Testing and Certification

TEST REPORT

Part 0 SAR Test for certification of SM-S721U

APPLICANT
SAMSUNG Electronics Co., Ltd.

REPORT NO.
HCT-SR-2407-FC005-R1

DATE OF ISSUE
Aug. 09, 2024

Tested by
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Technical Manager
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TEST REPORT

REPORT NO.
HCT-SR-2407-FC005-R1

DATE OF ISSUE
Aug 09, 2024

Product Name	**Mobile Phone**
Model Name	**SM-S721U**
Additional Model Name	**SM-S721U1**
Date of Test	**Jun. 3, 2024 ~ Jul. 11, 2024**
Location of Test	**■ Permanent Testing Lab □ On Site Testing Lab (Address: 74, Seoicheon-ro 578beon-gil, Majang-myeon, Icheon-si, Gyeonggi-do, 17383 KOREA)**
FCC Rule Part(s)	**CFR §2.1093**
Test Results	**PASS (SAR Limit : 1.6 W/kg)**

The result shown in this test report refer only to the sample(s) tested unless otherwise stated.
This test results were applied only to the test methods required by the standard.

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REVISION HISTORY

The revision history for this test report is shown in table.

Revision No.	Date of Issue	Description
0	July 19, 2024	Initial Release
1	Aug. 8, 2024	Page 16,17 were revised.

Notice

Content
The results shown in this test report only apply to the sample(s), as received, provided by the applicant, unless otherwise stated. The test results have only been applied with the test methods required by the standard(s). The laboratory is not accredited for the test results marked *. Information provided by the applicant is marked **. Test results provided by external providers are marked ***. When confirmation of authenticity of this test report is required, please contact www.hct.co.kr This test report provides test result(s) under the scope accredited by the Korea Laboratory Accreditation Scheme (KOLAS), which signed the ILAC-MRA. (KOLAS (KS Q ISO/IEC 17025) Accreditation No. KT197)

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1. Test Location

1.1 Test Laboratory

Company Name	HCT Co., Ltd.
Address	74, Seoicheon-ro 578beon-gil, Majang-myeon, Icheon-si, Gyeonggi-do, 17383 KOREA
Telephone	031-645-6300
Fax.	031-645-6401

1.2 Test Facilities

Our laboratories are accredited and approved by the following approval agencies according to ISO/IEC 17025.

Korea	National Radio Research Agency (Designation No. KR0032)
	KOLAS (Testing No. KT197)

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2. DEVICE UNDER TEST

2.1 General Information of the EUT

Device Wireless specification overview		
Band & Mode	**Operating Mode**	**Tx Frequency**
GSM850	Voice / Data	824.2 ㎒ ~ 848.8 ㎒
GSM1900	Voice / Data	1 850.2 ㎒ ~ 1 909.8 ㎒
UMTS Band 2	Voice / Data	1 852.4 ㎒ ~ 1 907.6 ㎒
UMTS Band 4	Voice / Data	1 712.4 ㎒ ~ 1 752.6 ㎒
UMTS Band 5	Voice / Data	826.4 ㎒ ~ 846.6 ㎒
LTE FDD Band 2 (PCS)	Voice / Data	1 850.7 ㎒ ~ 1 909.3 ㎒
LTE FDD Band 4 (AWS)	Voice / Data	1 710.7 ㎒ ~ 1 754.3 ㎒
LTE FDD Band 5 (Cell)	Voice / Data	824.7 ㎒ ~ 848.3 ㎒
LTE FDD Band 7	Voice / Data	2 502.5 ㎒ ~ 2 567.5 ㎒
LTE FDD Band 12	Voice / Data	699.7 ㎒ ~ 715.3 ㎒
LTE FDD Band 13	Voice / Data	779.5 ㎒ ~ 784.5 ㎒
LTE FDD Band 14	Voice / Data	790.5 ㎒ ~ 795.5 ㎒
LTE FDD Band 25	Voice / Data	1 850.7 ㎒ ~ 1 914.3 ㎒
LTE FDD Band 26	Voice / Data	814.7 ㎒ ~ 848.3 ㎒
LTE FDD Band 30	Voice / Data	2 307.5 ㎒ ~ 2 312.5 ㎒
LTE TDD Band 38	Voice / Data	2 572.5 ㎒ ~ 2 617.5 ㎒
LTE TDD Band 41	Voice / Data	2 498.5 ㎒ ~ 2 687.5 ㎒
LTE TDD Band 48	Voice / Data	3 552.5 ㎒ ~ 3 697.5 ㎒
LTE FDD Band 66 (AWS)	Voice / Data	1 710.7 ㎒ ~ 1 779.3 ㎒
LTE FDD Band 71	Voice / Data	665.5 ㎒ ~ 695.5 ㎒
NR FDD Band n2 (PCS)	Voice / Data	1 852.5 ㎒ ~ 1 907.5 ㎒
NR FDD Band n5	Voice / Data	826.5 ㎒ ~ 846.5 ㎒
NR FDD Band n7	Voice / Data	2 502.5 ㎒ ~ 2 567.5 ㎒
NR FDD Band n12	Voice / Data	701.5 ㎒ ~ 713.5 ㎒
NR FDD Band n25 (PCS)	Voice / Data	1 852.5 ㎒ ~ 1 912.5 ㎒
NR FDD Band n26	Voice / Data	816.5 ㎒ ~ 846.5 ㎒
NR FDD Band n30	Voice / Data	2 307.5 ㎒ ~ 2 312.5 ㎒
NR TDD Band n38	Voice / Data	2 575 ㎒ ~ 2 615 ㎒

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NR TDD Band n41	Voice / Data	2 501.01 ㎒ ~ 2 685 ㎒
NR TDD Band n48	Voice / Data	3 555 ㎒ ~ 3 695.01 ㎒
NR FDD Band n66	Voice / Data	1 712.5 ㎒ ~ 1 777.5 ㎒
NR FDD Band n70	Voice / Data	1 697.5 ㎒ ~ 1 707.5 ㎒
NR FDD Band n71	Voice / Data	665.5 ㎒ ~ 695.5 ㎒
NR TDD Band n77	Voice / Data	3 705 ㎒ ~ 3 975 ㎒
NR TDD Band n77 DoD	Voice / Data	3 445.01 ㎒ ~ 3 544.98 ㎒
NR TDD Band n78	Voice / Data	3 705 ㎒ ~ 3 795 ㎒
NR TDD Band n78 DoD	Voice / Data	3 455.01 ㎒ ~ 3 544.98 ㎒
NR Band n258	Data	24 250 ㎒ ~ 24 450 ㎒; 24 750 ㎒ ~ 25 250 ㎒
NR Band n260	Data	37 000 ㎒ ~ 40 000 ㎒
NR Band n261	Data	27 500 ㎒ ~ 28 350 ㎒
U-NII-1	Voice / Data	5 180 ㎒ ~ 5 240 ㎒
U-NII-2A	Voice / Data	5 260 ㎒ ~ 5 320 ㎒
U-NII-2C	Voice / Data	5 500 ㎒ ~ 5 720 ㎒
U-NII-3	Voice / Data	5 745 ㎒ ~ 5 825 ㎒
U-NII-4	Voice / Data	5 845 ㎒ ~ 5 885 ㎒
U-NII-5	Voice / Data	5 925 ㎒ – 6 425 ㎒
U-NII-6	Voice / Data	6 425 ㎒ – 6 525 ㎒
U-NII-7	Voice / Data	6 525 ㎒ – 6 865 ㎒
U-NII-8	Voice / Data	6 865 ㎒ – 7 115 ㎒
2.4 ㎓ WLAN	Voice / Data	2 412 ㎒ ~ 2 462 ㎒
Bluetooth / LE 5.3	Data	2 402 ㎒ ~ 2 480 ㎒
NFC	Data	13.56 ㎒
WPC	Data	110 ㎑ ~ 148 ㎑

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2.2 Time-Averaging for SAR

This WWAN Mode of DUT is equipped with an S.LSI chipset to which the Samsung S.LSI proprietary TAS (Time Average SAR) algorithm is applied. and also This equipment contains the Qualcomm modem supporting WLAN Fast connect TAS operations.
This DUT is enabled with the Samsung S.LSI proprietary TAS (Time Average SAR) algorithm for WWAN Mode and also Qualcomm Fast connect TAS feature for WLAN Mode to control and manage transmitting power in real time and to ensure at all times the time-averaged RF exposure is in compliance with the FCC requirement

FCC RF exposure limit is based on time averaged RF exposure. The SAR regulatory specification is defined over certain measurement duration allowing for time-averaging. The Samsung S.LSI proprietary TAS (Time Average SAR) algorithm has been designed to meet the compliance limits over the required duration, while still allowing dynamic control of transmit power to satisfy the performance of the system.

This feature performs time averaging SAR algorithm in real time to control and manage transmitting power and ensure the time-averaged RF exposure is in compliance with FCC requirements all the time.

The WLAN mode are not controlled by The Samsung S.LSI proprietary TAS (Time Average SAR) algorithm.
This equipment contains the Qualcomm modem supporting WLAN Fast connect TAS algorithm for TAS operations This feature performs time averaging algorithm in real time to control and manage transmitting power and ensure the time-averaged RF exposure is in compliance with FCC requirements all the time. DUT contains BDF File configured for the WLAN Fast connect TAS algorithm. Only the BT, NFC mode of the device did not apply the time averaged SAR algorithm.

The Samsung S.LSI TAS algorithm and Qualcomm Fast connect TAS algorithm allow the device to transmit at higher power instantaneously, as high as Pmax, when needed, but enforces power limiting to maintain time-averaged transmit power to Plimit. Below table shows Plimit NV settings and maximum tune up output power Pmax configured for this DUT for various transmit conditions (Radio SAR indicator RSI for Head /Body SAR of WWAN Mode, Device State Index DSI for WLAN mode).
The purpose of this report is to demonstrate that the DUT meets FCC SAR limits when transmitting in static transmission configurations at Plimit specified by manufacturer.

SAR Characterization confirms that Plimit in the 4G/5G/WLAN communication mode declared by the manufacturer satisfies SAR_target.

The compliance test under the static transmission scenario and simultaneous transmission analysis are reported in SAR report for WWAN. The validation of The Samsung S.LSI proprietary TAS (Time Average SAR) algorithm and compliance under the time- varying transmission scenario for WWAN technologies are reported in TAS Validation report.
The validation of The Qualcomm Fast connect TAS algorithm and compliance under the time- varying transmission scenario for WLAN technologies are reported in A3LSMS721U_SAR Part 2 Report_WLAN report.

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2.3 Nomenclature for Part 0 Report

Technology	Term	Description
2G/3G/4G/5G Sub 6 NR /WLAN/BT	Plimit	Power level that corresponds to the exposure design target (SAR_design_target) after accounting for all device design related uncertainties
	Pmax	Maximum tune up output power
	SAR_design_target	Target SAR level < FCC SAR limit after accounting for all device design related uncertainties.
	SAR Char	Table containing Plimit for all technologies and bands

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3. SAR MEASUREMENTS

3.1 SAR Definition

Specific Absorption Rate (SAR) is defined as the time derivative of the incremental electromagnetic energy (d*W*) absorbed by (dissipated in) an incremental mass (d*m*) contained in a volume element (d*V*) of a given density (*r*). It is also defined as the rate of RF energy absorption per unit mass at a point in an absorbing body

$$SAR = \frac{d}{dt}\left(\frac{dU}{dm}\right)$$

SAR Mathematical Equation

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

$$SAR = \sigma E^2 / \rho$$

Where:
σ = conductivity of the tissue-simulant material (S/m)
ρ = mass density of the tissue-simulant material (kg/㎥)
E = Total RMS electric field strength (V/m)

NOTE: The primary factors that control rate of energy absorption were found to be the wavelength of the incident field in relations to the dimensions and geometry of the irradiated organism, the orientation of the organism in relation to the polarity of field vectors, the presence of reflecting surfaces, and whether conductive contact is made by the organism with a ground plane.

Frequency	Maximum Area Scan Resolution(mm) (Δxarea, Δyarea)	Maximum Zoom Scan Resolution (mm) (Δxzoom, Δyzoom)	Maximum Zoom Scan Spatial Resolution (mm)			Minimum Zoom Scan Volume (mm) (x,y,z)
			Uniform Gri	Graded Grid		
			Δzzoom(n)	Δzzoom(1)*	Δzzoom(n>1)*	
≤2 GHz	≤15	≤8	≤5	≤4	≤1.5*Δzzoom(n-1)	≥30
2-3 GHz	≤12	≤5	≤5	≤4	≤1.5*Δzzoom(n-1)	≥30
3-4 GHz	≤12	≤5	≤4	≤3	≤1.5*Δzzoom(n-1)	≥28
4-5 GHz	≤10	≤4	≤3	≤2.5	≤1.5*Δzzoom(n-1)	≥25
5-6 GHz	≤10	≤4	≤2	≤2	≤1.5*Δzzoom(n-1)	≥22

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3.2 SAR Measurement Procedure

The evaluation was performed using the following procedure compliant to FCC KDB Publication 865664 D01v01r04 and IEEE 1528-2013:

1. The SAR distribution at the exposed side of the head or body was measured at a distance no more than 5.0 mm from the inner surface of the shell. The area covered the entire dimension of the DUT's head and body area and the horizontal grid resolution was depending on the FCC KDB 865664 D01v01r04 (see table 3-1) & IEEE 1528-2013.

2. Based on step, the area of the maximum absorption was determined by sophisticated interpolations routines implemented in DASY software. When an Area Scan has measured all reachable point. DASY system computes the field maximal found in the scanned are, within a range of the maximum. SAR at this fixed point was measured and used as a reference value.

3. Around this point, a volume was assessed according to the measurement resolution and volume size requirements of FCC KDB 865664 D01v01r04 table 4-1 and IEEE 1528-2013. On the basis of this data set, the spatial peak SAR value was evaluated with the following procedure (reference from the DASY manual.)

   a. The data at the surface were extrapolated, since the center of the dipoles is no more than 2.7 mm away from the tip of the probe (it is different from the probe type) and the distance between the surface and the lowest measuring point is 1.2 mm. The extrapolation was based on a least square algorithm. A polynomial of the fourth order was calculated through the points in z-axes. This polynomial was then used to evaluate the points between the surface and the probe tip.

   b. The maximum interpolated value was searched with a straight-forward algorithm. Around this maximum the SAR values averaged over the spatial volumes (1 g or 10 g) were computed using the 3D-Spline interpolation algorithm. The 3D-spline is composed of three one-dimensional splines with the "Not a knot" condition (in x, y, and z directions. The volume was integrated with the trapezoidal algorithm. One thousand points (10 x 10 x 10) were interpolated to calculate the average.

   c. All neighboring volumes were evaluated until no neighboring volume with a higher average value was found.

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4. The SAR reference value, at the same location as step 2, was re-measured after the zoom scan. If the value changed by more than 5 %, the SAR evaluation and drift measurements were repeated.

Table 3-1

Area and Zoom Scan Resolutions per FCC KDB Publication 865664 D01v01r04*

Frequency	Maximum Area Scan Resolution (mm) (Δxarea, Δyarea)	Maximum Zoom Scan Resolution (mm) (Δxzoom, Δyzoom)	Maximum Zoom Scan Spatial Resolution (mm)			Minimum Zoom Scan Volume (mm) (x,y,z)
			Uniform Grid	Graded Grid		
			Δzzoom(n)	Δzzoom(1)*	Δzzoom(n>1)*	
≤2 GHz	≤15	≤8	≤5	≤4	≤1.5*Δzzoom(n-1)	≥30
2-3 GHz	≤12	≤5	≤5	≤4	≤1.5*Δzzoom(n-1)	≥30
3-4 GHz	≤12	≤5	≤4	≤3	≤1.5*Δzzoom(n-1)	≥28
4-5 GHz	≤10	≤4	≤3	≤2.5	≤1.5*Δzzoom(n-1)	≥25
5-6 GHz	≤10	≤4	≤2	≤2	≤1.5*Δzzoom(n-1)	≥22

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4. SAR CHARACTERIZATION

4.1 Exposure Index and SAR Determination

This device uses different Radio State indicator (RSI) to configure different time averaged power levels based on certain exposure scenarios. Depending on the detection scheme implemented in the smartphone, the worst-case SAR was determined by measurements for the relevant exposure conditions for that RSI. Detailed descriptions of the detection mechanisms are included in the operational description.

When 1g SAR and 10g SAR exposure comparison is needed, the worst-case was determined from SAR normalized to 1g or 10g SAR limit.

The Radio State indicator (RSI) conditions used in Table 4-1 represent different exposure scenarios.

Table 4-1 RSI and Corresponding Exposure Scenarios

Scenario	Description	SAR Test Cases
Head (RSI = 1)	Device positioned next to head	Head SAR per KDB Publication 648474 D04
Body Phablet (RSI = 0)	Device transmits in hotspot mode near body Device is held with hand	Hotspot SAR per KDB Publication 941225 D06 Phablet SAR per KDB Publication 648474 D04

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4.2 SAR Design Target

SAR_design_target is determined by ensuring that it is less than FCC SAR limit after accounting for total device designed related uncertainties specified by the manufacturer (see Table 4-2).

SAR_design_target			
SAR_design_target < SAR_regulatory_limit x 10$^{-Total\ Uncertainty/10}$			
Head 1g SAR (W/kg)		**10g SAR (W/kg)**	
Total Uncertainty	1.0 dB	*Total Uncertainty*	1.0 dB
SAR_regulatory_limit	1.6 W/kg	*SAR_regulatory_limit*	4.0 W/kg
SAR_design_target	0.8 W/kg	*SAR_design_target*	2.0 W/kg

Table 4-2 Main *Head SAR_design_target* Calculations

SAR_design_target			
SAR_design_target < SAR_regulatory_limit x 10$^{-Total\ Uncertainty/10}$			
Body 1g SAR (W/kg)		**10g SAR (W/kg)**	
Total Uncertainty	1.0 dB	*Total Uncertainty*	1.0 dB
SAR_regulatory_limit	1.6 W/kg	*SAR_regulatory_limit*	4.0 W/kg
SAR_design_target	1.0 W/kg	*SAR_design_target*	2.5 W/kg

Table 4-2-1 *Main Body SAR_design_target* Calculations

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4.3 WLAN SAR Characterization

SAR test results corresponding to Pmax for each antenna/technology/band/DSI can be found in Appendix A. Plimit is calculated by linearly scaling with the measured SAR at the Pmax to correspond to the SAR_design_target. Plimit determination for each exposure scenario corresponding to SAR_design_target are shown in Table 4-3.

