#### Calibration Laboratory of Schmid & Partner Engineering AG Zeughausstrasse 43, 8004 Zurich, Switzerland



Schweizerischer Kalibrierdienst Service suisse d'étalonnage

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S Swiss Calibration Service

Accreditation No.: SCS 0108

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Client PC Test

Certificate No: D5GHzV2-1057\_Jan18

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Objeci	D5GHzV2 - SN:1	057	
Calibration procedure(s)	QA CAL-22.v2 Calibration proce	dure for dipole validation kits be	tween 3-6 GHz
			RNI
Calibration date:	January 16, 2018	3	BN 01-25-2018
This calibration certificate docum	enis the traceability to nati	ional standards, which realize the physical u	
The measurements and the unce	rtaintles with confidence p	robability are given on the following pages a	and are part of the certificate. $02/06/2$
All calibrations have been conduc	ted in the closed laborato	ry facility: environment lemperature (22 ± 3)	nils of measurements (SI). Ind are part of the certificate. PC and humidity < 70%. C([]]
		y isolary: chartonniant temperature (22 ± 3)	BIX BIX
Calibration Equipment used (M&)	re critical for calibration)		OUR
Primery Standards		Cal Date (Certificate No.)	Scheduled Calibration
Power meter NRP	SN: 104778	04-Apr-17 (No. 217-02521/02522)	Apr-18
Power sensor NRP-Z91	SN: 103244	04-Apr-17 (No. 217-02521)	Apr-16
Power sensor NRP-Z91	SN: 103245	04-Apr-17 (No. 217-02522)	Apr-18
Reference 20 dB Atlenuator	SN: 5058 (20k)	07-Apr-17 (No. 217-02528)	Apr-18
Type-N mismatch combination	SN: 5047.2 / 06327	07-Apr-17 (No. 217-02529)	Apr-18
Reference Probe EX3DV4	SN: 3503	30-Dec-17 (No. EX3-3503_Dec17)	Dec-18
DAE4	SN: 601	26-Oct-17 (No. DAE4-601_Oct17)	Oct-18
Concerdent: Stepdards			
Secondary Standards Power meter EPM-442A		Check Date (in house)	Scheduled Check
Power meter EPM-442A Power sensor HP 8481A	SN: GB37480704	07-Oct-15 (In house check Oct-16)	in house check: Oct-18
	SN: US37292783	07-Oct-15 (in house check Oct-16)	In house check: Oct-18
Power sensor HP 8481A	SN: MY41092317	07-Oct-15 (in house check Oct-16)	In house check: Oct-18
RF generator R&S SMT-06	SN: 100972	15-Jun-15 (in house check Oct-16)	In house check: Oct-18
Network Analyzer HP 8753E	SN: US37390585	18-Oct-01 (in house check Oct-17)	In house check: Oct-18
• •	Name	Function	Signature
Calibrated by:	Leif Klysner	Laboratory Technician	Leftly -
	Katia Pokovic	Technical Manager	
Approved by:	haija Pokovio		6645

Certificate No: D5GHzV2-1057\_Jan18

# **Calibration Laboratory of**

Schmid & Partner **Engineering AG** Zeughausstrasse 43, 8004 Zurich, Switzerland





Schweizerischer Kalibrierdienst

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## **Glossarv:**

TSL	tissue simulating liquid
ConvF	sensitivity in TSL / NORM x,y,z
N/A	not applicable or not measured

# **Calibration is Performed According to the Following Standards:**

- a) IEEE Std 1528-2013, "IEEE Recommended Practice for Determining the Peak Spatial-Averaged Specific Absorption Rate (SAR) in the Human Head from Wireless Communications Devices: Measurement Techniques", June 2013
- b) IEC 62209-1, "Measurement procedure for the assessment of Specific Absorption Rate (SAR) from hand-held and body-mounted devices used next to the ear (frequency range of 300 MHz to 6 GHz)", July 2016
- c) IEC 62209-2, "Procedure to determine the Specific Absorption Rate (SAR) for wireless communication devices used in close proximity to the human body (frequency range of 30 MHz to 6 GHz)", March 2010
- d) KDB 865664, "SAR Measurement Requirements for 100 MHz to 6 GHz"

# **Additional Documentation:**

e) DASY4/5 System Handbook

# Methods Applied and Interpretation of Parameters:

- Measurement Conditions: Further details are available from the Validation Report at the end of the certificate. All figures stated in the certificate are valid at the frequency indicated.
- Antenna Parameters with TSL: The dipole is mounted with the spacer to position its feed point exactly below the center marking of the flat phantom section, with the arms oriented parallel to the body axis.
- Feed Point Impedance and Return Loss: These parameters are measured with the dipole positioned under the liquid filled phantom. The impedance stated is transformed from the measurement at the SMA connector to the feed point. The Return Loss ensures low reflected power. No uncertainty required.
- Electrical Delay: One-way delay between the SMA connector and the antenna feed point. No uncertainty required.
- SAR measured: SAR measured at the stated antenna input power.
- SAR normalized: SAR as measured, normalized to an input power of 1 W at the antenna connector.
- SAR for nominal TSL parameters: The measured TSL parameters are used to calculate the nominal SAR result.

The reported uncertainty of measurement is stated as the standard uncertainty of measurement multiplied by the coverage factor k=2, which for a normal distribution corresponds to a coverage probability of approximately 95%.

Accreditation No.: SCS 0108

## **Measurement Conditions**

DASY system configuration, as far as not given on page 1.

DASY Version	DASY5	V52.10.0
Extrapolation	Advanced Extrapolation	
Phantom	Modular Flat Phantom V5.0	
Distance Dipole Center - TSL	10 mm	with Spacer
Zoom Scan Resolution	dx, dy = $4.0$ mm, dz = $1.4$ mm	Graded Ratio = 1.4 (Z direction)
Frequency	5200 MHz ± 1 MHz 5250 MHz ± 1 MHz 5600 MHz ± 1 MHz 5750 MHz ± 1 MHz 5800 MHz ± 1 MHz	

Head TSL parameters at 5250 MHz The following parameters and calculations were applied.

	Temperature	Permittivity	Conductivity
Nominal Head TSL parameters	22.0 °C	35.9	4.71 mho/m
Measured Head TSL parameters	(22.0 ± 0.2) °C	36.2 ± 6 %	4.55 mho/m ± 6 %
Head TSL temperature change during test	< 0.5 °C		

# SAR result with Head TSL at 5250 MHz

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	7.91 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	79.2 W/kg ± 19.9 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR measured	100 mW input power	2.28 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	22.8 W/kg ± 19.5 % (k=2)

Head TSL parameters at 5600 MHz The following parameters and calculations were applied.

	Temperature	Permittivity	Conductivity
Nominal Head TSL parameters	22.0 °C	35.5	5.07 mho/m
Measured Head TSL parameters	(22.0 ± 0.2) °C	35.8 ± 6 %	4.90 mho/m ± 6 %
Head TSL temperature change during test	< 0.5 °C		

## SAR result with Head TSL at 5600 MHz

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	8.41 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	84.1 W/kg ± 19.9 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR measured	100 mW input power	2.40 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	24.0 W/kg ± 19.5 % (k=2)

Head TSL parameters at 5750 MHz The following parameters and calculations were applied.

	Temperature	Permittivity	Conductivity
Nominal Head TSL parameters	22.0 °C	35.4	5.22 mho/m
Measured Head TSL parameters	(22.0 ± 0.2) °C	35.5 ± 6 %	5.06 mho/m ± 6 %
Head TSL temperature change during test	< 0.5 °C		

# SAR result with Head TSL at 5750 MHz

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	8.06 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	80.5 W/kg ± 19.9 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR measured	100 mW input power	2.30 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	23.0 W/kg ± 19.5 % (k=2)

#### Body TSL parameters at 5200 MHz

The following parameters and calculations were applied.

	Temperature	Permittivity	Conductivity
Nominal Body TSL parameters	22.0 °C	49.0	5.30 mho/m
Measured Body TSL parameters	(22.0 ± 0.2) °C	47.3 ± 6 %	5.41 mho/m ± 6 %
Body TSL temperature change during test	< 0.5 °C		

### SAR result with Body TSL at 5200 MHz

SAR averaged over 1 cm <sup>3</sup> (1 g) of Body TSL	Condition	
SAR measured	100 mW input power	7.36 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	73.1 W/kg ± 19.9 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Body TSL	condition	
SAR measured	100 mW input power	2.06 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	20.4 W/kg ± 19.5 % (k=2)

#### Body TSL parameters at 5250 MHz

The following parameters and calculations were applied.

	Temperature	Permittivity	Conductivity
Nominal Body TSL parameters	22.0 °C	48.9	5.36 mho/m
Measured Body TSL parameters	(22.0 ± 0.2) °C	47.2 ± 6 %	5.48 mho/m ± 6 %
Body TSL temperature change during test	< 0.5 °C		

## SAR result with Body TSL at 5250 MHz

SAR averaged over 1 cm <sup>3</sup> (1 g) of Body TSL	Condition	
SAR measured	100 mW input power	7.64 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	75.9 W/kg ± 19.9 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Body TSL	condition	
SAR measured	100 mW input power	2.13 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	21.1 W/kg ± 19.5 % (k=2)

Body TSL parameters at 5600 MHz The following parameters and calculations were applied.

	Temperature	Permittivity	Conductivity
Nominal Body TSL parameters	22.0 °C	48.5	5.77 mho/m
Measured Body TSL parameters	(22.0 ± 0.2) °C	46.6 ± 6 %	5.94 mho/m ± 6 %
Body TSL temperature change during test	< 0.5 °C		

# SAR result with Body TSL at 5600 MHz

SAR averaged over 1 cm <sup>3</sup> (1 g) of Body TSL	Condition	
SAR measured	100 mW input power	8.05 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	79.9 W/kg ± 19.9 % (k=2)
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SAR averaged over 10 cm <sup>3</sup> (10 g) of Body TSL	condition	
SAR measured	100 mW input power	2.25 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	22.3 W/kg ± 19.5 % (k=2)

## Body TSL parameters at 5750 MHz

The following parameters and calculations were applied.

	Temperature	Permittivity	Conductivity
Nominal Body TSL parameters	22.0 °C	48.3	5.94 mho/m
Measured Body TSL parameters	(22.0 ± 0.2) °C	46.3 ± 6 %	6.15 mho/m ± 6 %
Body TSL temperature change during test	< 0.5 °C		

## SAR result with Body TSL at 5750 MHz

SAR averaged over 1 cm <sup>3</sup> (1 g) of Body TSL	Condition	
SAR measured	100 mW input power	7.72 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	76.7 W/kg ± 19.9 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Body TSL	condition	
SAR measured	100 mW input power	2.14 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	21.2 W/kg ± 19.5 % (k=2)

Body TSL parameters at 5800 MHz The following parameters and calculations were applied.

	Temperature	Permittivity	Conductivity
Nominal Body TSL parameters	22.0 °C	48.2	6.00 mho/m
Measured Body TSL parameters	(22.0 ± 0.2) °C	46.2 ± 6 %	6.22 mho/m ± 6 %
Body TSL temperature change during test	< 0.5 °C		

## SAR result with Body TSL at 5800 MHz

SAR averaged over 1 cm <sup>3</sup> (1 g) of Body TSL	Condition	
SAR measured	100 mW input power	7.68 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	76.3 W/kg ± 19.9 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Body TSL	condition	
SAR measured	100 mW input power	2.13 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	21.1 W/kg ± 19.5 % (k=2)

## Appendix (Additional assessments outside the scope of SCS 0108)

### Antenna Parameters with Head TSL at 5250 MHz

Impedance, transformed to feed point	50.0 Ω - 5.5 jΩ
Return Loss	- 25.2 dB

#### Antenna Parameters with Head TSL at 5600 MHz

Impedance, transformed to feed point	54.7 Ω - 2.1 jΩ
Return Loss	- 26.2 dB

#### Antenna Parameters with Head TSL at 5750 MHz

Impedance, transformed to feed point	52.7 Ω + 0.0 jΩ
Return Loss	- 31.5 dB

#### Antenna Parameters with Body TSL at 5200 MHz

Impedance, transformed to feed point	49.3 Ω - 6.7 jΩ
Return Loss	- 23.4 dB

#### Antenna Parameters with Body TSL at 5250 MHz

Impedance, transformed to feed point	48.4 Ω - 3.9 jΩ
Return Loss	- 27.4 dB

#### Antenna Parameters with Body TSL at 5600 MHz

Impedance, transformed to feed point	55.3 Ω - 1.6 jΩ
Return Loss	- 25.6 dB

#### Antenna Parameters with Body TSL at 5750 MHz

Impedance, transformed to feed point	52.6 Ω + 1.1 jΩ
Return Loss	- 31.2 dB

#### Antenna Parameters with Body TSL at 5800 MHz

Impedance, transformed to feed point	51.8 Ω - 0.4 jΩ
Return Loss	- 34.9 dB

### **General Antenna Parameters and Design**

Electrical Delay (one direction) 1.203 ns
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After long term use with 100W radiated power, only a slight warming of the dipole near the feedpoint can be measured.

The dipole is made of standard semirigid coaxial cable. The center conductor of the feeding line is directly connected to the second arm of the dipole. The antenna is therefore short-circuited for DC-signals. On some of the dipoles, small end caps are added to the dipole arms in order to improve matching when loaded according to the position as explained in the "Measurement Conditions" paragraph. The SAR data are not affected by this change. The overall dipole length is still according to the Standard.

No excessive force must be applied to the dipole arms, because they might bend or the soldered connections near the feedpoint may be damaged.

### **Additional EUT Data**

Manufactured by	SPEAG
Manufactured on	November 27, 2006

# Appendix (Additional assessments outside the scope of SCS 0108)

### Measurement Conditions (f=5200 MHz)

DASY system configuration, as far as not given on page 1 and 3.

Phantom	SAM Head Phantom	For usage with cSAR3DV2-R/L
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## SAR result with SAM Head (Top)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	8.24 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	82.6 W/kg ± 20.3 % (k=2)
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SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL SAR measured	condition 100 mW input power	2.35 W/kg

### SAR result with SAM Head (Mouth)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	8.54 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	85.6 W/kg ± 20.3 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR measured	100 mW input power	2.37 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	23.7 W/kg ± 19.9 % (k=2)

# SAR result with SAM Head (Neck)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	8.14 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	81.6 W/kg ± 20.3 % (k=2)
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR measured	100 mW input power	2.37 W/kg

#### SAR result with SAM Head (Ear)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	5.16 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	51.7 W/kg ± 20.3 % (k=2)
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR averaged over 10 cm <sup>o</sup> (10 g) of Head TSL SAR measured	100 mW input power	1.76 W/kg

## Measurement Conditions (f=5800 MHz)

DASY system configuration, as far as not given on page 1 and 3.

Phantom	SAM Head Phantom	For usage with cSAR3DV2-R/L
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# SAR result with SAM Head (Top)

SAR averaged over 1 cm³ (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	8.62 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	86.3 W/kg ± 20.3 % (k=2)
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR measured	100 mW input power	2.41 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	

#### SAR result with SAM Head (Mouth)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	8.88 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	88.9 W/kg ± 20.3 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR measured	100 mW input power	2.44 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	24.4 W/kg ± 19.9 % (k=2)

## SAR result with SAM Head (Neck)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	8.33 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	83.4 W/kg ± 20.3 % (k=2)
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CAD every and ever 10 em <sup>3</sup> (10 m) of Head Tel	aandition	

SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR measured	100 mW input power	2.35 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	23.5 W/kg ± 19.9 % (k=2)

# SAR result with SAM Head (Ear)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	100 mW input power	5.68 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	56.8 W/kg ± 20.3 % (k=2)
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR averaged over 10 cm <sup>o</sup> (10 g) of Head TSL SAR measured	100 mW input power	1.89 W/kg

## **DASY5 Validation Report for Head TSL**

Date: 11.01.2018

Test Laboratory: SPEAG, Zurich, Switzerland

#### DUT: Dipole D5GHzV2; Type: D5GHzV2; Serial: D5GHzV2 - SN:1057

Communication System: UID 0 - CW; Frequency: 5250 MHz, Frequency: 5600 MHz, Frequency: 5750 MHz Medium parameters used: f = 5250 MHz;  $\sigma = 4.55$  S/m;  $\varepsilon_r = 36.2$ ;  $\rho = 1000$  kg/m<sup>3</sup>, Medium parameters used: f = 5600 MHz;  $\sigma = 4.9$  S/m;  $\varepsilon_r = 35.8$ ;  $\rho = 1000$  kg/m<sup>3</sup>, Medium parameters used: f = 5750 MHz;  $\sigma = 5.06$  S/m;  $\varepsilon_r = 35.5$ ;  $\rho = 1000$  kg/m<sup>3</sup> Phantom section: Flat Section Measurement Standard: DASY5 (IEEE/IEC/ANSI C63.19-2011)

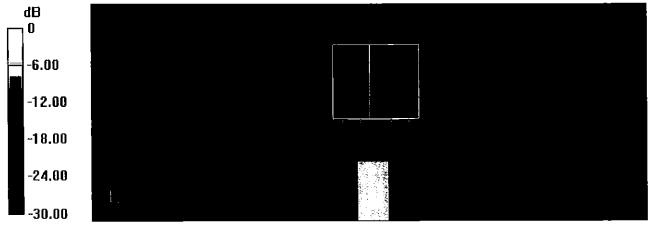
#### DASY52 Configuration:

- Probe: EX3DV4 SN3503; ConvF(5.51, 5.51, 5.51); Calibrated: 30.12.2017, ConvF(5.05, 5.05, 5.05); Calibrated: 30.12.2017, ConvF(4.98, 4.98, 4.98); Calibrated: 30.12.2017;
- Sensor-Surface: 1.4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn601 modified; Calibrated: 26.10.2017
- Phantom: Flat Phantom 5.0 (front); Type: QD 000 P50 AA; Serial: 1001
- DASY52 52.10.0(1446); SEMCAD X 14.6.10(7417)

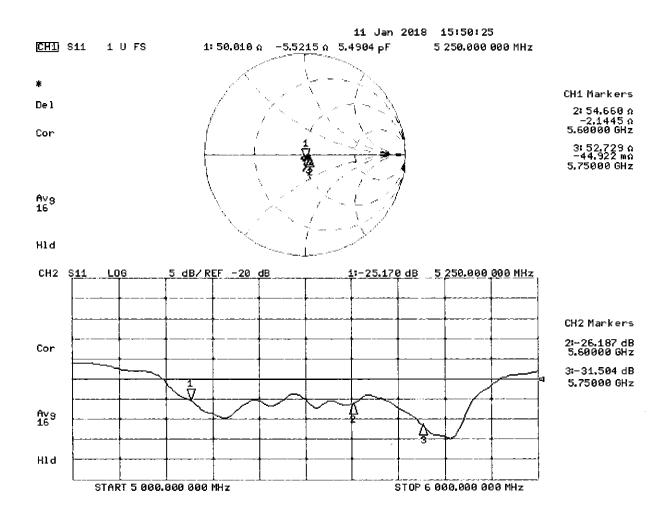
Dipole Calibration for Head Tissue/Pin=100mW, dist=10mm, f=5250 MHz/Zoom Scan, dist=1.4mm (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 72.54 V/m; Power Drift = -0.02 dB Peak SAR (extrapolated) = 27.5 W/kg SAR(1 g) = 7.91 W/kg; SAR(10 g) = 2.28 W/kg Maximum value of SAR (measured) = 17.7 W/kg

Dipole Calibration for Head Tissue/Pin=100mW, dist=10mm, f=5600 MHz/Zoom Scan, dist=1.4mm (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 72.77 V/m; Power Drift = -0.07 dB Peak SAR (extrapolated) = 32.2 W/kg SAR(1 g) = 8.41 W/kg; SAR(10 g) = 2.4 W/kg Maximum value of SAR (measured) = 19.7 W/kg

Dipole Calibration for Head Tissue/Pin=100mW, dist=10mm, f=5750 MHz/Zoom Scan, dist=1.4mm (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 70.93 V/m; Power Drift = -0.09 dB Peak SAR (extrapolated) = 31.4 W/kg SAR(1 g) = 8.06 W/kg; SAR(10 g) = 2.3 W/kg Maximum value of SAR (measured) = 18.9 W/kg



0 dB = 18.9 W/kg = 12.76 dBW/kg



## **DASY5 Validation Report for Body TSL**

Date: 10.01.2018

Test Laboratory: SPEAG, Zurich, Switzerland

## DUT: Dipole D5GHzV2; Type: D5GHzV2; Serial: D5GHzV2 - SN:1057

Communication System: UID 0 - CW; Frequency: 5200 MHz, Frequency: 5250 MHz, Frequency: 5600 MHz, Frequency: 5750 MHz, Frequency: 5800 MHz Medium parameters used: f = 5200 MHz;  $\sigma = 5.41$  S/m;  $\varepsilon_r = 47.3$ ;  $\rho = 1000$  kg/m<sup>3</sup>, Medium parameters used: f = 5250 MHz;  $\sigma = 5.48$  S/m;  $\varepsilon_r = 47.2$ ;  $\rho = 1000$  kg/m<sup>3</sup>, Medium parameters used: f = 5600 MHz;  $\sigma = 5.94$  S/m;  $\varepsilon_r = 46.6$ ;  $\rho = 1000$  kg/m<sup>3</sup>, Medium parameters used: f = 5750 MHz;  $\sigma = 6.15$  S/m;  $\varepsilon_r = 46.3$ ;  $\rho = 1000$  kg/m<sup>3</sup>, Medium parameters used: f = 5800 MHz;  $\sigma = 6.22$  S/m;  $\varepsilon_r = 46.2$ ;  $\rho = 1000$  kg/m<sup>3</sup> Medium parameters used: f = 5800 MHz;  $\sigma = 6.22$  S/m;  $\varepsilon_r = 46.2$ ;  $\rho = 1000$  kg/m<sup>3</sup>

DASY52 Configuration:

- Probe: EX3DV4 SN3503; ConvF(5.35, 5.35, 5.35); Calibrated: 30.12.2017, ConvF(5.26, 5.26, 5.26); Calibrated: 30.12.2017, ConvF(4.65, 4.65, 4.65); Calibrated: 30.12.2017, ConvF(4.57, 4.57, 4.57); Calibrated: 30.12.2017, ConvF(4.53, 4.53, 4.53); Calibrated: 30.12.2017;
- Sensor-Surface: 1.4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn601; Calibrated: 26.10.2017
- Phantom: Flat Phantom 5.0 (back); Type: QD 000 P50 AA; Serial: 1002
- DASY52 52.10.0(1446); SEMCAD X 14.6.10(7417)

Dipole Calibration for Body Tissue/Pin=100mW, dist=10mm, f=5200 MHz/Zoom Scan, dist=1.4mm (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 64.05 V/m; Power Drift = -0.03 dB Peak SAR (extrapolated) = 27.6 W/kg SAR(1 g) = 7.36 W/kg; SAR(10 g) = 2.06 W/kg Maximum value of SAR (measured) = 17.1 W/kg

Dipole Calibration for Body Tissue/Pin=100mW, dist=10mm, f=5250 MHz/Zoom Scan, dist=1.4mm (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 64.53 V/m; Power Drift = -0.02 dB Peak SAR (extrapolated) = 29.4 W/kg SAR(1 g) = 7.64 W/kg; SAR(10 g) = 2.13 W/kg Maximum value of SAR (measured) = 17.9 W/kg

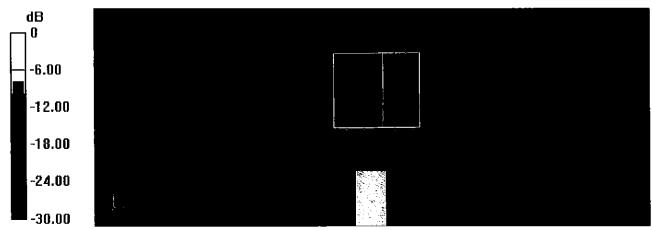
# Dipole Calibration for Body Tissue/Pin=100mW, dist=10mm, f=5600 MHz/Zoom Scan,

dist=1.4mm (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 65.09 V/m; Power Drift = -0.08 dB Peak SAR (extrapolated) = 34.0 W/kg SAR(1 g) = 8.05 W/kg; SAR(10 g) = 2.25 W/kg Maximum value of SAR (measured) = 19.5 W/kg

