

SAR TEST REPORT

Application No.: SUCR2509000895AT
Applicant: Askey Computer Corporation
Address of Applicant: 10F, No. 119, JianKang RD., Zhonghe Dist., New Taipei City, 23585 Taiwan
Manufacturer: Askey Computer Corporation
Address of Manufacturer: 10F, No. 119, JianKang RD., Zhonghe Dist., New Taipei City, 23585 Taiwan
EUT Description: 5G USB Dongle
Model No.: NDQ2300
Trade Mark: ASKEY, Dynalink
FCC ID: H8NNDQ2300-2
Standards: FCC 47CFR §2.1093
Date of Receipt: 2025-09-04
Date of Test: 2025-09-04 to 2025-09-24
Date of Issue: 2025-09-28

Test Result :	PASS *
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* In the configuration tested, the EUT detailed in this report complied with the standards specified above.

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Revision Record			
Version	Description	Date	Remark
01	Original	2025-09-28	/

Authorized for issue by:		
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TEST SUMMARY

Frequency Band	Maximum Reported SAR(W/kg)
	Body
LTE Band 7	0.77
LTE Band 12	0.38
LTE Band 13	0.37
LTE Band 14	0.73
LTE Band 25(2)	0.77
LTE Band 26(5)	0.70
LTE Band 30	0.79
LTE Band 41	0.79
LTE Band 48	0.78
LTE Band 66(4)	0.53
LTE Band 71	0.60
NR Band n7	1.15
NR Band n12	0.80
NR Band n14	0.80
NR Band n25(2)	0.78
NR Band n26(5)	0.42
NR Band n30	1.07
NR Band n41	1.19
NR Band n48	1.11
NR Band n66	0.80
NR Band n71	0.45
NR Band n77(78)	1.10
SAR Limited(W/kg)	1.6
Maximum Simultaneous Transmission SAR (W/kg)	
Scenario	Body
Sum SAR	1.38
SPLSR	/
SPLSR Limited	0.04

Note:

According to TCB workshop October, 2014 RF Exposure Procedures Update (Overlapping Bands): SAR for LTE Band 2/4/5, NR Band n2/5/78 is respectively covered by LTE Band 25/66/26, NR Band 25/26/77 due to similar frequency range, same maximum tune up limit and same channel bandwidth.

Because the frequency range is similar, the maximum tuning limit is the same, and the channel bandwidth and other operating parameters for the smaller band is fully supported by the larger band.

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1 General Information

1.1 General Description of EUT

Product Name:	5G USB Dongle	
Model No.:	NDQ2300	
Trade Mark:	ASKEY,Dynalink	
USB Cable	0.5m	
Product Phase:	production unit	
Device Type:	portable device	
Exposure Category:	uncontrolled environment / general population	
IMEI:	355241830384682	
Hardware Version:	NDQ2300_V3	
Software Version:	NDQ2300 V4.1.0.0	
Antenna Type:	Internal antennas	
Device Operating Configurations:		
Modulation Mode:	LTE:QPSK,16QAM,64QAM,256QAM 5G NR:DFT-s-OFDM(PI/2 BPSK,QPSK,16QAM,64QAM,256QAM) CP-OFDM(QPSK,16QAM,64QAM,256QAM)	
Power Class:	3, tested with power control “max power”(LTE Band)	
Frequency Bands:	Band	Tx(MHz)
	LTE Band 2	1850 ~1910
	LTE Band 4	1710~1755
	LTE Band 5	824~849
	LTE Band 7	2500~2570
	LTE Band 12	699~716
	LTE Band 13	777~787
	LTE Band 14	788~798
	LTE Band 25	1850~1915
	LTE Band 26	814~849
	LTE Band 30	2305~2315
	LTE Band 41	2496~2690
	LTE Band 48	3550~3700
	LTE Band 66	1710~1780
	LTE Band 71	663~698
	NR Band n2	1850 ~1910
	NR Band n5	824~849
	NR Band n7	2500~2570
	NR Band n12	699~716
	NR Band n14	788~798



	NR Band n25	1850~1915
	NR Band n26	814~849
	NR Band n30	2305~2315
	NR Band n41	2496~2690
	NR Band n48	3550~3700
	NR Band n66	1710~1780
	NR Band n71	663~698
	NR Band n77	3450~3550
		3700~3980
	NR Band n78	3450~3550
3700~3800		
RF Cable:	☒ Provided by applicant ☐ Provided by the laboratory	
Note: *Since the above data and/or information is provided by the client relevant results or conclusions of this report are only made for these data and/or information , SGS is not responsible for the authenticity, integrity and results of the data and information and/or the validity of the conclusion.		

1.2 Test Specification

Identity	Document Title
FCC 47CFR §2.1093	Radiofrequency Radiation Exposure Evaluation: Portable Devices
ANSI/IEEE C95.1-1992	IEEE Standard for Safety Levels with Respect to Human Exposure to Radio Frequency Electromagnetic Fields, 3 kHz – 300 GHz.
IEEE 1528-2013	Recommended Practice for Determining the Peak Spatial-Average Specific Absorption Rate (SAR) in the Human Head from Wireless Communications Devices: Measurement Techniques
KDB 941225 D05	SAR for LTE Devices v02r05
KDB 941225 D05A	LTE Rel.10 KDB Inquiry Sheet v01r02
KDB 447498 D01	General RF Exposure Guidance v06
KDB 447498 D02	SAR Procedures for Dongle Xmtr v02r01
KDB 865664 D01	SAR Measurement 100 MHz to 6 GHz v01r04
KDB 865664 D02	RF Exposure Reporting v01r02
KDB 690783 D01	SAR Listings on Grants v01r03
KDB 616217 D04	SAR for laptop and tablets v01r02

1.3 RF exposure limits

Human Exposure	Uncontrolled Environment General Population	Controlled Environment Occupational
Spatial Peak SAR* (Brain*Trunk)	1.60 mW/g	8.00 mW/g
Spatial Average SAR** (Whole Body)	0.08 mW/g	0.40 mW/g
Spatial Peak SAR*** (Hands/Feet/Ankle/Wrist)	4.00 mW/g	20.00 mW/g

Notes:

* The Spatial Peak value of the SAR averaged over any 1 gram of tissue (defined as a tissue volume in the shape of a cube) and over the appropriate averaging time

** The Spatial Average value of the SAR averaged over the whole body.

*** The Spatial Peak value of the SAR averaged over any 10 grams of tissue (defined as a tissue volume in the shape of a cube) and over the appropriate averaging time.

Uncontrolled Environments are defined as locations where there is the exposure of individuals who have no knowledge or control of their exposure.

Controlled Environments are defined as locations where there is exposure that may be incurred by persons who are aware of the potential for exposure, (i.e. as a result of employment or occupation.)

1.4 Test Location

All tests were performed at:

SGS-CSTC Standards Technical Services (Suzhou) Co., Ltd.

South of No. 6 Plant, No. 1, Runsheng Road, Suzhou Industrial Park, Suzhou Area, China (Jiangsu)
Pilot Free Trade Zone

No tests were sub-contracted.

1.5 Test Facility

The test facility is recognized, certified, or accredited by the following organizations:

- **A2LA (Certificate No. 6336.01)**

SGS-CSTC STANDARDS TECHNICAL SERVICES (SUZHOU) CO., LTD. is accredited by the American Association for Laboratory Accreditation(A2LA). Certificate No. 6336.01.

- **Innovation, Science and Economic Development Canada**

SGS-CSTC STANDARDS TECHNICAL SERVICES (SUZHOU) CO., LTD. has been recognized by ISED as an accredited testing laboratory.

CAB identifier: CN0120.

IC#: 27594.

- **FCC –Designation Number: CN1312**

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Designation Number: CN1312.

Test Firm Registration Number: 717327

2 Laboratory Environment

Temperature	Min. = 18°C, Max. = 25 °C
Relative humidity	Min. = 30%, Max. = 70%
Ground system resistance	< 0.5 Ω
Ambient noise is checked and found very low and in compliance with requirement of standards. Reflection of surrounding objects is minimized and in compliance with requirement of standards.	

3 SAR Measurements System Configuraion

3.1 The SAR Measurement System

This SAR Measurement System uses a Computer-controlled 3-D stepper motor system (SPEAG DASY professional system). A E-field probe is used to determine the internal electric fields. The SAR can be obtained from the equation $SAR = \sigma (|E|^2) / \rho$ where σ and ρ are the conductivity and mass density of the tissue-Simulate.

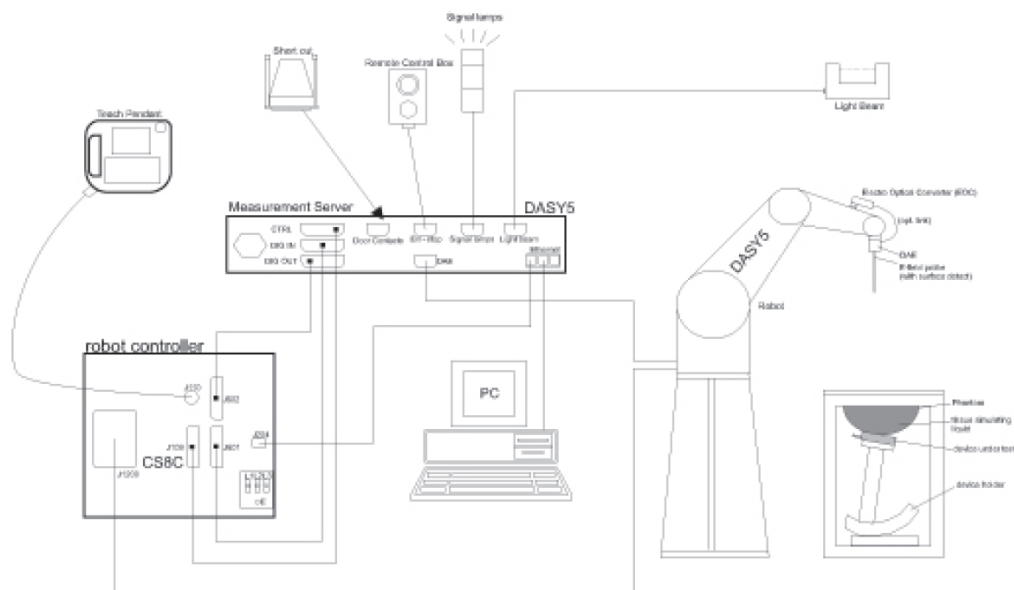
The DASY system for performing compliance tests consists of the following items:

A standard high precision 6-axis robot (Stabile RX family) with controller, teach pendant and software. An arm extension for accommodation the data acquisition electronics (DAE).

A dosimetric probe, i.e., an isotropic E-field probe optimized and calibrated for usage in tissue simulating liquid. The probe is equipped with an optical surface detector system.

A data acquisition electronics (DAE) which performs the signal amplification, signal multiplexing, AD-conversion, offset measurements, mechanical surface detection, collision detection, etc. The unit is battery powered with standard or rechargeable batteries. The signal is optically transmitted to the EOC.

The Electro-optical converter (EOC) performs the conversion between optical and electrical of the signals for the digital communication to DAE and for the analog signal from the optical surface detection. The EOC is connected to the measurement server.



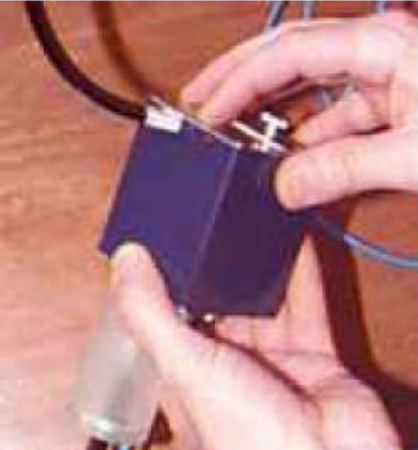
F-1. SAR Measurement System Configuration

- The function of the measurement server is to perform the time critical tasks such as signal filtering, control of the robot operation and fast movement interrupts.
- A probe alignment unit which improves the (absolute) accuracy of the probe positioning.
- A computer operating Windows system.
- DASY software.
- Remote control with teach pendant and additional circuitry for robot safety such as warning lamps, etc.
- The SAM twin phantom enabling testing left-hand, right-hand and Body Worn usage.
- The device holder for handheld mobile phones.
- Tissue simulating liquid mixed according to the given recipes.
- Validation dipole kits allowing to validating the proper functioning of the system.

3.2 Isotropic E-field Probe EX3DV4

	Symmetrical design with triangular core Built-in shielding against static charges PEEK enclosure material (resistant to organic solvents, e.g., DGBE)
Calibration	ISO/IEC 17025 calibration service available.
Frequency	10 MHz to > 6 GHz Linearity: ± 0.2 dB (30 MHz to 6 GHz)
Directivity	± 0.3 dB in TSL (rotation around probe axis) ± 0.5 dB in TSL (rotation normal to probe axis)
Dynamic Range	10 μ W/g to > 100 mW/g Linearity: ± 0.2 dB (noise: typically < 1 μ W/g)
Dimensions	Overall length: 337 mm (Tip: 20 mm) Tip diameter: 2.5 mm (Body: 12 mm) Typical distance from probe tip to dipole centers: 1 mm
Application	High precision dosimetric measurements in any exposure scenario (e.g., very strong gradient fields); the only probe that enables compliance testing for frequencies up to 6 GHz with precision of better 30%.
Compatibility	DASY52 SAR and higher, EASY4/MRI

3.3 Data Acquisition Electronics (DAE)

Model	DAE	
Construction	Signal amplifier, multiplexer, A/D converter and control logic. Serial optical link for communication with DASY4/5 embedded system (fully remote controlled). Two step probe touch detector for mechanical surface detection and emergency robot stop.	
Measurement Range	-100 to +300 mV (16 bit resolution and two range settings: 4mV,400mV)	
Input Offset Voltage	< 5μV (with auto zero)	
Input Bias Current	< 50 f A	
Dimensions	60 x 60 x 68 mm	

3.4 SAM Twin Phantom

Material	Vinylester, glass fiber reinforced (VE-GF)	
Liquid Compatibility	Compatible with all SPEAG tissue simulating liquids (incl. DGBE type)	
Shell Thickness	2 ± 0.2 mm (6 ± 0.2 mm at ear point)	
Dimensions (incl. Wooden Support)	Length: 1000 mm Width: 500 mm Height: adjustable feet	
Filling Volume	pprox.. 25 liters	
Wooden Support	SPEAG standard phantom table	

The shell corresponds to the specifications of the Specific Anthropomorphic Mannequin (SAM) phantom defined in IEEE 1528. It enables the dosimetric evaluation of left and right hand phone usage as well as body mounted usage at the flat phantom region. A cover prevents evaporation of the liquid. Reference markings on the phantom allow the complete setup of all predefined phantom positions and measurement grids by teaching three points with the robot.

Twin SAM V5.0 has the same shell geometry and is manufactured from the same material as Twin SAM V4.0, but has reinforced top structure.

3.5 ELI Phantom

Material	Vinylester, glass fiber reinforced (VE-GF)	
Liquid Compatibility	Compatible with all SPEAG tissue simulating liquids (incl. DGBE type)	
Shell Thickness	2.0 ± 0.2 mm(bottom plate)	
Dimensions	Major axis: 600 mm Minor axis: 400 mm	
Filling Volume	pprox.. 30 liters	
Wooden Support	SPEAG standard phantom table	

Phantom for compliance testing of handheld and body-mounted wireless devices in the frequency range of 30 MHz to 6 GHz. ELI is fully compatible with the IEEE 1528 standard and all known tissue simulating liquids. ELI has been optimized regarding its performance and can be integrated into our standard phantom tables. A cover prevents evaporation of the liquid. Reference markings on the phantom allow installation of the complete setup, including all predefined phantom positions and measurement grids, by teaching three points. The phantom is compatible with all SPEAG dosimetric probes and dipoles.

ELI V5.0 has the same shell geometry and is manufactured from the same material as ELI4 but has reinforced top structure.

3.6 Device Holder for Transmitters



F-2. Device Holder for Transmitters

- The DASY device holder is designed to cope with different positions given in the standard. It has two scales for the device rotation (with respect to the body axis) and the device inclination (with respect to the line between the ear reference points). The rotation centres for both scales are the ear reference point (ERP). Thus the device needs no repositioning when changing the angles.
- The DASY device holder has been made out of low-loss POM material having the following dielectric parameters: relative permittivity $\epsilon=3$ and loss tangent $\delta=0.02$. The amount of dielectric material has been reduced in the closest vicinity of the device, since measurements have suggested that the influence of the clamp on the test results could thus be lowered.

3.7 Measurement Procedure

3.7.1 Scanning procedure

Step 1: Power reference measurement

The “reference” and “drift” measurements are located at the beginning and end of the batch process. They measure the field drift at one single point in the liquid over the complete procedure.

Step 2: Area scan

The SAR distribution at the exposed side of the head was measured at a distance of 4mm from the inner surface of the shell. The area covered the entire dimension of the head and the horizontal grid spacing was 15mm*15mm or 12mm*12mm or 10mm*10mm. Based on the area scan data, the area of the maximum absorption was determined by spline interpolation.

Step 3: Zoom scan

Around this point, a volume of 32mm*32mm*30mm ($f \leq 2\text{GHz}$), 30mm*30mm*30mm (f for 2-3GHz) and 24mm*24mm*22mm (f for 5-6GHz) was assessed by measuring 5x5x7 points ($f \leq 2\text{GHz}$), 7x7x7 points (f for 2-3GHz) and 7x7x12 points (f for 5-6GHz). On this basis of this data set, the spatial peak SAR value was evaluated with the following procedure:

The data at the surface was extrapolated, since the centre of the dipoles is 2.0mm away from the tip of the probe and the distance between the surface and the lowest measuring point is 1.2mm. (This can be variable. Refer to the probe specification). 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. The maximum interpolated value was searched with a straight-forward algorithm. Around this maximum the SAR values averaged over the spatial volumes (1g or 10g) were computed using the 3D-Spline interpolation algorithm. The volume was integrated with the trapezoidal algorithm. One thousand points were interpolated to calculate the average. All neighbouring volumes were evaluated until no neighboring volume with a higher average value was found.

The area and zoom scan resolutions specified in the table below must be applied to the SAR measurements. Probe boundary effect error compensation is required for measurements with the probe tip closer than half a probe tip diameter to the phantom surface. Both the probe tip diameter and sensor offset distance must satisfy measurement protocols; to ensure probe boundary effect errors are minimized and the higher fields closest to the phantom surface can be correctly measured and extrapolated to the phantom surface for computing 1-g SAR. Tolerances of the post-processing algorithms must be verified by the test laboratory for the scan resolutions used in the SAR measurements, according to the reference distribution functions specified in IEEE Std. 1528-2013.

			$\leq 3 \text{ GHz}$	$> 3 \text{ GHz}$
Maximum distance from closest measurement point (geometric center of probe sensors) to phantom surface			$5 \pm 1 \text{ mm}$	$\frac{1}{2} \cdot \delta \cdot \ln(2) \pm 0.5 \text{ mm}$
Maximum probe angle from probe axis to phantom surface normal at the measurement location			$30^\circ \pm 1^\circ$	$20^\circ \pm 1^\circ$
Maximum area scan spatial resolution: $\Delta x_{\text{Area}}, \Delta y_{\text{Area}}$			$\leq 2 \text{ GHz: } \leq 15 \text{ mm}$ $2 - 3 \text{ GHz: } \leq 12 \text{ mm}$	$3 - 4 \text{ GHz: } \leq 12 \text{ mm}$ $4 - 6 \text{ GHz: } \leq 10 \text{ mm}$
			When the x or y dimension of the test device, in the measurement plane orientation, is smaller than the above, the measurement resolution must be $\leq$ the corresponding x or y dimension of the test device with at least one measurement point on the test device.	
Maximum zoom scan spatial resolution: $\Delta x_{\text{Zoom}}, \Delta y_{\text{Zoom}}$			$\leq 2 \text{ GHz: } \leq 8 \text{ mm}$ $2 - 3 \text{ GHz: } \leq 5 \text{ mm}^*$	$3 - 4 \text{ GHz: } \leq 5 \text{ mm}^*$ $4 - 6 \text{ GHz: } \leq 4 \text{ mm}^*$
Maximum zoom scan spatial resolution, normal to phantom surface	uniform grid: $\Delta z_{\text{Zoom}}(n)$		$\leq 5 \text{ mm}$	$3 - 4 \text{ GHz: } \leq 4 \text{ mm}$ $4 - 5 \text{ GHz: } \leq 3 \text{ mm}$ $5 - 6 \text{ GHz: } \leq 2 \text{ mm}$
	graded grid	$\Delta z_{\text{Zoom}}(1)$: between 1 st two points closest to phantom surface	$\leq 4 \text{ mm}$	$3 - 4 \text{ GHz: } \leq 3 \text{ mm}$ $4 - 5 \text{ GHz: } \leq 2.5 \text{ mm}$ $5 - 6 \text{ GHz: } \leq 2 \text{ mm}$
		$\Delta z_{\text{Zoom}}(n>1)$: between subsequent points	$\leq 1.5 \cdot \Delta z_{\text{Zoom}}(n-1)$	
Minimum zoom scan volume	x, y, z		$\geq 30 \text{ mm}$	$3 - 4 \text{ GHz: } \geq 28 \text{ mm}$ $4 - 5 \text{ GHz: } \geq 25 \text{ mm}$ $5 - 6 \text{ GHz: } \geq 22 \text{ mm}$

Step 4: Power reference measurement (drift)

The Power Drift Measurement job measures the field at the same location as the most recent power reference measurement job within the same procedure, and with the same settings. The indicated drift is mainly the variation of the DUT's output power and should vary max $\pm 5 \%$.

3.7.2 Data storage

The DASY software stores the acquired data from the data acquisition electronics as raw data (in microvolt readings from the probe sensors), together with all necessary software parameters for the data evaluation (probe calibration data, liquid parameters and device frequency and modulation data) in measurement files with the extension “DAE”. The software evaluates the desired unit and format for output each time the data is visualized or exported. This allows verification of the complete software setup even after the measurement and allows correction of incorrect parameter settings. For example, if a measurement has been performed with a wrong crest factor parameter in the device setup, the parameter can be corrected afterwards and the data can be re-evaluated. The measured data can be visualized or exported in different units or formats, depending on the selected probe type ([V/m], [A/m], [°C], [m W/g], [m W/cm²], [dBrel], etc.). Some of these units are not available in certain situations or show meaningless results, e.g., a SAR output in a lossless media will always be zero. Raw data can also be exported to perform the evaluation with other software packages.

3.7.3 Data Evaluation by SEMCAD

The SEMCAD software automatically executes the following procedures to calculate the field units from the microvolt readings at the probe connector. The parameters used in the evaluation are stored in the configuration modules of the software:

Probe parameters:	- Sensitivity	Normi, ai0, ai1, ai2
- Conversion factor	ConvFi	
- Diode compression point	Dcpi	
Device parameters:	- Frequency	f
- Crest factor	cf	
Media parameters:	- Conductivity	ε
- Density	ρ	

These parameters must be set correctly in the software. They can be found in the component documents, or they can be imported into the software from the configuration files issued for the DASY components. In the direct measuring mode of the multimeter option, the parameters of the actual system setup are used. In the scan visualization and export modes, the parameters stored in the corresponding document files are used.

The first step of the evaluation is a linearization of the filtered input signal to account for the compression characteristics of the detector diode. The compensation depends on the input signal, the diode type and the DC-transmission factor from the diode to the evaluation electronics.