Device State Index (DSI)	Plimit Determination Scenarios
0	The worst-case SAR exposure is determined as maximum SAR normalized to the limit among: 1. Extremity SAR measured at 0 mm 2. Body-Worn, Hotspot SAR at 10mm
1	Plimit is calculated based on 1g Head SAR
2	Plimit is calculated based on 1g mmwave SAR at 10mm, 0mm

Table 4-3 *PLimit* Determination

SAR_design_target			
$SAR\_design\_target < SAR\_regulatory\_limit \times 10^{-Total\ Uncertainty/10}$			
WLAN 1g SAR (W/kg)		**10g SAR (W/kg)**	
Total Uncertainty	1.0 dB	*Total Uncertainty*	1.0 dB
SAR_regulatory_limit	1.6 W/kg	*SAR_regulatory_limit*	4.0 W/kg
SAR_design_target	0.6 W/kg	*SAR_design_target*	1.25 W/kg

Table 4-3-1 *WLAN SAR_design_target* Calculations

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Table 4-4 SAR Characterization

Plim values in green indicate Plimit < Pmax			Plim values in grey indicate Plimt > Pmax			
Plimit corresponding to Head 0.8 W/kg (1g)/ Body 1.0 W/kg (1g) / Head 2W/Kg (10g) Body 2.5W/kg(10g) SAR_Design_target						Pmax
SAR Exposure Position			Head (RCV ON)	Body Phablet		Maximum Tune-up Output Power (Burst Average Power) [dBm]
Averaging volume			1g	1g	10g	
seperation Distance			0 mm	10 mm	0 mm	
Mode	Band	Antenna	RSI = 1	RSI =0		
GSM/GPRS/EDGE	850	A	32.3	26.9		28.5
GSM/GPRS/EDGE	1900	A	30.3	18.8		27.5
UMTS	2	A	36.3	20.0		23.5
UMTS	4	A	37.9	20.0		23.5
UMTS	5	A	31.6	29.2		24.5
LTE FDD	2 Lower	A	32.6	20.0		24.3
LTE FDD	2 Upper	F	17.5	20.0		22.5
LTE FDD	66(4) Lower	A	32.3	19.0		24.3
LTE FDD	66(4) Upper	F	17.5	19.0		22.5
LTE FDD	12	A	33.0	28.6		24.8
LTE FDD	13	A	31.8	28.2		24.8
LTE FDD	14	A	31.8	27.8		24.8
LTE FDD	5(26)	A	32.2	28.1		24.8
LTE FDD	30 Lower	A	38.1	20.0		23.0
LTE FDD	30 Upper	F	16.5	19.0		20.5
LTE FDD	71	A	33.0	27.3		24.8
LTE FDD	7	B	31.8	21.0		24.0
LTE FDD	7 Upper	F	16.0	19.0		22.5
LTE TDD PC3	41	B	34.0	20.0		24.0
LTE TDD PC2	41	B	32.6	20.4		26.0
LTE TDD PC3	41	F	14.5	18.0		20.0
LTE TDD PC2	41	F	14.9	17.4		23.0
LTE TDD	48	F	15.0	18.0		22.0
NR FDD	5	A	32.6	28.6		24.8
NR FDD	25 Lower	A	31.2	20.0		24.3
NR FDD	25 Upper	F	17.0	20.0		22.5
NR FDD	66 Lower	A	32.9	19.0		24.3
NR FDD	66 Upper	F	16.5	19.0		22.5
NR FDD	71	A	34.9	28.7		24.8
NR FDD	12	A	33.0	29.5		24.8
NR FDD	70	A	33.6	20.0		23.5
NR FDD	30	A	38.1	18.0		23.0
NR FDD	30 Upper	F	16.0	18.0		20.5
NR FDD	7	B	34.8	20.0		24.0
NR FDD	7 Upper	F	16.0	19.0		22.5
NR FDD	38	B	30.4	20.0		24.0
NR TDD	41 SRS0	B	19.5	20.0		26.0
NR TDD	41 SRS1	F	13.5	14.0		21.0
NR TDD	41 SRS2	D	14.0	14.0		21.0
NR TDD	41 SRS3	E	13.5	14.5		21.5
NR TDD	48 SRS0	F	15.0	17.0		22.0
NR TDD	48 SRS1	C	13.0	15.0		20.0
NR TDD	48 SRS2	D	14.5	16.5		21.0
NR TDD	48 SRS3	I	15.0	17.0		22.0
NR TDD	77 SRS0	F	15.0	17.0		26.0
NR TDD	77DoD SRS0	F	15.0	17.0		26.0
NR TDD	77 SRS1	C	14.0	16.0		23.5
NR TDD	77DoD SRS1	C	14.0	16.0		23.5
NR TDD	77 SRS2	D	14.0	16.0		23.5
NR TDD	77DoD SRS2	D	14.0	16.0		23.5
NR TDD	77 SRS3	I	15.0	17.0		25.0
NR TDD	77DoD SRS3	I	15.0	17.0		25.0

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Plim values in green indicate Plimit < Pmax							Plim values in grey indicate Plimt > Pmax	
Plimit corresponding to 0.6 W/kg (1g) 1.25W/kg(10g) SAR_Design_target							Pmax	
SAR Exposure Position			Head (RCV ON)	Body Phablet		mmwave	Maximum Tune-up Output Power (Burst Average Power) [dBm]	UL:DL Ratio
Averaging volume			1g	1g	10g	1g / 10g		
seperation Distance			0 mm	10 mm	0 mm	10 mm / 0 mm		
Mode	Band	Antenna	DSI = 1	DSI =0		DSI =2		
WLAN	2.4	H	14.0	16.0		16.0 / 16.0	19.0	100%
WLAN	2.4	J	14.0	16.0		16.0 / 16.0	19.0	100%
WLAN	2.4	H+J	14.0	16.0		16.0 / 16.0	17.0	100%
WLAN	5	H	12.0	15.0		13.0 / 13.0	17.0	100%
WLAN	5	E	12.0	15.0		13.0 / 13.0	17.0	100%
WLAN	5	H+E	12.0	15.0		13.0 / 13.0	17.0	100%
WLAN	6	H	8.0	8.0		8.0 / 8.0	14.0	100%
WLAN	6	E	8.0	8.0		8.0 / 8.0	14.0	100%
WLAN	6	H+E	8.0	8.0		8.0 / 8.0	14.0	100%

Note:

1. Compared with the Plimit(Tune up Powers) declared in each DSI by manufacturer and the plimit(calculation) calculated by the SAR measurement of each DSI, the lower power were applied to the plimit at each DSI configurations.
2. When *Pmax*< *Plimit*, the DUT will operate at a power level up to *Pmax*.
3. Maximum Tune up Power, Pmax is configured in Nv settings in EUT to limit maximum transmitting power. This power is converted into peak power in NV setting for TDD schemes. (GPRS, LTE TDD and WLAN/BT)

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5. Equipment List

Manufacturer	Type / Model	S/N	Calib. Date	Calib.Interval	Calib.Due
SPEAG	SAM Phantom	-	N/A	N/A	N/A
HP	SAR System Control PC	-	N/A	N/A	N/A
Staubli	CS8Cspeag-TX90	F11/ 5K3RA1/ C/ 01	N/A	N/A	N/A
Staubli	CS7MB	F01/ 5L76A1/ C/ 01	N/A	N/A	N/A
Staubli	CS8Cspeag-TX90	F17/ 59RAA1/ C/ 01	N/A	N/A	N/A
Staubli	CS9spe-TX2-90	F/24/0058554/C/001	N/A	N/A	N/A
Staubli	CS8Cspeag-TX90	F13/ 5SD0A1/ C/ 01	N/A	N/A	N/A
Staubli	CS8Cspeag-TX90	F07/56W9A1/C/01	N/A	N/A	N/A
Staubli	TX90 XLspeag	F11/ 5K3RA1/ A/ 01	N/A	N/A	N/A
Staubli	RX90B L	F01/ 5L76A1/ A/ 01	N/A	N/A	N/A
Staubli	TX90 XLspeag	F17/ 59RAA1/ A/ 01	N/A	N/A	N/A
Staubli	TX90 XLspeag	F/24/0058554/A/001	N/A	N/A	N/A
Staubli	TX90 XLspeag	F13/ 5SD0A1/ A/ 01	N/A	N/A	N/A
Staubli	TX90 XLspeag	F07/56W9A1/A/01	N/A	N/A	N/A
Staubli	Teach Pendant (Joystick)	S-1203 0309	N/A	N/A	N/A
Staubli	Teach Pendant (Joystick)	01.13P 00679	N/A	N/A	N/A
Staubli	Teach Pendant (Joystick)	011578	N/A	N/A	N/A
Staubli	Teach Pendant (Joystick)	D21144508	N/A	N/A	N/A
Staubli	Teach Pendant (Joystick)	001729	N/A	N/A	N/A
Staubli	Teach Pendant (Joystick)	S-0602	N/A	N/A	N/A
TESTO	175-H1/Thermometer	40331936309	12/26/2023	Annual	12/26/2024
TESTO	175-H1/Thermometer	40331953309	01/18/2024	Annual	01/18/2025
TESTO	175-H1/Thermometer	40331922309	12/26/2023	Annual	12/26/2024
TESTO	175-H1/Thermometer	40332651310	12/26/2023	Annual	12/26/2024
TESTO	608-H1/Thermometer	419535	03/20/2024	Annual	03/20/2025
TESTO	608-H1/Thermometer	83406789	06/26/2024	Annual	06/26/2025
SPEAG	DAE4	648	04/19/2024	Annual	04/19/2025
SPEAG	DAE4	868	09/20/2023	Annual	09/20/2024
SPEAG	DAE4	869	03/15/2024	Annual	03/15/2025
SPEAG	DAE4	1225	02/15/2024	Annual	02/15/2025
SPEAG	DAE4	1720	04/19/2024	Annual	04/19/2025
SPEAG	DAE4	1750	09/19/2023	Annual	09/19/2024
SPEAG	E-Field Probe EX3DV4	3797	01/23/2024	Annual	01/23/2025
SPEAG	E-Field Probe EX3DV4	7702	01/22/2024	Annual	01/22/2025
SPEAG	E-Field Probe EX3DV4	7681	11/27/2024	Annual	11/27/2025
SPEAG	E-Field Probe ESDV3	3076	07/18/2023	Annual	07/18/2024
SPEAG	E-Field Probe EX3DV4	7370	08/24/2023	Annual	08/24/2024
SPEAG	E-Field Probe EX3DV4	3968	09/27/2023	Annual	09/27/2024
SPEAG	CLA13	1016	09/21/2023	Annual	09/21/2024
SPEAG	Dipole D750V3	1014	05/20/2024	Annual	05/20/2025
SPEAG	Dipole D835V2	441	04/18/2024	Annual	04/18/2026
SPEAG	Dipole D1640V2	345	07/12/2023	Annual	07/12/2024
SPEAG	Dipole D1800V2	2d007	04/15/2024	Annual	04/15/2026
SPEAG	Dipole D1900V2	5d032	01/18/2024	Annual	01/18/2025
SPEAG	Dipole D2300V2	1010	07/19/2023	Annual	07/19/2024

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Manufacturer	Type / Model	S/N	Calib. Date	Calib.Interval	Calib.Due
SPEAG	Dipole D2450V2	743	03/14/2024	Annual	03/14/2025
SPEAG	Dipole D2600V2	1015	04/22/2024	Annual	04/22/2026
SPEAG	Dipole D3500V2	1132	01/23/2024	Annual	01/23/2025
SPEAG	Dipole D3700V2	1105	11/20/2023	Annual	11/20/2024
SPEAG	Dipole D3900V2	1086	05/21/2024	Annual	05/21/2025
SPEAG	Dipole D5 GHz V2	1107	04/19/2024	Annual	04/19/2026
SPEAG	Dipole D6.5GHzV2	1012	09/21/2023	Annual	09/21/2024
SPEAG	5G Verification source 10GHz	1018	04/17/2024	Annual	04/17/2025
Agilent	Power Meter E4419B	MY41291386	09/21/2023	Annual	09/21/2024
Agilent	Power Meter N1911A	MY45101406	05/21/2024	Annual	05/21/2025
Agilent	Power Sensor 8481A	SG1091286	09/21/2023	Annual	09/21/2024
H.P	Power Sensor 8481A	MY41090675	09/21/2023	Annual	09/21/2024
Agilent	Wideband Power Sensor N1921A	MY55220026	07/28/2023	Annual	07/28/2024
Agilent	11636B/Power Divider	58698	01/15/2024	Annual	01/15/2025
SPEAG	DAKS 3.5	1038	01/22/2024	Annual	01/22/2025
SPEAG	Vector Reflectometer	141013	01/11/2024	Annual	01/11/2025
SPEAG	DAKS 12	1048	03/20/2024	Annual	03/20/2025
SPEAG	MXA Signal Analyzer	MY49100108	01/09/2024	Annual	01/09/2025
H.P	Network Analyzer /8753ES	JP39240221	12/26/2023	Annual	12/26/2024
Agilent	WIRELESS COMMUNICATION E5515C	MY48361100	09/21/2023	Annual	09/21/2024
Agilent	WIRELESS COMMUNICATION E5515C	MY48360252	07/27/2023	Annual	07/27/2024
R&S	Wireless Communication Test Set CMW500	115733	03/19/2024	Annual	03/19/2025
Agilent	SIGNAL GENERATOR N5182A	MY47070230	03/19/2024	Annual	03/19/2025
EMPOWER	RF Power Amplifier	1084	05/21/2024	Annual	05/21/2025
EMPOWER	RF Power Amplifier	1041D/C0508	05/21/2024	Annual	05/21/2025
EMPOWER	RF Power Amplifier	1011	09/21/2023	Annual	09/21/2024
MICRO LAB	LP Filter / LA-15N	10453	09/21/2023	Annual	09/21/2024
MICRO LAB	LP Filter / LA-30N	-	09/21/2023	Annual	09/21/2024
MICRO LAB	LP Filter / LA-60N	32011	09/21/2023	Annual	09/21/2024
Agilent	Attenuator (3dB) 8693B	MY39260298	08/22/2023	Annual	08/22/2024
HP	Attenuator (3dB) 33340A	02427	08/22/2023	Annual	08/22/2024
HP	Attenuator (20dB) 8493C	09271	08/22/2023	Annual	08/22/2024
Agilent	Directional Bridge 86205A	3140A04581	04/22/2024	Annual	04/22/2025
OSI	Power Divider	#1	05/21/2024	Annual	05/21/2025
OSI	Power Divider	#2	05/21/2024	Annual	05/21/2025
OSI	Power Divider	#3	05/21/2024	Annual	05/21/2025
OSI	Power Divider	#4	05/21/2024	Annual	05/21/2025
OSI	Power Divider	#5	05/21/2024	Annual	05/21/2025
OSI	Power Divider	#6	05/21/2024	Annual	05/21/2025
OSI	Power Divider	#7	05/21/2024	Annual	05/21/2025
OSI	Power Divider	#8	05/21/2024	Annual	05/21/2025
Agilent	MXA Signal Analyzer N9020A	MY50510407	06/07/2023	Annual	06/07/2024
Agilent	MXA Signal Analyzer N9020A	MY50510407	06/04/2024	Annual	06/04/2025
KEYSIGHT	EXG Vector Signal Generator	MY50350097	03/05/2024	Annual	03/05/2025

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Manufacturer	Type / Model	S/N	Calib. Date	Calib.Interval	Calib.Due
HP	Dual Directional Coupler	16072	09/21/2023	Annual	09/21/2024
Anritsu	Radio Communication Test Station MT8000A	6262036812	11/28/2023	Annual	11/28/2024
Anritsu	Radio Communication Tester MT8820C	6201074225	01/17/2024	Annual	01/17/2025
Anritsu	Radio Communication Tester MT8820C	6200695605	03/19/2024	Annual	03/19/2025
Anritsu	Radio Communication Tester MT8821C	6201502997	05/21/2024	Annual	05/21/2025
Anritsu	Radio Communication Tester MT8821C	6262044720	11/28/2023	Annual	11/28/2024
Anritsu	Radio Communication Tester MT8821C	6201664725	01/17/2024	Annual	01/17/2025
Agilent	WIRELESS COMMUNICATION E5515C	MY50260992	05/22/2024	Annual	05/22/2025
ROHDE&SCHWARZ	BLUETOOTH TESTER CBT	100272	01/16/2024	Annual	01/16/2025

* The E-field probe was calibrated by SPEAG, by the waveguide technique procedure. Dipole Verification measurement is performed by HCT Lab. before each test. The brain/body simulating material is calibrated by HCT using the DAKS 3.5 to determine the conductivity and permittivity (dielectric constant) of the brain/body-equivalent material.

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6. Measurement Uncertainty

The measured SAR was <1.5 W/Kg for 1g SAR and <3.75 W/Kg For 10g SAR for all frequency bands. Therefore, per KDB Publication 865664 D01v01r04, the extended measurement uncertainty analysis per IEEE1528-2013 was not required.

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Appendix A: SAR Test Results For P limit CALCULATIONS

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Table A-1 DSI = 1 *PLimit* Calculations – 2G/3G Head SAR

MEASUREMENT RESULTS										
Frequency		Mode/ Band		Ant.	Frame Averaged Conducted Power	Test Position	Duty Cycle	Meas. SAR(1g)	Plimit	Minimum Plimit
MHz	Ch.				(dBm)			(W/kg)	(dBm)	(dBm)
836.6	190	GSM 850	GPRS 3Tx	A	24.56	Left Cheek	1:2.77	0.088	34.1	32.3
836.6	190	GSM 850		A	24.56	Left Tilt	1:2.77	0.064	35.5	
836.6	190	GSM 850		A	24.56	Right Cheek	1:2.77	0.134	32.3	
836.6	190	GSM 850		A	24.56	Right Tilt	1:2.77	0.069	35.2	
1 880	661	GSM 1900	GPRS 2Tx	A	20.55	Left Cheek	1:4.15	0.084	30.3	30.3
1 880	661	GSM 1900		A	20.55	Left Tilt	1:4.15	0.031	34.7	
1 880	661	GSM 1900		A	20.55	Right Cheek	1:4.15	0.035	34.1	
1 880	661	GSM 1900		A	20.55	Right Tilt	1:4.15	0.030	34.8	
836.6	4183	UMTS Band 5	RMC	A	24.22	Left Cheek	1:1	0.081	34.2	31.6
836.6	4183	UMTS Band 5	RMC	A	24.22	Left Tilt	1:1	0.055	35.8	
836.6	4183	UMTS Band 5	RMC	A	24.22	Right Cheek	1:1	0.146	31.6	
836.6	4183	UMTS Band 5	RMC	A	24.22	Right Tilt	1:1	0.064	35.2	
1732.4	1412	UMTS Band 4	RMC	A	24.29	Left Cheek	1:1	0.035	37.9	37.9
1732.4	1412	UMTS Band 4	RMC	A	24.29	Left Tilt	1:1	0.011	42.9	
1732.4	1412	UMTS Band 4	RMC	A	24.29	Right Cheek	1:1	0.021	40.1	
1732.4	1412	UMTS Band 4	RMC	A	24.29	Right Tilt	1:1	0.019	40.5	
1 880	9400	UMTS Band 2	RMC	A	23.81	Left Cheek	1:1	0.045	36.3	36.3
1 880	9400	UMTS Band 2	RMC	A	23.81	Left Tilt	1:1	0.024	39.0	
1 880	9400	UMTS Band 2	RMC	A	23.81	Right Cheek	1:1	0.024	39.0	
1 880	9400	UMTS Band 2	RMC	A	23.81	Right Tilt	1:1	0.024	39.0	

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Table A-2 DSI = 1 *PLimit* Calculations – 4G Head SAR

