	22.09	21.26	21.30	21.21
	12 (RB_Pos:6)	22.09	22.16	22.10	21.26	21.25	21.15
	12 (RB_Pos:11)	22.14	22.12	22.14	21.24	21.26	21.14
	25 (RB_Pos:0)	22.10	22.18	22.11	21.18	21.22	21.10
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26705	26740	26775	26705	26740	26775
3MHz	1 (RB_Pos:0)	23.07	23.05	23.07	21.97	22.48	22.23
	1 (RB_Pos:7)	23.07	23.03	23.09	21.96	22.49	22.21
	1 (RB_Pos:14)	22.99	23.03	23.01	21.90	22.42	22.16
	8 (RB_Pos:0)	22.12	22.14	22.08	21.21	21.16	21.23
	8 (RB_Pos:4)	22.17	22.16	22.15	21.20	21.21	21.31
	8 (RB_Pos:7)	22.11	22.09	22.06	21.20	21.16	21.23
	15 (RB_Pos:0)	22.11	22.13	22.11	21.14	21.16	21.10
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	26697	26740	26783	26697	26740	26783
1.4MHz	1 (RB_Pos:0)	22.98	23.04	23.00	22.07	22.46	22.09
	1 (RB_Pos: 2)	23.00	23.11	23.26	22.12	22.45	22.16
	1 (RB_Pos:5)	23.03	23.05	23.13	22.04	22.42	22.13
	3 (RB_Pos:0)	23.01	22.96	23.11	22.03	22.23	22.31
	3 (RB_Pos:1)	23.04	23.08	23.17	22.13	22.26	22.37
	3 (RB_Pos:2)	23.04	23.03	23.08	22.04	22.22	22.31
	6 (RB_Pos:0)	22.98	22.08	22.08	21.21	21.00	21.30

FDD LTE Band 38							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	37850	38000	38150	37850	38000	38150
20MHz	1 (RB_Pos:0)	22.96	23.01	23.14	22.28	22.27	22.46
	1 (RB_Pos:49)	23.11	23.10	**23.30**	22.37	22.25	22.54
	1 (RB_Pos:99)	23.09	23.19	23.28	22.45	22.47	22.64
	50 (RB_Pos:0)	22.03	22.00	21.97	21.04	21.02	21.02
	50 (RB_Pos:24)	22.05	22.06	22.09	21.09	21.10	21.12
	50 (RB_Pos:49)	22.12	22.10	**22.15**	21.10	21.16	21.15

	100 (RB_Pos:0)	22.07	22.04	**22.08**	21.06	21.05	21.10
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	37825	38000	38175	37825	38000	38175
15MHz	1 (RB_Pos:0)	23.02	23.04	23.05	22.24	22.48	22.36
	1 (RB_Pos:37)	23.07	23.15	23.07	22.30	22.64	22.47
	1 (RB_Pos:74)	23.16	23.27	23.13	22.38	22.71	22.50
	36 (RB_Pos:0)	22.03	22.05	21.98	21.10	21.04	21.02
	36 (RB_Pos:18)	22.07	22.12	22.08	21.09	21.10	21.13
	36 (RB_Pos:37)	22.11	22.09	22.07	21.08	21.10	21.12
	75 (RB_Pos:0)	22.06	22.02	22.07	21.06	21.06	21.11
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	37800	38000	38200	37800	38000	38200
10MHz	1 (RB_Pos:0)	23.37	23.31	23.49	22.61	22.75	22.75
	1 (RB_Pos:24)	23.24	23.28	23.31	22.56	22.78	22.69
	1 (RB_Pos:49)	23.42	23.47	23.48	22.77	23.00	22.93
	25 (RB_Pos:0)	22.22	22.15	22.20	21.20	21.17	21.24
	25 (RB_Pos:12)	22.22	22.26	22.31	21.25	21.28	21.35
	25 (RB_Pos:24)	22.23	22.28	22.31	21.23	21.29	21.32
	50 (RB_Pos:0)	22.24	22.29	22.26	21.25	21.30	21.33
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	37775	38000	38225	37775	38000	38225
5MHz	1 (RB_Pos:0)	23.36	23.27	23.36	22.57	22.69	22.66
	1 (RB_Pos:12)	23.32	23.19	23.27	22.55	22.62	22.57
	1 (RB_Pos:24)	23.33	23.26	23.28	22.56	22.64	22.49
	12 (RB_Pos:0)	22.26	22.30	22.21	21.26	21.40	21.28
	12 (RB_Pos:6)	22.20	22.26	22.29	21.23	21.37	21.35
	12 (RB_Pos:11)	22.22	22.12	22.30	21.21	21.28	21.30
	25 (RB_Pos:0)	22.24	22.22	22.31	21.26	21.32	21.29

FDD LTE Band 41							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	39750	40620	41490	39750	40620	41490
20MHz	1 (RB_Pos:0)	24.10	23.93	24.15	24.35	24.25	24.49
	1 (RB_Pos:49)	24.30	24.09	**24.42**	24.58	24.39	24.74
	1 (RB_Pos:99)	23.67	23.39	23.86	24.04	23.73	24.23

	50 (RB_Pos:0)	24.24	24.11	24.38	24.16	24.06	24.40
	50 (RB_Pos:24)	24.29	24.09	**24.44**	24.27	24.11	24.45
	50 (RB_Pos:49)	24.18	23.93	24.40	24.18	23.88	24.38
	100 (RB_Pos:0)	24.19	24.02	**24.34**	24.24	24.06	24.40
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	39725	40620	41515	39725	40620	41515
15MHz	1 (RB_Pos:0)	23.73	23.62	23.93	24.02	23.92	24.26
	1 (RB_Pos:37)	24.12	23.92	24.30	24.46	24.24	24.63
	1 (RB_Pos:74)	23.56	23.27	23.74	23.90	23.62	24.07
	36 (RB_Pos:0)	24.23	24.00	24.40	24.25	24.06	24.45
	36 (RB_Pos:18)	24.36	24.14	24.56	24.40	24.16	24.59
	36 (RB_Pos:37)	24.39	24.08	24.50	24.41	24.13	24.55
	75 (RB_Pos:0)	24.33	24.12	24.48	24.39	24.17	24.58
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	39700	40620	41540	39700	40620	41540
10MHz	1 (RB_Pos:0)	23.69	23.59	24.03	23.99	23.85	24.31
	1 (RB_Pos:24)	23.75	23.57	24.06	24.08	23.88	24.37
	1 (RB_Pos:49)	23.65	23.46	24.07	24.04	23.80	24.36
	25 (RB_Pos:0)	23.79	23.59	24.17	23.80	23.62	24.24
	25 (RB_Pos:12)	23.87	23.69	24.14	23.88	23.73	24.24
	25 (RB_Pos:24)	23.81	23.68	24.16	23.82	23.69	24.20
	50 (RB_Pos:0)	23.74	23.63	24.10	23.77	23.69	24.21
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	39675	40620	41565	39675	40620	41565
5MHz	1 (RB_Pos:0)	23.90	23.60	21.45	24.23	23.88	24.36
	1 (RB_Pos:12)	23.80	23.60	21.36	24.15	23.83	24.41
	1 (RB_Pos:24)	23.76	23.57	21.37	24.12	23.80	24.33
	12 (RB_Pos:0)	23.96	23.65	23.63	24.00	23.74	24.19
	12 (RB_Pos:6)	23.90	23.63	23.54	24.03	23.70	24.23
	12 (RB_Pos:11)	23.90	23.63	24.18	23.96	23.65	24.18
	25 (RB_Pos:0)	23.90	23.60	24.11	23.98	23.68	24.22

FDD LTE Band 66							
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	132072	132322	132572	132072	132322	132572

20MHz	1 (RB_Pos:0)	**23.23**	23.09	22.91	22.67	22.49	22.25
	1 (RB_Pos:49)	21.45	21.14	21.13	20.78	20.57	20.52
	1 (RB_Pos:99)	22.93	22.67	22.65	22.34	22.04	22.09
	50 (RB_Pos:0)	**20.97**	20.75	20.77	19.84	19.72	19.74
	50 (RB_Pos:24)	20.54	20.29	20.36	19.53	19.29	19.37
	50 (RB_Pos:49)	20.92	20.63	20.66	19.98	19.71	19.66
	100 (RB_Pos:0)	**20.99**	20.69	20.85	19.91	19.69	19.74
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	132047	132322	132597	132047	132322	132597
15MHz	1 (RB_Pos:0)	22.44	22.26	22.19	21.41	21.63	21.56
	1 (RB_Pos:37)	21.35	21.07	21.11	20.33	20.45	20.50
	1 (RB_Pos:74)	22.25	21.97	21.96	21.20	21.37	21.44
	36 (RB_Pos:0)	20.85	20.55	20.44	19.84	19.56	19.53
	36 (RB_Pos:18)	20.52	20.23	20.20	19.55	19.26	19.20
	36 (RB_Pos:37)	20.67	20.48	20.44	19.78	19.45	19.38
	75 (RB_Pos:0)	20.72	20.42	20.42	19.71	19.51	19.48
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	132022	132322	132622	132022	132322	132622
10MHz	1 (RB_Pos:0)	23.08	23.11	22.99	22.03	22.45	22.04
	1 (RB_Pos:24)	22.67	22.70	22.57	21.64	22.04	21.63
	1 (RB_Pos:49)	22.88	23.00	22.95	21.75	22.31	21.95
	25 (RB_Pos:0)	21.76	21.84	21.74	20.82	20.86	20.72
	25 (RB_Pos:12)	21.73	21.68	21.57	20.79	20.76	20.70
	25 (RB_Pos:24)	21.76	21.82	21.72	20.79	20.84	20.80
	50 (RB_Pos:0)	21.86	21.77	21.70	20.85	20.83	20.70
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	131997	132322	132647	131997	132322	132647
5MHz	1 (RB_Pos:0)	22.85	22.85	22.65	21.98	22.37	21.86
	1 (RB_Pos:12)	22.70	22.67	22.63	21.80	22.20	21.75
	1 (RB_Pos:24)	22.64	22.76	22.62	21.81	22.20	21.78
	12 (RB_Pos:0)	21.79	21.68	21.76	20.90	20.87	20.80
	12 (RB_Pos:6)	21.70	21.69	21.61	20.81	20.84	20.72
	12 (RB_Pos:11)	21.65	21.62	21.61	20.75	20.80	20.64
	25 (RB_Pos:0)	21.67	21.70	21.63	20.70	20.75	20.66
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	131987	132322	132657	131987	132322	132657

3MHz	1 (RB_Pos:0)	22.64	22.70	22.61	21.64	22.01	21.70
	1 (RB_Pos:7)	22.70	22.67	22.64	21.67	22.04	21.63
	1 (RB_Pos:14)	22.59	22.59	22.53	21.56	21.97	21.59
	8 (RB_Pos:0)	21.77	21.65	21.56	20.85	20.76	20.68
	8 (RB_Pos:4)	21.80	21.71	21.63	20.85	20.74	20.64
	8 (RB_Pos:7)	21.76	21.63	21.59	20.81	20.66	20.63
	15 (RB_Pos:0)	21.77	21.67	21.60	20.78	20.68	20.56
Bandwidth (MHz)	**RB Set**	**Power (dBm)**					
		QPSK			**16QAM**		
	Channel	131979	132322	132665	131979	132322	132665
1.4MHz	1 (RB_Pos:0)	22.69	22.59	22.55	21.79	21.99	21.63
	1 (RB_Pos: 2)	22.69	22.66	22.61	21.80	22.01	21.68
	1 (RB_Pos:5)	22.67	22.64	22.57	21.79	21.97	21.67
	3 (RB_Pos:0)	22.63	22.65	22.63	21.76	21.82	21.74
	3 (RB_Pos:1)	22.70	22.65	22.60	21.71	21.86	21.81
	3 (RB_Pos:2)	22.63	22.60	22.57	21.69	21.81	21.71
	6 (RB_Pos:0)	21.66	21.64	21.52	20.81	20.55	20.78

Conducted power measurement results for WLAN (2.4 GHz)

Mode	**Worst case Data rate**	**Conducted Power (dBm)**		
		Channel		
		1	**6**	**11**
802.11b	**11 Mbps**	**12.41**	11.20	12.02
802.11g	**54 Mbps**	12.27	10.97	11.87
802.11n(HT20)	**MCS3**	11.34	9.34	10.22

Mode	**Worst case Data rate**	**Conducted Power (dBm)**		
		Channel		
		3	**6**	**9**
802.11n(HT40)	**MCS3**	11.38	11.90	9.87

Conducted power measurement results for WLAN (5.2 GHz)

Mode	**Worst case Data rate**	**Conducted Power (dBm)**		
		Channel		
		36	**44**	**48**
802.11a	**24 Mbps**	10.92	10.83	10.77
802.11n(HT20)	**MCS3**	10.18	10.01	10.09
802.11ac(VHT20)	**MCS3**	11.59	**11.85**	11.77

Mode	**Worst case Data rate**	**Conducted Power (dBm)**

		Channel	
		38	46
802.11n(HT40)	MCS0	9.46	9.29
802.11ac(VHT40)	MCS0	11.02	10.65

Mode	Worst case Data rate	Conducted Power (dBm)
		Channel
		42
802.11ac(VHT80)	MCS0	10.06

Conducted power measurement results for WLAN (5.8 GHz)

Mode	Worst case Data rate	Conducted Power (dBm)		
		Channel		
		149	157	165
802.11a	24 Mbps	10.63	10.66	10.64
802.11n(HT20)	MCS3	10.25	10.34	10.27
802.11ac(VHT20)	MCS3	11.37	11.47	**11.77**

Mode	Worst case Data rate	Conducted Power (dBm)	
		Channel	
		151	159
802.11n(HT40)	MCS0	9.58	9.63
802.11ac(VHT40)	MCS0	11.05	11.34

Mode	Data Rate (Mbps)	Conducted Power (dBm)
		Channel
		155
802.11ac(VHT80)	MCS0	10.16

Conducted power measurement results for Bluetooth

Mode	Modulation	Channel	Frequency (MHz)	Conducted Power (dBm)
BR/EDR	GFSK	0	2402	9.19
		39	2441	9.97
		78	2480	9.90
	Pi/4DOPSK	0	2402	9.04
		39	2441	9.80
		78	2480	9.84
	8DPSK	0	2402	9.32

		39	**2441**	**10.11**
		78	**2480**	10.09
BLE	**GFSK**	**0**	**2402**	-0.17
		19	**2440**	**0.96**
		39	**2480**	0.73

Note(s):

1. Per KDB 447498 D01v06, the 1-g and 10-g SAR test exclusion thresholds for 100 MHz to 6 GHz at test separation distances ≤ 50 mm are determined by:

   [(max. power of channel, including tune-up tolerance, mW)/(min. test separation distance, mm)] ·[$\sqrt{f_{(GHz)}}$] ≤ 3.0 for 1-g SAR and ≤ 7.5 for 10-g extremity SAR

   $f_{(GHz)}$ 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

Bluetooth Turn-up Power (dBm)	Separation Distance (mm)	Frequency (GHz)	Value	Exclusion Thresholds
10.5	5	2.45	3.29	3.0

Per KDB 447498 D01v06, when the minimum test separation distance is < 5 mm, a distance of 5 mm is applied to determine SAR test exclusion. The test exclusion threshold is 3.29 which is> 3.0, SAR testing is required.

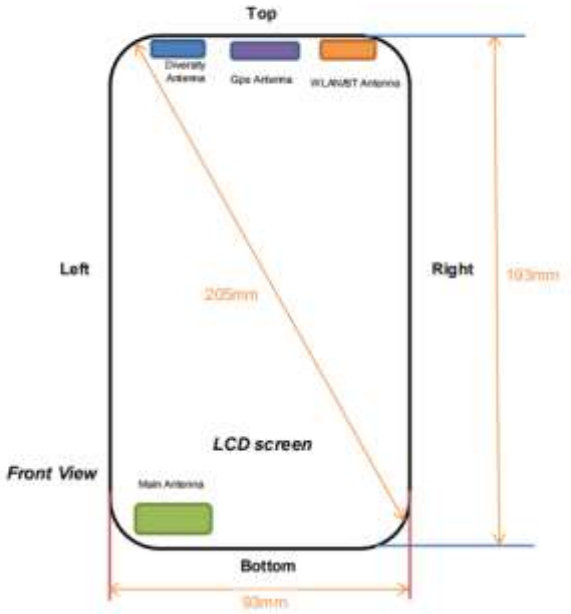
For IC: RSS-102 section 2.5.1 Exemption Limits for Routine Evaluation, Table 1 shows the SAR evaluation for a device with a separation distance of 5 mm at 2450 MHz is 4 mW, which is 6 dBm < 10.10 dBm, so SAR testing is required for IC.

Table 1: SAR evaluation — Exemption limits for routine evaluation based on frequency and separation distance [4, 5]

Frequency (MHz)	Exemption Limits (mW)				
	At separation distance of ≤5 mm	At separation distance of 10 mm	At separation distance of 15 mm	At separation distance of 20 mm	At separation distance of 25 mm
≤300	71 mW	101 mW	132 mW	162 mW	193 mW
450	52 mW	70 mW	88 mW	106 mW	123 mW
835	17 mW	30 mW	42 mW	55 mW	67 mW
1900	7 mW	10 mW	18 mW	34 mW	60 mW
2450	4 mW	7 mW	15 mW	30 mW	52 mW
3500	2 mW	6 mW	16 mW	32 mW	55 mW
5800	1 mW	6 mW	15 mW	27 mW	41 mW

Frequency (MHz)	Exemption Limits (mW)				
	At separation distance of 30 mm	At separation distance of 35 mm	At separation distance of 40 mm	At separation distance of 45 mm	At separation distance of ≥50 mm
≤300	223 mW	254 mW	284 mW	315 mW	345 mW
450	141 mW	159 mW	177 mW	195 mW	213 mW
835	80 mW	92 mW	105 mW	117 mW	130 mW
1900	99 mW	153 mW	225 mW	316 mW	431 mW
2450	83 mW	123 mW	173 mW	235 mW	309 mW
3500	86 mW	124 mW	170 mW	225 mW	290 mW
5800	56 mW	71 mW	85 mW	97 mW	106 mW

6.2 Transmit Antennas Conditions



Antenna information:

Main Antenna	GSM/WCDMA/LTE TX/RX
LTE Diversity Antenna	Only RX
WLAN/BT Antenna	WLAN/BT TX/RX
WLAN Diversity Antenna	Only RX

Distance of the Antenna to the EUT surface and edge (mm)						
Antenna	**Front**	**Back**	**Top**	**Bottom**	**Left**	**Right**
Main Antenna	3	3.9	158.8	5	3.5	88.4
WLAN/BT Antenna	5.5	4.2	6	158.5	87	3.5

Note(s):

1. Per KDB648474 D04, because the overall diagonal distance of this devices is 100mm<160mm, it is considered as “Mini Table“ device.
2. Per KDB648474 D04, 10-g extremity SAR is not required when Body-Worn mode 1-g reported SAR < 1.2 W/Kg.
3. According to the KDB941225 D06 Hot Spot SAR v02, the edges with less than 2.5 cm distance to the antennas need to be tested for SAR.

4. Referring to KDB 941225 D06 v02, When the overall device length and width are ≥9cm*5cm, the test distance is 10mm, SAR must be measured for all sides and surfaces with a transmitting antenna located with 25mm from that surface or edge.

6.3 SAR Test Exclusion Consideration Table

For FCC

According with FCC KDB 447498 D01, Appendix A, <SAR Test Exclusion Thresholds for 100 MHz – 6 GHz and ≤ 50 mm> Table, this Device SAR test configurations consider as below.

For IC

According with section 2.5.1 of RSS-102 Issue 5, SAR evaluation is required if the separation distance between the user and/or bystander and the antenna and/or radiating element of the device is less than or equal to 20 cm, except when the device operates at or below the applicable output power level (adjusted for tune-up tolerance) for the specified separation distance defined in Table.

Exemption Limits (mW)					
Frequency (MHz)	At separation distance of ≤5 mm	At separation distance of 10 mm	At separation distance of 15 mm	At separation distance of 20 mm	At separation distance of 25 mm
≤300	71 mW	101 mW	132 mW	162 mW	193 mW
450	52 mW	70 mW	88 mW	106 mW	123 mW
835	17 mW	30 mW	42 mW	55 mW	67 mW
1900	7 mW	10 mW	18 mW	34 mW	60 mW
2450	4 mW	7 mW	15 mW	30 mW	52 mW
3500	2 mW	6 mW	16 mW	32 mW	55 mW
5800	1 mW	6 mW	15 mW	27 mW	41 mW
Frequency (MHz)	At separation distance of 30 mm	At separation duistance of 35 mm	At separation distance of 40 mm	At separation distance of 45 mm	At separation distance of ≥50 mm
≤300	223 mW	254 mW	284 mW	315 mW	345 mW
450	141 mW	159 mW	177 mW	195 mW	213 mW
835	80 mW	92 mW	105 mW	117 mW	130 mW
1900	99 mW	153 mW	225 mW	315 mW	431 mW
2450	83 mW	123 mW	173 mW	235 mW	309 mW
3500	86 mW	124 mW	170 mW	225 mW	290 mW
5800	56 mW	71 mW	85 mW	97 mW	106 mW

SAR Test Exclusion Consideration Table:

Band	Mode	Max. Tune-up Power		Test Position Configurations					
		dBm	mW	Head	Front/ Back	Left Edge	Right Edge	Top Edge	Bottom Edge
GSM 850	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	Voice	34.20	2630.27	Yes	Yes	Yes	No	No	Yes
	Data	31.00	1258.93	N/A	Yes	Yes	No	No	Yes
GSM 1900	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	Voice	30.50	1122.02	Yes	Yes	Yes	No	No	Yes
	Data	25.50	354.81	N/A	Yes	Yes	No	No	Yes
WCDMA Band 2	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	RMC	23.60	229.09	Yes	Yes	Yes	No	No	Yes
WCDMA Band 4	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	RMC	23.50	223.87	Yes	Yes	Yes	No	No	Yes
WCDMA Band 5	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	RMC	24.50	281.84	Yes	Yes	Yes	No	No	Yes
LTE Band 2	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	23.80	239.88	Yes	Yes	Yes	No	No	Yes
LTE Band 4	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	23.50	223.87	Yes	Yes	Yes	No	No	Yes
LTE Band 5	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	24.50	281.84	Yes	Yes	Yes	No	No	Yes
LTE Band 7	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	23.00	199.53	Yes	Yes	Yes	No	No	Yes
LTE Band 12	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	25.00	316.23	Yes	Yes	Yes	No	No	Yes
LTE Band 13	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	24.50	281.84	Yes	Yes	Yes	No	No	Yes
LTE Band 14	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	24.00	251.19	Yes	Yes	Yes	No	No	Yes
LTE Band 25	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	23.50	223.87	Yes	Yes	Yes	No	No	Yes
LTE Band 26	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	24.00	251.19	Yes	Yes	Yes	No	No	Yes
LTE Band 41	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	25.00	316.23	Yes	Yes	Yes	No	No	Yes
LTE Band 66	Distance to User			<5mm	5mm	3.5mm	88.4mm	158.8mm	5mm
	QPSK	23.50	223.87	Yes	Yes	Yes	No	No	Yes

WLAN 2.4 G	Distance to User			<5mm	5.5mm	87mm	3.5mm	6mm	158.5mm
	802.11b	12.80	19.05	Yes	Yes	No	Yes	Yes	No
	802.11g	12.50	17.78	Yes	Yes	No	Yes	Yes	No
	802.11n (HT20)	12.00	15.85	Yes	Yes	No	Yes	Yes	No
	802.11n (HT40)	12.20	16.60	Yes	Yes	No	Yes	Yes	No
WLAN 5.2 G	Distance to User			<5mm	5.5mm	87mm	3.5mm	6mm	158.5mm
	802.11a	11.30	13.49	Yes	Yes	No	Yes	Yes	No
	802.11n (HT20)	10.50	11.22	Yes	Yes	No	Yes	Yes	No
	802.11ac (HT20)	12.00	15.85	Yes	Yes	No	Yes	Yes	No
	802.11n (HT40)	10.00	10.00	Yes	Yes	No	Yes	Yes	No
	802.11ac (HT40)	11.50	14.13	Yes	Yes	No	Yes	Yes	No
	802.11ac (HT80)	10.30	10.72	Yes	Yes	No	Yes	Yes	No
WLAN 5.8 G	Distance to User			<5mm	5.5mm	87mm	3.5mm	6mm	158.5mm
	802.11a	11.00	12.59	Yes	Yes	No	Yes	Yes	No
	802.11n (HT20)	10.50	11.22	Yes	Yes	No	Yes	Yes	No
	802.11ac (HT20)	12.00	15.85	Yes	Yes	No	Yes	Yes	No
	802.11n (HT40)	10.00	10.00	Yes	Yes	No	Yes	Yes	No
	802.11ac (HT40)	11.50	14.13	Yes	Yes	No	Yes	Yes	No
	802.11ac (HT80)	10.50	11.22	Yes	Yes	No	Yes	Yes	No
Bluetooth	Distance to User			<5mm	5.5mm	87mm	3.5mm	6mm	158.5mm
	BR/EDR	10.50	11.22	Yes	Yes	No	Yes	Yes	No
	BLE	1.00	1.26	Yes	Yes	No	Yes	Yes	No

Note:

1. Maximum power is the source-based time-average power and represents the maximum RF output power including tune-up tolerance among production units
2. Per KDB 447498 D01, for larger devices, the test separation distance of adjacent edge configuration is determined by the closest separation between the antenna and the user.
3. Per KDB 447498 D01, standalone SAR test exclusion threshold is applied; If the distance of the antenna to the

user is < 5mm, 5mm is used to determine SAR exclusion threshold

4. Per KDB 447498 D01, the 1-g and 10-g SAR test exclusion thresholds for 100 MHz to 6 GHz at test separation distances ≤ 50 mm are determined by:
   [(max. power of channel, including tune-up tolerance, mW)/(min. test separation distance, mm)] ·[√f(GHz)] ≤ 3.0 for 1-g SAR and ≤ 7.5 for 10-g extremity SAR
   a. f(GHz) is the RF channel transmit frequency in GHz
   b. Power and distance are rounded to the nearest mW and mm before calculation
   c. The result is rounded to one decimal place for comparison
   d. For < 50 mm distance, we just calculate mW of the exclusion threshold value (3.0) to do compare.
   This formula is [3.0] / [√f(GHz)] · [(min. test separation distance, mm)] = exclusion threshold of mW.
5. Per KDB 447498 D01, at 100 MHz to 6 GHz and for test separation distances > 50 mm, the SAR test exclusion threshold is determined according to the following
   a. [Threshold at 50 mm in step 1) + (test separation distance - 50 mm)·(f(MHz)/150)] mW, at 100 MHz to 1500 MHz
   b. [Threshold at 50 mm in step 1) + (test separation distance - 50 mm)·10] mW at > 1500 MHz and ≤ 6 GHz
6. Per KDB 941225 D01, RMC 12.2kbps setting is used to evaluate SAR. If HSDPA /HSUPA /DC-HSDPA output power is < 0.25dB higher than RMC12.2Kbps, or reported SAR with RMC 12.2kbps setting is ≤ 1.2W/kg, HSDPA/HSUPA/DC-HSDPA SAR evaluation can be excluded.
7. Per KDB 248227 D01, choose the highest output power channel to test SAR and determine further SAR exclusion.8. For each frequency band, testing at higher data rates and higher order modulations is not required when the maximum average output power for each of these configurations is less than 1/4dB higher than those measured at the lowest data rate
8. Per KDB 248227 D01 SAR is not required for the following 2.4 GHz OFDM conditions.
   a. When KDB Publication 447498 D01 SAR test exclusion applies to the OFDM configuration.
   b. When the highest reported SAR for DSSS is adjusted by the ratio of OFDM to DSSS specified maximum output power and the adjusted SAR is ≤ 1.2 W/kg.
9. Per KDB 248227 D01 SAR is not required for the following U-NII-1 and U-NII-2A bands conditions.
   a. When the same maximum output power is specified for both bands, begin SAR measurement in U-NII-2A band by applying the OFDM SAR requirements. If the highest reported SAR for a test configuration is ≤ 1.2 W/kg, SAR is not required for U-NII-1 band for that configuration (802.11 mode and exposure condition); otherwise, each band is tested independently for SAR.
   b. When different maximum output power is specified for the bands, begin SAR measurement in the band with higher specified maximum output power. The highest reported SAR for the tested configuration is adjusted by the ratio of lower to higher specified maximum output power for the two bands. When the adjusted SAR is ≤ 1.2 W/kg, SAR is not required for the band with lower maximum output power in that test configuration; otherwise, each band is tested independently for SAR.