If the exciting field is pulsed, the crest factor of the signal must be known to correctly compensate for peak power. The formula for each channel can be given as:

$$V_i = U_i + U_i^2 \cdot cf / dcpi$$

With V_i = compensated signal of channel I (I = x, y, z)

U_i = input signal of channel I (I = x, y, z)

cf = crest factor of exciting field (DASY parameter)

dcpi = diode compression point (DASY parameter)

From the compensated input signals the primary field data for each channel can be evaluated:

E-field probes:

$$E_i = (V_i / Norm_i \cdot ConvF)^{1/2}$$

H-field probes:

$$H_i = (V_i)^{1/2} \cdot (a_{i0} + a_{i1}f + a_{i2}f^2) / f$$

With V_i = compensated signal of channel i ($i = x, y, z$)

$Norm_i$ = sensor sensitivity of channel i ($i = x, y, z$)

[mV/(V/m)²] for E-field Probes

$ConvF$ = sensitivity enhancement in solution

a_{ij} = sensor sensitivity factors for H-field probes

f = carrier frequency [GHz]

E_i = electric field strength of channel i in V/m

H_i = magnetic field strength of channel i in A/m

The RSS value of the field components gives the total field strength (Hermitian magnitude):

$$E_{tot} = (E_x^2 + E_y^2 + E_z^2)^{1/2}$$

The primary field data are used to calculate the derived field units.

$$SAR = (E_{tot}^2 \cdot \sigma) / (\epsilon \cdot 1000)$$

with SAR = local specific absorption rate in mW/g

E_{tot} = total field strength in V/m

σ = conductivity in [mho/m] or [Siemens/m]

ϵ = equivalent tissue density in g/cm³

Note that the density is normally set to 1 (or 1.06), to account for actual brain density rather than the density of the simulation liquid. The power flow density is calculated assuming the excitation field to be a free space field.

$$P_{pwe} = E_{tot}^2 / 3770 \text{ or } P_{pwe} = H_{tot}^2 \cdot 37.7$$

with P_{pwe} = equivalent power density of a plane wave in mW/cm²

E_{tot} = total electric field strength in V/m

H_{tot} = total magnetic field strength in A/m

4 SAR measurement variability and uncertainty

4.1 SAR measurement variability

Per KDB 865664 D01 SAR measurement 100 MHz to 6 GHz v01r04, SAR measurement variability must be assessed for each frequency band, which is determined by the SAR probe calibration point and tissue-equivalent medium used for the device measurements. The additional measurements are repeated after the completion of all measurements requiring the same head or body tissue-equivalent medium in a frequency band. The test device should be returned to ambient conditions (normal room temperature) with the battery fully charged before it is re-mounted on the device holder for the repeated measurement(s) to minimize any unexpected variations in the repeated results.

1) Repeated measurement is not required when the original highest measured SAR is < 0.80 W/kg; steps 2) through 4) do not apply.

2) When the original highest measured SAR is ≥ 0.80 W/kg, repeat that measurement once.

3) Perform a second repeated measurement only if the ratio of largest to smallest SAR for the original and first repeated measurements is > 1.20 or when the original or repeated measurement is ≥ 1.45 W/kg ($\sim 10\%$ from the 1-g SAR limit).

4) Perform a third repeated measurement only if the original, first or second repeated measurement is ≥ 1.5 W/kg and the ratio of largest to smallest SAR for the original, first and second repeated measurements is > 1.20 .

The same procedures should be adapted for measurements according to extremity and occupational exposure limits by applying a factor of 2.5 for extremity exposure and a factor of 5 for occupational exposure to the corresponding SAR thresholds.

4.2 SAR measurement uncertainty

Per KDB 865664 D01 SAR Measurement 100 MHz to 6 GHz, when the highest measured 1-g SAR within a frequency band is < 1.5 W/kg, the extensive SAR measurement uncertainty analysis described in IEEE Std 1528-2013 is not required in SAR reports submitted for equipment approval. The equivalent ratio (1.5/1.6) is applied to extremity and occupational exposure conditions.

5 Description of Test Position

5.1 The Body Test Position

5.2 Dongle Transmitters

These test orientations are designed to replicate the exposure conditions of typical laptops, notebooks, netbooks, or tablet computers—where connectors (configured either horizontally or vertically) are located at various positions within the device's keyboard section.

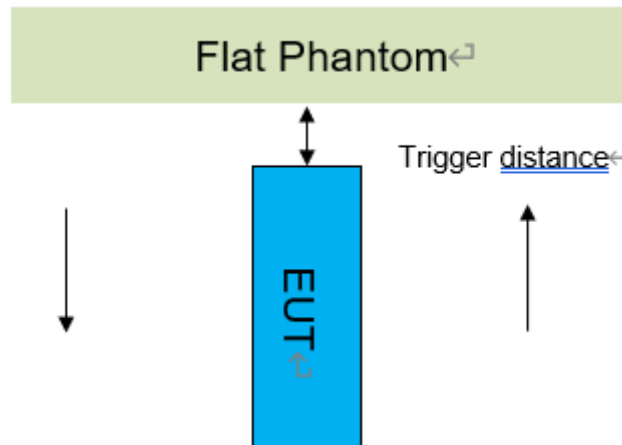
Current-generation portable host computers should be used to determine the required separation distance for SAR measurements. Additionally, the same test separation distance must be consistently applied when testing all frequency bands and modes for each orientation.

Per KDB 447498 D02, all orientations shall be tested with a device-to-phantom separation distance of 5 mm or less.

5.3 Proximity Sensor Triggering Test

5.3.1 Proximity sensor triggering distances

The Proximity sensor triggering was applied to the below table list antenna. Proximity sensor triggering distance testing was performed according to the procedures outlined in KDB 616217 D04 section 6.2, and EUT moving further away from the flat phantom and EUT moving toward the flat phantom were both assessed.

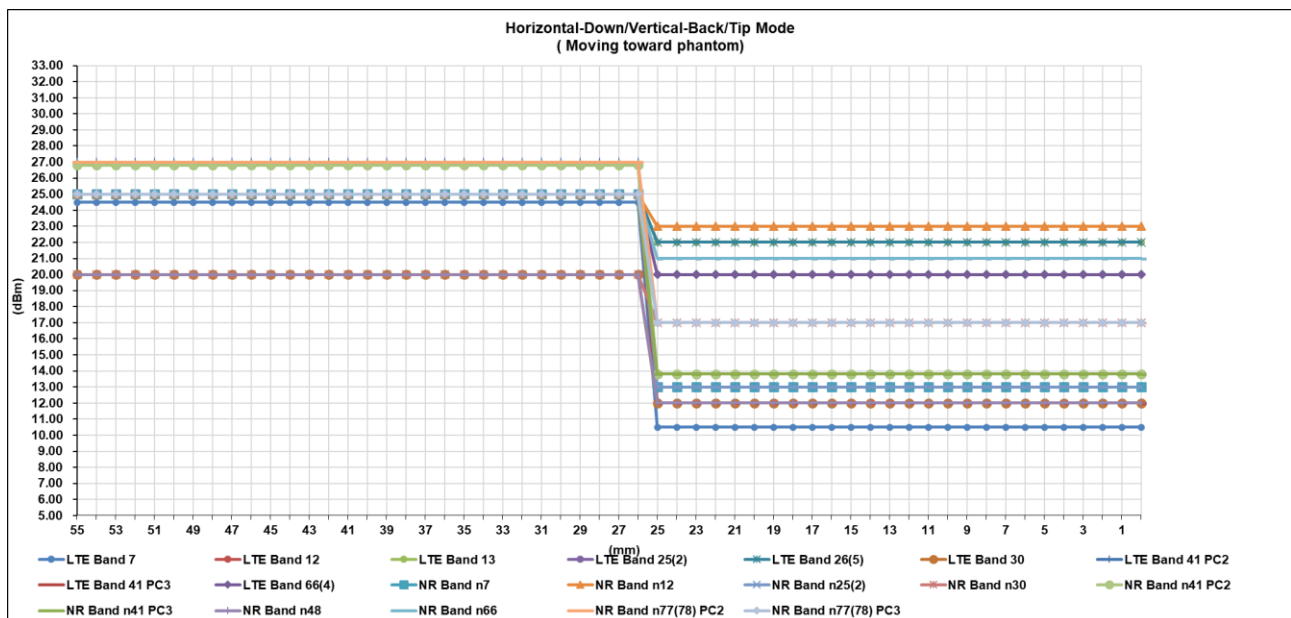
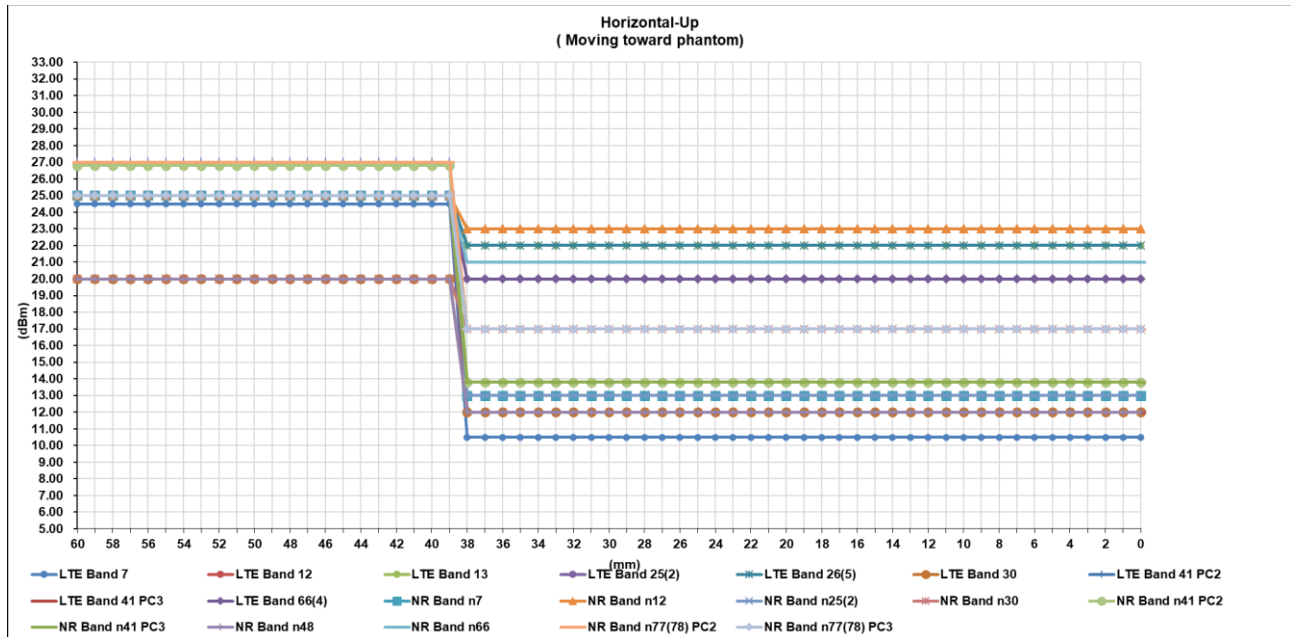


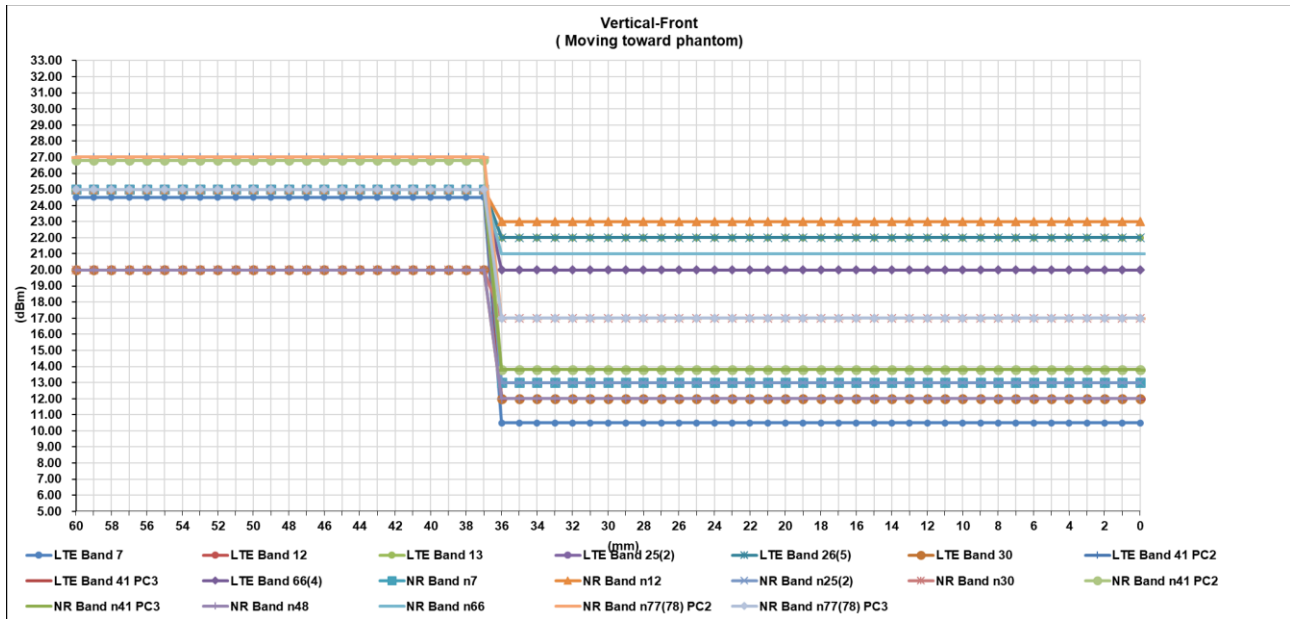
Proximity Sensor Triggering Distance(mm)					
Position	Horizontal-Up	Horizontal-Down	Vertical-Front	Vertical-Back	Tip Mode
Minimum	38	25	36	25	25
Required SAR Test	37	24	35	24	24

Note:

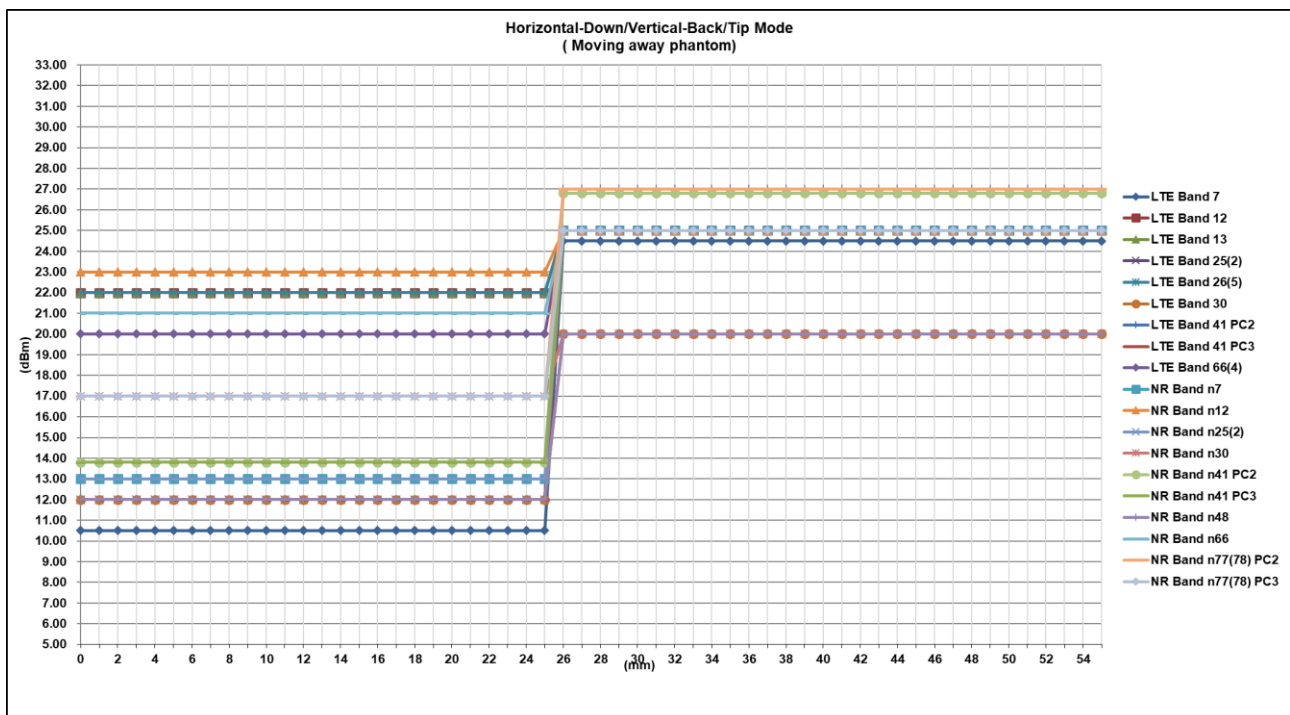
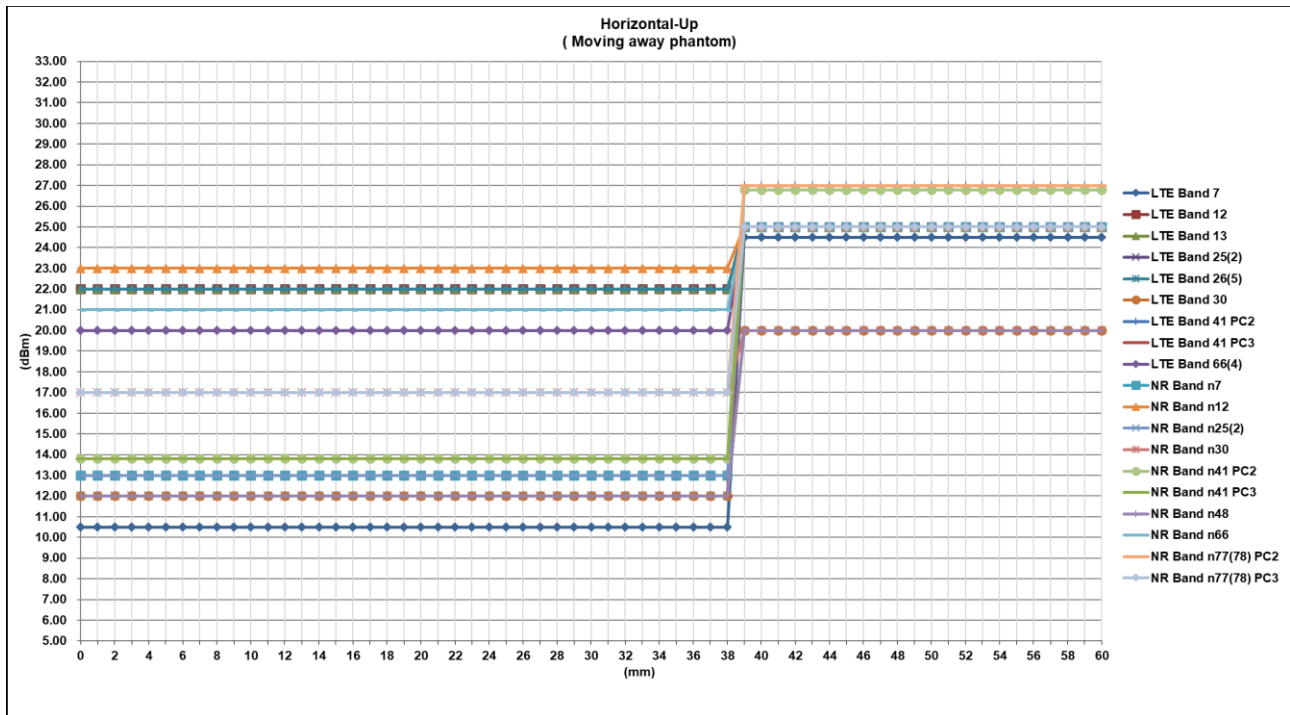
SAR tests with proximity sensor power reduction are only required for the sides of frequency bands in the table above. For the other sides or other frequency bands of the device, SAR is still tested at the maximum power level with sensor off.

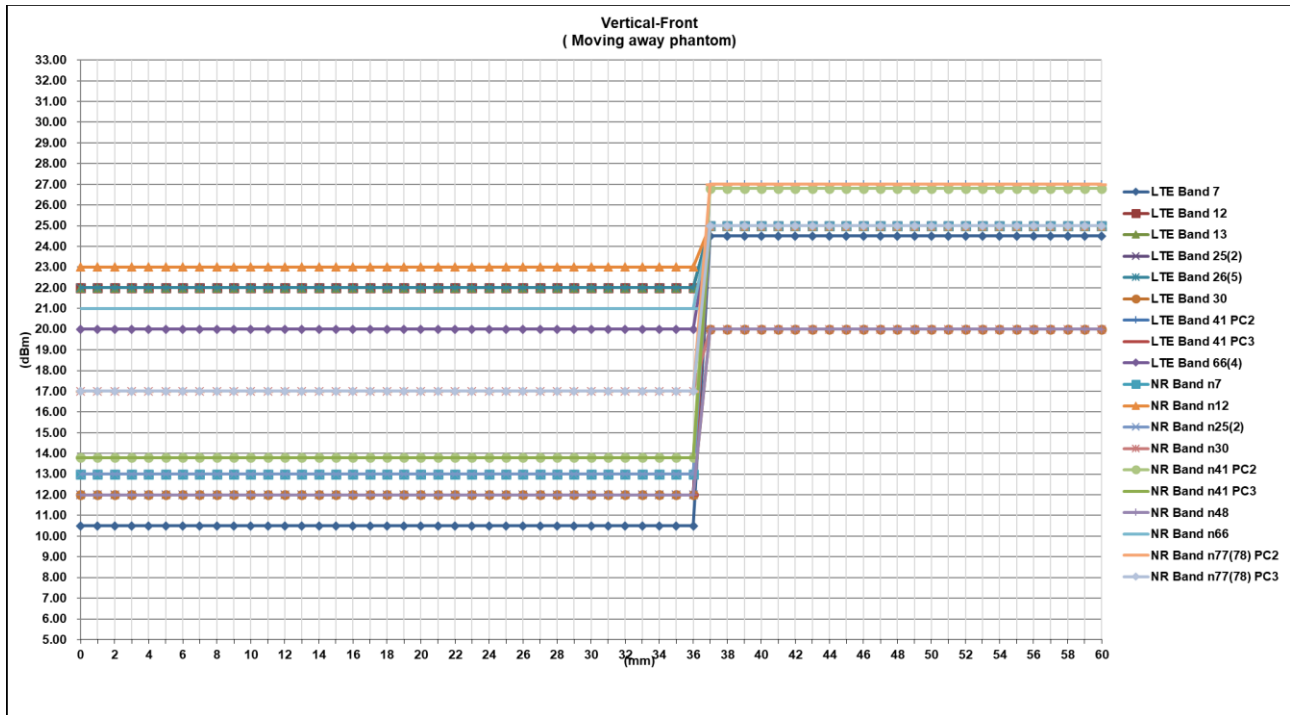
● Ant 0 DUT Moving Toward(Trigger)the Phantom