MEASUREMENT RESULTS														
Frequency		Mode		Ant.	Band width	Frame Averaged Conducted Power	Test Position	MPR	RB Size	RB offset	Duty Cycle	Meas. SAR(1g)	Plimit	Minimum Plimit
MHz	Ch.				(dBm)	(dBm)		(dB)				(W/kg)	(dBm)	(dBm)
2 510	20850	LTE Band 7	Mid	B	20	24.11	Left Cheek	0	1	0	1:1	0.136	31.8	31.8
2 510	20850	LTE Band 7	Mid	B	20	24.11	Left Tilt	0	1	0	1:1	0.106	32.9	
2 510	20850	LTE Band 7	Mid	B	20	24.11	Right Cheek	0	1	0	1:1	0.067	34.9	
2 510	20850	LTE Band 7	Mid	B	20	24.11	Right Tilt	0	1	0	1:1	0.053	35.9	
2 510	20850	LTE Band 7	Mid	F	20	16.31	Left Cheek	0	1	0	1:1	0.344	20.0	17.0
2 510	20850	LTE Band 7	Mid	F	20	16.31	Left Tilt	0	1	0	1:1	0.325	20.2	
2 510	20850	LTE Band 7	Mid	F	20	16.31	Right Cheek	0	1	0	1:1	0.562	17.8	
2 510	20850	LTE Band 7	Mid	F	20	16.31	Right Tilt	0	1	0	1:1	0.678	17.0	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Left Cheek	0	1	24	1:1	0.103	33.8	33.0
707.5	23095	LTE Band 12	Mid	A	10	24.86	Left Tilt	0	1	24	1:1	0.029	39.3	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Right Cheek	0	1	24	1:1	0.123	33.0	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Right Tilt	0	1	24	1:1	0.059	36.2	
782	23230	LTE Band 13	Mid	A	10	24.99	Left Cheek	0	1	0	1:1	0.131	32.8	31.8
782	23230	LTE Band 13	Mid	A	10	24.99	Left Tilt	0	1	0	1:1	0.089	34.5	
782	23230	LTE Band 13	Mid	A	10	24.99	Right Cheek	0	1	0	1:1	0.167	31.8	
782	23230	LTE Band 13	Mid	A	10	24.99	Right Tilt	0	1	0	1:1	0.075	35.3	
793	23330	LTE Band 14	Mid	A	10	24.93	Left Cheek	0	1	0	1:1	0.113	33.4	31.8
793	23330	LTE Band 14	Mid	A	10	24.93	Left Tilt	0	1	0	1:1	0.081	34.9	
793	23330	LTE Band 14	Mid	A	10	24.93	Right Cheek	0	1	0	1:1	0.165	31.8	
793	23330	LTE Band 14	Mid	A	10	24.93	Right Tilt	0	1	0	1:1	0.076	35.2	
1 860	26140	LTE Band 25	Low	A	20	24.65	Left Cheek	0	1	0	1:1	0.128	32.6	32.6
1 860	26140	LTE Band 25	Low	A	20	24.65	Left Tilt	0	1	0	1:1	0.055	36.3	
1 860	26140	LTE Band 25	Low	A	20	24.65	Right Cheek	0	1	0	1:1	0.066	35.5	
1 860	26140	LTE Band 25	Low	A	20	24.65	Right Tilt	0	1	0	1:1	0.058	36.0	
1882.5	26365	LTE Band 25	Mid	F	20	17.26	Left Cheek	0	1	0	1:1	0.358	20.8	18.7
1882.5	26365	LTE Band 25	Mid	F	20	17.26	Left Tilt	0	1	0	1:1	0.414	20.1	
1882.5	26365	LTE Band 25	Mid	F	20	17.26	Right Cheek	0	1	0	1:1	0.570	18.7	
1882.5	26365	LTE Band 25	Mid	F	20	17.26	Right Tilt	0	1	0	1:1	0.556	18.8	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Left Cheek	0	1	0	1:1	0.101	34.0	32.2
831.5	26865	LTE Band 26	Mid	A	15	25.05	Left Tilt	0	1	0	1:1	0.065	36.0	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Right Cheek	0	1	0	1:1	0.155	32.2	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Right Tilt	0	1	0	1:1	0.068	35.8	
2 310	27710	LTE Band 30	Mid	A	10	22.85	Left Cheek	0	1	0	1:1	0.018	39.3	38.1
2 310	27710	LTE Band 30	Mid	A	10	22.85	Left Tilt	0	1	0	1:1	0.014	40.4	
2 310	27710	LTE Band 30	Mid	A	10	22.85	Right Cheek	0	1	0	1:1	0.024	38.1	
2 310	27710	LTE Band 30	Mid	A	10	22.85	Right Tilt	0	1	0	1:1	0.007	43.4	
2 310	27710	LTE Band 30	Mid	F	10	16.87	Left Cheek	0	1	49	1:1	0.451	19.4	17.7
2 310	27710	LTE Band 30	Mid	F	10	16.87	Left Tilt	0	1	49	1:1	0.405	19.8	
2 310	27710	LTE Band 30	Mid	F	10	16.87	Right Cheek	0	1	49	1:1	0.638	17.9	
2 310	27710	LTE Band 30	Mid	F	10	16.87	Right Tilt	0	1	49	1:1	0.659	17.7	

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MEASUREMENT RESULTS														
Frequency		Mode		Ant.	Band width	Frame Averaged Conducted Power	Test Position	MPR	RB Size	RB offset	Duty Cycle	Meas. SAR(1g)	Plimit	Minimum Plimit
MHz	Ch.				(dBm)	(dBm)		(dB)				(W/kg)	(dBm)	(dBm)
2 593	40620	LTE Band41(PC3)	Mid	B	20	22.32	Left Cheek	0	1	0	1:1.58	0.054	34.0	34.0
2 593	40620	LTE Band41(PC3)	Mid	B	20	22.32	Left Tilt	0	1	0	1:1.58	0.019	38.6	
2 593	40620	LTE Band41(PC3)	Mid	B	20	22.32	Right Cheek	0	1	0	1:1.58	0.029	36.7	
2 593	40620	LTE Band41(PC3)	Mid	B	20	22.32	Right Tilt	0	1	0	1:1.58	0.009	41.8	
2 593	40620	LTE Band41(PC2)	Mid	B	20	22.58	Left Cheek	0	1	0	1:2.31	0.079	32.6	32.6
2 593	40620	LTE Band41(PC2)	Mid	B	20	22.58	Left Tilt	0	1	0	1:2.31	0.024	37.8	
2 593	40620	LTE Band41(PC2)	Mid	B	20	22.58	Right Cheek	0	1	0	1:2.31	0.041	35.5	
2 593	40620	LTE Band41(PC2)	Mid	B	20	22.58	Right Tilt	0	1	0	1:2.31	0.020	38.6	
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	15.02	Left Cheek	0	1	0	1:1.58	0.218	20.7	15.9
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	15.02	Left Tilt	0	1	0	1:1.58	0.218	20.7	
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	15.02	Right Cheek	0	1	0	1:1.58	0.531	16.8	
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	15.02	Right Tilt	0	1	0	1:1.58	0.648	15.9	
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	15.20	Left Cheek	0	1	0	1:2.31	0.167	22.0	17.2
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	15.20	Left Tilt	0	1	0	1:2.31	0.246	20.3	
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	15.20	Right Cheek	0	1	0	1:2.31	0.405	18.2	
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	15.20	Right Tilt	0	1	0	1:2.31	0.509	17.2	
3 560	55340	LTE Band 48	Low	F	20	15.46	Left Cheek	0	1	0	1:1.58	0.321	19.4	15.9
3 560	55340	LTE Band 48	Low	F	20	15.46	Left Tilt	0	1	0	1:1.58	0.337	19.2	
3 560	55340	LTE Band 48	Low	F	20	15.46	Right Cheek	0	1	0	1:1.58	0.523	17.3	
3 560	55340	LTE Band 48	Low	F	20	15.46	Right Tilt	0	1	0	1:1.58	0.730	15.9	
1 720	132072	LTE Band 66	Low	A	20	24.34	Left Cheek	0	1	0	1:1	0.128	32.3	32.3
1 720	132072	LTE Band 66	Low	A	20	24.34	Left Tilt	0	1	0	1:1	0.064	35.3	
1 720	132072	LTE Band 66	Low	A	20	24.34	Right Cheek	0	1	0	1:1	0.094	33.6	
1 720	132072	LTE Band 66	Low	A	20	24.34	Right Tilt	0	1	0	1:1	0.050	36.4	
1 745	132322	LTE Band 66	Mid	F	20	17.28	Left Cheek	0	1	99	1:1	0.411	20.2	19.5
1 745	132322	LTE Band 66	Mid	F	20	17.28	Left Tilt	0	1	99	1:1	0.480	19.5	
1 745	132322	LTE Band 66	Mid	F	20	17.28	Right Cheek	0	1	99	1:1	0.471	19.6	
1 745	132322	LTE Band 66	Mid	F	20	17.28	Right Tilt	0	1	99	1:1	0.442	19.9	
683	133322	LTE Band 71	Mid	A	20	24.86	Left Cheek	0	1	0	1:1	0.123	33.0	33.0
683	133322	LTE Band 71	Mid	A	20	24.86	Left Tilt	0	1	0	1:1	0.048	37.1	
683	133322	LTE Band 71	Mid	A	20	24.86	Right Cheek	0	1	0	1:1	0.106	33.6	
683	133322	LTE Band 71	Mid	A	20	24.86	Right Tilt	0	1	0	1:1	0.036	38.3	

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Table A-3 DSI = 1 *PLimit* Calculations – NR Head SAR

For some bands/modes, a lower *PLimit* was selected as a more conservative evaluation.
NR TDD Bands : In the case of the NR TDD bands, the Plimit were calculated as the Frame average power to which the duty factor was applied to the burst power.

SAR measurements of all NR bands were measured in FTM Mode.

MEASUREMENT RESULTS																
Frequency		Mode		Ant.	Band width	Frame Averaged Conducted Power	Test Configurations		MPR	RB Size	RB offset	Duty Cycle	Meas. SAR (1g)	Plimit	Minimum Plimit
MHz	Ch.				(dBm)	(dBm)			(dB)				(W/kg)	(dBm)	(dBm)
2 535	507000	NR Band n7	Mid	B	40	23.31	Left Cheek	DFT-s-OFDM QPSK	0	1	214	1:1	0.057	34.8	34.8
2 535	507000	NR Band n7	Mid	B	40	23.31	Left Tilt	DFT-s-OFDM QPSK	0	1	214	1:1	0.024	38.5	
2 535	507000	NR Band n7	Mid	B	40	23.31	Right Cheek	DFT-s-OFDM QPSK	0	1	214	1:1	0.021	39.1	
2 535	507000	NR Band n7	Mid	B	40	23.31	Right Tilt	DFT-s-OFDM QPSK	0	1	214	1:1	0.015	40.6	
2 535	507000	NR Band n7	Mid	F	40	16.23	Left Cheek	DFT-s-OFDM QPSK	0	1	214	1:1	0.347	19.9	18.2
2 535	507000	NR Band n7	Mid	F	40	16.23	Left Tilt	DFT-s-OFDM QPSK	0	1	214	1:1	0.335	20.0	
2 535	507000	NR Band n7	Mid	F	40	16.23	Right Cheek	DFT-s-OFDM QPSK	0	1	214	1:1	0.467	18.6	
2 535	507000	NR Band n7	Mid	F	40	16.23	Right Tilt	CP OFDM QPSK	0	1	214	1:1	0.503	18.2	
707.5	141500	NR Band n12	Mid	A	15	24.88	Left Cheek	DFT-s-OFDM QPSK	0	1	77	1:1	0.047	37.2	33.0
707.5	141500	NR Band n12	Mid	A	15	24.88	Left Tilt	DFT-s-OFDM QPSK	0	1	77	1:1	0.018	41.4	
707.5	141500	NR Band n12	Mid	A	15	24.88	Right Cheek	DFT-s-OFDM QPSK	0	1	77	1:1	0.124	33.0	
707.5	141500	NR Band n12	Mid	A	15	24.88	Right Tilt	DFT-s-OFDM QPSK	0	1	77	1:1	0.054	36.6	
1 882.5	376500	NR Band n25	Mid	A	40	24.54	Left Cheek	DFT-s-OFDM QPSK	0	1	108	1:1	0.174	31.2	31.2
1 882.5	376500	NR Band n25	Mid	A	40	24.54	Left Tilt	DFT-s-OFDM QPSK	0	1	108	1:1	0.068	35.2	
1 882.5	376500	NR Band n25	Mid	A	40	24.54	Right Cheek	DFT-s-OFDM QPSK	0	1	108	1:1	0.088	34.1	
1 882.5	376500	NR Band n25	Mid	A	40	24.54	Right Tilt	DFT-s-OFDM QPSK	0	1	108	1:1	0.091	34.0	
1 882.5	376500	NR Band n25	Mid	F	40	16.88	Left Cheek	DFT-s-OFDM QPSK	0	1	1	1:1	0.356	20.4	18.5
1 882.5	376500	NR Band n25	Mid	F	40	16.88	Left Tilt	DFT-s-OFDM QPSK	0	1	1	1:1	0.453	19.3	
1 882.5	376500	NR Band n25	Mid	F	40	16.88	Right Cheek	DFT-s-OFDM QPSK	0	1	1	1:1	0.541	18.6	
1 882.5	376500	NR Band n25	Mid	F	40	16.88	Right Tilt	DFT-s-OFDM QPSK	0	1	1	1:1	0.554	18.5	
831.5	166300	NR Band n26	Mid	A	20	25.04	Left Cheek	DFT-s-OFDM QPSK	0	1	1	1:1	0.076	35.3	32.6
831.5	166300	NR Band n26	Mid	A	20	25.04	Left Tilt	DFT-s-OFDM QPSK	0	1	1	1:1	0.036	38.5	
831.5	166300	NR Band n26	Mid	A	20	25.04	Right Cheek	DFT-s-OFDM QPSK	0	1	1	1:1	0.139	32.6	
831.5	166300	NR Band n26	Mid	A	20	25.04	Right Tilt	DFT-s-OFDM QPSK	0	1	1	1:1	0.065	35.9	
2 310	462000	NR Band n30	Mid	A	10	22.92	Left Cheek	DFT-s-OFDM QPSK	0	1	26	1:1	0.012	40.2	38.1
2 310	462000	NR Band n30	Mid	A	10	22.92	Left Tilt	DFT-s-OFDM QPSK	0	1	26	1:1	0.030	40.2	
2 310	462000	NR Band n30	Mid	A	10	22.92	Right Cheek	DFT-s-OFDM QPSK	0	1	26	1:1	0.0059	38.1	
2 310	462000	NR Band n30	Mid	A	10	22.92	Right Tilt	DFT-s-OFDM QPSK	0	1	26	1:1	0.021	41.5	
2 310	462000	NR Band n30	Mid	F	10	16.89	Left Cheek	DFT-s-OFDM QPSK	0	1	50	1:1	0.409	19.8	17.6
2 310	462000	NR Band n30	Mid	F	10	16.89	Left Tilt	DFT-s-OFDM QPSK	0	1	50	1:1	0.425	19.6	
2 310	462000	NR Band n30	Mid	F	10	16.89	Right Cheek	DFT-s-OFDM QPSK	0	1	50	1:1	0.645	17.8	
2 310	462000	NR Band n30	Mid	F	10	16.89	Right Tilt	DFT-s-OFDM QPSK	0	1	50	1:1	0.683	17.6	
2 595	519000	NR Band n38	Mid	B	40	23.48	Left Cheek	DFT-s-OFDM QPSK	0	1	1	1:1	0.162	30.4	30.4
2 595	519000	NR Band n38	Mid	B	40	23.48	Left Tilt	DFT-s-OFDM QPSK	0	1	1	1:1	0.048	35.7	
2 595	519000	NR Band n38	Mid	B	40	23.48	Right Cheek	DFT-s-OFDM QPSK	0	1	1	1:1	0.042	36.3	
2 595	519000	NR Band n38	Mid	B	40	23.48	Right Tilt	DFT-s-OFDM QPSK	0	1	1	1:1	0.037	36.8	

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MEASUREMENT RESULTS																
Frequency		Mode		Ant.	Band width	Frame Averaged Conducted Power	Test Configurations		MPR	RB Size	RB offset	Duty Cycle	Meas. SAR (1g)	Plimit	Minimum Plimit
MHz	Ch.				(dBm)	(dBm)			(dB)				(W/kg)	(dBm)	(dBm)
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	19.24	Left Cheek	DFT-s-OFDM QPSK	0	1	271	1:1	0.023	34.7	34.7
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	19.24	Left Tilt	DFT-s-OFDM QPSK	0	1	271	1:1	0.014	36.8	
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	19.24	Right Cheek	DFT-s-OFDM QPSK	0	1	271	1:1	0.014	36.8	
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	19.24	Right Tilt	DFT-s-OFDM QPSK	0	1	271	1:1	0.012	37.5	
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	13.47	Left Cheek	CW	0	-	-	1:1	0.336	17.2	14.7
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	13.47	Left Tilt	CW	0	-	-	1:1	0.324	17.4	
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	13.47	Right Cheek	CW	0	-	-	1:1	0.598	14.7	
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	13.47	Right Tilt	CW	0	-	-	1:1	0.655	14.3	
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	13.97	Left Cheek	CW	0	-	-	1:1	0.000	N/A	38.2
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	13.97	Left Tilt	CW	0	-	-	1:1	0.00114	43.0	
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	13.97	Right Cheek	CW	0	-	-	1:1	0.00167	40.0	
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	13.97	Right Tilt	CW	0	-	-	1:1	0.00287	38.2	
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	13.56	Left Cheek	CW	0	-	-	1:1	0.285	18.0	18.0
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	13.56	Left Tilt	CW	0	-	-	1:1	0.206	19.5	
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	13.56	Right Cheek	CW	0	-	-	1:1	0.144	21.0	
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	13.56	Right Tilt	CW	0	-	-	1:1	0.088	23.1	
3 624.99	641666	NR Band 48	Mid	F	40	15.61	Left Cheek	DFT-s-OFDM QPSK	0	1	53	1:1	0.204	21.5	17.3
3 624.99	641666	NR Band 48	Mid	F	40	15.61	Left Tilt	DFT-s-OFDM QPSK	0	1	53	1:1	0.230	21.0	
3 624.99	641666	NR Band 48	Mid	F	40	15.61	Right Cheek	DFT-s-OFDM QPSK	0	1	53	1:1	0.504	17.6	
3 624.99	641666	NR Band 48	Mid	F	40	15.61	Right Tilt	DFT-s-OFDM QPSK	0	1	53	1:1	0.547	17.3	
3 624.99	641666	NR Band 48 SRS1	Mid	C	40	12.84	Left Cheek	CW	0	-	-	1:1	0.016	29.8	29.8
3 624.99	641666	NR Band 48 SRS1	Mid	C	40	12.84	Left Tilt	CW	0	-	-	1:1	0.000	N/A	
3 624.99	641666	NR Band 48 SRS1	Mid	C	40	12.84	Right Cheek	CW	0	-	-	1:1	0.000	N/A	
3 624.99	641666	NR Band 48 SRS1	Mid	C	40	12.84	Right Tilt	CW	0	-	-	1:1	0.000	N/A	
3 680	645334	NR Band 48 SRS2	High	D	40	14.44	Left Cheek	CW	0	-	-	1:1	0.000	N/A	43.5
3 680	645334	NR Band 48 SRS2	High	D	40	14.44	Left Tilt	CW	0	-	-	1:1	0.000	N/A	
3 680	645334	NR Band 48 SRS2	High	D	40	14.44	Right Cheek	CW	0	-	-	1:1	0.000	N/A	
3 680	645334	NR Band 48 SRS2	High	D	40	14.44	Right Tilt	CW	0	-	-	1:1	0.001	43.5	
3 680	645334	NR Band 48 SRS3	High	I	40	15.45	Left Cheek	CW	0	-	-	1:1	0.167	22.3	19.4
3 680	645334	NR Band 48 SRS3	High	I	40	15.45	Left Tilt	CW	0	-	-	1:1	0.021	31.3	
3 680	645334	NR Band 48 SRS3	High	I	40	15.45	Right Cheek	CW	0	-	-	1:1	0.324	19.4	
3 680	645334	NR Band 48 SRS3	High	I	40	15.45	Right Tilt	CW	0	-	-	1:1	0.027	30.2	
1 745	349000	NR Band n66	Mid	A	40	24.43	Left Cheek	DFT-s-OFDM QPSK	0	1	214	1:1	0.115	32.9	32.9
1 745	349000	NR Band n66	Mid	A	40	24.43	Left Tilt	DFT-s-OFDM QPSK	0	1	214	1:1	0.060	35.7	
1 745	349000	NR Band n66	Mid	A	40	24.43	Right Cheek	DFT-s-OFDM QPSK	0	1	214	1:1	0.069	35.1	
1 745	349000	NR Band n66	Mid	A	40	24.43	Right Tilt	DFT-s-OFDM QPSK	0	1	214	1:1	0.069	35.1	
1 745	349000	NR Band n66	Mid	F	40	17.28	Left Cheek	DFT-s-OFDM QPSK	0	1	108	1:1	0.404	20.2	18.6
1 745	349000	NR Band n66	Mid	F	40	17.28	Left Tilt	DFT-s-OFDM QPSK	0	1	108	1:1	0.487	19.4	
1 745	349000	NR Band n66	Mid	F	40	17.28	Right Cheek	DFT-s-OFDM QPSK	0	1	108	1:1	0.588	18.6	
1 745	349000	NR Band n66	Mid	F	40	17.28	Right Tilt	DFT-s-OFDM QPSK	0	1	108	1:1	0.479	19.5	