# Dipole Calibration for Body Tissue/Pin=100mW, dist=10mm, f=5750 MHz/Zoom Scan,

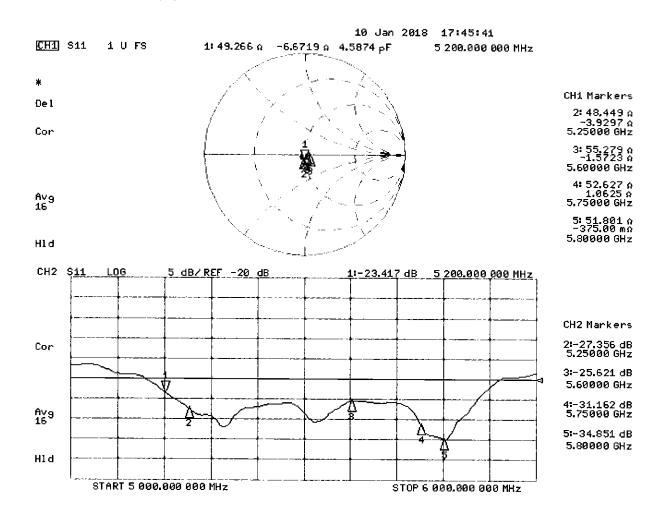
dist=1.4mm (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 63.45 V/m; Power Drift = -0.06 dB Peak SAR (extrapolated) = 32.9 W/kg SAR(1 g) = 7.72 W/kg; SAR(10 g) = 2.14 W/kg Maximum value of SAR (measured) = 18.9 W/kg

Dipole Calibration for Body Tissue/Pin=100mW, dist=10mm, f=5800 MHz/Zoom Scan, dist=1.4mm (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 63.14 V/m; Power Drift = -0.08 dB Peak SAR (extrapolated) = 33.3 W/kg SAR(1 g) = 7.68 W/kg; SAR(10 g) = 2.13 W/kg



0 dB = 18.9 W/kg = 12.76 dBW/kg

# Impedance Measurement Plot for Body TSL



### DASY5 Validation Report for SAM Head

Date: 16.01.2018

Test Laboratory: SPEAG, Zurich, Switzerland

#### DUT: Dipole 5GHz; Type: D5GHzV2; Serial: D5GHzV2 - SN:1057

Communication System: UID 0 - CW; Frequency: 5200 MHz, Frequency: 5800 MHz Medium parameters used: f = 5200 MHz;  $\sigma = 4.59$  S/m;  $\epsilon r = 36.5$ ;  $\rho = 1000$  kg/m3, Medium parameters used: f = 5800 MHz;  $\sigma = 5.28$  S/m;  $\epsilon r = 35.4$ ;  $\rho = 1000$  kg/m3 Measurement Standard: DASY5 (IEEE/IEC/ANSI C63.19-2007)

DASY52 Configuration:

- Probe: EX3DV4 SN3503; ConvF(5.75, 5.75, 5.75); Calibrated: 30.12.2017, ConvF(4.96, 4.96, 4.96); Calibrated: 30.12.2017;
- Sensor-Surface: 1.4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn601; Calibrated: 26.10.2017
- Phantom: SAM Head
- DASY52 52.10.0(1446); SEMCAD X 14.6.10(7417)

# SAM Head/Top - 5200/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm,

dz=1.4mm Reference Value = 72.99 V/m; Power Drift = 0.04 dB Peak SAR (extrapolated) = 30.6 W/kg SAR(1 g) = 8.24 W/kg; SAR(10 g) = 2.35 W/kg Maximum value of SAR (measured) = 19.7 W/kg

SAM Head/Top - 5800/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mmReference Value = 73.00 V/m; Power Drift = 0.07 dB Peak SAR (extrapolated) = 36.5 W/kg SAR(1 g) = 8.62 W/kg; SAR(10 g) = 2.41 W/kg Maximum value of SAR (measured) = 21.9 W/kg

SAM Head/Mouth - 5200/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 72.79 V/m; Power Drift = -0.04 dB Peak SAR (extrapolated) = 29.5 W/kg SAR(1 g) = 8.54 W/kg; SAR(10 g) = 2.37 W/kg Maximum value of SAR (measured) = 20.7 W/kg SAM Head/Mouth - 5800/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 71.69 V/m; Power Drift = -0.07 dB Peak SAR (extrapolated) = 34.9 W/kg

SAR(1 g) = 8.88 W/kg; SAR(10 g) = 2.44 W/kg Maximum value of SAR (measured) = 23.0 W/kg

SAM Head/Neck - 5200/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm,

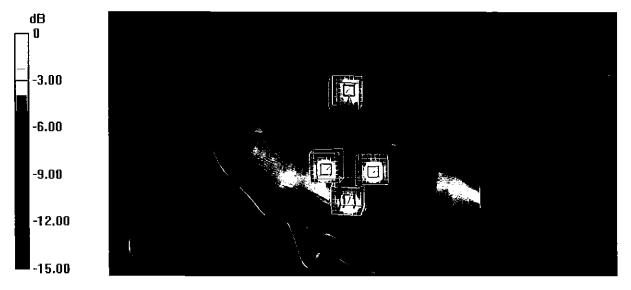
dz=1.4mm Reference Value = 72.48 V/m; Power Drift = 0.05 dB Peak SAR (extrapolated) = 27.9 W/kg SAR(1 g) = 8.14 W/kg; SAR(10 g) = 2.37 W/kg Maximum value of SAR (measured) = 19.3 W/kg

SAM Head/Neck - 5800/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 72.90 V/m; Power Drift = 0.01 dB

Peak SAR (extrapolated) = 33.4 W/kgSAR(1 g) = 8.33 W/kg; SAR(10 g) = 2.35 W/kgMaximum value of SAR (measured) = 21.8 W/kg

SAM Head/Ear - 5200/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 54.68 V/m; Power Drift = 0.03 dB Peak SAR (extrapolated) = 16.3 W/kg SAR(1 g) = 5.16 W/kg; SAR(10 g) = 1.76 W/kg Maximum value of SAR (measured) = 11.1 W/kg

SAM Head/Ear - 5800/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm Reference Value = 56.96 V/m; Power Drift = -0.05 dB Peak SAR (extrapolated) = 21.2 W/kg SAR(1 g) = 5.68 W/kg; SAR(10 g) = 1.89 W/kg Maximum value of SAR (measured) = 13.8 W/kg



0 dB = 13.8 W/kg = 11.40 dBW/kg



PCTEST ENGINEERING LABORATORY, INC. 7185 Oakland Mills Road, Columbia, MD 21046 USA Tel. +1.410.290.6652 / Fax +1.410.290.6654

http://www.pctest.com



# **Certification of Calibration**

Object

D5GHzV2 - SN: 1057

Calibration procedure(s) Procedure for Calibration Extension for SAR Dipoles.

1/16/2019

Extension Calibration date:

Description:

SAR Validation Dipole at 5250, 5600, and 5750 MHz.

#### Calibration Equipment used:

Manufacturer	Model	Description	Cal Date	Cal Interval	Cal Due	Serial Number
Agilent	8753ES	S-Parameter Network Analyzer	2/8/2018	Annual	2/8/2019	US39170122
Agilent	N5182A	MXG Vector Signal Generator	4/18/2018	Annual	4/18/2019	MY47420800
Amplifier Research	15S1G6	Amplifier	CBT	N/A	CBT	433971
Anritsu	MA2411B	Pulse Power Sensor	3/2/2018	Annual	3/2/2019	1207364
Anritsu	MA2411B	Pulse Power Sensor	3/2/2018	Annual	3/2/2019	1339018
Anritsu	ML2495A	Power Meter	10/21/2018	Annual	10/21/2019	941001
Control Company	4040	Therm./Clock/Humidity Monitor	3/31/2017	Biennial	3/31/2019	170232394
Control Company	4352	Ultra Long Stem Thermometer	5/2/2017	Biennial	5/2/2019	170330156
Keysight	772D	Dual Directional Coupler	CBT	N/A	CBT	MY52180215
Keysight Technologies	85033E	Standard Mechanical Calibration Kit (DC to 9GHz, 3.5mm)	6/4/2018	Annual	6/4/2019	MY53401181
MiniCircuits	VLF-6000+	Low Pass Filter	CBT	N/A	CBT	N/A
Mini-Circuits	BW-N20W5+	DC to 18 GHz Precision Fixed 20 dB Attenuator	CBT	N/A	CBT	N/A
Narda	4772-3	Attenuator (3dB)	CBT	N/A	CBT	9406
Pasternack	PE2209-10	Bidirectional Coupler	CBT	N/A	CBT	N/A
Seekonk	NC-100	Torque Wrench	7/11/2018	Annual	7/11/2019	N/A
SPEAG	DAE4	Dasy Data Acquisition Electronics	10/3/2018	Annual	10/3/2019	1558
SPEAG	DAE4	Dasy Data Acquisition Electronics	6/18/2018	Annual	6/18/2019	1334
SPEAG	DAK-3.5	Dielectric Assessment Kit	9/11/2018	Annual	9/11/2019	1091
SPEAG	EX3DV4	SAR Probe	8/23/2018	Annual	8/23/2019	7308
SPEAG	EX3DV4	SAR Probe	6/25/2018	Annual	6/25/2019	7409

Measurement Uncertainty = ±23% (k=2)

	Name	Function	Signature
Calibrated By:	Brodie Halbfoster	Test Engineer	BRODIE HALBFOSTER
Approved By:	Kaitlin O'Keefe	Senior Technical Manager	XOK

Object:	Date Issued:	Page 1 of 4
D5GHzV2 – SN: 1057	01/16/2019	raye 1014

# **DIPOLE CALIBRATION EXTENSION**

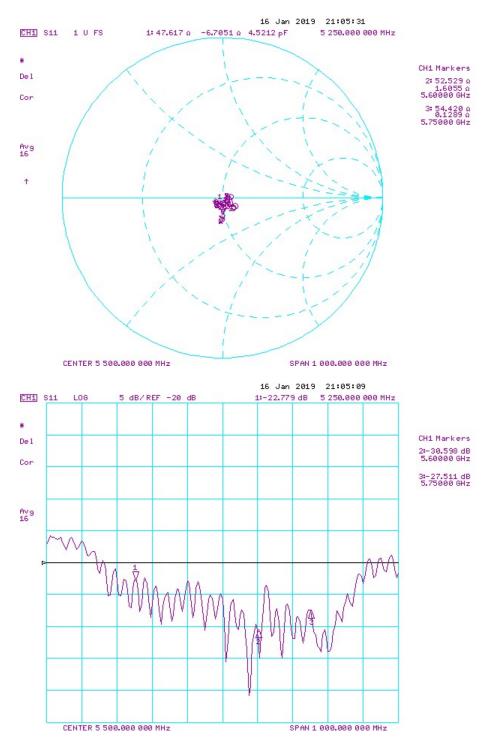
Per KDB 865664 D01, calibration intervals of up to three years may be considered for reference dipoles when it is demonstrated that the SAR target, impedance and return loss of a dipole have remained stable according to the following requirements:

- 1. The measured SAR does not deviate more than 10% from the target on the calibration certificate.
- 2. The return-loss does not deviate more than 20% from the previous measurement and meets the required 20dB minimum return-loss requirement.
- 3. The measurement of real or imaginary parts of impedance does not deviate more than  $5\Omega$  from the previous measurement.

The following dipole was checked to pass the above 3 requirements to have 2-year calibration period from the calibration date:

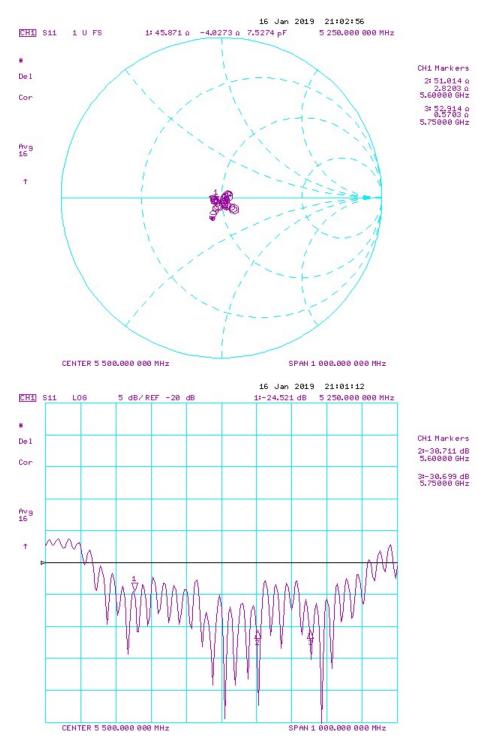
Frequency (MHz)	Calibration Date	Extension Date	Certificate Electrical Delay (ns)	Certificate SAR Target Head (1g) W/kg @ 17.0 dBm	Measured Head SAR (1g) W/kg @ 17.0 dBm	Deviation 1g (%)	Certificate SAR Target Head (10g) W/kg @ 17.0 dBm	Measured Head SAR (10g) W/kg @ 17.0 dBm	Deviation 10g (%)		Measured Impedance Head (Ohm) Real	Difference (Ohm) Real	Certificate Impedance Head (Ohm) Imaginary	Measured Impedance Head (Ohm) Imaginary	Difference (Ohm) Imaginary	Certificate Return Loss Head (dB)	Measured Return Loss Head (dB)	Deviation (%)	PASS/FAIL
5250	1/16/2018	1/16/2019	1.203	3.96	3.63	-8.33%	1.14	1.04	-8.77%	50	47.6	2.4	-5.5	-6.7	1.2	-25.2	-22.8	9.60%	PASS
5600	1/16/2018	1/16/2019	1.203	4.205	3.84	-8.68%	1.2	1.09	-9.17%	54.7	52.5	2.2	-2.1	1.6	3.7	-26.2	-30.6	-16.80%	PASS
5750	1/16/2018	1/16/2019	1.203	4.025	3.76	-6.58%	1.15	1.07	-6.96%	52.7	54.4	1.7	0	0.1	0.1	-31.5	-27.5	12.70%	PASS
Frequency (MHz)	Calibration Date	Extension Date	Certificate Electrical Delay (ns)	Certificate SAR Target Body (1g) W/kg @ 17.0 dBm	Measured Body SAR (1g) W/kg @ 17.0 dBm	Deviation 1g (%)	Certificate SAR Target Body (10g) W/kg @ 17.0 dBm	Measured Body SAR (10g) W/kg @ 17.0 dBm	Deviation 10g (%)		Measured Impedance Body (Ohm) Real	Difference (Ohm) Real	Certificate Impedance Body (Ohm) Imaginary	Measured Impedance Body (Ohm) Imaginary	Difference (Ohm) Imaginary	Certificate Return Loss Body (dB)	Measured Return Loss Body (dB)	Deviation (%)	PASS/FAIL
5250	1/16/2018	1/16/2019	1.203	3.795	3.73	-1.71%	1.06	1.03	-2.37%	48.4	45.9	2.5	-3.9	-4	0.1	-27.4	-24.5	10.50%	PASS
5600	1/16/2018	1/16/2019	1.203	3.995	4.06	1.63%	1.12	1.12	0.45%	55.3	51	4.3	-1.6	2.8	4.4	-25.6	-30.7	-20.00%	PASS
5750	1/16/2018	1/16/2019	1.203	3.835	3.65	-4.82%	1.06	1.02	-3.77%	52.6	52.9	0.3	1.1	0.6	0.5	-31.2	-30.7	1.60%	PASS

Object:	Date Issued:	Dogo 2 of 4
D5GHzV2 – SN: 1057	01/16/2019	Page 2 of 4



Impedance & Return-Loss Measurement Plot for Head TSL

Object:	Date Issued:	Daga 2 of 4	
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#### Impedance & Return-Loss Measurement Plot for Body TSL

Object:	Date Issued:	Page 4 of 4	
D5GHzV2 – SN: 1057	01/16/2019	Page 4 01 4	





# **Certification of Calibration**

Object

D5GHzV2 – SN: 1057

Calibration procedure(s) Procedure for Calibration Extension for SAR Dipoles.

1/16/2020

Extension Calibration date:

Description:

SAR Validation Dipole at 5250, 5600, and 5750 MHz.

#### Calibration Equipment used:

Manufacturer	Model	Description	Cal Date	Cal Interval	Cal Due	Serial Number
Control Company	4040	Therm./Clock/Humidity Monitor	6/29/2019	Biennial	6/29/2021	192291470
Control Company	4352	Ultra Long Stem Thermometer	8/2/2018	Biennial	8/2/2020	181334684
Amplifier Research	15S1G6	Amplifier	CBT	N/A	CBT	433971
Narda	4772-3	Attenuator (3dB)	CBT	N/A	CBT	9406
Keysight Technologies	85033E	Standard Mechanical Calibration Kit (DC to 9GHz, 3.5mm)	7/2/2019	Annual	7/2/2020	MY53401181
Rohde & Schwarz	ZNLE6	Vector Network Analyzer	10/11/2019	Annual	10/11/2020	101307
Mini-Circuits	BW-N20W5+	DC to 18 GHz Precision Fixed 20 dB Attenuator	CBT	N/A	CBT	N/A
SPEAG	DAKS-3.5	Portable DAK	9/10/2019	Annual	9/10/2020	1045
Anritsu	MA2411B	Pulse Power Sensor	8/14/2019	Annual	8/14/2020	1315051
Anritsu	MA2411B	Pulse Power Sensor	8/8/2019	Annual	8/8/2020	1339008
Anritsu	ML2495A	Power Meter	1/15/2020	Annual	1/15/2021	1328004
Agilent	N5182A	MXG Vector Signal Generator	8/19/2019	Annual	8/19/2020	MY47420837
Seekonk	NC-100	Torque Wrench	5/9/2018	Biennial	5/9/2020	22217
MiniCircuits	ZHDC-16-63-S+	Bidirectional Coupler	CBT	N/A	CBT	N/A
MiniCircuits	VLF-6000+	Low Pass Filter	CBT	N/A	CBT	N/A
SPEAG	EX3DV4	SAR Probe	5/16/2019	Annual	5/16/2020	7406
SPEAG	EX3DV4	SAR Probe	6/19/2019	Annual	6/19/2020	7409
SPEAG	DAE4	Dasy Data Acquisition Electronics	6/20/2019	Annual	6/20/2020	1334
SPEAG	DAE4	Dasy Data Acquisition Electronics	5/8/2019	Annual	5/8/2020	728

Measurement Uncertainty =  $\pm 23\%$  (k=2)

	Name	Function	Signature
Calibrated By:	Brodie Halbfoster	Test Engineer	BRODIE HALBFOSTER
Approved By:	Kaitlin O'Keefe	Senior Technical Manager	XOK

Object:	Date Issued:	Page 1 of 4	
D5GHzV2 – SN: 1057	01/16/2020	raye 1014	

# **DIPOLE CALIBRATION EXTENSION**

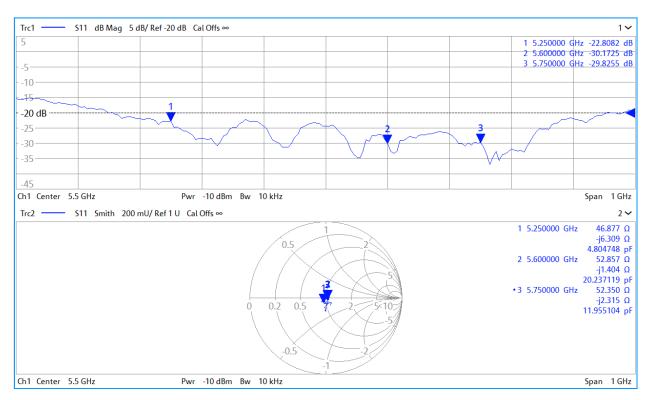
Per KDB 865664 D01, calibration intervals of up to three years may be considered for reference dipoles when it is demonstrated that the SAR target, impedance and return loss of a dipole have remained stable according to the following requirements:

- 1. The measured SAR does not deviate more than 10% from the target on the calibration certificate.
- 2. The return-loss does not deviate more than 20% from the previous measurement and meets the required 20dB minimum return-loss requirement.
- 3. The measurement of real or imaginary parts of impedance does not deviate more than  $5\Omega$  from the previous measurement.

The following dipole was checked to pass the above 3 requirements to have 3-year calibration period from the calibration date:

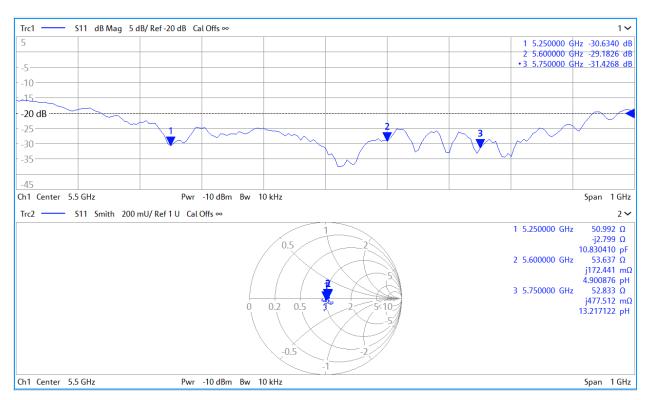
Frequency (MHz)	Calibration Date	Extension Date	Certificate Electrical Delay (ns)		Measured Head SAR (1g) W/kg @ 17.0 dBm		Certificate SAR Target Head (10g) W/kg @ 17.0 dBm	(10a) W/ka @	Deviation 10g (%)	Certificate Impedance Head (Ohm) Real	Measured Impedance Head (Ohm) Real	Difference (Ohm) Real	Certificate Impedance Head (Ohm) Imaginary	Measured Impedance Head (Ohm) Imaginary	Difference (Ohm) Imaginary	Certificate Return Loss Head (dB)	Measured Return Loss Head (dB)	Deviation (%)	PASS/FAIL
5250	1/16/2018	1/16/2020	1.203	3.96	3.72	-6.06%	1.14	1.05	-7.89%	50	46.9	3.1	-5.5	-6.3	0.8	-25.2	-22.8	9.50%	PASS
5600	1/16/2018	1/16/2020	1.203	4.205	3.91	-7.02%	1.2	1.11	-7.50%	54.7	52.9	1.8	-2.1	-1.4	0.7	-26.2	-30.2	-15.20%	PASS
5750	1/16/2018	1/16/2020	1.203	4.025	3.72	-7.58%	1.15	1.05	-8.70%	52.7	52.4	0.4	0	-2.3	2.3	-31.5	-29.8	5.30%	PASS
Frequency (MHz)	Calibration Date	Extension Date	Certificate Electrical Delay (ns)		Measured Body SAR (1g) W/kg @ 17.0 dBm		Certificate SAR Target Body (10g) W/kg @ 17.0 dBm	(10a) W/ka @	Deviation 10g (%)	Certificate Impedance Body (Ohm) Real	Measured Impedance Body (Ohm) Real	Difference (Ohm) Real	Certificate Impedance Body (Ohm) Imaginary	Measured Impedance Body (Ohm) Imaginary	Difference (Ohm) Imaginary	Certificate Return Loss Body (dB)	Measured Return Loss Body (dB)	Deviation (%)	PASS/FAIL
5250	1/16/2018	1/16/2020	1.203	3.795	3.75	-1.19%	1.06	1.04	-1.42%	48.4	51	2.6	-3.9	-2.8	1.1	-27.4	-30.6	-11.80%	PASS
5600	1/16/2018	1/16/2020	1.203	3.995	3.98	-0.38%	1.12	1.1	-1.35%	55.3	53.6	1.7	-1.6	0.2	1.8	-25.6	-29.2	-14.00%	PASS
5750	1/16/2018	1/16/2020	1.203	3.835	3.87	0.91%	1.06	1.06	0.00%	52.6	52.8	0.2	1.1	0.5	0.6	-31.2	-31.4	-0.20%	PASS

Object:	Date Issued:	Page 2 of 4		
D5GHzV2 – SN: 1057	01/16/2020	Fage 2 014		



#### Impedance & Return-Loss Measurement Plot for Head TSL

Object:	Date Issued:	Page 3 of 4	
D5GHzV2 – SN: 1057	01/16/2020	Fage 5 01 4	



#### Impedance & Return-Loss Measurement Plot for Body TSL

Object:	Date Issued:	Page 4 of 4		
D5GHzV2 – SN: 1057	01/16/2020	Fage 4 01 4		

### Calibration Laboratory of

Client

Schmid & Partner Engineering AG Zeughausstrasse 43, 8004 Zurich, Switzerland

BC MRA



S Schweizerischer Kalibrierdienst
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Accredited by the Swiss Accreditation Service (SAS) The Swiss Accreditation Service is one of the signatories to the EA Multilateral Agreement for the recognition of calibration certificates

PC Test

Certificate No: EX3-7410\_Jul19

Accreditation No.: SCS 0108

# **CALIBRATION CERTIFICATE**

Object	EX3DV4 - SN:7410
Calibration procedure(s)	QA CAL-01.v9, QA CAL-14.v5, QA CAL-23.v5, QA CAL-25.v7 Calibration procedure for dosimetric E-field probes
Calibration date:	July 16, 2019
This calibration certificate doc The measurements and the ur	uments the traceability to national standards, which realize the physical units of measurements (SI). Incertainties with confidence probability are given on the following pages and are part of the certificate.