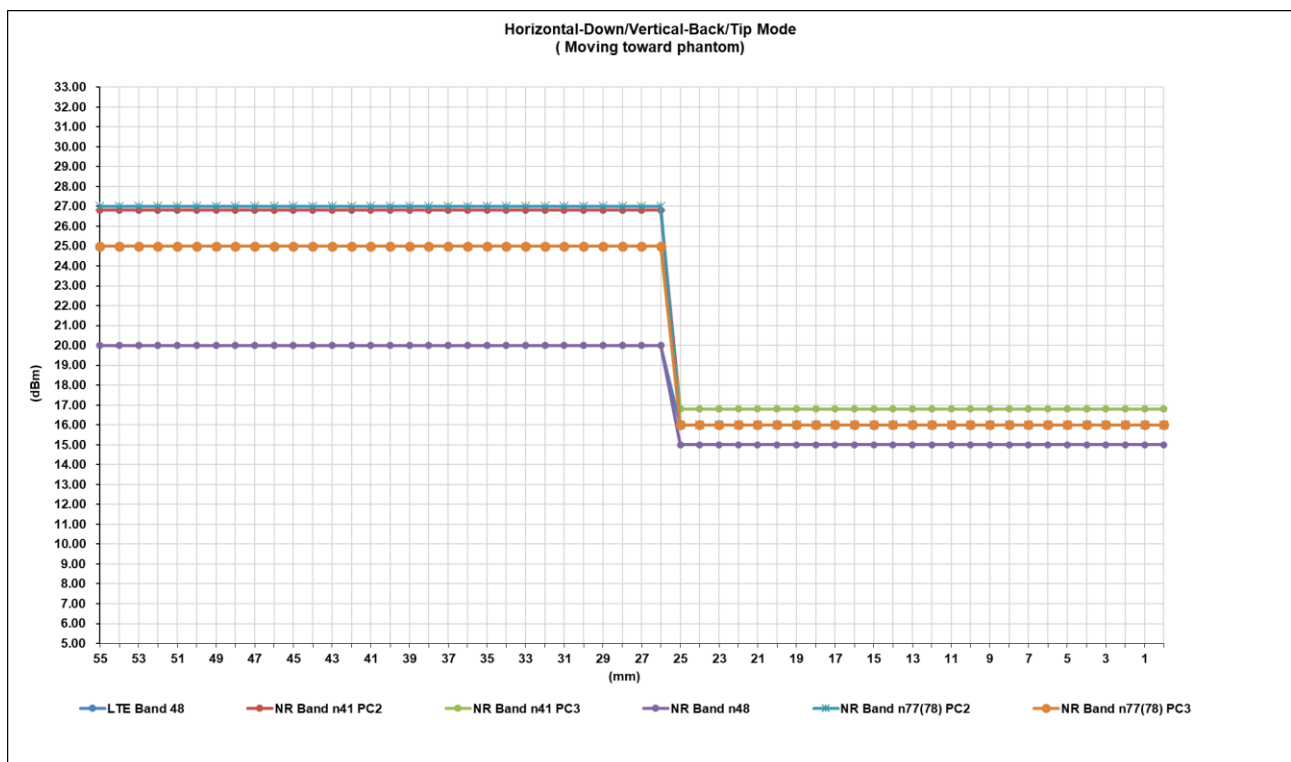
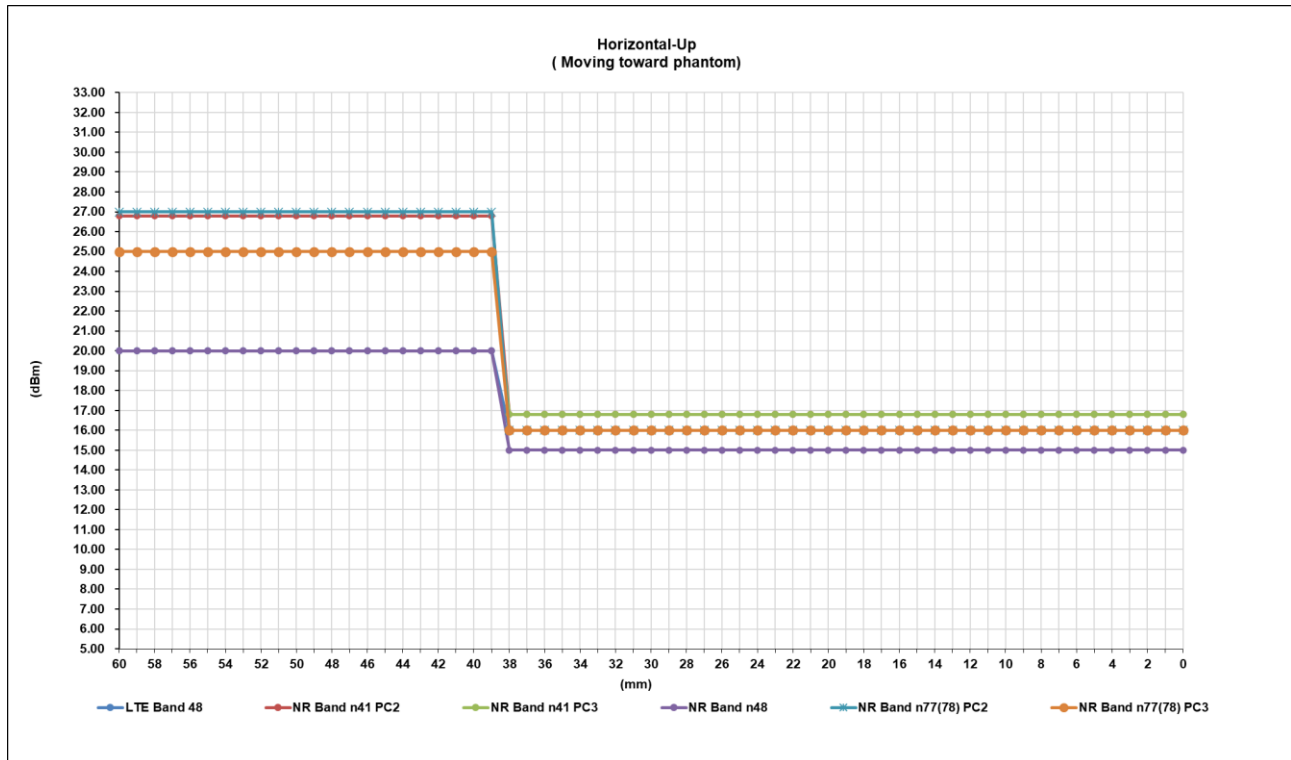


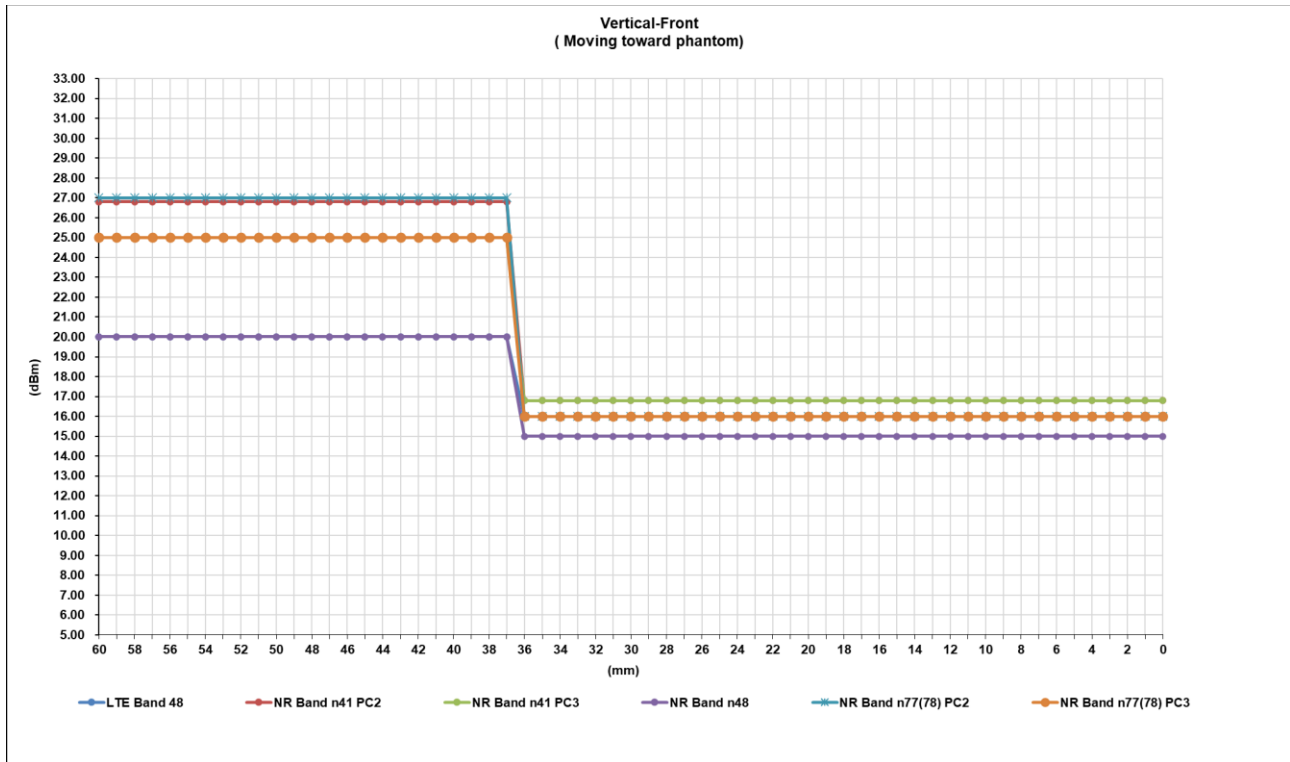
● Ant 0 DUT Moving Away(Release) from the Phantom



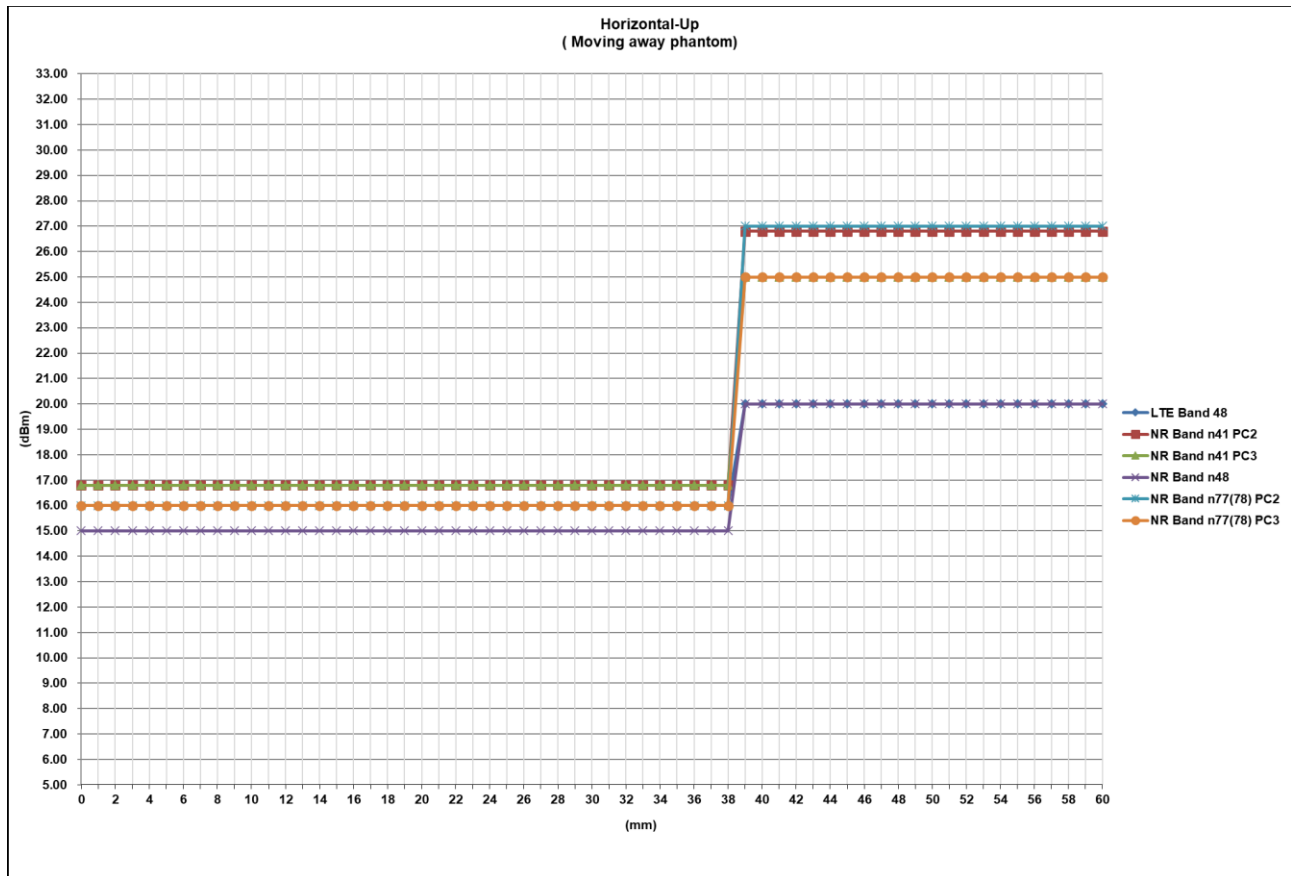


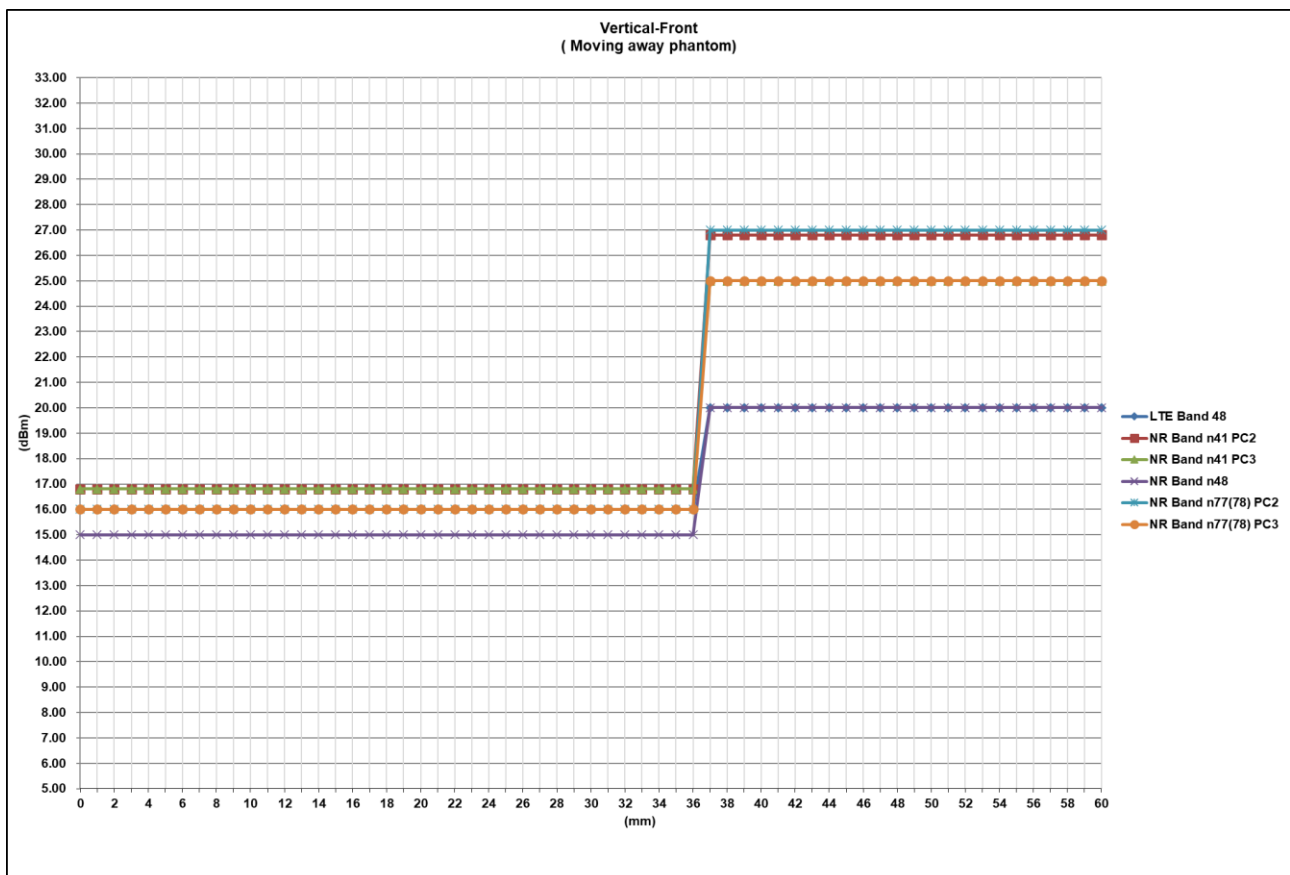
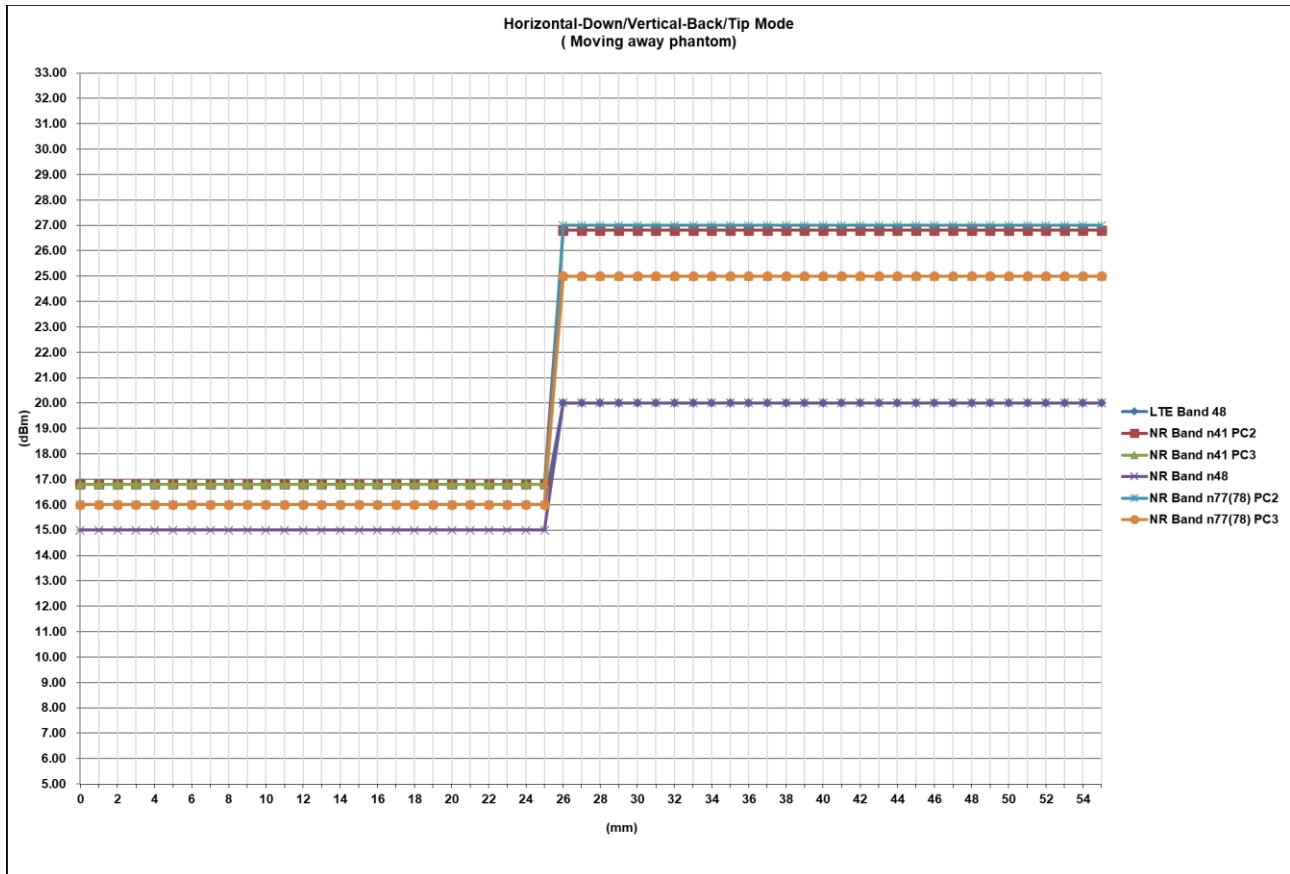
● Ant 2 DUT Moving Toward(Trigger)the Phantom





● Ant 2 DUT Moving Away(Release) from the Phantom





5.3.2 Proximity sensor coverage

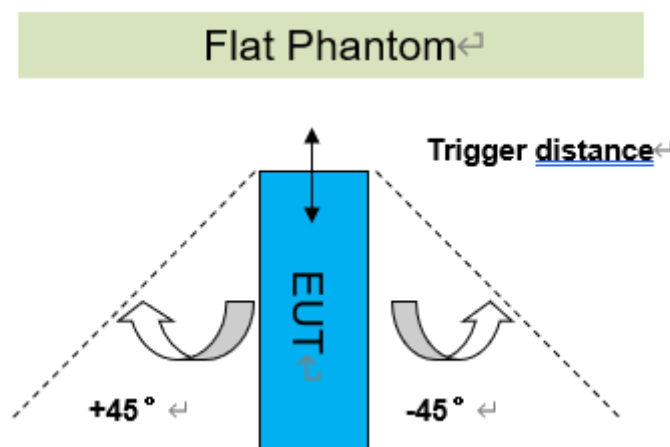
If a sensor is spatially offset from the antenna(s), it is necessary to verify sensor triggering for conditions where the antenna is next to the user, but the sensor is laterally further away to ensure sensor coverage is sufficient for reducing the power to maintain compliance. For p-sensor coverage testing, the device is moved and “along the direction of maximum antenna and sensor offset”.

The proximity sensor and main antenna use same metallic electrode, so there is no spatial offset.

5.3.3 Device tilt angle influences on proximity sensor triggering

The influence of device tilt angles to proximity sensor triggering was determined by positioning each tablet edge that contains a transmitting antenna, perpendicular to the flat phantom.

Rotating the tablet around the edge next to the phantom in $\leq 10^\circ$ increments until the tablet is $\pm 45^\circ$ from the vertical position at 0° , and the maximum output power remains in the reduced mode.



Summary of Tablet Tilt Angle Influence on Proximity Sensor Triggering for Edge Side													
Band (MHz)	Minimum trigger distance Per KDB616217S6.2	Minimum trigger distance at which power reduction was maintained over $\pm 45^\circ$	Power Reduction Status										
			-45°	-35°	-25°	-15°	-5°	0°	5°	15°	25°	35°	45°
Ant 0/2	Vertical-Back /Tip Mode 25mm	Vertical-Back /Tip Mode 25mm	on	on	on	on	on	on	on	on	on	on	on

6 SAR System Verificaion Procedure

6.1 Tissue Simulate Liquid

6.1.1 Recipes for Tissue Simulate Liquid

The bellowing tables give the recipes for tissue simulating liquids to be used in different frequency bands:

Ingredients (% by weight)	Frequency (MHz)				
	450	700-1000	1700-2000	2300-2500	2500-2700
Water	38.56	40.30	55.24	55.00	54.92
Salt (NaCl)	3.95	1.38	0.31	0.2	0.23
Sucrose	56.32	57.90	0	0	0
HEC	0.98	0.24	0	0	0
Bactericide	0.19	0.18	0	0	0
Tween	0	0	44.45	44.80	44.85
Salt: 99+% Pure Sodium Chloride Water: De-ionized, 16 MΩ+ resistivity Tween: Polyoxyethylene (20) sorbitan monolaurate Sucrose: 98+% Pure Sucrose HEC: Hydroxyethyl Cellulose					
Head Tissue Simulate Liquid (HBBL600-10000V6) is composed of the following ingredients: (Manufactured by SPEAG) Water: 50-65% Mineral oil: 10-30% Emulsifiers: 8-25% Sodium salt: 0-1.5%					

Table 1 : Recipe of Tissue Simulate Liquid

6.1.2 Measurement for Tissue Simulate Liquid

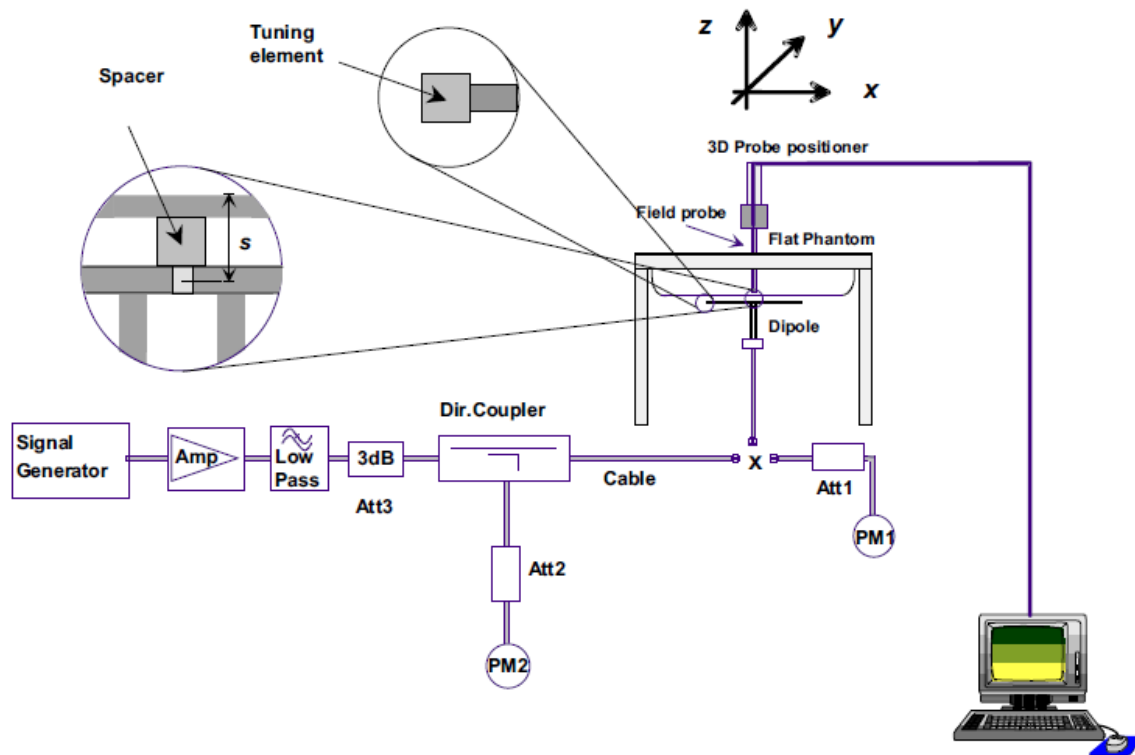
The Conductivity (σ) and Permittivity (ϵ_r) are listed in Table 2. For the SAR measurement given in this report. The temperature variation of the Tissue Simulate Liquids was $22 \pm 2^\circ\text{C}$.