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MEASUREMENT RESULTS																
Frequency		Mode		Ant.	Band width	Frame Averaged Conducted Power	Test Configurations		MPR	RB Size	RB offset	Duty Cycle	Meas. SAR (1g)	Plimit	Minimun Plimit
MHz	Ch.				(dBm)	(dBm)			(dB)				(W/kg)	(dBm)	(dBm)
1 702.5	340500	NR Band 70	Mid	A	15	24.14	Left Cheek	DFT-s-OFDM QPSK	0	1	77	1:1	0.091	33.6	33.6
1 702.5	340500	NR Band 70	Mid	A	15	24.14	Left Tilt	DFT-s-OFDM QPSK	0	1	77	1:1	0.039	37.3	
1 702.5	340500	NR Band 70	Mid	A	15	24.14	Right Cheek	DFT-s-OFDM QPSK	0	1	77	1:1	0.064	35.1	
1 702.5	340500	NR Band 70	Mid	A	15	24.14	Right Tilt	DFT-s-OFDM QPSK	0	1	77	1:1	0.052	36.0	
680.5	136100	NR Band 71	Mid	A	20	25.11	Left Cheek	DFT-s-OFDM QPSK	0	1	1	1:1	0.077	35.3	34.9
680.5	136100	NR Band 71	Mid	A	20	25.11	Left Tilt	DFT-s-OFDM QPSK	0	1	1	1:1	0.031	39.2	
680.5	136100	NR Band 71	Mid	A	20	25.11	Right Cheek	DFT-s-OFDM QPSK	0	1	1	1:1	0.075	35.4	
680.5	136100	NR Band 71	Mid	A	20	25.11	Right Tilt	DFT-s-OFDM QPSK	0	1	1	1:1	0.084	34.9	
3 930	662000	NR Band 77(PC3)	Low	F	100	15.35	Left Cheek	DFT-s-OFDM QPSK	0	1	271	1:1	0.402	18.3	16.4
3 930	662000	NR Band 77(PC3)	Low	F	100	15.35	Left Tilt	DFT-s-OFDM QPSK	0	1	271	1:1	0.412	18.2	
3 930	662000	NR Band 77(PC3)	Low	F	100	15.35	Right Cheek	DFT-s-OFDM QPSK	0	1	271	1:1	0.629	16.4	
3 930	662000	NR Bandn77(PC3)	Low	F	100	15.35	Right Tilt	DFT-s-OFDM QPSK	0	1	271	1:1	0.518	17.2	
3 500.01	633334	NR Band 77 DoD(PC3)	Mid	F	100	15.86	Right Tilt	DFT-s-OFDM QPSK	0	135	138	1:1	0.613	17.0	17.0
3 750	650000	NR Band 77 SRS1	Low	C	100	14.20	Left Cheek	CW	0	-	-	1:1	0	N/A	43.2
3 750	650000	NR Band 77 SRS1	Low	C	100	14.20	Left Tilt	CW	0	-	-	1:1	0	N/A	
3 750	650000	NR Band 77 SRS1	Low	C	100	14.20	Right Cheek	CW	0	-	-	1:1	0.001	43.2	
3 750	650000	NR Band 77 SRS1	Low	C	100	14.20	Right Tilt	CW	0	-	-	1:1	0	N/A	
3 500.01	633334	NR Band 77DoD SRS1	Mid	C	100	14.12	Right Cheek	CW	0	-	-	1:1	0.001	43.2	43.2
3 750	650000	NR Band 77 SRS2	Low	D	100	14.76	Left Cheek	CW	0	-	-	1:1	0	N/A	43.8
3 750	650000	NR Band 77 SRS2	Low	D	100	14.76	Left Tilt	CW	0	-	-	1:1	0	N/A	
3 750	650000	NR Band 77 SRS2	Low	D	100	14.76	Right Cheek	CW	0	-	-	1:1	0.001	43.8	
3 750	650000	NR Band 77 SRS2	Low	D	100	14.76	Right Tilt	CW	0	-	-	1:1	0	N/A	
3 500.01	633334	NR Band 77DoD SRS2	Mid	D	100	13.90	Right Tilt	CW	0	-	-	1:1	0.001	42.9	42.9
3 750	650000	NR Band 77 SRS3	Low	I	100	15.94	Left Cheek	CW	0	-	-	1:1	0.286	20.4	18.3
3 750	650000	NR Band 77 SRS3	Low	I	100	15.94	Left Tilt	CW	0	-	-	1:1	0.032	29.9	
3 750	650000	NR Band 77 SRS3	Low	I	100	15.94	Right Cheek	CW	0	-	-	1:1	0.460	18.3	
3 750	650000	NR Band 77 SRS3	Low	I	100	15.94	Right Tilt	CW	0	-	-	1:1	0.044	28.5	
3 500.01	633334	NR Band 77DoD SRS3	Mid	I	100	15.15	Right Cheek	CW	0	-	-	1:1	0.463	17.5	17.5

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Table A-4 DSI = 1 *PLimit* Calculations – WLAN Head SAR

MEASUREMENT RESULTS													
Frequency		Mode/ Band	Band width	Ant. No.	Data Rate	Frame Averaged Conducted Power	Test Position	Ant. Config.	Duty Cycle	Meas. SAR(1g)	Scaling Factor	Plimit	Minimum Plimit
MHz	Ch.		(MHz)		(Mbps)	(dBm)				(W/kg)	(Duty)	(dBm)	(dBm)
2 462	11	802.11b	20	H	1	14.01	Left Cheek	WIFI1	99.0	0.067	1.010	23.5	16.7
2 462	11	802.11b	20	H	1	14.01	Left Tilt	WIFI1	99.0	0.060	1.010	24.0	
2 462	11	802.11b	20	H	1	14.01	Right Cheek	WIFI1	99.0	0.323	1.010	16.7	
2 462	11	802.11b	20	H	1	14.01	Right Tilt	WIFI1	99.0	0.309	1.010	16.9	
2 412	1	802.11b	20	J	1	13.89	Left Cheek	WIFI2	99.0	0.107	1.010	21.4	18.5
2 412	1	802.11b	20	J	1	13.89	Left Tilt	WIFI2	99.0	0.014	1.010	30.2	
2 412	1	802.11b	20	J	1	13.89	Right Cheek	WIFI2	99.0	0.206	1.010	18.5	
2 412	1	802.11b	20	J	1	13.89	Right Tilt	WIFI2	99.0	0.016	1.010	29.6	
2 437	6	802.11g	20	H,E	6	13.83	Left Cheek	MIMO	93.0	0.067	1.075	23.4	17.9
2 437	6	802.11g	20	H,E	6	13.83	Left Tilt	MIMO	93.0	0.041	1.075	25.5	
2 437	6	802.11g	20	H,E	6	13.83	Right Cheek	MIMO	93.0	0.233	1.075	17.9	
2 437	6	802.11g	20	H,E	6	13.83	Right Tilt	MIMO	93.0	0.172	1.075	19.3	
5 855	171	802.11ac	80	H	MCS0	12.98	Left Cheek	WIFI1	85.8	0.091	1.166	21.2	16.8
5 855	171	802.11ac	80	H	MCS0	12.98	Left Tilt	WIFI1	85.8	0.079	1.166	21.8	
5 290	58	802.11ac	80	H	MCS0	12.97	Right Cheek	WIFI1	85.8	0.248	1.166	16.8	
5 290	58	802.11ac	80	H	MCS0	12.97	Right Tilt	WIFI1	85.8	0.158	1.166	18.8	
5 775	155	802.11ac	80	E	MCS0	12.96	Left Cheek	WIFI2	85.8	0.285	1.166	16.2	16.2
5 775	155	802.11ac	80	E	MCS0	12.96	Left Tilt	WIFI2	85.8	0.248	1.166	16.8	
5 775	155	802.11ac	80	E	MCS0	12.96	Right Cheek	WIFI2	85.8	0.197	1.166	17.8	
5 855	171	802.11ac	80	E	MCS0	12.87	Right Tilt	WIFI2	85.8	0.143	1.166	19.1	
5 855	171	802.11ac	80	H,E	MCS0	12.87	Left Cheek	MIMO	85.8	0.304	1.166	15.8	15.8
5 855	171	802.11ac	80	H,E	MCS0	12.87	Left Tilt	MIMO	85.8	0.246	1.166	16.7	
5 775	155	802.11ac	80	H,E	MCS0	12.96	Right Cheek	MIMO	85.8	0.245	1.166	16.8	
5 855	171	802.11ac	80	H,E	MCS0	12.87	Right Tilt	MIMO	85.8	0.228	1.166	17.1	
6 505	111	802.11ax	160	H	MCS0	8.70	Left Cheek	WIFI1	99.6	0.023	1.005	22.9	15.3
6 505	111	802.11ax	160	H	MCS0	8.70	Left Tilt	WIFI1	99.6	0.013	1.005	25.3	
6 505	111	802.11ax	160	H	MCS0	8.70	Right Cheek	WIFI1	99.6	0.131	1.005	15.3	
6 505	111	802.11ax	160	H	MCS0	8.70	Right Tilt	WIFI1	99.6	0.065	1.005	18.4	
6 505	111	802.11ax	160	E	MCS0	8.62	Left Cheek	WIFI2	99.6	0.122	1.005	15.5	15.5
6 505	111	802.11ax	160	E	MCS0	8.62	Left Tilt	WIFI2	99.6	0.083	1.005	17.2	
6 505	111	802.11ax	160	E	MCS0	8.62	Right Cheek	WIFI2	99.6	0.084	1.005	17.2	
6 505	111	802.11ax	160	E	MCS0	8.62	Right Tilt	WIFI2	99.6	0.015	1.005	24.6	

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Table A-5 DSI = 0 *PLimit* Calculations – 2G/3G Hotspot/Body SAR

For some bands/modes, a lower P_{Limit} was selected as a more conservative evaluation.

MEASUREMENT RESULTS											
Frequency		Mode/ Band		Ant. No.	Frame Averaged Conducted Power	Test Position	Spacing (mm)	Duty Cycle	Meas. SAR(1g)	Plimit	Minimum Plimit
MHz	Ch.				(dBm)				(W/kg)	(dBm)	(dBm)
836.6	190	GSM 850	GPRS3Tx	A	24.56	Rear	10	1:2.77	0.582	26.9	26.9
836.6	190	GSM 850	GPRS3Tx	A	24.56	Front	10	1:2.77	0.340	29.2	
836.6	190	GSM 850	GPRS3Tx	A	24.56	Left	10	1:2.77	0.064	36.5	
836.6	190	GSM 850	GPRS3Tx	A	24.56	Right	10	1:2.77	0.232	30.9	
836.6	190	GSM 850	GPRS3Tx	A	24.56	Bottom	10	1:2.77	0.283	30.0	
1 880.0	661	GSM 1900	GPRS2Tx	A	18.17	Rear	10	1:4.15	0.202	25.1	22.3
1 880.0	661	GSM 1900	GPRS2Tx	A	18.17	Front	10	1:4.15	0.182	25.6	
1 880.0	661	GSM 1900	GPRS2Tx	A	18.17	Left	10	1:4.15	0.057	30.6	
1 880.0	661	GSM 1900	GPRS2Tx	A	18.17	Right	10	1:4.15	0.042	31.9	
1 880.0	661	GSM 1900	GPRS2Tx	A	18.17	Bottom	10	1:4.15	0.389	22.3	
836.6	4183	UMTS Band 5	RMC	A	24.22	Rear	10	1:1	0.256	30.1	30.1
836.6	4183	UMTS Band 5	RMC	A	24.22	Front	10	1:1	0.190	31.4	
836.6	4183	UMTS Band 5	RMC	A	24.22	Left	10	1:1	0.037	38.5	
836.6	4183	UMTS Band 5	RMC	A	24.22	Right	10	1:1	0.117	33.5	
836.6	4183	UMTS Band 5	RMC	A	24.22	Bottom	10	1:1	0.142	32.7	
1732.4	1412	UMTS Band 4	RMC	A	20.55	Rear	10	1:1	0.529	23.3	22.1
1732.4	1412	UMTS Band 4	RMC	A	20.55	Front	10	1:1	0.390	24.6	
1732.4	1412	UMTS Band 4	RMC	A	20.55	Left	10	1:1	0.192	27.7	
1732.4	1412	UMTS Band 4	RMC	A	20.55	Right	10	1:1	0.068	32.2	
1732.4	1412	UMTS Band 4	RMC	A	20.55	Bottom	10	1:1	0.705	22.1	
1 880	9400	UMTS Band 2	RMC	A	20.98	Rear	10	1:1	0.444	24.5	22.5
1 880	9400	UMTS Band 2	RMC	A	20.98	Front	10	1:1	0.313	26.0	
1 880	9400	UMTS Band 2	RMC	A	20.98	Left	10	1:1	0.105	30.8	
1 880	9400	UMTS Band 2	RMC	A	20.98	Right	10	1:1	0.086	31.6	
1 880	9400	UMTS Band 2	RMC	A	20.98	Bottom	10	1:1	0.704	22.5	

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Table A-6 DSI = 0 *PLimit* Calculations – 4G Hotspot SAR

For some bands/modes, a lower P_{Limit} was selected as a more conservative evaluation.

MEASUREMENT RESULTS															
Frequency		Mode		Ant. No.	Band width	Frame Averaged Conducted Power	Test Position	Spacing (mm)	MPR	RB Size	RB offset	Duty Cycle	Meas. SAR (1g)	Plimit	Minimum Plimit
MHz	Ch.				MHz	(dBm)			(dB)				(W/kg)	(dBm)	(dBm)
2 510	20850	LTE Band 7	Low	B	20	20.97	Rear	10	0	1	0	1:1	0.241	27.1	26.1
2 510	20850	LTE Band 7	Low	B	20	20.97	Front	10	0	1	0	1:1	0.234	27.3	
2 510	20850	LTE Band 7	Low	B	20	20.97	Left	10	0	1	0	1:1	0.250	27.0	
2 510	20850	LTE Band 7	Low	B	20	20.97	Bottom	10	0	1	0	1:1	0.306	26.1	
2 560	21350	LTE Band 7	High	F	20	18.65	Rear	10	0	1	0	1:1	0.304	23.8	21.8
2 560	21350	LTE Band 7	High	F	20	18.65	Front	10	0	1	0	1:1	0.265	24.4	
2 560	21350	LTE Band 7	High	F	20	18.65	Left	10	0	1	0	1:1	0.040	32.6	
2 560	21350	LTE Band 7	High	F	20	18.65	Top	10	0	1	0	1:1	0.488	21.8	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Rear	10	0	1	24	1:1	0.367	29.2	29.2
707.5	23095	LTE Band 12	Mid	A	10	24.86	Front	10	0	1	24	1:1	0.307	30.0	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Left	10	0	1	24	1:1	0.069	36.5	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Right	10	0	1	24	1:1	0.118	34.1	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Bottom	10	0	1	24	1:1	0.293	30.2	
782	23230	LTE Band 13	Mid	A	10	24.99	Rear	10	0	1	0	1:1	0.457	28.4	28.4
782	23230	LTE Band 13	Mid	A	10	24.99	Front	10	0	1	0	1:1	0.369	29.3	
782	23230	LTE Band 13	Mid	A	10	24.99	Left	10	0	1	0	1:1	0.133	33.8	
782	23230	LTE Band 13	Mid	A	10	24.99	Right	10	0	1	0	1:1	0.354	29.5	
782	23230	LTE Band 13	Mid	A	10	24.99	Bottom	10	0	1	0	1:1	0.259	30.9	
793	23330	LTE Band 14	Mid	A	10	24.93	Rear	10	0	1	0	1:1	0.520	27.8	27.8
793	23330	LTE Band 14	Mid	A	10	24.93	Front	10	0	1	0	1:1	0.399	28.9	
793	23330	LTE Band 14	Mid	A	10	24.93	Left	10	0	1	0	1:1	0.077	36.1	
793	23330	LTE Band 14	Mid	A	10	24.93	Right	10	0	1	0	1:1	0.219	31.5	
793	23330	LTE Band 14	Mid	A	10	24.93	Bottom	10	0	1	0	1:1	0.328	29.8	
1 883	26365	LTE Band 25	Mid	A	20	20.35	Rear	10	0	1	49	1:1	0.257	26.3	24.4
1 883	26365	LTE Band 25	Mid	A	20	20.35	Front	10	0	1	49	1:1	0.194	27.5	
1 883	26365	LTE Band 25	Mid	A	20	20.35	Left	10	0	1	49	1:1	0.066	32.2	
1 883	26365	LTE Band 25	Mid	A	20	20.35	Right	10	0	1	49	1:1	0.050	33.4	
1 883	26365	LTE Band 25	Mid	A	20	20.35	Bottom	10	0	1	49	1:1	0.398	24.4	
1 883	26365	LTE Band 25	Mid	F	20	19.59	Rear	10	0	1	0	1:1	0.256	25.5	21.6
1 883	26365	LTE Band 25	Mid	F	20	19.59	Front	10	0	1	0	1:1	0.235	25.9	
1 883	26365	LTE Band 25	Mid	F	20	19.59	Left	10	0	1	0	1:1	0.065	31.5	
1 883	26365	LTE Band 25	Mid	F	20	19.59	Top	10	0	1	0	1:1	0.629	21.6	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Rear	10	0	1	0	1:1	0.496	28.1	28.1
831.5	26865	LTE Band 26	Mid	A	15	25.05	Front	10	0	1	0	1:1	0.343	29.7	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Left	10	0	1	0	1:1	0.068	36.7	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Right	10	0	1	0	1:1	0.170	32.7	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Bottom	10	0	1	0	1:1	0.295	30.4	
2 310	27710	LTE Band 30	Mid	A	10	19.45	Rear	10	0	1	0	1:1	0.209	26.2	22.2
2 310	27710	LTE Band 30	Mid	A	10	19.45	Front	10	0	1	0	1:1	0.196	26.5	
2 310	27710	LTE Band 30	Mid	A	10	19.45	Left	10	0	1	0	1:1	0.012	38.7	