6.4 SAR Measurement Results

GSM 850

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head												
Voice	Without scanner	Left Cheek	0	190	836.6	0.05	0.272	33.80	34.20	1.10	0.298	1#
		Left Tilt	0	190	836.6	-0.05	0.158	33.80	34.20	1.10	0.173	
		Right Cheek	0	190	836.6	-0.02	0.221	33.80	34.20	1.10	0.242	
		Right Tilt	0	190	836.6	-0.04	0.142	33.80	34.20	1.10	0.156	
Body-worn Accessory												
Voice	With scanner	Front Side	10	128	824.2	-0.16	0.686	33.72	34.20	1.12	0.766	
			10	190	836.6	-0.12	0.712	33.80	34.20	1.10	0.781	2#
			10	251	848.8	-0.18	0.596	33.71	34.20	1.12	0.667	
		Back Side	10	190	836.6	-0.01	0.202	33.80	34.20	1.10	0.221	
	Without scanner	Back Side	10	190	836.6	-0.06	0.577	33.80	34.20	1.10	0.633	3#
Hotspot												
GPRS 1 TX	With scanner	Front Side	10	190	836.6	0.01	0.315	30.34	31.00	1.16	0.367	4#
		Back Side	10	190	836.6	0.12	0.066	30.34	31.00	1.16	0.077	
		Left Edge	10	190	836.6	0.04	0.085	30.34	31.00	1.16	0.099	
		Bottom Edge	10	190	836.6	-0.10	0.163	30.34	31.00	1.16	0.190	
	Without scanner	Back Side	10	190	836.6	0.02	0.228	30.34	31.00	1.16	0.265	5#

GSM 1900

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head												
Voice	Without scanner	Left Cheek	0	512	1850.2	-0.010	0.108	30.16	30.50	1.08	0.117	6#
		Left Tilt	0	512	1850.2	-0.140	0.031	30.16	30.50	1.08	0.034	
		Right Cheek	0	512	1850.2	0.110	0.061	30.16	30.50	1.08	0.066	
		Right Tilt	0	512	1850.2	-0.190	0.032	30.16	30.50	1.08	0.035	
Body-worn Accessory												
Voice	With scanner	Front Side	10	512	1850.2	0.040	0.406	30.16	30.50	1.08	0.439	7#
		Back Side	10	512	1850.2	-0.100	0.061	30.16	30.50	1.08	0.066	

	Without scanner	Back Side	10	512	1850.2	-0.100	0.285	30.16	30.50	1.08	0.308	8#
Hotspot												
GPRS 1 TX	With scanner	Front Side	10	512	1850.2	0.050	0.462	26.74	27.00	1.06	0.491	9#
		Back Side	10	512	1850.2	0.090	0.050	26.74	27.00	1.06	0.053	
		Left Edge	10	512	1850.2	-0.040	0.102	26.74	27.00	1.06	0.108	
		Bottom Edge	10	512	1850.2	-0.060	0.278	26.74	27.00	1.06	0.295	
	Without scanner	Back Side	10	512	1850.2	-0.030	0.260	26.74	27.00	1.06	0.276	10#

Note(s):

1. Body-Worn accessory testing is typically associated with voice operations. Therefore, GSM voice was evaluated for Body-Worn SAR.
2. Justification for reduced test configurations per KDB Publication 941225 D01v03r01: The source-based timeaveraged output power was evaluated for all multi-slot operations. The multi-slot configuration with the highest frame averaged output power was evaluated for SAR.

WCDMA Band II

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head												
RMC	Without scanner	Left Cheek	0	9538	1907.6	-0.15	0.196	23.22	23.60	1.09	0.214	11#
		Left Tilt	0	9538	1907.6	-0.08	0.069	23.22	23.60	1.09	0.075	
		Right Cheek	0	9538	1907.6	-0.19	0.122	23.22	23.60	1.09	0.133	
		Right Tilt	0	9538	1907.6	-0.16	0.079	23.22	23.60	1.09	0.086	
Body-worn Accessory & Hotspot												
RMC	With scanner	Front Side	10	9262	1852.4	0.04	0.994	22.88	23.60	1.18	1.173	
			10	9400	1880.0	0.06	1.020	23.06	23.60	1.13	1.155	
			10	9538	1907.6	0.02	1.080	23.22	23.60	1.09	1.179	12#
		Back Side	10	9538	1907.6	-0.18	0.138	23.22	23.60	1.09	0.151	
		Left Edge	10	9538	1907.6	-0.02	0.297	23.22	23.60	1.09	0.324	
		Bottom Edge	10	9538	1907.6	-0.13	0.599	23.22	23.60	1.09	0.654	
	Without scanner	Back Side	10	9538	1907.6	-0.13	0.571	23.22	23.60	1.09	0.623	13#

WCDMA Band IV

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	Power Drift	Meas. SAR 1 g	Meas. Power	Max. tune-up Power	Scaling Factor	Report SAR 1 g	Meas. No.

						(dB)	(W/Kg)	(dBm)	(dBm)		(W/Kg)	
Head												
RMC	Without scanner	Left Cheek	0	1312	1712.4	-0.17	0.123	22.90	23.50	1.15	0.141	14#
		Left Tilt	0	1312	1712.4	-0.05	0.067	22.90	23.50	1.15	0.077	
		Right Cheek	0	1312	1712.4	-0.11	0.076	22.90	23.50	1.15	0.087	
		Right Tilt	0	1312	1712.4	0.01	0.070	22.90	23.50	1.15	0.080	
Body-worn Accessory & Hotspot												
RMC	With scanner	Front Side	10	1312	1712.4	0.02	0.891	22.90	23.50	1.15	1.023	
			10	1413	1732.6	-0.11	0.884	22.86	23.50	1.16	1.024	
			10	1513	1752.6	0.00	0.968	22.79	23.50	1.18	1.140	15#
		Back Side	10	1312	1712.4	-0.07	0.120	22.90	23.50	1.15	0.138	
		Left Edge	10	1312	1712.4	-0.03	0.331	22.90	23.50	1.15	0.380	
		Bottom Edge	10	1312	1712.4	-0.19	0.461	22.90	23.50	1.15	0.529	
	Without scanner	Back Side	10	1312	1712.4	-0.05	0.462	22.90	23.50	1.15	0.530	16#

WCDMA Band V

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head												
RMC	Without scanner	Left Cheek	0	4233	846.6	-0.05	0.339	24.18	24.50	1.08	0.365	17#
		Left Tilt	0	4233	846.6	-0.10	0.200	24.18	24.50	1.08	0.215	
		Right Cheek	0	4233	846.6	-0.11	0.251	24.18	24.50	1.08	0.270	
		Right Tilt	0	4233	846.6	0.05	0.163	24.18	24.50	1.08	0.175	
Body-worn Accessory & Hotspot												
RMC	With scanner	Front Side	10	4132	826.4	-0.10	0.773	23.95	24.30	1.08	0.838	
			10	4183	836.6	-0.06	0.844	24.02	24.30	1.07	0.900	
			10	4233	846.6	-0.12	0.894	24.18	24.50	1.08	0.962	18#
		Back Side	10	4233	846.6	-0.06	0.159	24.18	24.50	1.08	0.171	
		Left Edge	10	4233	846.6	0.03	0.265	24.18	24.50	1.08	0.285	
		Bottom Edge	10	4233	846.6	-0.09	0.406	24.03	24.50	1.11	0.452	
	Without scanner	Back Side	10	4233	846.6	-0.09	0.667	24.03	24.50	1.11	0.743	19#

Note(s):

1. WCDMA mode in Body SAR was tested under RMC 12.2 kbps without HSPA inactive per KDB Publication 941225 D01v03. HSPA SAR was not required since the average output power of the HSPA subtests was not more than 0.25 dB higher than the RMC level and SAR was less than 1.2 W/kg.

LTE Band 2 (20MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	18700	1860	1	High	-0.12	0.223	23.53	23.80	1.06	0.237	20#
				19100	1900	50	Low	0.01	0.184	22.47	23.00	1.13	0.208	
		Left Tilt	0	18700	1860	1	High	-0.08	0.069	23.53	23.80	1.06	0.073	
				19100	1900	50	Low	0.07	0.051	22.47	23.00	1.13	0.058	
		Right Cheek	0	18700	1860	1	High	-0.19	0.131	23.53	23.80	1.06	0.139	
				19100	1900	50	Low	-0.20	0.096	22.47	23.00	1.13	0.108	
		Right Tilt	0	18700	1860	1	High	-0.07	0.096	23.53	23.80	1.06	0.139	
				19100	1900	50	Low	-0.20	0.096	22.47	23.00	1.13	0.108	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	18700	1860	1	High	0.00	1.240	23.53	23.80	1.06	1.320	
				18900	1880	1	High	0.03	1.260	23.39	23.80	1.10	1.385	21#
				19100	1900	1	High	0.01	1.100	23.29	23.80	1.12	1.237	
				18700	1860	50	Low	-0.02	1.000	22.01	23.00	1.26	1.256	
				18900	1880	50	Low	0.04	0.913	22.25	23.00	1.19	1.085	
				19100	1900	50	Low	0.06	0.805	22.47	23.00	1.13	0.909	
				19100	1900	100	Low	0.06	0.938	22.40	23.00	1.15	1.077	
		Back Side	10	18700	1860	1	High	-0.12	0.203	23.53	23.80	1.06	0.216	
				19100	1900	50	Low	-0.15	0.136	22.47	23.00	1.13	0.154	
		Left Edge	10	18700	1860	1	High	-0.14	0.303	23.53	23.80	1.06	0.322	
				19100	1900	50	Low	-0.16	0.191	22.47	23.00	1.13	0.216	
		Bottom Edge	10	18700	1860	1	High	-0.09	0.710	23.53	23.80	1.06	0.756	
				19100	1900	50	Low	-0.14	0.450	22.47	23.00	1.13	0.508	
	Without Scaner	Back Side	10	18700	1860	1	High	-0.10	0.700	23.53	23.80	1.06	0.745	22#
				19100	1900	50	Low	-0.11	0.505	22.47	23.00	1.13	0.571	

LTE Band 4 (20MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	20050	1720	1	Low	-0.11	0.131	22.82	23.50	1.17	0.153	23#
				20050	1720	50	High	-0.19	0.105	21.73	22.00	1.06	0.112	
		Left Tilt	0	20050	1720	1	Low	-0.16	0.062	22.82	23.50	1.17	0.073	
				20050	1720	50	High	-0.06	0.049	21.73	22.00	1.06	0.052	

		Right Cheek	0	20050	1720	1	Low	-0.18	0.086	22.82	23.50	1.17	0.101	
				20050	1720	50	High	-0.16	0.071	21.73	22.00	1.06	0.076	
		Right Tilt	0	20050	1720	1	Low	-0.10	0.050	22.82	23.50	1.17	0.058	
				20050	1720	50	High	-0.13	0.045	21.73	22.00	1.06	0.048	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	20050	1720	1	Low	-0.07	0.866	22.82	23.50	1.17	1.013	
				20175	1732.5	1	Low	0.02	0.884	22.80	23.50	1.17	1.039	24#
				20300	1745	1	Low	-0.01	0.869	22.73	23.50	1.19	1.038	
				20050	1720	50	High	-0.01	0.619	21.73	22.00	1.06	0.659	
				20050	1720	100	Low	-0.02	0.629	21.75	22.00	1.06	0.666	
		Back Side	10	20050	1720	1	Low	-0.15	0.093	22.82	23.50	1.17	0.109	
				20050	1720	50	High	0.11	0.080	21.73	22.00	1.06	0.085	
		Left Edge	10	20050	1720	1	Low	-0.01	0.292	22.82	23.50	1.17	0.341	
				20050	1720	50	High	-0.01	0.246	21.73	22.00	1.06	0.262	
		Bottom Edge	10	20050	1720	1	Low	-0.13	0.442	22.82	23.50	1.17	0.517	
				20050	1720	50	High	-0.11	0.370	21.73	22.00	1.06	0.394	
	Without Scaner	Back Side	10	20050	1720	1	Low	-0.07	**0**.458	22.82	23.50	1.17	0.536	25#
				20050	1720	50	High	-0.09	0.386	21.73	22.00	1.06	0.411	

LTE Band 5 (10MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	20450	829	1	High	0.02	0.274	24.14	24.50	1.09	0.298	26#
				20450	829	25	Mid	-0.14	0.178	23.00	23.50	1.12	0.200	
		Left Tilt	0	20450	829	1	High	-0.02	0.167	24.14	24.50	1.09	0.181	
				20450	829	25	Mid	-0.04	0.110	23.00	23.50	1.12	0.123	
		Right Cheek	0	20450	829	1	High	-0.17	0.264	24.14	24.50	1.09	0.287	
				20450	829	25	Mid	0.00	0.185	23.00	23.50	1.12	0.208	
		Right Tilt	0	20450	829	1	High	0.10	0.141	24.14	24.50	1.09	0.153	
				20450	829	25	Mid	-0.06	0.094	23.00	23.50	1.12	0.105	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	20450	829	1	High	-0.14	0.899	24.14	24.50	1.09	0.977	27#
				20525	836.5	1	High	-0.07	0.832	24.05	24.50	1.11	0.923	
				20600	844	1	High	-0.04	0.836	24.11	24.50	1.09	0.915	
				20450	829	25	Mid	0.04	0.536	23.00	23.50	1.12	0.601	
				20450	829	50	Low	0.00	0.544	23.02	23.50	1.12	0.608	
		Back Side	10	20450	829	1	High	-0.05	0.112	24.14	24.50	1.09	0.122	

				20450	829	25	Mid	-0.09	0.078	23.00	23.50	1.12	0.088	
		Left Edge	10	20450	829	1	High	-0.08	0.260	24.14	24.50	1.09	0.282	
				20450	829	25	Mid	-0.08	0.185	23.00	23.50	1.12	0.208	
		Bottom Edge	10	20450	829	1	High	-0.12	0.365	24.14	24.50	1.09	0.397	
				20450	829	25	Mid	-0.09	0.255	23.00	23.50	1.12	0.286	
	Without Scaner	Back Side	10	20450	829	1	High	-0.03	0.648	24.14	24.50	1.09	0.704	28#
				20450	829	25	Mid	-0.07	0.446	23.00	23.50	1.12	0.500	

LTE Band 7 (20MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	21100	2535	1	Mid	-0.02	0.266	22.75	23.00	1.06	0.282	29#
				20850	2510	50	High	-0.12	0.197	21.93	22.50	1.14	0.225	
		Left Tilt	0	21100	2535	1	Mid	-0.11	0.102	22.75	23.00	1.06	0.108	
				20850	2510	50	High	-0.14	0.073	21.93	22.50	1.14	0.083	
		Right Cheek	0	21100	2535	1	Mid	-0.10	0.194	22.75	23.00	1.06	0.205	
				20850	2510	50	High	-0.15	0.162	21.93	22.50	1.14	0.185	
		Right Tilt	0	21100	2535	1	Mid	-0.15	0.130	22.75	23.00	1.06	0.138	
				20850	2510	50	High	-0.05	0.098	21.93	22.50	1.14	0.112	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	20850	2510	1	Mid	0.11	0.765	22.69	23.00	1.07	0.822	30#
				21100	2535	1	Mid	0.07	0.755	22.75	23.00	1.06	0.800	
				21350	2560	1	Mid	0.00	0.735	22.60	23.00	1.10	0.806	
				20850	2510	50	High	0.01	0.561	21.93	22.50	1.14	0.640	
				20850	2510	100	Low	-0.03	0.681	21.87	22.00	1.03	0.702	
		Back Side	10	21100	2535	1	Mid	-0.13	0.153	22.75	23.00	1.06	0.162	
				20850	2510	50	High	-0.19	0.142	21.93	22.50	1.14	0.162	
		Left Edge	10	21100	2535	1	Mid	0.02	0.145	22.75	23.00	1.06	0.154	
				20850	2510	50	High	0.01	0.123	21.93	22.50	1.14	0.140	
		Bottom Edge	10	21100	2535	1	Mid	-0.06	0.415	22.75	23.00	1.06	0.440	
				20850	2510	50	High	-0.08	0.334	21.93	22.50	1.14	0.381	
	Without Scaner	Back Side	10	21100	2535	1	Mid	-0.15	**0.476**	22.75	23.00	1.06	0.504	31#
				20850	2510	50	High	-0.19	0.392	21.93	22.50	1.14	0.447	

LTE Band 12 (10MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	23060	704	1	Low	0.02	0.187	24.29	25.00	1.18	0.220	32#
				23130	711	25	Low	-0.13	0.141	23.04	23.50	1.11	0.157	
		Left Tilt	0	23060	704	1	Low	0.02	0.084	24.29	25.00	1.18	0.099	
				23130	711	25	Low	-0.17	0.069	23.04	23.50	1.11	0.077	
		Right Cheek	0	23060	704	1	Low	-0.18	0.172	24.29	25.00	1.18	0.203	
				23130	711	25	Low	-0.17	0.139	23.04	23.50	1.11	0.155	
		Right Tilt	0	23060	704	1	Low	-0.13	0.083	24.29	25.00	1.18	0.098	
				23130	711	25	Low	0.00	0.062	23.04	23.50	1.11	0.069	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	23060	704	1	Low	-0.05	0.335	24.29	25.00	1.18	0.394	33#
				23130	711	25	Low	-0.04	0.212	23.04	23.50	1.11	0.236	
		Back Side	10	23060	704	1	Low	-0.11	0.117	24.29	25.00	1.18	0.138	
				23130	711	25	Low	-0.10	0.085	23.04	23.50	1.11	0.094	
		Left Edge	10	23060	704	1	Low	-0.13	0.190	24.29	25.00	1.18	0.224	
				23130	711	25	Low	-0.13	0.147	23.04	23.50	1.11	0.163	
		Bottom Edge	10	23060	704	1	Low	-0.12	0.145	24.29	25.00	1.18	0.171	
				23130	711	25	Low	-0.15	0.118	23.04	23.50	1.11	0.131	
	Without Scaner	Back Side	10	23060	704	1	Low	0.00	**0.218**	24.29	25.00	1.18	0.257	34#
				23130	711	25	Low	0.08	0.177	23.04	23.50	1.11	0.197	

LTE Band 13 (10MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	23230	782	1	Low	0.01	0.241	24.02	24.50	1.12	0.269	35#
				23230	782	25	Low	-0.15	0.178	22.89	23.50	1.15	0.205	
		Left Tilt	0	23230	782	1	Low	-0.04	0.141	24.02	24.50	1.12	0.157	
				23230	782	25	Low	-0.11	0.107	22.89	23.50	1.15	0.123	
		Right Cheek	0	23230	782	1	Low	-0.10	0.208	24.02	24.50	1.12	0.232	
				23230	782	25	Low	-0.17	0.168	22.89	23.50	1.15	0.193	
		Right Tilt	0	23230	782	1	Low	-0.05	0.112	24.02	24.50	1.12	0.125	
				23230	782	25	Low	-0.05	0.089	22.89	23.50	1.15	0.102	

Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	23230	782	1	Low	-0.14	**0.566**	24.02	24.50	1.12	0.632	36#
				23230	782	25	Low	-0.08	0.353	22.89	23.50	1.15	0.406	
		Back Side	10	23230	782	1	Low	-0.08	0.121	24.02	24.50	1.12	0.135	
				23230	782	25	Low	-0.06	0.099	22.89	23.50	1.15	0.114	
		Left Edge	10	23230	782	1	Low	-0.16	0.204	24.02	24.50	1.12	0.228	
				23230	782	25	Low	-0.10	0.160	22.89	23.50	1.15	0.184	
		Bottom Edge	10	23230	782	1	Low	-0.10	0.225	24.02	24.50	1.12	0.251	
				23230	782	25	Low	-0.05	0.176	22.89	23.50	1.15	0.203	
	Without Scaner	Back Side	10	23230	782	1	Low	-0.01	**0.377**	24.02	24.50	1.12	0.421	37#
				23230	782	25	Low	-0.02	0.289	22.89	23.50	1.15	0.333	

LTE Band 14 (10MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	23300	793	1	Low	-0.18	0.235	23.48	24.00	1.13	0.265	38#
				23300	793	25	Low	0.06	0.166	22.15	22.50	1.08	0.180	
		Left Tilt	0	23300	793	1	Low	-0.03	0.128	23.48	24.00	1.13	0.144	
				23300	793	25	Low	0.06	0.098	22.15	22.50	1.08	0.106	
		Right Cheek	0	23300	793	1	Low	-0.15	0.231	23.48	24.00	1.13	0.260	
				23300	793	25	Low	-0.11	0.175	22.15	22.50	1.08	0.190	
		Right Tilt	0	23300	793	1	Low	-0.03	0.126	23.48	24.00	1.13	0.142	
				23300	793	25	Low	-0.01	0.095	22.15	22.50	1.08	0.103	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	23300	793	1	Low	-0.04	0.374	23.48	24.00	1.13	0.422	39#
				23300	793	25	Low	-0.11	0.372	22.15	22.50	1.08	0.403	
		Back Side	10	23300	793	1	Low	0.02	0.125	23.48	24.00	1.13	0.141	
				23300	793	25	Low	-0.14	0.094	22.15	22.50	1.08	0.102	
		Left Edge	10	23300	793	1	Low	-0.17	0.218	23.48	24.00	1.13	0.246	
				23300	793	25	Low	-0.12	0.167	22.15	22.50	1.08	0.181	
		Bottom Edge	10	23300	793	1	Low	-0.11	0.233	23.48	24.00	1.13	0.263	
				23300	793	25	Low	-0.07	0.177	22.15	22.50	1.08	0.192	
	Without Scaner	Back Side	10	23300	793	1	Low	-0.08	0.354	23.48	24.00	1.13	0.399	40#
				23300	793	25	Low	-0.13	0.263	22.15	22.50	1.08	0.285	

LTE Band 25 (20MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	26590	1905	1	Mid	-0.01	0.244	23.15	23.50	1.08	0.264	41#
				26590	1905	50	Mid	-0.17	0.187	22.19	22.50	1.07	0.201	
		Left Tilt	0	26590	1905	1	Mid	0.04	0.064	23.15	23.50	1.08	0.069	
				26590	1905	50	Mid	-0.10	0.056	22.19	22.50	1.07	0.060	
		Right Cheek	0	26590	1905	1	Mid	-0.12	0.123	23.15	23.50	1.08	0.133	
				26590	1905	50	Mid	-0.13	0.094	22.19	22.50	1.07	0.101	
		Right Tilt	0	26590	1905	1	Mid	-0.13	0.062	23.15	23.50	1.08	0.067	
				26590	1905	50	Mid	-0.15	0.061	22.19	22.50	1.07	0.066	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	26140	1860	1	Mid	-0.02	1.050	22.79	23.50	1.18	1.236	
				26365	1883	1	Mid	-0.05	1.020	23.04	23.50	1.11	1.134	
				26590	1905	1	Mid	-0.04	1.220	23.15	23.50	1.08	1.322	42#
				26140	1860	50	Mid	0.02	0.890	21.87	22.50	1.16	1.029	
				26365	1883	50	Mid	-0.06	0.814	21.99	22.50	1.12	0.915	
				26590	1905	50	Mid	0.01	0.806	22.19	22.50	1.07	0.866	
				26365	1883	100	Low	0.03	0.800	21.83	22.50	1.17	0.933	
		Back Side	10	26590	1905	1	Mid	0.13	0.196	23.15	23.50	1.08	0.212	
				26590	1905	50	Mid	-0.20	0.161	22.19	22.50	1.07	0.173	
		Left Edge	10	26590	1905	1	Mid	-0.02	0.270	23.15	23.50	1.08	0.293	
				26590	1905	50	Mid	-0.01	0.225	22.19	22.50	1.07	0.242	
		Bottom Edge	10	26590	1905	1	Mid	-0.14	0.594	23.15	23.50	1.08	0.003	
				26590	1905	50	Mid	-0.18	0.475	22.19	22.50	1.07	0.510	
	Without Scaner	Back Side	10	26590	1905	1	Mid	-0.02	0.629	23.15	23.50	1.08	0.682	43#
				26590	1905	50	Mid	-0.06	0.517	22.19	22.50	1.07	0.555	

LTE Band 26 Part22 (15MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	26965	841.5	1	Low	0.07	0.273	23.69	24.00	1.07	0.293	44#
				26965	841.5	36	Low	0.08	0.211	22.50	23.00	1.12	0.237	
		Left Tilt	0	26965	841.5	1	Low	0.01	0.149	23.69	24.00	1.07	0.160	

				26965	841.5	36	Low	-0.04	0.115	22.50	23.00	1.12	0.129	
		Right Cheek	0	26965	841.5	1	Low	-0.13	0.227	23.69	24.00	1.07	0.244	
				26965	841.5	36	Low	-0.15	0.188	22.50	23.00	1.12	0.211	
		Right Tilt	0	26965	841.5	1	Low	-0.03	0.152	23.69	24.00	1.07	0.163	
				26965	841.5	36	Low	-0.03	0.117	22.50	23.00	1.12	0.131	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	26865	831.5	1	Low	-0.08	0.774	23.46	24.00	1.13	0.876	
				26915	836.5	1	Low	-0.11	0.797	23.41	24.00	1.15	0.913	
				26965	841.5	1	Low	-0.07	0.804	23.69	24.00	1.07	0.863	45#
				26965	841.5	36	Low	-0.10	0.637	22.50	23.00	1.12	0.715	
				26965	841.5	75	Low	-0.09	0.620	22.50	23.00	1.12	0.696	
		Back Side	10	26965	841.5	1	Low	-0.11	0.111	23.69	24.00	1.07	0.119	
				26965	841.5	36	Low	-0.09	0.088	22.50	23.00	1.12	0.099	
		Left Edge	10	26965	841.5	1	Low	-0.15	0.253	23.69	24.00	1.07	0.272	
				26965	841.5	36	Low	-0.17	0.202	22.50	23.00	1.12	0.227	
		Bottom Edge	10	26965	841.5	1	Low	-0.11	0.346	23.69	24.00	1.07	0.372	
				26965	841.5	36	Low	-0.10	0.283	22.50	23.00	1.12	0.318	
	Without Scaner	Back Side	10	26965	841.5	1	Low	-0.14	0.572	23.69	24.00	1.07	0.614	46#
				26965	841.5	36	Low	-0.15	0.440	22.50	23.00	1.12	0.494	

LTE Band 26 Part90 (10MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	26740	819	1	Low	-0.16	0.204	23.29	23.60	1.07	0.219	47#
				26740	819	25	Mid	0.08	0.186	22.18	22.50	1.08	0.200	
		Left Tilt	0	26740	819	1	Low	0.01	0.143	23.29	23.60	1.07	0.154	
				26740	819	25	Mid	-0.04	0.105	22.18	22.50	1.08	0.113	
		Right Cheek	0	26740	819	1	Low	-0.13	0.197	23.29	23.60	1.07	0.212	
				26740	819	25	Mid	-0.09	0.165	22.18	22.50	1.08	0.178	
		Right Tilt	0	26740	819	1	Low	-0.10	0.152	23.29	23.60	1.07	0.163	
				26740	819	25	Mid	-0.13	0.106	22.18	22.50	1.08	0.114	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	26740	819	1	Low	-0.10	0.692	23.29	23.60	1.07	0.743	48#
				26740	819	25	Mid	-0.12	0.597	22.18	22.50	1.08	0.643	
		Back Side	10	26740	819	1	Low	0.14	0.099	23.29	23.60	1.07	0.106	
				26740	819	25	Mid	0.11	0.083	22.18	22.50	1.08	0.089	
		Left Edge	10	26740	819	1	Low	-0.16	0.241	23.29	23.60	1.07	0.259	

				26740	819	25	Mid	0.15	0.178	22.18	22.50	1.08	0.192	
		Bottom Edge	10	26740	819	1	Low	0.12	0.324	23.29	23.60	1.07	0.348	
				26740	819	25	Mid	0.09	0.267	22.18	22.50	1.08	0.287	
	Without Scaner	Back Side	10	26740	819	1	Low	0.00	0.407	23.29	23.60	1.07	0.437	49#
				26740	819	25	Mid	0.13	0.346	22.18	22.50	1.08	0.372	

LTE Band 38 (20MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	38150	2610	1	Mid	-0.13	0.187	23.30	24.00	1.17	0.220	50#
				38150	2610	50	Mid	-0.15	0.149	22.15	22.50	1.08	0.162	
		Left Tilt	0	38150	2610	1	Mid	0.00	0.050	23.30	24.00	1.17	0.059	
				38150	2610	50	Mid	-0.13	0.041	22.15	22.50	1.08	0.044	
		Right Cheek	0	38150	2610	1	Mid	-0.17	0.118	23.30	24.00	1.17	0.139	
				38150	2610	50	Mid	0.12	0.093	22.15	22.50	1.08	0.101	
		Right Tilt	0	38150	2610	1	Mid	-0.16	0.062	23.30	24.00	1.17	0.073	
				38150	2610	50	Mid	-0.15	0.050	22.15	22.50	1.08	0.054	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	38150	2610	1	Mid	-0.02	**0.484**	23.30	24.00	1.17	0.569	51#
				38150	2610	50	Mid	-0.10	0.391	22.15	22.50	1.08	0.424	
		Back Side	10	38150	2610	1	Mid	-0.12	0.100	23.30	24.00	1.17	0.117	
				38150	2610	50	Mid	-0.18	0.079	22.15	22.50	1.08	0.086	
		Left Edge	10	38150	2610	1	Mid	-0.09	0.082	23.30	24.00	1.17	0.096	
				38150	2610	50	Mid	-0.13	0.067	22.15	22.50	1.08	0.073	
		Bottom Edge	10	38150	2610	1	Mid	-0.07	0.326	23.30	24.00	1.17	0.383	
				38150	2610	50	Mid	-0.12	0.259	22.15	22.50	1.08	0.281	
	Without Scaner	Back Side	10	38150	2610	1	Mid	-0.15	**0.269**	23.30	24.00	1.17	0.316	52#
				38150	2610	50	Mid	-0.16	0.213	22.15	22.50	1.08	0.231	

LTE Band 41 (20MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without	Left Cheek	0	41490	2680	1	Mid	-0.19	0.077	24.42	25.00	1.14	0.088	53#

	scanner			41490	2680	50	Mid	0.10	0.062	24.44	25.00	1.14	0.071	
		Left Tilt	0	41490	2680	1	Mid	0.00	0.019	24.42	25.00	1.14	0.022	
				41490	2680	50	Mid	-0.19	0.015	24.44	25.00	1.14	0.017	
		Right Cheek	0	41490	2680	1	Mid	0.10	0.074	24.42	25.00	1.14	0.085	
				41490	2680	50	Mid	-0.14	0.058	24.44	25.00	1.14	0.066	
		Right Tilt	0	41490	2680	1	Mid	-0.16	0.044	24.42	25.00	1.14	0.050	
				41490	2680	50	Mid	-0.12	0.034	24.44	25.00	1.14	0.039	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	41490	2680	1	Mid	0.09	0.301	24.42	25.00	1.14	0.344	54#
				41490	2680	50	Mid	-0.05	0.201	24.44	25.00	1.14	0.229	
		Back Side	10	41490	2680	1	Mid	0.09	0.051	24.42	25.00	1.14	0.058	
				41490	2680	50	Mid	-0.12	0.039	24.44	25.00	1.14	0.044	
		Left Edge	10	41490	2680	1	Mid	0.06	0.043	24.42	25.00	1.14	0.049	
				41490	2680	50	Mid	0.02	0.037	24.44	25.00	1.14	0.042	
		Bottom Edge	10	41490	2680	1	Mid	-0.05	0.215	24.42	25.00	1.14	0.246	
				41490	2680	50	Mid	-0.07	0.171	24.44	25.00	1.14	0.195	
	Without Scaner	Back Side	10	41490	2680	1	Mid	-0.15	0.158	24.42	25.00	1.14	0.181	55#
				41490	2680	50	Mid	-0.14	0.130	24.44	25.00	1.14	0.148	

LTE Band 66(20MHz Bandwidth**)**

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	RB Numb.	RB Start	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
QPSK	Without scanner	Left Cheek	0	132072	1720	1	Low	0.07	0.166	23.23	23.50	1.06	0.177	56#
				132072	1720	50	Low	-0.13	0.103	20.97	21.50	1.13	0.116	
		Left Tilt	0	132072	1720	1	Low	-0.07	0.066	23.23	23.50	1.06	0.070	
				132072	1720	50	Low	0.04	0.040	20.97	21.50	1.13	0.045	
		Right Cheek	0	132072	1720	1	Low	-0.14	0.076	23.23	23.50	1.06	0.081	
				132072	1720	50	Low	-0.10	0.047	20.97	21.50	1.13	0.053	
		Right Tilt	0	132072	1720	1	Low	-0.08	0.056	23.23	23.50	1.06	0.060	
				132072	1720	50	Low	-0.01	0.035	20.97	21.50	1.13	0.040	
Body-worn Accessory & Hotspot														
QPSK	With scanner	Front Side	10	132072	1720	1	Low	0.09	0.964	23.23	23.50	1.06	1.026	
				132322	1745	1	Low	-0.02	0.883	23.09	23.50	1.10	0.970	
				132572	1770	1	Low	0.03	1.040	22.91	23.50	1.15	1.191	57#
				132072	1720	50	Low	0.00	0.532	20.97	21.50	1.13	0.601	
				132072	1720	100	Low	-0.03	0.556	20.97	21.50	1.13	0.628	
		Back Side	10	132072	1720	1	Low	-0.21	0.149	23.23	24.00	1.19	0.178	

				132072	1720	50	Low	-0.19	0.096	20.97	21.50	1.13	0.108	
		Left Edge	10	132072	1720	1	Low	0.03	0.341	23.23	24.00	1.19	0.407	
				132072	1720	50	Low	0.00	0.211	20.97	21.50	1.13	0.238	
		Bottom Edge	10	132072	1720	1	Low	-0.18	0.470	23.23	24.00	1.19	0.561	
				132072	1720	50	Low	-0.20	0.296	20.97	21.50	1.13	0.334	
	Without Scaner	Back Side	10	132072	1720	1	Low	-0.09	0.520	23.23	24.00	1.19	0.621	58#
				132072	1720	50	Low	-0.11	0.328	20.97	21.50	1.13	0.371	

Note(s):

1. LTE Considerations: LTE test configurations are determined according to SAR Evaluation Considerations for LTE Devices in FCC KDB Publication 941225 D05v02r05.
2. MPR is permanently implemented for this device by the manufacturer. The specific manufacturer target MPR is indicated alongside the SAR results.