Tissue Type	Measured Frequency (MHz)	Measured Tissue		Target Tissue ($\pm 5\%$)		Deviation (Within $\pm 5\%$)		Liquid Temp. ($^\circ\text{C}$)	Test Date
		ϵ_r	$\sigma(\text{S/m})$	ϵ_r	$\sigma(\text{S/m})$	ϵ_r	$\sigma(\text{S/m})$		
750 Head	750	41.649	0.895	41.90	0.89	-0.60%	0.56%	22.4	2025/9/4
750 Head	750	43.402	0.870	41.90	0.89	3.58%	-2.25%	22.4	2025/9/6
835 Head	835	41.580	0.913	41.50	0.90	0.19%	1.44%	22.5	2025/9/8
1750 Head	1750	40.318	1.375	40.10	1.37	0.54%	0.36%	22.5	2025/9/10
1950 Head	1950	40.561	1.427	40.00	1.40	1.40%	1.93%	22.5	2025/9/12
2300 Head	2300	38.550	1.683	39.50	1.67	-2.41%	0.78%	22.3	2025/9/14
2600 Head	2600	37.939	1.980	39.00	1.96	-2.72%	1.02%	22.9	2025/9/16
3500 Head	3500	38.320	3.021	37.90	2.91	1.11%	3.81%	22.6	2025/9/18
3700 Head	3700	37.700	3.257	37.70	3.12	0.00%	4.39%	22.6	2025/9/20
3900 Head	3900	37.083	3.468	37.50	3.32	-1.11%	4.46%	22.6	2025/9/22
4100 Head	4100	37.869	3.408	37.20	3.53	1.80%	-3.46%	22.6	2025/9/24

Table 2 : Measurement result of Tissue electric parameters

6.2 SAR System Check

The microwave circuit arrangement for system Check is sketched in F-12. The daily system accuracy verification occurs within the flat section of the SAM phantom. A SAR measurement was performed to see if the measured SAR was within $\pm 10\%$ from the target SAR values. The tests were conducted on the same days as the measurement of the EUT. The obtained results from the system accuracy verification are displayed in the following table (A power level of 250mW (below 3GHz) or 100mW (3-6GHz) was input to the dipole antenna). During the tests, the ambient temperature of the laboratory was in the range $22\pm 2^{\circ}\text{C}$, the relative humidity was in the range 60% and the liquid depth above the ear reference points was above 15 ± 0.5 cm in all the cases. It is seen that the system is operating within its specification, as the results are within acceptable tolerance of the reference values.



F-12.The microwave circuit arrangement used for SAR system Check

6.2.1 Justification for Extended SAR Dipole Calibrations

1) Instead of the typical annual calibration recommended by measurement standards, longer calibration intervals of up to three years may be considered when it is demonstrated that the SAR target, impedance and return loss of a dipole have remain stable according to the following requirements. Each measured dipole is expected to evaluate with the following criteria at least on annual interval in Appendix C.

- a) There is no physical damage on the dipole;
- b) System check with specific dipole is within 10% of calibrated value;
- c) Return-loss is within 20% of calibrated measurement;
- d) Impedance is within 5Ω from the previous measurement.

2) Network analyzer probe calibration against air, distilled water and a shorting block performed before measuring liquid parameters.

6.2.2 Summary System Check Result(s)

Validation Kit	Measured SAR 250mW	Measured SAR 250mW	Measured SAR (normalized to 1W)	Measured SAR (normalized to 1W)	Target SAR (normalized to 1W)	Target SAR (normalized to 1W)	Deviation (Within ±10%)		Liquid Temp. (°C)	Test Date
	1g (W/kg)	10g (W/kg)	1g (W/kg)	10g (W/kg)	1-g(W/kg)	10-g(W/kg)	1-g(W/kg)	10-g(W/kg)		
D750V3_Head	2.03	1.36	8.12	5.44	8.54	5.80	-4.92%	-6.21%	22.4	2025/9/4
D750V3_Head	2.09	1.35	8.36	5.40	8.54	5.80	-2.11%	-6.90%	22.4	2025/9/6
D835V2_Head	2.47	1.55	9.88	6.20	9.60	6.16	2.92%	0.65%	22.5	2025/9/8
D1750V2_Head	9.43	5.01	37.72	20.04	36.30	19.30	3.91%	3.83%	22.5	2025/9/10
D1950V3_Head	9.58	4.96	38.32	19.84	40.40	20.80	-5.15%	-4.62%	22.5	2025/9/12
D2300V2_Head	13.00	6.17	52.00	24.68	49.00	23.50	6.12%	5.02%	22.3	2025/9/14
D2600V2_Head	13.20	6.10	52.80	24.40	55.20	24.70	-4.35%	-1.21%	22.9	2025/9/16
Validation Kit	Measured SAR 100mW	Measured SAR 100mW	Measured SAR (normalized to 1W)	Measured SAR (normalized to 1W)	Target SAR (normalized to 1W)	Target SAR (normalized to 1W)	Deviation (Within ±10%)		Liquid Temp. (°C)	Test Date
	1g (W/kg)	10g (W/kg)	1g (W/kg)	10g (W/kg)	1-g(W/kg)	10-g(W/kg)	1-g(W/kg)	10-g(W/kg)		
D3500V2_Head	6.72	2.58	67.20	25.80	65.80	25.00	2.13%	3.20%	22.6	2025/9/18
D3700V2_Head	6.38	2.33	63.80	23.30	65.60	24.10	-2.74%	-3.32%	22.6	2025/9/20
D3900V2_3.9GHz_Head	7.14	2.40	71.40	24.00	67.60	23.50	5.62%	2.13%	22.6	2025/9/22
D3900V2_4.1GHz_Head	6.81	2.43	68.10	24.30	67.90	23.40	0.29%	3.85%	22.6	2025/9/24

Table 3 : SAR System Check Result

6.2.3 Detailed System Check Results

Please see the Appendix A

7 Test Configuration

7.1 Operation Configurations

7.1.1 LTE Test Configuration

LTE modes were tested according to FCC KDB 941225 D05 publication. Please see notes after the tabulated SAR data for required test configurations. Establishing connections with base station simulators ensure a consistent means for testing SAR and are recommended for evaluating SAR [4]. The Radio Communication Analyzer was used for LTE output power measurements and SAR testing. Max power control was used so the UE transmits with maximum output power during SAR testing. SAR must be measured with the maximum TTI (transmit time interval) supported by the device in each LTE configuration.

TDD LTE test consideration

For Time-Division Duplex (TDD) systems, SAR must be tested using a fixed periodic duty factor according to the highest transmission duty factor implemented for the device and supported by the defined 3GPP LTE TDD configurations.

SAR was tested with the highest transmission duty factor (63.33%) using Uplink-downlink configuration 0 and Special subframe configuration 7.

LTE TDD Band support 3GPP TS 36.211 section 4.2 for Type 2 Frame Structure and Table 4.2-2 for uplink-downlink configurations and Table 4.2-1 for Special subframe configurations.

Frame structure type 2:

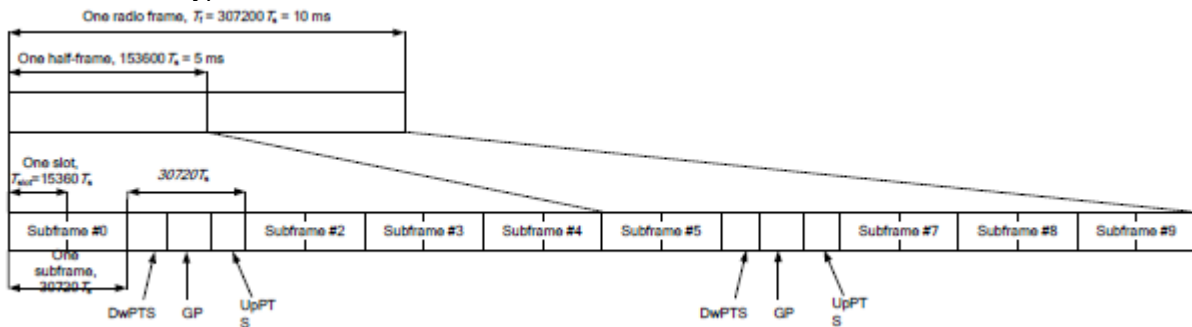


Table 4.2-1: Configuration of special subframe (lengths of DwPTS/GP/UpPTS).

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

Table 4.2-2: Uplink-downlink configurations.

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

Calculated Duty Cycle=[Extended cyclic prefix in uplink x (Ts) x # of S + # of U]/10ms

Uplink-Downlink Configuration	Downlink-to-Uplink Switch-point Periodicity	Subframe Number										Calculated Duty Cycle (%)
		0	1	2	3	4	5	6	7	8	9	
0	5 ms	D	S	U	U	U	D	S	U	U	U	63.33
1	5 ms	D	S	U	U	D	D	S	U	U	D	43.33
2	5 ms	D	S	U	D	D	D	S	U	D	D	23.33
3	10 ms	D	S	U	U	U	D	D	D	D	D	31.67
4	10 ms	D	S	U	U	D	D	D	D	D	D	21.67
5	10 ms	D	S	U	D	D	D	D	D	D	D	11.67
6	5 ms	D	S	U	U	U	D	S	U	U	D	53.33

A) Spectrum Plots for RB Configurations

A properly configured base station simulator was used for SAR tests and power measurements. Therefore, spectrum plots for RB configurations were not required to be included in this report.

B) MPR

MPR is permanently implemented for this device by the manufacturer. The specific manufacturer target MPR is indicated alongside the SAR results. MPR is enabled for this device, according to 3GPP TS36.101 Section 6.2.3 – 6.2.5 under Table 6.2.3-1.

Modulation	Channel bandwidth/Transmission bandwidth						MPR (dB)
	1.4 MHz	3 MHz	5 MHz	10 MHz	15 MHz	20 MHz	
QPSK	≤ 5	≤ 4	≤ 8	≤ 12	≤ 16	≤ 18	0
QPSK	> 5	> 4	> 8	> 12	> 16	> 18	1
16QAM	≤ 5	≤ 4	≤ 8	≤ 12	≤ 16	≤ 18	1
16QAM	> 5	> 4	> 8	> 12	> 16	> 18	2
64QAM	≤ 5	≤ 4	≤ 8	≤ 12	≤ 16	≤ 18	2
64QAM	> 5	> 4	> 8	> 12	> 16	> 18	3
256QAM	≥ 1						5

C) A-MPR

A-MPR (Additional MPR) has been disabled for all SAR tests by setting NS=01 on the base station simulator.

D) Largest channel bandwidth standalone SAR test requirements

1) QPSK with 1 RB allocation

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

2) QPSK with 50% RB allocation

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

3) QPSK with 100% RB allocation

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

4) Higher order modulations

For each modulation besides QPSK; e.g., 16-QAM, 64-QAM, apply the QPSK procedures in above sections to determine the QAM configurations that may need SAR measurement. For each configuration identified as required for testing, SAR is required only when the highest maximum output power for the configuration in the higher order modulation is $> \frac{1}{2}$ dB higher than the same configuration in QPSK or when the reported SAR for the QPSK configuration is > 1.45 W/kg.

E) Other channel bandwidth standalone SAR test requirements

For the other channel bandwidths used by the device in a frequency band, apply all the procedures required for the largest channel bandwidth in section A) to determine the channels and RB configurations that need SAR testing and only measure SAR when the highest maximum output power of a configuration requiring testing in the smaller channel bandwidth is $> \frac{1}{2}$ dB higher than the equivalent channel configurations in the largest channel bandwidth configuration or the reported SAR of a configuration for the largest channel bandwidth is > 1.45 W/kg.

F) LTE CA additional specification

The device supports intra-band contiguous and inter-band discontinuous uplink and downlink LTE Carrier Aggregation (CA). When carrier aggregation applies, implementation and measurement details for the following are necessary.

- a) Intra-band carrier aggregation requirements for uplink.
- b) Intra-band and inter-band carrier aggregation requirements for downlink.

The downlink LTE CA test is not required since the maximum output power for downlink LTE CA was not more than 0.25dB higher than the maximum output power for without downlink LTE CA.

SAR test procedure for intra-band contiguous UL LTE CA as below:

1) Maximum output power is measured for each UL CA configuration for the required test channels described in KDB 941225 D05

- UL PCC configuration is determined by the required test channel
- SCC and subsequent CCs are added alternatively to either side of the PCC or within the transmission band for channels at the ends of a frequency band.

2) SAR for UL CA is required in each exposure condition and frequency band combination

3) For this device, as the maximum output for Intra-band uplink LTE CA is $\leq$ standalone LTE mode (without CA),

- PCC is configured according to the highest standalone SAR configuration tested.
- SCC and subsequent CCs are configured according to procedures used for power measurement and parameters (BW, RB etc.) similar to that used for the PCC

4) When the reported SAR for UL CA configuration, described above, is > 1.2 W/kg, UL CA SAR is also required for all required test channels (PCC based)

5) UL CA SAR is also required for standalone SAR configurations > 1.2 W/kg when they are scaled to the UL CA power level.

7.1.2 NR Band Test Configuration

1. NR Band n2/5/7/12/14/25/26/30/41/48/66/71/77/78 support SA mode and n5/12/25/41/48/66/71/77/78 support NSA mode. LTE+NR Band operations are possible only with LTE under EN-DC mode and the operations are possible as following table:

Band/Antenna		LTE Band 2	LTE Band 4	LTE Band 5	LTE Band 7	LTE Band 12	LTE Band 13	LTE Band 14	LTE Band 25	LTE Band 26	LTE Band 30	LTE Band 41	LTE Band 48	LTE Band 66	LTE Band 71
		Ant0	Ant0	Ant0	Ant0	Ant0	Ant0	Ant0	Ant0	Ant0	Ant0	Ant0	Ant2	Ant0	Ant0
n5	Ant0												√		
n12	Ant0												√		
n25	Ant0												√		
n66	Ant0												√		
n71	Ant0												√		
n41	Ant2	√	√	√		√			√	√				√	√
n77	Ant2	√		√	√	√	√	√	√		√	√		√	√
n78	Ant2				√										
n48	Ant2	√		√			√							√	

2. The general information supported by the NR band is as following table:

Band		n2	n5	n7	n12	n14	n25	n26	n30
Modulation	DFT-s-OFDM	PI/2 BPSK	Yes	Yes	Yes	Yes	Yes	Yes	Yes
		QPSK	Yes	Yes	Yes	Yes	Yes	Yes	Yes
		16QAM	Yes	Yes	Yes	Yes	Yes	Yes	Yes
		64QAM	Yes	Yes	Yes	Yes	Yes	Yes	Yes
		256QAM	Yes	Yes	Yes	Yes	Yes	Yes	Yes
	CP-OFDM	QPSK	Yes	Yes	Yes	Yes	Yes	Yes	Yes
		16QAM	Yes	Yes	Yes	Yes	Yes	Yes	Yes
		64QAM	Yes	Yes	Yes	Yes	Yes	Yes	Yes
		256QAM	Yes	Yes	Yes	Yes	Yes	Yes	Yes
	Max Duty Cycle		100%	100%	100%	100%	100%	100%	100%

Band		n41	n48	n66	n71	n77	n78
Modulation	DFT-s-OFDM	PI/2 BPSK	Yes	Yes	Yes	Yes	Yes
		QPSK	Yes	Yes	Yes	Yes	Yes
		16QAM	Yes	Yes	Yes	Yes	Yes
		64QAM	Yes	Yes	Yes	Yes	Yes
		256QAM	Yes	Yes	Yes	Yes	Yes
	CP-OFDM	QPSK	Yes	Yes	Yes	Yes	Yes
		16QAM	Yes	Yes	Yes	Yes	Yes
		64QAM	Yes	Yes	Yes	Yes	Yes
		256QAM	Yes	Yes	Yes	Yes	Yes
	Max Duty Cycle		100%	100%	100%	100%	100%

Band	SCS	Bandwidth												
		5MHz	10MHz	15MHz	20MHz	25MHz	30MHz	40MHz	50MHz	60MHz	70MHz	80MHz	90MHz	100MHz
n2	15 kHz	Yes	Yes	Yes	Yes	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
n5	15 kHz	Yes	Yes	Yes	Yes	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
n7	15 kHz	Yes	Yes	Yes	Yes	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
n12	15 kHz	Yes	Yes	Yes	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
n14	15 kHz	Yes	Yes	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
n25	15 kHz	Yes	Yes	Yes	Yes	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
n26	15 kHz	Yes	Yes	Yes	Yes	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
n30	15 kHz	N/A	Yes	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
n41	15 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	Yes	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
n48	15 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	Yes	N/A	N/A	Yes	N/A	N/A	N/A	N/A	N/A	N/A
n66	15 kHz	Yes	Yes	Yes	Yes	N/A	Yes	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
n71	15 kHz	Yes	Yes	Yes	Yes	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
n77	15 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	Yes	N/A	Yes	Yes	N/A	Yes	N/A	Yes	N/A	Yes
n78	15 kHz	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
	30 kHz	N/A	N/A	N/A	Yes	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes

3. For 5G NR test procedure was following step similar FCC KDB 941225 D05:

- For DFT-OFDM and CP-OFDM output power measurement reduction, according to 3GPP 38.101 maximum power reduction for power class 3, the CP-OFDM mode will not higher than DFT-OFDM mode, therefore, similar FCC KDB 941225 D05 procedure for other modulation output power for each RB allocation configuration is $> \text{not } \frac{1}{2}$ dB higher than the same configuration in DFT-QPSK and the reported SAR for the DFT-QPSK configuration is ≤ 1.45 W/kg; CP-OFDM testing is not required.
- For DFT-OFDM output power measurement reduction, according to 38.101 maximum power reduction for power class 3, for PI/2 BPSK/16QAM/64QMA/256QAM and smaller bandwidth output power will spot check largest channel bandwidth worst RB configuration to ensure the PI/2 BPSK/16QAM/64QMA/256QAM and smaller bandwidth output power will not $\frac{1}{2}$ dB higher than the same configuration in the largest supported bandwidth.
- SAR testing start with the largest SCS and largest channel bandwidth and measure SAR for QPSK with 1 RB allocation, using the RB offset and required test channel combination with the highest maximum output power for RB offsets at the upper edge, middle and lower edge of each required test channel.
- 50% RB allocation for QPSK SAR testing follows 1RB QPSK allocation procedure
- QPSK with 100% RB allocation, SAR is not required when the highest maximum output power for 100 % RB allocation is less than the highest maximum output power in 50% and 1 RB allocations and the highest reported SAR for 1 RB and 50% RB allocation are ≤ 0.8 W/kg. Otherwise, SAR is measured for the highest output power channel; and if the reported SAR is > 1.45 W/kg, the remaining required test channels must also be tested.
- PI/2 BPSK/16QAM/64QAM/256QAM output powers according to 3GPP MPR will not $\frac{1}{2}$ dB higher than the same configuration in QPSK, also reported SAR for the QPSK configuration is less than 1.45 W/kg, PI/2 BPSK/16QAM/64QAM/256QAM SAR testing are not required.
- Smaller SCS/bandwidth output power for each RB allocation configuration for this device will not $\frac{1}{2}$ dB higher than the same configuration in the largest supported bandwidth, and the reported SAR for the largest supported bandwidth is ≤ 1.45 W/kg, smaller bandwidth SAR testing is not required for this device.

4. MPR

MPR is permanently implemented for this device by the manufacturer. The specific manufacturer target MPR is indicated alongside the SAR results. MPR is enabled for this device, according to 3GPP TS 38.101-1 Section 6.2.2 under Table 6.2.2 -1 and Table 6.2.2 -2.

Table 6.2.2-1 Maximum power reduction (MPR) for power class 3

Modulation		MPR (dB)		
		Edge RB allocations	Outer RB allocations	Inner RB allocations
DFT-s-OFDM	Pi/2 BPSK	$\leq 3.5^1$	$\leq 1.2^1$	$\leq 0.2^1$
		$\leq 0.5^2$	$\leq 0.5^2$	0 ²
	QPSK	≤ 1		0
	16 QAM	≤ 2		≤ 1
	64 QAM	≤ 2.5		
CP-OFDM	256 QAM	≤ 4.5		
	QPSK	≤ 3		≤ 1.5
	16 QAM	≤ 3		≤ 2
	64 QAM	≤ 3.5		
	256 QAM	≤ 6.5		
NOTE 1: Applicable for UE operating in TDD mode with Pi/2 BPSK modulation and UE indicates support for UE capability <i>powerBoosting-pi2BPSK</i> and if the IE <i>powerBoostPi2BPSK</i> is set to 1 and 40 % or less slots in radio frame are used for UL transmission for bands n40, n41, n77, n78 and n79. The reference power of 0 dB MPR is 26 dBm.				
NOTE 2: Applicable for UE operating in FDD mode, or in TDD mode in bands other than n40, n41, n77, n78 and n79 with Pi/2 BPSK modulation and if the IE <i>powerBoostPi2BPSK</i> is set to 0 and if more than 40 % of slots in radio frame are used for UL transmission for bands n40, n41, n77, n78 and n79.				

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

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

5. For FDD NR Band operation does not have the fixed UL/DL frame structure, but during the transmitting/receiving it can be operated in the slot structure of 100% UL duty cycle, we are proposing the conservative way to evaluate SAR at 100% duty cycle. For the purpose of test NR Band standalone SAR, and also test SAR level at 100% TX duty cycle.

6. For 5G NR Sub6GHz SISO Mode, SAR Test plan as below:

1) For 5G NR NSA mode with the same UL EN_DC combination but different DL EN_DC combinations, eg: EN-DC configuration: UL DC_7A_n5 (UL two bands) with DL DC_7C_n5 (DL two bands)

a) The UL EN-DC configuration, including the Tx antenna configuration, RF path, the channel bandwidth and other operating parameters are the same.

b) The maximum output power, including tolerance, for the UL EN-DC configuration with DL two or more bands must be $\leq$ the same UL EN-DC configuration with DL two bands only to qualify for the SAR test exclusion.

7. For EN-DC SAR, as the existing SAR test system cannot test the multiple different frequency bands simultaneous Transmission SAR at the same time, we suggest that the conservative “max + max” multi-Tx and SAR scaling method can be used to evaluate the inter-band Uplink EN-DC SAR from standalone SAR test results of each LTE and NR EN-DC component band and the conservative “max + max” multi-Tx method to combine the scaled SAR value from each EN-DC component band as the inter-band Uplink EN-DC SAR. All Simultaneous Transmission Scenarios will be evaluated independently in the final SAR report.

8. When the reported SAR for and EN DC configuration is greater than 1.2 W/kg, EN DC SAR is also required for other NR based test channels.

9. EN DC SAR is also required for standalone NR configurations greater than 1.2 W/kg when scaled to the EN DC power level.

8 Test Result

8.1 DUT Antenna Locations (Back View)

The DUT Antenna Locations can be referred to Appendix D

8.2 Measurement of RF Conducted Power

8.2.1 RF Conducted Power reduction specification

This device uses a single fixed level of power reduction through static table look-up for SAR compliance and it is triggered by a single event or operation

- 1) The proximity sensor is used to indicate when the device is held close to a user's body exposure condition. It utilizes the proximity sensor to reduce the output power in specific wireless and operating modes of main antenna to ensure SAR compliance.

8.2.2 RF Conducted Power Data

The detailed power data can be referred to Appendix E Conducted RF Output Power.

8.3 Measurement of SAR Data

Note:

- 1) The maximum Scaled SAR value is marked in bold. Graph results refer to Appendix B.
- 2) Per KDB 447498 D04, testing of other required channels within the operating mode of a frequency band is not required when the reported 1-g or 10-g SAR for the mid-band or highest output power channel is:
 - $\leq 0.8\text{W/kg}$ for 1-g or 2.0W/kg for 10-g respectively, when the transmission band is $\leq 100\text{MHz}$.
 - $\leq 0.6\text{ W/kg}$ or 1.5 W/kg , for 1-g or 10-g respectively, when the transmission band is between 100 MHz and 200 MHz.
 - $\leq 0.4\text{ W/kg}$ or 1.0 W/kg , for 1-g or 10-g respectively, when the transmission band is $\geq 200\text{ MHz}$.
- 3) According to TCB workshop (Overlapping LTE Bands): SAR in LTE band 2/4/5, NR band n2/5/78 is respectively covered by LTE band 25/66/26, NR band n25/26/77. Because the frequency range is similar, the maximum tuning limit is the same, and the channel bandwidth and other operating parameters for the smaller band is fully supported by the larger band.