All calibrations have been conducted in the closed laboratory facility: environment temperature (22 ± 3)°C and humidity < 70%.

Calibration Equipment used (M&TE critical for calibration)

Primary Standards	ID	Cal Date (Certificate No.)	Scheduled Calibration
Power meter NRP	SN: 104778	03-Apr-19 (No. 217-02892/02893)	Apr-20
Power sensor NRP-Z91	SN: 103244	03-Apr-19 (No. 217-02892)	Apr-20
Power sensor NRP-Z91	SN: 103245	03-Apr-19 (No. 217-02893)	Apr-20
Reference 20 dB Attenuator	SN: S5277 (20x)	04-Apr-19 (No. 217-02894)	Apr-20
DAE4	SN: 660	19-Dec-18 (No. DAE4-660_Dec18)	Dec-19
Reference Probe ES3DV2	SN: 3013	31-Dec-18 (No. ES3-3013_Dec18)	Dec-19
Secondary Standards	ID	Check Date (in house)	Scheduled Check
Power meter E4419B	SN: GB41293874	06-Apr-16 (in house check Jun-18)	In house check: Jun-20
Power sensor E4412A	SN: MY41498087	06-Apr-16 (in house check Jun-18)	In house check: Jun-20
Power sensor E4412A	SN: 000110210	06-Apr-16 (in house check Jun-18)	In house check: Jun-20
RF generator HP 8648C	SN: US3642U01700	04-Aug-99 (in house check Jun-18)	In house check: Jun-20
Network Analyzer E8358A	SN: US41080477	31-Mar-14 (in house check Oct-18)	In house check; Oct-19

	Name	Function	Signature
Calibrated by:	Jeton Kastrati	Laboratory Technician	$\rightarrow - lb$
		ζ	-F-G-
Approved by:	Katja Pokovic	Technical Manager	V
			At 45
			Issued: July 16, 2019

This calibration certificate shall not be reproduced except in full without written approval of the laboratory.

# Calibration Laboratory of

Schmid & Partner Engineering AG Zeughausstrasse 43, 8004 Zurich, Switzerland



S Schweizerischer Kalibrierdienst

- C Service suisse d'étalonnage
  - S Servizio svizzero di taratura
  - Swiss Calibration Service

Accreditation No.: SCS 0108

Accredited by the Swiss Accreditation Service (SAS)

The Swiss Accreditation Service is one of the signatories to the EA Multilateral Agreement for the recognition of calibration certificates

#### Glossary:

TSL	tissue simulating liquid
NORMx,y,z	sensitivity in free space
ConvF	sensitivity in TSL / NORMx,y,z
DCP	diode compression point
CF	crest factor (1/duty_cycle) of the RF signal
A, B, C, D	modulation dependent linearization parameters
Polarization φ	φ rotation around probe axis
Polarization 9	$\vartheta$ rotation around an axis that is in the plane normal to probe axis (at measurement center),
	i.e., $\vartheta = 0$ is normal to probe axis
Connector Angle	information used in DASY system to align probe sensor X to the robot coordinate system

#### Calibration is Performed According to the Following Standards:

- a) IEEE Std 1528-2013, "IEEE Recommended Practice for Determining the Peak Spatial-Averaged Specific Absorption Rate (SAR) in the Human Head from Wireless Communications Devices: Measurement Techniques", June 2013
- b) IEC 62209-1, ", "Measurement procedure for the assessment of Specific Absorption Rate (SAR) from handheld and body-mounted devices used next to the ear (frequency range of 300 MHz to 6 GHz)", July 2016
- c) IEC 62209-2, "Procedure to determine the Specific Absorption Rate (SAR) for wireless communication devices used in close proximity to the human body (frequency range of 30 MHz to 6 GHz)", March 2010
- d) KDB 865664, "SAR Measurement Requirements for 100 MHz to 6 GHz"

#### Methods Applied and Interpretation of Parameters:

- NORMx,y,z: Assessed for E-field polarization 9 = 0 (f ≤ 900 MHz in TEM-cell; f > 1800 MHz: R22 waveguide). NORMx,y,z are only intermediate values, i.e., the uncertainties of NORMx,y,z does not affect the E<sup>2</sup>-field uncertainty inside TSL (see below ConvF).
- NORM(f)x,y,z = NORMx,y,z \* frequency\_response (see Frequency Response Chart). This linearization is
  implemented in DASY4 software versions later than 4.2. The uncertainty of the frequency response is included
  in the stated uncertainty of ConvF.
- *DCPx,y,z*: DCP are numerical linearization parameters assessed based on the data of power sweep with CW signal (no uncertainty required). DCP does not depend on frequency nor media.
- PAR: PAR is the Peak to Average Ratio that is not calibrated but determined based on the signal characteristics
- *Ax,y,z; Bx,y,z; Cx,y,z; Dx,y,z; VRx,y,z: A, B, C, D* are numerical linearization parameters assessed based on the data of power sweep for specific modulation signal. The parameters do not depend on frequency nor media. *VR* is the maximum calibration range expressed in RMS voltage across the diode.
- ConvF and Boundary Effect Parameters: Assessed in flat phantom using E-field (or Temperature Transfer Standard for f ≤ 800 MHz) and inside waveguide using analytical field distributions based on power measurements for f > 800 MHz. The same setups are used for assessment of the parameters applied for boundary compensation (alpha, depth) of which typical uncertainty values are given. These parameters are used in DASY4 software to improve probe accuracy close to the boundary. The sensitivity in TSL corresponds to NORMx,y,z \* ConvF whereby the uncertainty corresponds to that given for ConvF. A frequency dependent ConvF is used in DASY version 4.4 and higher which allows extending the validity from ± 50 MHz to ± 100 MHz.
- Spherical isotropy (3D deviation from isotropy): in a field of low gradients realized using a flat phantom exposed by a patch antenna.
- Sensor Offset: The sensor offset corresponds to the offset of virtual measurement center from the probe tip (on probe axis). No tolerance required.
- Connector Angle: The angle is assessed using the information gained by determining the NORMx (no uncertainty required).

#### **Basic Calibration Parameters**

	Sensor X	Sensor Y	Sensor Z	Unc (k=2)
Norm (μV/(V/m) <sup>2</sup> ) <sup>A</sup>	0.41	0.47	0.43	± 10.1 %
DCP (mV) <sup>B</sup>	95.0	98.5	98.3	

#### **Calibration Results for Modulation Response**

UID	Communication System Name		A dB	B dBõV	C	D dB	VR mV	Max dev.	Max Unc <sup>E</sup> (k=2)
0	CW	X	0.00	0.00	1.00	0.00	143.3	± 3.3 %	± 4.7 %
		Y	0.00	0.00	1.00		136.3	1	
		Z	0.00	0.00	1.00		146.3	1	
10352-	Pulse Waveform (200Hz, 10%)	X	7.20	77.00	15.83	10.00	60.0	± 3.7 %	± 9,6 %
AAA		Y	15.00	89.41	20.45		60.0	1	
		Z	15.00	86.58	19,43		60.0	1	
10353-	Pulse Waveform (200Hz, 20%)	X	15.00	85.70	17.13	6.99	80.0	± 2.7 %	± 9.6 %
AAA		Y	15.00	94.26	21.82		80.0	1	
		Z	15.00	87.46	18.36		80.0	1	
10354-	Pulse Waveform (200Hz, 40%)	X	15.00	84.98	15.02	3.98	95.0	± 1.4 %	± 9.6 %
AAA		Y	15.00	105.63	25.93	1	95.0	1	
		Z	15.00	86.91	16.30		95.0		
10355-	Pulse Waveform (200Hz, 60%)	X	0.58	63.48	6.70	2.22	120.0	± 1.4 %	±9.6 %
AAA		Y	15.00	128.91	35.05		120.0		
		Z	1.67	69.27	9.07		120.0		
10387-	QPSK Waveform, 1 MHz	X	0.58	60.52	7.75	0.00	150.0	± 2.7 %	±9.6 %
AAA		Y	1.10	67.31	12.60		150.0		
		Z	0.65	60.71	8.42		150,0		
10388-	QPSK Waveform, 10 MHz	X	2.25	68.70	16.13	0.00	150.0	± 1.1 %	± 9.6 %
AAA		Y	2.69	71.62	17.77		150.0		
		Z	2.10	66.95	14.95		150.0		
10396-	64-QAM Waveform, 100 kHz	X	2.85	69.56	18.52	3.01	150.0	±0.7 %	± 9.6 %
AAA		Y	3.27	72.43	19.82		150.0		
		Z	2.96	69.30	18.13		150.0		
10399-	64-QAM Waveform, 40 MHz	X	3.51	67.28	15.99	0.00	150.0	± 2.2 %	± 9.6 %
AAA		Y	3.73	68.43	16.68		150.0		
		Z	3.45	66.65	15.48		150.0		
10414-	WLAN CCDF, 64-QAM, 40MHz	X	4.86	65.74	15.76	0.00	150.0	± 4.2 %	± 9.6 %
AAA		Y	5.02	66.29	16.07		150.0		
		Z	4.91	65.47	15.50		150.0		

Note: For details on UID parameters see Appendix

The reported uncertainty of measurement is stated as the standard uncertainty of measurement multiplied by the coverage factor k=2, which for a normal distribution corresponds to a coverage probability of approximately 95%.

<sup>&</sup>lt;sup>A</sup> The uncertainties of Norm X,Y,Z do not affect the E<sup>2</sup>-field uncertainty inside TSL (see Pages 5 and 6). <sup>B</sup> Numerical linearization parameter: uncertainty not required. <sup>E</sup> Uncertainty is determined using the max. deviation from linear response applying rectangular distribution and is expressed for the square of the field value.

#### **Sensor Model Parameters**

	C1 fF	C2 fF	a V <sup>-1</sup>	T1 ms.V <sup>-2</sup>	T2 ms.V⁻¹	T3 ms	T4 V <sup>-2</sup>	T5 V⁻1	Т6
Х	44.0	341.99	38.28	7.82	0.67	5.04	0.00	0.55	1.01
Y	48.3	362.63	36.17	12.06	0.12	5.10	0.87	0.38	1.01
Z	52.1	408.62	38.63	10.30	0.68	5.08	0.00	0.64	1.01

### **Other Probe Parameters**

Sensor Arrangement	Triangular
Connector Angle (°)	0.7
Mechanical Surface Detection Mode	enabled
Optical Surface Detection Mode	disabled
Probe Overall Length	337 mm
Probe Body Diameter	10 mm
Tip Length	9 mm
Tip Diameter	2.5 mm
Probe Tip to Sensor X Calibration Point	1 mm
Probe Tip to Sensor Y Calibration Point	1 mm
Probe Tip to Sensor Z Calibration Point	1 mm
Recommended Measurement Distance from Surface	1.4 mm

		<b>J</b>							
f (MHz) <sup>c</sup>	Relative Permittivity <sup>F</sup>	Conductivity (S/m) <sup>F</sup>	ConvF X	ConvF Y	ConvF Z	Alpha <sup>G</sup>	Depth <sup>G</sup> (mm)	Unc (k=2)	
750	41.9	0.89	9.95	9.95	9.95	0.69	0.80	± 12.0 %	
835	41.5	0.90	9.88	9.88	9.88	0.51	0.80	± 12.0 %	
1750	40.1	1.37	8.46	8.46	8.46	0.33	0.86	± 12.0 %	
1900	40.0	1.40	8.11	8.11	8.11	0.35	0.86	± 12.0 %	
2300	39.5	1.67	7.91	7.91	7.91	0.34	0.90	± 12.0 %	
2450	39.2	1.80	7.47	7.47	7.47	0.37	0.90	± 12.0 %	
2600	39.0	1.96	7.33	7.33	7.33	0.39	0.90	± 12.0 %	
5250	35.9	4.71	5.46	5.46	5.46	0.40	1.80	± 13.1 %	
5600	35.5	5.07	4.85	4.85	4.85	0.40	1.80	± 13.1 %	
5750	35.4	5.22	5.05	5.05	5.05	0.40	1.80	± 13.1 %	

#### Calibration Parameter Determined in Head Tissue Simulating Media

<sup>C</sup> Frequency validity above 300 MHz of ± 100 MHz only applies for DASY v4.4 and higher (see Page 2), else it is restricted to ± 50 MHz. The uncertainty is the RSS of the ConvF uncertainty at calibration frequency and the uncertainty for the indicated frequency band. Frequency validity below 300 MHz is ± 10, 25, 40, 50 and 70 MHz for ConvF assessments at 30, 64, 128, 150 and 220 MHz respectively. Validity of ConvF assessed at 6 MHz is 4-9 MHz, and ConvF assessed at 13 MHz is 9-19 MHz. Above 5 GHz frequency validity can be extended to ± 110 MHz.

<sup>F</sup> At frequencies below 3 GHz, the validity of tissue parameters ( $\varepsilon$  and  $\sigma$ ) can be relaxed to  $\pm$  10% if liquid compensation formula is applied to measured SAR values. At frequencies above 3 GHz, the validity of tissue parameters ( $\varepsilon$  and  $\sigma$ ) is restricted to  $\pm$  5%. The uncertainty is the RSS of the ConvF uncertainty for indicated target tissue parameters.

 $^{6}$  Alpha/Depth are determined during calibration. SPEAG warrants that the remaining deviation due to the boundary effect after compensation is always less than ± 1% for frequencies below 3 GHz and below ± 2% for frequencies between 3-6 GHz at any distance larger than half the probe tip diameter from the boundary.

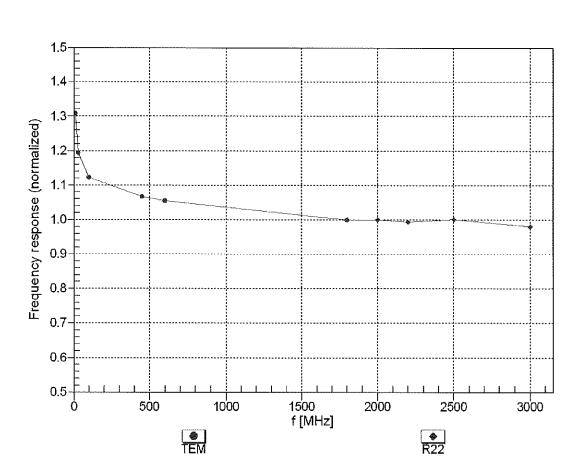
f (MHz) <sup>c</sup>	Relative Permittivity <sup>F</sup>	Conductivity (S/m) <sup>F</sup>	ConvF X	ConvF Y	ConvF Z	Alpha <sup>G</sup>	Depth <sup>G</sup> (mm)	Unc (k=2)
750	55.5	0.96	10.01	10.01	10.01	0.48	0.84	± 12.0 %
835	55.2	0.97	9.79	9.79	9.79	0.48	0.80	± 12.0 %
1750	53.4	1.49	8.08	8.08	8.08	0.38	0.86	± 12.0 %
1900	53.3	1.52	7.78	7.78	7.78	0.42	0.86	± 12.0 %
2300	52.9	1.81	7.68	7.68	7.68	0.43	0.90	± 12.0 %
2450	52.7	1.95	7.44	7.44	7.44	0.33	0.90	± 12.0 %
2600	52.5	2.16	7.43	7.43	7.43	0.33	0.80	± 12.0 %
5250	48.9	5.36	4.95	4.95	4.95	0.50	1.90	± 13.1 %
5600	48.5	5.77	4.42	4.42	4.42	0.50	1.90	± 13.1 %
5750	48.3	5.94	4.60	4.60	4.60	0.50	1.90	± 13.1 %

#### Calibration Parameter Determined in Body Tissue Simulating Media

<sup>C</sup> Frequency validity above 300 MHz of ± 100 MHz only applies for DASY v4.4 and higher (see Page 2), else it is restricted to ± 50 MHz. The uncertainty is the RSS of the ConvF uncertainty at calibration frequency and the uncertainty for the indicated frequency band. Frequency validity below 300 MHz is ± 10, 25, 40, 50 and 70 MHz for ConvF assessments at 30, 64, 128, 150 and 220 MHz respectively. Validity of ConvF assessed at 6 MHz is 4-9 MHz, and ConvF assessed at 13 MHz is 9-19 MHz. Above 5 GHz frequency validity can be extended to ± 110 MHz.

<sup>F</sup> At frequencies below 3 GHz, the validity of tissue parameters ( $\varepsilon$  and  $\sigma$ ) can be relaxed to ± 10% if liquid compensation formula is applied to measured SAR values. At frequencies above 3 GHz, the validity of tissue parameters ( $\varepsilon$  and  $\sigma$ ) is restricted to ± 5%. The uncertainty is the RSS of the ConvF uncertainty for indicated target tissue parameters.

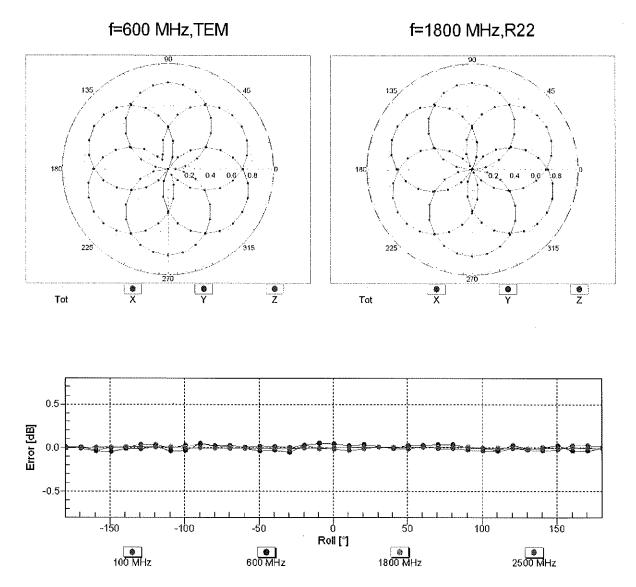
 $^{6}$  Alpha/Depth are determined during calibration. SPEAG warrants that the remaining deviation due to the boundary effect after compensation is always less than  $\pm$  1% for frequencies below 3 GHz and below  $\pm$  2% for frequencies between 3-6 GHz at any distance larger than half the probe tip diameter from the boundary.



# Frequency Response of E-Field (TEM-Cell:ifi110 EXX, Waveguide: R22)

Uncertainty of Frequency Response of E-field: ± 6.3% (k=2)

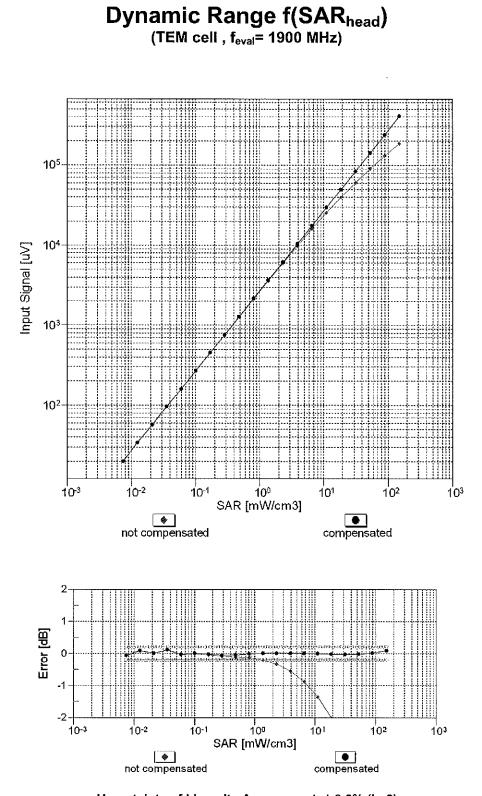
July 16, 2019



# Receiving Pattern ( $\phi$ ), $\vartheta = 0^{\circ}$

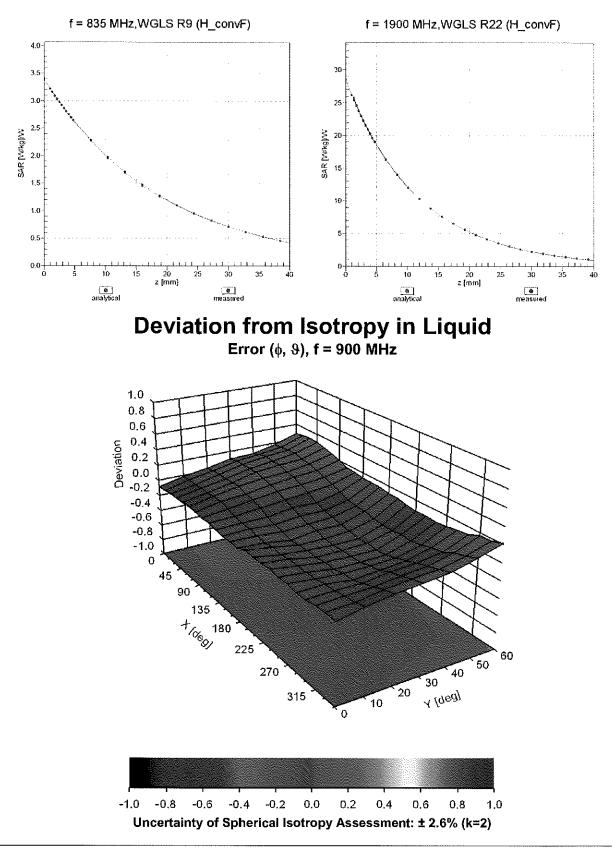
Uncertainty of Axial Isotropy Assessment: ± 0.5% (k=2)