WLAN 2.4 GHz

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Duty Cycle (%)	Duty Cycle Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
802.11b	With scanner	Left Cheek	0	1	2412	0.07	0.179	12.41	12.80	1.09	98.22	1.02	0.196	59#
		Left Tilt	0	1	2412	-0.12	0.105	12.41	12.80	1.09	98.22	1.02	0.115	
		Right Cheek	0	1	2412	-0.07	0.111	12.41	12.80	1.09	98.22	1.02	0.121	
		Right Tilt	0	1	2412	-0.07	0.080	12.41	12.80	1.09	98.22	1.02	0.088	
Body-worn Accessory & Hotspot														
802.11b	With scanner	Front Side	10	1	2412	-0.16	0.109	12.41	12.80	1.09	98.22	1.02	0.119	60#
		Back Side	10	1	2412	-0.14	0.040	12.41	12.80	1.09	98.22	1.02	0.044	
		Right Edge	10	1	2412	0.13	0.043	12.41	12.80	1.09	98.22	1.02	0.047	
		Top Edge	10	1	2412	-0.12	0.052	12.41	12.80	1.09	98.22	1.02	0.057	
	Without Scaner	Back Side	10	1	2412	0.20	0.109	12.41	12.80	1.09	98.22	1.02	0.119	61#

WLAN 5.2 GHz

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Duty Cycle (%)	Duty Cycle Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
802.11ac (VHT20)	With scanner	Left Cheek	0	44	5220	0.16	0.032	11.85	12.00	1.04	85.46	1.17	0.033	
		Left Tilt	0	44	5220	0.10	0.031	11.85	12.00	1.04	85.46	1.17	0.032	
		Right Cheek	0	44	5220	0.14	0.03	11.85	12.00	1.04	85.46	1.17	0.031	

		Right Tilt	0	44	5220	-0.15	0.037	11.85	12.00	1.04	85.46	1.17	0.038	62#
Body-worn Accessory & Hotspot														
802.11ac (VHT20)	With scanner	Front Side	10	44	5220	0.18	0.027	11.85	12.00	1.04	85.46	1.17	0.028	63#
		Back Side	10	44	5220	0.19	0.011	11.85	12.00	1.04	85.46	1.17	0.011	
		RightEdge	10	44	5220	0.18	0.021	11.85	12.00	1.04	85.46	1.17	0.022	
		Top Edge	10	44	5220	0.18	0.023	11.85	12.00	1.04	85.46	1.17	0.024	
	Without Scaner	Back Side	10	44	5220	0.15	0.039	11.85	12.00	1.04	85.46	1.17	0.040	64#

WLAN 5.8 GHz

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Duty Cycle (%)	Duty Cycle Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
802.11ac(VHT20)	With scanner	Left Cheek	0	165	5825	0.13	0.035	11.77	12.00	1.05	86.10	1.16	0.037	
		Left Tilt	0	165	5825	-0.11	0.039	11.77	12.00	1.05	86.10	1.16	0.041	
		Right Cheek	0	165	5825	0.19	0.04	11.77	12.00	1.05	86.10	1.16	0.042	
		Right Tilt	0	165	5825	0.14	0.048	11.77	12.00	1.05	86.10	1.16	0.051	65#
Body-worn Accessory & Hotspot														
802.11ac(VHT20)	With scanner	Front Side	10	165	5825	0.16	0.042	11.77	12.00	1.05	86.10	1.16	0.044	66#
		Back Side	10	165	5825	0.18	0.018	11.77	12.00	1.05	86.10	1.16	0.019	
		Right Edge	10	165	5825	0.15	0.027	11.77	12.00	1.05	86.10	1.16	0.028	
		Top Edge	10	165	5825	0.17	0.038	11.77	12.00	1.05	86.10	1.16	0.040	
	Without Scaner	Back Side	10	165	5825	0.18	0.032	11.77	12.00	1.05	86.10	1.16	0.034	67#

Note(s):

1. Per KDB 248227 D01 SAR is not required for the following 2.4 GHz OFDM conditions.
   a. When the reported SAR of the highest measured maximum output power channel for the exposure configuration is ≤ 0.8 W/kg, no further SAR testing is required for 802.11b DSSS in that exposure configuration.
   b. When the highest reported SAR for DSSS is adjusted by the ratio of OFDM to DSSS specified maximum output power and the adjusted SAR is ≤ 1.2 W/kg.
2. For OFDM transmission configurations in the 2.4 GHz and 5 GHz bands, 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 for each frequency band.

3. Per KDB 248227 D01 5G WLAN Subsequent Test Configuration Procedures
   SAR measurement requirements for the remaining 802.11 transmission mode configurations that have not been tested in the initial test configuration are determined separately for each standalone and aggregated frequency band, in each exposure condition, according to the maximum output power specified for production units.
   a. When SAR test exclusion provisions of KDB Publication 447498 D01 are applicable and SAR measurement is not required for the initial test configuration, SAR is also not required for the next highest maximum output power transmission mode subsequent test configuration(s) in that frequency band or aggregated band and exposure configuration.
   b. When the highest reported SAR for the initial test configuration (when applicable, include subsequent highest output channels), according to the initial test position or fixed exposure position requirements, is adjusted by the ratio of the subsequent test configuration to initial test configuration specified maximum output power and the adjusted SAR is ≤ 1.2 W/kg, SAR is not required for that subsequent test configuration.

General Note(s):

1. The test data reported are the worst-case SAR values according to test procedures specified in IEEE 1528-2013, FCC KDB Publication 865664 D01v01r04 and FCC KDB Publication 447498 D01v06.
2. All modes of operation were investigated, and worst-case results are reported.
3. The EUT is tested 2nd hot-spot peak, if it is less than 2 dB below the highest peak.
4. SAR results were scaled to the maximum allowed power to demonstrate compliance per FCC KDB Publication 447498 D01v06.
5. Per FCC KDB Publication 648474 D04v01r03, body worn SAR was evaluated without a headset connected to the device. Since the standalone reported SAR was ≤1.2 W/kg, no additional body worn SAR evaluations using a headset cable were required.
6. Per FCC KDB Publication 865664 D01v01r04, variability SAR tests were performed when the measured SAR results for a frequency band were greater than 0.8 W/kg.
7. Per FCC KDB Publication 447498 D01v06, if the reported (scaled) SAR measured at the middle channel or highest output power channel for each test configuration is ≤ 0.8 W/kg then testing at the other channels is not required for such test configuration(s). When the maximum output power variation across the required test channels is>1/2 dB, instead of the middle channel, the highest output power channel must be used.

Bluetooth

Mode	Method	Position	Dist. (mm)	Ch.	Freq. (MHz)	Power Drift (dB)	Meas. SAR 1 g (W/Kg)	Meas. Power (dBm)	Max. tune-up Power (dBm)	Scaling Factor	Duty Cycle (%)	Duty Cycle Factor	Report SAR 1 g (W/Kg)	Meas. No.
Head														
EDR	With scanner	Left Cheek	0	39	2441	-0.12	0.124	10.11	10.50	1.09	100	1.00	0.136	68#
		Left Tilt	0	39	2441	-0.11	0.067	10.11	10.50	1.09	100	1.00	0.073	
		Right Cheek	0	39	2441	-0.11	0.037	10.11	10.50	1.09	100	1.00	0.040	
		Right Tilt	0	39	2441	-0.17	0.027	10.11	10.50	1.09	100	1.00	0.030	
Body-worn Accessory & Hotspot														
EDR	With scanner	Front Side	10	39	2441	-0.07	0.026	10.11	10.50	1.09	100	1.00	0.028	69#
		Back Side	10	39	2441	0.08	0.006	10.11	10.50	1.09	100	1.00	0.007	
		Right Edge	10	39	2441	0.07	0.017	10.11	10.50	1.09	100	1.00	0.019	
		Top Edge	10	39	2441	0.11	0.02	10.11	10.50	1.09	100	1.00	0.022	
	Without Scanner	Back Side	10	39	2441	-0.17	0.032	10.11	10.50	1.09	100	1.00	0.035	70#

General Note(s):

1. The test data reported are the worst-case SAR values according to test procedures specified in IEEE 1528-2013, FCC KDB Publication 865664 D01v01r04 and FCC KDB Publication 447498 D01v06.
2. All modes of operation were investigated, and worst-case results are reported.
3. The EUT is tested 2nd hot-spot peak, if it is less than 2 dB below the highest peak.
4. SAR results were scaled to the maximum allowed power to demonstrate compliance per FCC KDB Publication 447498 D01v06.
5. Per FCC KDB Publication 648474 D04v01r03, body worn SAR was evaluated without a headset connected to the device. Since the standalone reported SAR was ≤1.2 W/kg, no additional body worn SAR evaluations using a headset cable were required.
6. Per FCC KDB Publication 865664 D01v01r04, variability SAR tests were performed when the measured SAR results for a frequency band were greater than 0.8 W/kg.
7. Per FCC KDB Publication 447498 D01v06, if the reported (scaled) SAR measured at the middle channel or highest output power channel for each test configuration is ≤ 0.8 W/kg then testing at the other channels is not required for such test configuration(s). When the maximum output power variation across the required test channels is>1/2 dB, instead of the middle channel, the highest output power channel must be used

6.5 SAR Measurement Variability

In accordance with published RF Exposure KDB procedure 865664 D01 SAR measurement 100 MHz to 6 GHz v01r04. These additional measurements are repeated after the completion of all measurements requiring the same head or body tissue-equivalent medium in a frequency band. The test device should be returned to ambient conditions (normal room temperature) with the battery fully charged before it is re-mounted on the device holder for the repeated measurement(s) to minimize any unexpected variations in the repeated results.

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 (~ 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.

Frequency band	Test Position	Mode	Ch.	Original 1g SAR (W/kg)	1st Repeated 1g SAR (W/kg)	Largest to Smallest SAR Ratio
GSM 850	Front	Voice	190	0.712	0.711	1.00
WCDMA B2	Front	RMC	9538	1.080	1.130	1.05
WCDMA B4	Front	RMC	1513	0.968	1.060	1.10
WCDMA B4	Front	RMC	4233	0.894	0.903	1.01
LTE B2	Front	QPSK	18900	1.260	1.240	1.02
LTE B2	Front	QPSK	18700	1.000	0.999	1.00
LTE B4	Front	QPSK	20175	0.884	0.870	1.02
LTE B5	Front	QPSK	20450	0.899	0.822	1.09
LTE B7	Front	QPSK	20850	0.765	0.757	1.011
LTE B25	Front	QPSK	26590	1.220	1.150	1.061
LTE B25	Front	QPSK	26140	0.890	0.885	1.006

Note(s):

1. Second Repeated Measurement is not required since the ratio of the largest to smallest SAR for the original and first repeated measurement is not > 1.20.

6.6 Standalone SAR Test Exclusion Considerations and Estimated SAR

KDB 447498 D01v06 General RF Exposure Guidance v06, introduces a new formula for calculating the SAR to Peak Location Ratio (SPLSR) between pairs of simultaneously transmitting antennas:

$$SPLSR = (SAR_1 + SAR_2)^{1.5} / R_i$$

Where:

SAR_1 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

SAR_2 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

R_i 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 $[(x_1-x_2)^2 + (y_1-y_2)^2 + (z_1-z_2)^2]$

A new threshold of 0.04 is also introduced in the draft KDB. Thus, 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:

$$(SAR_1 + SAR_2)^{1.5} / R_i < 0.04$$

6.7 Simultaneous Transmission SAR Considerations

Sum of the SAR for GSM + WLAN & Bluetooth

Condition	Simultaneous Transmission Scenario (W/Kg)				Max Σ 1-g SAR (W/Kg)	SPLSR (Yes/ No)
	GSM	WLAN DTS Band	WLAN UNII Band	Bluetooth		
Head	0.298	0.196	0.051	0.136	0.494	No
Body-Worn	0.781	0.119	0.044	0.035	0.900	No
Hotspot	0.491	0.119	0.044	0.035	0.610	No

Conclusion:

Simultaneous transmission SAR measurement (Volume Scan) is not required because the either sum of the 1-g SAR is < 1.6 W/kg or the SPLSR is < 0.04 for all circumstances that require SPLSR calculation.

Sum of the SAR for WCDMA + WLAN & Bluetooth

Condition	Simultaneous Transmission Scenario (W/Kg)				Max Σ 1-g SAR (W/Kg)	SPLSR (Yes/ No)
	WCDMA	WLAN DTS Band	WLAN UNII Band	Bluetooth		
Head	0.365	0.196	0.051	0.136	0.561	No
Body-Worn	1.179	0.119	0.044	0.035	1.298	No
Hotspot	1.179	0.119	0.044	0.035	1.298	No

Conclusion:

Simultaneous transmission SAR measurement (Volume Scan) is not required because the either sum of the 1-g SAR is < 1.6 W/kg or the SPLSR is < 0.04 for all circumstances that require SPLSR calculation.

Sum of the SAR for LTE + WLAN & Bluetooth

Condition	Simultaneous Transmission Scenario (W/Kg)				Max Σ 1-g SAR (W/Kg)	SPLSR (Yes/ No)
	LTE	WLAN DTS Band	WLAN UNII Band	Bluetooth		
Head	0.298	0.196	0.051	0.136	0.494	No
Body-Worn	1.385	0.119	0.044	0.035	1.504	No
Hotspot	1.385	0.119	0.044	0.035	1.504	No

Conclusion:

Simultaneous transmission SAR measurement (Volume Scan) is not required because the either sum of the 1-g SAR is < 1.6 W/kg or the SPLSR is < 0.04 for all circumstances that require SPLSR calculation.

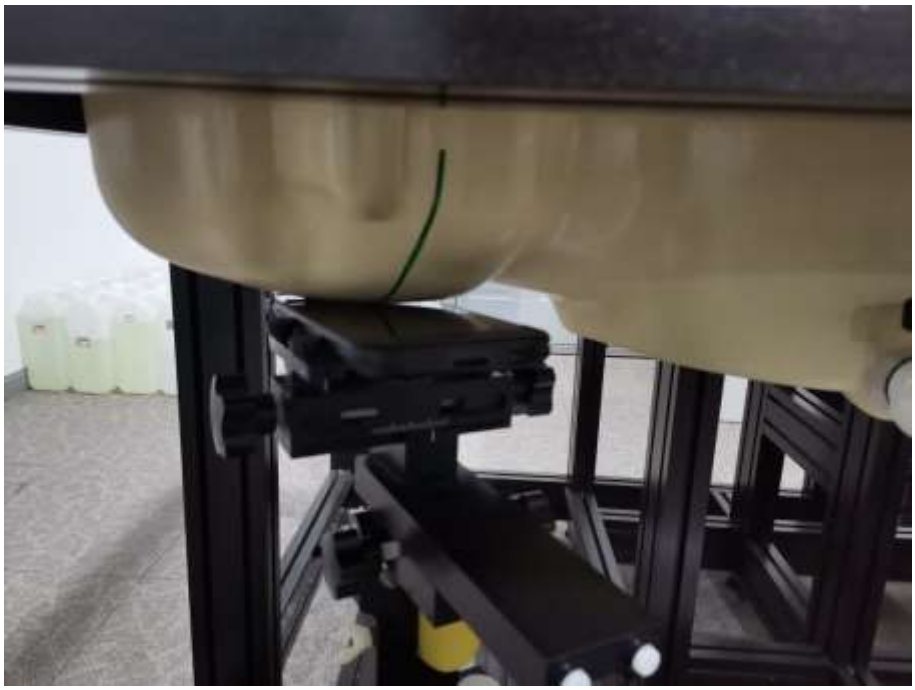
7 Appendixes

7.1 Liquid depth

7.2 Sample and Set-up Photos

Front of the sample

Back of the sample

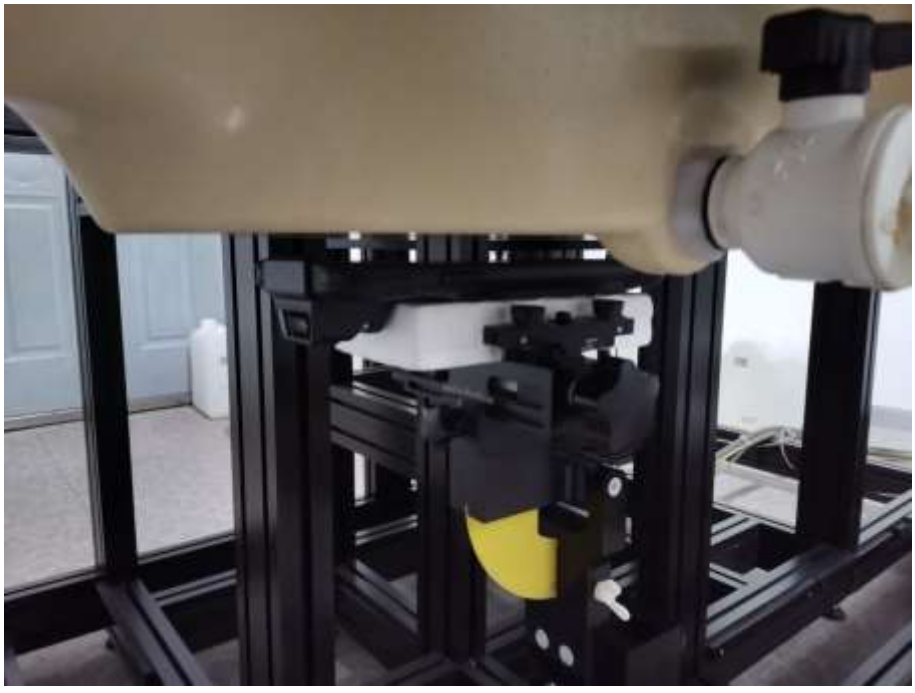


Right Touch

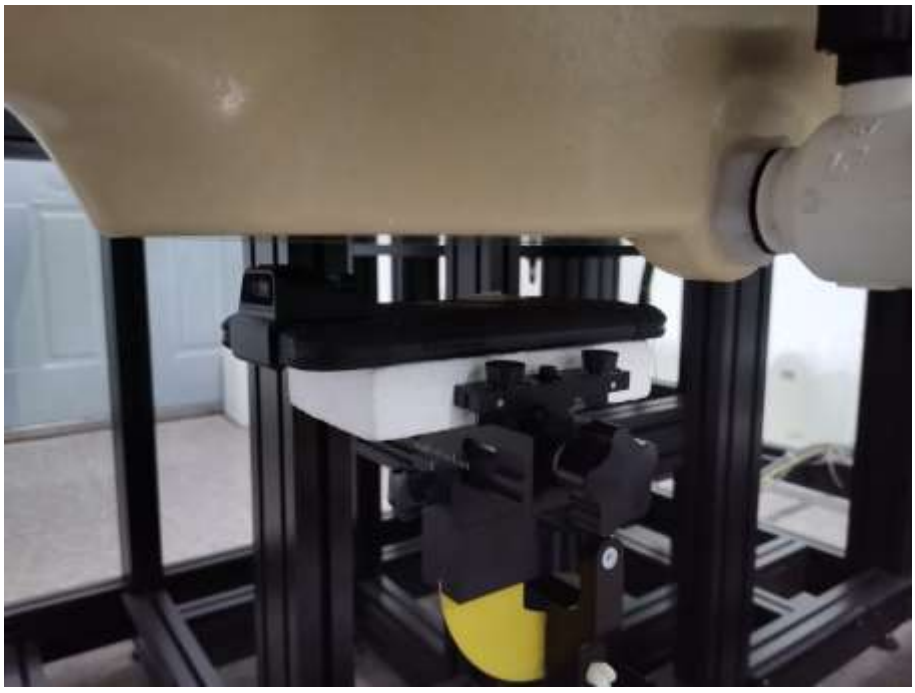
Right Tilt

Left Touch

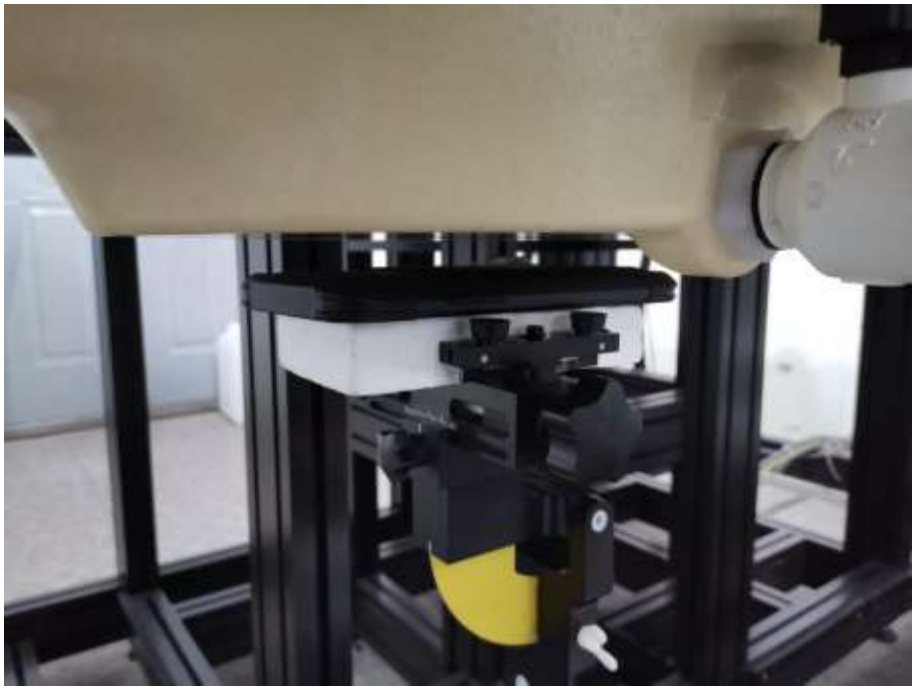
Left Tilt



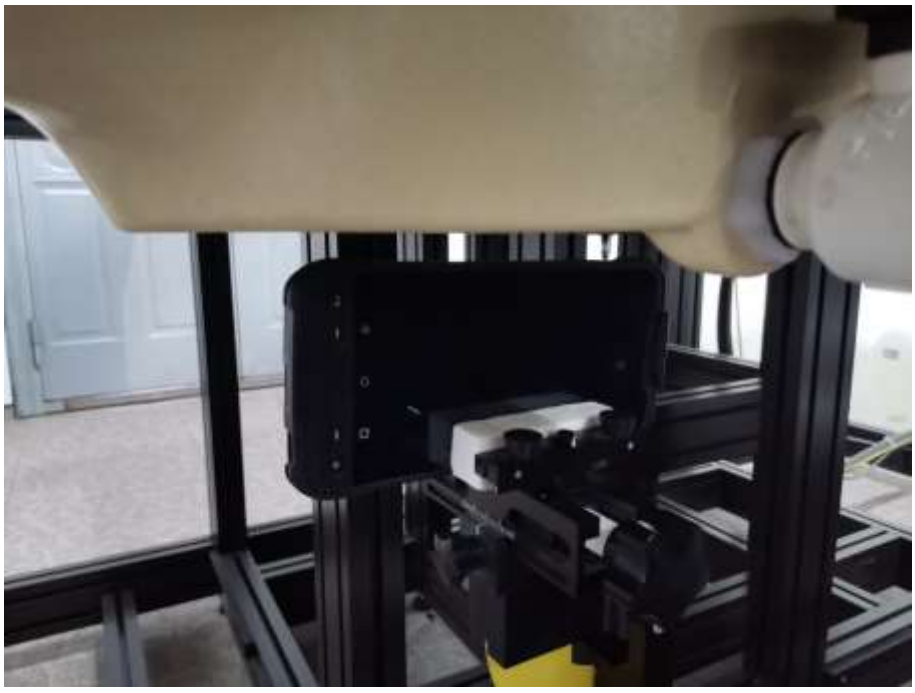
Front- 10mm With scanner



Back - 10mm With scanner

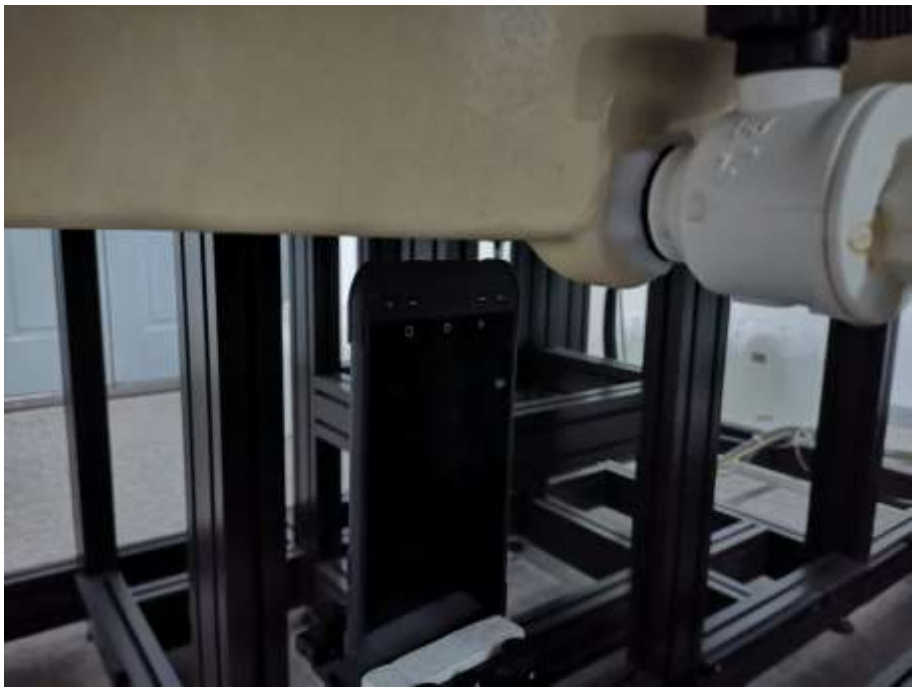


Back - 10mm Without scanner



Left - 10mm With scanner

Right - 10mm With scanner



Bottom - 10mm With scanner

Top - 10mm With scanner

7.3 System Verification Plots

System Validation for 750MHz Head _2021-01-23

Measurement Report for D750V2 SN1055, FRONT, D750, UID 0 -, Channel 50 (750.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
D750V2 SN1055,	180.0 x 100.0 x 330.0	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 15.00	D750	CW, 0--	750.0, 50	10.16	0.910	42.838