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2 310	27710	LTE Band 30	Mid	A	10	19.45	Right	10	0	1	0	1:1	0.019	36.7	
2 310	27710	LTE Band 30	Mid	A	10	19.45	Bottom	10	0	1	0	1:1	0.533	22.2	

MEASUREMENT RESULTS

Frequency		Mode		Ant. No.	Band width	Frame Averaged Conducted Power	Test Position	Spacing (mm)	MPR	RB Size	RB offset	Duty Cycle	Meas. SAR (1g)	Plimit	Minimum Plimit
MHz	Ch.				MHz	(dBm)			(dB)				(W/kg)	(dBm)	(dBm)
2 310	27710	LTE Band 30	Mid	F	10	19.53	Rear	10	0	1	49	1:1	0.340	24.2	21.5
2 310	27710	LTE Band 30	Mid	F	10	19.53	Front	10	0	1	49	1:1	0.207	26.4	
2 310	27710	LTE Band 30	Mid	F	10	19.53	Left	10	0	1	49	1:1	0.070	31.1	
2 310	27710	LTE Band 30	Mid	F	10	19.53	Top	10	0	1	49	1:1	0.632	21.5	
2 593	40620	LTE Band41(PC3)	Mid	B	20	19.98	Rear	10	0	1	0	1:1.58	0.216	26.6	26.2
2 593	40620	LTE Band41(PC3)	Mid	B	20	19.98	Front	10	0	1	0	1:1.58	0.146	28.3	
2 593	40620	LTE Band41(PC3)	Mid	B	20	19.98	Left	10	0	1	0	1:1.58	0.149	28.3	
2 593	40620	LTE Band41(PC3)	Mid	B	20	19.98	Bottom	10	0	1	0	1:1.58	0.241	26.2	
2 593	40620	LTE Band41(PC2)	Mid	B	20	20.41	Rear	10	0	1	0	1:2.31	0.248	26.5	25.7
2 593	40620	LTE Band41(PC2)	Mid	B	20	20.41	Front	10	0	1	0	1:2.31	0.189	27.7	
2 593	40620	LTE Band41(PC2)	Mid	B	20	20.41	Left	10	0	1	0	1:2.31	0.198	27.4	
2 593	40620	LTE Band41(PC2)	Mid	B	20	20.41	Bottom	10	0	1	0	1:2.31	0.296	25.7	
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	18.68	Rear	10	0	1	49	1:1.58	0.167	26.5	22.9
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	18.68	Front	10	0	1	49	1:1.58	0.184	26.0	
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	18.68	Left	10	0	1	49	1:1.58	0.027	34.4	
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	18.68	Top	10	0	1	49	1:1.58	0.379	22.9	
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	16.94	Rear	10	0	1	0	1:2.31	0.226	23.4	21.7
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	16.94	Front	10	0	1	0	1:2.31	0.199	24.0	
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	16.94	Left	10	0	1	0	1:2.31	0.026	32.8	
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	16.94	Top	10	0	1	0	1:2.31	0.333	21.7	
3 647	56207	LTE Band 48	Mid	F	20	18.47	Rear	10	0	1	0	1:1.58	0.330	23.3	23.3
3 647	56207	LTE Band 48	Mid	F	20	18.47	Front	10	0	1	0	1:1.58	0.134	27.2	
3 647	56207	LTE Band 48	Mid	F	20	18.47	Left	10	0	1	0	1:1.58	0.032	33.4	
3 647	56207	LTE Band 48	Mid	F	20	18.47	Top	10	0	1	0	1:1.58	0.298	23.7	
1 720	132072	LTE Band 66	Low	A	20	18.76	Rear	10	0	1	49	1:1	0.416	22.6	20.7
1 720	132072	LTE Band 66	Low	A	20	18.76	Front	10	0	1	49	1:1	0.286	24.2	
1 720	132072	LTE Band 66	Low	A	20	18.76	Left	10	0	1	49	1:1	0.082	29.6	
1 720	132072	LTE Band 66	Low	A	20	18.76	Right	10	0	1	49	1:1	0.066	30.6	
1 720	132072	LTE Band 66	Low	A	20	18.76	Bottom	10	0	1	49	1:1	0.647	20.7	
1 745	132322	LTE Band 66	Mid	F	20	19.72	Rear	10	0	1	0	1:1	0.349	24.3	21.0
1 745	132322	LTE Band 66	Mid	F	20	19.72	Front	10	0	1	0	1:1	0.353	24.2	
1 745	132322	LTE Band 66	Mid	F	20	19.72	Left	10	0	1	0	1:1	0.042	33.5	
1 745	132322	LTE Band 66	Mid	F	20	19.72	Top	10	0	1	0	1:1	0.744	21.0	
683	133322	LTE Band 71	Mid	A	20	24.86	Rear	10	0	1	0	1:1	0.303	30.0	30.0
683	133322	LTE Band 71	Mid	A	20	24.86	Front	10	0	1	0	1:1	0.195	32.0	
683	133322	LTE Band 71	Mid	A	20	24.86	Left	10	0	1	0	1:1	0.217	31.5	
683	133322	LTE Band 71	Mid	A	20	24.86	Right	10	0	1	0	1:1	0.146	33.2	
683	133322	LTE Band 71	Mid	A	20	24.86	Bottom	10	0	1	0	1:1	0.084	35.6	

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Table A-7 DSI = 0 *PLimit* Calculations – NR Hotspot SAR

For some bands/modes, a lower *PLimit* was selected as a more conservative evaluation.
NR TDD Bands : In the case of the NR TDD bands, the Plimit were calculated as the Frame average power to which the duty factor was applied to the burst power.0
SAR measurements of all NR bands were measured in FTM Mode.

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MEASUREMENT RESULTS																
Frequency		Mode		Ant. No.	Band width	Frame Averaged Conducted Power	Test Position		MPR	Spacing (mm)	RB Size	RB offset	Duty Cycle	Meas. SAR(1g)	Plimit	Minim Plimit
MHz	Ch.				MHz	(dBm)			(dB)					(W/kg)	(dBm)	(dBm)
2 535	507000	NR Band n7	Mid	B	40	19.40	Rear	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.241	25.6	24.9
2 535	507000	NR Band n7	Mid	B	40	19.40	Front	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.181	26.8	
2 535	507000	NR Band n7	Mid	B	40	19.40	Left	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.247	25.5	
2 535	507000	NR Band n7	Mid	B	40	19.40	Bottom	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.281	24.9	
2 535	507000	NR Band n7	Mid	F	40	19.42	Rear	DFT-s-OFDM QPSK	0	10	1	214	1:1	0.365	23.8	22.4
2 535	507000	NR Band n7	Mid	F	40	19.42	Front	DFT-s-OFDM QPSK	0	10	1	214	1:1	0.184	26.8	
2 535	507000	NR Band n7	Mid	F	40	19.42	Left	DFT-s-OFDM QPSK	0	10	1	214	1:1	0.041	33.3	
2 535	507000	NR Band n7	Mid	F	40	19.42	Top	DFT-s-OFDM QPSK	0	10	1	214	1:1	0.506	22.4	
707.5	141500	NR Band n12	Mid	A	15	24.88	Rear	DFT-s-OFDM QPSK	0	10	1	77	1:1	0.347	29.5	29.5
707.5	141500	NR Band n12	Mid	A	15	24.88	Front	DFT-s-OFDM QPSK	0	10	1	77	1:1	0.284	30.3	
707.5	141500	NR Band n12	Mid	A	15	24.88	Left	DFT-s-OFDM QPSK	0	10	1	77	1:1	0.078	36.0	
707.5	141500	NR Band n12	Mid	A	15	24.88	Right	DFT-s-OFDM QPSK	0	10	1	77	1:1	0.120	34.1	
707.5	141500	NR Band n12	Mid	A	15	24.88	Bottom	DFT-s-OFDM QPSK	0	10	1	77	1:1	0.230	31.3	
1 882.5	376500	NR Band n25	Mid	A	40	20.08	Rear	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.194	27.2	23.6
1 882.5	376500	NR Band n25	Mid	A	40	20.08	Front	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.180	27.5	
1 882.5	376500	NR Band n25	Mid	A	40	20.08	Left	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.065	32.0	
1 882.5	376500	NR Band n25	Mid	A	40	20.08	Right	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.038	34.3	
1 882.5	376500	NR Band n25	Mid	A	40	20.08	Bottom	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.440	23.6	
1 882.5	376500	NR Band n25	Mid	F	40	19.71	Rear	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.318	24.7	21.3
1 882.5	376500	NR Band n25	Mid	F	40	19.71	Front	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.296	25.0	
1 882.5	376500	NR Band n25	Mid	F	40	19.71	Left	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.170	27.4	
1 882.5	376500	NR Band n25	Mid	F	40	19.71	Top	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.691	21.3	
831.5	166300	NR Band n26	Mid	A	20	25.04	Rear	DFT-s-OFDM QPSK	0	10	1	53	1:1	0.445	28.6	28.6
831.5	166300	NR Band n26	Mid	A	20	25.04	Front	DFT-s-OFDM QPSK	0	10	1	53	1:1	0.336	29.8	
831.5	166300	NR Band n26	Mid	A	20	25.04	Left	DFT-s-OFDM QPSK	0	10	1	53	1:1	0.072	36.5	
831.5	166300	NR Band n26	Mid	A	20	25.04	Right	DFT-s-OFDM QPSK	0	10	1	53	1:1	0.141	33.5	
831.5	166300	NR Band n26	Mid	A	20	25.04	Bottom	DFT-s-OFDM QPSK	0	10	1	53	1:1	0.307	30.2	
2 310	462000	NR Band n30	Mid	A	10	17.34	Rear	DFT-s-OFDM QPSK	0	10	1	26	1:1	0.313	22.4	20.5
2 310	462000	NR Band n30	Mid	A	10	17.34	Front	DFT-s-OFDM QPSK	0	10	1	26	1:1	0.104	27.2	
2 310	462000	NR Band n30	Mid	A	10	17.34	Left	DFT-s-OFDM QPSK	0	10	1	26	1:1	0.019	34.6	
2 310	462000	NR Band n30	Mid	A	10	17.34	Right	DFT-s-OFDM QPSK	0	10	1	26	1:1	0.019	34.6	
2 310	462000	NR Band n30	Mid	A	10	17.34	Bottom	DFT-s-OFDM QPSK	0	10	1	26	1:1	0.478	20.5	
2 310	462000	NR Band n30	Mid	F	10	18.93	Rear	DFT-s-OFDM QPSK	0	10	1	50	1:1	0.372	23.2	20.4
2 310	462000	NR Band n30	Mid	F	10	18.93	Front	DFT-s-OFDM QPSK	0	10	1	50	1:1	0.189	26.2	
2 310	462000	NR Band n30	Mid	F	10	18.93	Left	DFT-s-OFDM QPSK	0	10	1	50	1:1	0.044	32.5	
2 310	462000	NR Band n30	Mid	F	10	18.93	Top	DFT-s-OFDM QPSK	0	10	1	50	1:1	0.709	20.4	
2 595	519000	NR Band n38	Mid	B	40	19.17	Rear	DFT-s-OFDM QPSK	0	10	1	50	1:1	0.372	23.5	23.5
2 595	519000	NR Band n38	Mid	B	40	19.17	Front	DFT-s-OFDM QPSK	0	10	1	50	1:1	0.189	25.4	
2 595	519000	NR Band n38	Mid	B	40	19.17	Left	DFT-s-OFDM QPSK	0	10	1	50	1:1	0.044	26.2	
2 595	519000	NR Band n38	Mid	B	40	19.17	Bottom	DFT-s-OFDM QPSK	0	10	1	50	1:1	0.709	23.8	

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MEASUREMENT RESULTS																		
Frequency		Mode		Ant. No.	Band width	Frame Averaged Conducted Power	Test Position		MPR	Spacing (mm)	RB Size	RB offset	Duty Cycle	Meas. SAR(1g)	Plimit	Minim Plimit
MHz	Ch.				MHz	(dBm)			(dB)					(W/kg)	(dBm)	(dBm)
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	20.26	Rear	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.174	27.9	27.2
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	20.26	Front	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.130	29.1	
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	20.26	Left	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.170	28.0	
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	20.26	Bottom	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.202	27.2	
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	14.50	Rear	CW	0	10	-	-	1:1	0.177	22.0	21.3
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	14.50	Front	CW	0	10	-	-	1:1	0.123	23.6	
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	14.50	Left	CW	0	10	-	-	1:1	0.021	31.3	
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	14.50	Top	CW	0	10	-	-	1:1	0.209	21.3	
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	14.97	Rear	CW	0	10	-	-	1:1	0.090	25.4	25.4
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	14.97	Front	CW	0	10	-	-	1:1	0.015	33.2	
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	14.97	Right	CW	0	10	-	-	1:1	0	N/A	
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	14.97	Bottom	CW	0	10	-	-	1:1	0.047	28.2	
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	14.56	Rear	CW	0	10	-	-	1:1	0.084	25.3	25.3
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	14.56	Front	CW	0	10	-	-	1:1	0.065	26.4	
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	14.56	Right	CW	0	10	-	-	1:1	0.040	28.5	
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	14.56	Top	CW	0	10	-	-	1:1	0.049	27.7	
3 624.99	641666	NR Band 48	Mid	F	100	17.50	Rear	DFT-s-OFDM QPSK	0	10	1	53	1:1	0.332	22.3	22.3
3 624.99	641666	NR Band 48	Mid	F	100	17.50	Front	DFT-s-OFDM QPSK	0	10	1	53	1:1	0.102	27.4	
3 624.99	641666	NR Band 48	Mid	F	100	17.50	Left	DFT-s-OFDM QPSK	0	10	1	53	1:1	0.025	33.5	
3 624.99	641666	NR Band 48	Mid	F	100	17.50	Bottom	DFT-s-OFDM QPSK	0	10	1	53	1:1	0.281	23.0	
3 624.99	641666	NR Band 48 SRS1	Mid	C	100	14.88	Rear	CW	0	10	-	-	1:1	0.079	25.9	23.8
3 624.99	641666	NR Band 48 SRS1	Mid	C	100	14.88	Front	CW	0	10	-	-	1:1	0.091	25.3	
3 624.99	641666	NR Band 48 SRS1	Mid	C	100	14.88	Left	CW	0	10	-	-	1:1	0.128	23.8	
3 624.99	641666	NR Band 48 SRS1	Mid	C	100	14.88	Top	CW	0	10	-	-	1:1	0.027	30.6	
3 680	645334	NR Band 48 SRS2	Mid	D	100	16.42	Rear	CW	0	10	-	-	1:1	0.555	19.0	19.0
3 680	645334	NR Band 48 SRS2	Mid	D	100	16.42	Front	CW	0	10	-	-	1:1	0.0078	37.4	
3 680	645334	NR Band 48 SRS2	Mid	D	100	16.42	Right	CW	0	10	-	-	1:1	0.017	34.1	
3 680	645334	NR Band 48 SRS2	Mid	D	100	16.42	Bottom	CW	0	10	-	-	1:1	0.056	28.9	
3 680	645334	NR Band 48 SRS3	Mid	I	100	17.52	Rear	CW	0	10	-	-	1:1	0.140	26.1	26.1
3 680	645334	NR Band 48 SRS3	Mid	I	100	17.52	Front	CW	0	10	-	-	1:1	0.058	29.9	
3 680	645334	NR Band 48 SRS3	Mid	I	100	17.52	Left	CW	0	10	-	-	1:1	0.027	33.2	
1 745	349000	NR Band n66	Mid	A	40	18.76	Rear	DFT-s-OFDM QPSK	0	10	1	214	1:1	0.340	23.4	20.6
1 745	349000	NR Band n66	Mid	A	40	18.76	Front	DFT-s-OFDM QPSK	0	10	1	214	1:1	0.224	25.3	
1 745	349000	NR Band n66	Mid	A	40	18.76	Left	DFT-s-OFDM QPSK	0	10	1	214	1:1	0.068	30.4	
1 745	349000	NR Band n66	Mid	A	40	18.76	Right	DFT-s-OFDM QPSK	0	10	1	214	1:1	0.04	32.7	
1 745	349000	NR Band n66	Mid	A	40	18.76	Bottom	DFT-s-OFDM QPSK	0	10	1	214	1:1	0.655	20.6	
1 745	349000	NR Band n66	Mid	F	40	19.56	Rear	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.277	25.1	21.0
1 745	349000	NR Band n66	Mid	F	40	19.56	Front	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.446	23.1	
1 745	349000	NR Band n66	Mid	F	40	19.56	Left	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.142	28.0	
1 745	349000	NR Band n66	Mid	F	40	19.56	Top	DFT-s-OFDM QPSK	0	10	1	108	1:1	0.716	21.0	

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MEASUREMENT RESULTS																	
Frequency		Mode		Ant. No.	Band width	Frame Averaged Conducted Power	Test Position		MPR	Spacing (mm)	RB Size	RB offset	Duty Cycle	Meas. SAR(1g)	Plimit	Minimum Plimit
MHz	Ch.				MHz	(dBm)			(dB)					(W/kg)	(dBm)	(dBm)
1 702.5	340500	NR Band n70	Mid	A	15	19.94	Rear	DFT-s-OFDM QPSK	0	10	1	77	1:1	0.379	24.2	
1 702.5	340500	NR Band n70	Mid	A	15	19.94	Front	DFT-s-OFDM QPSK	0	10	1	77	1:1	0.323	24.8	
1 702.5	340500	NR Band n70	Mid	A	15	19.94	Left	DFT-s-OFDM QPSK	0	10	1	77	1:1	0.079	31.0	21.6
1 702.5	340500	NR Band n70	Mid	A	15	19.94	Right	DFT-s-OFDM QPSK	0	10	1	77	1:1	0.047	33.2	
1 702.5	340500	NR Band n70	Mid	A	15	19.94	Bottom	DFT-s-OFDM QPSK	0	10	1	77	1:1	0.677	21.6	
680.5	136100	NR Band 71	Mid	A	20	25.11	Rear	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.192	32.3	
680.5	136100	NR Band 71	Mid	A	20	25.11	Front	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.156	33.2	
680.5	136100	NR Band 71	Mid	A	20	25.11	Left	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.190	32.3	32.3
680.5	136100	NR Band 71	Mid	A	20	25.11	Right	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.132	33.9	
680.5	136100	NR Band 71	Mid	A	20	25.11	Bottom	DFT-s-OFDM QPSK	0	10	1	1	1:1	0.072	36.5	
3 930	662000	NR Band 77(PC3)	Low	F	100	17.09	Rear	DFT-s-OFDM QPSK	0	10	1	271	1:1	0.464	20.4	
3 930	662000	NR Band 77(PC3)	Low	F	100	17.09	Front	DFT-s-OFDM QPSK	0	10	1	271	1:1	0.118	26.4	
3 930	662000	NR Band 77(PC3)	Low	F	100	17.09	Left	DFT-s-OFDM QPSK	0	10	1	271	1:1	0.030	32.3	20.4
3 930	662000	NR Band 77(PC3)	Low	F	100	17.09	Top	DFT-s-OFDM QPSK	0	10	1	271	1:1	0.319	22.1	
3 500.01	633334	NR Band 77 DoD(PC3)	Mid	F	100	17.17	Rear	DFT-s-OFDM QPSK	0	10	1	271	1:1	0.332	22.0	22.0
3 750	650000	NR Band 77 SRS1	Low	C	100	16.14	Rear	CW	0	10	-	-	1:1	0.071	27.6	
3 750	650000	NR Band 77 SRS1	Low	C	100	16.14	Front	CW	0	10	-	-	1:1	0.071	27.6	
3 750	650000	NR Band 77 SRS1	Low	C	100	16.14	Left	CW	0	10	-	-	1:1	0.137	24.8	24.8
3 750	650000	NR Band 77 SRS1	Low	C	100	16.14	Bottom	CW	0	10	-	-	1:1	0.024	32.3	
3 500.01	633334	NR Band 77DoD SRS1	Mid	C	100	16.11	Left	CW	0	10	-	-	1:1	0.159	24.1	24.1
3 750	650000	NR Band 77 SRS2	Low	D	100	16.77	Rear	CW	0	10	-	-	1:1	0.470	20.0	
3 750	650000	NR Band 77 SRS2	Low	D	100	16.77	Front	CW	0	10	-	-	1:1	0.010	36.8	
3 750	650000	NR Band 77 SRS2	Low	D	100	16.77	Right	CW	0	10	-	-	1:1	0.022	33.3	20.0
3 750	650000	NR Band 77 SRS2	Low	D	100	16.77	Bottom	CW	0	10	-	-	1:1	0.056	29.3	
3 500.01	633334	NR Band 77DoD SRS2	Mid	D	100	15.79	Rear	CW	0	10	-	-	1:1	0.401	19.8	19.8
3 750	650000	NR Band 77 SRS3	Low	I	100	17.95	Rear	CW	0	10	-	-	1:1	0.182	25.3	
3 750	650000	NR Band 77 SRS3	Low	I	100	17.95	Front	CW	0	10	-	-	1:1	0.102	27.9	
3 750	650000	NR Band 77 SRS3	Low	I	100	17.95	Left	CW	0	10	-	-	1:1	0.038	32.2	25.3
3 500.01	633334	NR Band 77DoD SRS3	Mid	I	100	17.10	Rear	CW	0	10	-	-	1:1	0.125	26.1	26.1