July 16, 2019



## Uncertainty of Linearity Assessment: ± 0.6% (k=2)

#### Certificate No: EX3-7410\_Jul19



# **Conversion Factor Assessment**

## **Appendix: Modulation Calibration Parameters**

UID	Rev	Communication System Name	Group	PAR	Unch
		_		(dB)	(k=2)
0		CW	CW	0.00	±4.7 %
10010	CAA	SAR Validation (Square, 100ms, 10ms)	Test	10.00	±9.6 %
10011	CAB	UMTS-FDD (WCDMA)	WCDMA	2.91	± 9.6 %
10012	CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 1 Mbps)	WLAN	1.87	±9.6 %
10013	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps)	WLAN	9.46	±9.6 %
10021	DAC	GSM-FDD (TDMA, GMSK)	GSM	9.39	±9.6 %
10023	DAC	GPRS-FDD (TDMA, GMSK, TN 0)	GSM	9.57	± 9.6 %
10024	DAC	GPRS-FDD (TDMA, GMSK, TN 0-1)	GSM	6.56	± 9.6 %
10025	DAC	EDGE-FDD (TDMA, 8PSK, TN 0)	GSM	12.62	± 9.6 %
10026	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-1)	GSM	9.55	±9.6 %
10027	DAC	GPRS-FDD (TDMA, GMSK, TN 0-1-2)	GSM	4.80	± 9.6 %
10028	DAC	GPRS-FDD (TDMA, GMSK, TN 0-1-2-3)	GSM	3.55	±9.6 %
10029	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-1-2)	GSM	7.78	± 9.6 %
10030	CAA	IEEE 802.15.1 Bluetooth (GFSK, DH1)	Bluetooth	5.30	±9.6 %
10031	CAA	IEEE 802.15.1 Bluetooth (GFSK, DH3)	Bluetooth	1.87	±9.6 %
10032	CAA	IEEE 802.15.1 Bluetooth (GFSK, DH5)	Bluetooth	1.16	±96%
10033	CAA	IEEE 802.15.1 Bluetooth (PI/4-DQPSK, DH1)	Bluetooth	7.74	± 9.6 %
10034	CAA	IEEE 802.15.1 Bluetooth (PI/4-DQPSK, DH3)	Bluetooth	4.53	± 9.6 %
10035	CAA	IEEE 802.15.1 Bluetooth (PI/4-DQPSK, DH5)	Bluetooth	3.83	±9.6 %
10036	CAA	IEEE 802.15.1 Bluetooth (8-DPSK, DH1)	Bluetooth	8.01	±9.6 %
10037	CAA	IEEE 802.15.1 Bluetooth (8-DPSK, DH3)	Bluetooth	4.77	± 9.6 %
10038	CAA	IEEE 802.15.1 Bluetooth (8-DPSK, DH5)	Bluetooth	4.10	±9.6 %
10039	CAB	CDMA2000 (1xRTT, RC1)	CDMA2000	4.57	±9.6 %
10042	CAB	IS-54 / IS-136 FDD (TDMA/FDM, PI/4-DQPSK, Halfrate)	AMPS	7.78	± 9.6 %
10044	CAA	IS-91/EIA/TIA-553 FDD (FDMA, FM)	AMPS	0.00	± 9.6 %
10048	CAA	DECT (TDD, TDMA/FDM, GFSK, Full Slot, 24)	DECT	13.80	± 9.6 %
10049	CAA	DECT (TDD, TDMA/FDM, GFSK, Double Slot, 12)	DECT	10.79	± 9.6 %
10056	CAA	UMTS-TDD (TD-SCDMA, 1.28 Mcps)	TD-SCDMA	11.01	±9.6 %
10058	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-1-2-3)	GSM	6.52	± 9.6 %
10059	CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 2 Mbps)	WLAN	2.12	± 9.6 %
10060	CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 5.5 Mbps)	WLAN	2.83	± 9.6 %
10061	CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 11 Mbps)	WLAN	3.60	±9.6 %
10062	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 6 Mbps)	WLAN	8.68	± 9.6 %
10063	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 9 Mbps)	WLAN	8.63	±9.6 %
10064	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 12 Mbps)	WLAN	9.09	± 9.6 %
10065	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 18 Mbps)	WLAN	9.00	± 9.6 %
10066	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 24 Mbps)	WLAN	9.38	± 9.6 %
10067	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 36 Mbps)	WLAN	10.12	± 9.6 %
10068	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 48 Mbps)	WLAN	10.24	± 9.6 %
10069	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 54 Mbps)	WLAN	10.56	± 9.6 %
10071	CAB	IEEE 802.11g WIFI 2.4 GHz (DSSS/OFDM, 9 Mbps)	WLAN	9.83	± 9.6 %
10072	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 12 Mbps)	WLAN	9.62	± 9.6 %
10072	CAB	IEEE 802.11g WIFI 2.4 GHz (DSSS/OFDM, 18 Mbps)	WLAN	9.94	± 9.6 %
10074	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 24 Mbps)	WLAN	10.30	± 9.6 %
10075	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 36 Mbps)	WLAN	10.77	± 9.6 %
10076	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 48 Mbps)	WLAN	10.94	± 9.6 %
10077	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 54 Mbps)	WLAN	11.00	± 9.6 %
10081	CAB	CDMA2000 (1xRTT, RC3)	CDMA2000	3.97	±9.6 %
10082	CAB	IS-54 / IS-136 FDD (TDMA/FDM, PI/4-DQPSK, Fullrate)	AMPS	4.77	± 9.6 %
10090	DAC	GPRS-FDD (TDMA, GMSK, TN 0-4)	GSM	6.56	± 9.6 %
10097	CAB	UMTS-FDD (HSDPA)	WCDMA	3,98	±9.6 %
10098	CAB	UMTS-FDD (HSUPA, Subtest 2)	WCDMA	3.98	±9.6 %
10099	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-4)	GSM	9.55	± 9.6 %
10100	CAE	LTE-FDD (SC-FDMA, 100% RB, 20 MHz, QPSK)	LTE-FDD	5.67	± 9.6 %
10100	CAE	LTE-FDD (SC-FDMA, 100% RB, 20 MHz, 16-QAM)	LTE-FDD	6.42	± 9.6 %
10101	CAE	LTE-FDD (SC-FDMA, 100% RB, 20 MHz, 64-QAM)	LTE-FDD	6.60	± 9.6 %
10102	CAG	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, QPSK)	LTE-TDD	9.29	± 9.6 %
	CAG	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, 16-QAM)	LTE-TDD	9.97	± 9.6 %
1 10104					
10104 10105	CAG	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, 64-QAM)	LTE-TDD	10.01	± 9.6 %