8.3.1 SAR Result of LTE Band 7

LTE Band 7 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	20	QPSK 1_0	21100/2535	1:1	0.609	0.08	9.50	10.50	1.259	0.767	22.9
Horizontal-Up-7C	20	QPSK 1_0	21100/2535	1:1	0.586	0.07	9.46	10.50	1.271	0.745	22.9
		QPSK 1_99	20902/2515.2								
Horizontal-Down	20	QPSK 1_0	21100/2535	1:1	0.076	0.02	9.50	10.50	1.259	0.096	22.9
Vertical-Front	20	QPSK 1_0	21100/2535	1:1	0.270	-0.08	9.50	10.50	1.259	0.340	22.9
Vertical-Back	20	QPSK 1_0	21100/2535	1:1	0.138	-0.06	9.50	10.50	1.259	0.174	22.9
Tip Mode	20	QPSK 1_0	21100/2535	1:1	0.176	-0.11	9.50	10.50	1.259	0.222	22.9
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	20	QPSK 50_0	21100/2535	1:1	0.507	0.14	9.46	10.50	1.271	0.644	22.9
Horizontal-Down	20	QPSK 50_0	21100/2535	1:1	0.064	-0.03	9.46	10.50	1.271	0.081	22.9
Vertical-Front	20	QPSK 50_0	21100/2535	1:1	0.223	0.13	9.46	10.50	1.271	0.283	22.9
Vertical-Back	20	QPSK 50_0	21100/2535	1:1	0.103	0.00	9.46	10.50	1.271	0.131	22.9
Tip Mode	20	QPSK 50_0	21100/2535	1:1	0.125	-0.15	9.46	10.50	1.271	0.159	22.9
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	20	QPSK 1_0	21100/2535	1:1	0.406	0.03	23.76	24.50	1.186	0.481	22.9
Horizontal-Up-37mm-7C	20	QPSK 1_0	21100/2535	1:1	0.355	-0.07	23.46	24.50	1.271	0.451	22.9
		QPSK 1_99	20902/2515.2								
Horizontal-Down-24mm	20	QPSK 1_0	21100/2535	1:1	0.248	0.15	23.76	24.50	1.186	0.294	22.9
Vertical-Front-35mm	20	QPSK 1_0	21100/2535	1:1	0.102	0.02	23.76	24.50	1.186	0.121	22.9
Vertical-Back-24mm	20	QPSK 1_0	21100/2535	1:1	0.168	0.12	23.76	24.50	1.186	0.199	22.9
Tip Mode-24mm	20	QPSK 1_0	21100/2535	1:1	0.377	-0.08	23.76	24.50	1.186	0.447	22.9
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	20	QPSK 50_0	21100/2535	1:1	0.398	-0.12	22.65	23.50	1.216	0.484	22.9
Horizontal-Down-24mm	20	QPSK 50_0	21100/2535	1:1	0.241	-0.07	22.65	23.50	1.216	0.293	22.9
Vertical-Front-35mm	20	QPSK 50_0	21100/2535	1:1	0.100	0.09	22.65	23.50	1.216	0.122	22.9
Vertical-Back-24mm	20	QPSK 50_0	21100/2535	1:1	0.144	-0.15	22.65	23.50	1.216	0.175	22.9
Tip Mode-24mm	20	QPSK 50_0	21100/2535	1:1	0.292	-0.15	22.65	23.50	1.216	0.355	22.9

8.3.2 SAR Result of LTE Band 12

LTE Band 12 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	10	QPSK 1_0	23095/707.5	1:1	0.300	0.02	21.00	22.00	1.259	0.378	22.4
Horizontal-Down	10	QPSK 1_0	23095/707.5	1:1	0.111	0.17	21.00	22.00	1.259	0.140	22.4
Vertical-Front	10	QPSK 1_0	23095/707.5	1:1	0.191	0.12	21.00	22.00	1.259	0.240	22.4
Vertical-Back	10	QPSK 1_0	23095/707.5	1:1	0.151	-0.14	21.00	22.00	1.259	0.190	22.4
Tip Mode	10	QPSK 1_0	23095/707.5	1:1	0.092	-0.07	21.00	22.00	1.259	0.116	22.4
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	10	QPSK 25_0	23095/707.5	1:1	0.254	0.17	20.90	22.00	1.288	0.327	22.4
Horizontal-Down	10	QPSK 25_0	23095/707.5	1:1	0.094	0.11	20.90	22.00	1.288	0.121	22.4
Vertical-Front	10	QPSK 25_0	23095/707.5	1:1	0.133	-0.09	20.90	22.00	1.288	0.171	22.4
Vertical-Back	10	QPSK 25_0	23095/707.5	1:1	0.124	0.02	20.90	22.00	1.288	0.160	22.4
Tip Mode	10	QPSK 25_0	23095/707.5	1:1	0.077	-0.02	20.90	22.00	1.288	0.099	22.4
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	10	QPSK 1_0	23095/707.5	1:1	0.039	0.05	23.91	25.00	1.285	0.050	22.4
Horizontal-Down-24mm	10	QPSK 1_0	23095/707.5	1:1	0.079	-0.01	23.91	25.00	1.285	0.102	22.4
Vertical-Front-35mm	10	QPSK 1_0	23095/707.5	1:1	0.011	0.02	23.91	25.00	1.285	0.014	22.4
Vertical-Back-24mm	10	QPSK 1_0	23095/707.5	1:1	0.059	-0.01	23.91	25.00	1.285	0.076	22.4
Tip Mode-24mm	10	QPSK 1_0	23095/707.5	1:1	0.000	-0.01	23.91	25.00	1.285	0.000	22.4
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	10	QPSK 25_0	23095/707.5	1:1	0.025	-0.09	22.84	24.00	1.306	0.033	22.4
Horizontal-Down-24mm	10	QPSK 25_0	23095/707.5	1:1	0.048	0.04	22.84	24.00	1.306	0.063	22.4
Vertical-Front-35mm	10	QPSK 25_0	23095/707.5	1:1	0.011	-0.07	22.84	24.00	1.306	0.014	22.4
Vertical-Back-24mm	10	QPSK 25_0	23095/707.5	1:1	0.048	-0.04	22.84	24.00	1.306	0.063	22.4
Tip Mode-24mm	10	QPSK 25_0	23095/707.5	1:1	0.000	-0.15	22.84	24.00	1.306	0.000	22.4

8.3.3 SAR Result of LTE Band 13

LTE Band 13 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	10	QPSK 1_0	23230/782	1:1	0.296	0.01	21.05	22.00	1.245	0.368	22.4
Horizontal-Down	10	QPSK 1_0	23230/782	1:1	0.231	-0.12	21.05	22.00	1.245	0.287	22.4
Vertical-Front	10	QPSK 1_0	23230/782	1:1	0.197	0.03	21.05	22.00	1.245	0.245	22.4
Vertical-Back	10	QPSK 1_0	23230/782	1:1	0.239	-0.07	21.05	22.00	1.245	0.297	22.4
Tip Mode	10	QPSK 1_0	23230/782	1:1	0.141	-0.05	21.05	22.00	1.245	0.175	22.4
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	10	QPSK 25_0	23230/782	1:1	0.223	0.01	20.94	22.00	1.276	0.285	22.4
Horizontal-Down	10	QPSK 25_0	23230/782	1:1	0.146	-0.18	20.94	22.00	1.276	0.186	22.4
Vertical-Front	10	QPSK 25_0	23230/782	1:1	0.140	-0.14	20.94	22.00	1.276	0.179	22.4
Vertical-Back	10	QPSK 25_0	23230/782	1:1	0.187	0.00	20.94	22.00	1.276	0.239	22.4
Tip Mode	10	QPSK 25_0	23230/782	1:1	0.135	-0.10	20.94	22.00	1.276	0.172	22.4
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	10	QPSK 1_0	23230/782	1:1	0.092	0.02	23.92	25.00	1.282	0.118	22.4
Horizontal-Down-24mm	10	QPSK 1_0	23230/782	1:1	0.201	0.02	23.92	25.00	1.282	0.258	22.4
Vertical-Front-35mm	10	QPSK 1_0	23230/782	1:1	0.058	0.03	23.92	25.00	1.282	0.074	22.4
Vertical-Back-24mm	10	QPSK 1_0	23230/782	1:1	0.106	0.03	23.92	25.00	1.282	0.136	22.4
Tip Mode-24mm	10	QPSK 1_0	23230/782	1:1	0.044	-0.12	23.92	25.00	1.282	0.056	22.4
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	10	QPSK 25_0	23230/782	1:1	0.066	0.03	22.81	24.00	1.315	0.087	22.4
Horizontal-Down-24mm	10	QPSK 25_0	23230/782	1:1	0.098	0.16	22.81	24.00	1.315	0.129	22.4
Vertical-Front-35mm	10	QPSK 25_0	23230/782	1:1	0.036	0.06	22.81	24.00	1.315	0.047	22.4
Vertical-Back-24mm	10	QPSK 25_0	23230/782	1:1	0.077	-0.16	22.81	24.00	1.315	0.101	22.4
Tip Mode-24mm	10	QPSK 25_0	23230/782	1:1	0.000	0.17	22.81	24.00	1.315	0.000	22.4

8.3.4 SAR Result of LTE Band 14

LTE Band 14 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Body Test data (Separate 5mm 1RB)											
Horizontal-Up	10	QPSK 1_0	23330/793	1:1	0.571	0.03	23.92	25.00	1.282	0.732	22.4
Horizontal-Down	10	QPSK 1_0	23330/793	1:1	0.429	-0.09	23.92	25.00	1.282	0.550	22.4
Vertical-Front	10	QPSK 1_0	23330/793	1:1	0.469	-0.18	23.92	25.00	1.282	0.601	22.4
Vertical-Back	10	QPSK 1_0	23330/793	1:1	0.424	-0.12	23.92	25.00	1.282	0.544	22.4
Tip Mode	10	QPSK 1_0	23330/793	1:1	0.276	-0.05	23.92	25.00	1.282	0.354	22.4
Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	10	QPSK 25_0	23330/793	1:1	0.492	-0.13	22.94	24.00	1.276	0.628	22.4
Horizontal-Down	10	QPSK 25_0	23330/793	1:1	0.343	-0.02	22.94	24.00	1.276	0.438	22.4
Vertical-Front	10	QPSK 25_0	23330/793	1:1	0.376	0.09	22.94	24.00	1.276	0.480	22.4
Vertical-Back	10	QPSK 25_0	23330/793	1:1	0.328	0.04	22.94	24.00	1.276	0.419	22.4
Tip Mode	10	QPSK 25_0	23330/793	1:1	0.198	-0.04	22.94	24.00	1.276	0.253	22.4

8.3.5 SAR Result of LTE Band 25

LTE Band 25 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	20	QPSK 1_0	26365/1882.5	1:1	0.632	0.04	11.15	12.00	1.216	0.769	22.5
Horizontal-Up-2C	20	QPSK 1_0	18900/1880	1:1	0.553	0.15	10.97	12.00	1.268	0.701	22.5
		QPSK 1_99	18702/1860.2								
Horizontal-Down	20	QPSK 1_0	26365/1882.5	1:1	0.097	-0.02	11.15	12.00	1.216	0.118	22.5
Vertical-Front	20	QPSK 1_0	26365/1882.5	1:1	0.039	0.02	11.15	12.00	1.216	0.047	22.5
Vertical-Back	20	QPSK 1_0	26365/1882.5	1:1	0.111	-0.10	11.15	12.00	1.216	0.135	22.5
Tip Mode	20	QPSK 1_0	26365/1882.5	1:1	0.440	-0.03	11.15	12.00	1.216	0.535	22.5
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	20	QPSK 50_0	26365/1882.5	1:1	0.489	0.11	11.03	12.00	1.250	0.611	22.5
Horizontal-Down	20	QPSK 50_0	26365/1882.5	1:1	0.079	0.06	11.03	12.00	1.250	0.099	22.5
Vertical-Front	20	QPSK 50_0	26365/1882.5	1:1	0.032	-0.14	11.03	12.00	1.250	0.040	22.5
Vertical-Back	20	QPSK 50_0	26365/1882.5	1:1	0.088	-0.15	11.03	12.00	1.250	0.110	22.5
Tip Mode	20	QPSK 50_0	26365/1882.5	1:1	0.372	-0.15	11.03	12.00	1.250	0.465	22.5
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	20	QPSK 1_0	26365/1882.5	1:1	0.315	0.07	24.06	25.00	1.242	0.391	22.5
Horizontal-Up-37mm-2C	20	QPSK 1_0	18900/1880	1:1	0.266	-0.05	23.99	25.00	1.262	0.336	22.5
		QPSK 1_99	18702/1860.2								
Horizontal-Down-24mm	20	QPSK 1_0	26365/1882.5	1:1	0.156	-0.02	24.06	25.00	1.242	0.194	22.5
Vertical-Front-35mm	20	QPSK 1_0	26365/1882.5	1:1	0.026	-0.01	24.06	25.00	1.242	0.032	22.5
Vertical-Back-24mm	20	QPSK 1_0	26365/1882.5	1:1	0.211	-0.04	24.06	25.00	1.242	0.262	22.5
Tip Mode-24mm	20	QPSK 1_0	26365/1882.5	1:1	0.305	0.13	24.06	25.00	1.242	0.379	22.5
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	20	QPSK 50_0	26365/1882.5	1:1	0.284	0.02	23.04	24.00	1.247	0.354	22.5
Horizontal-Down-24mm	20	QPSK 50_0	26365/1882.5	1:1	0.152	-0.12	23.04	24.00	1.247	0.190	22.5
Vertical-Front-35mm	20	QPSK 50_0	26365/1882.5	1:1	0.016	0.07	23.04	24.00	1.247	0.020	22.5
Vertical-Back-24mm	20	QPSK 50_0	26365/1882.5	1:1	0.181	0.19	23.04	24.00	1.247	0.226	22.5
Tip Mode-24mm	20	QPSK 50_0	26365/1882.5	1:1	0.342	-0.09	23.04	24.00	1.247	0.427	22.5

8.3.6 SAR Result of LTE Band 26

LTE Band 26 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	15	QPSK 1_0	26865/831.5	1:1	0.571	-0.09	21.13	22.00	1.222	0.698	22.5
Horizontal-Up-5B	10	QPSK 1_0	20575/841.5	1:1	0.509	0.11	20.87	22.00	1.297	0.660	22.5
		QPSK 1_49	20476/831.6								
Horizontal-Down	15	QPSK 1_0	26865/831.5	1:1	0.314	0.05	21.13	22.00	1.222	0.384	22.5
Vertical-Front	15	QPSK 1_0	26865/831.5	1:1	0.323	0.16	21.13	22.00	1.222	0.395	22.5
Vertical-Back	15	QPSK 1_0	26865/831.5	1:1	0.339	0.00	21.13	22.00	1.222	0.414	22.5
Tip Mode	15	QPSK 1_0	26865/831.5	1:1	0.240	-0.17	21.13	22.00	1.222	0.293	22.5
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	15	QPSK 36_0	26865/831.5	1:1	0.451	-0.03	21.08	22.00	1.236	0.557	22.5
Horizontal-Down	15	QPSK 36_0	26865/831.5	1:1	0.260	-0.08	21.08	22.00	1.236	0.321	22.5
Vertical-Front	15	QPSK 36_0	26865/831.5	1:1	0.247	-0.09	21.08	22.00	1.236	0.305	22.5
Vertical-Back	15	QPSK 36_0	26865/831.5	1:1	0.304	-0.06	21.08	22.00	1.236	0.376	22.5
Tip Mode	15	QPSK 36_0	26865/831.5	1:1	0.180	0.14	21.08	22.00	1.236	0.222	22.5
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	15	QPSK 1_0	26865/831.5	1:1	0.058	0.01	24.65	25.00	1.084	0.063	22.5
Horizontal-Up-37mm-5B	10	QPSK 1_0	20575/841.5	1:1	0.036	-0.07	24.16	25.00	1.213	0.044	22.5
		QPSK 1_49	20476/831.6								
Horizontal-Down-24mm	15	QPSK 1_0	26865/831.5	1:1	0.094	0.02	24.65	25.00	1.084	0.102	22.5
Vertical-Front-35mm	15	QPSK 1_0	26865/831.5	1:1	0.066	0.02	24.65	25.00	1.084	0.072	22.5
Vertical-Back-24mm	15	QPSK 1_0	26865/831.5	1:1	0.136	-0.06	24.65	25.00	1.084	0.147	22.5
Tip Mode-24mm	15	QPSK 1_0	26865/831.5	1:1	0.000	-0.05	24.65	25.00	1.084	0.000	22.5
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	15	QPSK 36_0	26865/831.5	1:1	0.036	-0.05	23.56	24.00	1.107	0.040	22.5
Horizontal-Down-24mm	15	QPSK 36_0	26865/831.5	1:1	0.141	-0.16	23.56	24.00	1.107	0.156	22.5
Vertical-Front-35mm	15	QPSK 36_0	26865/831.5	1:1	0.054	0.12	23.56	24.00	1.107	0.060	22.5
Vertical-Back-24mm	15	QPSK 36_0	26865/831.5	1:1	0.113	0.07	23.56	24.00	1.107	0.125	22.5
Tip Mode-24mm	15	QPSK 36_0	26865/831.5	1:1	0.000	0.00	23.56	24.00	1.107	0.000	22.5

8.3.7 SAR Result of LTE Band 30

LTE Band 30 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	10	QPSK 1_0	27710/2310	1:1	0.652	0.02	11.15	12.00	1.216	0.793	22.3
Horizontal-Down	10	QPSK 1_0	27710/2310	1:1	0.068	-0.14	11.15	12.00	1.216	0.083	22.3
Vertical-Front	10	QPSK 1_0	27710/2310	1:1	0.113	0.01	11.15	12.00	1.216	0.137	22.3
Vertical-Back	10	QPSK 1_0	27710/2310	1:1	0.136	0.14	11.15	12.00	1.216	0.165	22.3
Tip Mode	10	QPSK 1_0	27710/2310	1:1	0.359	-0.17	11.15	12.00	1.216	0.437	22.3
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	10	QPSK 25_0	27710/2310	1:1	0.560	0.17	11.03	12.00	1.250	0.700	22.3
Horizontal-Down	10	QPSK 25_0	27710/2310	1:1	0.054	0.02	11.03	12.00	1.250	0.068	22.3
Vertical-Front	10	QPSK 25_0	27710/2310	1:1	0.095	0.11	11.03	12.00	1.250	0.119	22.3
Vertical-Back	10	QPSK 25_0	27710/2310	1:1	0.114	-0.11	11.03	12.00	1.250	0.143	22.3
Tip Mode	10	QPSK 25_0	27710/2310	1:1	0.338	0.19	11.03	12.00	1.250	0.423	22.3
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	10	QPSK 1_0	27710/2310	1:1	0.312	0.01	19.79	20.00	1.050	0.327	22.3
Horizontal-Down-24mm	10	QPSK 1_0	27710/2310	1:1	0.134	-0.02	19.79	20.00	1.050	0.141	22.3
Vertical-Front-35mm	10	QPSK 1_0	27710/2310	1:1	0.076	-0.16	19.79	20.00	1.050	0.080	22.3
Vertical-Back-24mm	10	QPSK 1_0	27710/2310	1:1	0.215	-0.09	19.79	20.00	1.050	0.226	22.3
Tip Mode-24mm	10	QPSK 1_0	27710/2310	1:1	0.481	0.03	19.79	20.00	1.050	0.505	22.3
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	10	QPSK 25_0	27710/2310	1:1	0.300	0.07	18.69	19.00	1.074	0.322	22.3
Horizontal-Down-24mm	10	QPSK 25_0	27710/2310	1:1	0.114	0.10	18.69	19.00	1.074	0.122	22.3
Vertical-Front-35mm	10	QPSK 25_0	27710/2310	1:1	0.058	0.05	18.69	19.00	1.074	0.062	22.3
Vertical-Back-24mm	10	QPSK 25_0	27710/2310	1:1	0.166	-0.15	18.69	19.00	1.074	0.178	22.3
Tip Mode-24mm	10	QPSK 25_0	27710/2310	1:1	0.356	0.00	18.69	19.00	1.074	0.382	22.3

8.3.8 SAR Result of LTE Band 41

LTE Band 41 SAR Test Record											
Ant 0 Test Record											
Test position	BW	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scale d factor	Scale d SAR 1-g (W/kg)	Liquid Temp.(℃)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	20	QPSK 1_0	40620/2593	1:1.5 8	0.607	0.06	10.86	12.00	1.300	0.789	22.9
Horizontal-Up-41C	20	QPSK 1_0	40620/2593	1:1.5 8	0.566	0.15	10.79	12.00	1.321	0.748	22.9
		QPSK 1_99	40422/2573.2								
Horizontal-Up-PC2	20	QPSK 1_0	40620/2593	1:2.3 3	0.429	0.01	10.86	12.00	1.300	0.558	22.9
Horizontal-Up	20	QPSK 1_0	39750/2506	1:1.5 8	0.392	0.07	10.69	12.00	1.352	0.530	22.9
Horizontal-Up	20	QPSK 1_0	40185/2549.5	1:1.5 8	0.428	-0.16	10.67	12.00	1.358	0.581	22.9
Horizontal-Up	20	QPSK 1_0	41055/2636.5	1:1.5 8	0.539	0.00	10.68	12.00	1.355	0.730	22.9
Horizontal-Up	20	QPSK 1_0	41490/2680	1:1.5 8	0.544	-0.11	10.74	12.00	1.337	0.727	22.9
Horizontal-Down	20	QPSK 1_0	40620/2593	1:1.5 8	0.102	0.14	10.86	12.00	1.300	0.133	22.9
Vertical-Front	20	QPSK 1_0	40620/2593	1:1.5 8	0.140	0.08	10.86	12.00	1.300	0.182	22.9
Vertical-Back	20	QPSK 1_0	40620/2593	1:1.5 8	0.077	-0.08	10.86	12.00	1.300	0.100	22.9
Tip Mode	20	QPSK 1_0	40620/2593	1:1.5 8	0.145	0.12	10.86	12.00	1.300	0.189	22.9
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	20	QPSK 50_0	40620/2593	1:1.5 8	0.496	0.08	10.73	12.00	1.340	0.664	22.9
Horizontal-Up	20	QPSK 50_0	39750/2506	1:1.5 8	0.376	0.18	10.67	12.00	1.358	0.511	22.9
Horizontal-Up	20	QPSK 50_0	40185/2549.5	1:1.5 8	0.448	-0.04	10.68	12.00	1.355	0.607	22.9
Horizontal-Up	20	QPSK 50_0	41055/2636.5	1:1.5 8	0.491	-0.04	10.72	12.00	1.343	0.659	22.9
Horizontal-Up	20	QPSK 50_0	41490/2680	1:1.5 8	0.455	0.06	10.74	12.00	1.337	0.608	22.9
Horizontal-Down	20	QPSK 50_0	40620/2593	1:1.5 8	0.081	-0.06	10.73	12.00	1.340	0.109	22.9
Vertical-Front	20	QPSK 50_0	40620/2593	1:1.5 8	0.112	-0.01	10.73	12.00	1.340	0.150	22.9
Vertical-Back	20	QPSK 50_0	40620/2593	1:1.5 8	0.060	0.08	10.73	12.00	1.340	0.080	22.9
Tip Mode	20	QPSK 50_0	40620/2593	1:1.5 8	0.126	0.17	10.73	12.00	1.340	0.169	22.9
Sensor on Body Test data (Separate 5mm 100%RB)											
Horizontal-Up	20	QPSK 100_0	40620/2593	1:1.5 8	0.500	0.11	10.80	12.00	1.318	0.659	22.9
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	20	QPSK 1_0	40620/2593	1:1.5 8	0.105	0.07	24.50	25.00	1.122	0.118	22.9
Horizontal-Up-37mm-41C	20	QPSK 1_0	40620/2593	1:1.5 8	0.081	0.02	24.29	25.00	1.178	0.095	22.9
		QPSK 1_99	40422/2573.2								
Horizontal-Up-37mm-PC2	20	QPSK 1_0	40620/2593	1:2.3 3	0.107	-0.05	26.58	27.00	1.102	0.118	22.9
Horizontal-Down-24mm	20	QPSK 1_0	40620/2593	1:1.5 8	0.116	0.15	24.50	25.00	1.122	0.130	22.9
Vertical-Front-35mm	20	QPSK 1_0	40620/2593	1:1.5 8	0.030	-0.08	24.50	25.00	1.122	0.034	22.9
Vertical-Back-24mm	20	QPSK 1_0	40620/2593	1:1.5 8	0.060	-0.19	24.50	25.00	1.122	0.067	22.9
Tip Mode-24mm	20	QPSK 1_0	40620/2593	1:1.5	0.120	0.14	24.50	25.00	1.122	0.135	22.9



				8							
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	20	QPSK 50_0	40620/2593	1:1.5 8	0.079	0.06	23.39	24.00	1.151	0.091	22.9
Horizontal-Down-24mm	20	QPSK 50_0	40620/2593	1:1.5 8	0.085	-0.12	23.39	24.00	1.151	0.098	22.9
Vertical-Front-35mm	20	QPSK 50_0	40620/2593	1:1.5 8	0.025	0.07	23.39	24.00	1.151	0.029	22.9
Vertical-Back-24mm	20	QPSK 50_0	40620/2593	1:1.5 8	0.045	-0.16	23.39	24.00	1.151	0.052	22.9
Tip Mode-24mm	20	QPSK 50_0	40620/2593	1:1.5 8	0.088	-0.10	23.39	24.00	1.151	0.101	22.9