Hardware Setup

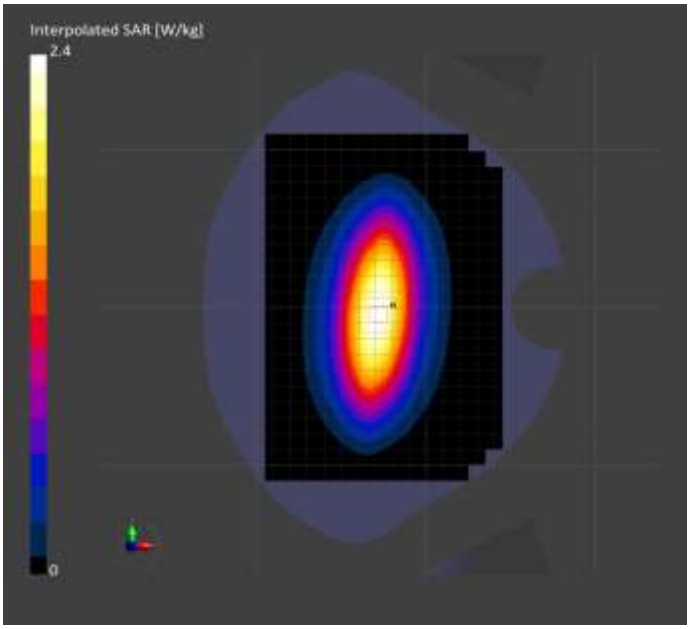
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 220.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	2.10	2.16
psSAR10g [W/Kg]	1.42	1.39
Power Drift [dB]	-0.04	0.00
M2/M1 [%]		17.1
Dist 3dB Peak [mm]		63.0



System Validation for 835MHz Head _2021-01-31

Measurement Report for D835V2 SN4d061, FRONT, D835, UID 0 -, Channel 50 (835.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
D835V2 SN4d061,	160.0 x 120.0 x 340.0	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 15.00	D835	CW, 0--	835.0, 50	9.79	0.916	42.619

Hardware Setup

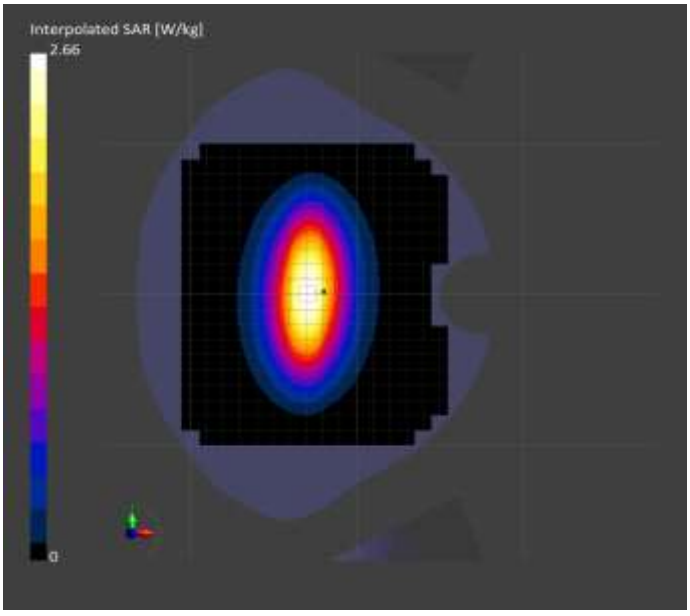
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	160.0 x 200.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	2.32	2.34
psSAR10g [W/Kg]	1.53	1.49
Power Drift [dB]	-0.06	-0.00
M2/M1 [%]		18.6
Dist 3dB Peak [mm]		61.8



System Validation for 1800MHz Head _2021-01-28

Measurement Report for D1800V2 SN1d148, FRONT, D1800, UID 0 -, Channel 50 (1800.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
D1800V2 SN1d148,	100.0 x 74.0 x 300.0	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10 mm	D1800	CW, 0--	1800.0, 50	8.45	1.387	41.885

Hardware Setup

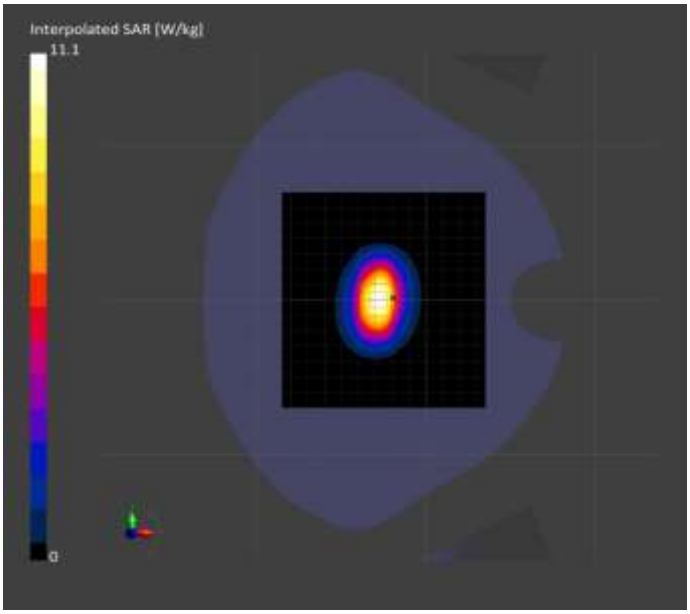
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	120.0 x 140.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	9.09	9.07
psSAR10g [W/Kg]	4.87	4.71
Power Drift [dB]	-0.12	0.00
M2/M1 [%]		10.0
Dist 3dB Peak [mm]		53.0



System Validation for 1900MHz Head _2021-01-21

Measurement Report for D1900V2 SN5d092, FRONT, D1900, UID 0 -, Channel 50 (1900.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
D1900V2 SN5d092,	100.0 x 68.0 x 300.0	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10 mm	D1900	CW, 0--	1900.0, 50	8.07	1.433	41.326

Hardware Setup

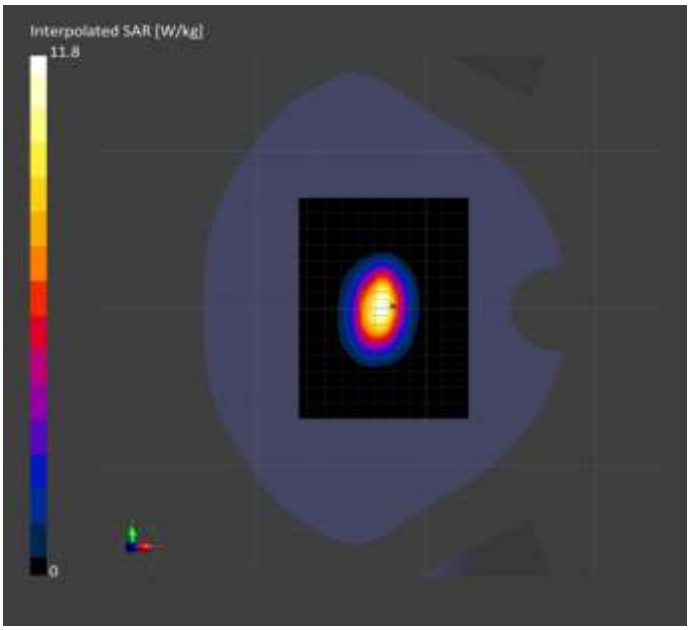
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	100.0 x 140.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	9.44	9.80
psSAR10g [W/Kg]	4.99	5.00
Power Drift [dB]	-0.10	0.00
M2/M1 [%]		9.0
Dist 3dB Peak [mm]		52.3



System Validation for 2450MHz Head _2021-02-03

Measurement Report for D2450V2 SN723, FRONT, D2450, UID 0 -, Channel 50 (2450.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
D2450V2 SN723,	100.0 x 52.0 x 290.0	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	D2450	CW, 0--	2450.0, 50	7.65	1.729	38.906

Hardware Setup

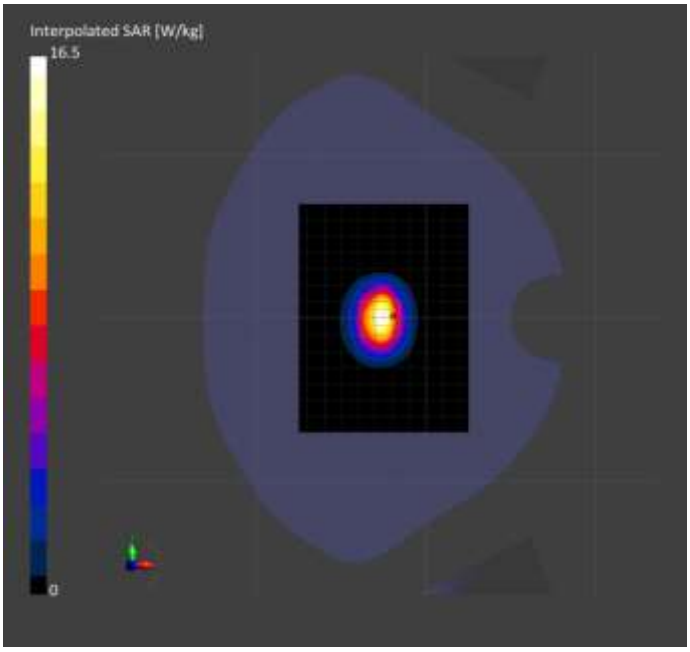
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	100.0 x 140.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	12.6	13.0
psSAR10g [W/Kg]	5.95	5.97
Power Drift [dB]	-0.10	0.00
M2/M1 [%]		9.0
Dist 3dB Peak [mm]		48.4



System Validation for 2600MHz Head _2021-01-29

Measurement Report for D2600V2 SN1142, FRONT, D2600, UID 0 -, Channel 50 (2600.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
D2600V2 SN1142,	100.0 x 50.0 x 290.0	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	D2600	CW, 0--	2600.0, 50	7.45	2.032	40.573

Hardware Setup

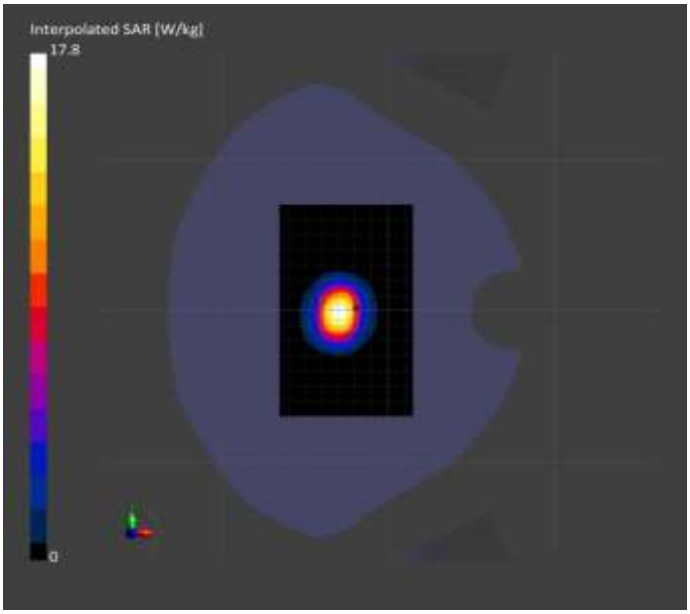
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	80.0 x 140.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	14.0	13.9
psSAR10g [W/Kg]	6.52	6.20
Power Drift [dB]	-0.16	-0.01
M2/M1 [%]		9.0
Dist 3dB Peak [mm]		46.6



System Validation for 5200MHz Head _2021-02-04

Measurement Report for D5GHzV2 SN1061, FRONT, D5GHz, UID 0 -, Channel 20 (5200.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
D5GHzV2 SN1061,	80.0 x 20.0 x 300.0	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	D5GHz	CW, 0--	5200.0, 20	5.53	4.84	34.555

Hardware Setup

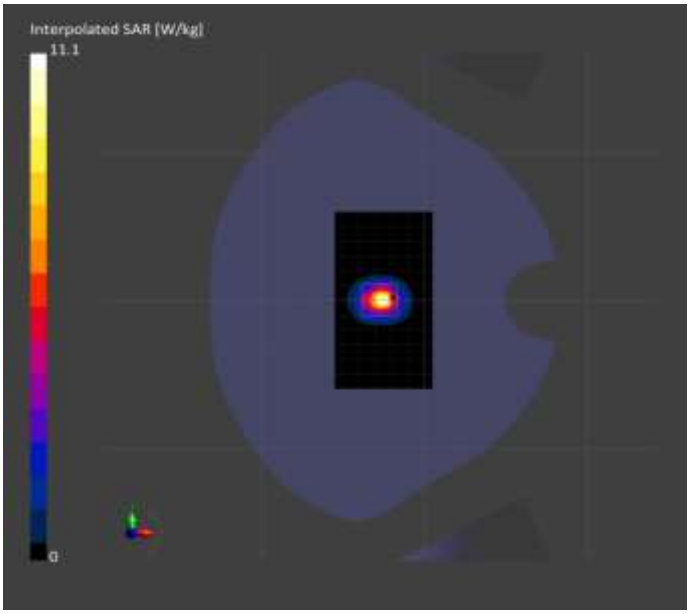
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	60.0 x 120.0	22.0 x 22.0 x 22.0
Grid Steps [mm]	10.0 x 10.0	4.0 x 4.0 x 1.4
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	6.84	7.53
psSAR10g [W/Kg]	2.00	2.16
Power Drift [dB]	-0.13	-0.11
M2/M1 [%]		7.2
Dist 3dB Peak [mm]		66.9



System Validation for 5800MHz Head _2021-02-04

Measurement Report for D5GHzV2 SN1061, FRONT, D5GHz, UID 0 -, Channel 80 (5800.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
D5GHzV2 SN1061,	80.0 x 20.0 x 300.0	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	D5GHz	CW, 0--	5800.0, 80	4.75	5.149	34.935

Hardware Setup

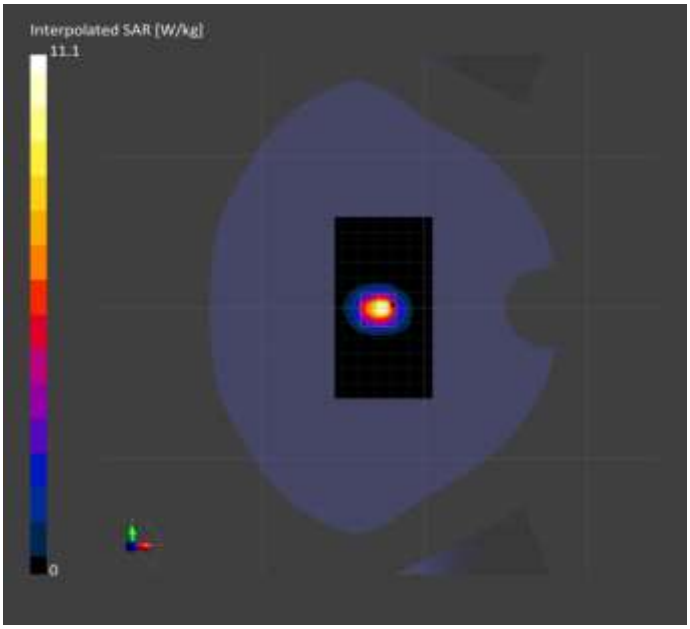
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	60.0 x 120.0	22.0 x 22.0 x 22.0
Grid Steps [mm]	10.0 x 10.0	4.0 x 4.0 x 1.4
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	7.18	8.14
psSAR10g [W/Kg]	2.14	2.29
Power Drift [dB]	-0.13	-0.08
M2/M1 [%]		7.2
Dist 3dB Peak [mm]		63.1



7.4 Highest SAR Test Plots

Meas.1 Measurement Report for RS60, CHEEK, GSM 850, UID 10024 DAC, Channel 190 (836.6MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000001942	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	GSM 850	GSM, 10024-DAC	836.6, 190	9.79	0.933	42.266

Hardware Setup

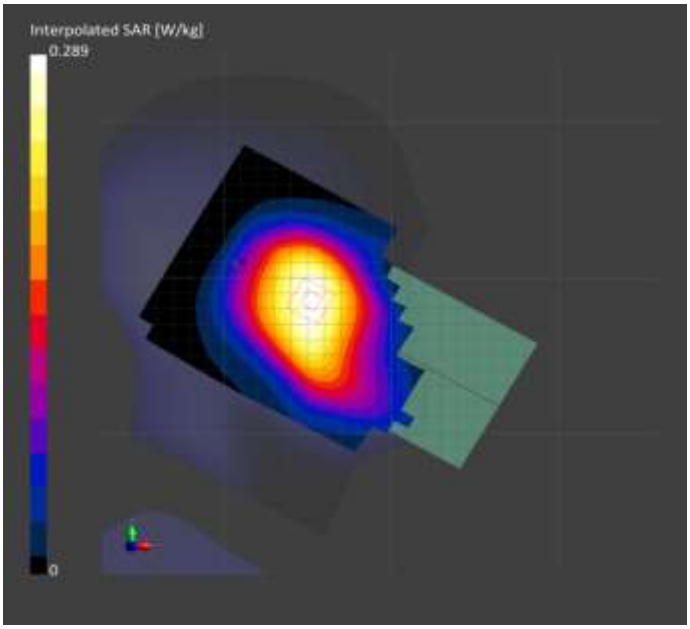
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.253	0.272
psSAR10g [W/Kg]	0.177	0.211
Power Drift [dB]	-0.16	0.05
M2/M1 [%]		inf
Dist 3dB Peak [mm]		78.0



Meas.2 Measurement Report for RS60, FRONT, GSM 850, UID 10021 DAC, Channel 190 (836.6MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000001942	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	GSM 850	GSM, 10021-DAC	836.6, 190	9.79	0.933	42.266

Hardware Setup

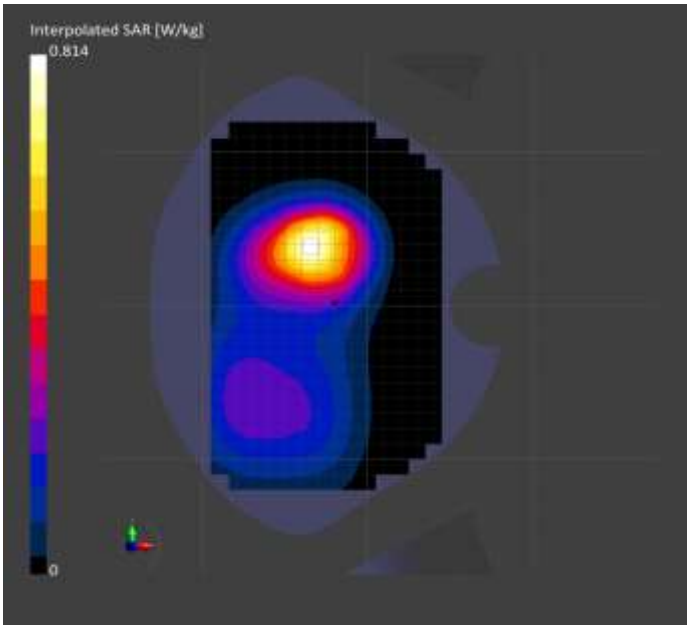
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.700	0.712
psSAR10g [W/Kg]	0.461	0.443
Power Drift [dB]	-0.15	-0.12
M2/M1 [%]		19.2
Dist 3dB Peak [mm]		60.0



Meas.3 Measurement Report for RS60, BACK, GSM 850, UID 10021 DAC, Channel 190 (836.6MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000001942	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	GSM 850	GSM, 10021-DAC	836.6, 190	9.79	0.933	42.266

Hardware Setup

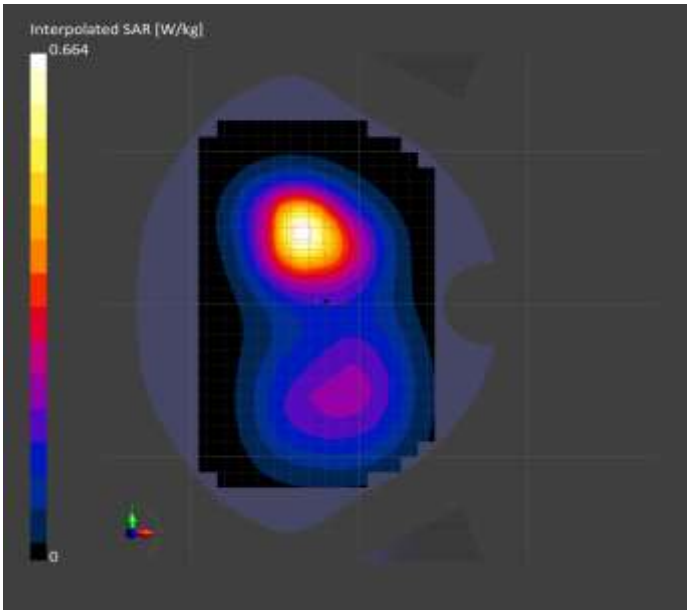
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.573	0.577
psSAR10g [W/Kg]	0.378	0.365
Power Drift [dB]	-0.10	-0.06
M2/M1 [%]		19.8
Dist 3dB Peak [mm]		62.2



Meas.4 Measurement Report for RS60, FRONT, GPRS 850, UID 10023 DAC, Channel 190 (836.6MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000001942	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	GSM 850	GSM, 10023-DAC	836.6, 190	9.79	0.933	42.266

Hardware Setup

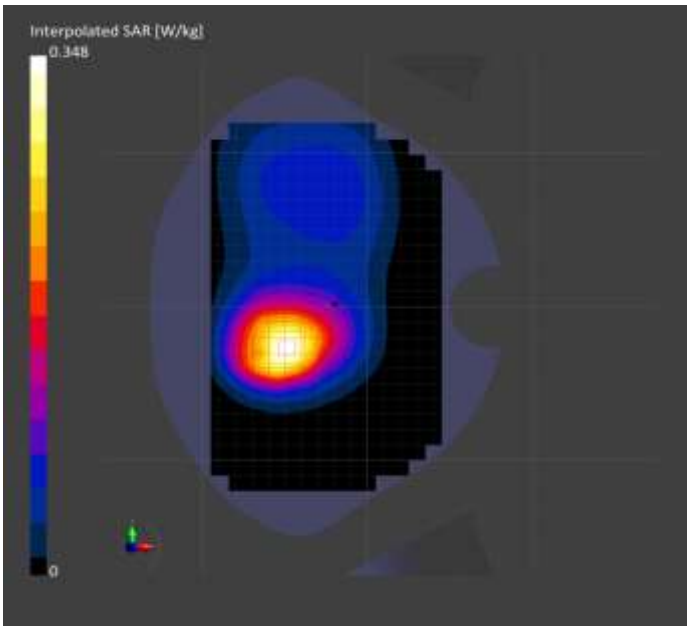
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.303	0.315
psSAR10g [W/Kg]	0.200	0.194
Power Drift [dB]	0.05	0.01
M2/M1 [%]		17.7
Dist 3dB Peak [mm]		59.3



Meas.5 Measurement Report for RS60, BACK, GPRS 850, UID 10023 DAC, Channel 190 (836.6MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000001942	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	GSM 850	GSM, 10023-DAC	836.6, 190	9.79	0.933	42.266

Hardware Setup

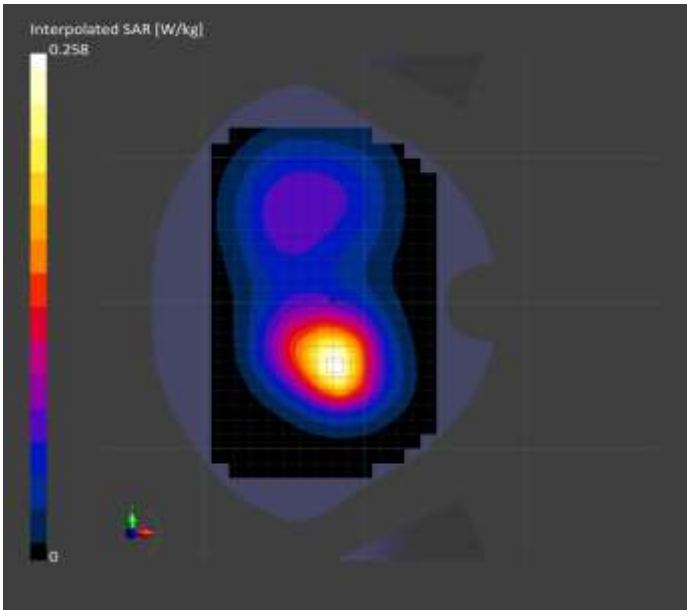
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.224	0.228
psSAR10g [W/Kg]	0.148	0.145
Power Drift [dB]	0.06	0.02
M2/M1 [%]		20.6
Dist 3dB Peak [mm]		62.1



Meas.6 Measurement Report for RS60, CHEEK, PCS 1900, UID 10021 DAC, Channel 512 (1850.2MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000001942	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	PCS 1900	GSM, 10021-DAC	1850.2, 512	8.07	1.383	41.377

Hardware Setup

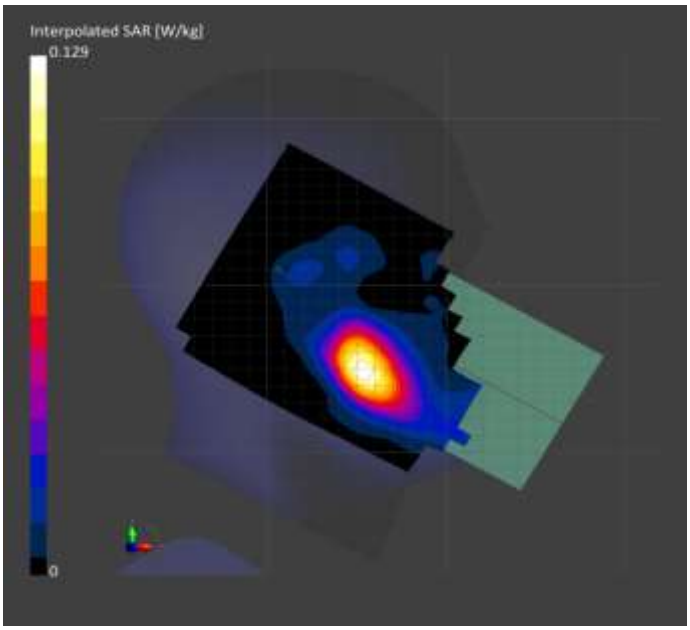
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.105	0.108
psSAR10g [W/Kg]	0.059	0.064
Power Drift [dB]	-0.19	-0.01
M2/M1 [%]		11.4
Dist 3dB Peak [mm]		65.6



Meas.7 Measurement Report for RS60, FRONT, PCS 1900, UID 10021 DAC, Channel 512 (1850.2MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000001942	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	PCS 1900	GSM, 10021-DAC	1850.2, 512	8.07	1.383	41.377

Hardware Setup

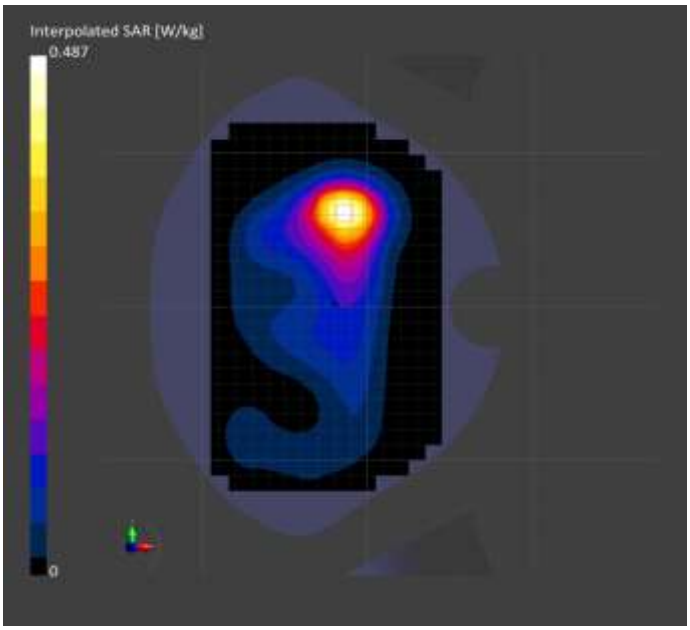
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.401	0.406
psSAR10g [W/Kg]	0.229	0.227
Power Drift [dB]	0.02	0.04
M2/M1 [%]		14.6
Dist 3dB Peak [mm]		57.4



Meas.8 Measurement Report for RS60, BACK, PCS 1900, UID 10021 DAC, Channel 512 (1850.2MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000001942	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	PCS 1900	GSM, 10021-DAC	1850.2, 512	8.07	1.383	41.377