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10110         CAG         LTE-FDD         5.7.6         ±9.6 %           10111         CAG         LTE-FDD         6.7.4         ±9.6 %           10112         CAG         LTE-FDD         6.7.4         ±9.6 %           10112         CAG         LTE-FDD         6.7.4         ±9.6 %           10112         CAG         LTE-FDD         6.7.2         ±9.6 %           10114         CAC         LEEE 602.11n (HT Greenfield, 318 Mbps, BP-SK)         WLAN         8.4.6         ±9.6 %           10116         CAC         LEEE 602.11n (HT Greenfield, 61 Mbps, 16-GAM)         WLAN         8.4.6         ±9.6 %           10116         CAC         LEEE 602.11n (HT Moxed, 61 Mbps, 16-GAM)         WLAN         8.15         ±9.6 %           10116         CAC         LEEE 602.11n (HT Moxed, 61 Mbps, 16-GAM)         WLAN         8.15         ±9.6 %           10116         CAC         LEEE 602.11n (HT Moxed, 61 Mbps, 16-GAM)         UTE-FDD         6.63         ±9.6 %           10116         CAC         LEEE 602.11n (HT Moxed, 61 Mbps, 16-GAM)         LTE-FDD         6.73         ±9.6 %           10140         CAE         LTE-FDD (SC-FDM, 100% RB, 16 MHz, 46-GAM)         LTE-FDD         6.73         ±9.6 %           101	40100				-	
10111         CAG         LTE-FDD         6.49         19.6 %           10112         CAG         LTE-FDD (SC-FDMA, 100%, RB, 10 MHz, 64-OAM)         LTE-FDD         6.59         19.6 %           10113         CAG         LTE-FDD (SC-FDMA, 100%, RB, 10 MHz, 64-OAM)         LTE-FDD         6.50         19.6 %           10114         CAG         LTE-FDD (SC-FDMA, 100%, RB, 10 MHz, 64-OAM)         WLAN         8.46         19.6 %           10115         CAG         LEEE 602.11n (HT Greenfield, 31 Mbps, 64-OAM)         WLAN         8.46         19.6 %           10117         CAG         LEEE 602.11n (HT Mixed, 135 Mbps, 64-OAM)         WLAN         8.69         19.6 %           10118         CAG         LEEE 602.11n (HT Mixed, 135 Mbps, 64-OAM)         WLAN         8.69         19.6 %           10140         CAE         LTE-FDD (SC-FDMA, 100%, RB, 15 MHz, 16-OAM)         UTE-FDD         6.41         19.6 %           10141         CAE         LTE-FDD (SC-FDMA, 100%, RB, 13 MHz, 16-OAM)         LTE-FDD         5.73         19.6 %           10142         CAE         LTE-FDD (SC-FDMA, 100%, RB, 14 MHz, 16-OAM)         LTE-FDD         6.74         19.6 %           10142         CAE         LTE-FDD (SC-FDMA, 100%, RB, 14 MHz, 16-OAM)         LTE-FDD         6.72	10109	CAG	LTE-FDD (SC-FDMA, 100% RB, 10 MHz, 16-QAM)	LTE-FDD	6.43	±9.6 %
19112         CAG         LTE-FDD         6.50         ±9.6 %           19113         CAG         LTE-FDD         6.52         ±9.6 %           19114         CAG         LEEE B02.1 fn (HT Greenfield, 13.6 Mbps, BPSK)         WLAN         8.16         ±9.6 %           19115         CAG         LEEE B02.1 fn (HT Greenfield, 13.6 Mbps, BP-CAM)         WLAN         8.16         ±9.6 %           19116         CAC         LEEE B02.1 fn (HT Meed, 81 Mbps, 16-CAM)         WLAN         8.16         ±9.6 %           19116         CAC         LEEE B02.1 fn (HT Meed, 81 Mbps, 16-CAM)         WLAN         8.13         ±9.6 %           19116         CAC         LEEE B02.1 fn (HT Meed, 81 Mbps, 16-CAM)         WLAN         8.13         ±9.6 %           19116         CAC         LEEE B02.1 fn (HT Meed, 81 Mbp, 16-CAM)         WLAN         8.13         ±9.6 %           19147         CAE         LTE-FDD (5C-FDMA, 100% RB, 15 MHz, 16-CAM)         LTE-FDD         6.53         ±9.6 %           19147         CAE         LTE-FDD (5C-FDMA, 100% RB, 14 MHz, 16-CAM)         LTE-FDD         6.57         ±9.6 %           19144         CAE         LTE-FDD (5C-FDMA, 100% RB, 14 MHz, 16-CAM)         LTE-FDD         6.62         ±9.6 %           19144         CAE			LTE-FDD (SC-FDMA, 100% RB, 5 MHz, QPSK)		5.75	± 9.6 %
10113         CAG         LTE-FDD         672         1 = 6 + 70           10114         CAC         LEEE 602.11n (HT Greenfeld, 13 Mbps, 16-CAM)         WLAN         8.16         9.8 %,           10115         CAC         LEEE 602.11n (HT Greenfeld, 13 Mbps, 16-CAM)         WLAN         8.16         9.8 %,           10116         CAC         LEEE 602.11n (HT Mseed, 135 Mbps, 18-CAM)         WLAN         8.16         9.8 %,           10117         CAC         LEEE 602.11n (HT Mseed, 135 Mbps, 18-CAM)         WLAN         8.17         9.8 %,           10118         CAC         LEEE 602.11n (HT Mseed, 135 Mbps, 18-CAM)         WLAN         8.16         9.8 %,           10140         CAC         LEEE 602.11n (HT Mseed, 135 Mbps, 18-CAM)         WLAN         8.17         9.8 %,           10141         CAC         LEEF 602.57DM, 100%, RB, 15 MHz, 16-CAM)         LTE-FDD         6.53         19.6 %,           10142         CAE         LTE-FDD (SC-FDM, 100%, RB, 15 MHz, 16-CAM)         LTE-FDD         6.53         19.6 %,           10142         CAE         LTE-FDD (SC-FDM, 100%, RB, 14 MHz, 16-CAM)         LTE-FDD         6.36         19.6 %,           10142         CAE         LTE-FDD (SC-FDM, 400%, RB, 14 MHz, 16-CAM)         LTE-FDD         6.36         19.6 %		· • • • • • • • • • • • • • • • • • • •		LTE-FDD	6.44	± 9.6 %
10114         CAC         EEEE 802.11n (HT Greenfield, 31 Mpps, BPSK)         WLAN         8.40         19.85%           10115         CAC         EEEE 802.11n (HT Greenfield, 31 Mpps, BC-OAM)         WLAN         8.40         19.85%           10116         CAC         EEEE 802.11n (HT Greenfield, 135 Mbps, BC-OAM)         WLAN         8.07         2.96.5%           10116         CAC         EEEE 802.11n (HT Mixed, 81 Mbps, 16-OAM)         WLAN         8.13         2.96.5%           10116         CAC         EEEE 802.11n (HT Mixed, 81 Mbps, 16-OAM)         WLAN         8.13         2.96.5%           10140         CAC         EEEE 802.11n (HT Mixed, 81 Mbps, 16-OAM)         UTE+FDD         6.49         2.96.5%           10141         CAE         LTE+FDD (SC-FDMA, 100% RB, 3 MHz, 16-OAM)         UTE+FDD         6.57         3.96.5%           10142         CAE         LTE+FDD (SC-FDMA, 100% RB, 3 MHz, 16-OAM)         LTE+FDD         6.57         3.96.5%           10144         CAE         LTE+FDD (SC-FDMA, 100% RB, 3 MHz, 16-OAM)         LTE+FDD         6.65         3.96.5%           10145         CAF         LTE+FDD (SC-FDMA, 50% RB, 20 MHz, 16-OAM)         LTE+FDD (SC-FDMA, 50%         B.76         4.96.5%           10146         CAF         LTE+FDD (SC-FDMA, 50% RB, 20 MHz,			LTE-FDD (SC-FDMA, 100% RB, 10 MHz, 64-QAM)		6.59	± 9.6 %
10116         CAC         LEEE 802.11n (HT Greenfield, 35 Mbps, 64-GAM)         WLAN         8.14         2.88 %           10117         CAC         LEEE 802.11n (HT Wared, 135 Mbps, 82-GAM)         WLAN         8.13         2.86 %           10118         CAC         LEEE 802.11n (HT Wared, 135 Mbps, 82-GAM)         WLAN         8.13         2.86 %           10119         CAC         LEEE 802.11n (HT Wared, 135 Mbps, 82-GAM)         WLAN         8.13         2.86 %           10140         CAC         LEEE 802.11n (HT Wared, 136 Mbps, 82-GAM)         WLAN         8.13         2.86 %           10141         CAC         LTE-FDD (SC-FDMA, 100% RB, 15 MHz, 16-GAM)         UTE-FDD         6.33         2.86 %           10143         CAE         LTE-FDD (SC-FDMA, 100% RB, 15 MHz, 16-GAM)         UTE-FDD         6.36         4.98 %           10144         CAE         LTE-FDD (SC-FDMA, 100% RB, 14 MHz, 0FSK)         LTE-FDD         6.76         4.98 %         4.98 %           10144         CAE         LTE-FDD (SC-FDMA, 100% RB, 12 MHz, 16-GAM)         LTE-FDD         6.71         3.98 %         4.98 %           10145         CAE         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-GAM)         LTE-FDD         6.72         4.86 %         5.96 %         5.96 %         5.96 %         5			LTE-FDD (SC-FDMA, 100% RB, 5 MHz, 64-QAM)	LTE-FDD	6.62	± 9.6 %
10110         CAC         LEE 802.11n (HT Greenfield, 135 Mbps, 84-CAM)         WI AN         8.15         18.8 %           10117         CAC         LEEE 802.11n (HT Mixed, 81 Mbps, 46-CAM)         WI AN         8.59         13.8 %           10118         CAC         LEEE 802.11n (HT Mixed, 81 Mbps, 46-CAM)         WI AN         8.59         13.8 %           10140         CAE         LTE-FDD (SC-FDMA, 100% FB; 15 MHz, 18-CAM)         LTE-FDD (6.49         8.3 %           10141         CAE         LTE-FDD (SC-FDMA, 100% FB; 15 MHz, 18-CAM)         LTE-FDD (6.53         9.8 %           10142         CAE         LTE-FDD (SC-FDMA, 100% FB; 14 MHz, 18-CAM)         LTE-FDD (6.57         9.8 %           10144         CAE         LTE-FDD (SC-FDMA, 100% FB; 14 MHz, 18-CAM)         LTE-FDD (6.57         9.8 %           10145         CAF         LTE-FDD (SC-FDMA, 100% FB; 14 MHz, 18-CAM)         LTE-FDD (6.67         9.8 %           10147         CAF         LTE-FDD (SC-FDMA, 100% FB; 14 MHz, 18-CAM)         LTE-FDD (6.67         9.8 %           10147         CAF         LTE-FDD (SC-FDMA, 100% FB; 14 MHz, 18-CAM)         LTE-FDD (6.67         9.8 %           10147         CAF         LTE-FDD (SC-FDMA, 50% FB; 20 MHz, 18-CAM)         LTE-FDD (6.67         9.8 %           10160         CAE				WLAN	8.10	± 9.6 %
10112         CAC         IEEE 802.11n (HT Mixed, 13.5 MBps, 8F-SA)         WUAN         8.007         2.80 SK           10118         CAC         IEEE 802.11n (HT Mixed, 136 Mbps, 64-OAM)         WUAN         8.103         8.90 SK           10140         CAC         IEEE 802.11n (HT Mixed, 136 Mbps, 64-OAM)         ULAN         8.13 SK           10140         CAE         ITE-FDD (SC-FDMA, 100% RB, 15 MHz, 16-OAM)         ITE-FDD 6.53         9.6 %           10141         CAE         ITE-FDD (SC-FDMA, 100% RB, 3 MHz, 16-OAM)         ITE-FDD 6.53         9.6 %           10142         CAE         ITE-FDD (SC-FDMA, 100% RB, 3 MHz, 16-OAM)         ITE-FDD 6.53         9.6 %           10144         CAE         ITE-FDD (SC-FDMA, 100% RB, 3 MHz, 16-OAM)         ITE-FDD 6.65         9.6 %           10145         CAF         ITE-FDD (SC-FDMA, 100% RB, 14 MHz, 16-OAM)         ITE-FDD 6.62         9.6 %           10147         CAF         ITE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-OAM)         ITE-FDD 6.62         9.6 %           10147         CAF         ITE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-OAM)         ITE-FDD 6.62         9.6 %           10147         CAF         ITE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-OAM)         ITE-FDD 6.62         9.6 %           10147         CAF         ITE-FDD (SC-FDMA, 50% RB			IEEE 802.11n (HT Greenfield, 81 Mbps, 16-QAM)	WLAN	8.46	± 9.6 %
10118         CAC         IEEE 802.11n (HT Mixed, 81 Mbps, 16-CAM)         WLAN         8.59         ± 9.6 %           10119         CAC         IEEE 802.11n (HT Mixed, 135 Mbps, 64-CAM)         LTE-FDD         6.40         ± 9.6 %           10141         CAE         LTE-FDD         (53C-FDM, 109% RB, 15 MHz, 16-CAM)         LTE-FDD         6.53         ± 9.6 %           10142         CAE         LTE-FDD         (53C-FDM, 109% RB, 3 MHz, 26-CAM)         LTE-FDD         6.53         ± 9.6 %           10143         CAE         LTE-FDD         (53C-FDM, 109% RB, 3 MHz, 26-CAM)         LTE-FDD         6.65         ± 9.6 %           10144         CAE         LTE-FDD         (53C-FDM, 109% RB, 14 MHz, 0FSA)         LTE-FDD         6.66         ± 9.6 %           10146         CAF         LTE-FDD         (53C-FDM, 109% RB, 14 MHz, 0FSA)         LTE-FDD         6.62         ± 9.6 %           10147         CAF         LTE-FDD         (53C-FDM, 50% RB, 20 MHz, 0FAAM)         LTE-FDD         6.62         ± 9.6 %           10150         CAG         LTE-FDD         (53C-FDM, 50% RB, 20 MHz, 0FAAM)         LTE-FDD         6.62         ± 9.6 %           10151         CAG         LTE-FDD (SC-FDM, 50% RB, 20 MHz, 0FAAM)         LTE-FDD         9.62         ± 9.6 %	a second s		IEEE 802.11n (HT Greenfield, 135 Mbps, 64-QAM)	WLAN	8.15	± 9.6 %
10118         CAC         IEEE 802.11n (HT Mixed, 313 Mbps, 46-CAM)         WLAN         8.59         ± 9.6 %           10119         CAC         IEEE 802.11n (HT Mixed, 313 Mbps, 46-CAM)         LTE-FDD         6.49         ± 9.6 %           10141         CAE         LTE-FDD         (5.57         ± 9.6 %           10142         CAE         LTE-FDD         (5.57         ± 9.6 %           10142         CAE         LTE-FDD         (5.57         ± 9.6 %           10142         CAE         LTE-FDD         (5.57         ± 9.6 %           10144         CAE         LTE-FDD         (5.57         ± 9.6 %           10144         CAE         LTE-FDD         (5.57         ± 9.6 %           10146         CAF         LTE-FDD         (5.67 MA, 50% RB, 20 MHz, 0°SK)         LTE-FDD         6.41         ± 9.6 %           10147         CAF         LTE-FDD         (5.57 MA, 50% RB, 20 MHz, 0°SK)         LTE-FDD         6.42         ± 9.6 %           10149         CAE         LTE-FDD         (5.67 MA, 50% RB, 20 MHz, 0°SK)         LTE-FDD         6.42         ± 9.6 %           10147         CAE         LTE-FDD         (5.67 MA, 50% RB, 20 MHz, 0°SK)         LTE-FDD         6.42         ± 9.6 % <tr< td=""><td>and the second s</td><td></td><td>IEEE 802.11n (HT Mixed, 13.5 Mbps, BPSK)</td><td>WLAN</td><td>8.07</td><td></td></tr<>	and the second s		IEEE 802.11n (HT Mixed, 13.5 Mbps, BPSK)	WLAN	8.07	
10119         CAC         IEEE 802.11n (HT Mixed, 135 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %.           10140         CAE         LTE-FDD         (6.57)         ± 9.6 %.           10141         CAE         LTE-FDD         (6.53)         ± 9.6 %.           10142         CAE         LTE-FDD         (6.53)         ± 9.6 %.           10143         CAE         LTE-FDD         (6.53)         ± 9.6 %.           10144         CAE         LTE-FDD         (6.56)         ± 9.6 %.           10144         CAE         LTE-FDD         (6.56)         ± 9.6 %.           10146         CAF         LTE-FDD         (6.57)         ± 9.6 %.           10146         CAF         LTE-FDD         (6.52)         ± 9.6 %.           10147         CAF         LTE-FDD         (6.52)         ± 9.6 %.           10149         CAE         LTE-FDD         (6.52)         ± 9.6 %.           10141         CAE         LTE-FDD         (6.22)         ± 9.6 %.           10151         CAG         LTE-FDD         (6.22)         ± 9.6 %.           10145         CAE         LTE-FDD         (6.72)         ± 9.6 %.           10152         CAG		CAC	IEEE 802.11n (HT Mixed, 81 Mbps, 16-QAM)			
10140         CAE         LTE-FDD         66.49         ± 9 6 %           10141         CAE         LTE-FDD         65.73         ± 9 6 %           10142         CAE         LTE-FDD         65.73         ± 9 6 %           10143         CAE         LTE-FDD         65.73         ± 9 6 %           10144         CAE         LTE-FDD         65.73         ± 9 6 %           10144         CAE         LTE-FDD         65.75         ± 9 6 %           10144         CAE         LTE-FDD         65.75         ± 9 6 %           10146         CAF         LTE-FDD         65.75         ± 9 6 %           10146         CAF         LTE-FDD         10 7 %         R8.14 MHz, 64-QAM)         LTE-FDD         6.62         ± 9 6 %           10147         CAE         LTE-FDD         10 7 %         R8.14 MHz, 64-QAM)         LTE-FDD         6.62         ± 9 6 %           10150         CAG         LTE-FDD         10 7 %         R8.20 MHz, 64-QAM)         LTE-FDD         5.75         ± 9 6 %           10151         CAG         LTE-FDD         10 7 %         R8.20 MHz, 16-QAM)         LTE-FDD         5.75         ± 9 6 %           10152         CAG         LTE-FDD <td></td> <td>CAC</td> <td>IEEE 802.11n (HT Mixed, 135 Mbps, 64-QAM)</td> <td></td> <td></td> <td></td>		CAC	IEEE 802.11n (HT Mixed, 135 Mbps, 64-QAM)			
10141         CAE         LTE-FDD         65.3         = 59.6%           10142         CAE         LTE-FDD         65.3         = 59.6%           10143         CAE         LTE-FDD         65.3         = 59.6%           10144         CAE         LTE-FDD         65.3         # 96.%           10144         CAE         LTE-FDD         65.65         # 96.%           10144         CAE         LTE-FDD         65.76         ± 96.6%           10145         CAF         LTE-FDD         65.76         ± 96.6%           10146         CAF         LTE-FDD         65.72         ± 9.6 %           10147         CAF         LTE-FDD         (65.79M.A. 100% RB.1 4 MHz, 16-CAM)         LTE-FDD         6.42         ± 9.6 %           10149         CAE         LTE-FDD         (65.79M.A. 50% RB.2 0 MHz, 16-CAM)         LTE-FDD         6.42         ± 9.6 %           10151         CAG         LTE-FDD         (65.79M.A. 50% RB.2 0 MHz, 16-CAM)         LTE-FDD         5.72         ± 9.6 %           10152         CAG         LTE-FDD         (65.79M.A. 50% RB.2 0 MHz, 16-CAM)         LTE-FDD         5.73         ± 9.6 %           10156         CAG         LTE-FDD         (65.79M.A. 50% RB.2 0 M	10140	CAE				
10143         CAE         LITE-FDD         5.73         # 9.9 %           10143         CAE         LITE-FDD         65.73         # 9.9 %           10144         CAE         LITE-FDD         65.65         # 9.6 %           10145         CAF         LITE-FDD         65.76         # 9.6 %           10146         CAF         LITE-FDD         65.76         # 9.6 %           10146         CAF         LITE-FDD         65.77         # 9.6 %           10147         CAF         LITE-FDD         65.72         # 9.6 %           10149         CAE         LITE-FDD         65.72         # 9.6 %           10149         CAE         LITE-FDD         (65.70 M, 50% RB, 20 MHz, 04-CAM)         LITE-FDD         6.62         # 9.6 %           10151         CAG         LITE-FDD         (65.70 M, 50% RB, 20 MHz, 16-CAM)         LITE-FDD         9.02         # 9.6 %           10152         CAG         LITE-FDD         (65.70 M, 50% RB, 20 MHz, 16-CAM)         LITE-FDD         10.05 & 9.6 %           10153         CAG         LITE-FDD         (65.70 M, 50% RB, 10 MHz, 20 FSK)         LITE-FDD         5.79 & # 9.6 %           10155         CAG         LITE-FDD         (65.70 M, 50% RB, 5 MHz, 20 FSK)	10141	CAE	LTE-FDD (SC-FDMA, 100% RB, 15 MHz, 64-QAM)		· · · · · · · · · · · · · · · · · · ·	
10143         CAE         LTE-FDD         (56, 27)           10144         CAE         LTE-FDD         (56, 27)         (57)	10142	CAE	LTE-FDD (SC-FDMA, 100% RB, 3 MHz, QPSK)			
10144         CAE         LTE-FDD         6.65         9.9 %           10145         CAF         LTE-FDD         65.76         ± 9.6 %           10146         CAF         LTE-FDD         65.77         ± 9.6 %           10146         CAF         LTE-FDD         65.77         ± 9.6 %           10147         CAF         LTE-FDD         65.72         ± 9.6 %           10149         CAE         LTE-FDD         65.72         ± 9.6 %           10160         CAE         LTE-FDD         (65.70 MA, 50% RB, 20 MHz, 16-QAM)         LTE-FDD         6.60         ± 9.6 %           10151         CAG         LTE-TDD         (9.27 FDMA, 50% RB, 20 MHz, 40-QAM)         LTE-TDD         9.92         ± 9.6 %           10152         CAG         LTE-TDD         (9.5C-FDMA, 50% RB, 20 MHz, 16-QAM)         LTE-FDD         6.75         ± 9.6 %           10153         CAG         LTE-FDD         (5C-FDMA, 50% RB, 50 MHz, QPSK)         LTE-FDD         6.76         ± 9.6 %           10155         CAG         LTE-FDD         (5C-FDMA, 50% RB, 5 MHz, QPSK)         LTE-FDD         6.76         ± 9.6 %           10157         CAG         LTE-FDD         (5C-FDMA, 50% RB, 5 MHz, QPSK)         LTE-FDD         6.49 ± 9.6 %<	10143					
10146         CAF         LTE-FDD         (5.76         ±9.6 %           10146         CAF         LTE-FDD         (5.77         ±9.6 %           10147         CAF         LTE-FDD         (5.77         ±9.6 %           10149         CAF         LTE-FDD         (5.77         ±9.6 %           10149         CAF         LTE-FDD         (5.77         ±9.6 %           10151         CAG         LTE-TDD         (5.77         ±9.6 %           10152         CAG         LTE-TDD         (5.77         ±9.6 %           10153         CAG         LTE-TDD         (5.77         ±9.6 %           10154         CAG         LTE-TDD         (5.77         ±9.6 %           10155         CAG         LTE-TDD         (5.77         ±9.6 %           10156         CAG         LTE-FDD         (5.77         ±9.6 %           10156         CAG         LTE-FDD         (5.77         ±9.6 %           10157         CAG         LTE-FDD         (5.77         ±9.6 %           10157         CAG         LTE-FDD         (5.78         ±9.6 %           10156         CAG         LTE-FDD         (5.78         ±9.6 % <t< td=""><td>10144</td><td></td><td>LTE-FDD (SC-FDMA, 100% BB, 3 MHz, 64-OAM)</td><td></td><td></td><td></td></t<>	10144		LTE-FDD (SC-FDMA, 100% BB, 3 MHz, 64-OAM)			
10146         CAF         LTE-FDD         65.7         12.8         7           10147         CAF         LTE-FDD         65.7         12.8         6%           10149         CAE         LTE-FDD         65.7         19.6         6%         11.6         6%         19.6         6%         10.6         19.6         6%         11.6         6%         19.6         6%         11.6         6%         19.6         6%         11.6         6%         19.6         6%         11.6         6%         11.6         6%         11.6         6%         11.6         6%         11.6         6%         11.6         6%         11.6         6%         11.6         6%         11.6         6%         11.6	10145		LTE-EDD (SC-EDMA 100% BB 14 MHz OPSK)			
10147         CAF         LTE-FDD         SC-FDMA, 100% RB, 14 MHz, 16-GAM)         LTE-FDD         6.72         ±9.6 %           10149         CAE         LTE-FDD         (SC-FDMA, 50% RB, 20 MHz, 16-GAM)         LTE-FDD         6.42         ±9.6 %           10150         CAE         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-GAM)         LTE-FDD         6.60         ±9.6 %           10151         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 16-GAM)         LTE-FDD         9.28         ±9.6 %           10152         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 16-GAM)         LTE-FDD         10.05         ±9.6 %           10154         CAG         LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 16-GAM)         LTE-FDD         5.76         ±9.6 %           10155         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 0PSK)         LTE-FDD         5.79         ±9.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 0PSK)         LTE-FDD         6.43         ±9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 0-GAM)         LTE-FDD         6.42         ±9.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 0-GAM)         LTE-FDD         6.43         ±9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50% R						
10149         CAE         LTE-FDD         (SC-FDMA, 50%, RB, 20 MHz, 16-QAM)         LTE-FDD         6.42         19.6 %           10150         CAE         LTE-FDD         (SC-FDMA, 50%, RB, 20 MHz, 04-QAM)         LTE-FDD         6.60         ±9.6 %           10151         CAG         LTE-TDD         (SC-FDMA, 50%, RB, 20 MHz, 16-QAM)         LTE-TDD         9.22         ±9.6 %           10152         CAG         LTE-TDD         (SC-FDMA, 50%, RB, 20 MHz, 16-QAM)         LTE-TDD         9.92         ±9.6 %           10154         CAG         LTE-TDD         (SC-FDMA, 50%, RB, 10 MHz, 04-QN)         LTE-FDD         6.75         ±9.6 %           10155         CAG         LTE-FDD         (SC-FDMA, 50%, RB, 5 MHz, 04-QAM)         LTE-FDD         6.43         ±9.6 %           10156         CAG         LTE-FDD         (SC-FDMA, 50%, RB, 5 MHz, 04-QAM)         LTE-FDD         6.62         ±9.6 %           10159         CAG         LTE-FDD         (SC-FDMA, 50%, RB, 15 MHz, 04-QAM)         LTE-FDD         6.56         ±9.6 %           10160         CAE         LTE-FDD         (SC-FDMA, 50%, RB, 15 MHz, 04-QAM)         LTE-FDD         6.56         ±9.6 %           10161         CAE         LTE-FDD         (SC-FDMA, 50%, RB, 16 MHz, 04-QAM)         LTE-FD						
10150         CAE         LTE-FDD         SC-FDMA, 50% RB, 20 MHz, GPSK)         LTE-FDD         6.66         ± 9.6 %           10151         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, GCAM)         LTE-TDD         9.28         ± 9.6 %           10152         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, GCAM)         LTE-TDD         10.05         ± 9.6 %           10153         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, G-GAM)         LTE-TDD         10.05         ± 9.6 %           10154         CAG         LTE-TDD (SC-FDMA, 50% RB, 50 MHz, G+GAM)         LTE-FDD         5.75         ± 9.6 %           10155         CAG         LTE-FDD (SC-FDMA, 50% RB, 50 MHz, G+GAM)         LTE-FDD         6.43         ± 9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50% RB, 50 MHz, G+GAM)         LTE-FDD         6.42         ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50% RB, 50 MHz, G+GAM)         LTE-FDD         6.62         ± 9.6 %           10169         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, G+GAM)         LTE-FDD         6.82         ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, G+GAM)         LTE-FDD         6.82         ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50% RB, 14 MHz,			TE-EDD (SC-EDMA, 100% RB, 20 MHz, 16 OAM)			
10151       CAG       LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 60-AM)       LTE-TDD       9.28       ±0.6 %         10152       CAG       LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 64-QAM)       LTE-TDD       10.06       ±9.6 %         10154       CAG       LTE-TDD (SC-FDMA, 50% RB, 10 MHz, QPSK)       LTE-FDD       5.75       ±9.6 %         10155       CAG       LTE-FDD (SC-FDMA, 50% RB, 10 MHz, QPSK)       LTE-FDD       6.43       ±9.6 %         10156       CAG       LTE-FDD (SC-FDMA, 50% RB, 5 MHz, QPSK)       LTE-FDD       6.49       ±9.6 %         10157       CAG       LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM)       LTE-FDD       6.62       ±9.6 %         10158       CAG       LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)       LTE-FDD       6.62       ±9.6 %         10160       CAE       LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)       LTE-FDD       5.82       ±9.6 %         10161       CAE       LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)       LTE-FDD       6.43       ±9.6 %         10162       CAE       LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 0PSK)       LTE-FDD       6.48       ±9.6 %         10162       CAE       LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 0PSK)       LTE-FDD       6.48       ±9.6 %         10162       CAE			TE-EDD (SC-EDMA 50% PP 20 MUL- CA CAMA	1 · · · · · · · · · · · · · · · · · · ·		
10152         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 16-QAM)         LTE-TDD         9.92         ± 9.6 %           10153         CAG         LTE-TDD (SC-FDMA, 50% RB, 10 MHz, Q-PSK)         LTE-FDD         5.7 ± 9.6 %           10155         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, Q-PSK)         LTE-FDD         5.7 ± 9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, Q-PSK)         LTE-FDD         5.7 ± 9.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, Q-PSK)         LTE-FDD         5.6 ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, Q-PSK)         LTE-FDD         6.62 ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, Q-GAM)         LTE-FDD         6.62 ± 9.6 %           10160         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.43 ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.48 ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, QPSK)         LTE-FDD         6.48 ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, QPSK)         LTE-FDD         6.73 ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 17 KB, 20 MHz,			TE-TOD (00-10WA, 00% RD, 20 WH- 0000)			
10153         CAG         LTE-TDD (SC-FDMA, 50%, RB, 20 MHz, 64-0AM)         LTE-TDD         10.06         ±9.6 %           10154         CAG         LTE-FDD (SC-FDMA, 50%, RB, 10 MHz, QPSK)         LTE-FDD         6.75         ±9.6 %           10155         CAG         LTE-FDD (SC-FDMA, 50%, RB, 10 MHz, QPSK)         LTE-FDD         6.43         ±9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50%, RB, 10 MHz, 16-QAM)         LTE-FDD         6.43         ±9.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50%, RB, 10 MHz, 64-QAM)         LTE-FDD         6.62         ±9.6 %           10160         CAG         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 64-QAM)         LTE-FDD         5.82         ±9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 64-QAM)         LTE-FDD         6.63         ±9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 64-QAM)         LTE-FDD         6.43         ±9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 64-QAM)         LTE-FDD         6.43         ±9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50%, RB, 14 MHz, 0FSK)         LTE-FDD         6.48         ±9.6 %           10162         CAF         LTE-FDD (SC-FDMA, 50%, RB, 14 MHz, 0FSK) <td></td> <td></td> <td>TETETED (SC EDMA 50% BB 20 MUL 40 CAME</td> <td></td> <td></td> <td></td>			TETETED (SC EDMA 50% BB 20 MUL 40 CAME			
10154         CAG         LTE-FDD         SC:FDMA, 50%, RB, 10 MHz, GPSK)         LTE-FDD         5.75         ± 9.6 %           10155         CAG         LTE-FDD (SC-FDMA, 50%, RB, 10 MHz, 16-QAM)         LTE-FDD         6.43         ± 9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50%, RB, 5 MHz, 16-QAM)         LTE-FDD         6.49         ± 9.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50%, RB, 5 MHz, 16-QAM)         LTE-FDD         6.49         ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 64-QAM)         LTE-FDD         6.62         ± 9.6 %           10160         CAE         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 64-QAM)         LTE-FDD         6.64         ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 64-QAM)         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50%, RB, 14 MHz, QPSK)         LTE-FDD         6.44         ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50%, RB, 14 MHz, GP-QAM)         LTE-FDD         6.21         ± 9.6 %           10167         CAF         LTE-FDD (SC-FDMA, 178, 20 MHz, 64-QAM)         LTE-FDD         6.73         ± 9.6 %           10168         CAF         LTE-FDD (SC-FDMA, 50%,			LTE TOD (SO FDMA 50% RB, 20 MHZ, 16-QAM)			
10155         CAG         LTE-FDD         Sci 200, NHz, 16-QAM)         LTE-FDD         6.43         ± 8.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50%, RB, 5 MHz, QPSK)         LTE-FDD         5.79         ± 9.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50%, RB, 5 MHz, 16-QAM)         LTE-FDD         6.62         ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50%, RB, 5 MHz, 16-QAM)         LTE-FDD         6.62         ± 9.6 %           10159         CAG         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 16-QAM)         LTE-FDD         6.62         ± 9.6 %           10160         CAE         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 16-QAM)         LTE-FDD         6.43         ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 16-QAM)         LTE-FDD         6.44         ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50%, RB, 14 MHz, 16-QAM)         LTE-FDD         6.74         ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50%, RB, 14 MHz, 16-QAM)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 17 MB, 20 MHz, 16-QAM)         LTE-FDD         6.73         ± 9.6 %           10171         CAG         LTE-FDD (SC-FDMA, 17 RB, 20 MHz,						
10156         CAG         LTE-FDD         SC.FDMA, 50%, RB, 5 MHz, QPSK)         LTE-FDD         5.79         ± 0.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50%, RB, 5 MHz, 16-QAM)         LTE-FDD         6.49         ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50%, RB, 5 MHz, 64-QAM)         LTE-FDD         6.62         ± 9.6 %           10160         CAE         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, QCAM)         LTE-FDD         5.82         ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, QCAM)         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50%, RB, 14 MHz, QCSK)         LTE-FDD         6.43         ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50%, RB, 14 MHz, QCSK)         LTE-FDD         6.42         ± 9.6 %           10167         CAE         LTE-FDD (SC-FDMA, 50%, RB, 14 MHz, QCSK)         LTE-FDD         6.79         ± 9.6 %           10168         CAF         LTE-FDD (SC-FDMA, 10%, 20% RB, 14 MHz, QCSK)         LTE-FDD         6.79         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 10%, 20 MHz, QCSK)         LTE-FDD         6.73         ± 9.6 %           10171         CAE         LTE-FDD (SC-FDMA, 17 B, 20 MHz,			LIE-FUD (SU-FUMA, SU% KB, 10 MHZ, QPSK)		and the second se	
10157         CAG         LTE-FDD (SC-FDMA, 50% RB, 6 MHz, 16-QAM)         LTE-FDD         6.49         13.06 %           10158         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM)         LTE-FDD         6.62         19.6 %           10169         CAC         LTE-FDD (SC-FDMA, 50% RB, 55 MHz, 26-QAM)         LTE-FDD         6.56         19.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 26-QAM)         LTE-FDD         6.58         19.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.58         19.6 %           10163         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 46-QAM)         LTE-FDD         6.46         19.6 %           10168         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 64-QAM)         LTE-FDD         6.41         19.6 %           10169         CAE         LTE-FDD (SC-FDMA, 10%, 20 MHz, 16-QAM)         LTE-FDD         5.73         19.6 %           10170         CAE         LTE-FDD (SC-FDMA, 178, 20 MHz, 64-QAM)         LTE-FDD         6.52         19.6 %           10171         AAE         LTE-FDD (SC-FDMA, 178, 20 MHz, 64-QAM)         LTE-FDD         6.52         19.6 %           10172         CAG         LTE-FDD (SC-FDMA, 178, 20 MHz, 64-QAM)         LT			LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM)			
10158       CAG       LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM)       LTE-FDD       6.62       ± 9.6 %         10159       CAG       LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM)       LTE-FDD       6.56       ± 9.6 %         10160       CAE       LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)       LTE-FDD       6.43       ± 9.6 %         10161       CAE       LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)       LTE-FDD       6.43       ± 9.6 %         10162       CAE       LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 0FSK)       LTE-FDD       6.43       ± 9.6 %         10166       CAF       LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 0FSK)       LTE-FDD       6.79       ± 9.6 %         10168       CAF       LTE-FDD (SC-FDMA, 18, 20 MHz, 16-QAM)       LTE-FDD       6.79       ± 9.6 %         10170       CAE       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       6.52       ± 9.6 %         10171       CAG       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       6.49       ± 9.6 %         10172       CAG       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       6.49       ± 9.6 %         10172       CAG       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       9.21       ± 9.6 %         10176       CAG			LTE-FDD (SC-FDMA, 50% RB, 5 MHz, QPSK)		5.79	
10159         CAG         LTE-FDD         6.56         ± 9.6 %           10160         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, QPSK)         LTE-FDD         5.82         ± 9.6 %           10161         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.43         ± 9.6 %           10166         CAF         LTE-FDD         (SC-FDMA, 50% RB, 14 MHz, QPSK)         LTE-FDD         6.21         ± 9.6 %           10169         CAF         LTE-FDD         (SC-FDMA, 50% RB, 14 MHz, QPSK)         LTE-FDD         6.79         ± 9.6 %           10169         CAE         LTE-FDD (SC-FDMA, 182, 20 MHz, 16-QAM)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-FDD         6.49         ± 9.6 %           10171         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-FDD         9.48         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-FDD         9.48         ± 9.6 %           10174         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 M			LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM)		6.49	
10160         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, QPSK)         LTE-FDD         5.82         ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 04-QAM)         LTE-FDD         6.54         ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 04-QAM)         LTE-FDD         6.74         ± 9.6 %           10168         CAF         LTE-FDD (SC-FDMA, 18B, 20 MHz, 04-QAM)         LTE-FDD         6.71         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 04-QAM)         LTE-FDD         6.52         ± 9.6 %           10171         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 04-QAM)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 04-QAM)         LTE-FDD         9.21         ± 9.6 %           10173         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)         LTE-FDD         9.21         ± 9.6 %           10174         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 04-QAM)         LTE-FDD         9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 04-QAM)         LTE-FDD			LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM)		6.62	± 9.6 %
10161         CAE         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD         6.58         ± 9.6 %           10166         CAF         LTE-FDD         (5.67)         ± 9.6 %           10167         CAF         LTE-FDD         (5.67)         ± 9.6 %           10168         CAF         LTE-FDD         (5.71)         ± 9.6 %           10168         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 178, 20 MHz, 0PSK)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 178, 20 MHz, 04-QAM)         LTE-FDD         6.49         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 178, 20 MHz, 16-QAM)         LTE-FDD         9.44         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 178, 20 MHz, 16-QAM)         LTE-FDD         9.44         ± 9.6 %           10174         CAG         LTE-FDD (SC-FDMA, 178, 20 MHz, 16-QAM)         LTE-FDD         5.72         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDM			LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM)		6.56	±9.6 %
10162         CAE         LTE-FDD         6.53         ± 9.6 %           10166         CAF         LTE-FDD         6.54         ± 9.6 %           10166         CAF         LTE-FDD         (5.46         ± 9.6 %           10167         CAF         LTE-FDD         (5.21         ± 9.6 %           10168         CAF         LTE-FDD         (5.21         ± 9.6 %           10168         CAF         LTE-FDD         (5.73         ± 9.6 %           10169         CAE         LTE-FDD         (5.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-FDD         6.52         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-FDD         9.48         ± 9.6 %           10173         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-FDD         9.48         ± 9.6 %           10174         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-FDD         5.72         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, G4-QAM)         LTE-FDD				LTE-FDD	5.82	
10162         CAE         LTE-FDD         6.58         ± 9.6 %           10166         CAF         LTE-FDD         6.46         ± 9.6 %           10167         CAF         LTE-FDD         6.46         ± 9.6 %           10168         CAF         LTE-FDD         6.21         ± 9.6 %           10169         CAF         LTE-FDD         6.79         ± 9.6 %           10169         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-FDD         6.44         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-TDD         9.21         ± 9.6 %           10172         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-TDD         9.21         ± 9.6 %           10173         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-TDD         10.25         ± 9.6 %           10174         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-FDD         5.72         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, GPSK)         LTE-FDD         5.72         ± 9.6 %           10176				LTE-FDD	6.43	± 9.6 %
10166       CAF       LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 0PSK)       LTE-FDD       6.46       ± 9.6 %         10167       CAF       LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)       LTE-FDD       6.79       ± 9.6 %         10168       CAF       LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM)       LTE-FDD       6.79       ± 9.6 %         10170       CAE       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       6.52       ± 9.6 %         10171       AAE       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       6.48       ± 9.6 %         10172       CAG       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       9.21       ± 9.6 %         10173       CAG       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       9.48       ± 9.6 %         10173       CAG       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 04-QAM)       LTE-FDD       9.48       ± 9.6 %         10175       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 04-QAM)       LTE-FDD       5.72       ± 9.6 %         10176       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 04-QAM)       LTE-FDD       5.72       ± 9.6 %         10177       CAI       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 04-QAM)       LTE-FDD       5.73       ± 9.6 %         10178       CAG			LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 64-QAM)	LTE-FDD	6.58	
10167         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.21         ± 9.6 %           10168         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 0PSK)         LTE-FDD         6.52         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-FDD         9.21         ± 9.6 %           10173         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)         LTE-FDD         9.21         ± 9.6 %           10174         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 04-QAM)         LTE-FDD         9.22         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM)         LTE-FDD         5.72         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 04-QAM)         LTE-FDD         6.52         ± 9.6 %           10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)         LTE			LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, QPSK)	LTE-FDD		
10168       CAF       LTE-FDD (SC-FDMA, 10% RB, 1.4 MHz, 64-QAM)       LTE-FDD       6.79       ± 9.6 %         10169       CAE       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)       LTE-FDD       6.52       ± 9.6 %         10171       CAE       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       6.49       ± 9.6 %         10171       AAE       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       6.49       ± 9.6 %         10172       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-TDD       9.21       ± 9.6 %         10173       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-TDD       9.48       ± 9.6 %         10175       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)       LTE-FDD       5.72       ± 9.6 %         10176       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)       LTE-FDD       5.73       ± 9.6 %         10176       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)       LTE-FDD       5.73       ± 9.6 %         10177       CAI       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)       LTE-FDD       6.52       ± 9.6 %         10179       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)       LTE-FDD       6.50       ± 9.6 %         10180       CAE       LT		CAF	LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)	LTE-FDD		
10169         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-TDD         9.21         ± 9.6 %           10172         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-TDD         9.21         ± 9.6 %           10173         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-TDD         9.48         ± 9.6 %           10174         CAG         LTE-TDD (SC-FDMA, 1 RB, 10 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10177         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QAM)         LTE-FDD         5.72         ± 9.6 %           10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QAM)         LTE-FDD         6.52         ± 9.6 %           10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QAM)         LTE-FDD         5.	10168	CAF	LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM)	LTE-FDD		
10170       CAE       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)       LTE-FDD       6.52       ± 9.6 %         10171       AAE       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)       LTE-FDD       6.49       ± 9.6 %         10172       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK)       LTE-TDD       9.21       ± 9.6 %         10173       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)       LTE-TDD       9.48       ± 9.6 %         10174       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-TDD       9.48       ± 9.6 %         10175       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)       LTE-FDD       5.72       ± 9.6 %         10176       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)       LTE-FDD       5.73       ± 9.6 %         10177       CAI       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)       LTE-FDD       5.73       ± 9.6 %         10178       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)       LTE-FDD       6.52       ± 9.6 %         10178       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)       LTE-FDD       6.50       ± 9.6 %         10180       CAG       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)       LTE-FDD       6.52       ± 9.6 %         10182       CAE       LTE-FDD (S	10169	CAE	LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)	and the second se		
10171       AAE       LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-FDD       6.49       ± 9.6 %         10172       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK)       LTE-TDD       9.21       ± 9.6 %         10173       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK)       LTE-TDD       9.48       ± 9.6 %         10174       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)       LTE-TDD       10.25       ± 9.6 %         10175       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM)       LTE-FDD       5.72       ± 9.6 %         10176       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)       LTE-FDD       6.52       ± 9.6 %         10177       CAI       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)       LTE-FDD       6.52       ± 9.6 %         10178       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 04-QAM)       LTE-FDD       6.52       ± 9.6 %         10179       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 04-QAM)       LTE-FDD       6.50       ± 9.6 %         10180       CAE       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 04-QAM)       LTE-FDD       6.52       ± 9.6 %         10181       CAE       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 04-QAM)       LTE-FDD       6.52       ± 9.6 %         10183       AAD       LTE	10170	CAE	LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)			
10172       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK)       LTE-TDD       9.21       ± 9.6 %         10173       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)       LTE-TDD       9.48       ± 9.6 %         10174       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-TDD       10.25       ± 9.6 %         10175       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)       LTE-FDD       5.72       ± 9.6 %         10176       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)       LTE-FDD       6.52       ± 9.6 %         10177       CAI       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)       LTE-FDD       5.73       ± 9.6 %         10178       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)       LTE-FDD       6.52       ± 9.6 %         10178       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 04-QAM)       LTE-FDD       6.50       ± 9.6 %         10180       CAG       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 0PSK)       LTE-FDD       6.50       ± 9.6 %         10181       CAE       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 0PSK)       LTE-FDD       6.52       ± 9.6 %         10182       CAE       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 0PSK)       LTE-FDD       6.52       ± 9.6 %         10182       CAE       LTE-FDD	10171	AAE	LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)			
10173       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)       LTE-TDD       9.48       ± 9.6 %         10174       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-TDD       10.25       ± 9.6 %         10175       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)       LTE-FDD       5.72       ± 9.6 %         10176       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)       LTE-FDD       5.73       ± 9.6 %         10177       CAI       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)       LTE-FDD       5.73       ± 9.6 %         10178       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)       LTE-FDD       6.52       ± 9.6 %         10179       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)       LTE-FDD       6.50       ± 9.6 %         10180       CAG       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 20PSK)       LTE-FDD       5.72       ± 9.6 %         10181       CAE       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)       LTE-FDD       5.72       ± 9.6 %         10183       AAD       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 04-QAM)       LTE-FDD       6.50       ± 9.6 %         10183       CAE       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 04-QAM)       LTE-FDD       6.51       ± 9.6 %         10184       CAE       LT	10172	CAG	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK)			
10174       CAG       LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)       LTE-TDD       10.25       ± 9.6 %         10175       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)       LTE-FDD       5.72       ± 9.6 %         10176       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)       LTE-FDD       6.52       ± 9.6 %         10177       CAI       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)       LTE-FDD       6.52       ± 9.6 %         10178       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)       LTE-FDD       6.52       ± 9.6 %         10179       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)       LTE-FDD       6.50       ± 9.6 %         10180       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)       LTE-FDD       6.50       ± 9.6 %         10181       CAE       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 0-QAM)       LTE-FDD       5.72       ± 9.6 %         10182       CAE       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 0-QAM)       LTE-FDD       5.73       ± 9.6 %         10183       AAD       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 0-QAM)       LTE-FDD       5.73       ± 9.6 %         10184       CAE       LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)       LTE-FDD       5.73       ± 9.6 %         10185       CAE       LTE-FDD (SC-	10173	CAG	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)			
10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 04-QAM)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 04-QAM)         LTE-FDD         5.72         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 04-QAM)         LTE-FDD         5.73         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 04-QAM)         LTE-FDD	10174	CAG				
10176         CAG         LTE-FDD         (SC-FDMA, 1 RB, 10 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         6.51         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         6.51         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FD	10175	CAG				
10177       CAI       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)       LTE-FDD       5.73       ±9.6 %         10178       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)       LTE-FDD       6.52       ±9.6 %         10179       CAG       LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)       LTE-FDD       6.50       ±9.6 %         10180       CAG       LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)       LTE-FDD       6.50       ±9.6 %         10181       CAE       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)       LTE-FDD       5.72       ±9.6 %         10182       CAE       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)       LTE-FDD       6.52       ±9.6 %         10182       CAE       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)       LTE-FDD       6.50       ±9.6 %         10183       AAD       LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)       LTE-FDD       5.73       ±9.6 %         10184       CAE       LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)       LTE-FDD       5.73       ±9.6 %         10185       CAE       LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)       LTE-FDD       5.73       ±9.6 %         10186       AAE       LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)       LTE-FDD       5.73       ±9.6 %         10187       CAF       LTE-FDD (SC-FDMA, 1 RB, 1						
10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, G4-QAM)         LTE-FDD	jamma to containing and		LTE-FDD (SC-FDMA, 1 RB, 5 MHz, OPSK)			
10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 0PSK)         LTE-FDD         5.73         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 0PSK)         LTE-FDD         6.50         ± 9.6 %           10186         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD			LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-0AM)			
10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.51         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD <td></td> <td></td> <td></td> <td></td> <td></td> <td></td>						
10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, G4-QAM)         LTE-FDD         6.51         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, G4-QAM)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, G4-QAM)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN </td <td></td> <td></td> <td></td> <td></td> <td></td> <td></td>						
10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN			1TE-EDD (SC-EDMA 1 RR 15 MHz ODCV)			
10183       AAD       LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)       LTE-FDD       6.50       ± 9.6 %         10184       CAE       LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)       LTE-FDD       5.73       ± 9.6 %         10185       CAE       LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)       LTE-FDD       5.73       ± 9.6 %         10185       CAE       LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)       LTE-FDD       6.51       ± 9.6 %         10186       AAE       LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)       LTE-FDD       6.50       ± 9.6 %         10187       CAF       LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)       LTE-FDD       5.73       ± 9.6 %         10188       CAF       LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)       LTE-FDD       6.52       ± 9.6 %         10189       AAF       LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, G4-QAM)       LTE-FDD       6.50       ± 9.6 %         10193       CAC       IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)       WLAN       8.09       ± 9.6 %         10194       CAC       IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)       WLAN       8.12       ± 9.6 %         10195       CAC       IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)       WLAN       8.12       ± 9.6 %         10196       CAC			$\frac{1}{1} = \frac{1}{100} \frac{1}$			
10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.51         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.51         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLA						
10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.51         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 14 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WL						
10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.10         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.13         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)						
10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         5.73         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.10         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %						
10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.11         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.10         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %						
10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.11         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %			LTE-FUD (SU-FUMA, 1 KB, 1.4 MHz, QPSK)			the second se
10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 39 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.21         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %			LTE-FDD (SC-FDMA, 1 KB, 1.4 MHz, 16-QAM)		******	
10194         CAC         IEEE 802.11n (HT Greenfield, 39 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.21         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %			LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)			± 9.6 %
10194         CAC         IEEE 802.11n (HT Greenfield, 39 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.21         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %			IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)		8.09	±9.6 %
10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.21         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %			IEEE 802.11n (HT Greenfield, 39 Mbps, 16-QAM)	WLAN		
10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %			IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)	WLAN		
10197         CAC         IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %			IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)			
10198 CAC IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM) WLAN 8.27 ± 9.6 %			IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)			
			IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)			
	10219	CAC	IEEE 802.11n (HT Mixed, 7.2 Mbps, BPSK)	WLAN	8.03	± 9.6 %