8.3.9 SAR Result of LTE Band 48

LTE Band 48 SAR Test Record											
Ant 2 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	20	QPSK 1_0	55990/3625	1:1.58	0.403	0.05	14.85	16.00	1.303	0.525	22.6
Horizontal-Down	20	QPSK 1_0	55990/3625	1:1.58	0.135	-0.03	14.85	16.00	1.303	0.176	22.6
Vertical-Front	20	QPSK 1_0	55990/3625	1:1.58	0.595	0.09	14.85	16.00	1.303	0.775	22.6
Vertical-Front-48C	20	QPSK 1_0	55990/3625	1:1.58	0.527	0.03	14.79	16.00	1.321	0.696	22.6
		QPSK 1_99	55792/3605.2								22.6
Vertical-Back	20	QPSK 1_0	55990/3625	1:1.58	0.033	-0.10	14.85	16.00	1.303	0.043	22.6
Tip Mode	20	QPSK 1_0	55990/3625	1:1.58	0.067	0.01	14.85	16.00	1.303	0.087	22.6
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	20	QPSK 50_0	55990/3625	1:1.58	0.337	0.03	14.75	16.00	1.334	0.449	22.6
Horizontal-Down	20	QPSK 50_0	55990/3625	1:1.58	0.101	0.14	14.75	16.00	1.334	0.135	22.6
Vertical-Front	20	QPSK 50_0	55990/3625	1:1.58	0.376	0.09	14.75	16.00	1.334	0.501	22.6
Vertical-Back	20	QPSK 50_0	55990/3625	1:1.58	0.017	0.19	14.75	16.00	1.334	0.023	22.6
Tip Mode	20	QPSK 50_0	55990/3625	1:1.58	0.043	-0.05	14.75	16.00	1.334	0.057	22.6
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	20	QPSK 1_0	55990/3625	1:1.58	0.108	-0.06	18.86	20.00	1.300	0.140	22.6
Horizontal-Up-37mm-48C	20	QPSK 1_0	55990/3625	1:1.58	0.088	0.03	18.83	20.00	1.309	0.115	22.6
		QPSK 1_99	55792/3605.2								22.6
Horizontal-Down-24mm	20	QPSK 1_0	55990/3625	1:1.58	0.043	-0.10	18.86	20.00	1.300	0.056	22.6
Vertical-Front-35mm	20	QPSK 1_0	55990/3625	1:1.58	0.091	0.02	18.86	20.00	1.300	0.118	22.6
Vertical-Back-24mm	20	QPSK 1_0	55990/3625	1:1.58	0.020	-0.15	18.86	20.00	1.300	0.026	22.6
Tip Mode-24mm	20	QPSK 1_0	55990/3625	1:1.58	0.030	0.07	18.86	20.00	1.300	0.039	22.6
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	20	QPSK 50_0	55990/3625	1:1.58	0.103	0.02	17.91	19.00	1.285	0.132	22.6
Horizontal-Down-24mm	20	QPSK 50_0	55990/3625	1:1.58	0.036	0.06	17.91	19.00	1.285	0.046	22.6
Vertical-Front-35mm	20	QPSK 50_0	55990/3625	1:1.58	0.075	0.13	17.91	19.00	1.285	0.096	22.6
Vertical-Back-24mm	20	QPSK 50_0	55990/3625	1:1.58	0.019	0.03	17.91	19.00	1.285	0.024	22.6
Tip Mode-24mm	20	QPSK 50_0	55990/3625	1:1.58	0.028	-0.04	17.91	19.00	1.285	0.036	22.6

8.3.10 SAR Result of LTE Band 66

LTE Band 66 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(℃)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	20	QPSK 1_0	132322/1745	1:1	0.303	0.19	19.15	20.00	1.216	0.369	22.5
Horizontal-Down	20	QPSK 1_0	132322/1745	1:1	0.181	0.13	19.15	20.00	1.216	0.220	22.5
Vertical-Front	20	QPSK 1_0	132322/1745	1:1	0.081	0.08	19.15	20.00	1.216	0.099	22.5
Vertical-Back	20	QPSK 1_0	132322/1745	1:1	0.161	0.16	19.15	20.00	1.216	0.196	22.5
Tip Mode	20	QPSK 1_0	132322/1745	1:1	0.432	-0.10	19.15	20.00	1.216	0.525	22.5
Tip Mode-66B	15	QPSK 1_0	132322/1745	1:1	0.375	0.06	18.96	20.00	1.271	0.476	22.5
	5	QPSK 1_24	132229/1735.7								22.5
Tip Mode-66C	20	QPSK 1_0	132322/1745	1:1	0.388	-0.10	18.97	20.00	1.268	0.492	22.5
		QPSK 1_99	132124/1725.2								22.5
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	20	QPSK 50_0	132322/1745	1:1	0.244	0.05	19.03	20.00	1.250	0.305	22.5
Horizontal-Down	20	QPSK 50_0	132322/1745	1:1	0.135	0.13	19.03	20.00	1.250	0.169	22.5
Vertical-Front	20	QPSK 50_0	132322/1745	1:1	0.067	-0.04	19.03	20.00	1.250	0.084	22.5
Vertical-Back	20	QPSK 50_0	132322/1745	1:1	0.128	-0.17	19.03	20.00	1.250	0.160	22.5
Tip Mode	20	QPSK 50_0	132322/1745	1:1	0.336	-0.14	19.03	20.00	1.250	0.420	22.5
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	20	QPSK 1_0	132322/1745	1:1	0.078	0.02	23.80	25.00	1.318	0.103	22.5
Horizontal-Up-37mm-66B	15	QPSK 1_0	132322/1745	1:1	0.052	0.03	23.73	25.00	1.340	0.070	22.5
	5	QPSK 1_24	132229/1735.7								22.5
Horizontal-Up-37mm-66C	20	QPSK 1_0	132322/1745	1:1	0.059	-0.07	23.74	25.00	1.337	0.079	22.5
		QPSK 1_99	132124/1725.2								22.5
Horizontal-Down-24mm	20	QPSK 1_0	132322/1745	1:1	0.092	0.06	23.80	25.00	1.318	0.121	22.5
Vertical-Front-35mm	20	QPSK 1_0	132322/1745	1:1	0.066	0.02	23.80	25.00	1.318	0.087	22.5
Vertical-Back-24mm	20	QPSK 1_0	132322/1745	1:1	0.066	-0.18	23.80	25.00	1.318	0.087	22.5
Tip Mode-24mm	20	QPSK 1_0	132322/1745	1:1	0.096	-0.19	23.80	25.00	1.318	0.127	22.5
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	20	QPSK 50_0	132322/1745	1:1	0.07	0.04	22.72	24.00	1.343	0.094	22.5
Horizontal-Down-24mm	20	QPSK 50_0	132322/1745	1:1	0.074	-0.02	22.72	24.00	1.343	0.099	22.5
Vertical-Front-35mm	20	QPSK 50_0	132322/1745	1:1	0.056	-0.05	22.72	24.00	1.343	0.075	22.5
Vertical-Back-24mm	20	QPSK 50_0	132322/1745	1:1	0.060	-0.16	22.72	24.00	1.343	0.081	22.5
Tip Mode-24mm	20	QPSK 50_0	132322/1745	1:1	0.083	-0.12	22.72	24.00	1.343	0.111	22.5

8.3.11 SAR Result of LTE Band 71

LTE Band 71 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Body Test data (Separate 5mm 1RB)											
Horizontal-Up	20	QPSK 1_0	133322/683	1:1	0.565	-0.03	24.71	25.00	1.069	0.604	22.4
Horizontal-Down	20	QPSK 1_0	133322/683	1:1	0.278	-0.03	24.71	25.00	1.069	0.297	22.4
Vertical-Front	20	QPSK 1_0	133322/683	1:1	0.341	0.08	24.71	25.00	1.069	0.365	22.4
Vertical-Back	20	QPSK 1_0	133322/683	1:1	0.300	0.14	24.71	25.00	1.069	0.321	22.4
Tip Mode	20	QPSK 1_0	133322/683	1:1	0.221	0.18	24.71	25.00	1.069	0.236	22.4
Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	20	QPSK 50_0	133322/683	1:1	0.512	0.01	23.55	24.00	1.109	0.568	22.4
Horizontal-Down	20	QPSK 50_0	133322/683	1:1	0.276	-0.15	23.55	24.00	1.109	0.306	22.4
Vertical-Front	20	QPSK 50_0	133322/683	1:1	0.347	0.10	23.55	24.00	1.109	0.385	22.4
Vertical-Back	20	QPSK 50_0	133322/683	1:1	0.297	0.06	23.55	24.00	1.109	0.329	22.4
Tip Mode	20	QPSK 50_0	133322/683	1:1	0.239	-0.10	23.55	24.00	1.109	0.265	22.4

8.3.12 SAR Result of NR Band n7

SA N7 SAR Test Record											
Ant0 Test Record											
Test position	BW	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scale factor	Scale SAR 1-g (W/kg)	Liquid Temp.(℃)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	20	QPSK 1_1	507000/2535	100%	0.732	0.06	12.13	13.00	1.222	0.894	22.9
Horizontal-Up	20	QPSK 1_1	502000/2510	100%	0.891	0.02	11.91	13.00	1.285	1.145	22.9
Horizontal-Up-Repeat SAR	20	QPSK 1_1	502000/2510	100%	0.887	0.07	11.91	13.00	1.285	1.140	22.9
Horizontal-Up	20	QPSK 1_1	512000/2560	100%	0.591	-0.09	11.86	13.00	1.300	0.768	22.9
Horizontal-Down	20	QPSK 1_1	507000/2535	100%	0.074	0.04	12.13	13.00	1.222	0.090	22.9
Vertical-Front	20	QPSK 1_1	507000/2535	100%	0.270	-0.05	12.13	13.00	1.222	0.330	22.9
Vertical-Back	20	QPSK 1_1	507000/2535	100%	0.148	0.10	12.13	13.00	1.222	0.181	22.9
Tip Mode	20	QPSK 1_1	507000/2535	100%	0.183	0.05	12.13	13.00	1.222	0.224	22.9
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	20	QPSK 50_28	507000/2535	100%	0.651	0.06	11.99	13.00	1.262	0.821	22.9
Horizontal-Up	20	QPSK 50_28	502000/2510	100%	0.744	0.06	11.79	13.00	1.321	0.983	22.9
Horizontal-Up	20	QPSK 50_28	512000/2560	100%	0.543	-0.15	11.83	13.00	1.309	0.711	22.9
Horizontal-Down	20	QPSK 50_28	507000/2535	100%	0.076	0.10	11.99	13.00	1.262	0.096	22.9
Vertical-Front	20	QPSK 50_28	507000/2535	100%	0.258	0.19	11.99	13.00	1.262	0.326	22.9
Vertical-Back	20	QPSK 50_28	507000/2535	100%	0.132	0.17	11.99	13.00	1.262	0.167	22.9
Tip Mode	20	QPSK 50_28	507000/2535	100%	0.162	-0.12	11.99	13.00	1.262	0.204	22.9
Sensor on Body Test data (Separate 5mm 100%RB)											
Horizontal-Up	20	QPSK 100_0	507000/2535	100%	0.646	0.12	11.06	12.00	1.242	0.802	22.9
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	20	QPSK 1_1	507000/2535	100%	0.409	-0.02	24.06	25.00	1.242	0.508	22.9
Horizontal-Down-24mm	20	QPSK 1_1	507000/2535	100%	0.258	0.03	24.06	25.00	1.242	0.320	22.9
Vertical-Front-35mm	20	QPSK 1_1	507000/2535	100%	0.118	0.07	24.06	25.00	1.242	0.147	22.9
Vertical-Back-24mm	20	QPSK 1_1	507000/2535	100%	0.152	0.05	24.06	25.00	1.242	0.189	22.9
Tip Mode-24mm	20	QPSK 1_1	507000/2535	100%	0.343	-0.12	24.06	25.00	1.242	0.426	22.9
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	20	QPSK 50_28	507000/2535	100%	0.397	0.00	24.03	25.00	1.250	0.496	22.9
Horizontal-Down-24mm	20	QPSK 50_28	507000/2535	100%	0.266	-0.13	24.03	25.00	1.250	0.333	22.9
Vertical-Front-35mm	20	QPSK 50_28	507000/2535	100%	0.106	-0.18	24.03	25.00	1.250	0.133	22.9
Vertical-Back-24mm	20	QPSK 50_28	507000/2535	100%	0.138	-0.17	24.03	25.00	1.250	0.173	22.9
Tip Mode-24mm	20	QPSK 50_28	507000/2535	100%	0.327	0.01	24.03	25.00	1.250	0.409	22.9

Test Position	Test ch./Freq.	Measured SAR (W/kg)	1 st Repeated	Ratio	2 nd Repeated	3 rd Repeated
Horizontal-Up 5mm	502000/2510	0.891	0.887	1.005	N/A	N/A
Note: 1) When the original highest measured SAR is ≥ 0.80 W/kg, the measurement was repeated once.						
2) A second repeated measurement was performed only if the ratio of largest to smallest SAR for the original and first repeated measurements was > 1.20 or when the original or repeated measurement was ≥ 1.45 W/kg (~ 10% from the 1-g SAR limit).						
3) A third repeated measurement was performed only if the original, first or second repeated measurement was ≥ 1.5 W/kg and the ratio of largest to smallest SAR for the original, first and second repeated measurements is > 1.20 .						



4) Repeated measurements are not required when the original highest measured SAR is < 0.80 W/kg
5) The same procedures should be adapted for measurements according to extremity and occupational exposure limits by applying a factor of 2.5 for extremity exposure and a factor of 5 for occupational exposure to the corresponding SAR thresholds. The repeated measurement results must be clearly identified in the SAR report.

8.3.13 SAR Result of NR Band n12

SA N12 SAR Test Record											
Ant0 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	15	QPSK 1_1	141500/707.5	100%	0.546	0.04	21.89	23.00	1.291	0.705	22.4
Horizontal-Down	15	QPSK 1_1	141500/707.5	100%	0.252	-0.07	21.89	23.00	1.291	0.325	22.4
Vertical-Front	15	QPSK 1_1	141500/707.5	100%	0.282	-0.16	21.89	23.00	1.291	0.364	22.4
Vertical-Back	15	QPSK 1_1	141500/707.5	100%	0.255	0.10	21.89	23.00	1.291	0.329	22.4
Tip Mode	15	QPSK 1_1	141500/707.5	100%	0.171	-0.09	21.89	23.00	1.291	0.221	22.4
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	15	QPSK 36_22	141500/707.5	100%	0.612	0.01	21.85	23.00	1.303	0.798	22.4
Horizontal-Down	15	QPSK 36_22	141500/707.5	100%	0.276	0.04	21.85	23.00	1.303	0.360	22.4
Vertical-Front	15	QPSK 36_22	141500/707.5	100%	0.302	0.06	21.85	23.00	1.303	0.394	22.4
Vertical-Back	15	QPSK 36_22	141500/707.5	100%	0.276	0.17	21.85	23.00	1.303	0.360	22.4
Tip Mode	15	QPSK 36_22	141500/707.5	100%	0.165	-0.11	21.85	23.00	1.303	0.215	22.4
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	15	QPSK 1_1	141500/707.5	100%	0.090	0.02	23.83	25.00	1.309	0.118	22.4
Horizontal-Down-24mm	15	QPSK 1_1	141500/707.5	100%	0.094	-0.07	23.83	25.00	1.309	0.123	22.4
Vertical-Front-35mm	15	QPSK 1_1	141500/707.5	100%	0.078	-0.16	23.83	25.00	1.309	0.102	22.4
Vertical-Back-24mm	15	QPSK 1_1	141500/707.5	100%	0.052	0.04	23.83	25.00	1.309	0.068	22.4
Tip Mode-24mm	15	QPSK 1_1	141500/707.5	100%	0.000	-0.11	23.83	25.00	1.309	0.000	22.4
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	15	QPSK 36_22	141500/707.5	100%	0.073	0.14	23.80	25.00	1.318	0.096	22.4
Horizontal-Down-24mm	15	QPSK 36_22	141500/707.5	100%	0.067	-0.10	23.80	25.00	1.318	0.088	22.4
Vertical-Front-35mm	15	QPSK 36_22	141500/707.5	100%	0.068	0.02	23.80	25.00	1.318	0.090	22.4
Vertical-Back-24mm	15	QPSK 36_22	141500/707.5	100%	0.063	-0.05	23.80	25.00	1.318	0.083	22.4
Tip Mode-24mm	15	QPSK 36_22	141500/707.5	100%	0.000	0.01	23.80	25.00	1.318	0.000	22.4

8.3.14 SAR Result of NR Band n14

SA N14 SAR Test Record											
Ant0 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Body Test data (Separate 5mm 1RB)											
Horizontal-Up	10	QPSK 1_1	158600/793	100%	0.312	0.10	23.91	25.00	1.285	0.401	22.4
Horizontal-Down	10	QPSK 1_1	158600/793	100%	0.619	-0.02	23.91	25.00	1.285	0.796	22.4
Vertical-Front	10	QPSK 1_1	158600/793	100%	0.471	0.11	23.91	25.00	1.285	0.605	22.4
Vertical-Back	10	QPSK 1_1	158600/793	100%	0.383	-0.02	23.91	25.00	1.285	0.492	22.4
Tip Mode	10	QPSK 1_1	158600/793	100%	0.200	0.03	23.91	25.00	1.285	0.257	22.4
Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	10	QPSK 25_14	158600/793	100%	0.292	-0.07	23.79	25.00	1.321	0.386	22.4
Horizontal-Down	10	QPSK 25_14	158600/793	100%	0.582	0.10	23.79	25.00	1.321	0.769	22.4
Vertical-Front	10	QPSK 25_14	158600/793	100%	0.435	0.03	23.79	25.00	1.321	0.575	22.4
Vertical-Back	10	QPSK 25_14	158600/793	100%	0.380	-0.02	23.79	25.00	1.321	0.502	22.4
Tip Mode	10	QPSK 25_14	158600/793	100%	0.222	0.19	23.79	25.00	1.321	0.293	22.4

8.3.15 SAR Result of NR Band n25

SA N25 SAR Test Record											
Ant0 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	20	QPSK 1_1	376500/1882.5	100%	0.561	-0.19	12.26	13.00	1.186	0.665	22.5
Horizontal-Down	20	QPSK 1_1	376500/1882.5	100%	0.097	-0.16	12.26	13.00	1.186	0.115	22.5
Vertical-Front	20	QPSK 1_1	376500/1882.5	100%	0.040	0.18	12.26	13.00	1.186	0.047	22.5
Vertical-Back	20	QPSK 1_1	376500/1882.5	100%	0.106	-0.16	12.26	13.00	1.186	0.126	22.5
Tip Mode	20	QPSK 1_1	376500/1882.5	100%	0.407	-0.04	12.26	13.00	1.186	0.483	22.5
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	20	QPSK 50_28	376500/1882.5	100%	0.644	0.02	12.18	13.00	1.208	0.778	22.5
Horizontal-Down	20	QPSK 50_28	376500/1882.5	100%	0.101	0.13	12.18	13.00	1.208	0.122	22.5
Vertical-Front	20	QPSK 50_28	376500/1882.5	100%	0.041	-0.17	12.18	13.00	1.208	0.050	22.5
Vertical-Back	20	QPSK 50_28	376500/1882.5	100%	0.104	-0.06	12.18	13.00	1.208	0.126	22.5
Tip Mode	20	QPSK 50_28	376500/1882.5	100%	0.422	-0.10	12.18	13.00	1.208	0.510	22.5
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	20	QPSK 1_1	376500/1882.5	100%	0.333	0.05	24.21	25.00	1.199	0.399	22.5
Horizontal-Down-24mm	20	QPSK 1_1	376500/1882.5	100%	0.184	0.13	24.21	25.00	1.199	0.221	22.5
Vertical-Front-35mm	20	QPSK 1_1	376500/1882.5	100%	0.056	0.07	24.21	25.00	1.199	0.067	22.5
Vertical-Back-24mm	20	QPSK 1_1	376500/1882.5	100%	0.163	0.05	24.21	25.00	1.199	0.196	22.5
Tip Mode-24mm	20	QPSK 1_1	376500/1882.5	100%	0.426	0.17	24.21	25.00	1.199	0.511	22.5
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	20	QPSK 50_28	376500/1882.5	100%	0.357	-0.03	24.20	25.00	1.202	0.429	22.5
Horizontal-Down-24mm	20	QPSK 50_28	376500/1882.5	100%	0.188	-0.16	24.20	25.00	1.202	0.226	22.5
Vertical-Front-35mm	20	QPSK 50_28	376500/1882.5	100%	0.046	0.11	24.20	25.00	1.202	0.055	22.5
Vertical-Back-24mm	20	QPSK 50_28	376500/1882.5	100%	0.197	0.15	24.20	25.00	1.202	0.237	22.5
Tip Mode-24mm	20	QPSK 50_28	376500/1882.5	100%	0.553	-0.18	24.20	25.00	1.202	0.665	22.5

8.3.16 SAR Result of NR Band n26

SA N26 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Test mode	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Body Test data (Separate 5mm 1RB)											
Horizontal-Up	20	QPSK 1_1	166300/831.5	100%	0.252	0.12	24.23	25.00	1.194	0.301	22.5
Horizontal-Down	20	QPSK 1_1	166300/831.5	100%	0.350	-0.09	24.23	25.00	1.194	0.418	22.5
Vertical-Front	20	QPSK 1_1	166300/831.5	100%	0.295	0.03	24.23	25.00	1.194	0.352	22.5
Vertical-Back	20	QPSK 1_1	166300/831.5	100%	0.322	-0.11	24.23	25.00	1.194	0.384	22.5
Tip Mode	20	QPSK 1_1	166300/831.5	100%	0.216	-0.18	24.23	25.00	1.194	0.258	22.5
Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	20	QPSK 50_28	166300/831.5	100%	0.260	-0.17	24.22	25.00	1.197	0.311	22.5
Horizontal-Down	20	QPSK 50_28	166300/831.5	100%	0.329	-0.09	24.22	25.00	1.197	0.394	22.5
Vertical-Front	20	QPSK 50_28	166300/831.5	100%	0.278	0.01	24.22	25.00	1.197	0.333	22.5
Vertical-Back	20	QPSK 50_28	166300/831.5	100%	0.292	0.03	24.22	25.00	1.197	0.349	22.5
Tip Mode	20	QPSK 50_28	166300/831.5	100%	0.218	0.17	24.22	25.00	1.197	0.261	22.5

8.3.17 SAR Result of NR Band n30

SA N30 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	10	QPSK 1_1	462000/2310	100%	0.647	-0.17	16.30	17.00	1.175	0.760	22.3
Horizontal-Down	10	QPSK 1_1	462000/2310	100%	0.065	0.00	16.30	17.00	1.175	0.076	22.3
Vertical-Front	10	QPSK 1_1	462000/2310	100%	0.114	0.10	16.30	17.00	1.175	0.134	22.3
Vertical-Back	10	QPSK 1_1	462000/2310	100%	0.116	-0.01	16.30	17.00	1.175	0.136	22.3
Tip Mode	10	QPSK 1_1	462000/2310	100%	0.336	0.16	16.30	17.00	1.175	0.395	22.3
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	10	QPSK 25_14	462000/2310	100%	0.865	0.09	16.09	17.00	1.233	1.067	22.3
Horizontal-Up-Repeat SAR	10	QPSK 25_14	462000/2310	100%	0.859	0.01	16.09	17.00	1.233	1.059	22.3
Horizontal-Down	10	QPSK 25_14	462000/2310	100%	0.086	-0.03	16.09	17.00	1.233	0.106	22.3
Vertical-Front	10	QPSK 25_14	462000/2310	100%	0.144	0.03	16.09	17.00	1.233	0.178	22.3
Vertical-Back	10	QPSK 25_14	462000/2310	100%	0.147	-0.07	16.09	17.00	1.233	0.181	22.3
Tip Mode	10	QPSK 25_14	462000/2310	100%	0.427	-0.06	16.09	17.00	1.233	0.527	22.3
Sensor on Body Test data (Separate 5mm 100%RB)											
Horizontal-Up	10	QPSK 50_0	462000/2310	100%	0.642	0.14	15.26	16.00	1.186	0.761	22.3
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	10	QPSK 1_1	462000/2310	100%	0.102	0.07	19.23	20.00	1.194	0.122	22.3
Horizontal-Down-24mm	10	QPSK 1_1	462000/2310	100%	0.040	0.13	19.23	20.00	1.194	0.048	22.3
Vertical-Front-35mm	10	QPSK 1_1	462000/2310	100%	0.025	-0.16	19.23	20.00	1.194	0.030	22.3
Vertical-Back-24mm	10	QPSK 1_1	462000/2310	100%	0.055	0.06	19.23	20.00	1.194	0.066	22.3
Tip Mode-24mm	10	QPSK 1_1	462000/2310	100%	0.132	0.09	19.23	20.00	1.194	0.158	22.3
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	10	QPSK 25_14	462000/2310	100%	0.111	-0.05	19.22	20.00	1.197	0.133	22.3
Horizontal-Down-24mm	10	QPSK 25_14	462000/2310	100%	0.056	0.12	19.22	20.00	1.197	0.067	22.3
Vertical-Front-35mm	10	QPSK 25_14	462000/2310	100%	0.031	-0.07	19.22	20.00	1.197	0.037	22.3
Vertical-Back-24mm	10	QPSK 25_14	462000/2310	100%	0.088	0.17	19.22	20.00	1.197	0.105	22.3
Tip Mode-24mm	10	QPSK 25_14	462000/2310	100%	0.179	-0.08	19.22	20.00	1.197	0.214	22.3

Test Position	Test ch./Freq.	Measured SAR (W/kg)	1 st Repeated	Ratio	2 nd Repeated	3 rd Repeated
Horizontal-Up 5mm	462000/2310	0.865	0.859	1.007	N/A	N/A
Note: 1) When the original highest measured SAR is ≥ 0.80 W/kg, the measurement was repeated once.						
2) A second repeated measurement was preformed only if the ratio of largest to smallest SAR for the original and first repeated measurements was > 1.20 or when the original or repeated measurement was ≥ 1.45 W/kg ($\sim 10\%$ from the 1-g SAR limit).						
3) A third repeated measurement was preformed only if the original, first or second repeated measurement was ≥ 1.5 W/kg and the ratio of largest to smallest SAR for the original, first and second repeated measurements is > 1.20 .						
4) Repeated measurements are not required when the original highest measured SAR is < 0.80 W/kg						
5) The same procedures should be adapted for measurements according to extremity and occupational exposure limits by applying a factor of 2.5 for extremity exposure and a factor of 5 for occupational exposure to the corresponding SAR thresholds. The repeated measurement results must be clearly identified in the SAR report.						