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Table A-8 DSI = 0 *PLimit* Calculations – WLAN Hotspot/Body SAR

MEASUREMENT RESULTS													
Frequency		Mode/ Band	Band width	Ant. No.	Data Rate	Frame Averaged Conducted Power	Test Position	Ant. Config.	Duty Cycle	Meas. SAR(1g)	Scaling Factor	Plimit	Minimum Plimit
Mhz	Ch.		(Mhz)		(Mbps)	(dBm)				(W/kg)	(Duty)	(dBm)	(dBm)
2 437	6	802.11b	20	H	1	15.37	Rear	WIFI1	99.0	0.153	1.010	21.3	20.5
2 437	6	802.11b	20	H	1	15.37	Front	WIFI1	99.0	0.128	1.010	22.1	
2 437	6	802.11b	20	H	1	15.37	Left	WIFI1	99.0	0.183	1.010	20.5	
2 437	6	802.11b	20	H	1	15.37	Top	WIFI1	99.0	0.101	1.010	23.1	
2 412	1	802.11b	20	J	1	16.80	Rear	WIFI2	99.0	0.056	1.010	27.1	27.1
2 412	1	802.11b	20	J	1	16.80	Front	WIFI2	99.0	0.023	1.010	31.0	
2 412	1	802.11b	20	J	1	16.80	Right	WIFI2	99.0	0.0043	1.010	38.6	
2 437	6	802.11g	20	H,J	6	15.67	Rear	MIMO	93.0	0.104	1.075	23.3	21.4
2 437	6	802.11g	20	H,J	6	15.67	Front	MIMO	93.0	0.091	1.075	23.9	
2 437	6	802.11g	20	H,J	6	15.67	Left	MIMO	93.0	0.162	1.075	21.4	
2 437	6	802.11g	20	H,J	6	15.67	Right	MIMO	93.0	0.00905	1.075	33.9	
2 437	6	802.11g	20	H,J	6	15.67	Top	MIMO	93.0	0.056	1.075	26.0	
5 690	138	802.11ac	80	H	MCS0	15.48	Rear	WIFI1	86.0	0.093	1.166	23.6	20.8
5 290	58	802.11ac	80	H	MCS0	15.15	Front	WIFI1	86.0	0.059	1.166	25.2	
5 775	155	802.11ac	80	H	MCS0	15.49	Left	WIFI1	86.0	0.176	1.166	20.8	
5 775	155	802.11ac	80	H	MCS0	15.49	Top	WIFI1	86.0	0.041	1.166	27.1	
5 290	58	802.11ac	80	E	MCS0	15.15	Rear	WIFI2	86.0	0.366	1.166	17.3	17.3
5 690	138	802.11ac	80	E	MCS0	15.51	Front	WIFI2	86.0	0.059	1.166	25.6	
5 775	155	802.11ac	80	E	MCS0	15.42	Right	WIFI2	86.0	0.012	1.166	32.4	
5 775	155	802.11ac	80	E	MCS0	15.42	Top	WIFI2	86.0	0.067	1.166	24.9	
5 290	58	802.11ac	80	H,E	MCS0	15.15	Rear	MIMO	86.0	0.386	1.166	17.1	17.1
5 855	171	802.11ac	80	H,E	MCS0	15.38	Front	MIMO	86.0	0.086	1.166	23.8	
5 775	155	802.11ac	80	H,E	MCS0	15.42	Left	MIMO	86.0	0.139	1.166	21.8	
5 775	155	802.11ac	80	H,E	MCS0	15.42	Right	MIMO	86.0	0.014	1.166	31.7	
5 775	155	802.11ac	80	H,E	MCS0	15.42	Top	MIMO	86.0	0.064	1.166	25.1	
6 505	111	802.11ax	160	H	MCS0	8.70	Rear	WIFI1	99.6	0.052	1.005	19.3	19.3
6 505	111	802.11ax	160	H	MCS0	8.70	Front	WIFI1	99.6	0.028	1.005	22.0	
6 505	111	802.11ax	160	E	MCS0	8.62	Rear	WIFI2	99.6	0.026	1.005	22.3	22.3
6 505	111	802.11ax	160	E	MCS0	8.62	Front	WIFI2	99.6	0.011	1.005	26.0	

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Table A-9 DSI = 0 *PLimit* Calculations – 2G/3G Phablet SAR

For some bands/modes, a lower P_{Limit} was selected as a more conservative evaluation.

MEASUREMENT RESULTS											
Frequency		Mode/ Band		Ant. No.	Frame Averaged Conducted Power	Test Position	Spacing (mm)	Duty Cycle	Meas. SAR(10g)	Plimit	Minimum Pli
MHz	Ch.				(dBm)				(W/kg)	(dBm)	(dBm)
836.6	190	GSM 850	GPRS3Tx	A	24.56	Rear	0	1:2.77	0.677	30.2	30.2
836.6	190	GSM 850	GPRS3Tx	A	24.56	Front	0	1:2.77	0.525	31.3	
836.6	190	GSM 850	GPRS3Tx	A	24.56	Left	0	1:2.77	0.456	32.0	
836.6	190	GSM 850	GPRS3Tx	A	24.56	Right	0	1:2.77	0.095	38.8	
836.6	190	GSM 850	GPRS3Tx	A	24.56	Bottom	0	1:2.77	0.278	34.1	
1 880.0	661	GSM 1900	GPRS2Tx	A	18.17	Rear	0	1:4.15	0.587	24.5	22.4
1 880.0	661	GSM 1900	GPRS2Tx	A	18.17	Front	0	1:4.15	0.939	22.4	
1 880.0	661	GSM 1900	GPRS2Tx	A	18.17	Left	0	1:4.15	0.354	26.7	
1 880.0	661	GSM 1900	GPRS2Tx	A	18.17	Right	0	1:4.15	0.064	34.1	
1 880.0	661	GSM 1900	GPRS2Tx	A	18.17	Bottom	0	1:4.15	0.645	24.1	
836.6	4183	UMTS Band 5	RMC	A	24.22	Rear	0	1:1	0.766	29.4	29.2
836.6	4183	UMTS Band 5	RMC	A	24.22	Front	0	1:1	0.789	29.2	
836.6	4183	UMTS Band 5	RMC	A	24.22	Left	0	1:1	0.099	38.2	
836.6	4183	UMTS Band 5	RMC	A	24.22	Right	0	1:1	0.021	45.0	
836.6	4183	UMTS Band 5	RMC	A	24.22	Bottom	0	1:1	0.288	33.6	
1732.4	1412	UMTS Band 4	RMC	A	20.55	Rear	0	1:1	0.919	24.9	24.7
1732.4	1412	UMTS Band 4	RMC	A	20.55	Front	0	1:1	0.886	25.1	
1732.4	1412	UMTS Band 4	RMC	A	20.55	Left	0	1:1	0.256	30.4	
1732.4	1412	UMTS Band 4	RMC	A	20.55	Right	0	1:1	0.060	36.7	
1732.4	1412	UMTS Band 4	RMC	A	20.55	Bottom	0	1:1	0.961	24.7	
1 880	9400	UMTS Band 2	RMC	A	20.98	Rear	0	1:1	0.857	25.6	24.6
1 880	9400	UMTS Band 2	RMC	A	20.98	Front	0	1:1	1.090	24.6	
1 880	9400	UMTS Band 2	RMC	A	20.98	Left	0	1:1	0.505	27.9	
1 880	9400	UMTS Band 2	RMC	A	20.98	Right	0	1:1	0.081	35.9	
1 880	9400	UMTS Band 2	RMC	A	20.98	Bottom	0	1:1	0.674	26.7	

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Table A-10 DSI = 0 *PLimit* Calculations – 4G Phablet SAR

For some bands/modes, a lower P_{Limit} was selected as a more conservative evaluation.

MEASUREMENT RESULTS															
Frequency		Mode		Ant. No.	Band width	Frame Averaged Conducted Power	Test Position	Spacing (mm)	MPR	RB Size	RB offset	Duty Cycle	Meas. SAR (10g)	Plimit	Minimum Plimit
MHz	Ch.				MHz	(dBm)			(dB)				(W/kg)	(dBm)	(dBm)
2 510	20850	LTE Band 7	Low	B	20	20.97	Rear	0	0	1	0	1:1	1.300	23.8	23.8
2 510	20850	LTE Band 7	Low	B	20	20.97	Front	0	0	1	0	1:1	1.190	24.2	
2 510	20850	LTE Band 7	Low	B	20	20.97	Left	0	0	1	0	1:1	0.621	27.0	
2 510	20850	LTE Band 7	Low	B	20	20.97	Bottom	0	0	1	0	1:1	1.080	24.6	
2 560	21350	LTE Band 7	High	F	20	18.65	Rear	0	0	1	0	1:1	0.751	23.9	19.8
2 560	21350	LTE Band 7	High	F	20	18.65	Front	0	0	1	0	1:1	0.900	23.1	
2 560	21350	LTE Band 7	High	F	20	18.65	Left	0	0	1	0	1:1	0.143	31.1	
2 560	21350	LTE Band 7	High	F	20	18.65	Top	0	0	1	0	1:1	1.910	19.8	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Rear	0	0	1	24	1:1	1.050	28.6	28.6
707.5	23095	LTE Band 12	Mid	A	10	24.86	Front	0	0	1	24	1:1	1.060	28.6	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Left	0	0	1	24	1:1	0.370	33.2	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Right	0	0	1	24	1:1	0.116	38.2	
707.5	23095	LTE Band 12	Mid	A	10	24.86	Bottom	0	0	1	24	1:1	0.833	29.6	
782	23230	LTE Band 13	Mid	A	10	24.99	Rear	0	0	1	0	1:1	1.120	28.5	28.2
782	23230	LTE Band 13	Mid	A	10	24.99	Front	0	0	1	0	1:1	1.200	28.2	
782	23230	LTE Band 13	Mid	A	10	24.99	Left	0	0	1	0	1:1	0.496	32.0	
782	23230	LTE Band 13	Mid	A	10	24.99	Right	0	0	1	0	1:1	0.103	38.8	
782	23230	LTE Band 13	Mid	A	10	24.99	Bottom	0	0	1	0	1:1	0.761	30.2	
793	23330	LTE Band 14	Mid	A	10	24.93	Rear	0	0	1	0	1:1	1.160	28.3	28.3
793	23330	LTE Band 14	Mid	A	10	24.93	Front	0	0	1	0	1:1	1.150	28.3	
793	23330	LTE Band 14	Mid	A	10	24.93	Left	0	0	1	0	1:1	0.512	31.8	
793	23330	LTE Band 14	Mid	A	10	24.93	Right	0	0	1	0	1:1	0.158	36.9	
793	23330	LTE Band 14	Mid	A	10	24.93	Bottom	0	0	1	0	1:1	0.644	30.8	
1 883	26365	LTE Band 25	Mid	A	20	20.35	Rear	0	0	1	49	1:1	0.298	29.6	27.5
1 883	26365	LTE Band 25	Mid	A	20	20.35	Front	0	0	1	49	1:1	0.463	27.7	
1 883	26365	LTE Band 25	Mid	A	20	20.35	Left	0	0	1	49	1:1	0.408	28.2	
1 883	26365	LTE Band 25	Mid	A	20	20.35	Right	0	0	1	49	1:1	0.061	36.5	
1 883	26365	LTE Band 25	Mid	A	20	20.35	Bottom	0	0	1	49	1:1	0.482	27.5	
1 883	26365	LTE Band 25	Mid	F	20	19.59	Rear	0	0	1	0	1:1	0.577	26.0	20.2
1 883	26365	LTE Band 25	Mid	F	20	19.59	Front	0	0	1	0	1:1	0.952	23.8	
1 883	26365	LTE Band 25	Mid	F	20	19.59	Left	0	0	1	0	1:1	0.261	29.4	
1 883	26365	LTE Band 25	Mid	F	20	19.59	Top	0	0	1	0	1:1	2.150	20.2	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Rear	0	0	1	0	1:1	0.653	30.9	30.9
831.5	26865	LTE Band 26	Mid	A	15	25.05	Front	0	0	1	0	1:1	0.641	31.0	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Left	0	0	1	0	1:1	0.431	32.7	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Right	0	0	1	0	1:1	0.055	41.6	
831.5	26865	LTE Band 26	Mid	A	15	25.05	Bottom	0	0	1	0	1:1	0.263	34.8	

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MEASUREMENT RESULTS															
Frequency		Mode		Ant. No.	Band width	Frame Averaged Conducted Power	Test Position	Spacing (mm)	MPR	RB Size	RB offset	Duty Cycle	Meas. SAR (10g)	Plimit	Minimum Plimit
MHz	Ch.				MHz	(dBm)			(dB)				(W/kg)	(dBm)	(dBm)
2 310	27710	LTE Band 30	Mid	A	10	19.45	Rear	0	0	1	0	1:1	0.341	28.1	28.1
2 310	27710	LTE Band 30	Mid	A	10	19.45	Front	0	0	1	0	1:1	0.328	28.3	
2 310	27710	LTE Band 30	Mid	A	10	19.45	Left	0	0	1	0	1:1	0.035	38.0	
2 310	27710	LTE Band 30	Mid	A	10	19.45	Right	0	0	1	0	1:1	0.042	37.2	
2 310	27710	LTE Band 30	Mid	A	10	19.45	Bottom	0	0	1	0	1:1	0.226	29.9	
2 310	27710	LTE Band 30	Mid	F	10	19.53	Rear	0	0	1	49	1:1	0.688	25.1	20.9
2 310	27710	LTE Band 30	Mid	F	10	19.53	Front	0	0	1	49	1:1	0.968	23.7	
2 310	27710	LTE Band 30	Mid	F	10	19.53	Left	0	0	1	49	1:1	0.134	32.2	
2 310	27710	LTE Band 30	Mid	F	10	19.53	Top	0	0	1	49	1:1	1.810	20.9	
2 593	40620	LTE Band41(PC3)	Mid	B	20	19.98	Rear	0	0	1	0	1:1.58	0.724	25.4	25.1
2 593	40620	LTE Band41(PC3)	Mid	B	20	19.98	Front	0	0	1	0	1:1.58	0.771	25.1	
2 593	40620	LTE Band41(PC3)	Mid	B	20	19.98	Left	0	0	1	0	1:1.58	0.274	29.6	
2 593	40620	LTE Band41(PC3)	Mid	B	20	19.98	Bottom	0	0	1	0	1:1.58	0.776	25.1	
2 593	40620	LTE Band41(PC2)	Mid	B	20	20.41	Rear	0	0	1	0	1:2.31	0.780	25.5	25.1
2 593	40620	LTE Band41(PC2)	Mid	B	20	20.41	Front	0	0	1	0	1:2.31	0.697	26.0	
2 593	40620	LTE Band41(PC2)	Mid	B	20	20.41	Left	0	0	1	0	1:2.31	0.290	29.8	
2 593	40620	LTE Band41(PC2)	Mid	B	20	20.41	Bottom	0	0	1	0	1:2.31	0.854	25.1	
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	18.68	Rear	0	0	1	49	1:1.58	0.663	24.4	20.1
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	18.68	Front	0	0	1	49	1:1.58	0.943	22.9	
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	18.68	Left	0	0	1	49	1:1.58	0.140	31.2	
2 593.0	40620	LTE Band41(PC3)	Mid	F	20	18.68	Top	0	0	1	49	1:1.58	1.800	20.1	
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	16.94	Rear	0	0	1	0	1:2.31	0.634	22.9	18.4
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	16.94	Front	0	0	1	0	1:2.31	0.959	21.1	
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	16.94	Left	0	0	1	0	1:2.31	0.136	29.6	
2 593.0	40620	LTE Band41(PC2)	Mid	F	20	16.94	Top	0	0	1	0	1:2.31	1.770	18.4	
3 647	56207	LTE Band 48	Mid	F	20	18.47	Rear	0	0	1	0	1:1.58	0.788	23.5	21.1
3 647	56207	LTE Band 48	Mid	F	20	18.47	Front	0	0	1	0	1:1.58	0.502	25.4	
3 647	56207	LTE Band 48	Mid	F	20	18.47	Left	0	0	1	0	1:1.58	0.098	32.5	
3 647	56207	LTE Band 48	Mid	F	20	18.47	Top	0	0	1	0	1:1.58	1.370	21.1	
1 720	132072	LTE Band 66	Low	A	20	18.76	Rear	0	0	1	49	1:1	0.765	23.9	23.3
1 720	132072	LTE Band 66	Low	A	20	18.76	Front	0	0	1	49	1:1	0.774	23.9	
1 720	132072	LTE Band 66	Low	A	20	18.76	Left	0	0	1	49	1:1	0.203	29.7	
1 720	132072	LTE Band 66	Low	A	20	18.76	Right	0	0	1	49	1:1	0.062	34.8	
1 720	132072	LTE Band 66	Low	A	20	18.76	Bottom	0	0	1	49	1:1	0.886	23.3	
1 745	132322	LTE Band 66	Mid	F	20	19.72	Rear	0	0	1	0	1:1	0.453	27.1	23.2
1 745	132322	LTE Band 66	Mid	F	20	19.72	Front	0	0	1	0	1:1	0.665	25.5	
1 745	132322	LTE Band 66	Mid	F	20	19.72	Left	0	0	1	0	1:1	0.194	30.8	
1 745	132322	LTE Band 66	Mid	F	20	19.72	Top	0	0	1	0	1:1	1.120	23.2	
683	133322	LTE Band 71	Mid	A	20	24.86	Rear	0	0	1	0	1:1	1.130	28.3	27.3
683	133322	LTE Band 71	Mid	A	20	24.86	Front	0	0	1	0	1:1	0.948	29.1	
683	133322	LTE Band 71	Mid	A	20	24.86	Left	0	0	1	0	1:1	1.410	27.3	
683	133322	LTE Band 71	Mid	A	20	24.86	Right	0	0	1	0	1:1	0.071	40.3	
683	133322	LTE Band 71	Mid	A	20	24.86	Bottom	0	0	1	0	1:1	0.941	29.1	

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Table A-11 DSI = 0 *PLimit* Calculations – NR Phablet SAR

For some bands/modes, a lower *PLimit* was selected as a more conservative evaluation.
NR TDD Bands : In the case of the NR TDD bands, the Plimit were calculated as the Frame average power to which the duty factor was applied to the burst power.0
SAR measurements of all NR bands were measured in FTM Mode.