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10220	CAC	IEEE 802.11n (HT Mixed, 43.3 Mbps, 16-QAM)	WLAN	8.13	± 9.6 %
10221	CAC	IEEE 802.11n (HT Mixed, 72.2 Mbps, 64-QAM)	WLAN	8.27	±9.6 %
10222	CAC	IEEE 802.11n (HT Mixed, 15 Mbps, BPSK)	WLAN	8.06	$\pm 9.6\%$
10223	CAC	IEEE 802.11n (HT Mixed, 90 Mbps, 16-QAM)	WLAN	8.48	± 9.6 % ± 9.6 %
10224	CAC	IEEE 802.11n (HT Mixed, 150 Mbps, 64-QAM)	*****	8.08	
10225	CAB	UMTS-FDD (HSPA+)		5.97	± 9.6 %
10226	CAA	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)	LTE-TDD	9.49	±9.6%
10227	CAA	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)	LTE-TDD	10.26	± 9.6 %
10228	CAA	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)	LTE-TDD	9.22	± 9.6 %
10229	CAC	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10230	CAC	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10231	CAC	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, QPSK)	LTE-TDD	9.19	<u>±9.6 %</u> ±9.6 %
10232	CAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)	LTE-TDD	9.48 10.25	
10233	CAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)	LTE-TDD		± 9.6 %
10234	CAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK)	LTE-TDD	9.21	±9.6%
10235	CAF	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10236	CAF	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10237	CAF	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, QPSK)	LTE-TDD	9.21	± 9.6 %
10238	CAF	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10239	CAF	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)	LTE-TDD	10.25	$\pm 9.6\%$
10240	CAF	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, QPSK)	LTE-TDD	9.21	$\pm 9.6\%$
10241	CAA	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)	LTE-TDD	9.82	± 9.6 %
10242	CAA	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM)	LTE-TDD	9.86	± 9.6 %
10243	CAA	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, QPSK)	LTE-TDD	9.46	± 9.6 %
10244	CAC	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 16-QAM)	LTE-TDD	10.06	$\pm 9.6\%$
10245	CAC	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 64-QAM)	LTE-TDD	10.06	± 9.6 %
10246	CAC	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, QPSK)	LTE-TDD	9.30	±9.6%
10247	CAF	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM)	LTE-TDD	9.91	±9.6 %
10248	CAF	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM)	LTE-TDD	10.09	± 9.6 %
10249	CAF	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, QPSK)	LTE-TDD	9.29	± 9.6 %
10250	CAF	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM)	LTE-TDD	9.81	± 9.6 %
10251	CAF	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM)	LTE-TDD	10.17	± 9.6 %
10252	CAF	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, QPSK)	LTE-TDD	9.24	± 9.6 %
10253	CAF	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)	LTE-TDD	9.90	± 9.6 %
10254	CAF	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 64-QAM)	LTE-TDD	10.14	± 9.6 %
10255	CAF	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, QPSK)	LTE-TDD	9.20	± 9.6 %
10256	CAA	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, 16-QAM)	LTE-TDD	9.96	± 9.6 %
10257	CAA	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, 64-QAM)	LTE-TDD	10.08	± 9.6 %
10258	CAA	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, QPSK)	LTE-TDD	9.34	± 9.6 %
10259	CAC	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, 16-QAM)	LTE-TDD	9.98	± 9.6 %
10260	CAC	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, 64-QAM)	LTE-TDD	9.97	± 9.6 %
10261	CAC	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, QPSK)	LTE-TDD	9.24	± 9.6 %
10262	CAF	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, 16-QAM)	LTE-TDD	9.83	$\pm 9.6\%$
10263	CAF	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, 64-QAM)	LTE-TDD	10.16	± 9.6 %
10264	CAF	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, QPSK)	LTE-TDD	9,23	± 9.6 %
10265	CAF	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, 16-QAM)	LTE-TDD	9.92	± 9.6 %
10266	CAF	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, 64-QAM)	LTE-TDD	10.07	± 9.6 %
10267	CAF	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, QPSK)	LTE-TDD	9.30	± 9.6 %
10268	CAF	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, 16-QAM)	LTE-TDD	10.06	± 9.6 %
10269	CAF	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, 64-QAM)	LTE-TDD	10.13	± 9.6 %
10270	CAF	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, QPSK)	LTE-TDD	9.58	± 9.6 %
10274	CAB	UMTS-FDD (HSUPA, Subtest 5, 3GPP Rel8.10)	WCDMA	4.87	± 9.6 %
10275	CAB	UMTS-FDD (HSUPA, Subtest 5, 3GPP Rel8.4)	WCDMA	3.96	± 9.6 %
10277	CAA	PHS (QPSK)	PHS	11.81	±9.6 %
10278	CAA	PHS (QPSK, BW 884MHz, Rolloff 0.5)	PHS	11.81	± 9.6 %
10279	CAA	PHS (QPSK, BW 884MHz, Rolloff 0.38)	PHS	12.18	± 9.6 %
10290	AAB	CDMA2000, RC1, SO55, Full Rate	CDMA2000	3.91	± 9.6 %
10291	AAB	CDMA2000, RC3, SO55, Full Rate	CDMA2000	3.46	±9.6%
10292	AAB	CDMA2000, RC3, SO32, Full Rate	CDMA2000	3.39	± 9.6 %
10293	AAB	CDMA2000, RC3, SO3, Full Rate	CDMA2000	3.50	± 9.6 %
10000	AAB	CDMA2000, RC1, SO3, 1/8th Rate 25 fr.	CDMA2000	12.49	± 9.6 %
10295		LTE-FDD (SC-FDMA, 50% RB, 20 MHz, QPSK)	LTE-FDD	5.81	± 9.6 %
10295	AAD				
	AAD AAD	LTE-FDD (SC-FDMA, 50% RB, 3 MHz, QPSK) LTE-FDD (SC-FDMA, 50% RB, 3 MHz, QPSK) LTE-FDD (SC-FDMA, 50% RB, 3 MHz, 16-QAM)	LTE-FDD LTE-FDD	5.72 6.39	± 9.6 %

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10300	AAD	LTE-FDD (SC-FDMA, 50% RB, 3 MHz, 64-QAM)	LTE-FDD	6.60	± 9.6 %
10301	AAA	IEEE 802.16e WIMAX (29:18, 5ms, 10MHz, QPSK, PUSC)	WIMAX	12.03	± 9.6 %
10302	AAA	IEEE 802.16e WIMAX (29:18, 5ms, 10MHz, QPSK, PUSC, 3 CTRL symbols)	WIMAX	12.57	± 9.6 %
10303	AAA	IEEE 802.16e WIMAX (31:15, 5ms, 10MHz, 64QAM, PUSC)	WiMAX	12.52	± 9.6 %
10304	AAA	IEEE 802.16e WIMAX (29:18, 5ms, 10MHz, 64QAM, PUSC)	WIMAX	11.86	± 9.6 %
10305	AAA	IEEE 802.16e WIMAX (31:15, 10ms, 10MHz, 64QAM, PUSC, 15	WIMAX	15.24	± 9.6 %
10306	AAA	symbols) IEEE 802.16e WiMAX (29:18, 10ms, 10MHz, 64QAM, PUSC, 18	WiMAX	14.67	± 9.6 %
10307	AAA	symbols) IEEE 802.16e WiMAX (29:18, 10ms, 10MHz, QPSK, PUSC, 18	WIMAX	14.49	± 9.6 %
10308	AAA	symbols) IEEE 802.16e WiMAX (29:18, 10ms, 10MHz, 16QAM, PUSC)	10/:00/	44.40	
10309	AAA	IEEE 802.16e WIMAX (29:18, 10ms, 10MHz, 16QAM, POSC)	WIMAX WIMAX	14.46 14.58	± 9.6 %
		symbols)	VVIIV/32	14.00	± 9.6 %
10310	AAA	IEEE 802.16e WiMAX (29:18, 10ms, 10MHz, QPSK, AMC 2x3, 18 symbols)	WiMAX	14.57	± 9.6 %
10311	AAD	LTE-FDD (SC-FDMA, 100% RB, 15 MHz, QPSK)	LTE-FDD	6.06	± 9.6 %
10313	AAA	IDEN 1:3	IDEN	10.51	± 9.6 %
10314	AAA	IDEN 1:6	IDEN	13.48	± 9.6 %
10315	AAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 1 Mbps, 96pc duty cycle)	WLAN	1.71	± 9.6 %
10316	AAB	IEEE 802.11g WiFi 2.4 GHz (ERP-OFDM, 6 Mbps, 96pc duty cycle)	WLAN	8.36	± 9.6 %
10317	AAC	IEEE 802.11a WIFI 5 GHz (OFDM, 6 Mbps, 96pc duty cycle)	WLAN	8.36	± 9.6 %
10352	AAA	Pulse Waveform (200Hz, 10%)	Generic	10.00	± 9.6 9
10353	AAA	Pulse Waveform (200Hz, 20%)	Generic	6.99	± 9.6 9
10354	AAA	Pulse Waveform (200Hz, 40%)	Generic	3.98	± 9.6 %
10355	AAA	Pulse Waveform (200Hz, 60%)	Generic	2.22	± 9.6 %
10356	AAA	Pulse Waveform (200Hz, 80%)	Generic	0.97	± 9.6 %
10387	AAA	QPSK Waveform, 1 MHz	Generic	5.10	± 9.6 %
10388	AAA	QPSK Waveform, 10 MHz	Generic	5.22	±9.6 %
10396	AAA	64-QAM Waveform, 100 kHz	Generic	6.27	± 9.6 %
10399	AAA	64-QAM Waveform, 40 MHz	Generic	6.27	±9.6 %
10400	AAD	IEEE 802.11ac WiFi (20MHz, 64-QAM, 99pc duty cycle)	WLAN	8.37	± 9.6 %
10401	AAD	IEEE 802.11ac WiFI (40MHz, 64-QAM, 99pc duty cycle)	WLAN	8.60	± 9.6 %
10402	AAD	IEEE 802.11ac WiFi (80MHz, 64-QAM, 99pc duty cycle)	WLAN	8.53	± 9.6 %
10403	AAB	CDMA2000 (1xEV-DO, Rev. 0)	CDMA2000	3.76	± 9.6 %
10404	AAB	CDMA2000 (1xEV-DO, Rev. A)	CDMA2000	3.77	± 9.6 %
10406	AAB	CDMA2000, RC3, SO32, SCH0, Full Rate	CDMA2000	5.22	± 9.6 %
10410	AAF	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, QPSK, UL	LTE-TDD	7.82	± 9.6 %
		Subframe=2,3,4,7,8,9, Subframe Conf=4)			
10414	AAA	WLAN CCDF, 64-QAM, 40MHz	Generic	8.54	± 9.6 %
10415	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 1 Mbps, 99pc duty cycle)	WLAN	1.54	± 9.6 %
10416	AAA	IEEE 802.11g WiFi 2.4 GHz (ERP-OFDM, 6 Mbps, 99pc duty cycle)	WLAN	8.23	±9.6 %
10417	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 6 Mbps, 99pc duty cycle)	WLAN	8.23	± 9.6 %
10418	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps, 99pc duty cycle, Long preambule)	WLAN	8.14	± 9.6 %
10419	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps, 99pc duty cycle, Short preambule)	WLAN	8.19	± 9.6 %
10422	AAB	IEEE 802.11n (HT Greenfield, 7.2 Mbps, BPSK)	WLAN	8.32	± 9.6 %
10423	AAB	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM)	WLAN	8.47	± 9.6 %
10424	AAB	IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM)	WLAN	8.40	± 9.6 %
10425	AAB	IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK)	WLAN	8.41	± 9.6 %
10426	AAB	IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM)	WLAN	8.45	± 9.6 %
10427	AAB	IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM)	WLAN	8.41	± 9.6 %
10430	AAD	LTE-FDD (OFDMA, 5 MHz, E-TM 3.1)	LTE-FDD	8.28	± 9.6 %
10431	AAD	LTE-FDD (OFDMA, 10 MHz, E-TM 3.1)	LTE-FDD	8.38	± 9.6 %
10432	AAC	LTE-FDD (OFDMA, 15 MHz, E-TM 3.1)	LTE-FDD	8.34	± 9.6 %
10433	AAC	LTE-FDD (OFDMA, 20 MHz, E-TM 3.1)	LTE-FDD	8.34	± 9.6 %
10434	AAA	W-CDMA (BS Test Model 1, 64 DPCH)	WCDMA	8.60	± 9.6 %
10435	AAF	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10447	AAD	LTE-FDD (OFDMA, 5 MHz, E-TM 3.1, Clipping 44%)	LTE-FDD	7.56	±9.6%
10448	AAD	LTE-FDD (OFDMA, 10 MHz, E-TM 3.1, Clippin 44%)	LTE-FDD	7.53	± 9.6 %
10449	AAC	LTE-FDD (OFDMA, 15 MHz, E-TM 3.1, Cliping 44%)	LTE-FDD	7.51	± 9.6 %
10450	AAC	LTE-FDD (OFDMA, 20 MHz, E-TM 3.1, Clipping 44%)			- 0.0 /

10451	AAA	W-CDMA (BS Test Model 1, 64 DPCH, Clipping 44%)	WCDMA	7.59	± 9.6 %
10456	AAB	IEEE 802.11ac WiFi (160MHz, 64-QAM, 99pc duty cycle)	WLAN	8.63	± 9.6 %
10457	AAA	UMTS-FDD (DC-HSDPA)	WCDMA	6.62	± 9.6 %
10458	AAA	CDMA2000 (1xEV-DO, Rev. B, 2 carriers)	CDMA2000	6.55	±9.6%
10459	AAA	CDMA2000 (1xEV-DO, Rev. B, 3 carriers)	CDMA2000 WCDMA	8.25 2.39	±9.6 % ±9.6 %
10460	AAA	UMTS-FDD (WCDMA, AMR) LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK, UL		7.82	$\pm 9.6\%$ $\pm 9.6\%$
10461	AAA	Subframe=2,3,4,7,8,9)		1.02	1 3.0 %
10462	AAA	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.30	±9.6 %
10463	AAA	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.56	± 9.6 %
10464	AAB	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7,82	± 9.6 %
10465	AAB	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10466	AAB	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	±9.6 %
10467	AAE	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	±9.6 %
10468	AAE	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10469	AAE	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.56	± 9.6 %
10470	AAE	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10471	AAE	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10472	AAE	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM, UL Subframe=2.3.4.7.8.9)	LTE-TDD	8.57	± 9.6 %
10473	AAE	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, QPSK, UL Subframe=2.3.4.7.8.9)	LTE-TDD	7.82	± 9.6 %
10474	AAE	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10475	AAE	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	± 9.6 %
10477	AAF	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10478	AAF	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	±9.6 %
10479	AAA	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.74	± 9.6 %
10480	AAA	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.18	± 9.6 %
10481	AAA	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.45	± 9.6 %
10482	AAB	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.71	± 9.6 %
10483	AAB	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.39	± 9.6 %
10484	AAB	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.47	± 9.6 %
10485	AAE	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.59	± 9.6 %
10486	AAE	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.38	± 9.6 %
10487	AAE	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.60	± 9.6 %
10488	AAE	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, QPSK, UL Subframe=2.3.4.7.8.9)	LTE-TDD	7.70	± 9.6 %
10489	AAE	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.31	± 9.6 %
10490	AAE	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.54	± 9.6 %
10491	AAE	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.74	± 9.6 %