Hardware Setup

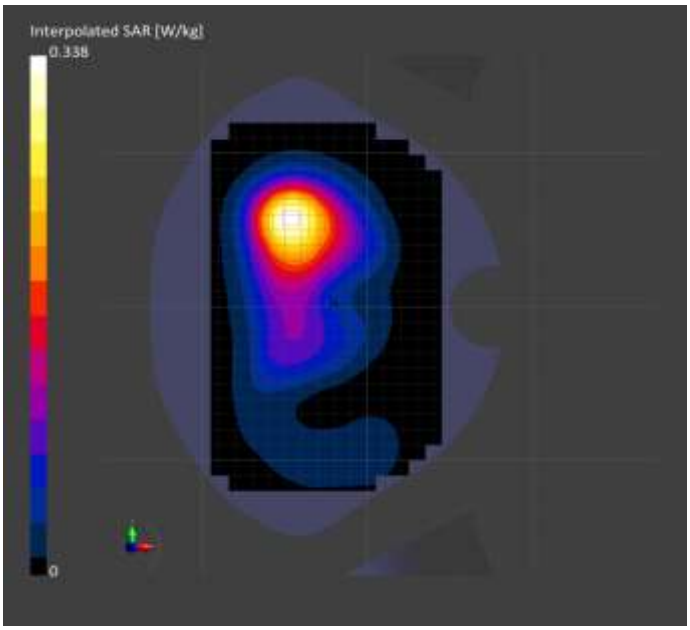
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.281	0.285
psSAR10g [W/Kg]	0.169	0.170
Power Drift [dB]	-0.16	-0.10
M2/M1 [%]		17.7
Dist 3dB Peak [mm]		59.1



Meas.9 Measurement Report for RS60, FRONT, GPRS 1900, UID 10023 DAC, Channel 512 (1850.2MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000001942	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	PCS 1900	GSM, 10023-DAC	1850.2, 512	8.07	1.383	41.377

Hardware Setup

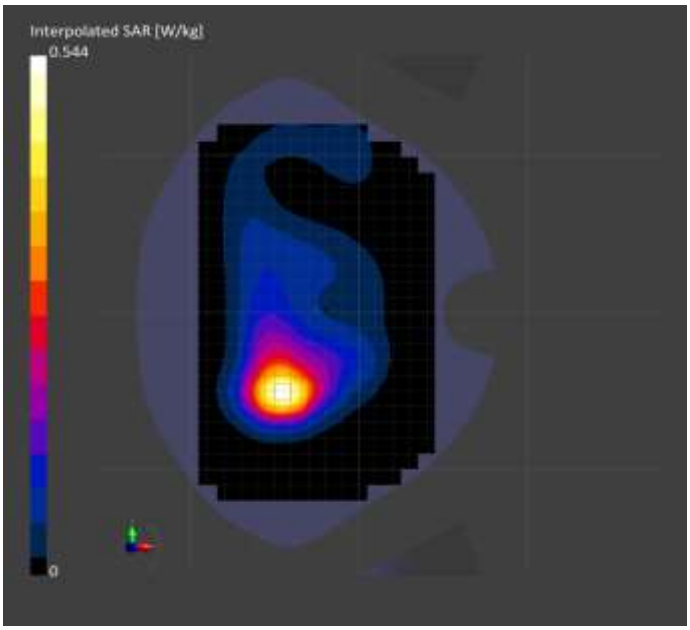
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.443	0.462
psSAR10g [W/Kg]	0.249	0.256
Power Drift [dB]	-0.12	0.05
M2/M1 [%]		13.0
Dist 3dB Peak [mm]		58.7



Meas.10 Measurement Report for RS60, BACK, PCS 1900, UID 10023 DAC, Channel 512 (1850.2MHz)
Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000001942	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	PCS 1900	GSM, 10023-DAC	1850.2, 512	8.07	1.383	41.377

Hardware Setup

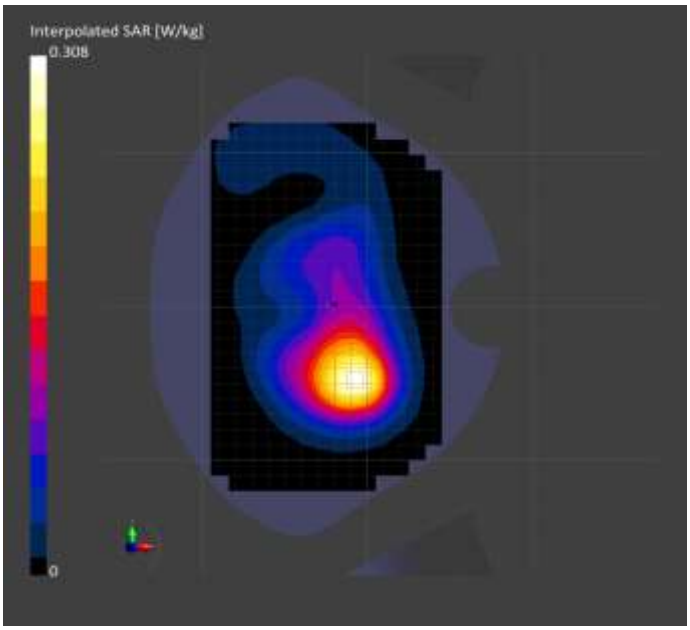
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.254	0.260
psSAR10g [W/Kg]	0.153	0.156
Power Drift [dB]	0.11	-0.03
M2/M1 [%]		17.0
Dist 3dB Peak [mm]		59.7



Meas.11 Measurement Report for RS60, CHEEK, Band 2, UTRA/FDD, UID 10011 CAB, Channel 9538 (1907.6MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 2, UTRA/FDD	WCDMA, 10011-CAB	1907.6, 9538	8.07	1.452	40.982

Hardware Setup

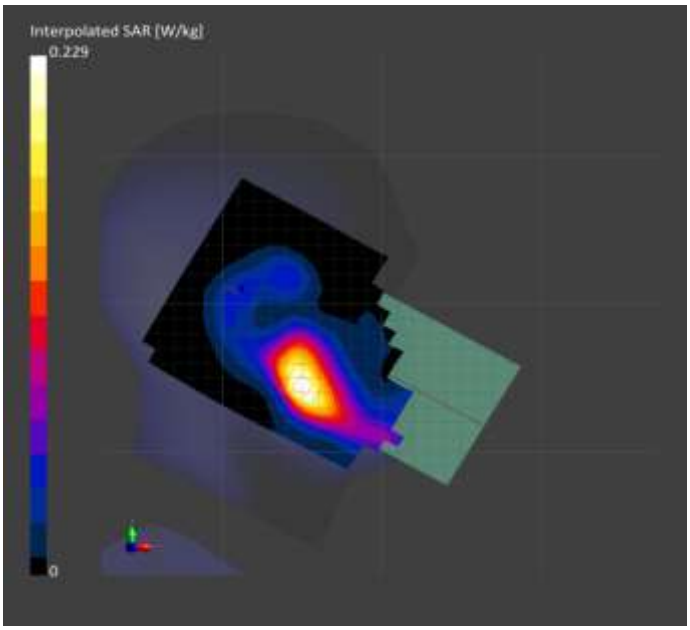
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.187	0.196
psSAR10g [W/Kg]	0.107	0.121
Power Drift [dB]	-0.11	-0.15
M2/M1 [%]		11.7
Dist 3dB Peak [mm]		69.2



Meas.12 Measurement Report for RS60, FRONT, Band 2, UTRA/FDD, UID 10457 AAA, Channel 9538 (1907.6MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 2, UTRA/FDD	WCDMA, 10457-AAA	1907.6, 9538	8.07	1.452	40.982

Hardware Setup

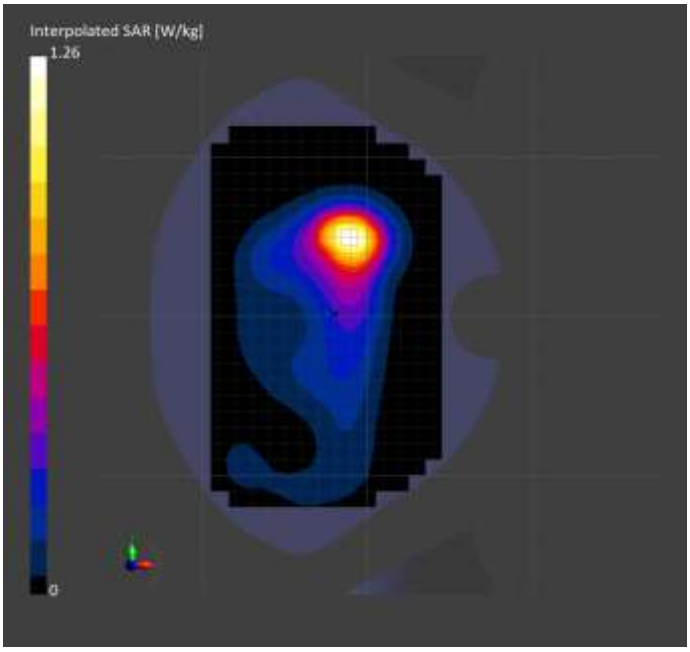
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	1.03	1.08
psSAR10g [W/Kg]	0.579	0.590
Power Drift [dB]	0.03	0.02
M2/M1 [%]		13.3
Dist 3dB Peak [mm]		56.9



Meas.13 Measurement Report for RS60, BACK, Band 2, UTRA/FDD, UID 10457 AAA, Channel 9538 (1907.6MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 2, UTRA/FDD	WCDMA, 10457-AAA	1907.6, 9538	8.07	1.452	40.982

Hardware Setup

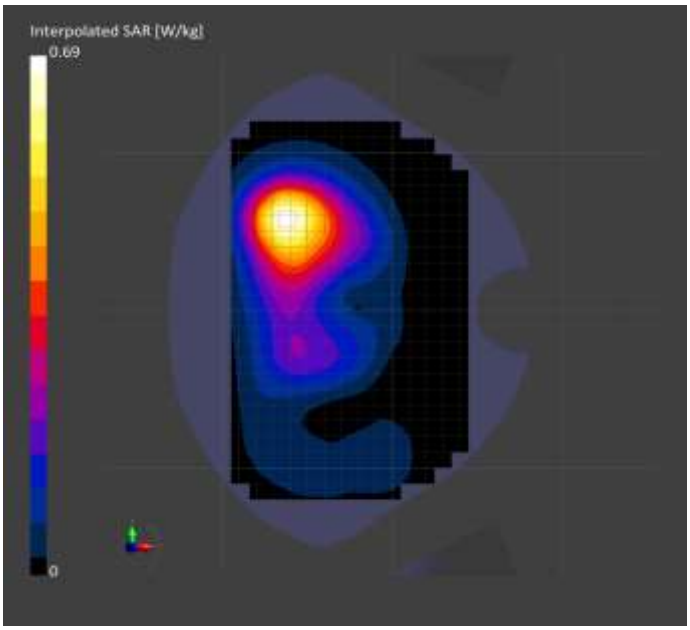
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.570	0.571
psSAR10g [W/Kg]	0.340	0.340
Power Drift [dB]	-0.10	-0.13
M2/M1 [%]		19.1
Dist 3dB Peak [mm]		58.5



Meas.14 Measurement Report for RS60, CHEEK, Band 4, UTRA/FDD, UID 10011 CAB, Channel 1312 (1712.4MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 4, UTRA/FDD	WCDMA, 10011-CAB	1712.4, 1312	8.45	1.405	41.886

Hardware Setup

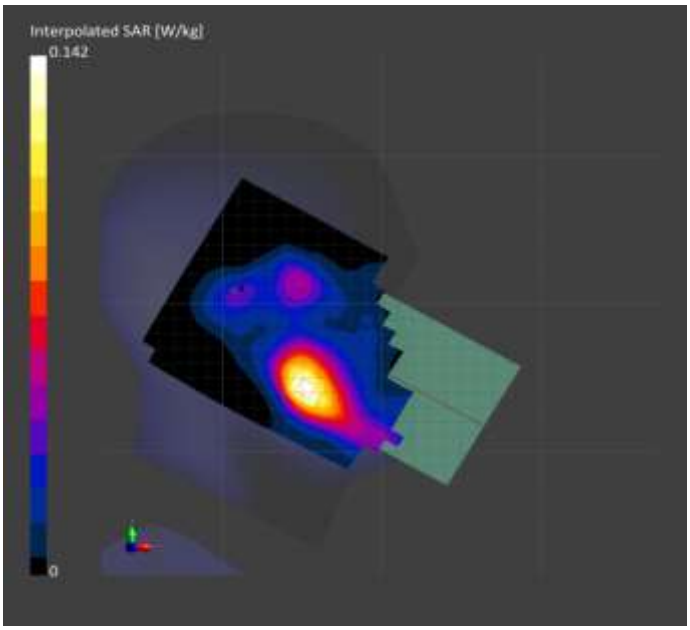
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.117	0.123
psSAR10g [W/Kg]	0.069	0.079
Power Drift [dB]	0.07	-0.17
M2/M1 [%]		12.7
Dist 3dB Peak [mm]		71.3



Meas.15 Measurement Report for RS60, FRONT, Band 4, UTRA/FDD, UID 10457 AAA, Channel 1513 (1752.6MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 4, UTRA/FDD	WCDMA, 10457-AAA	1752.6, 1513	8.45	1.422	41.072

Hardware Setup

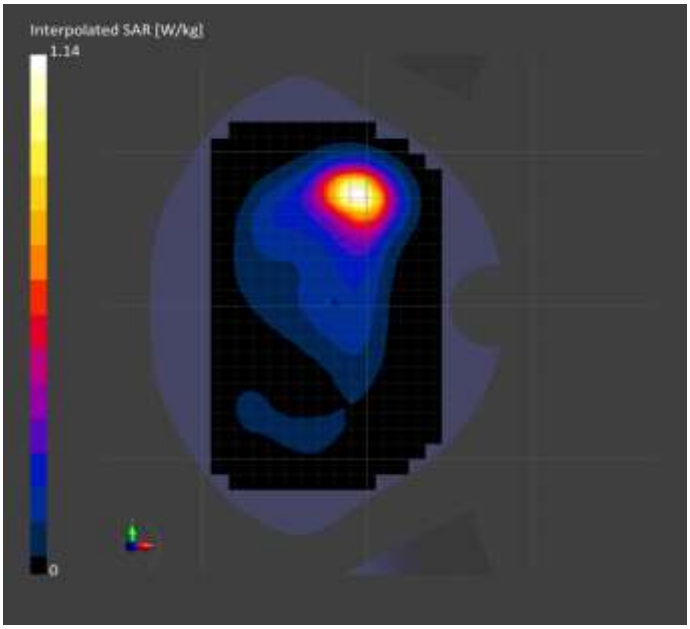
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.948	0.968
psSAR10g [W/Kg]	0.539	0.537
Power Drift [dB]	-0.00	-0.00
M2/M1 [%]		13.6
Dist 3dB Peak [mm]		57.6



Meas.16 Measurement Report for RS60, BACK, Band 4, UTRA/FDD, UID 10457 AAA, Channel 1312 (1712.4MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 4, UTRA/FDD	WCDMA, 10457-AAA	1712.4, 1312	8.45	1.405	41.886

Hardware Setup

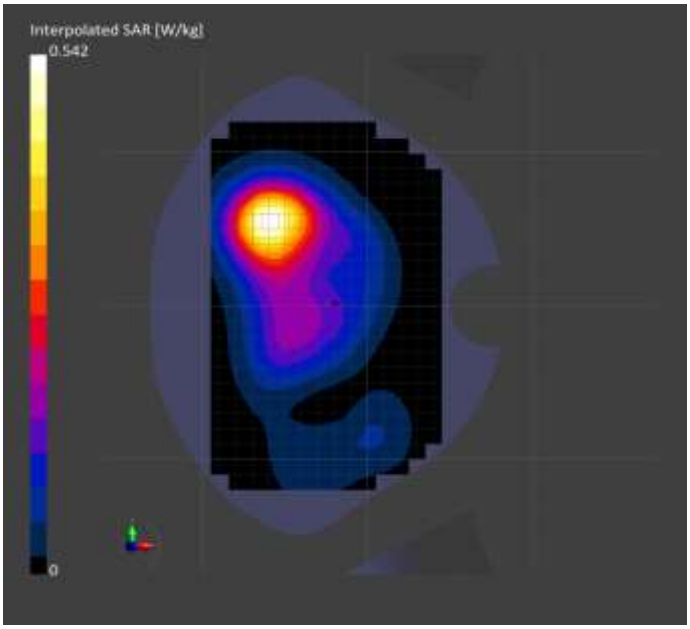
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.456	0.462
psSAR10g [W/Kg]	0.276	0.279
Power Drift [dB]	-0.06	-0.05
M2/M1 [%]		19.2
Dist 3dB Peak [mm]		60.7



Meas.17 Measurement Report for RS60, CHEEK, Band 5, UTRA/FDD, UID 10011 CAB, Channel 4233 (846.6MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 5, UTRA/FDD	WCDMA, 10011-CAB	846.6, 4233	9.79	0.943	42.794

Hardware Setup

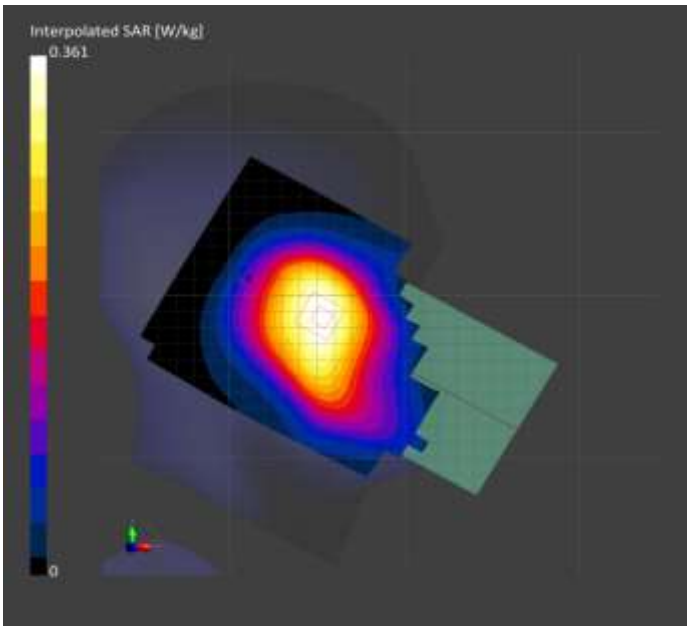
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.317	0.339
psSAR10g [W/Kg]	0.220	0.261
Power Drift [dB]	-0.02	-0.05
M2/M1 [%]		inf
Dist 3dB Peak [mm]		78.0



Meas.18 Measurement Report for RS60, FRONT, Band 5, UTRA/FDD, UID 10457 AAA, Channel 4233 (846.6MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 5, UTRA/FDD	WCDMA, 10457-AAA	846.6, 4233	9.79	0.943	42.794

Hardware Setup

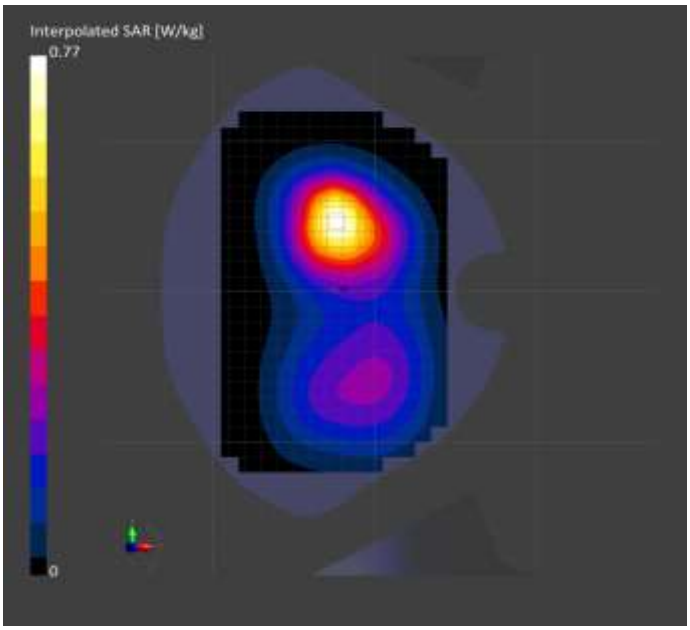
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.872	0.894
psSAR10g [W/Kg]	0.576	0.559
Power Drift [dB]	-0.04	-0.12
M2/M1 [%]		20.5
Dist 3dB Peak [mm]		60.8



Meas.19 Measurement Report for RS60, BACK, Band 5, UTRA/FDD, UID 10457 AAA, Channel 4233 (846.6MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 5, UTRA/FDD	WCDMA, 10457-AAA	846.6, 4233	9.79	0.943	42.794

Hardware Setup

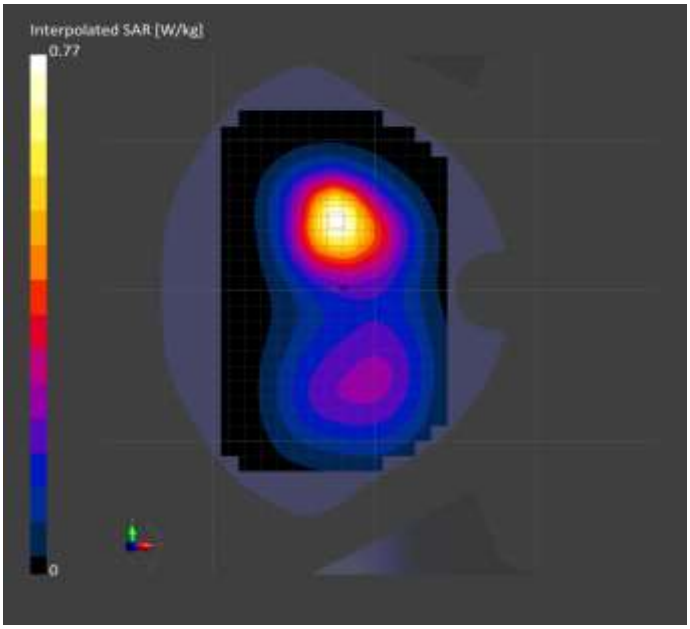
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.665	0.667
psSAR10g [W/Kg]	0.439	0.426
Power Drift [dB]	-0.07	-0.09
M2/M1 [%]		21.2
Dist 3dB Peak [mm]		63.3



Meas.20 Measurement Report for RS60, CHEEK, Band 2, E-UTRA/FDD, UID 10169 CAE, Channel 18700 (1860.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 2, E-UTRA/FDD	LTE-FDD, 10169-CAE	1860.0, 18700	8.07	1.432	41.324

Hardware Setup

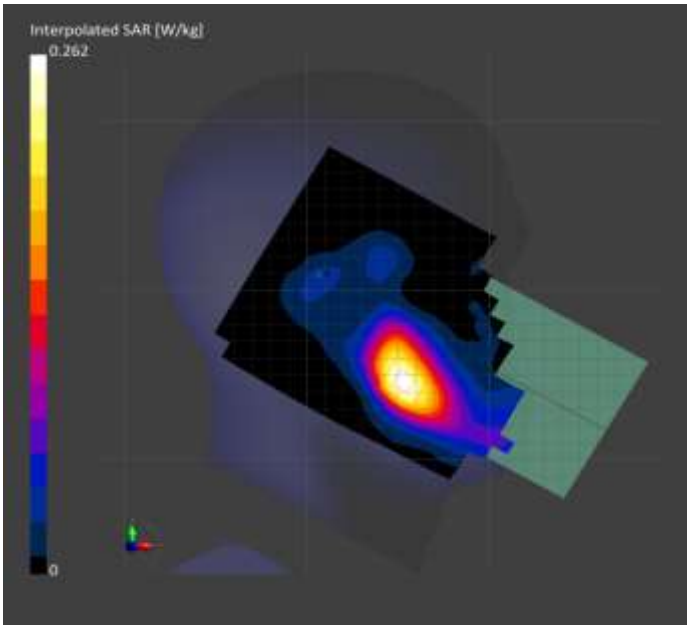
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.216	0.223
psSAR10g [W/Kg]	0.124	0.136
Power Drift [dB]	0.19	-0.12
M2/M1 [%]		13.0
Dist 3dB Peak [mm]		67.0



Meas.21 Measurement Report for RS60, FRONT, Band 2, E-UTRA/FDD, UID 10169 CAE, Channel 18900 (1880.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 2, E-UTRA/FDD	LTE-FDD, 10169-CAE	1880.0, 18900	8.07	1.427	41.252

Hardware Setup

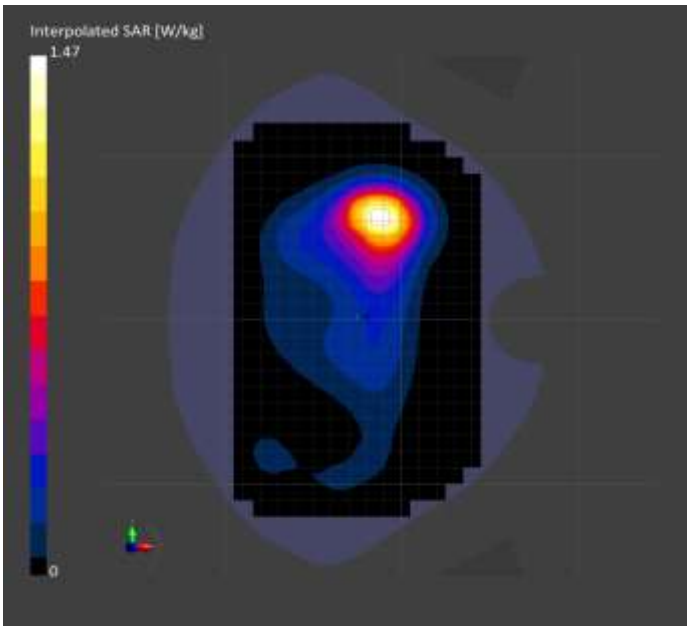
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	1.22	1.26
psSAR10g [W/Kg]	0.687	0.686
Power Drift [dB]	-0.00	0.03
M2/M1 [%]		13.3
Dist 3dB Peak [mm]		56.4



Meas.22 Measurement Report for RS60, BACK, Band 2, E-UTRA/FDD, UID 10169 CAE, Channel 18700 (1860.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 2, E-UTRA/FDD	LTE-FDD, 10169-CAE	1860.0, 18700	8.07	1.432	41.324

Hardware Setup

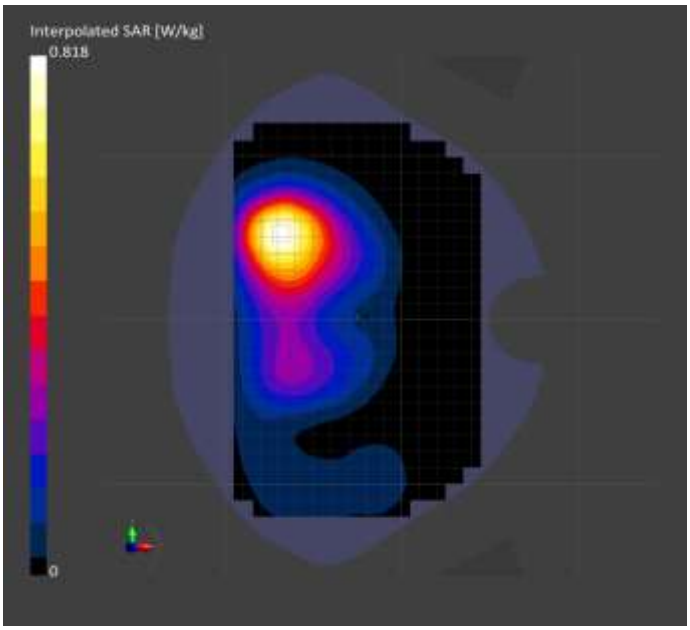
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.687	0.700
psSAR10g [W/Kg]	0.413	0.414
Power Drift [dB]	-0.11	-0.10
M2/M1 [%]		18.4
Dist 3dB Peak [mm]		58.4



Meas.23 Measurement Report for RS60, CHEEK, Band 4, E-UTRA/FDD, UID 10169 CAE, Channel 20050 (1720.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 4, E-UTRA/FDD	LTE-FDD, 10169-CAE	1720.0, 20050	8.45	1.413	41.749

Hardware Setup

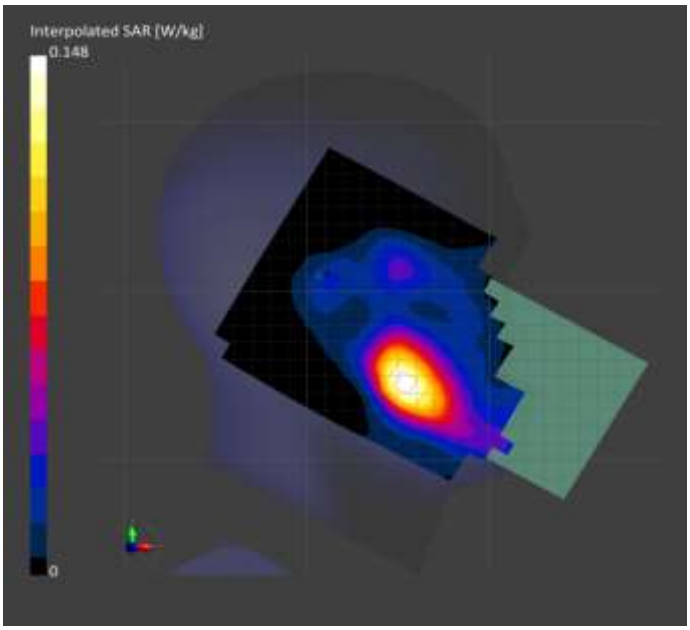
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.124	0.131
psSAR10g [W/Kg]	0.073	0.082
Power Drift [dB]	-0.15	-0.11
M2/M1 [%]		12.4
Dist 3dB Peak [mm]		69.0