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MEASUREMENT RESULTS																
Frequency		Mode		Ant. No.	Band width	Frame Averaged Conducted Power	Test Position		MPR	Spacing (mm)	RB Size	RB offset	Duty Cycle	Meas. SAR (10g)	Plimit	Minimum Plimit
MHz	Ch.				MHz	(dBm)			(dB)					(W/kg)	(dBm)	(dBm)
2 535	507000	NR Band n7	Mid	B	40	19.40	Rear	DFT-s-OFDM QPSK	0	0	1	1	1:1	1.490	21.6	21.6
2 535	507000	NR Band n7	Mid	B	40	19.40	Front	DFT-s-OFDM QPSK	0	0	1	1	1:1	1.320	22.2	
2 535	507000	NR Band n7	Mid	B	40	19.40	Left	DFT-s-OFDM QPSK	0	0	1	1	1:1	0.650	25.3	
2 535	507000	NR Band n7	Mid	B	40	19.40	Bottom	DFT-s-OFDM QPSK	0	0	1	1	1:1	0.998	23.4	
2 535	507000	NR Band n7	Mid	F	40	19.42	Rear	DFT-s-OFDM QPSK	0	0	1	214	1:1	0.780	24.5	19.8
2 535	507000	NR Band n7	Mid	F	40	19.42	Front	DFT-s-OFDM QPSK	0	0	1	214	1:1	1.070	23.1	
2 535	507000	NR Band n7	Mid	F	40	19.42	Left	DFT-s-OFDM QPSK	0	0	1	214	1:1	0.143	31.8	
2 535	507000	NR Band n7	Mid	F	40	19.42	Top	DFT-s-OFDM QPSK	0	0	1	214	1:1	2.280	19.8	
707.5	141500	NR Band n12	Mid	A	15	24.88	Rear	DFT-s-OFDM QPSK	0	0	1	77	1:1	0.775	30.0	29.8
707.5	141500	NR Band n12	Mid	A	15	24.88	Front	DFT-s-OFDM QPSK	0	0	1	77	1:1	0.802	29.8	
707.5	141500	NR Band n12	Mid	A	15	24.88	Left	DFT-s-OFDM QPSK	0	0	1	77	1:1	0.301	34.1	
707.5	141500	NR Band n12	Mid	A	15	24.88	Right	DFT-s-OFDM QPSK	0	0	1	77	1:1	0.167	36.6	
707.5	141500	NR Band n12	Mid	A	15	24.88	Bottom	DFT-s-OFDM QPSK	0	0	1	77	1:1	0.656	30.7	
1 882.5	376500	NR Band n25	Mid	A	40	20.08	Rear	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.563	26.6	24.6
1 882.5	376500	NR Band n25	Mid	A	40	20.08	Front	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.877	24.6	
1 882.5	376500	NR Band n25	Mid	A	40	20.08	Left	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.366	28.4	
1 882.5	376500	NR Band n25	Mid	A	40	20.08	Right	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.059	36.4	
1 882.5	376500	NR Band n25	Mid	A	40	20.08	Bottom	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.552	26.6	
1 882.5	376500	NR Band n25	Mid	F	40	19.71	Rear	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.503	26.7	22.5
1 882.5	376500	NR Band n25	Mid	F	40	19.71	Front	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.740	25.0	
1 882.5	376500	NR Band n25	Mid	F	40	19.71	Left	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.207	30.5	
1 882.5	376500	NR Band n25	Mid	F	40	19.71	Top	DFT-s-OFDM QPSK	0	0	1	108	1:1	1.320	22.5	
831.5	166300	NR Band n26	Mid	A	20	25.04	Rear	DFT-s-OFDM QPSK	0	0	1	53	1:1	0.861	29.7	29.7
831.5	166300	NR Band n26	Mid	A	20	25.04	Front	DFT-s-OFDM QPSK	0	0	1	53	1:1	0.770	30.2	
831.5	166300	NR Band n26	Mid	A	20	25.04	Left	DFT-s-OFDM QPSK	0	0	1	53	1:1	0.472	32.3	
831.5	166300	NR Band n26	Mid	A	20	25.04	Right	DFT-s-OFDM QPSK	0	0	1	53	1:1	0.186	36.3	
831.5	166300	NR Band n26	Mid	A	20	25.04	Bottom	DFT-s-OFDM QPSK	0	0	1	53	1:1	0.350	33.6	
2 310	462000	NR Band n30	Mid	A	10	17.34	Rear	DFT-s-OFDM QPSK	0	0	1	26	1:1	0.212	28.1	23.9
2 310	462000	NR Band n30	Mid	A	10	17.34	Front	DFT-s-OFDM QPSK	0	0	1	26	1:1	0.200	28.3	
2 310	462000	NR Band n30	Mid	A	10	17.34	Left	DFT-s-OFDM QPSK	0	0	1	26	1:1	0.022	37.9	
2 310	462000	NR Band n30	Mid	A	10	17.34	Right	DFT-s-OFDM QPSK	0	0	1	26	1:1	0.037	35.6	
2 310	462000	NR Band n30	Mid	A	10	17.34	Bottom	DFT-s-OFDM QPSK	0	0	1	26	1:1	0.558	23.9	
2 310	462000	NR Band n30	Mid	F	10	18.93	Rear	DFT-s-OFDM QPSK	0	0	1	50	1:1	0.580	25.3	21.0
2 310	462000	NR Band n30	Mid	F	10	18.93	Front	DFT-s-OFDM QPSK	0	0	1	50	1:1	0.921	23.3	
2 310	462000	NR Band n30	Mid	F	10	18.93	Left	DFT-s-OFDM QPSK	0	0	1	50	1:1	0.119	32.2	
2 310	462000	NR Band n30	Mid	F	10	18.93	Top	DFT-s-OFDM QPSK	0	0	1	50	1:1	1.560	21.0	
2 595	519000	NR Band n38	Mid	B	40	19.17	Rear	DFT-s-OFDM QPSK	0	0	1	50	1:1	1.110	22.7	22.6
2 595	519000	NR Band n38	Mid	B	40	19.17	Front	DFT-s-OFDM QPSK	0	0	1	50	1:1	0.864	23.8	
2 595	519000	NR Band n38	Mid	B	40	19.17	Left	DFT-s-OFDM QPSK	0	0	1	50	1:1	0.419	26.9	
2 595	519000	NR Band n38	Mid	B	40	19.17	Bottom	DFT-s-OFDM QPSK	0	0	1	50	1:1	1.130	22.6	

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MEASUREMENT RESULTS																		
Frequency		Mode		Ant. No.	Band width	Frame Averaged Conducted Power	Test Position		MPR	Spacing (mm)	RB Size	RB offset	Duty Cycle	Meas. SAR(10g)	Plimit	Minim Plim
MHz	Ch.				MHz	(dBm)			(dB)					(W/kg)	(dBm)	(dBm)
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	20.26	Rear	DFT-s-OFDM QPSK	0	0	1	1	1:1	0.755	25.5	25.5
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	20.26	Front	DFT-s-OFDM QPSK	0	0	1	1	1:1	0.654	26.1	
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	20.26	Left	DFT-s-OFDM QPSK	0	0	1	1	1:1	0.256	30.2	
2 592.99	518598	NR Band n41(PC3)	Mid	B	100	20.26	Bottom	DFT-s-OFDM QPSK	0	0	1	1	1:1	0.641	26.2	
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	14.50	Rear	CW	0	0	-	-	1:1	0.266	24.2	20.0
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	14.50	Front	CW	0	0	-	-	1:1	0.313	23.5	
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	14.50	Left	CW	0	0	-	-	1:1	0.052	31.3	
2 592.99	518598	NR Band n41 SRS1	Mid	F	100	14.50	Top	CW	0	0	-	-	1:1	0.701	20.0	
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	14.97	Rear	CW	0	0	-	-	1:1	0.238	25.2	25.2
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	14.97	Front	CW	0	0	-	-	1:1	0.032	33.9	
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	14.97	Right	CW	0	0	-	-	1:1	0.000	N/A	
2 592.99	518598	NR Band n41 SRS2	Mid	D	100	14.97	Bottom	CW	0	0	-	-	1:1	0.025	35.0	
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	14.56	Rear	CW	0	0	-	-	1:1	0.105	28.3	25.6
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	14.56	Front	CW	0	0	-	-	1:1	0.170	26.2	
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	14.56	Right	CW	0	0	-	-	1:1	0.197	25.6	
2 592.99	518598	NR Band n41 SRS3	Mid	E	100	14.56	Top	CW	0	0	-	-	1:1	0.098	28.6	
3 624.99	641666	NR Band 48	Mid	F	100	17.50	Rear	DFT-s-OFDM QPSK	0	0	1	53	1:1	0.733	22.8	20.3
3 624.99	641666	NR Band 48	Mid	F	100	17.50	Front	DFT-s-OFDM QPSK	0	0	1	53	1:1	0.754	22.7	
3 624.99	641666	NR Band 48	Mid	F	100	17.50	Left	DFT-s-OFDM QPSK	0	0	1	53	1:1	0.088	32.0	
3 624.99	641666	NR Band 48	Mid	F	100	17.50	Top	DFT-s-OFDM QPSK	0	0	1	53	1:1	1.31	20.3	
3 624.99	641666	NR Band 48 SRS1	Mid	C	100	14.88	Rear	CW	0	0	-	-	1:1	0.439	22.4	19.9
3 624.99	641666	NR Band 48 SRS1	Mid	C	100	14.88	Front	CW	0	0	-	-	1:1	0.532	21.6	
3 624.99	641666	NR Band 48 SRS1	Mid	C	100	14.88	Left	CW	0	0	-	-	1:1	0.795	19.9	
3 624.99	641666	NR Band 48 SRS1	Mid	C	100	14.88	Bottom	CW	0	0	-	-	1:1	0.097	29.0	
3 680	645334	NR Band 48 SRS2	Mid	D	100	16.42	Rear	CW	0	0	-	-	1:1	0.797	21.4	21.4
3 680	645334	NR Band 48 SRS2	Mid	D	100	16.42	Front	CW	0	0	-	-	1:1	0.067	32.1	
3 680	645334	NR Band 48 SRS2	Mid	D	100	16.42	Right	CW	0	0	-	-	1:1	0.033	35.2	
3 680	645334	NR Band 48 SRS2	Mid	D	100	16.42	Bottom	CW	0	0	-	-	1:1	0.096	30.6	
3 680	645334	NR Band 48 SRS3	Mid	I	100	17.52	Rear	CW	0	0	-	-	1:1	0.594	23.8	23.5
3 680	645334	NR Band 48 SRS3	Mid	I	100	17.52	Front	CW	0	0	-	-	1:1	0.632	23.5	
3 680	645334	NR Band 48 SRS3	Mid	I	100	17.52	Left	CW	0	0	-	-	1:1	0.210	28.3	
1 745	349000	NR Band n66	Mid	A	40	18.76	Rear	DFT-s-OFDM QPSK	0	0	1	214	1:1	0.744	24.0	22.9
1 745	349000	NR Band n66	Mid	A	40	18.76	Front	DFT-s-OFDM QPSK	0	0	1	214	1:1	0.790	23.8	
1 745	349000	NR Band n66	Mid	A	40	18.76	Left	DFT-s-OFDM QPSK	0	0	1	214	1:1	0.229	29.1	
1 745	349000	NR Band n66	Mid	A	40	18.76	Right	DFT-s-OFDM QPSK	0	0	1	214	1:1	0.082	33.6	
1 745	349000	NR Band n66	Mid	A	40	18.76	Bottom	DFT-s-OFDM QPSK	0	0	1	214	1:1	0.974	22.9	
1 745	349000	NR Band n66	Mid	F	40	19.56	Rear	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.503	26.5	22.6
1 745	349000	NR Band n66	Mid	F	40	19.56	Front	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.691	25.1	
1 745	349000	NR Band n66	Mid	F	40	19.56	Left	DFT-s-OFDM QPSK	0	0	1	108	1:1	0.181	31.0	
1 745	349000	NR Band n66	Mid	F	40	19.56	Top	DFT-s-OFDM QPSK	0	0	1	108	1:1	1.250	22.6	

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MEASUREMENT RESULTS																
Frequency		Mode		Ant. No.	Band width	Frame Averaged Conducted Power	Test Position		MPR	Spacing (mm)	RB Size	RB offset	Duty Cycle	Meas. SAR(10g)	Plimit	Minim Plimi
MHz	Ch.				MHz	(dBm)			(dB)					(W/kg)	(dBm)	(dBm)
1 702.5	340500	NR Band n70	Mid	A	15	19.94	Rear	DFT-s-OFDM QPSK	0	0	1	77	1:1	0.822	24.8	23.8
1 702.5	340500	NR Band n70	Mid	A	15	19.94	Front	DFT-s-OFDM QPSK	0	0	1	77	1:1	0.941	24.2	
1 702.5	340500	NR Band n70	Mid	A	15	19.94	Left	DFT-s-OFDM QPSK	0	0	1	77	1:1	0.206	30.8	
1 702.5	340500	NR Band n70	Mid	A	15	19.94	Right	DFT-s-OFDM QPSK	0	0	1	77	1:1	0.029	39.3	
1 702.5	340500	NR Band n70	Mid	A	15	19.94	Bottom	DFT-s-OFDM QPSK	0	0	1	77	1:1	1.020	23.8	
680.5	136100	NR Band 71	Mid	A	20	25.11	Rear	DFT-s-OFDM QPSK	0	0	1	1	1:1	0.925	29.4	28.7
680.5	136100	NR Band 71	Mid	A	20	25.11	Front	DFT-s-OFDM QPSK	0	0	1	1	1:1	0.752	30.3	
680.5	136100	NR Band 71	Mid	A	20	25.11	Left	DFT-s-OFDM QPSK	0	0	1	1	1:1	1.100	28.7	
680.5	136100	NR Band 71	Mid	A	20	25.11	Right	DFT-s-OFDM QPSK	0	0	1	1	1:1	0.110	38.7	
680.5	136100	NR Band 71	Mid	A	20	25.11	Bottom	DFT-s-OFDM QPSK	0	0	1	1	1:1	0.595	31.3	
3 930	662000	NR Band 77(PC3)	Low	F	100	17.09	Rear	DFT-s-OFDM QPSK	0	0	1	271	1:1	0.887	21.6	21.6
3 930	662000	NR Band 77(PC3)	Low	F	100	17.09	Front	DFT-s-OFDM QPSK	0	0	1	271	1:1	0.653	22.9	
3 930	662000	NR Band 77(PC3)	Low	F	100	17.09	Left	DFT-s-OFDM QPSK	0	0	1	271	1:1	0.054	33.7	
3 930	662000	NR Band 77(PC3)	Low	F	100	17.09	Top	DFT-s-OFDM QPSK	0	0	1	271	1:1	0.792	22.1	
3 500.01	633334	NR Band 77 DoD(PC3)	Mid	F	100	17.17	Rear	DFT-s-OFDM QPSK	0	0	1	271	1:1	0.876	21.7	21.7
3 750	650000	NR Band 77 SRS1	Low	C	100	16.14	Rear	CW	0	0	-	-	1:1	0.621	22.2	19.7
3 750	650000	NR Band 77 SRS1	Low	C	100	16.14	Front	CW	0	0	-	-	1:1	0.625	22.2	
3 750	650000	NR Band 77 SRS1	Low	C	100	16.14	Left	CW	0	0	-	-	1:1	1.100	19.7	
3 750	650000	NR Band 77 SRS1	Low	C	100	16.14	Bottom	CW	0	0	-	-	1:1	0.063	32.1	
3 500.01	633334	NR Band 77DoD SRS1	Mid	C	100	16.11	Left	CW	0	0	-	-	1:1	0.97	20.2	20.2
3 750	650000	NR Band 77 SRS2	Low	D	100	16.77	Rear	CW	0	0	-	-	1:1	0.700	22.3	22.3
3 750	650000	NR Band 77 SRS2	Low	D	100	16.77	Front	CW	0	0	-	-	1:1	0.050	33.8	
3 750	650000	NR Band 77 SRS2	Low	D	100	16.77	Right	CW	0	0	-	-	1:1	0.033	35.6	
3 750	650000	NR Band 77 SRS2	Low	D	100	16.77	Bottom	CW	0	0	-	-	1:1	0.084	31.5	
3 500.01	633334	NR Band 77DoD SRS2	Mid	D	100	15.79	Rear	CW	0	0	-	-	1:1	0.678	21.5	21.5
3 750	650000	NR Band 77 SRS3	Low	I	100	17.95	Rear	CW	0	0	-	-	1:1	0.513	24.8	24.8
3 750	650000	NR Band 77 SRS3	Low	I	100	17.95	Front	CW	0	0	-	-	1:1	0.423	25.7	
3 750	650000	NR Band 77 SRS3	Low	I	100	17.95	Left	CW	0	0	-	-	1:1	0.178	29.4	
3 500.01	633334	NR Band 77DoD SRS3	Mid	I	100	17.10	Rear	CW	0	0	-	-	1:1	0.498	24.1	24.1

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Table A-12 DSI = 0 *PLimit* Calculations – WLAN Phablet SAR

For some bands/modes, a lower P_{Limit} was selected as a more conservative evaluation.