8.3.18 SAR Result of NR Band n41

SA N41 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	100	QPSK 1_1	518598/2592.99	100%	0.879	0.07	12.48	13.80	1.355	1.191	22.9
Horizontal-Up-Repeat SAR	100	QPSK 1_1	518598/2592.99	100%	0.872	-0.01	12.48	13.80	1.355	1.182	22.9
Horizontal-Down	100	QPSK 1_1	518598/2592.99	100%	0.113	0.17	12.48	13.80	1.355	0.153	22.9
Vertical-Front	100	QPSK 1_1	518598/2592.99	100%	0.319	0.12	12.48	13.80	1.355	0.432	22.9
Vertical-Back	100	QPSK 1_1	518598/2592.99	100%	0.157	-0.15	12.48	13.80	1.355	0.213	22.9
Tip Mode	100	QPSK 1_1	518598/2592.99	100%	0.204	0.11	12.48	13.80	1.355	0.276	22.9
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	100	QPSK 135_69	518598/2592.99	100%	0.733	-0.19	12.40	13.80	1.380	1.012	22.9
Horizontal-Down	100	QPSK 135_69	518598/2592.99	100%	0.127	-0.07	12.40	13.80	1.380	0.175	22.9
Vertical-Front	100	QPSK 135_69	518598/2592.99	100%	0.133	-0.04	12.40	13.80	1.380	0.184	22.9
Vertical-Back	100	QPSK 135_69	518598/2592.99	100%	0.089	-0.05	12.40	13.80	1.380	0.123	22.9
Tip Mode	100	QPSK 135_69	518598/2592.99	100%	0.152	-0.15	12.40	13.80	1.380	0.210	22.9
Sensor on Body Test data (Separate 5mm 100%RB)											
Horizontal-Up	100	QPSK 270_0	518598/2592.99	100%	0.709	0.19	11.44	12.80	1.368	0.970	22.9
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	100	QPSK 1_1	518598/2592.99	100%	0.455	0.07	25.38	26.80	1.387	0.631	22.9
Horizontal-Down-24mm	100	QPSK 1_1	518598/2592.99	100%	0.382	-0.13	25.38	26.80	1.387	0.530	22.9
Vertical-Front-35mm	100	QPSK 1_1	518598/2592.99	100%	0.169	-0.09	25.38	26.80	1.387	0.234	22.9
Vertical-Back-24mm	100	QPSK 1_1	518598/2592.99	100%	0.204	0.13	25.38	26.80	1.387	0.283	22.9
Tip Mode-24mm	100	QPSK 1_1	518598/2592.99	100%	0.391	-0.04	25.38	26.80	1.387	0.542	22.9
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	100	QPSK 135_69	518598/2592.99	100%	0.276	0.11	25.30	26.80	1.413	0.390	22.9
Horizontal-Down-24mm	100	QPSK 135_69	518598/2592.99	100%	0.295	-0.18	25.30	26.80	1.413	0.417	22.9
Vertical-Front-35mm	100	QPSK 135_69	518598/2592.99	100%	0.099	0.01	25.30	26.80	1.413	0.140	22.9
Vertical-Back-24mm	100	QPSK 135_69	518598/2592.99	100%	0.090	0.00	25.30	26.80	1.413	0.127	22.9
Tip Mode-24mm	100	QPSK 135_69	518598/2592.99	100%	0.204	0.18	25.30	26.80	1.413	0.288	22.9
Sensor off Body Test data (Separate 100%RB)											
Horizontal-Up-37mm	100	QPSK 270_0	518598/2592.99	100%	0.262	0.02	24.41	25.80	1.377	0.361	22.9
Ant 2 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	100	QPSK 1_1	518598/2592.99	100%	0.336	-0.09	16.04	16.80	1.191	0.400	22.9
Horizontal-Down	100	QPSK 1_1	518598/2592.99	100%	0.210	-0.14	16.04	16.80	1.191	0.250	22.9
Vertical-Front	100	QPSK 1_1	518598/2592.99	100%	0.616	-0.15	16.04	16.80	1.191	0.734	22.9
Vertical-Back	100	QPSK 1_1	518598/2592.99	100%	0.121	-0.14	16.04	16.80	1.191	0.144	22.9
Tip Mode	100	QPSK 1_1	518598/2592.99	100%	0.102	-0.15	16.04	16.80	1.191	0.122	22.9
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	100	QPSK 135_69	518598/2592.99	100%	0.304	0.14	15.89	16.80	1.233	0.375	22.9
Horizontal-Down	100	QPSK 135_69	518598/2592.99	100%	0.172	-0.10	15.89	16.80	1.233	0.212	22.9
Vertical-Front	100	QPSK 135_69	518598/2592.99	100%	0.458	0.01	15.89	16.80	1.233	0.565	22.9
Vertical-Back	100	QPSK 135_69	518598/2592.99	100%	0.047	0.16	15.89	16.80	1.233	0.058	22.9

Tip Mode	100	QPSK 135_69	518598/2592.99	100%	0.043	0.16	15.89	16.80	1.233	0.053	22.9
Sensor on Body Test data (Separate 5mm 100%RB)											
Vertical-Front	100	QPSK 270_0	518598/2592.99	100%	0.466	0.03	14.88	15.80	1.236	0.576	22.9
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	100	QPSK 1_1	518598/2592.99	100%	0.302	0.07	25.98	26.80	1.208	0.365	22.9
Horizontal-Down-24mm	100	QPSK 1_1	518598/2592.99	100%	0.243	-0.19	25.98	26.80	1.208	0.293	22.9
Vertical-Front-35mm	100	QPSK 1_1	518598/2592.99	100%	0.255	0.02	25.98	26.80	1.208	0.308	22.9
Vertical-Back-24mm	100	QPSK 1_1	518598/2592.99	100%	0.153	0.09	25.98	26.80	1.208	0.185	22.9
Tip Mode-24mm	100	QPSK 1_1	518598/2592.99	100%	0.322	0.18	25.98	26.80	1.208	0.389	22.9
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	100	QPSK 135_69	518598/2592.99	100%	0.276	-0.03	25.89	26.80	1.233	0.340	22.9
Horizontal-Down-24mm	100	QPSK 135_69	518598/2592.99	100%	0.168	0.11	25.89	26.80	1.233	0.207	22.9
Vertical-Front-35mm	100	QPSK 135_69	518598/2592.99	100%	0.203	0.01	25.89	26.80	1.233	0.250	22.9
Vertical-Back-24mm	100	QPSK 135_69	518598/2592.99	100%	0.093	0.13	25.89	26.80	1.233	0.115	22.9
Tip Mode-24mm	100	QPSK 135_69	518598/2592.99	100%	0.152	-0.08	25.89	26.80	1.233	0.187	22.9

Test Position	Test ch./Freq.	Measured SAR (W/kg)	1 st Repeated	Ratio	2 nd Repeated	3 rd Repeated
Horizontal-Up 5mm	518598/2592.99	0.879	0.872	1.008	N/A	N/A
Note: 1) When the original highest measured SAR is ≥ 0.80 W/kg, the measurement was repeated once.						
2) A second repeated measurement was performed only if the ratio of largest to smallest SAR for the original and first repeated measurements was > 1.20 or when the original or repeated measurement was ≥ 1.45 W/kg ($\sim 10\%$ from the 1-g SAR limit).						
3) A third repeated measurement was performed only if the original, first or second repeated measurement was ≥ 1.5 W/kg and the ratio of largest to smallest SAR for the original, first and second repeated measurements is > 1.20 .						
4) Repeated measurements are not required when the original highest measured SAR is < 0.80 W/kg						
5) The same procedures should be adapted for measurements according to extremity and occupational exposure limits by applying a factor of 2.5 for extremity exposure and a factor of 5 for occupational exposure to the corresponding SAR thresholds. The repeated measurement results must be clearly identified in the SAR report.						

8.3.19 SAR Result of NR Band n48

SA N48 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	40	QPSK 1_1	641666/3624.99	100%	0.818	0.01	10.68	12.00	1.355	1.109	22.6
Horizontal-Up-Repeat SAR	40	QPSK 1_1	641666/3624.99	100%	0.813	-0.05	10.68	12.00	1.355	1.102	22.6
Horizontal-Up	40	QPSK 1_1	638000/3570	100%	0.605	0.14	10.45	12.00	1.429	0.864	22.6
Horizontal-Up	40	QPSK 1_1	645322/3679.98	100%	0.783	0.18	10.60	12.00	1.380	1.081	22.6
Horizontal-Down	40	QPSK 1_1	641666/3624.99	100%	0.100	0.17	10.68	12.00	1.355	0.136	22.6
Vertical-Front	40	QPSK 1_1	641666/3624.99	100%	0.077	-0.07	10.68	12.00	1.355	0.104	22.6
Vertical-Back	40	QPSK 1_1	641666/3624.99	100%	0.088	0.08	10.68	12.00	1.355	0.119	22.6
Tip Mode	40	QPSK 1_1	641666/3624.99	100%	0.436	0.14	10.68	12.00	1.355	0.591	22.6
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	40	QPSK 50_28	641666/3624.99	100%	0.719	-0.09	10.55	12.00	1.396	1.004	22.6
Horizontal-Up	40	QPSK 50_28	638000/3570	100%	0.579	-0.08	10.54	12.00	1.400	0.810	22.6
Horizontal-Up	40	QPSK 50_28	645322/3679.98	100%	0.703	-0.11	10.52	12.00	1.406	0.988	22.6
Horizontal-Down	40	QPSK 50_28	641666/3624.99	100%	0.159	-0.09	10.55	12.00	1.396	0.222	22.6
Vertical-Front	40	QPSK 50_28	641666/3624.99	100%	0.083	-0.05	10.55	12.00	1.396	0.116	22.6
Vertical-Back	40	QPSK 50_28	641666/3624.99	100%	0.075	-0.11	10.55	12.00	1.396	0.105	22.6
Tip Mode	40	QPSK 50_28	641666/3624.99	100%	0.405	0.08	10.55	12.00	1.396	0.566	22.6
Sensor on Body Test data (Separate 5mm 100%RB)											
Horizontal-Up	40	QPSK 100_0	641666/3624.99	100%	0.687	-0.13	9.44	11.00	1.432	0.984	22.6
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	40	QPSK 1_1	641666/3624.99	100%	0.109	0.05	18.59	20.00	1.384	0.151	22.6
Horizontal-Down-24mm	40	QPSK 1_1	641666/3624.99	100%	0.063	0.18	18.59	20.00	1.384	0.087	22.6
Vertical-Front-35mm	40	QPSK 1_1	641666/3624.99	100%	0.011	0.01	18.59	20.00	1.384	0.015	22.6
Vertical-Back-24mm	40	QPSK 1_1	641666/3624.99	100%	0.064	-0.17	18.59	20.00	1.384	0.089	22.6
Tip Mode-24mm	40	QPSK 1_1	641666/3624.99	100%	0.142	-0.06	18.59	20.00	1.384	0.196	22.6
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	40	QPSK 50_28	641666/3624.99	100%	0.082	-0.03	18.50	20.00	1.413	0.116	22.6
Horizontal-Down-24mm	40	QPSK 50_28	641666/3624.99	100%	0.086	-0.07	18.50	20.00	1.413	0.121	22.6
Vertical-Front-35mm	40	QPSK 50_28	641666/3624.99	100%	0.016	0.02	18.50	20.00	1.413	0.023	22.6
Vertical-Back-24mm	40	QPSK 50_28	641666/3624.99	100%	0.065	0.06	18.50	20.00	1.413	0.092	22.6
Tip Mode-24mm	40	QPSK 50_28	641666/3624.99	100%	0.116	0.14	18.50	20.00	1.413	0.164	22.6
Ant 2 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	40	QPSK 1_1	641666/3624.99	100%	0.323	-0.13	13.77	15.00	1.327	0.429	22.6
Horizontal-Down	40	QPSK 1_1	641666/3624.99	100%	0.145	-0.06	13.77	15.00	1.327	0.192	22.6
Vertical-Front	40	QPSK 1_1	641666/3624.99	100%	0.573	-0.07	13.77	15.00	1.327	0.761	22.6
Vertical-Back	40	QPSK 1_1	641666/3624.99	100%	0.047	0.19	13.77	15.00	1.327	0.062	22.6
Tip Mode	40	QPSK 1_1	641666/3624.99	100%	0.056	0.17	13.77	15.00	1.327	0.074	22.6
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	40	QPSK 50_28	641666/3624.99	100%	0.305	0.17	13.76	15.00	1.330	0.406	22.6
Horizontal-Down	40	QPSK 50_28	641666/3624.99	100%	0.150	-0.08	13.76	15.00	1.330	0.200	22.6
Vertical-Front	40	QPSK 50_28	641666/3624.99	100%	0.599	-0.19	13.76	15.00	1.330	0.797	22.6

Vertical-Back	40	QPSK 50_28	641666/3624.99	100%	0.037	-0.12	13.76	15.00	1.330	0.049	22.6
Tip Mode	40	QPSK 50_28	641666/3624.99	100%	0.065	-0.03	13.76	15.00	1.330	0.086	22.6
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	40	QPSK 1_1	641666/3624.99	100%	0.245	0.01	18.82	20.00	1.312	0.321	22.6
Horizontal-Down-24mm	40	QPSK 1_1	641666/3624.99	100%	0.080	0.17	18.82	20.00	1.312	0.105	22.6
Vertical-Front-35mm	40	QPSK 1_1	641666/3624.99	100%	0.205	0.09	18.82	20.00	1.312	0.269	22.6
Vertical-Back-24mm	40	QPSK 1_1	641666/3624.99	100%	0.072	-0.05	18.82	20.00	1.312	0.094	22.6
Tip Mode-24mm	40	QPSK 1_1	641666/3624.99	100%	0.096	-0.09	18.82	20.00	1.312	0.126	22.6
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	40	QPSK 50_28	641666/3624.99	100%	0.231	0.02	18.80	20.00	1.318	0.305	22.6
Horizontal-Down-24mm	40	QPSK 50_28	641666/3624.99	100%	0.074	-0.09	18.80	20.00	1.318	0.098	22.6
Vertical-Front-35mm	40	QPSK 50_28	641666/3624.99	100%	0.163	-0.07	18.80	20.00	1.318	0.215	22.6
Vertical-Back-24mm	40	QPSK 50_28	641666/3624.99	100%	0.068	-0.12	18.80	20.00	1.318	0.090	22.6
Tip Mode-24mm	40	QPSK 50_28	641666/3624.99	100%	0.103	0.09	18.80	20.00	1.318	0.136	22.6

Test Position	Test ch./Freq.	Measured SAR (W/kg)	1 st Repeated	Ratio	2 nd Repeated	3 rd Repeated
Horizontal-Up 5mm	641666/3624.99	0.818	0.813	1.006	N/A	N/A
Note: 1) When the original highest measured SAR is ≥ 0.80 W/kg, the measurement was repeated once.						
2) A second repeated measurement was performed only if the ratio of largest to smallest SAR for the original and first repeated measurements was > 1.20 or when the original or repeated measurement was ≥ 1.45 W/kg ($\sim 10\%$ from the 1-g SAR limit).						
3) A third repeated measurement was performed only if the original, first or second repeated measurement was ≥ 1.5 W/kg and the ratio of largest to smallest SAR for the original, first and second repeated measurements is > 1.20 .						
4) Repeated measurements are not required when the original highest measured SAR is < 0.80 W/kg						
5) The same procedures should be adapted for measurements according to extremity and occupational exposure limits by applying a factor of 2.5 for extremity exposure and a factor of 5 for occupational exposure to the corresponding SAR thresholds. The repeated measurement results must be clearly identified in the SAR report.						

8.3.20 SAR Result of NR Band n66

SA N66 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	30	QPSK 1_1	349000/1745	100%	0.327	-0.02	19.69	21.00	1.352	0.442	22.5
Horizontal-Down	30	QPSK 1_1	349000/1745	100%	0.214	-0.14	19.69	21.00	1.352	0.289	22.5
Vertical-Front	30	QPSK 1_1	349000/1745	100%	0.100	-0.09	19.69	21.00	1.352	0.135	22.5
Vertical-Back	30	QPSK 1_1	349000/1745	100%	0.155	0.04	19.69	21.00	1.352	0.210	22.5
Tip Mode	30	QPSK 1_1	349000/1745	100%	0.480	0.10	19.69	21.00	1.352	0.649	22.5
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	30	QPSK 80_40	349000/1745	100%	0.455	-0.07	19.58	21.00	1.387	0.631	22.5
Horizontal-Down	30	QPSK 80_40	349000/1745	100%	0.242	0.04	19.58	21.00	1.387	0.336	22.5
Vertical-Front	30	QPSK 80_40	349000/1745	100%	0.112	-0.01	19.58	21.00	1.387	0.155	22.5
Vertical-Back	30	QPSK 80_40	349000/1745	100%	0.193	0.09	19.58	21.00	1.387	0.268	22.5
Tip Mode	30	QPSK 80_40	349000/1745	100%	0.575	-0.04	19.58	21.00	1.387	0.797	22.5
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	30	QPSK 1_1	349000/1745	100%	0.063	-0.07	23.67	25.00	1.358	0.086	22.5
Horizontal-Down-24mm	30	QPSK 1_1	349000/1745	100%	0.121	-0.18	23.67	25.00	1.358	0.164	22.5
Vertical-Front-35mm	30	QPSK 1_1	349000/1745	100%	0.037	0.02	23.67	25.00	1.358	0.050	22.5
Vertical-Back-24mm	30	QPSK 1_1	349000/1745	100%	0.073	-0.07	23.67	25.00	1.358	0.099	22.5
Tip Mode-24mm	30	QPSK 1_1	349000/1745	100%	0.100	-0.06	23.67	25.00	1.358	0.136	22.5
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	30	QPSK 80_40	349000/1745	100%	0.058	0.03	23.60	25.00	1.380	0.080	22.5
Horizontal-Down-24mm	30	QPSK 80_40	349000/1745	100%	0.118	0.13	23.60	25.00	1.380	0.163	22.5
Vertical-Front-35mm	30	QPSK 80_40	349000/1745	100%	0.026	0.01	23.60	25.00	1.380	0.036	22.5
Vertical-Back-24mm	30	QPSK 80_40	349000/1745	100%	0.072	-0.12	23.60	25.00	1.380	0.099	22.5
Tip Mode-24mm	30	QPSK 80_40	349000/1745	100%	0.112	-0.14	23.60	25.00	1.380	0.155	22.5

8.3.21 SAR Result of NR Band n71

SA N71 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Body Test data (Separate 5mm 1RB)											
Horizontal-Up	20	QPSK 1_1	136100/680.5	100%	0.267	0.04	23.79	25.00	1.321	0.353	22.4
Horizontal-Down	20	QPSK 1_1	136100/680.5	100%	0.126	0.04	23.79	25.00	1.321	0.166	22.4
Vertical-Front	20	QPSK 1_1	136100/680.5	100%	0.171	-0.02	23.79	25.00	1.321	0.226	22.4
Vertical-Back	20	QPSK 1_1	136100/680.5	100%	0.125	0.17	23.79	25.00	1.321	0.165	22.4
Tip Mode	20	QPSK 1_1	136100/680.5	100%	0.112	-0.18	23.79	25.00	1.321	0.148	22.4
Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	20	QPSK 50_28	136100/680.5	100%	0.337	0.04	23.76	25.00	1.330	0.448	22.4
Horizontal-Down	20	QPSK 50_28	136100/680.5	100%	0.154	-0.03	23.76	25.00	1.330	0.205	22.4
Vertical-Front	20	QPSK 50_28	136100/680.5	100%	0.163	0.11	23.76	25.00	1.330	0.217	22.4
Vertical-Back	20	QPSK 50_28	136100/680.5	100%	0.143	-0.03	23.76	25.00	1.330	0.190	22.4
Tip Mode	20	QPSK 50_28	136100/680.5	100%	0.102	0.15	23.76	25.00	1.330	0.136	22.4

8.3.22 SAR Result of NR Band n77 (3450-3550)

SA N77 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	100	QPSK 1_1	633334/3500	100%	0.577	-0.19	15.71	17.00	1.346	0.777	22.6
Horizontal-Down	100	QPSK 1_1	633334/3500	100%	0.064	0.11	15.71	17.00	1.346	0.086	22.6
Vertical-Front	100	QPSK 1_1	633334/3500	100%	0.086	-0.14	15.71	17.00	1.346	0.116	22.6
Vertical-Back	100	QPSK 1_1	633334/3500	100%	0.208	0.00	15.71	17.00	1.346	0.280	22.6
Tip Mode	100	QPSK 1_1	633334/3500	100%	0.448	-0.15	15.71	17.00	1.346	0.603	22.6
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	100	QPSK 135_69	633334/3500	100%	0.633	-0.02	15.61	17.00	1.377	0.872	22.6
Horizontal-Down	100	QPSK 135_69	633334/3500	100%	0.073	0.02	15.61	17.00	1.377	0.101	22.6
Vertical-Front	100	QPSK 135_69	633334/3500	100%	0.092	0.04	15.61	17.00	1.377	0.127	22.6
Vertical-Back	100	QPSK 135_69	633334/3500	100%	0.192	0.00	15.61	17.00	1.377	0.264	22.6
Tip Mode	100	QPSK 135_69	633334/3500	100%	0.534	0.11	15.61	17.00	1.377	0.735	22.6
Sensor on Body Test data (Separate 5mm 100%RB)											
Horizontal-Up	100	QPSK 270_0	633334/3500	100%	0.581	-0.08	14.70	16.00	1.349	0.784	22.6
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	100	QPSK 1_1	633334/3500	100%	0.328	0.06	25.70	27.00	1.349	0.442	22.6
Horizontal-Down-24mm	100	QPSK 1_1	633334/3500	100%	0.099	0.07	25.70	27.00	1.349	0.134	22.6
Vertical-Front-35mm	100	QPSK 1_1	633334/3500	100%	0.094	0.02	25.70	27.00	1.349	0.127	22.6
Vertical-Back-24mm	100	QPSK 1_1	633334/3500	100%	0.268	0.18	25.70	27.00	1.349	0.362	22.6
Tip Mode-24mm	100	QPSK 1_1	633334/3500	100%	0.485	-0.08	25.70	27.00	1.349	0.654	22.6
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	100	QPSK 135_69	633334/3500	100%	0.276	0.14	25.66	27.00	1.361	0.376	22.6
Horizontal-Down-24mm	100	QPSK 135_69	633334/3500	100%	0.098	-0.14	25.66	27.00	1.361	0.133	22.6
Vertical-Front-35mm	100	QPSK 135_69	633334/3500	100%	0.107	-0.02	25.66	27.00	1.361	0.146	22.6
Vertical-Back-24mm	100	QPSK 135_69	633334/3500	100%	0.302	-0.02	25.66	27.00	1.361	0.411	22.6
Tip Mode-24mm	100	QPSK 135_69	633334/3500	100%	0.510	-0.19	25.66	27.00	1.361	0.694	22.6
Ant 2 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	100	QPSK 1_1	633334/3500	100%	0.336	0.18	15.17	16.00	1.211	0.407	22.6
Horizontal-Down	100	QPSK 1_1	633334/3500	100%	0.066	0.07	15.17	16.00	1.211	0.080	22.6
Vertical-Front	100	QPSK 1_1	633334/3500	100%	0.532	0.03	15.17	16.00	1.211	0.644	22.6
Vertical-Back	100	QPSK 1_1	633334/3500	100%	0.049	0.09	15.17	16.00	1.211	0.059	22.6
Tip Mode	100	QPSK 1_1	633334/3500	100%	0.041	0.17	15.17	16.00	1.211	0.050	22.6
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	100	QPSK 135_69	633334/3500	100%	0.375	0.06	14.97	16.00	1.268	0.475	22.6
Horizontal-Down	100	QPSK 135_69	633334/3500	100%	0.100	0.09	14.97	16.00	1.268	0.127	22.6
Vertical-Front	100	QPSK 135_69	633334/3500	100%	0.613	-0.01	14.97	16.00	1.268	0.777	22.6
Vertical-Back	100	QPSK 135_69	633334/3500	100%	0.054	0.05	14.97	16.00	1.268	0.068	22.6
Tip Mode	100	QPSK 135_69	633334/3500	100%	0.037	-0.13	14.97	16.00	1.268	0.047	22.6
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	100	QPSK 1_1	633334/3500	100%	0.309	0.09	25.48	27.00	1.419	0.438	22.6