Meas.24 Measurement Report for RS60, FRONT, Band 4, E-UTRA/FDD, UID 10169 CAE, Channel 20175 (1732.5MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 4, E-UTRA/FDD	LTE-FDD, 10169-CAE	1732.5, 20175	8.45	1.387	41.077

Hardware Setup

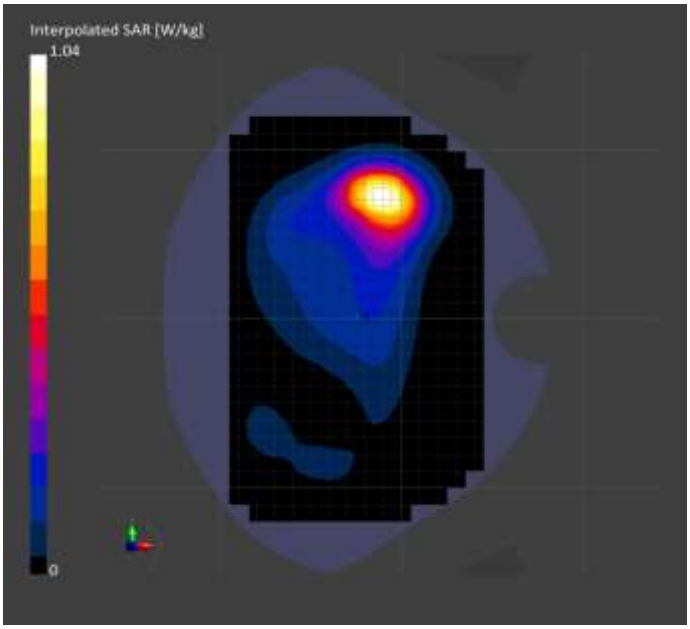
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.861	0.884
psSAR10g [W/Kg]	0.490	0.486
Power Drift [dB]	-0.15	0.02
M2/M1 [%]		13.3
Dist 3dB Peak [mm]		57.0



Meas.25 Measurement Report for RS60, BACK, Band 4, E-UTRA/FDD, UID 10169 CAE, Channel 20050 (1720.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 4, E-UTRA/FDD	LTE-FDD, 10169-CAE	1720.0, 20050	8.45	1.413	41.749

Hardware Setup

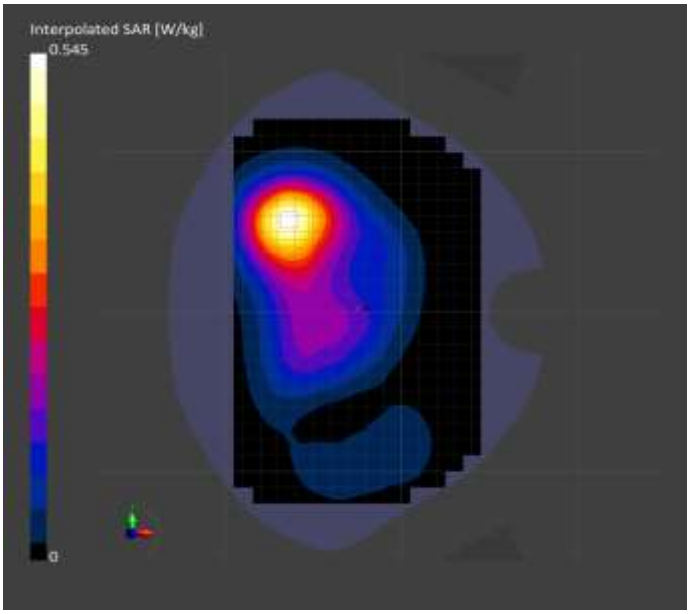
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.453	0.458
psSAR10g [W/Kg]	0.273	0.275
Power Drift [dB]	-0.10	-0.07
M2/M1 [%]		18.0
Dist 3dB Peak [mm]		60.0



Meas.26 Measurement Report for RS60, CHEEK, Band 5, E-UTRA/FDD, UID 10175 CAG, Channel 20450 (829.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 5, E-UTRA/FDD	LTE-FDD, 10175-CAG	829.0, 20450	9.79	0.916	42.469

Hardware Setup

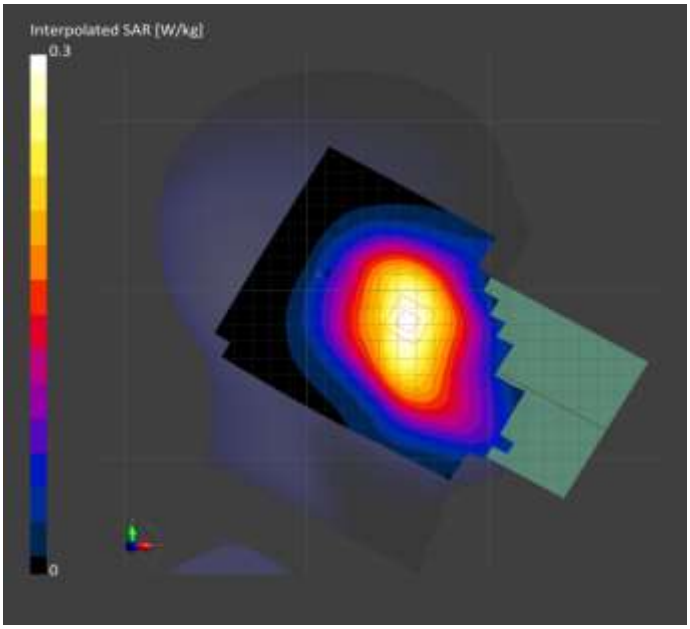
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.260	0.274
psSAR10g [W/Kg]	0.177	0.206
Power Drift [dB]	-0.18	0.02
M2/M1 [%]		inf
Dist 3dB Peak [mm]		75.0



Meas.27 Measurement Report for RS60, FRONT, Band 5, E-UTRA/FDD, UID 10175 CAG, Channel 20450 (829.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 5, E-UTRA/FDD	LTE-FDD, 10175-CAG	829.0, 20450	9.79	0.916	42.469

Hardware Setup

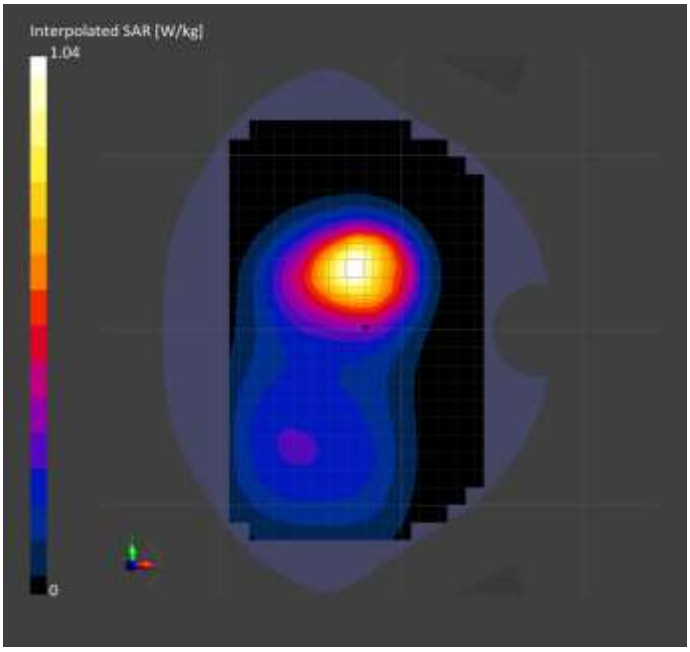
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.898	0.899
psSAR10g [W/Kg]	0.589	0.556
Power Drift [dB]	-0.18	-0.14
M2/M1 [%]		17.9
Dist 3dB Peak [mm]		58.2



Meas.28 Measurement Report for RS60, BACK, Band 5, E-UTRA/FDD, UID 10175 CAG, Channel 20450 (829.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 5, E-UTRA/FDD	LTE-FDD, 10175-CAG	829.0, 20450	9.79	0.916	42.469

Hardware Setup

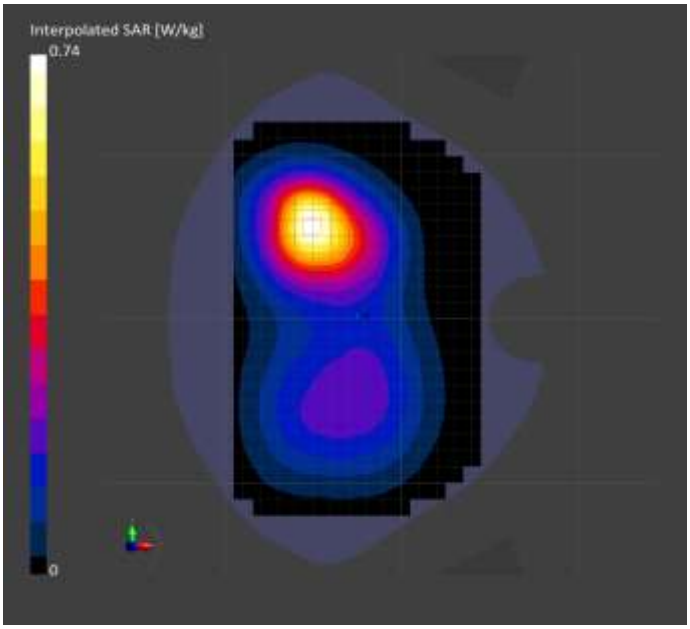
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.643	0.648
psSAR10g [W/Kg]	0.427	0.407
Power Drift [dB]	-0.07	-0.03
M2/M1 [%]		20.5
Dist 3dB Peak [mm]		61.4



Meas.29 Measurement Report for RS60, CHEEK, Band 7, E-UTRA/FDD, UID 10169 CAE, Channel 21100 (2535.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 7, E-UTRA/FDD	LTE-FDD, 10169-CAE	2535.0, 21100	7.65	1.969	40.805

Hardware Setup

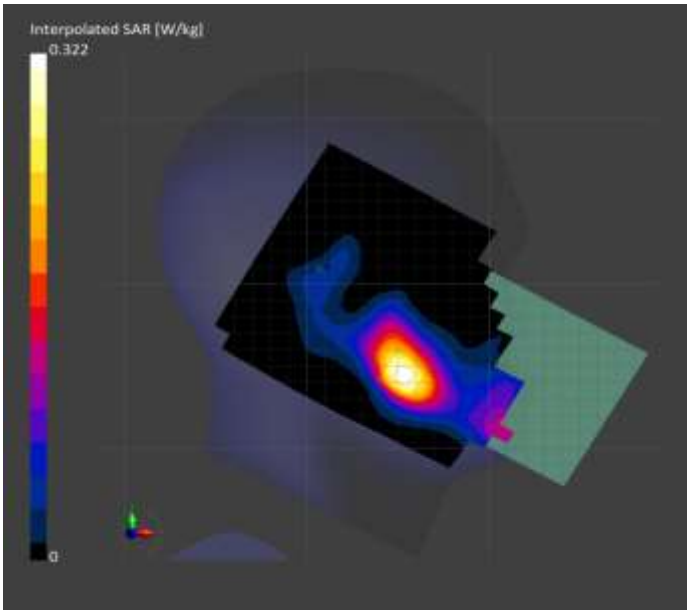
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.256	0.266
psSAR10g [W/Kg]	0.133	0.142
Power Drift [dB]	-0.16	-0.02
M2/M1 [%]		11.7
Dist 3dB Peak [mm]		57.9



Meas.30 Measurement Report for RS60, FRONT, Band 7, E-UTRA/FDD, UID 10169 CAE, Channel 20850 (2510.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 7, E-UTRA/FDD	LTE-FDD, 10169-CAE	2510.0, 20850	7.65	1.942	40.714

Hardware Setup

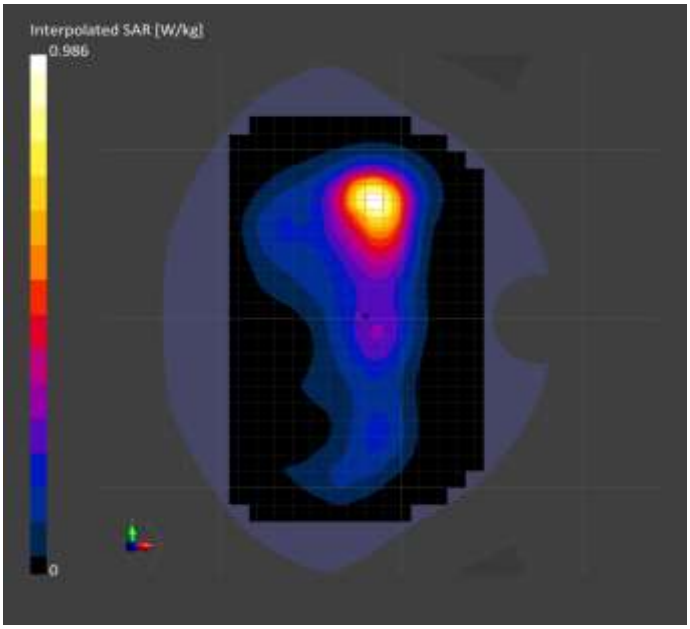
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.775	0.765
psSAR10g [W/Kg]	0.406	0.393
Power Drift [dB]	-0.09	0.11
M2/M1 [%]		14.1
Dist 3dB Peak [mm]		50.1



Meas.31 Measurement Report for RS60, BACK, Band 7, E-UTRA/FDD, UID 10169 CAE, Channel 21100 (2535.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 7, E-UTRA/FDD	LTE-FDD, 10169-CAE	2535.0, 21100	7.65	1.969	40.805

Hardware Setup

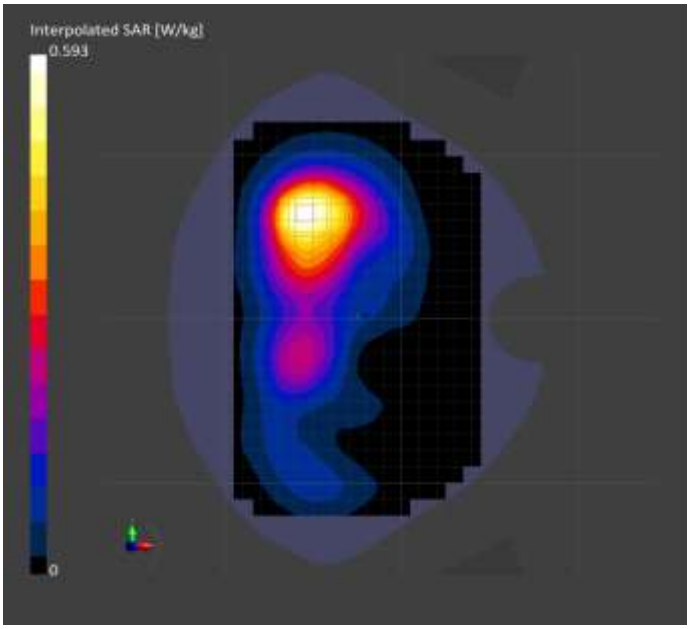
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.482	0.476
psSAR10g [W/Kg]	0.271	0.263
Power Drift [dB]	-0.12	-0.15
M2/M1 [%]		15.6
Dist 3dB Peak [mm]		51.1



Meas.32 Measurement Report for RS60, CHEEK, Band 12, E-UTRA/FDD, UID 10175 CAG, Channel 23060 (704.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 12, E-UTRA/FDD	LTE-FDD, 10175-CAG	704.0, 23060	10.16	0.913	42.849

Hardware Setup

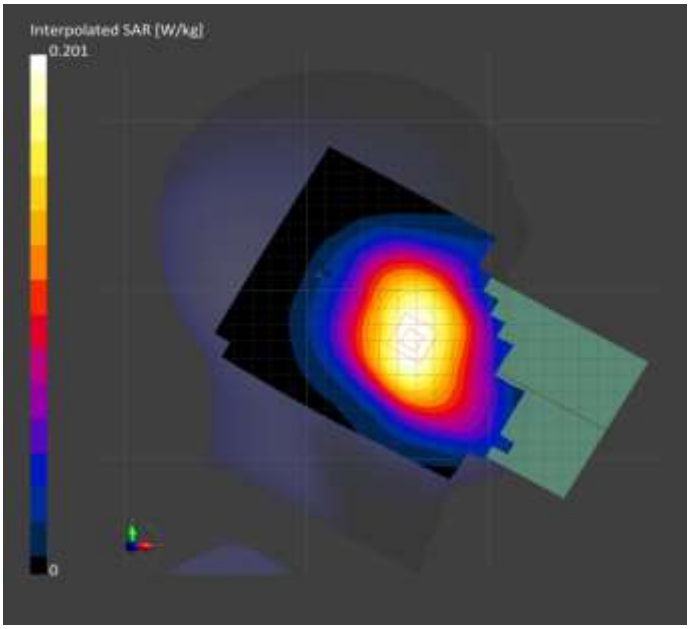
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.178	0.187
psSAR10g [W/Kg]	0.125	0.145
Power Drift [dB]	-0.14	0.02
M2/M1 [%]		inf
Dist 3dB Peak [mm]		78.9



Meas.33 Measurement Report for RS60, FRONT, Band 12, E-UTRA/FDD, UID 10175 CAG, Channel 23060 (704.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 12, E-UTRA/FDD	LTE-FDD, 10175-CAG	704.0, 23060	10.16	0.913	42.849

Hardware Setup

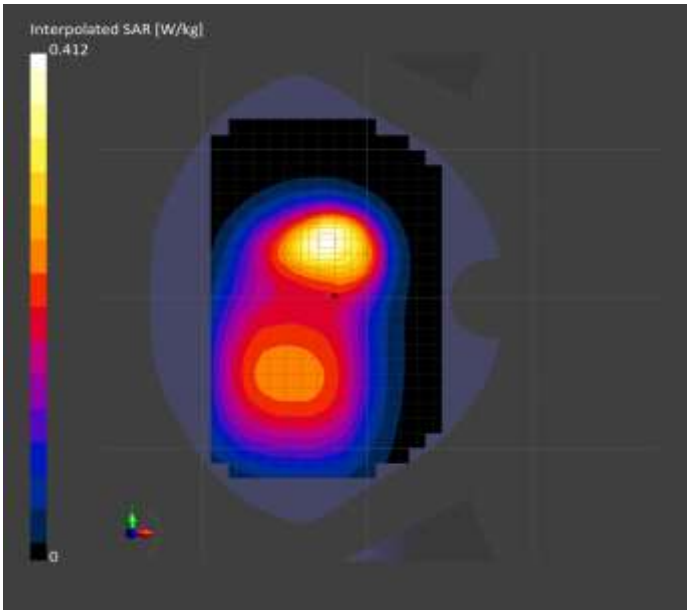
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.356	0.335
psSAR10g [W/Kg]	0.240	0.211
Power Drift [dB]	-0.04	-0.05
M2/M1 [%]		19.2
Dist 3dB Peak [mm]		59.3



Meas.34 Measurement Report for RS60, BACK, Band 12, E-UTRA/FDD, UID 10175 CAG, Channel 23060 (704.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 12, E-UTRA/FDD	LTE-FDD, 10175-CAG	704.0, 23060	10.16	0.913	42.849

Hardware Setup

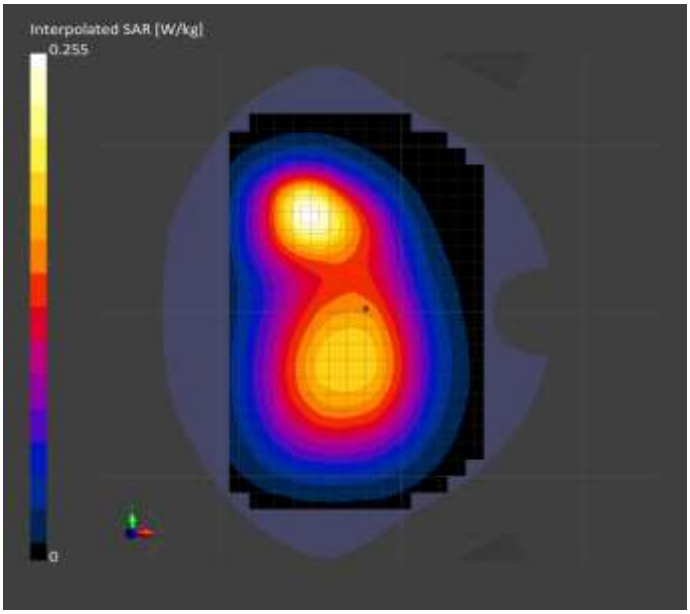
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.222	0.218
psSAR10g [W/Kg]	0.150	0.138
Power Drift [dB]	-0.06	-0.00
M2/M1 [%]		20.5
Dist 3dB Peak [mm]		60.7



Meas.35 Measurement Report for RS60, CHEEK, Band 13, E-UTRA/FDD, UID 10175 CAG, Channel 23230 (782.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 13, E-UTRA/FDD	LTE-FDD, 10175-CAG	782.0, 23230	10.16	0.863	42.747

Hardware Setup

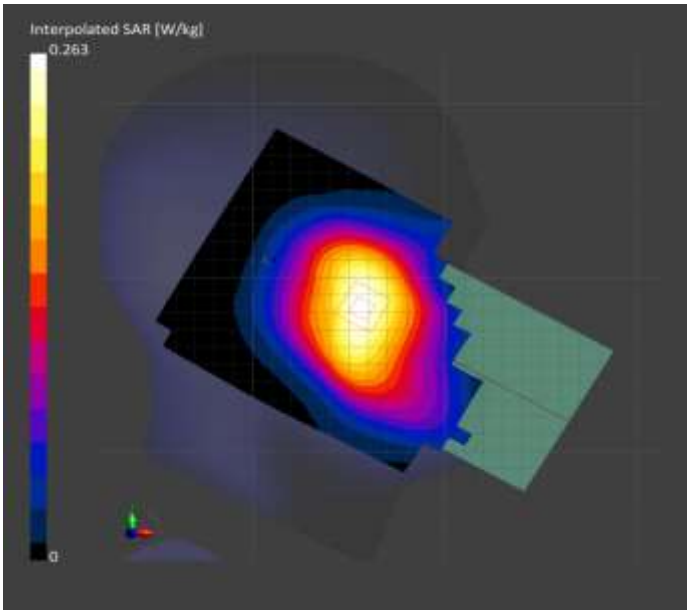
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.229	0.241
psSAR10g [W/Kg]	0.157	0.183
Power Drift [dB]	-0.05	0.01
M2/M1 [%]		inf
Dist 3dB Peak [mm]		77.2



Meas.36 Measurement Report for RS60, FRONT, Band 13, E-UTRA/FDD, UID 10175 CAG, Channel 23230 (782.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 13, E-UTRA/FDD	LTE-FDD, 10175-CAG	782.0, 23230	10.16	0.863	42.747

Hardware Setup

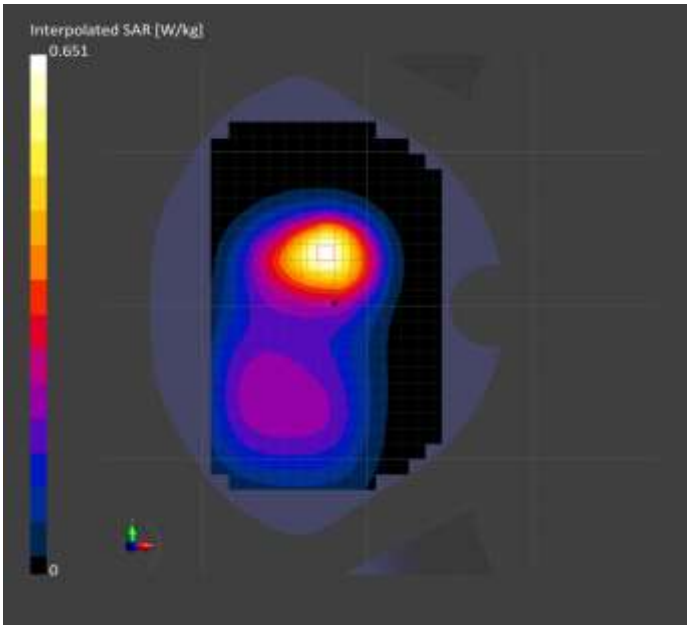
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.567	0.566
psSAR10g [W/Kg]	0.377	0.356
Power Drift [dB]	-0.15	-0.14
M2/M1 [%]		19.8
Dist 3dB Peak [mm]		60.2



Meas.37 Measurement Report for RS60, BACK, Band 13, E-UTRA/FDD, UID 10175 CAG, Channel 23230 (782.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 13, E-UTRA/FDD	LTE-FDD, 10175-CAG	782.0, 23230	10.16	0.863	42.747

Hardware Setup

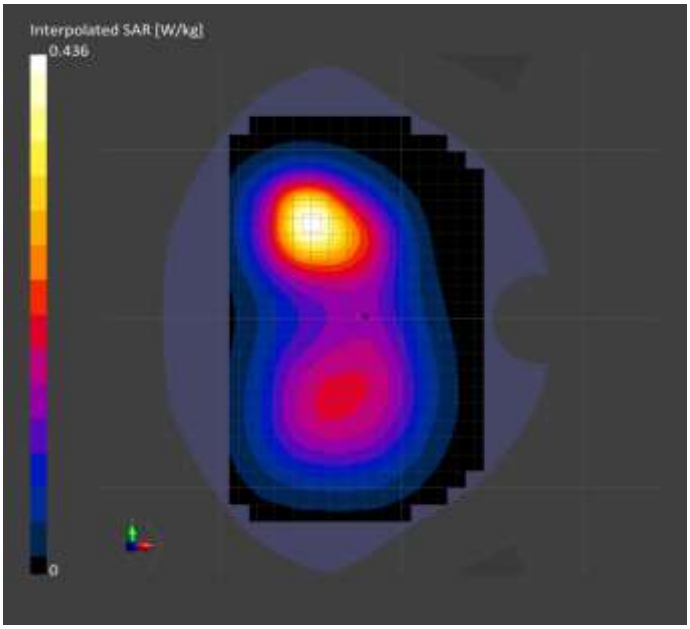
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.380	0.377
psSAR10g [W/Kg]	0.254	0.238
Power Drift [dB]	-0.10	-0.01
M2/M1 [%]		21.2
Dist 3dB Peak [mm]		61.6



Meas.38 Measurement Report for RS60, CHEEK, Band 14, E-UTRA/FDD, UID 10175 CAG, Channel 23330 (793.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 14, E-UTRA/FDD	LTE-FDD, 10175-CAG	793.0, 23330	10.16	0.875	43.546

Hardware Setup

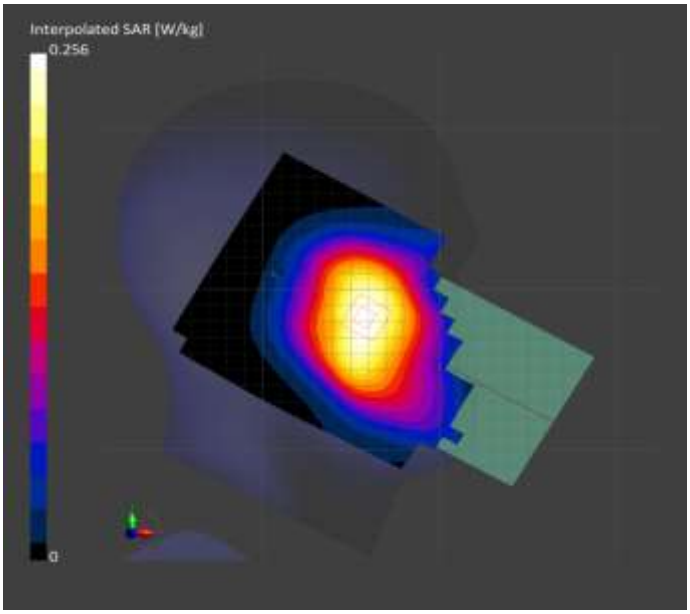
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.224	0.235
psSAR10g [W/Kg]	0.155	0.183
Power Drift [dB]	-0.20	-0.18
M2/M1 [%]		inf
Dist 3dB Peak [mm]		79.2



Meas.39 Measurement Report for RS60, FRONT, Band 14, E-UTRA/FDD, UID 10175 CAG, Channel 23330 (793.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 14, E-UTRA/FDD	LTE-FDD, 10175-CAG	793.0, 23330	10.16	0.875	43.546

Hardware Setup

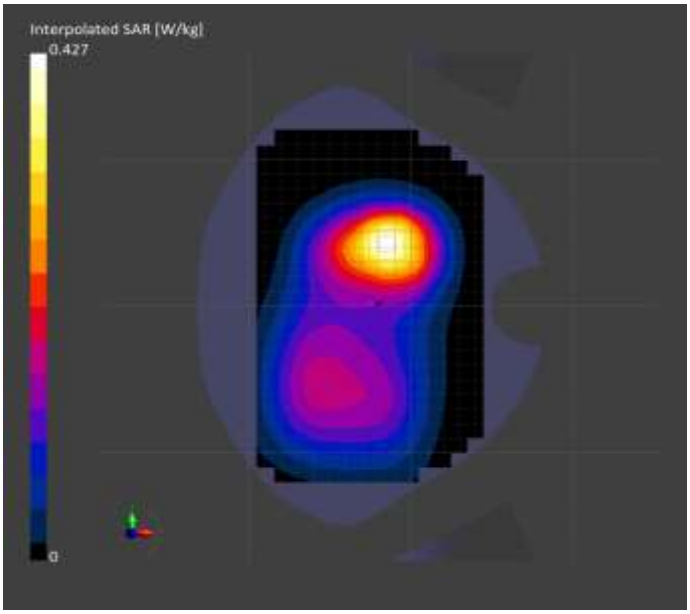
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.371	0.374
psSAR10g [W/Kg]	0.248	0.237
Power Drift [dB]	-0.07	-0.04
M2/M1 [%]		22.2
Dist 3dB Peak [mm]		61.3