MEASUREMENT RESULTS														
Frequency		Mode/ Band	Band width	Ant. No.	Data Rate	Frame Averaged Conducted Power	Test Position	Ant. Config.	Spacing (mm)	Duty Cycle	Meas. SAR(10g)	Scaling Factor	Plimit	Minimum Plimit
MHz	Ch.		(MHz)		(Mbps)	(dBm)					(W/kg)	(Duty)	(dBm)	(dBm)
2 437	6	802.11b	20	H	1	15.37	Rear	WIFI1	0	99.0	0.710	1.010	17.8	17.6
2 437	6	802.11b	20	H	1	15.37	Front	WIFI1	0	99.0	0.637	1.010	18.3	
2 437	6	802.11b	20	H	1	15.37	Left	WIFI1	0	99.0	0.747	1.010	17.6	
2 437	6	802.11b	20	H	1	15.37	Top	WIFI1	0	99.0	0.326	1.010	21.2	
2 412	1	802.11b	20	J	1	16.80	Rear	WIFI2	0	99.0	0.073	1.010	29.1	27.2
2 412	1	802.11b	20	J	1	16.80	Front	WIFI2	0	99.0	0.270	1.010	23.5	
2 412	1	802.11b	20	J	1	16.80	Right	WIFI2	0	99.0	0.115	1.010	27.2	
2 437	6	802.11g	20	H,J	6	15.67	Rear	MIMO	0	93	0.489	1.075	19.7	19.7
2 437	6	802.11g	20	H,J	6	15.67	Front	MIMO	0	93	0.455	1.075	20.1	
2 437	6	802.11g	20	H,J	6	15.67	Left	MIMO	0	93	0.483	1.075	19.8	
2 437	6	802.11g	20	H,J	6	15.67	Right	MIMO	0	93	0.079	1.075	27.7	
2 437	6	802.11g	20	H,J	6	15.67	Top	MIMO	0	93	0.182	1.075	24.0	
5 775	155	802.11ac	80	H	MCS0	15.49	Rear	WIFI1	0	86.0	0.435	1.166	20.1	16.8
5 775	155	802.11ac	80	H	MCS0	15.49	Front	WIFI1	0	86.0	0.390	1.166	20.5	
5 775	155	802.11ac	80	H	MCS0	15.49	Left	WIFI1	0	86.0	0.926	1.166	16.8	
5 775	155	802.11ac	80	H	MCS0	15.49	Top	WIFI1	0	86.0	0.123	1.166	25.6	
5 290	58	802.11ac	80	E	MCS0	15.15	Rear	WIFI2	0	86.0	0.426	1.166	19.8	19.8
5 855	171	802.11ac	80	E	MCS0	15.61	Front	WIFI2	0	86.0	0.309	1.166	21.7	
5 690	138	802.11ac	80	E	MCS0	15.51	Right	WIFI2	0	86.0	0.094	1.166	26.7	
5 690	138	802.11ac	80	E	MCS0	15.51	Top	WIFI2	0	86.0	0.359	1.166	23.3	
5 775	155	802.11ac	80	H,E	MCS0	15.42	Rear	MIMO	0	86.0	0.604	1.166	18.6	16.8
5 775	155	802.11ac	80	H,E	MCS0	15.42	Front	MIMO	0	86.0	0.584	1.166	18.7	
5 775	155	802.11ac	80	H,E	MCS0	15.42	Left	MIMO	0	86.0	0.916	1.166	16.8	
5 690	138	802.11ac	80	H,E	MCS0	15.51	Right	MIMO	0	86.0	0.080	1.166	27.4	
5 290	58	802.11ac	80	H,E	MCS0	15.15	Rear	MIMO	0	86.0	0.177	1.166	23.6	
6 505	111	802.11ax	160	H	MCS0	8.70	Rear	WIFI1	0	99.5	0.122	1.005	18.8	15.8
6 505	111	802.11ax	160	H	MCS0	8.70	Front	WIFI1	0	99.5	0.194	1.005	16.8	
6 505	111	802.11ax	160	H	MCS0	8.70	Left	WIFI1	0	99.5	0.241	1.005	15.8	
6 505	111	802.11ax	160	H	MCS0	8.70	Top	WIFI1	0	99.5	0.039	1.005	23.8	
6 505	111	802.11ac	160	E	MCS0	8.62	Rear	WIFI2	0	99.5	0.104	1.005	19.4	19.4
6 505	111	802.11ac	160	E	MCS0	8.62	Front	WIFI2	0	99.5	0.084	1.005	20.3	
6 505	111	802.11ac	160	E	MCS0	8.62	Right	WIFI2	0	99.5	0.015	1.005	27.8	
6 505	111	802.11ac	160	E	MCS0	8.62	Top	WIFI2	0	99.5	0.032	1.005	24.5	

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Table A-13 DSI = 2 *PLimit* Calculations – WLAN Hotspot SAR

For some bands/modes, a lower P_{Limit} was selected as a more conservative evaluation.

MEASUREMENT RESULTS														
Frequency		Mode/ Band	Band width	Ant. No.	Data Rate	Frame Averaged Conducted Power	Test Position	Ant. Config.	Spacing (mm)	Duty Cycle	Meas. SAR(1g)	Scaling Factor	Plimit	Minimum Plimit
MHz	Ch.		(MHz)		(Mbps)	(dBm)					(W/kg)	(Duty)	(dBm)	(dBm)
5 290	58	802.11ac	80	H	MCS0	13.37	Rear	WIFI1	10	86.0	0.073	1.166	22.5	22.1
5 290	58	802.11ac	80	H	MCS0	13.37	Front	WIFI1	10	86.0	0.049	1.166	24.2	
5 290	58	802.11ac	80	H	MCS0	13.37	Left	WIFI1	10	86.0	0.080	1.166	22.1	
5 290	58	802.11ac	80	H	MCS0	13.37	Top	WIFI1	10	86.0	0.036	1.166	25.6	
5 690	138	802.11ac	80	H	MCS0	13.61	Rear	WIFI1	10	86.0	0.061	1.166	23.5	20.2
5 690	138	802.11ac	80	H	MCS0	13.61	Front	WIFI1	10	86.0	0.056	1.166	23.9	
5 690	138	802.11ac	80	H	MCS0	13.61	Left	WIFI1	10	86.0	0.116	1.166	20.7	
5 690	138	802.11ac	80	H	MCS0	13.61	Top	WIFI1	10	86.0	0.131	1.166	20.2	
5 775	155	802.11ac	80	H	MCS0	13.77	Rear	WIFI1	10	86.0	0.089	1.166	22.1	21.1
5 775	155	802.11ac	80	H	MCS0	13.77	Front	WIFI1	10	86.0	0.049	1.166	24.6	
5 775	155	802.11ac	80	H	MCS0	13.77	Left	WIFI1	10	86.0	0.110	1.166	21.1	
5 775	155	802.11ac	80	H	MCS0	13.77	Top	WIFI1	10	86.0	0.063	1.166	23.6	
5 855	171	802.11ac	80	H	MCS0	13.79	Rear	WIFI1	10	86.0	0.068	1.166	23.2	20.9
5 855	171	802.11ac	80	H	MCS0	13.79	Front	WIFI1	10	86.0	0.066	1.166	23.4	
5 855	171	802.11ac	80	H	MCS0	13.79	Left	WIFI1	10	86.0	0.116	1.166	20.9	
5 855	171	802.11ac	80	H	MCS0	13.79	Top	WIFI1	10	86.0	0.068	1.166	23.2	
5 290	58	802.11ac	80	E	MCS0	13.11	Rear	WIFI2	10	86.0	0.285	1.166	16.3	16.3
5 290	58	802.11ac	80	E	MCS0	13.11	Front	WIFI2	10	86.0	0.054	1.166	23.6	
5 290	58	802.11ac	80	E	MCS0	13.11	Right	WIFI2	10	86.0	0.039	1.166	25.0	
5 290	58	802.11ac	80	E	MCS0	13.11	Top	WIFI2	10	86.0	0.151	1.166	19.1	
5 690	138	802.11ac	80	E	MCS0	13.57	Rear	WIFI2	10	86.0	0.180	1.166	18.8	18.8
5 690	138	802.11ac	80	E	MCS0	13.57	Front	WIFI2	10	86.0	0.053	1.166	24.1	
5 690	138	802.11ac	80	E	MCS0	13.57	Right	WIFI2	10	86.0	0.083	1.166	22.2	
5 690	138	802.11ac	80	E	MCS0	13.57	Top	WIFI2	10	86.0	0.074	1.166	22.7	
5 775	155	802.11ac	80	E	MCS0	13.04	Rear	WIFI2	10	86.0	0.156	1.166	18.9	18.9
5 775	155	802.11ac	80	E	MCS0	13.04	Front	WIFI2	10	86.0	0.146	1.166	19.2	
5 775	155	802.11ac	80	E	MCS0	13.04	Right	WIFI2	10	86.0	0.157	1.166	18.9	
5 775	155	802.11ac	80	E	MCS0	13.04	Top	WIFI2	10	86.0	0.060	1.166	23.0	
5 855	171	802.11ac	80	E	MCS0	13.55	Rear	WIFI2	10	86.0	0.177	1.166	18.9	18.9
5 855	171	802.11ac	80	E	MCS0	13.55	Front	WIFI2	10	86.0	0.048	1.166	24.5	
5 855	171	802.11ac	80	E	MCS0	13.55	Right	WIFI2	10	86.0	0.096	1.166	21.5	
5 855	171	802.11ac	80	E	MCS0	13.55	Top	WIFI2	10	86.0	0.051	1.166	24.3	
5 290	58	802.11ac	80	H,E	MCS0	13.11	Rear	MIMO	10	86.0	0.168	1.166	18.6	18.6
5 290	58	802.11ac	80	H,E	MCS0	13.11	Front	MIMO	10	86.0	0.067	1.166	22.6	
5 290	58	802.11ac	80	H,E	MCS0	13.11	Left	MIMO	10	86.0	0.041	1.166	24.8	
5 290	58	802.11ac	80	H,E	MCS0	13.11	Right	MIMO	10	86.0	0.052	1.166	23.7	
5 290	58	802.11ac	80	H,E	MCS0	13.11	Top	MIMO	10	86.0	0.134	1.166	19.6	
5 690	138	802.11ac	80	H,E	MCS0	13.57	Rear	MIMO	10	86.0	0.153	1.166	19.5	19.5
5 690	138	802.11ac	80	H,E	MCS0	13.57	Front	MIMO	10	86.0	0.065	1.166	23.2	
5 690	138	802.11ac	80	H,E	MCS0	13.57	Left	MIMO	10	86.0	0.118	1.166	20.6	
5 690	138	802.11ac	80	H,E	MCS0	13.57	Right	MIMO	10	86.0	0.087	1.166	22.0	
5 690	138	802.11ac	80	H,E	MCS0	13.57	Top	MIMO	10	86.0	0.082	1.166	22.2	

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MEASUREMENT RESULTS														
Frequency		Mode/ Band	Band width	Ant. No.	Data Rate	Frame Averaged Conducted Power	Test Position	Ant. Config.	Spacing (mm)	Duty Cycle	Meas. SAR(1g)	Scaling Factor	Plimit	Minimum Plimit
MHz	Ch.		(MHz)		(Mbps)	(dBm)					(W/kg)	(Duty)	(dBm)	(dBm)
5 775	155	802.11ac	80	H,E	MCS0	13.04	Rear	MIMO	10	86.0	0.157	1.166	18.9	18.9
5 775	155	802.11ac	80	H,E	MCS0	13.04	Front	MIMO	10	86.0	0.086	1.166	21.5	
5 775	155	802.11ac	80	H,E	MCS0	13.04	Left	MIMO	10	86.0	0.097	1.166	21.0	
5 775	155	802.11ac	80	H,E	MCS0	13.04	Right	MIMO	10	86.0	0.075	1.166	22.1	
5 775	155	802.11ac	80	H,E	MCS0	13.04	Top	MIMO	10	86.0	0.071	1.166	22.3	
5 855	171	802.11ac	80	H,E	MCS0	13.55	Rear	MIMO	10	86.0	0.156	1.166	19.4	16.3
5 855	171	802.11ac	80	H,E	MCS0	13.55	Front	MIMO	10	86.0	0.063	1.166	23.3	
5 855	171	802.11ac	80	H,E	MCS0	13.55	Left	MIMO	10	86.0	0.322	1.166	16.3	
5 855	171	802.11ac	80	H,E	MCS0	13.55	Right	MIMO	10	86.0	0.040	1.166	25.3	
5 855	171	802.11ac	80	H,E	MCS0	13.55	Top	MIMO	10	86.0	0.057	1.166	23.8	

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Table A-13 DSI = 2 *PLimit* Calculations – WLAN Phablet SAR

For some bands/modes, a lower P_{Limit} was selected as a more conservative evaluation.

MEASUREMENT RESULTS														
Frequency		Mode/ Band	Band width	Ant. No.	Data Rate	Frame Averaged Conducted Power	Test Position	Ant. Config.	Spacing (mm)	Duty Cycle	Meas. SAR(1g)	Scaling Factor	Plimit	Minimum Plimit
MHz	Ch.		(MHz)		(Mbps)	(dBm)					(W/kg)	(Duty)	(dBm)	(dBm)
5 290	58	802.11ac	80	H	MCS0	13.37	Rear	WIFI1	0	86.0	0.273	1.166	20.0	18.5
5 290	58	802.11ac	80	H	MCS0	13.37	Front	WIFI1	0	86.0	0.368	1.166	18.7	
5 290	58	802.11ac	80	H	MCS0	13.37	Left	WIFI1	0	86.0	0.380	1.166	18.5	
5 290	58	802.11ac	80	H	MCS0	13.37	Top	WIFI1	0	86.0	0.062	1.166	26.4	
5 690	138	802.11ac	80	H	MCS0	13.61	Rear	WIFI1	0	86.0	0.277	1.166	20.2	18.9
5 690	138	802.11ac	80	H	MCS0	13.61	Front	WIFI1	0	86.0	0.218	1.166	21.2	
5 690	138	802.11ac	80	H	MCS0	13.61	Left	WIFI1	0	86.0	0.373	1.166	18.9	
5 690	138	802.11ac	80	H	MCS0	13.61	Top	WIFI1	0	86.0	0.052	1.166	27.4	
5 775	155	802.11ac	80	H	MCS0	13.77	Rear	WIFI1	0	86.0	0.174	1.166	22.3	18.4
5 775	155	802.11ac	80	H	MCS0	13.77	Front	WIFI1	0	86.0	0.263	1.166	20.5	
5 775	155	802.11ac	80	H	MCS0	13.77	Left	WIFI1	0	86.0	0.435	1.166	18.4	
5 775	155	802.11ac	80	H	MCS0	13.77	Top	WIFI1	0	86.0	0.051	1.166	27.7	
5 855	171	802.11ac	80	H	MCS0	13.79	Rear	WIFI1	0	86.0	0.197	1.166	21.8	19.5
5 855	171	802.11ac	80	H	MCS0	13.79	Front	WIFI1	0	86.0	0.267	1.166	20.5	
5 855	171	802.11ac	80	H	MCS0	13.79	Left	WIFI1	0	86.0	0.332	1.166	19.5	
5 855	171	802.11ac	80	H	MCS0	13.79	Top	WIFI1	0	86.0	0.023	1.166	31.1	
5 290	58	802.11ac	80	E	MCS0	13.11	Rear	WIFI2	0	86.0	0.244	1.166	20.2	20.2
5 290	58	802.11ac	80	E	MCS0	13.11	Front	WIFI2	0	86.0	0.210	1.166	20.9	
5 290	58	802.11ac	80	E	MCS0	13.11	Right	WIFI2	0	86.0	0.089	1.166	24.6	
5 290	58	802.11ac	80	E	MCS0	13.11	Top	WIFI2	0	86.0	0.206	1.166	20.9	
5 690	138	802.11ac	80	E	MCS0	13.57	Rear	WIFI2	0	86.0	0.215	1.166	21.2	20.5
5 690	138	802.11ac	80	E	MCS0	13.57	Front	WIFI2	0	86.0	0.148	1.166	22.8	
5 690	138	802.11ac	80	E	MCS0	13.57	Right	WIFI2	0	86.0	0.071	1.166	26.0	
5 690	138	802.11ac	80	E	MCS0	13.57	Top	WIFI2	0	86.0	0.254	1.166	20.5	
5 775	155	802.11ac	80	E	MCS0	13.04	Rear	WIFI2	0	86.0	0.242	1.166	20.2	20.2
5 775	155	802.11ac	80	E	MCS0	13.04	Front	WIFI2	0	86.0	0.160	1.166	22.0	
5 775	155	802.11ac	80	E	MCS0	13.04	Right	WIFI2	0	86.0	0.036	1.166	28.4	
5 775	155	802.11ac	80	E	MCS0	13.04	Top	WIFI2	0	86.0	0.099	1.166	24.1	
5 855	171	802.11ac	80	E	MCS0	13.55	Rear	WIFI2	0	86.0	0.249	1.166	20.6	20.6
5 855	171	802.11ac	80	E	MCS0	13.55	Front	WIFI2	0	86.0	0.173	1.166	22.1	
5 855	171	802.11ac	80	E	MCS0	13.55	Right	WIFI2	0	86.0	0.032	1.166	29.5	
5 855	171	802.11ac	80	E	MCS0	13.55	Top	WIFI2	0	86.0	0.088	1.166	25.1	
5 290	58	802.11ac	80	H,E	MCS0	13.11	Rear	MIMO	0	86.0	0.238	1.166	20.3	19.6
5 290	58	802.11ac	80	H,E	MCS0	13.11	Front	MIMO	0	86.0	0.195	1.166	21.2	
5 290	58	802.11ac	80	H,E	MCS0	13.11	Left	MIMO	0	86.0	0.280	1.166	19.6	
5 290	58	802.11ac	80	H,E	MCS0	13.11	Right	MIMO	0	86.0	0.114	1.166	23.5	
5 290	58	802.11ac	80	H,E	MCS0	13.11	Top	MIMO	0	86.0	0.175	1.166	21.6	
5 690	138	802.11ac	80	H,E	MCS0	13.57	Rear	MIMO	0	86.0	0.094	1.166	24.8	18.3
5 690	138	802.11ac	80	H,E	MCS0	13.57	Front	MIMO	0	86.0	0.229	1.166	20.9	
5 690	138	802.11ac	80	H,E	MCS0	13.57	Left	MIMO	0	86.0	0.420	1.166	18.3	
5 690	138	802.11ac	80	H,E	MCS0	13.57	Right	MIMO	0	86.0	0.040	1.166	28.5	
5 690	138	802.11ac	80	H,E	MCS0	13.57	Top	MIMO	0	86.0	0.106	1.166	24.3	

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MEASUREMENT RESULTS														
Frequency		Mode/ Band	Band width	Ant. No.	Data Rate	Frame Averaged Conducted Power	Test Position	Ant. Config.	Spacing (mm)	Duty Cycle	Meas. SAR(1g)	Scaling Factor	Plimit	Minimum Plimit
MHz	Ch.		(MHz)		(Mbps)	(dBm)					(W/kg)	(Duty)	(dBm)	(dBm)
5 775	155	802.11ac	80	H,E	MCS0	13.04	Rear	MIMO	0	86.0	0.288	1.166	19.4	17.7
5 775	155	802.11ac	80	H,E	MCS0	13.04	Front	MIMO	0	86.0	0.261	1.166	19.8	
5 775	155	802.11ac	80	H,E	MCS0	13.04	Left	MIMO	0	86.0	0.423	1.166	17.7	
5 775	155	802.11ac	80	H,E	MCS0	13.04	Right	MIMO	0	86.0	0.076	1.166	25.2	
5 775	155	802.11ac	80	H,E	MCS0	13.04	Top	MIMO	0	86.0	0.092	1.166	24.4	
5 855	171	802.11ac	80	H,E	MCS0	13.55	Rear	MIMO	0	86.0	0.232	1.166	20.9	17.6
5 855	171	802.11ac	80	H,E	MCS0	13.55	Front	MIMO	0	86.0	0.291	1.166	19.9	
5 855	171	802.11ac	80	H,E	MCS0	13.55	Left	MIMO	0	86.0	0.487	1.166	17.6	
5 855	171	802.11ac	80	H,E	MCS0	13.55	Right	MIMO	0	86.0	0.030	1.166	29.7	
5 855	171	802.11ac	80	H,E	MCS0	13.55	Top	MIMO	0	86.0	0.102	1.166	24.4	

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