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Horizontal-Down-24mm	100	QPSK 1_1	633334/3500	100%	0.231	-0.17	25.48	27.00	1.419	0.328	22.6
Vertical-Front-35mm	100	QPSK 1_1	633334/3500	100%	0.433	-0.04	25.48	27.00	1.419	0.614	22.6
Vertical-Back-24mm	100	QPSK 1_1	633334/3500	100%	0.279	-0.01	25.48	27.00	1.419	0.396	22.6
Tip Mode-24mm	100	QPSK 1_1	633334/3500	100%	0.161	0.17	25.48	27.00	1.419	0.228	22.6
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	100	QPSK 135_69	633334/3500	100%	0.275	0.12	25.32	27.00	1.472	0.405	22.6
Horizontal-Down-24mm	100	QPSK 135_69	633334/3500	100%	0.186	-0.14	25.32	27.00	1.472	0.274	22.6
Vertical-Front-35mm	100	QPSK 135_69	633334/3500	100%	0.407	-0.12	25.32	27.00	1.472	0.599	22.6
Vertical-Back-24mm	100	QPSK 135_69	633334/3500	100%	0.246	0.15	25.32	27.00	1.472	0.362	22.6
Tip Mode-24mm	100	QPSK 135_69	633334/3500	100%	0.158	-0.02	25.32	27.00	1.472	0.233	22.6

8.3.23 SAR Result of NR Band n77 (3700-3980)

SA N77 SAR Test Record											
Ant 0 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	100	QPSK 1_1	656000/3840	100%	0.888	0.05	16.08	17.00	1.236	1.098	22.6
Horizontal-Up-Repeat SAR	100	QPSK 1_1	656000/3840	100%	0.879	0.01	16.08	17.00	1.236	1.086	22.6
Horizontal-Down	100	QPSK 1_1	656000/3840	100%	0.386	0.11	16.08	17.00	1.236	0.477	22.6
Vertical-Front	100	QPSK 1_1	656000/3840	100%	0.095	0.05	16.08	17.00	1.236	0.117	22.6
Vertical-Back	100	QPSK 1_1	656000/3840	100%	0.352	-0.01	16.08	17.00	1.236	0.435	22.6
Tip Mode	100	QPSK 1_1	656000/3840	100%	0.462	0.16	16.08	17.00	1.236	0.571	22.6
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	100	QPSK 135_69	656000/3840	100%	0.753	-0.09	16.04	17.00	1.247	0.939	22.6
Horizontal-Down	100	QPSK 135_69	656000/3840	100%	0.330	-0.15	16.04	17.00	1.247	0.412	22.6
Vertical-Front	100	QPSK 135_69	656000/3840	100%	0.090	0.12	16.04	17.00	1.247	0.112	22.6
Vertical-Back	100	QPSK 135_69	656000/3840	100%	0.410	-0.15	16.04	17.00	1.247	0.511	22.6
Tip Mode	100	QPSK 135_69	656000/3840	100%	0.305	0.06	16.04	17.00	1.247	0.380	22.6
Body Test data (Separate 5mm 100%RB)											
Horizontal-Up	100	QPSK 270_0	656000/3840	100%	0.729	0.11	15.08	16.00	1.236	0.901	22.6
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	100	QPSK 1_1	656000/3840	100%	0.423	-0.12	26.16	27.00	1.213	0.513	22.6
Horizontal-Down-24mm	100	QPSK 1_1	656000/3840	100%	0.866	0.19	26.16	27.00	1.213	1.051	22.6
Vertical-Front-35mm	100	QPSK 1_1	656000/3840	100%	0.166	-0.12	26.16	27.00	1.213	0.201	22.6
Vertical-Back-24mm	100	QPSK 1_1	656000/3840	100%	0.783	0.10	26.16	27.00	1.213	0.950	22.6
Tip Mode-24mm	100	QPSK 1_1	656000/3840	100%	0.836	-0.02	26.16	27.00	1.213	1.014	22.6
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	100	QPSK 135_69	656000/3840	100%	0.379	0.03	26.13	27.00	1.222	0.463	22.6
Horizontal-Down-24mm	100	QPSK 135_69	656000/3840	100%	0.752	0.14	26.13	27.00	1.222	0.919	22.6
Vertical-Front-35mm	100	QPSK 135_69	656000/3840	100%	0.139	-0.08	26.13	27.00	1.222	0.170	22.6
Vertical-Back-24mm	100	QPSK 135_69	656000/3840	100%	0.737	-0.04	26.13	27.00	1.222	0.900	22.6
Tip Mode-24mm	100	QPSK 135_69	656000/3840	100%	0.769	-0.11	26.13	27.00	1.222	0.940	22.6
Sensor off Body Test data (Separate 100%RB)											
Horizontal-Down-24mm	100	QPSK 270_0	656000/3840	100%	0.782	-0.08	25.18	26.00	1.208	0.945	22.6
Vertical-Back-24mm	100	QPSK 270_0	656000/3840	100%	0.703	-0.01	25.18	26.00	1.208	0.849	22.6
Tip Mode-24mm	100	QPSK 270_0	656000/3840	100%	0.753	0.07	25.18	26.00	1.208	0.909	22.6
Ant 2 Test Record											
Test position	BW.	Modulation	Test ch./Freq.	Duty Cycle	SAR (W/kg) 1-g	Power drift (dB)	Conducted Power(dBm)	Tune up Limit(dBm)	Scaled factor	Scaled SAR 1-g (W/kg)	Liquid Temp.(°C)
Sensor on Body Test data (Separate 5mm 1RB)											
Horizontal-Up	100	QPSK 1_1	656000/3840	100%	0.323	0.05	14.98	16.00	1.265	0.409	22.6
Horizontal-Down	100	QPSK 1_1	656000/3840	100%	0.094	-0.12	14.98	16.00	1.265	0.119	22.6
Vertical-Front	100	QPSK 1_1	656000/3840	100%	0.272	-0.08	14.98	16.00	1.265	0.344	22.6
Vertical-Back	100	QPSK 1_1	656000/3840	100%	0.023	0.00	14.98	16.00	1.265	0.029	22.6
Tip Mode	100	QPSK 1_1	656000/3840	100%	0.061	-0.04	14.98	16.00	1.265	0.077	22.6
Sensor on Body Test data (Separate 5mm 50%RB)											
Horizontal-Up	100	QPSK 135_69	656000/3840	100%	0.312	-0.06	14.85	16.00	1.303	0.407	22.6
Horizontal-Down	100	QPSK 135_69	656000/3840	100%	0.096	-0.14	14.85	16.00	1.303	0.125	22.6
Vertical-Front	100	QPSK 135_69	656000/3840	100%	0.265	-0.02	14.85	16.00	1.303	0.345	22.6

Vertical-Back	100	QPSK 135_69	656000/3840	100%	0.021	-0.08	14.85	16.00	1.303	0.027	22.6
Tip Mode	100	QPSK 135_69	656000/3840	100%	0.083	0.02	14.85	16.00	1.303	0.108	22.6
Sensor off Body Test data (Separate 1RB)											
Horizontal-Up-37mm	100	QPSK 1_1	656000/3840	100%	0.311	0.12	25.86	27.00	1.300	0.404	22.6
Horizontal-Down-24mm	100	QPSK 1_1	656000/3840	100%	0.281	-0.11	25.86	27.00	1.300	0.365	22.6
Vertical-Front-35mm	100	QPSK 1_1	656000/3840	100%	0.588	0.18	25.86	27.00	1.300	0.764	22.6
Vertical-Back-24mm	100	QPSK 1_1	656000/3840	100%	0.178	0.02	25.86	27.00	1.300	0.231	22.6
Tip Mode-24mm	100	QPSK 1_1	656000/3840	100%	0.394	-0.11	25.86	27.00	1.300	0.512	22.6
Sensor off Body Test data (Separate 50%RB)											
Horizontal-Up-37mm	100	QPSK 135_69	656000/3840	100%	0.278	0.14	25.73	27.00	1.340	0.372	22.6
Horizontal-Down-24mm	100	QPSK 135_69	656000/3840	100%	0.224	-0.19	25.73	27.00	1.340	0.300	22.6
Vertical-Front-35mm	100	QPSK 135_69	656000/3840	100%	0.539	-0.02	25.73	27.00	1.340	0.722	22.6
Vertical-Back-24mm	100	QPSK 135_69	656000/3840	100%	0.128	-0.14	25.73	27.00	1.340	0.171	22.6
Tip Mode-24mm	100	QPSK 135_69	656000/3840	100%	0.291	-0.06	25.73	27.00	1.340	0.390	22.6

Test Position	Test ch./Freq.	Measured SAR (W/kg)	1 st Repeated	Ratio	2 nd Repeated	3 rd Repeated
Horizontal-Up 5mm	656000/3840	0.888	0.879	1.010	N/A	N/A
Note: 1) When the original highest measured SAR is ≥ 0.80 W/kg, the measurement was repeated once.						
2) A second repeated measurement was performed only if the ratio of largest to smallest SAR for the original and first repeated measurements was > 1.20 or when the original or repeated measurement was ≥ 1.45 W/kg ($\sim 10\%$ from the 1-g SAR limit).						
3) A third repeated measurement was performed only if the original, first or second repeated measurement was ≥ 1.5 W/kg and the ratio of largest to smallest SAR for the original, first and second repeated measurements is > 1.20 .						
4) Repeated measurements are not required when the original highest measured SAR is < 0.80 W/kg						
5) The same procedures should be adapted for measurements according to extremity and occupational exposure limits by applying a factor of 2.5 for extremity exposure and a factor of 5 for occupational exposure to the corresponding SAR thresholds. The repeated measurement results must be clearly identified in the SAR report.						

8.4 LTE Band 41 Power Class 2 and Power Class 3 Linearity

This device supports Power Class 2 and Power Class 3 operations for LTE Band 41. The highest available duty cycle for Power Class 2 operations is 50 % using UL-DL configuration 1. Per May 2017 TCB Workshop Notes based on the device behavior, all SAR tests were performed using Power Class 3. SAR with Power Class 2 at the highest power and available duty factor was additionally performed for the Power Class 3 configuration with the highest SAR for each exposure condition. The linearity between the Power Class 2 and Power Class 3 SAR results and the respective frame averaged powers was calculated to determine that the results were linear.

Per May 2017 TCB Workshop, no additional SAR measurements were required since the linearity between power classes was < 10% and all reported SAR values were < 1.4 W/kg for 1g and < 3.5 W/kg for 10g.

LTE Band 41 SAR testing with power class 2 at the highest power and available duty factor was additionally performed for the power class 3 configuration with the highest SAR for each exposure condition.

LTE Band 41 Ant 0 Sensor off		
	LTE Band 41 (Power Class 3)	LTE Band 41 (Power Class 2)
Maximum Tune up Power (dBm)	25.00	27.00
Reported 1g SAR (W/kg)	0.105	0.107
Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	200.17	217.01
Linearity SAR (W/kg)	0.114	
% deviation from expected linearity		-6.00%

LTE Band 41 Ant 0 Sensor on		
	LTE Band 41 (Power Class 3)	LTE Band 41 (Power Class 2)
Maximum Tune up Power (dBm)	12.00	12.00
Reported 1g SAR (W/kg)	0.607	0.429
Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	10.03	6.86
Linearity SAR (W/kg)	0.415	
% deviation from expected linearity		3.32%

8.5 NR MIMO SAR Summation Scenario

Test position		SARmax (W/kg)						Summed SAR		
		N41 ANT0	N41 ANT2	N48 ANT0	N48 ANT2	N77(78) ANT0	N77(78) ANT2			
		1	2	3	4	5	6	1+2	3+4	5+6
MIMO	Horizontal-Up	1.191	0.400	1.109	0.429	1.098	0.475	1.591	1.538	1.573
	Horizontal-Down	0.530	0.293	0.222	0.200	1.051	0.365	0.823	0.422	1.416
	Vertical-Front	0.432	0.734	0.116	0.797	0.201	0.777	1.166	0.913	0.978
	Vertical-Back	0.283	0.185	0.119	0.094	0.950	0.396	0.468	0.213	1.346
	Tip Mode	0.542	0.389	0.591	0.136	1.014	0.512	0.931	0.727	1.526

8.6 ENDC SAR Summation Scenario

Body:

LTE Band (EN_DC)	Exposure position	Ant0	n41 Ant2	EN_DC Summed SAR
		1	2	
Band 12	Horizontal-Up	0.378	0.400	0.778
	Horizontal-Down	0.140	0.293	0.433
	Vertical-Front	0.240	0.734	0.974
	Vertical-Back	0.190	0.185	0.375
	Tip Mode	0.116	0.389	0.505
Band 25	Horizontal-Up	0.769	0.400	1.169
	Horizontal-Down	0.194	0.293	0.487
	Vertical-Front	0.047	0.734	0.781
	Vertical-Back	0.262	0.185	0.447
	Tip Mode	0.535	0.389	0.924
Band 26	Horizontal-Up	0.698	0.400	1.098
	Horizontal-Down	0.384	0.293	0.677
	Vertical-Front	0.395	0.734	1.129
	Vertical-Back	0.414	0.185	0.599
	Tip Mode	0.293	0.389	0.682
Band 2	Horizontal-Up	0.769	0.400	1.169
	Horizontal-Down	0.194	0.293	0.487
	Vertical-Front	0.047	0.734	0.781
	Vertical-Back	0.262	0.185	0.447
	Tip Mode	0.535	0.389	0.924
Band 4	Horizontal-Up	0.369	0.400	0.769
	Horizontal-Down	0.220	0.293	0.513
	Vertical-Front	0.099	0.734	0.833
	Vertical-Back	0.196	0.185	0.381
	Tip Mode	0.525	0.389	0.914
Band 5	Horizontal-Up	0.698	0.400	1.098
	Horizontal-Down	0.384	0.293	0.677
	Vertical-Front	0.395	0.734	1.129
	Vertical-Back	0.414	0.185	0.599
	Tip Mode	0.293	0.389	0.682
Band 66	Horizontal-Up	0.369	0.400	0.769
	Horizontal-Down	0.220	0.293	0.513
	Vertical-Front	0.099	0.734	0.833
	Vertical-Back	0.196	0.185	0.381
	Tip Mode	0.525	0.389	0.914
Band 71	Horizontal-Up	0.604	0.400	1.004
	Horizontal-Down	0.306	0.293	0.599
	Vertical-Front	0.385	0.734	1.119
	Vertical-Back	0.329	0.185	0.514
	Tip Mode	0.265	0.389	0.654

LTE Band (EN_DC)	Exposure position	Ant0	n77	EN_DC Summed SAR
			Ant2	
		1	2	1+2
Band 12	Horizontal-Up	0.378	0.475	0.853
	Horizontal-Down	0.140	0.365	0.505
	Vertical-Front	0.240	0.777	1.017
	Vertical-Back	0.190	0.396	0.586
	Tip Mode	0.116	0.512	0.628
Band 13	Horizontal-Up	0.368	0.475	0.843
	Horizontal-Down	0.287	0.365	0.652
	Vertical-Front	0.245	0.777	1.022
	Vertical-Back	0.297	0.396	0.693
	Tip Mode	0.175	0.512	0.687
Band 14	Horizontal-Up	0.732	0.475	1.207
	Horizontal-Down	0.550	0.365	0.915
	Vertical-Front	0.601	0.777	1.378
	Vertical-Back	0.544	0.396	0.940
	Tip Mode	0.354	0.512	0.866
Band 25	Horizontal-Up	0.769	0.475	1.244
	Horizontal-Down	0.194	0.365	0.559
	Vertical-Front	0.047	0.777	0.824
	Vertical-Back	0.262	0.396	0.658
	Tip Mode	0.535	0.512	1.047
Band 2	Horizontal-Up	0.769	0.475	1.244
	Horizontal-Down	0.194	0.365	0.559
	Vertical-Front	0.047	0.777	0.824
	Vertical-Back	0.262	0.396	0.658
	Tip Mode	0.535	0.512	1.047
Band 30	Horizontal-Up	0.793	0.475	1.268
	Horizontal-Down	0.141	0.365	0.506
	Vertical-Front	0.137	0.777	0.914
	Vertical-Back	0.226	0.396	0.622
	Tip Mode	0.505	0.512	1.017
Band 41	Horizontal-Up	0.789	0.475	1.264
	Horizontal-Down	0.133	0.365	0.498
	Vertical-Front	0.182	0.777	0.959
	Vertical-Back	0.100	0.396	0.496
	Tip Mode	0.189	0.512	0.701
Band 5	Horizontal-Up	0.698	0.475	1.173
	Horizontal-Down	0.384	0.365	0.749
	Vertical-Front	0.395	0.777	1.172
	Vertical-Back	0.414	0.396	0.810
	Tip Mode	0.293	0.512	0.805
Band 66	Horizontal-Up	0.369	0.475	0.844
	Horizontal-Down	0.220	0.365	0.585
	Vertical-Front	0.099	0.777	0.876
	Vertical-Back	0.196	0.396	0.592
	Tip Mode	0.525	0.512	1.037
Band 71	Horizontal-Up	0.604	0.475	1.079
	Horizontal-Down	0.306	0.365	0.671
	Vertical-Front	0.385	0.777	1.162

Band 7	Vertical-Back	0.329	0.396	0.725
	Tip Mode	0.265	0.512	0.777
	Horizontal-Up	0.767	0.475	1.242
	Horizontal-Down	0.294	0.365	0.659
	Vertical-Front	0.340	0.777	1.117
	Vertical-Back	0.199	0.396	0.595
	Tip Mode	0.447	0.512	0.959

LTE Band (EN_DC)	Exposure position	Ant0	n48	EN_DC Summed SAR
		1	Ant2	
			2	
Band 13	Horizontal-Up	0.368	0.429	0.797
	Horizontal-Down	0.287	0.200	0.487
	Vertical-Front	0.245	0.797	1.042
	Vertical-Back	0.297	0.094	0.391
	Tip Mode	0.175	0.136	0.311
Band 2	Horizontal-Up	0.769	0.429	1.198
	Horizontal-Down	0.194	0.200	0.394
	Vertical-Front	0.047	0.797	0.844
	Vertical-Back	0.262	0.094	0.356
	Tip Mode	0.535	0.136	0.671
Band 5	Horizontal-Up	0.698	0.429	1.127
	Horizontal-Down	0.384	0.200	0.584
	Vertical-Front	0.395	0.797	1.192
	Vertical-Back	0.414	0.094	0.508
	Tip Mode	0.293	0.136	0.429
Band 66	Horizontal-Up	0.369	0.429	0.798
	Horizontal-Down	0.220	0.200	0.420
	Vertical-Front	0.099	0.797	0.896
	Vertical-Back	0.196	0.094	0.290
	Tip Mode	0.525	0.136	0.661

LTE Band (EN_DC)	Exposure position	Ant2	n12	n25	n5	n66	n71	EN_DC Summed SAR	EN_DC Summed SAR	EN_DC Summed SAR	EN_DC Summed SAR	EN_DC Summed SAR
		1	Ant0	Ant0	Ant0	Ant0	Ant0	1+2	1+3	1+4	1+5	1+6
			2	3	4	5	6					
Band 48	Horizontal-Up	0.525	0.798	0.778	0.311	0.631	0.448	1.323	1.303	0.836	1.156	0.973
	Horizontal-Down	0.176	0.360	0.226	0.418	0.336	0.205	0.536	0.402	0.594	0.512	0.381
	Vertical-Front	0.775	0.394	0.067	0.352	0.155	0.226	1.169	0.842	1.127	0.930	1.001
	Vertical-Back	0.043	0.360	0.237	0.384	0.268	0.190	0.403	0.280	0.427	0.311	0.233
	Tip Mode	0.087	0.221	0.665	0.261	0.797	0.148	0.308	0.752	0.348	0.884	0.235

LTE Band (EN_DC)	Exposure position	Ant0	n78	EN_DC Summed SAR
		1	Ant2	
			2	
Band 7	Horizontal-Up	0.767	0.475	1.242
	Horizontal-Down	0.294	0.365	0.659
	Vertical-Front	0.340	0.777	1.117
	Vertical-Back	0.199	0.396	0.595
	Tip Mode	0.447	0.512	0.959

9 Equipment list

Test Platform		SPEAG DASY5 Professional				
Description		SAR Test System				
Software Reference		DASY52 52.10.4(1527); SEMCAD X 14.6.14(7483)				
Hardware Reference						
Equipment		Manufacturer	Model	Serial Number	Calibration Date	Due date of calibration
☒	Twin Phantom	SPEAG	SAM7	1702	NCR	NCR
☒	DAE	SPEAG	DAE4	1740	2025-02-17	2026-02-16
☒	E-Field Probe	SPEAG	EX3DV4	3923	2024-11-04	2025-11-03
☒	Validation Kits	SPEAG	D750V3	1214	2025-04-01	2028-03-31
☒	Validation Kits	SPEAG	D835V2	4d161	2023-08-25	2026-08-24
☒	Validation Kits	SPEAG	D1750V2	1105	2023-11-03	2026-11-02
☒	Validation Kits	SPEAG	D1950V3	1218	2023-05-04	2026-05-03
☒	Validation Kits	SPEAG	D2300V2	1096	2025-04-01	2028-03-31
☒	Validation Kits	SPEAG	D2600V2	1158	2025-03-31	2028-03-30
☒	Validation Kits	SPEAG	D3500V2	1133	2025-04-02	2028-04-01
☒	Validation Kits	SPEAG	D3700V2	1108	2025-04-01	2028-03-31
☒	Validation Kits	SPEAG	D3900V2	1083	2025-03-31	2028-03-30
☒	Dielectric parameter probes	SPEAG	DAK-3.5	1333	2024-11-18	2025-11-17
☒	Agilent Network Analyzer	Agilent	E5071C	MY46523590	2024-12-19	2025-12-18
☒	Universal Radio Communication Tester	R&S	CMW500	111637	2025-09-03	2026-09-02
☒	RF Bi-Directional Coupler	Agilent	86205-60001	MY31400031	NCR	NCR
☒	Signal Generator	R&S	SMB100A	182393	2025-02-05	2026-02-04
☒	Preamplifier	Qiji	YX28980933	202104001	NCR	NCR
☒	USB Average Power Sensor	Keysight	U2002H	MY5639004	2024-09-10 2025-09-10	2025-09-09 2026-09-09
☒	USB Average Power Sensor	Agilent	U2002H	MY48200110	2024-11-21	2025-11-20
☒	Attenuator	SHX	TS2-3dB	30704	NCR	NCR
☒	Coaxial low pass filter	Mini-Circuits	VLF-2500(+)	NA	NCR	NCR
☒	Coaxial low pass filter	Microlab Fxr	LA-F13	NA	NCR	NCR
☒	DC POWER SUPPLY	SAKO	SK1730SL5A	NA	NCR	NCR
☒	Speed reading thermometer	LKM	DTM3000	NA	2024-09-16 2025-09-16	2025-09-15 2026-09-15
☒	Humidity and Temperature Indicator	MingGao	MingGao	NA	2024-09-16 2025-09-16	2025-09-15 2026-09-15

Note: All the equipment are within the valid period when the tests are performed.



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10 Calibration certificate

Please see the Appendix C

11 Photographs

Please see the Appendix D

Appendix A: Detailed System Check Results

Appendix B: Detailed Test Results

Appendix C: Calibration certificate

Appendix D: Photographs

Appendix E: Conducted RF Output Power

--- End of report ---