Meas.40 Measurement Report for RS60, BACK, Band 14, E-UTRA/FDD, UID 10175 CAG, Channel 23330 (793.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 14, E-UTRA/FDD	LTE-FDD, 10175-CAG	793.0, 23330	10.16	0.875	43.546

Hardware Setup

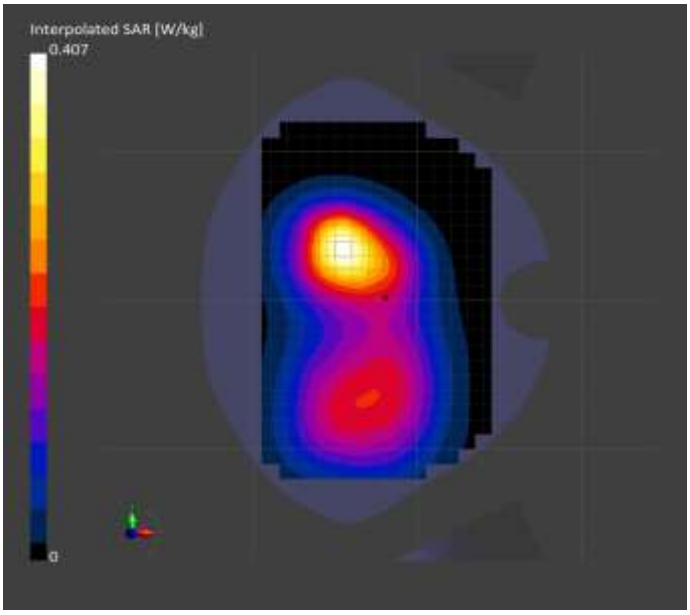
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.355	0.354
psSAR10g [W/Kg]	0.236	0.227
Power Drift [dB]	-0.12	-0.08
M2/M1 [%]		21.9
Dist 3dB Peak [mm]		63.8



Meas.41 Measurement Report for RS60, CHEEK, Band 25, E-UTRA/FDD, UID 10169 CAE, Channel 26590 (1905.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 25, E-UTRA/FDD	LTE-FDD, 10169-CAE	1905.0, 26590	8.07	1.443	40.973

Hardware Setup

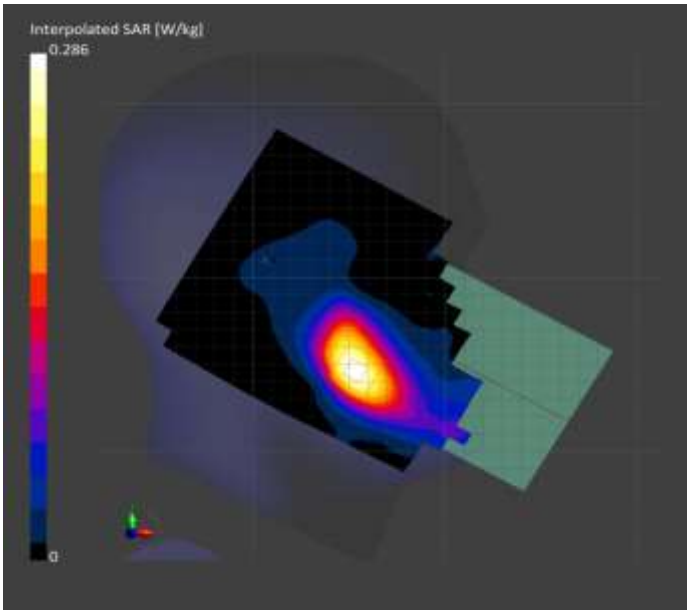
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.236	0.244
psSAR10g [W/Kg]	0.135	0.148
Power Drift [dB]	-0.12	-0.01
M2/M1 [%]		11.1
Dist 3dB Peak [mm]		66.8



Meas.42 Measurement Report for RS60, FRONT, Band 25, E-UTRA/FDD, UID 10169 CAE, Channel 26590 (1905.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 25, E-UTRA/FDD	LTE-FDD, 10169-CAE	1905.0, 26590	8.07	1.443	40.974

Hardware Setup

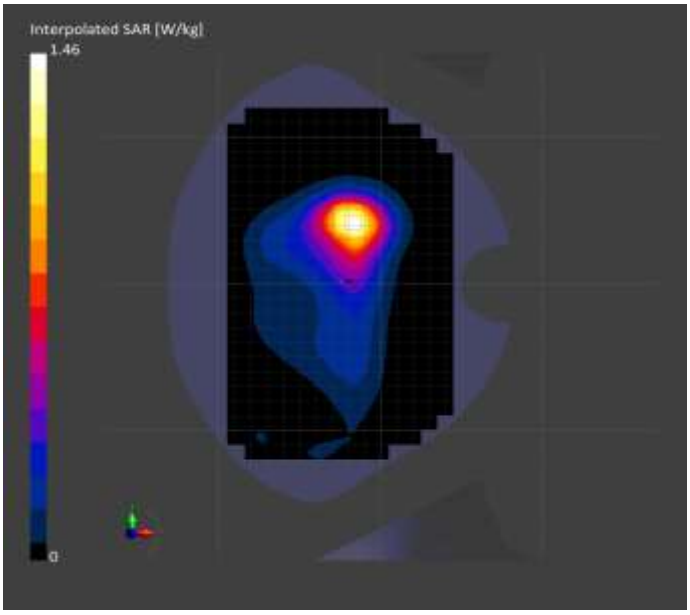
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	1.19	1.22
psSAR10g [W/Kg]	0.656	0.664
Power Drift [dB]	-0.03	-0.04
M2/M1 [%]		13.3
Dist 3dB Peak [mm]		56.1



Meas.43 Measurement Report for RS60, BACK, Band 25, E-UTRA/FDD, UID 10169 CAE, Channel 26590 (1905.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 25, E-UTRA/FDD	LTE-FDD, 10169-CAE	1905.0, 26590	8.07	1.443	40.974

Hardware Setup

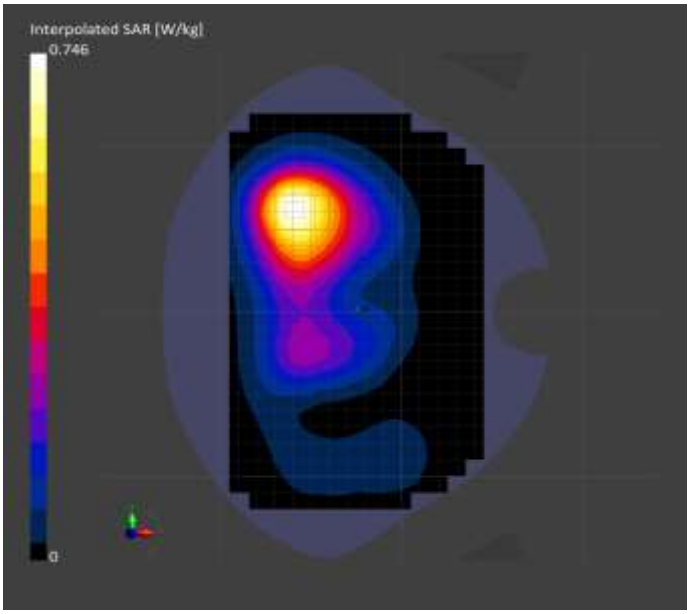
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.625	0.629
psSAR10g [W/Kg]	0.374	0.372
Power Drift [dB]	-0.01	-0.02
M2/M1 [%]		17.5
Dist 3dB Peak [mm]		57.3



Meas.44 Measurement Report for RS60, CHEEK, Band 26 E-UTRA/FDD, UID 10181 CAE, Channel 26965 (841.5MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 26 E-UTRA/FDD	LTE-FDD, 10181-CAE	841.5, 26965	9.79	0.941	42.642

Hardware Setup

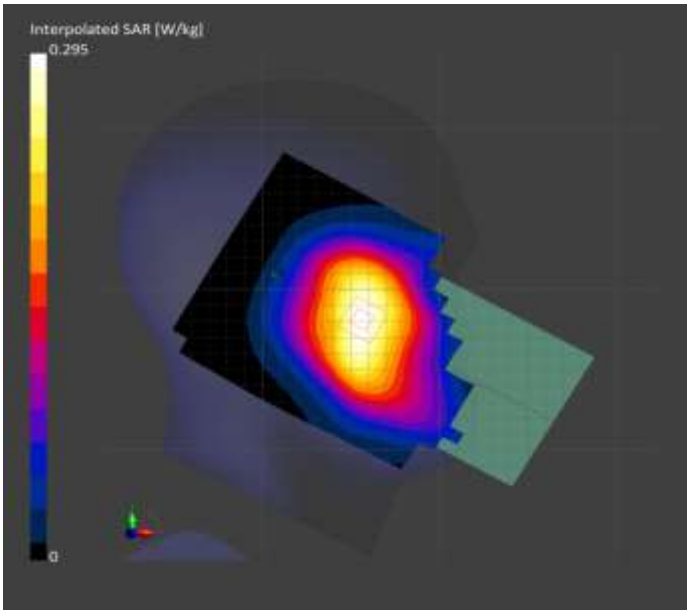
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.257	0.273
psSAR10g [W/Kg]	0.176	0.209
Power Drift [dB]	0.04	0.07
M2/M1 [%]		inf
Dist 3dB Peak [mm]		77.0



Meas.45 Measurement Report for RS60, FRONT, Band 26 E-UTRA/FDD, UID 10181 CAE, Channel 26965 (841.5MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 26 E-UTRA/FDD	LTE-FDD, 10181-CAE	841.5, 26965	9.79	0.941	42.642

Hardware Setup

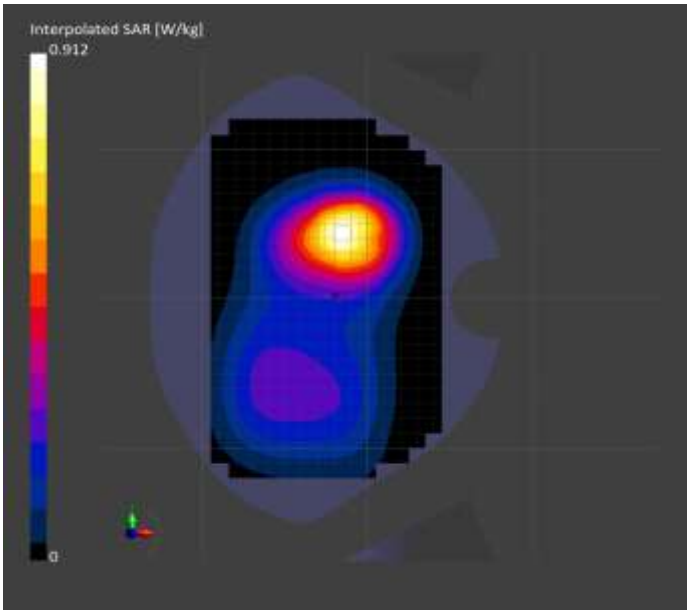
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.783	0.804
psSAR10g [W/Kg]	0.514	0.502
Power Drift [dB]	-0.10	-0.07
M2/M1 [%]		20.6
Dist 3dB Peak [mm]		60.3



Meas.46 Measurement Report for RS60, BACK, Band 26 E-UTRA/FDD, UID 10181 CAE, Channel 26965 (841.5MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 26 E-UTRA/FDD	LTE-FDD, 10181-CAE	841.5, 26965	9.79	0.941	42.642

Hardware Setup

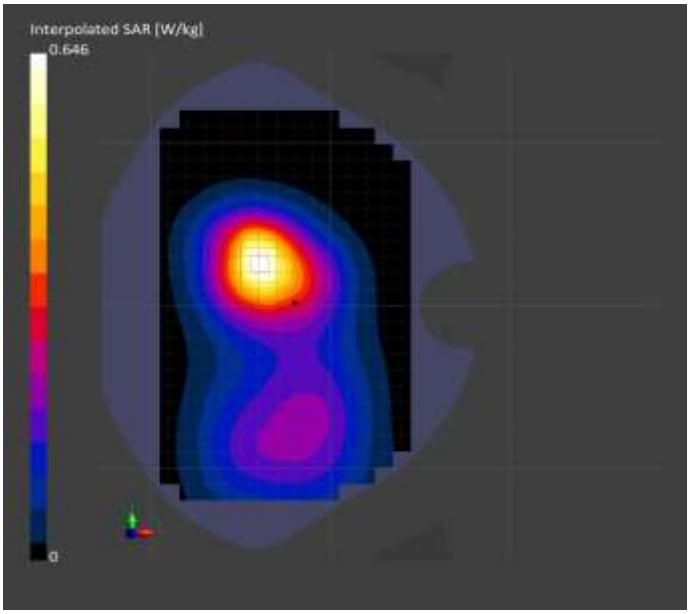
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.563	0.572
psSAR10g [W/Kg]	0.373	0.365
Power Drift [dB]	-0.14	-0.14
M2/M1 [%]		20.5
Dist 3dB Peak [mm]		63.0



Meas.47 Measurement Report for RS60, CHEEK, Band 26 E-UTRA/FDD, UID 10175 CAG, Channel 26740 (819.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 26 E-UTRA/FDD	LTE-FDD, 10175-CAG	819.0, 26740	9.79	0.882	42.531

Hardware Setup

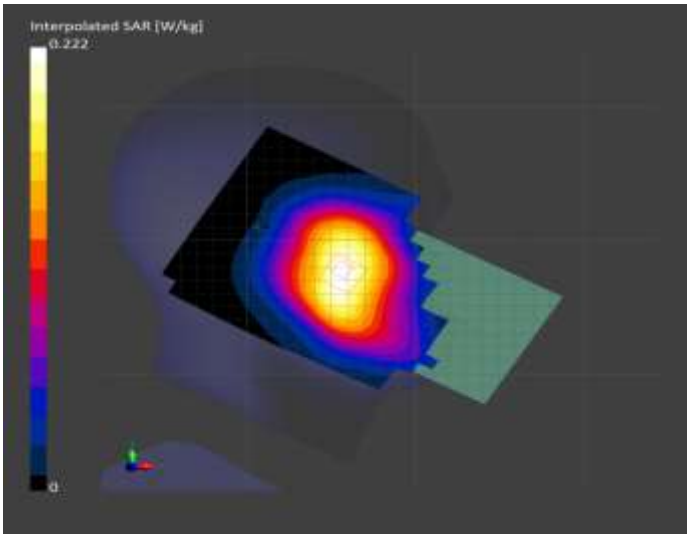
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.193	0.204
psSAR10g [W/Kg]	0.133	0.156
Power Drift [dB]	-0.14	-0.16
M2/M1 [%]		inf
Dist 3dB Peak [mm]		77.1



Meas.48 Measurement Report for RS60, FRONT, Band 26 E-UTRA/FDD, UID 10175 CAG, Channel 26740 (819.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 26 E-UTRA/FDD	LTE-FDD, 10175-CAG	819.0, 26740	9.79	0.882	42.531

Hardware Setup

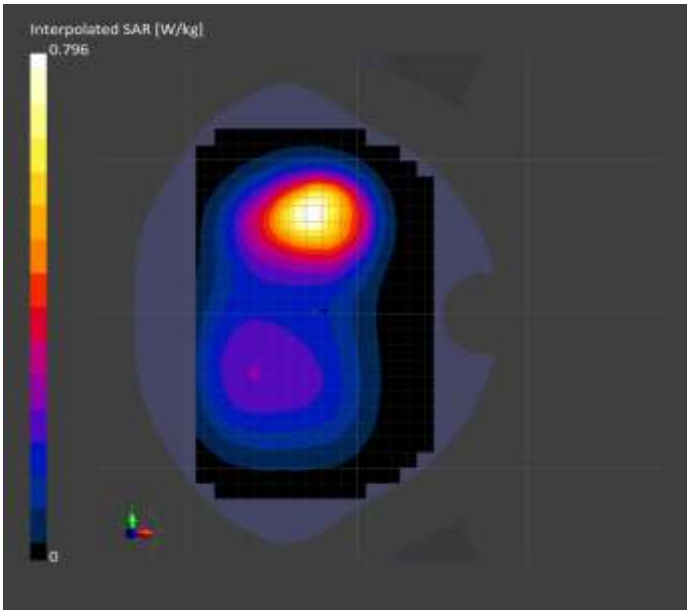
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.691	0.692
psSAR10g [W/Kg]	0.457	0.428
Power Drift [dB]	-0.08	-0.10
M2/M1 [%]		18.4
Dist 3dB Peak [mm]		57.7



Meas.49 Measurement Report for RS60, BACK, Band 26 E-UTRA/FDD, UID 10175 CAG, Channel 26740 (819.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	/	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 26 E-UTRA/FDD	LTE-FDD, 10175-CAG	819.0, 26740	9.79	0.882	42.531

Hardware Setup

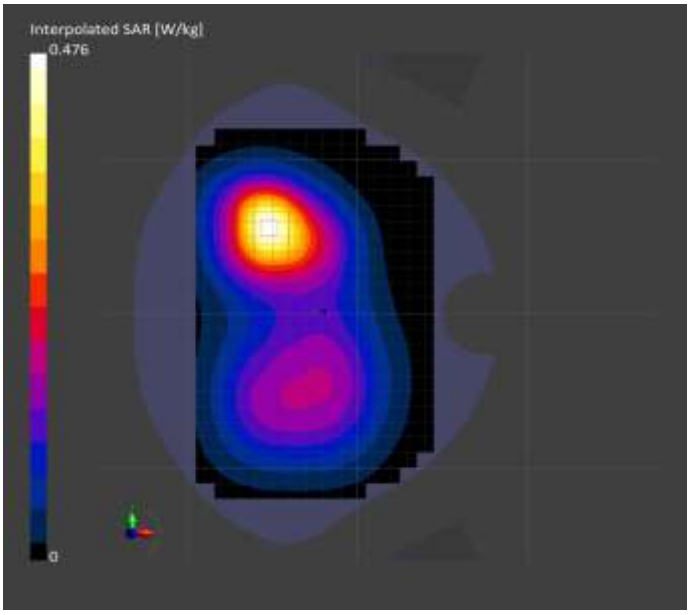
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.413	0.407
psSAR10g [W/Kg]	0.274	0.258
Power Drift [dB]	-0.07	0.00
M2/M1 [%]		21.2
Dist 3dB Peak [mm]		61.1



Meas.50 Measurement Report for RS60, CHEEK, Band 38, E-UTRA/TDD, UID 10172 CAG, Channel 38150 (2610.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 38, E-UTRA/TDD	LTE-TDD, 10172-CAG	2610.0, 38150	7.45	2.033	40.569

Hardware Setup

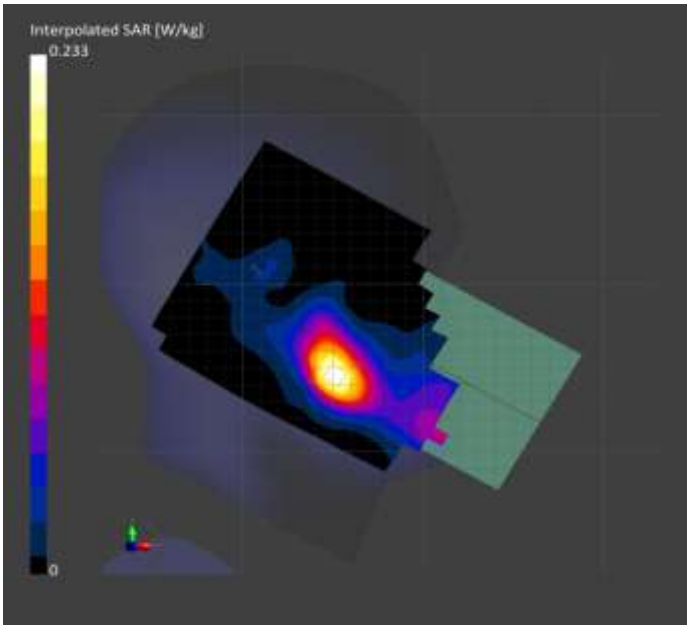
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.184	0.187
psSAR10g [W/Kg]	0.094	0.101
Power Drift [dB]	-0.19	-0.13
M2/M1 [%]		11.9
Dist 3dB Peak [mm]		57.9



Meas.51 Measurement Report for RS60, FRONT, Band 38, E-UTRA/TDD, UID 10172 CAG, Channel 38150 (2610.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 38, E-UTRA/TDD	LTE-TDD, 10172-CAG	2610.0, 38150	7.45	2.033	40.569

Hardware Setup

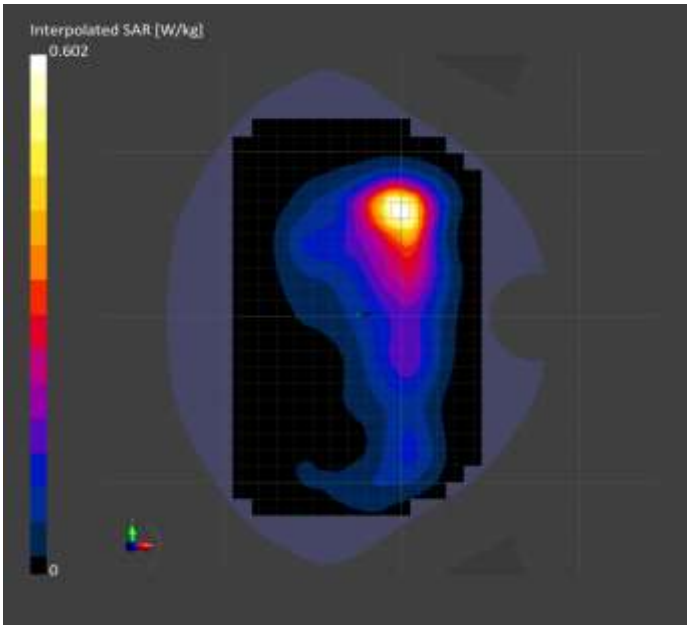
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.484	0.484
psSAR10g [W/Kg]	0.250	0.244
Power Drift [dB]	-0.02	-0.02
M2/M1 [%]		13.9
Dist 3dB Peak [mm]		49.1



Meas.52 Measurement Report for RS60, BACK, Band 38, E-UTRA/TDD, UID 10172 CAG, Channel 38150 (2610.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 38, E-UTRA/TDD	LTE-TDD, 10172-CAG	2610.0, 38150	7.45	2.033	40.569

Hardware Setup

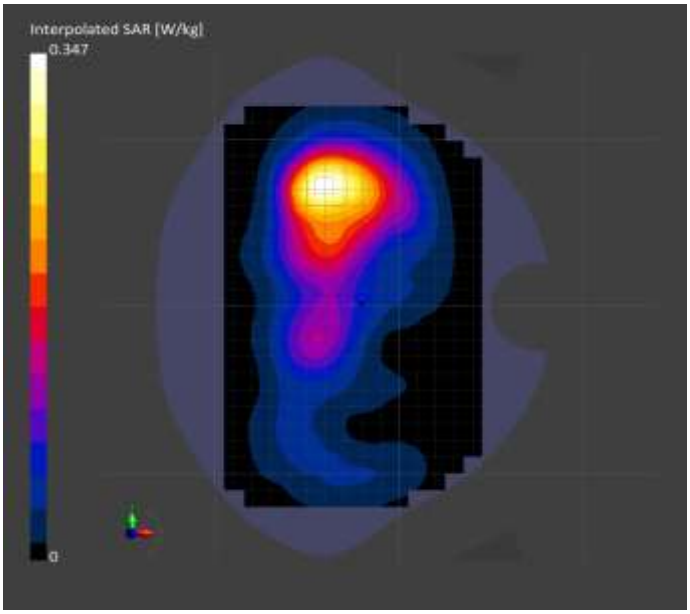
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.279	0.269
psSAR10g [W/Kg]	0.153	0.149
Power Drift [dB]	-0.17	-0.15
M2/M1 [%]		16.6
Dist 3dB Peak [mm]		50.6



Meas.53 Measurement Report for 7162S, CHEEK, Band 41, E-UTRA/TDD, UID 10172 CAG, Channel 41490 (2680.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
7162S,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 41, E-UTRA/TDD	LTE-TDD, 10172-CAG	2680.0, 41490	7.45	2.032	40.573

Hardware Setup

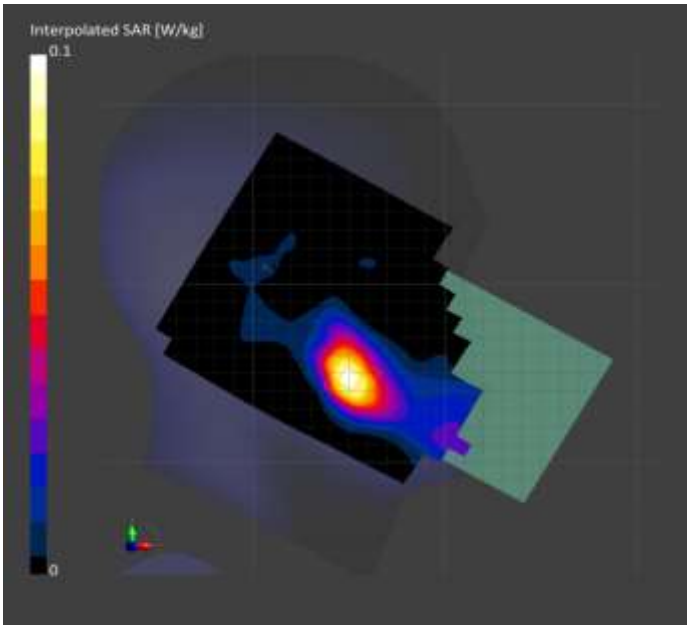
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.076	0.077
psSAR10g [W/Kg]	0.037	0.039
Power Drift [dB]	0.16	-0.19
M2/M1 [%]		-inf
Dist 3dB Peak [mm]		-368.0



Meas.54 Measurement Report for RS60, FRONT, Band 41, E-UTRA/TDD, UID 10172 CAG, Channel 41490 (2680.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 41, E-UTRA/TDD	LTE-TDD, 10172-CAG	2680.0, 41490	7.45	2.032	40.573

Hardware Setup

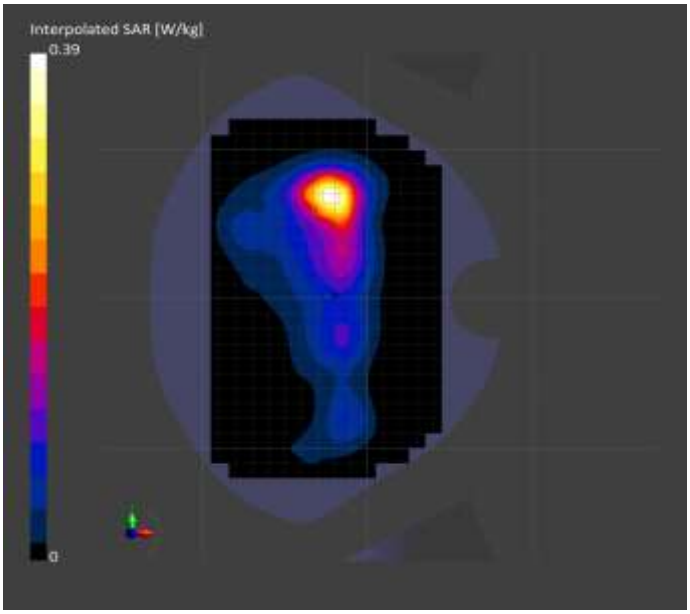
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.306	0.301
psSAR10g [W/Kg]	0.153	0.148
Power Drift [dB]	-0.16	0.09
M2/M1 [%]		13.5
Dist 3dB Peak [mm]		48.2



Meas.55 Measurement Report for RS60, BACK, Band 41, E-UTRA/TDD, UID 10172 CAG, Channel 41490 (2680.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 41, E-UTRA/TDD	LTE-TDD, 10172-CAG	2680.0, 41490	7.45	2.032	40.573

Hardware Setup

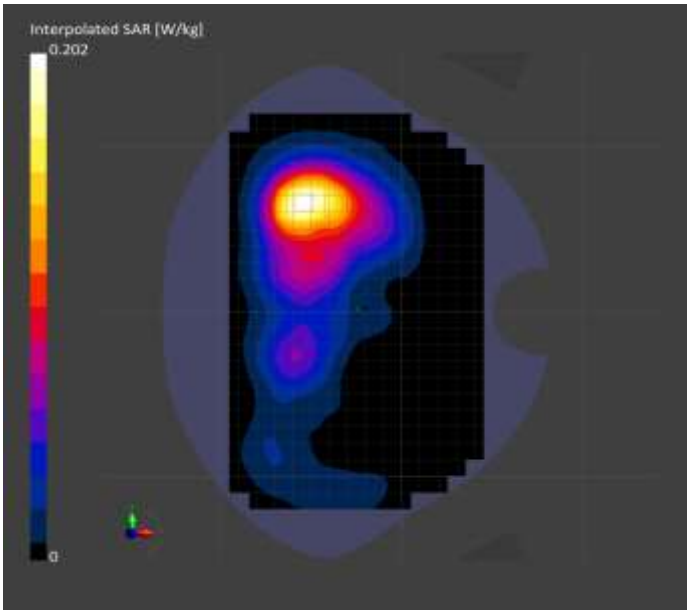
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.162	0.158
psSAR10g [W/Kg]	0.087	0.084
Power Drift [dB]	-0.16	-0.15
M2/M1 [%]		15.0
Dist 3dB Peak [mm]		49.1