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10535           10536           10537           10538           10540           10541	AAB AAB AAB AAB	IEEE 802.11ac WiFi (40MHz, MCS1, 99pc duty cycle) IEEE 802.11ac WiFi (40MHz, MCS2, 99pc duty cycle) IEEE 802.11ac WiFi (40MHz, MCS3, 99pc duty cycle)	WLAN WLAN WLAN	8.45 8.32	<u>±9.6 %</u> ±9.6 %
10537 10538 10540	AAB				
10538 10540				8.44	± 9.6 %
10540		IEEE 802.11ac WiFi (40MHz, MCS3, 99pc duty cycle)	WLAN	8.54	± 9.6 %
	AAB	IEEE 802.11ac WiFi (40MHz, MCS4, 95pc duty cycle)	WLAN	8.39	± 9.6 %
10041	AAB	IEEE 802.11ac WiFi (40MHz, MCS0, 99pc duty cycle)	WLAN	8.46	± 9.6 %
10542	AAB	IEEE 802.11ac WiFi (40MHz, MCS8, 99pc duty cycle)	WLAN	8.65	± 9.6 %
10542	AAB	IEEE 802.11ac WiFi (40MHz, MCS9, 99pc duty cycle)	WLAN	8.65	± 9.6 %
10545	AAB	IEEE 802.11ac WiFi (80MHz, MCS0, 99pc duty cycle)	WLAN	8.47	± 9.6 %
10545	AAB	IEEE 802.11ac WiFi (80MHz, MCS1, 99pc duty cycle)	WLAN	8.55	± 9.6 %
10546	AAB	IEEE 802.11ac WiFi (80MHz, MCS2, 99pc duty cycle)	WLAN	8,35	± 9.6 %
10540	AAB	IEEE 802.11ac WiFi (80MHz, MCS3, 99pc duty cycle)	WLAN	8,49	± 9.6 %
10548	AAB	IEEE 802.11ac WiFi (80MHz, MCS4, 99pc duty cycle)	WLAN	8.37	± 9.6 %
10550	AAB	IEEE 802.11ac WiFi (80MHz, MCS6, 99pc duty cycle)	WLAN	8.38	± 9.6 %
10551	AAB	IEEE 802.11ac WiFi (80MHz, MCS7, 99pc duty cycle)	WLAN	8.50	± 9.6 %
10552	AAB	IEEE 802.11ac WiFi (80MHz, MCS8, 99pc duty cycle)	WLAN	8.42	± 9.6 %
10553	AAB	IEEE 802.11ac WiFi (80MHz, MCS9, 99pc duty cycle)	WLAN	8.45	± 9.6 %
10554	AAC	IEEE 802.11ac WiFi (160MHz, MCS0, 99pc duty cycle)	WLAN	8.48	± 9.6 %
10555	AAC	IEEE 802.11ac Will (160MHz, MCS1, 99pc duty cycle)	WLAN	8.47	± 9.6 %
10556	AAC	IEEE 802.11ac WiFi (160MHz, MCS2, 99pc duty cycle)	WLAN	8.50	± 9.6 %
10557	AAC	IEEE 802.11ac WiFi (160MHz, MCS3, 99pc duty cycle)	WLAN	8.52	± 9.6 %
10558	AAC	IEEE 802.11ac WiFi (160MHz, MCS4, 99pc duty cycle)	WLAN	8.61	± 9.6 %
10556	AAC	IEEE 802.11ac WiFi (160MHz, MCS6, 99pc duty cycle)	WLAN	8.73	± 9.6 %
10561	AAC	IEEE 802.11ac WiFi (160MHz, MCS7, 99pc duty cycle)	WLAN	8.56	± 9.6 %
10562	AAC	IEEE 802.11ac WiFi (160MHz, MCS8, 99pc duty cycle)	WLAN	8.69	± 9.6 %
10563	AAC	IEEE 802.11ac WiFi (160MHz, MCS9, 99pc duty cycle)	WLAN	8.77	± 9.6 %
10564	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 9 Mbps, 99pc duty	WLAN	8.25	± 9.6 %
10304	~~~	cvcle)	VVL/IN	0.20	1 2 3.0 /0
10565	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 12 Mbps, 99pc duty cycle)	WLAN	8.45	± 9.6 %
10566	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 18 Mbps, 99pc duty cycle)	WLAN	8.13	± 9.6 %
10567	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 24 Mbps, 99pc duty cycle)	WLAN	8.00	± 9.6 %
10568	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 36 Mbps, 99pc duty cvcle)	WLAN	8.37	± 9.6 %
10569	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 48 Mbps, 99pc duty cycle)	WLAN	8.10	± 9.6 %
10570	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 54 Mbps, 99pc duty cycle)	WLAN	8.30	± 9.6 %
10571	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 1 Mbps, 90pc duty cycle)	WLAN	1.99	± 9.6 %
10572	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 2 Mbps, 90pc duty cycle)	WLAN	1.99	± 9.6 %
10573	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 5.5 Mbps, 90pc duty cycle)	WLAN	1.98	± 9.6 %
10574	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 11 Mbps, 90pc duty cycle)	WLAN	1.98	± 9.6 %
10575	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps, 90pc duty cycle)	WLAN	8.59	± 9.6 %
10576	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 9 Mbps, 90pc duty cycle)	WLAN	8.60	± 9.6 %
10577	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 12 Mbps, 90pc duty cycle)	WLAN	8.70	± 9.6 %
10578	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 18 Mbps, 90pc duty cycle)	WLAN	8.49	± 9.6 %
10579	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 24 Mbps, 90pc duty cycle)	WLAN	8.36	± 9.6 %
10580	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 36 Mbps, 90pc duty cycle)	WLAN	8.76	± 9.6 %
10581	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 48 Mbps, 90pc duty cycle)	WLAN	8.35	± 9.6 %
10582	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 54 Mbps, 90pc duty cycle)	WLAN	8.67	± 9.6 %
10583	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 6 Mbps, 90pc duty cycle)	WLAN	8.59	± 9.6 %
10584	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 9 Mbps, 90pc duty cycle)	WLAN	8.60	± 9.6 %
	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 12 Mbps, 90pc duty cycle)	WLAN WLAN	8.70	<u>± 9.6 %</u> ± 9.6 %
10585 10586	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 18 Mbps, 90pc duty cycle)			

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40500	1				
10588	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 36 Mbps, 90pc duty cycle)	WLAN	8.76	± 9.6 %
10589	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 48 Mbps, 90pc duty cycle)	WLAN	8.35	± 9.6 %
10590	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 54 Mbps, 90pc duty cycle)	WLAN	8.67	± 9.6 %
10591	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS0, 90pc duty cycle)	WLAN	8.63	± 9.6 %
10592	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS1, 90pc duty cycle)	WLAN	8.79	± 9.6 %
10593	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS2, 90pc duty cycle)	WLAN	8.64	± 9.6 %
10594	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS3, 90pc duty cycle)	WLAN	8.74	± 9.6 %
10595	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS4, 90pc duty cycle)	WLAN	8.74	± 9.6 %
10596	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS5, 90pc duty cycle)	WLAN	8.71	± 9.6 %
10597	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS6, 90pc duty cycle)	WLAN	8.72	± 9.6 %
10598	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS7, 90pc duty cycle)	WLAN	8.50	± 9.6 %
10599	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS0, 90pc duty cycle)	WLAN	8.79	± 9.6 %
10600	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS1, 90pc duty cycle)	WLAN	8.88	±9.6 %
10601	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS2, 90pc duty cycle)	WLAN	8.82	±9.6 %
10602	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS3, 90pc duty cycle)	WLAN	8.94	±9.6 %
10603	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS4, 90pc duty cycle)	WLAN	9.03	± 9.6 %
10604	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS5, 90pc duty cycle)	WLAN	8.76	± 9.6 %
10605	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS6, 90pc duty cycle)	WLAN	8.97	± 9.6 %
10606	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS7, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10607	AAB	IEEE 802.11ac WiFi (20MHz, MCS0, 90pc duty cycle)	WLAN	8.64	± 9.6 %
10608	AAB	IEEE 802.11ac WiFi (20MHz, MCS1, 90pc duty cycle)	WLAN	8.77	± 9.6 %
10609	AAB	IEEE 802.11ac WiFi (20MHz, MCS2, 90pc duty cycle)	WLAN	8.57	± 9.6 %
10610	AAB	IEEE 802.11ac WiFi (20MHz, MCS3, 90pc duty cycle)	WLAN	8.78	± 9.6 %
10611	AAB	IEEE 802.11ac WiFi (20MHz, MCS4, 90pc duty cycle)	WLAN	8.70	$\pm 9.6\%$ $\pm 9.6\%$
10612	AAB	IEEE 802.11ac WiFi (20MHz, MCS5, 90pc duty cycle)	WLAN	8.77	$\pm 9.6\%$ $\pm 9.6\%$
10613	AAB	IEEE 802.11ac WiFi (20MHz, MCS6, 90pc duty cycle)	WLAN	8.94	
10614	AAB	IEEE 802.11ac WiFi (20MHz, MCS7, 90pc duty cycle)	WLAN		± 9.6 %
10615	AAB	IEEE 802.11ac WiFi (20MHz, MCS8, 90pc duty cycle)		8.59	± 9.6 %
10616	AAB	IEEE 802.11ac WiFi (40MHz, MCS0, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10617	AAB		WLAN	8.82	± 9.6 %
10618	AAB	IEEE 802.11ac WiFi (40MHz, MCS1, 90pc duty cycle) IEEE 802.11ac WiFi (40MHz, MCS2, 90pc duty cycle)	WLAN	8.81	± 9.6 %
10619	AAB		WLAN	8.58	± 9.6 %
10620		IEEE 802.11ac WiFi (40MHz, MCS3, 90pc duty cycle)	WLAN	8.86	± 9.6 %
	AAB	IEEE 802.11ac WiFi (40MHz, MCS4, 90pc duty cycle)	WLAN	8.87	± 9.6 %
10621	AAB	IEEE 802.11ac WiFi (40MHz, MCS5, 90pc duty cycle)	WLAN	8.77	±9.6 %
10622	AAB	IEEE 802.11ac WiFi (40MHz, MCS6, 90pc duty cycle)	WLAN	8.68	± 9.6 %
10623	AAB	IEEE 802.11ac WiFi (40MHz, MCS7, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10624	AAB	IEEE 802.11ac WiFi (40MHz, MCS8, 90pc duty cycle)	WLAN	8.96	± 9.6 %
10625	AAB	IEEE 802.11ac WiFi (40MHz, MCS9, 90pc duty cycle)	WLAN	8.96	±9.6 %
10626	AAB	IEEE 802.11ac WiFi (80MHz, MCS0, 90pc duty cycle)	WLAN	8.83	± 9,6 %
10627	AAB	IEEE 802.11ac WiFi (80MHz, MCS1, 90pc duty cycle)	WLAN	8.88	± 9.6 %
10628	AAB	IEEE 802.11ac WiFi (80MHz, MCS2, 90pc duty cycle)	WLAN	8.71	± 9.6 %
10629	AAB	IEEE 802.11ac WiFi (80MHz, MCS3, 90pc duty cycle)	WLAN	8.85	± 9.6 %
10630	AAB	IEEE 802.11ac WiFi (80MHz, MCS4, 90pc duty cycle)	WLAN	8.72	±9.6 %
10631	AAB	IEEE 802.11ac WiFi (80MHz, MCS5, 90pc duty cycle)	WLAN	8.81	±9.6 %
10632	AAB	IEEE 802.11ac WiFi (80MHz, MCS6, 90pc duty cycle)	WLAN	8.74	±9.6 %
10633	AAB	IEEE 802.11ac WiFi (80MHz, MCS7, 90pc duty cycle)	WLAN	8.83	± 9.6 %
10634	AAB	IEEE 802.11ac WiFi (80MHz, MCS8, 90pc duty cycle)	WLAN	8.80	± 9.6 %
10635	AAB	IEEE 802.11ac WiFi (80MHz, MCS9, 90pc duty cycle)	WLAN	8.81	± 9.6 %
10636	AAC	IEEE 802.11ac WiFi (160MHz, MCS0, 90pc duty cycle)	WLAN	8.83	± 9.6 %
10637	AAC	IEEE 802.11ac WiFi (160MHz, MCS1, 90pc duty cycle)	WLAN	8.79	± 9.6 %
10638	AAC	IEEE 802.11ac WiFi (160MHz, MCS2, 90pc duty cycle)	WLAN	8.86	± 9.6 %
10639	AAC	IEEE 802.11ac WiFi (160MHz, MCS3, 90pc duty cycle)	WLAN	8.85	± 9.6 %
10640	AAC	IEEE 802.11ac WiFi (160MHz, MCS4, 90pc duty cycle)	WLAN	8.98	± 9.6 %
10641	AAC	IEEE 802.11ac WiFi (160MHz, MCS5, 90pc duty cycle)	WLAN	9.06	± 9.6 %
10642	AAC	IEEE 802.11ac WiFi (160MHz, MCS6, 90pc duty cycle)	WLAN	9.06	± 9.6 %
10643	AAC	IEEE 802.11ac WiFi (160MHz, MCS7, 90pc duty cycle)	WLAN	8.89	± 9.6 %
10644	AAC	IEEE 802.11ac WiFi (160MHz, MCS8, 90pc duty cycle)	WLAN	9.05	
10645	AAC	IEEE 802.11ac WiFi (160MHz, MCS9, 90pc duty cycle)	WLAN	9.05	± 9.6 %
10646	AAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK, UL Subframe=2,7)	LTE-TDD		± 9.6 %
10647	AAF	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL Subframe=2,7)		11.96	± 9.6 %
10648	AAA	CDMA2000 (1x Advanced)	LTE-TDD	11.96	± 9.6 %
10652	AAD	LTE-TDD (OFDMA, 5 MHz, E-TM 3.1, Clipping 44%)	CDMA2000	3.45	± 9.6 %
			LTE-TDD	6.91	± 9.6 %
	ΔΔΠ				
10653 10654	AAD AAD	LTE-TDD (OFDMA, 10 MHz, E-TM 3.1, Clipping 44%) LTE-TDD (OFDMA, 15 MHz, E-TM 3.1, Clipping 44%)	LTE-TDD LTE-TDD	7.42 6.96	±9.6 % ±9.6 %

40055		LTE TOD (OEDMA, OO MILE E TMO 4 Offening 449()		7.04	
10655	AAE	LTE-TDD (OFDMA, 20 MHz, E-TM 3.1, Clipping 44%)	LTE-TDD Test	7.21	±9.6 % ±9.6 %
10658 10659	AAA	Pulse Waveform (200Hz, 10%) Pulse Waveform (200Hz, 20%)	Test	6.99	$\pm 9.6\%$
10659	AAA	Pulse Waveform (200Hz, 40%)	Test	3.98	± 9.6 %
10661	AAA	Pulse Waveform (200Hz, 40%)	Test	2.22	±9.6%
10662	AAA	Pulse Waveform (200Hz, 80%)	Test	0.97	± 9.6 %
10670	AAA	Bluetooth Low Energy	Bluetooth	2.19	± 9.6 %
10671	AAA	IEEE 802.11ax (20MHz, MCS0, 90pc duty cycle)	WLAN	9.09	± 9.6 %
10672	AAA	IEEE 802.11ax (20MHz, MCS1, 90pc duty cycle)	WLAN	8.57	±9.6 %
10673	AAA	IEEE 802.11ax (20MHz, MCS2, 90pc duty cycle)	WLAN	8.78	± 9.6 %
10674	AAA	IEEE 802.11ax (20MHz, MCS3, 90pc duty cycle)	WLAN	8.74	± 9.6 %
10675	AAA	IEEE 802.11ax (20MHz, MCS4, 90pc duty cycle)	WLAN	8.90	±9.6%
10676	AAA	IEEE 802.11ax (20MHz, MCS5, 90pc duty cycle)	WLAN	8.77	±9.6%
10677	AAA	IEEE 802.11ax (20MHz, MCS6, 90pc duty cycle)	WLAN	8.73	± 9.6 %
10678	AAA	IEEE 802.11ax (20MHz, MCS7, 90pc duty cycle)	WLAN	8.78	±9.6 %
10679	AAA	IEEE 802.11ax (20MHz, MCS8, 90pc duty cycle)	WLAN	8.89	± 9.6 %
10680	AAA	IEEE 802.11ax (20MHz, MCS9, 90pc duty cycle)	WLAN	8.80	±9.6 %
10681	AAA	IEEE 802.11ax (20MHz, MCS10, 90pc duty cycle)	WLAN	8.62	± 9.6 %
10682	AAA	IEEE 802.11ax (20MHz, MCS11, 90pc duty cycle)	WLAN	8.83	± 9.6 %
10683	AAA	IEEE 802.11ax (20MHz, MCS0, 99pc duty cycle)	WLAN	8.42	± 9.6 %
10684		IEEE 802.11ax (20MHz, MCS1, 99pc duty cycle)	WLAN	8.26	±9.6 %
10685	AAA	IEEE 802.11ax (20MHz, MCS2, 99pc duty cycle)	WLAN	8.33	$\pm 9.6\%$
10686	AAA	IEEE 802.11ax (20MHz, MCS3, 99pc duty cycle)	WLAN	8.28	± 9.6 %
10687	AAA	IEEE 802.11ax (20MHz, MCS4, 99pc duty cycle)	WLAN	8.45	± 9.6 % ± 9.6 %
10688		IEEE 802.11ax (20MHz, MCS5, 99pc duty cycle)	WLAN WLAN	8.29	$\pm 9.6\%$ $\pm 9.6\%$
10689	AAA AAA	IEEE 802.11ax (20MHz, MCS6, 99pc duty cycle) IEEE 802.11ax (20MHz, MCS7, 99pc duty cycle)	WLAN	8.55	$\pm 9.6\%$ $\pm 9.6\%$
10690	AAA	IEEE 802.11ax (20MHz, MCS7, 99pc duty cycle)	WLAN	8.25	± 9.6 %
10692	AAA	IEEE 802.11ax (20MHz, MCS8, 99pc duty cycle)	WLAN	8.29	± 9.6 %
10693	AAA	IEEE 802.11ax (20MHz, MCS3, 39pc duty cycle)	WLAN	8.25	± 9.6 %
10694	AAA	IEEE 802.11ax (20MHz, MCS11, 99pc duty cycle)	WLAN	8.57	±9.6 %
10695	AAA	IEEE 802.11ax (20MHz, MCS0, 90pc duty cycle)	WLAN	8.78	±9.6 %
10696	AAA	IEEE 802.11ax (40MHz, MCS1, 90pc duty cycle)	WLAN	8.91	±9.6 %
10697	AAA	IEEE 802.11ax (40MHz, MCS2, 90pc duty cycle)	WLAN	8.61	± 9.6 %
10698	AAA	IEEE 802.11ax (40MHz, MCS3, 90pc duty cycle)	WLAN	8.89	± 9.6 %
10699	AAA	IEEE 802.11ax (40MHz, MCS4, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10700	AAA	IEEE 802.11ax (40MHz, MCS5, 90pc duty cycle)	WLAN	8.73	± 9.6 %
10701	AAA	IEEE 802.11ax (40MHz, MCS6, 90pc duty cycle)	WLAN	8.86	± 9.6 %
10702	AAA	IEEE 802.11ax (40MHz, MCS7, 90pc duty cycle)	WLAN	8.70	± 9.6 %
10703	AAA	IEEE 802.11ax (40MHz, MCS8, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10704	AAA	IEEE 802.11ax (40MHz, MCS9, 90pc duty cycle)	WLAN	8.56	±9.6 %
10705	AAA	IEEE 802.11ax (40MHz, MCS10, 90pc duty cycle)	WLAN	8.69	±9.6%
10706	AAA	IEEE 802.11ax (40MHz, MCS11, 90pc duty cycle)	WLAN	8.66	± 9.6 %
10707	AAA	IEEE 802.11ax (40MHz, MCS0, 99pc duty cycle)	WLAN	8.32	± 9.6 %
10708	AAA	IEEE 802.11ax (40MHz, MCS1, 99pc duty cycle)	WLAN	8.55	± 9.6 %
10709	AAA	IEEE 802.11ax (40MHz, MCS2, 99pc duty cycle)	WLAN	8.33	± 9.6 %
10710		IEEE 802.11ax (40MHz, MCS3, 99pc duty cycle)	WLAN	8.29	± 9.6 %
10711	AAA	IEEE 802.11ax (40MHz, MCS4, 99pc duty cycle)	WLAN	8.39	±9.6%
10712	AAA	IEEE 802.11ax (40MHz, MCS5, 99pc duty cycle) IEEE 802.11ax (40MHz, MCS6, 99pc duty cycle)	WLAN WLAN	8.67	<u>± 9.6 %</u> ± 9.6 %
10713		IEEE 802.11ax (40MHz, MCS6, 99pc duty cycle)	WLAN	8.26	$\pm 9.6\%$
10714	AAA AAA	IEEE 802.11ax (40MHz, MCS7, 99pc duty cycle)	WLAN	8.45	± 9.6 %
10715	AAA	IEEE 802.11ax (40MHz, MCS8, 99pc duty cycle)	WLAN	8.30	± 9.6 %
10716	AAA	IEEE 802.11ax (40MHz, MCS9, 99pc duty cycle)	WLAN	8.48	± 9.6 %
10717		IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle)	WLAN	8.24	± 9.6 %
10719	AAA	IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle)	WLAN	8.81	± 9.6 %
10713	AAA	IEEE 802.11ax (80MHz, MCS1, 90pc duty cycle)	WLAN	8.87	± 9.6 %
1	AAA	IEEE 802.11ax (80MHz, MCS2, 90pc duty cycle)	WLAN	8.76	± 9.6 %
10721				8.55	± 9.6 %
10721		I LEEE 802.11ax (80MHZ, MCS3, 90DC QUIV CVCIE)	WLAN	1 0.00	
10722	AAA	IEEE 802.11ax (80MHz, MCS3, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS4, 90pc duty cycle)	WLAN	8.70	± 9.6 %
10722 10723		IEEE 802.11ax (80MHz, MCS3, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS4, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS5, 90pc duty cycle)	WLAN WLAN		
10722	AAA AAA	IEEE 802.11ax (80MHz, MCS4, 90pc duty cycle)	WLAN	8.70	± 9.6 %
10722 10723 10724	AAA AAA AAA	IEEE 802.11ax (80MHz, MCS4, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS5, 90pc duty cycle)	WLAN WLAN	8.70 8.90	± 9.6 % ± 9.6 %