Meas.56 Measurement Report for RS60, CHEEK, Band 66, E-UTRA/FDD, UID 10169 CAE, Channel 132072 (1720.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	Band 66, E-UTRA/FDD	LTE-FDD, 10169-CAE	1720.0, 132072	8.45	1.413	41.749

Hardware Setup

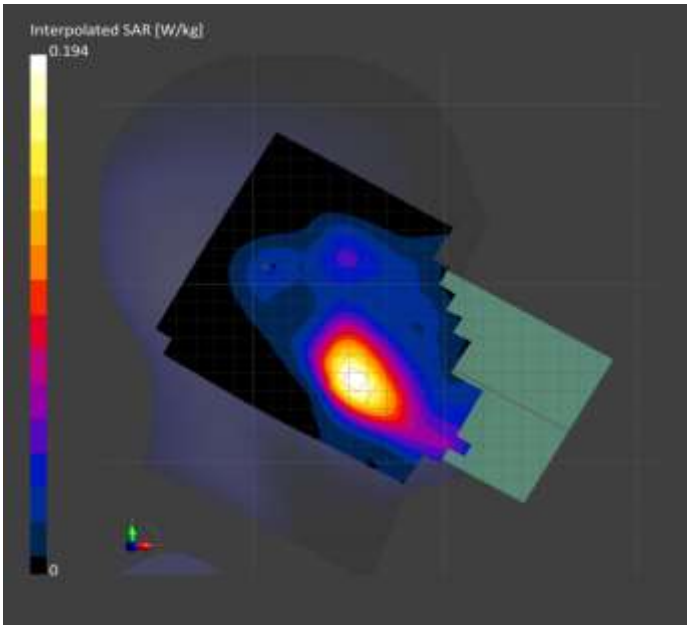
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.162	0.166
psSAR10g [W/Kg]	0.094	0.104
Power Drift [dB]	-0.20	0.07
M2/M1 [%]		13.0
Dist 3dB Peak [mm]		69.0



Meas.57 Measurement Report for RS60, FRONT, Band 66, E-UTRA/FDD, UID 10169 CAE, Channel 132572 (1770.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	Band 66, E-UTRA/FDD	LTE-FDD, 10169-CAE	1770.0, 132572	8.45	1.388	40.892

Hardware Setup

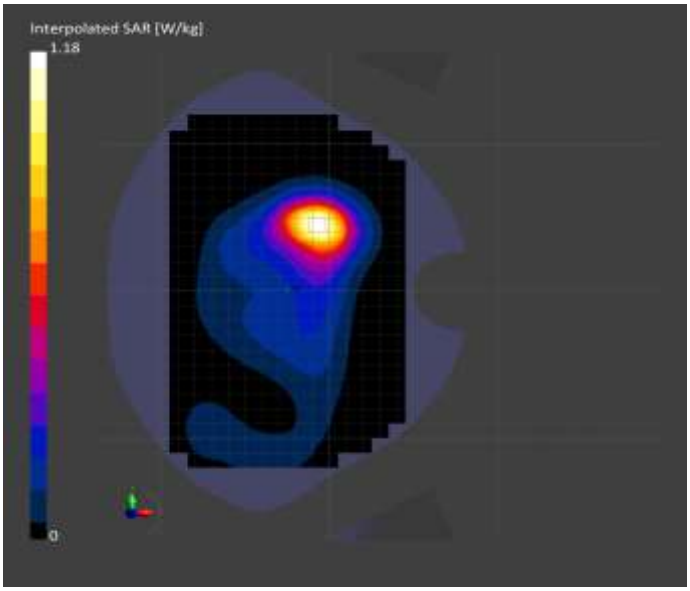
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.982	1.04
psSAR10g [W/Kg]	0.559	0.574
Power Drift [dB]	0.10	0.03
M2/M1 [%]		13.3
Dist 3dB Peak [mm]		56.0



Meas.58 Measurement Report for RS60, BACK, Band 66, E-UTRA/FDD, UID 10169 CAE, Channel 132072 (1720.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	Band 66, E-UTRA/FDD	LTE-FDD, 10169-CAE	1720.0, 132072	8.45	1.413	41.749

Hardware Setup

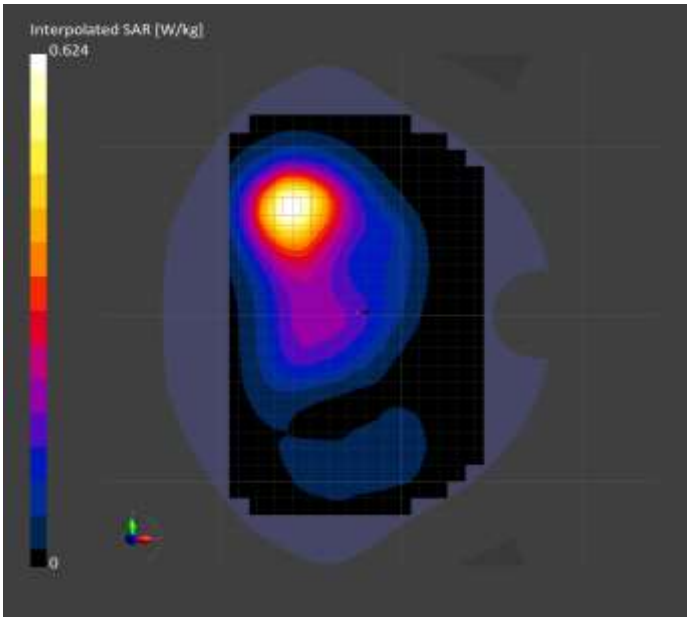
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.524	0.520
psSAR10g [W/Kg]	0.316	0.312
Power Drift [dB]	-0.14	-0.09
M2/M1 [%]		18.0
Dist 3dB Peak [mm]		59.8



Meas.59 Measurement Report for RS60, CHEEK, WLAN 2.4GHz, UID 10517 AAA, Channel 1 (2412.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	WLAN 2.4GHz	WLAN, 10517-AAA	2412.0, 1	7.65	1.713	38.757

Hardware Setup

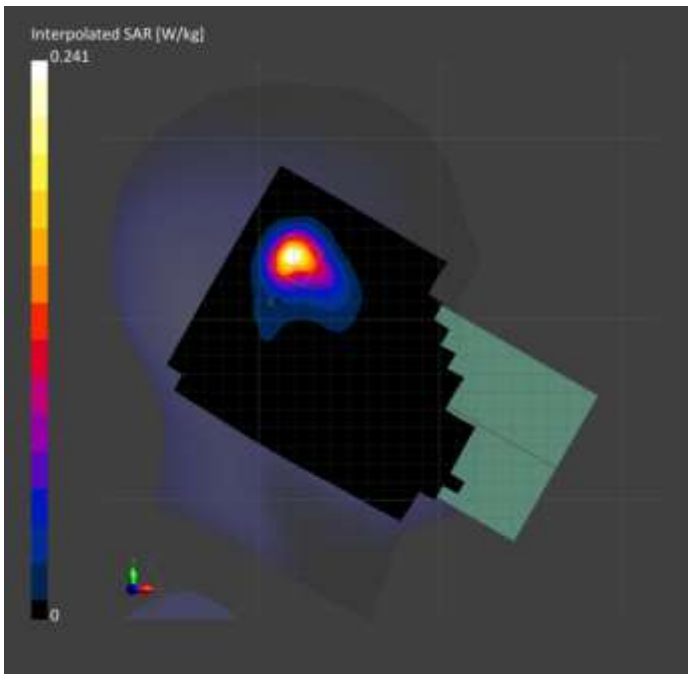
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.175	0.179
psSAR10g [W/Kg]	0.078	0.078
Power Drift [dB]	-0.11	0.07
M2/M1 [%]		9.5
Dist 3dB Peak [mm]		49.2



Meas.60 Measurement Report for RS60, FRONT, WLAN 2.4GHz, UID 10517 AAA, Channel 1 (2412.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	WLAN 2.4GHz	WLAN, 10517-AAA	2412.0, 1	7.65	1.713	38.757

Hardware Setup

Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.109	0.109
psSAR10g [W/Kg]	0.054	0.053
Power Drift [dB]	-0.14	-0.16
M2/M1 [%]		13.0
Dist 3dB Peak [mm]		49.7

Meas.61 Measurement Report for RS60, BACK, WLAN 2.4GHz, UID 10517 AAA, Channel 1 (2412.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	WLAN 2.4GHz	WLAN, 10517-AAA	2412.0, 1	7.65	1.713	38.757

Hardware Setup

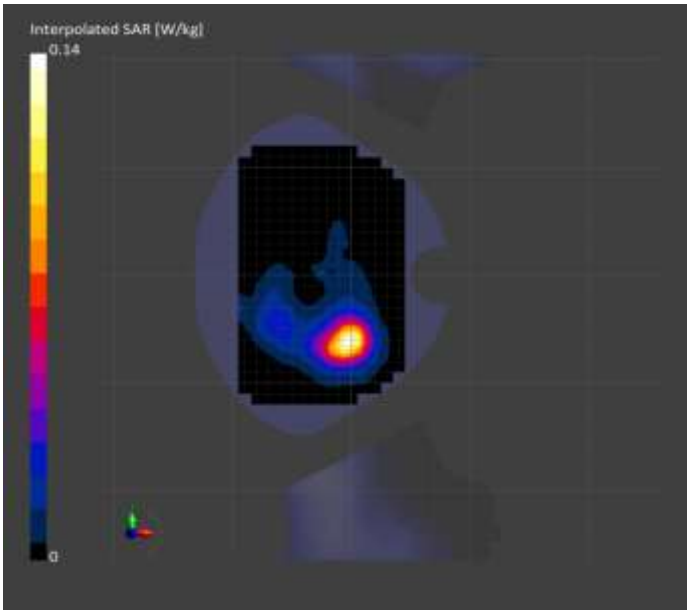
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.112	0.109
psSAR10g [W/Kg]	0.058	0.055
Power Drift [dB]	0.15	0.20
M2/M1 [%]		13.0
Dist 3dB Peak [mm]		56.5



Meas.62 Measurement Report for RS60, TILT, WLAN 5GHz, UID 10525 AAB, Channel 44 (5220.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
RightHead, HSL	TILT, 0.00	WLAN 5GHz	WLAN, 10525-AAB	5220.0, 44	5.53	4.509	35.256

Hardware Setup

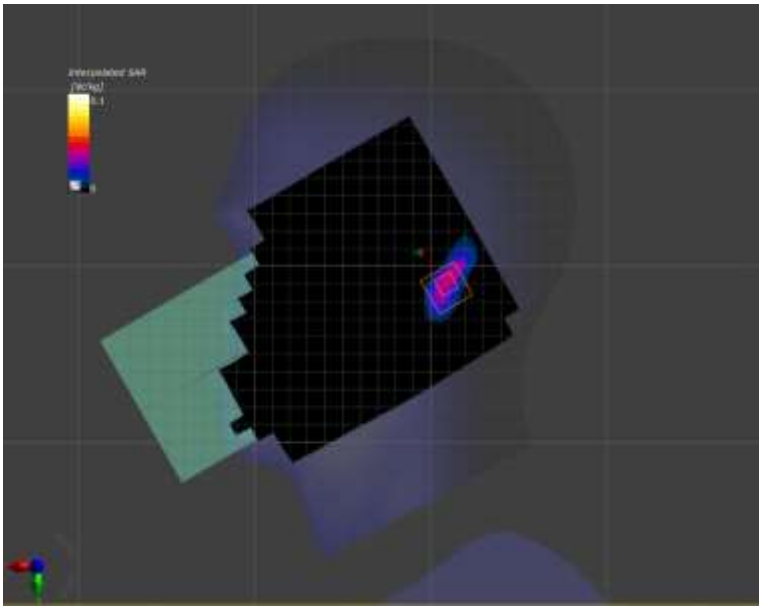
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.041	0.037
psSAR10g [W/Kg]	0.014	0.009
Power Drift [dB]	-0.12	-0.15
M2/M1 [%]		-inf
Dist 3dB Peak [mm]		68.0



Meas.63 Measurement Report for RS60, FRONT, WLAN 5GHz, UID 10525 AAB, Channel 44 (5220.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	WLAN 5GHz	WLAN, 10525-AAB	5220.0, 44	5.53	4.509	35.526

Hardware Setup

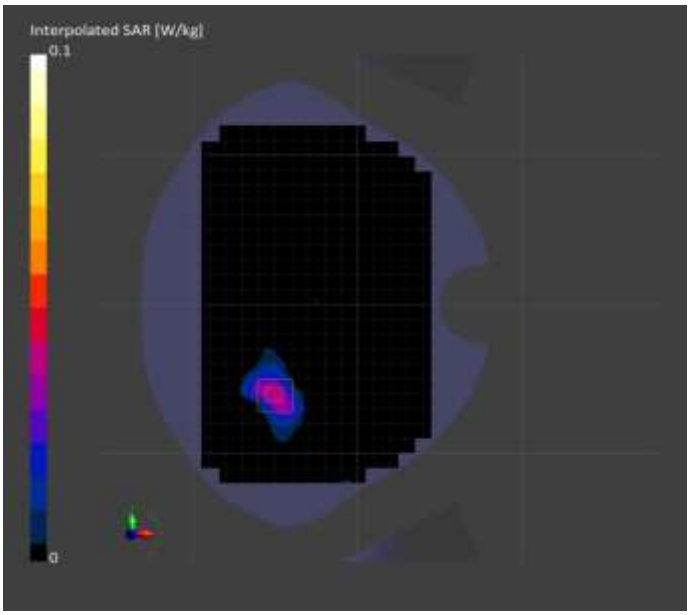
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	22.0 x 22.0 x 22.0
Grid Steps [mm]	10.0 x 10.0	4.0 x 4.0 x 1.4
Sensor Surface [mm]	3.0	1.4
Surface Detection	Unknown method	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.029	0.027
psSAR10g [W/Kg]	0.011	0.007
Power Drift [dB]	0.13	0.18
M2/M1 [%]		-inf
Dist 3dB Peak [mm]		-68.0



Meas.64 Measurement Report for RS60, BACK, WLAN 5GHz, UID 10525 AAB, Channel 44 (5220.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	WLAN 5GHz	WLAN, 10525-AAB	5220.0, 44	5.53	4.509	35.256

Hardware Setup

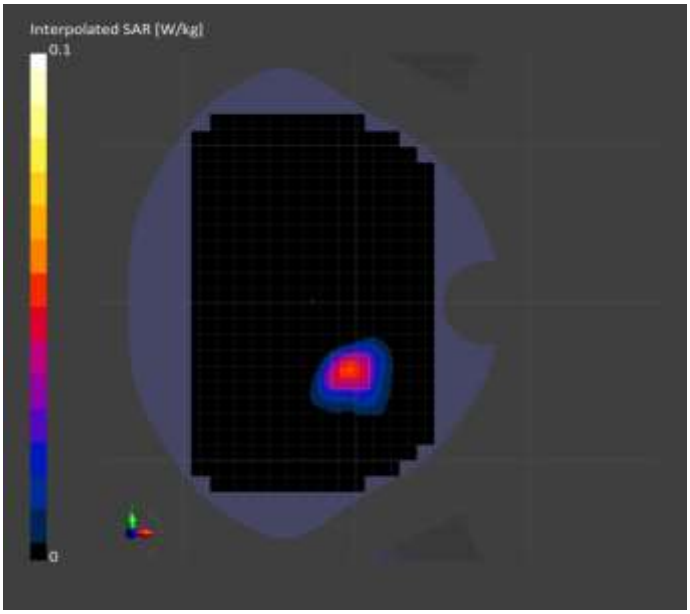
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	22.0 x 22.0 x 22.0
Grid Steps [mm]	10.0 x 10.0	4.0 x 4.0 x 1.4
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.041	0.039
psSAR10g [W/Kg]	0.016	0.012
Power Drift [dB]	0.16	0.15
M2/M1 [%]		-inf
Dist 3dB Peak [mm]		-78.0



Meas.65 Measurement Report for RS60, TILT, WLAN 5GHz, UID 10528 AAB, Channel 165 (5825.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
RightHead, HSL	TILT, 0.00	WLAN 5GHz	WLAN, 10528-AAB	5825.0, 165	4.75	5.151	34.754

Hardware Setup

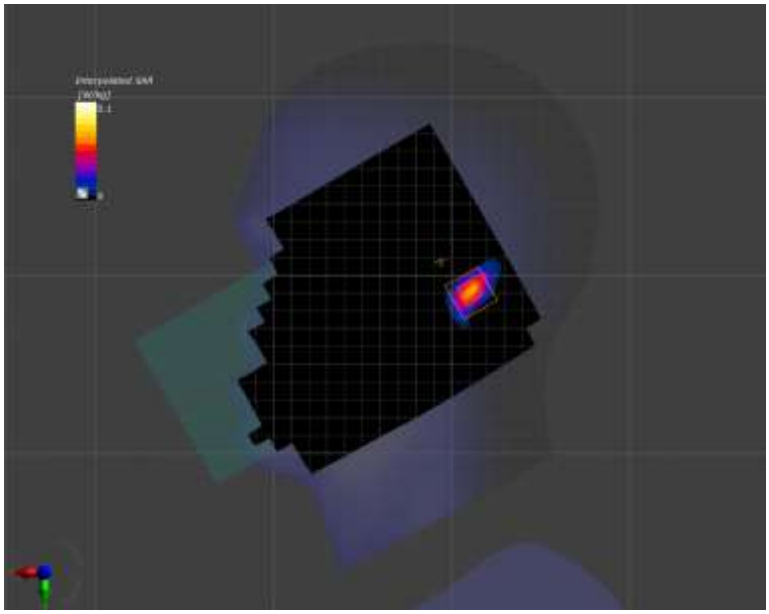
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	22.0 x 22.0 x 22.0
Grid Steps [mm]	10.0 x 10.0	4.0 x 4.0 x 1.4
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.042	0.048
psSAR10g [W/Kg]	0.011	0.009
Power Drift [dB]	0.15	0.14
M2/M1 [%]		5.7
Dist 3dB Peak [mm]		66.1



Meas.66 Measurement Report for RS60, FRONT, WLAN 5GHz, UID 10528 AAB, Channel 165 (5825.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 10.00	WLAN 5GHz	WLAN, 10528-AAB	5825.0, 165	4.75	5.151	34.754

Hardware Setup

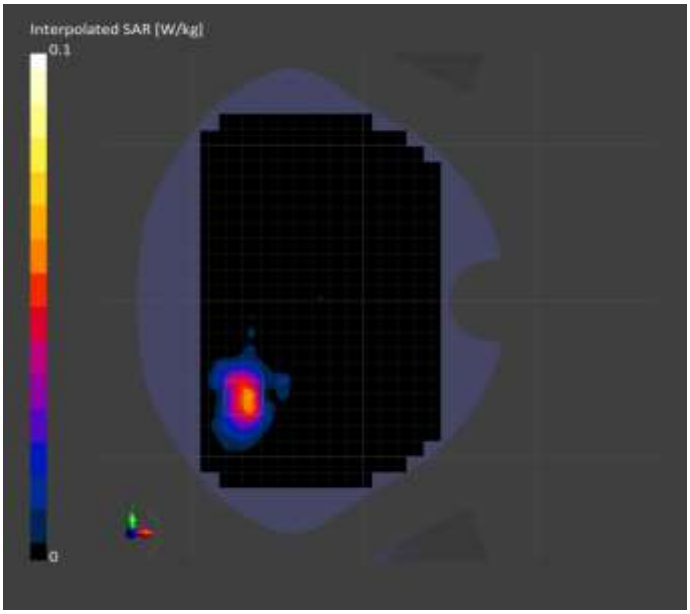
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	22.0 x 22.0 x 22.0
Grid Steps [mm]	10.0 x 10.0	4.0 x 4.0 x 1.4
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.047	0.042
psSAR10g [W/Kg]	0.017	0.010
Power Drift [dB]	0.09	0.16
M2/M1 [%]		-inf
Dist 3dB Peak [mm]		-64.0



Meas.67 Measurement Report for RS60, BACK, WLAN 5GHz, UID 10528 AAB, Channel 165 (5825.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	WLAN 5GHz	WLAN, 10528-AAB	5825.0, 165	4.75	5.151	34.754

Hardware Setup

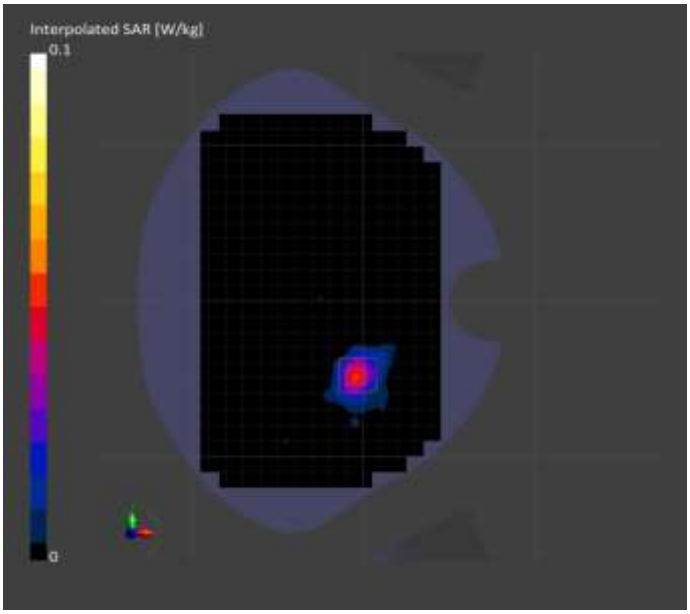
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	22.0 x 22.0 x 22.0
Grid Steps [mm]	10.0 x 10.0	4.0 x 4.0 x 1.4
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.037	0.032
psSAR10g [W/Kg]	0.013	0.008
Power Drift [dB]	0.15	0.18
M2/M1 [%]		-inf
Dist 3dB Peak [mm]		-72.0



Meas.68 Measurement Report for RS60, CHEEK, ISM 2.4 GHz Band, UID 10034 CAA, Channel 39 (2441.0MHz)

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
LeftHead, HSL	CHEEK, 0.00	ISM 2.4 GHz Band	Bluetooth, 10034-CAA	2441.0, 39	7.65	1.726	38.895

Hardware Setup

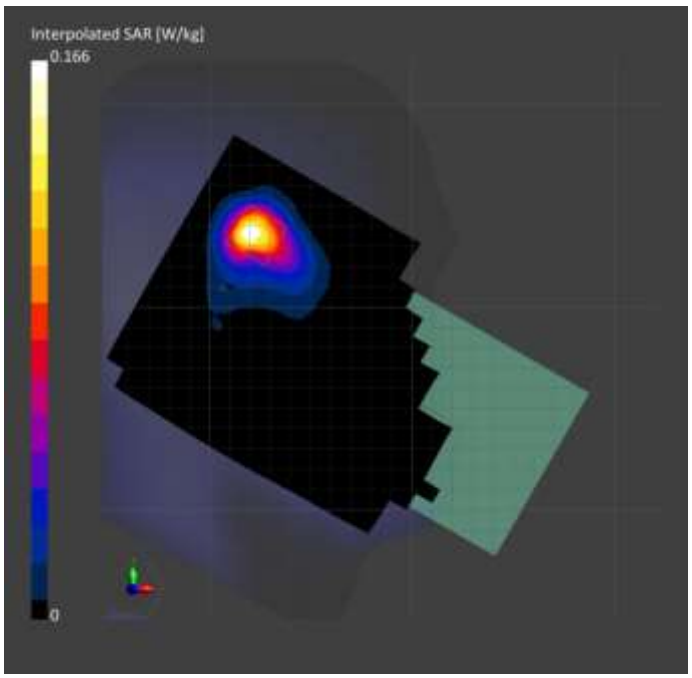
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.121	0.124
psSAR10g [W/Kg]	0.055	0.053
Power Drift [dB]	-0.17	-0.12
M2/M1 [%]		8.1
Dist 3dB Peak [mm]		49.7



Meas.69 Measurement Report for RS60, FRONT, ISM 2.4 GHz Band, UID 10030 CAA, Channel 39 (2441.0MHz) With Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	FRONT, 0.00	ISM 2.4 GHz Band	Bluetooth, 10030-CAA	2441.0, 39	7.65	1.726	38.895

Hardware Setup

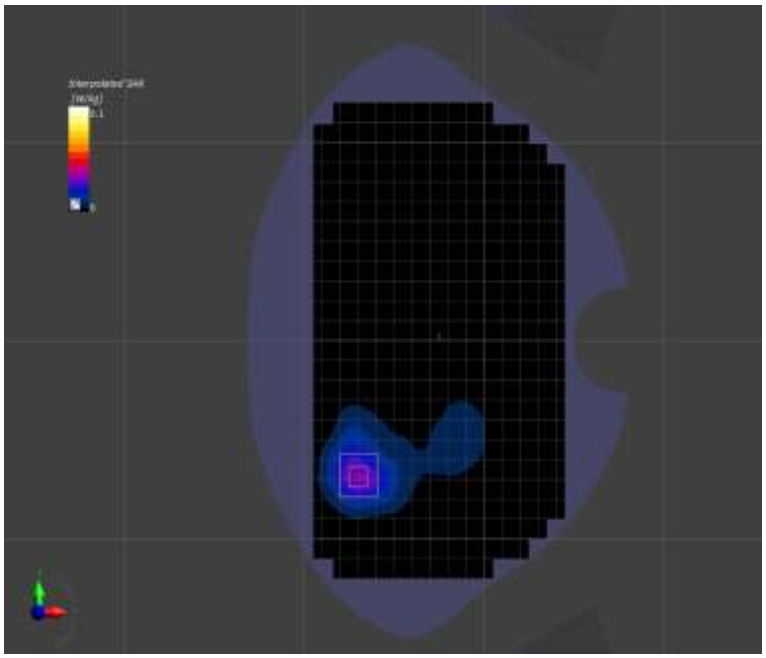
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	VMS + 6p	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.025	0.026
psSAR10g [W/Kg]	0.013	0.012
Power Drift [dB]	-0.12	-0.07
M2/M1 [%]		8.9
Dist 3dB Peak [mm]		50.0



Meas.70 Measurement Report for RS60, BACK, ISM 2.4 GHz Band, UID 10036 CAA, Channel 39 (2441.0MHz) Without Scaner

Device under Test Properties

Name, Manufacturer	Dimensions [mm]	IMEI	DUT Type
RS60,	193.0 x 93.0 x 16.5	015850000002015	Phone

Exposure Conditions

Phantom Section, TSL	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor	TSL Conductivity [S/m]	TSL Permittivity
Flat, HSL	BACK, 10.00	ISM 2.4 GHz Band	Bluetooth, 10036-CAA	2441.0, 39	7.65	1.726	38.895

Hardware Setup

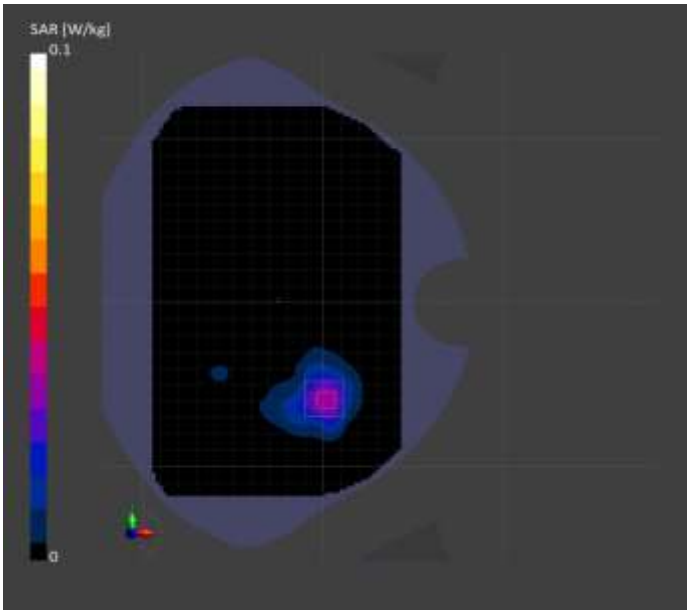
Phantom	TSL, Measured Date	Probe, Calibration Date	DAE, Calibration Date
Twin-SAM V8.0 (30deg probe tilt) - 1461	HBBL-600-10000 Charge:xxxx, --	EX3DV4 - SN7475, 2020-10-29	DAE4 Sn787, 2020-09-30

Scan Setup

	Area Scan	Zoom Scan
Grid Extents [mm]	140.0 x 240.0	30.0 x 30.0 x 30.0
Grid Steps [mm]	10.0 x 10.0	5.0 x 5.0 x 5.0
Sensor Surface [mm]	3.0	1.4
Surface Detection	Unknown method	VMS + 6p
Scan Method	Measured	Measured

Measurement Results

	Area Scan	Zoom Scan
psSAR1g [W/Kg]	0.033	0.032
psSAR10g [W/Kg]	0.017	0.015
Power Drift [dB]	-0.16	-0.17
M2/M1 [%]		-inf
Dist 3dB Peak [mm]		-73.0



End of the report***