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10728	AAA	IEEE 802.11ax (80MHz, MCS9, 90pc duty cycle)	WLAN	8.65	±9.6 %
10729	AAA	IEEE 802.11ax (80MHz, MCS10, 90pc duty cycle)	WLAN	8.64	± 9.6 %
10730	AAA	IEEE 802.11ax (80MHz, MCS11, 90pc duty cycle)	WLAN	8.67	± 9.6 %
10731	AAA	IEEE 802.11ax (80MHz, MCS0, 99pc duty cycle)	WLAN	8.42	± 9.6 %
10732	AAA	IEEE 802.11ax (80MHz, MCS1, 99pc duty cycle)	WLAN	8.46	± 9.6 %
10733	AAA	IEEE 802.11ax (80MHz, MCS2, 99pc duty cycle)	WLAN	8.40	± 9.6 %
10734	AAA	IEEE 802.11ax (80MHz, MCS3, 99pc duty cycle)	WLAN	8.25	± 9.6 %
10735	AAA	IEEE 802.11ax (80MHz, MCS4, 99pc duty cycle)	WLAN	8.33	± 9.6 %
10736	AAA	IEEE 802.11ax (80MHz, MCS5, 99pc duty cycle)	WLAN	8.27	± 9.6 %
10737	AAA	IEEE 802.11ax (80MHz, MCS6, 99pc duty cycle)	WLAN	8.36	± 9.6 %
10738	AAA	IEEE 802.11ax (80MHz, MCS7, 99pc duty cycle)	WLAN	8.42	± 9.6 %
10739	AAA	IEEE 802.11ax (80MHz, MCS8, 99pc duty cycle)	WLAN	8.29	± 9.6 %
10740	AAA	IEEE 802.11ax (80MHz, MCS9, 99pc duty cycle)	WLAN	8.48	± 9.6 %
10741	AAA	IEEE 802.11ax (80MHz, MCS10, 99pc duty cycle)	WLAN	8.40	± 9.6 %
10742	AAA	IEEE 802.11ax (80MHz, MCS11, 99pc duty cycle)	WLAN	8.43	± 9.6 %
10743	AAA	IEEE 802.11ax (160MHz, MCS0, 90pc duty cycle)	WLAN	8.94	± 9.6 %
10744	AAA	IEEE 802.11ax (160MHz, MCS1, 90pc duty cycle)	WLAN	9.16	± 9.6 %
10745	AAA	IEEE 802.11ax (160MHz, MCS2, 90pc duty cycle)	WLAN	8.93	± 9.6 %
10746	AAA	IEEE 802.11ax (160MHz, MCS3, 90pc duty cycle)	WLAN	9.11	± 9.6 %
10747	AAA	IEEE 802.11ax (160MHz, MCS4, 90pc duty cycle)	WLAN	9.04	± 9.6 %
10748	AAA	IEEE 802.11ax (160MHz, MCS5, 90pc duty cycle)	WLAN	8.93	±9.6 %
10749	AAA	IEEE 802.11ax (160MHz, MCS6, 90pc duty cycle)	WLAN	8.90	± 9.6 %
10750	AAA	IEEE 802.11ax (160MHz, MCS7, 90pc duty cycle)	WLAN	8.79	±9.6 %
10751	AAA	IEEE 802.11ax (160MHz, MCS8, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10752	AAA	IEEE 802.11ax (160MHz, MCS9, 90pc duty cycle)	WLAN	8.81	±9.6 %
10753	AAA	IEEE 802.11ax (160MHz, MCS10, 90pc duty cycle)	WLAN	9.00	±9.6 %
10754	AAA	IEEE 802.11ax (160MHz, MCS11, 90pc duty cycle)	WLAN	8.94	±9.6 %
10755	AAA	IEEE 802.11ax (160MHz, MCS0, 99pc duty cycle)	WLAN	8.64	±9.6 %
10756	AAA	IEEE 802.11ax (160MHz, MCS1, 99pc duty cycle)	WLAN	8.77	±9.6 %
10757	AAA	IEEE 802.11ax (160MHz, MCS2, 99pc duty cycle)	WLAN	8.77	±9.6 %
10758	AAA	IEEE 802.11ax (160MHz, MCS3, 99pc duty cycle)	WLAN	8.69	± 9.6 %
10759	AAA	IEEE 802.11ax (160MHz, MCS4, 99pc duty cycle)	WLAN	8.58	±9.6 %
10760	AAA	IEEE 802.11ax (160MHz, MCS5, 99pc duty cycle)	WLAN	8.49	±9.6 %
10761	AAA	IEEE 802.11ax (160MHz, MCS6, 99pc duty cycle)	WLAN	8.58	±9.6 %
10762	AAA	IEEE 802.11ax (160MHz, MCS7, 99pc duty cycle)	WLAN	8.49	±9.6 %
10763	AAA	IEEE 802.11ax (160MHz, MCS8, 99pc duty cycle)	WLAN	8.53	± 9.6 %
10764	AAA	IEEE 802.11ax (160MHz, MCS9, 99pc duty cycle)	WLAN	8.54	± 9.6 %
10765	AAA	IEEE 802.11ax (160MHz, MCS10, 99pc duty cycle)	WLAN	8.54	± 9.6 %
10766	AAA	IEEE 802.11ax (160MHz, MCS11, 99pc duty cycle)	WLAN	8.51	± 9.6 %

<sup>E</sup> Uncertainty is determined using the max. deviation from linear response applying rectangular distribution and is expressed for the square of the field value.

## **Calibration Laboratory of**

Schmid & Partner Engineering AG Zeughausstrasse 43, 8004 Zurich, Switzerland

Accredited by the Swiss Accreditation Service (SAS) The Swiss Accreditation Service is one of the signatories to the EA Multilateral Agreement for the recognition of calibration certificates

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Schweizerischer Kalibrierdienst

- S Service suisse d'étalonnage С
  - Servizio svizzero di taratura
- S Swiss Calibration Service

Accreditation No.: SCS 0108

BN 09-26-2019

Certificate No: EX3-7551\_Sep19

CALIBRATION C	ERTIFICATE
Object	EX3DV4 - SN:7551
Calibration procedure(s)	QA CAL-01.v9, QA CAL-23.v5, QA CAL-25.v

QA CAL-U1.V9, QA CAL-23.V5, QA CAL-25.V7 Calibration procedure for dosimetric E-field probes

Calibration date:

September 19, 2019

This calibration certificate documents the traceability to national standards, which realize the physical units of measurements (SI). The measurements and the uncertainties with confidence probability are given on the following pages and are part of the certificate.

All calibrations have been conducted in the closed laboratory facility: environment temperature (22 ± 3)°C and humidity < 70%.

Calibration Equipment used (M&TE critical for calibration)

Primary Standards	ID	Cal Date (Certificate No.)	Scheduled Calibration
Power meter NRP	SN: 104778	03-Apr-19 (No. 217-02892/02893)	Apr-20
Power sensor NRP-Z91	SN: 103244	03-Apr-19 (No. 217-02892)	Apr-20
Power sensor NRP-Z91	SN: 103245	03-Apr-19 (No. 217-02893)	Apr-20
Reference 20 dB Attenuator	SN: S5277 (20x)	04-Apr-19 (No. 217-02894)	Apr-20
DAE4	SN: 660	19-Dec-18 (No. DAE4-660_Dec18)	Dec-19
Reference Probe ES3DV2	SN: 3013	31-Dec-18 (No. ES3-3013_Dec18)	Dec-19
Secondary Standards	ID	Check Date (in house)	Scheduled Check
Power meter E4419B	SN: GB41293874	06-Apr-16 (in house check Jun-18)	In house check: Jun-20
Power sensor E4412A	SN: MY41498087	06-Apr-16 (in house check Jun-18)	In house check: Jun-20
Power sensor E4412A	SN: 000110210	06-Apr-16 (in house check Jun-18)	In house check: Jun-20
RF generator HP 8648C	SN: US3642U01700	04-Aug-99 (in house check Jun-18)	In house check: Jun-20
Network Analyzer E8358A	SN: US41080477	31-Mar-14 (in house check Oct-18)	In house check: Oct-19

	Name	Function	Signature	al ann an Ao I an Anna Malaitt Al Adaitteach
Calibrated by:	Michael Weber	Laboratory Technician		
			//. <b>///</b> /	
Approved by:	Katja Pokovic	Technical Manager	all	
			Issued: September 19, 1	2019
This calibration certificat	e shall not be reproduced except in full	without written approval of the labo	pratory.	

## Calibration Laboratory of

Schmid & Partner Engineering AG Zeughausstrasse 43, 8004 Zurich, Switzerland



S Schweizerischer Kalibrierdienst

- C Service suisse d'étalonnage
- Servizio svizzero di taratura
  - Swiss Calibration Service

Accreditation No.: SCS 0108

Accredited by the Swiss Accreditation Service (SAS)

The Swiss Accreditation Service is one of the signatories to the EA Multilateral Agreement for the recognition of calibration certificates

## Glossary:

TSL	tissue simulating liquid
NORMx,y,z	sensitivity in free space
ConvF	sensitivity in TSL / NORMx,y,z
DCP	diode compression point
CF	crest factor (1/duty_cycle) of the RF signal
A, B, C, D	modulation dependent linearization parameters
Polarization φ	φ rotation around probe axis
Polarization 9	$\vartheta$ rotation around an axis that is in the plane normal to probe axis (at measurement center), i.e., $\vartheta = 0$ is normal to probe axis
Connector Angle	information used in DASY system to align probe sensor X to the robot coordinate system

### Calibration is Performed According to the Following Standards:

- a) IEEE Std 1528-2013, "IEEE Recommended Practice for Determining the Peak Spatial-Averaged Specific Absorption Rate (SAR) in the Human Head from Wireless Communications Devices: Measurement Techniques", June 2013
- b) IEC 62209-1, ", "Measurement procedure for the assessment of Specific Absorption Rate (SAR) from handheld and body-mounted devices used next to the ear (frequency range of 300 MHz to 6 GHz)", July 2016
- c) IEC 62209-2, "Procedure to determine the Specific Absorption Rate (SAR) for wireless communication devices used in close proximity to the human body (frequency range of 30 MHz to 6 GHz)", March 2010
- d) KDB 865664, "SAR Measurement Requirements for 100 MHz to 6 GHz"

### Methods Applied and Interpretation of Parameters:

- NORMx,y,z: Assessed for E-field polarization 9 = 0 (f ≤ 900 MHz in TEM-cell; f > 1800 MHz: R22 waveguide). NORMx,y,z are only intermediate values, i.e., the uncertainties of NORMx,y,z does not affect the E<sup>2</sup>-field uncertainty inside TSL (see below *ConvF*).
- NORM(f)x,y,z = NORMx,y,z \* frequency\_response (see Frequency Response Chart). This linearization is implemented in DASY4 software versions later than 4.2. The uncertainty of the frequency response is included in the stated uncertainty of ConvF.
- DCPx, y, z: DCP are numerical linearization parameters assessed based on the data of power sweep with CW signal (no uncertainty required). DCP does not depend on frequency nor media.
- PAR: PAR is the Peak to Average Ratio that is not calibrated but determined based on the signal characteristics
- Ax,y,z; Bx,y,z; Cx,y,z; Dx,y,z; VRx,y,z: A, B, C, D are numerical linearization parameters assessed based on the data of power sweep for specific modulation signal. The parameters do not depend on frequency nor media. VR is the maximum calibration range expressed in RMS voltage across the diode.
- ConvF and Boundary Effect Parameters: Assessed in flat phantom using E-field (or Temperature Transfer Standard for f ≤ 800 MHz) and inside waveguide using analytical field distributions based on power measurements for f > 800 MHz. The same setups are used for assessment of the parameters applied for boundary compensation (alpha, depth) of which typical uncertainty values are given. These parameters are used in DASY4 software to improve probe accuracy close to the boundary. The sensitivity in TSL corresponds to NORMx, y, z \* ConvF whereby the uncertainty corresponds to that given for ConvF. A frequency dependent ConvF is used in DASY version 4.4 and higher which allows extending the validity from ± 50 MHz to ± 100 MHz.
- Spherical isotropy (3D deviation from isotropy): in a field of low gradients realized using a flat phantom exposed by a patch antenna.
- Sensor Offset: The sensor offset corresponds to the offset of virtual measurement center from the probe tip (on probe axis). No tolerance required.
- Connector Angle: The angle is assessed using the information gained by determining the NORMx (no uncertainty required).

### **Basic Calibration Parameters**

1	Sensor X	Sensor Y	Sensor Z	Unc (k=2)
Norm $(\mu V/(V/m)^2)^A$	0.57	0.54	0.56	± 10.1 %
DCP (mV) <sup>8</sup>	104.3	99.1	95.6	

### **Calibration Results for Modulation Response**

UID	Communication System Name		A dB	B dBõV	С	D dB	VR mV	Max dev.	Max Unc <sup>E</sup> (k=2)
0	CW	X	0.00	0.00	1.00	0.00	181.1	± 3.0 %	±4.7 %
		Y	0.00	0.00	1.00		174.4		
		Z	0.00	0.00	1.00		174.0		
10352-	Pulse Waveform (200Hz, 10%)	X	15.00	89.60	21.65	10.00	60.0	± 3.9 %	± 9.6 %
AAA		Y	15.00	87,33	19.66		60.0		
		Z	15.00	88.48	20.15		60.0		
10353-	Pulse Waveform (200Hz, 20%)	X	15.00	90.79	21.23	6.99	80.0	± 2.7 %	± 9.6 %
AAA		Y	15.00	87.95	18.66		80.0		
		Z	15.00	90.69	19.98		80.0		
10354-	Pulse Waveform (200Hz, 40%)	X	15.00	94.66	21.81	3.98	95.0	± 1.2 %	± 9.6 %
AAA		Y	15.00	89.03	17.62	]	95.0		
		Z	15.00	94.85	20.37		95.0		
10355-	Pulse Waveform (200Hz, 60%)	X	15.00	102.60	24.35	2,22	120.0	± 1.1 %	± 9.6 %
AAA		Y	15.00	87.27	15.36		120.0		
		Z	15.00	97.27	19.82		120.0	]	
10387-	QPSK Waveform, 1 MHz	X	1.24	68.72	13.42	0.00	150.0	± 3.2 %	± 9.6 %
AAA		Y	0.54	60.00	7.02		150.0		
		Z	0.39	60.00	3.70		150.0		
10388-	QPSK Waveform, 10 MHz	X	2.73	71.86	17.85	0.00	150.0	± 1.4 %	±9.6 %
AAA		Y	1.99	66.53	14.73		150.0		
		Z	2.16	69.95	16.98		150.0		
10396-	64-QAM Waveform, 100 kHz	X	3.60	74.00	20.55	3.01	150.0	± 0.9 %	± 9.6 %
AAA		Y	2.73	68.63	17.73	]	150.0	]	
		Z	2.22	67.94	18.36		150.0		
10399-	64-QAM Waveform, 40 MHz	X	3.66	68.17	16.52	0.00	150.0	±2.1%	± 9.6 %
AAA		Y	3.37	66.52	15.34		150.0		
		Z	3.41	67.62	16.33		150.0		
10414-	WLAN CCDF, 64-QAM, 40MHz	X	4.90	65.94	15.82	0.00	150.0	± 4.2 %	± 9.6 %
AAA		Y	4.76	65.46	15.39		150.0		
		Z	4.60	66.09	16.03		150.0		

Note: For details on UID parameters see Appendix

The reported uncertainty of measurement is stated as the standard uncertainty of measurement multiplied by the coverage factor k=2, which for a normal distribution corresponds to a coverage probability of approximately 95%.

<sup>&</sup>lt;sup>A</sup> The uncertainties of Norm X,Y,Z do not affect the  $E^2$ -field uncertainty inside TSL (see Pages 5 and 6). <sup>B</sup> Numerical linearization parameter: uncertainty not required.

<sup>&</sup>lt;sup>E</sup> Uncertainty is determined using the max. deviation from linear response applying rectangular distribution and is expressed for the square of the field value.

### Sensor Model Parameters

	C1 fF	C2 fF	α V <sup>-1</sup>	T1 ms.V <sup>-2</sup>	T2 ms.V⁻¹	T3 ms	T4 V <sup>-2</sup>	T5 V <sup>-1</sup>	Т6
Х	47.8	351.65	34.83	22.77	0.50	5.10	0.98	0.37	1.01
Y	41.0	312.25	36.63	13.13	0.44	5.08	0.35	0.46	1.01
Ż	25.5	199.44	38.63	11.25	0.42	5.10	0.00	0.26	1.01

## **Other Probe Parameters**

Sensor Arrangement	Triangular
Connector Angle (°)	120.2
Mechanical Surface Detection Mode	enabled
Optical Surface Detection Mode	disabled
Probe Overall Length	337 mm
Probe Body Diameter	10 mm
Tip Length	9 mm
Tip Diameter	2.5 mm
Probe Tip to Sensor X Calibration Point	1 mm
Probe Tip to Sensor Y Calibration Point	1 mm
Probe Tip to Sensor Z Calibration Point	1 mm
Recommended Measurement Distance from Surface	1.4 mm

f (MHz) <sup>c</sup>	Relative Permittivity <sup>F</sup>	Conductivity (S/m) <sup>F</sup>	ConvF X	ConvF Y	ConvF Z	Alpha <sup>G</sup>	Depth <sup>G</sup> (mm)	Unc (k=2)
750	41.9	0.89	10.11	10.11	10.11	0.50	0.80	± 12.0 %
835	41.5	0.90	9.88	9.88	9.88	0.38	0.92	± 12.0 %
1750	40.1	1.37	8.34	8.34	8.34	0.28	0.80	± 12.0 %
1900	40.0	1.40	8.05	8.05	8.05	0.29	0.80	± 12.0 %
2300	39.5	1.67	7.74	7.74	7.74	0.30	0.90	± 12.0 %
2450	39.2	1.80	7.30	7.30	7.30	0.32	0.90	± 12.0 %
2600	39.0	1.96	7.18	7.18	7.18	0.35	0.90	± 12.0 %

#### Calibration Parameter Determined in Head Tissue Simulating Media

<sup>c</sup> Frequency validity above 300 MHz of ± 100 MHz only applies for DASY v4.4 and higher (see Page 2), else it is restricted to ± 50 MHz. The uncertainty is the RSS of the ConvF uncertainty at calibration frequency and the uncertainty for the indicated frequency band. Frequency validity below 300 MHz is ± 10, 25, 40, 50 and 70 MHz for ConvF assessments at 30, 64, 128, 150 and 220 MHz respectively. Validity of ConvF assessed at 6 MHz is 4-9 MHz, and ConvF assessed at 13 MHz is 9-19 MHz. Above 5 GHz frequency validity can be extended to ± 110 MHz.

measured SAR values. At frequencies above 3 GHz, the validity of tissue parameters (e and  $\sigma$ ) is restricted to  $\pm$  5%. The uncertainty is the RSS of

the ConvF uncertainty for indicated target tissue parameters. <sup>9</sup> Alpha/Depth are determined during calibration. SPEAG warrants that the remaining deviation due to the boundary effect after compensation is always less than ± 1% for frequencies below 3 GHz and below ± 2% for frequencies between 3-6 GHz at any distance larger than half the probe tip diameter from the boundary.

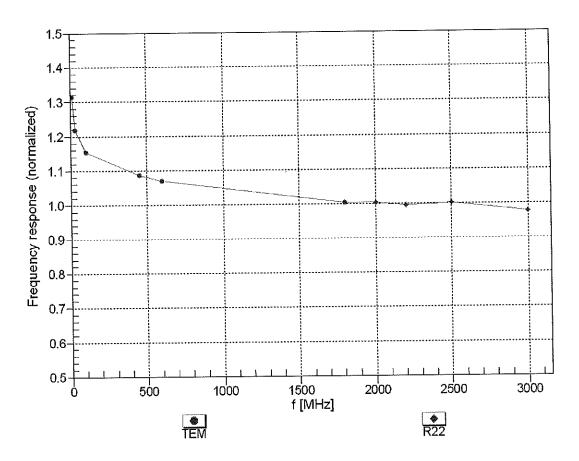
f (MHz) <sup>C</sup>	Relative Permittivity <sup>F</sup>	Conductivity (S/m) <sup>F</sup>	ConvF X	ConvF Y	ConvF Z	Alpha <sup>G</sup>	Depth <sup>G</sup> (mm)	Unc (k=2)
750	55.5	0.96	10.09	10.09	10.09	0.45	0.80	± 12.0 %
835	55.2	0.97	9.92	9.92	9.92	0.42	0.80	± 12.0 %
1750	53.4	1.49	8.13	8.13	8.13	0.37	0.87	± 12.0 %
1900	53.3	1.52	7.69	7.69	7.69	0.41	0.80	± 12.0 %
2300	52.9	1.81	7.63	7.63	7.63	0.40	0.90	± 12.0 %
2450	52.7	1.95	7.41	7.41	7.41	0.36	0.90	± 12.0 %
2600	52.5	2.16	7.34	7.34	7.34	0.28	0.96	± 12.0 %

## Calibration Parameter Determined in Body Tissue Simulating Media

<sup>c</sup> Frequency validity above 300 MHz of  $\pm$  100 MHz only applies for DASY v4.4 and higher (see Page 2), else it is restricted to  $\pm$  50 MHz. The uncertainty is the RSS of the ConvF uncertainty at calibration frequency and the uncertainty for the indicated frequency band. Frequency validity below 300 MHz is  $\pm$  10, 25, 40, 50 and 70 MHz for ConvF assessments at 30, 64, 128, 150 and 220 MHz respectively. Validity of ConvF assessed at 6 MHz is 4-9 MHz, and ConvF assessed at 13 MHz is 9-19 MHz. Above 5 GHz frequency validity can be extended to  $\pm$  110 MHz.

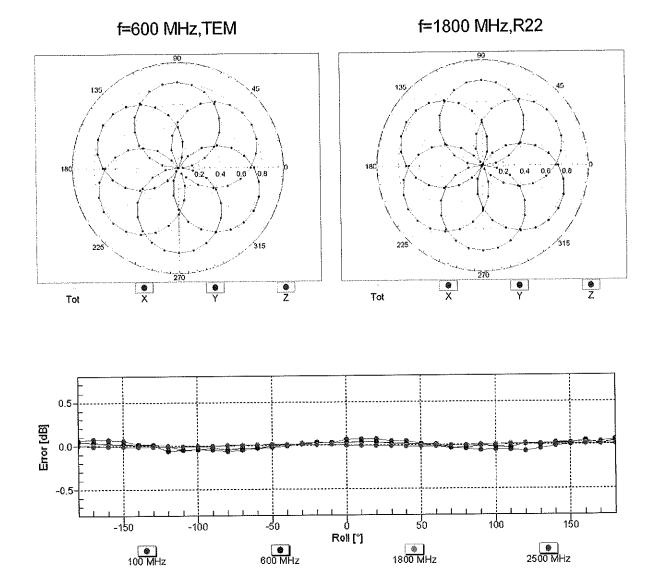
At frequencies below 3 GHz, the validity of tissue parameters ( $\epsilon$  and  $\sigma$ ) can be relaxed to  $\pm$  10% if liquid compensation formula is applied to measured SAR values. At frequencies above 3 GHz, the validity of tissue parameters ( $\epsilon$  and  $\sigma$ ) is restricted to  $\pm$  5%. The uncertainty is the RSS of

the ConvF uncertainty for indicated target tissue parameters. <sup>9</sup> Alpha/Depth are determined during calibration. SPEAG warrants that the remaining deviation due to the boundary effect after compensation is always less than ± 1% for frequencies below 3 GHz and below ± 2% for frequencies between 3-6 GHz at any distance larger than half the probe tip diameter from the boundary.



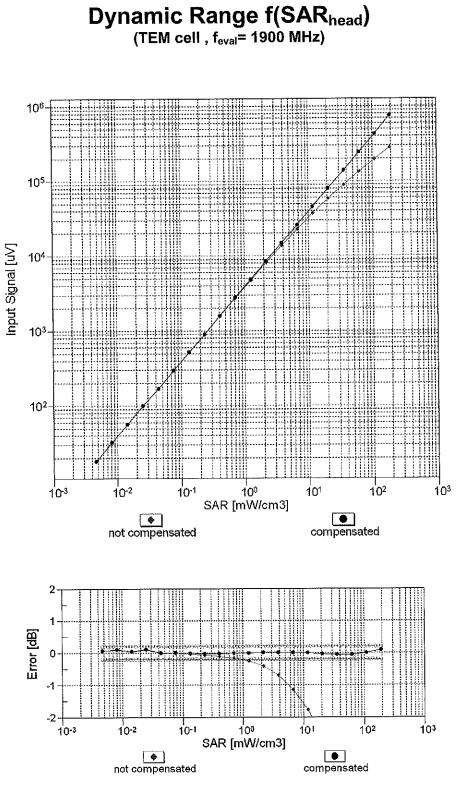
## Frequency Response of E-Field (TEM-Cell:ifi110 EXX, Waveguide: R22)

Uncertainty of Frequency Response of E-field: ± 6.3% (k=2)

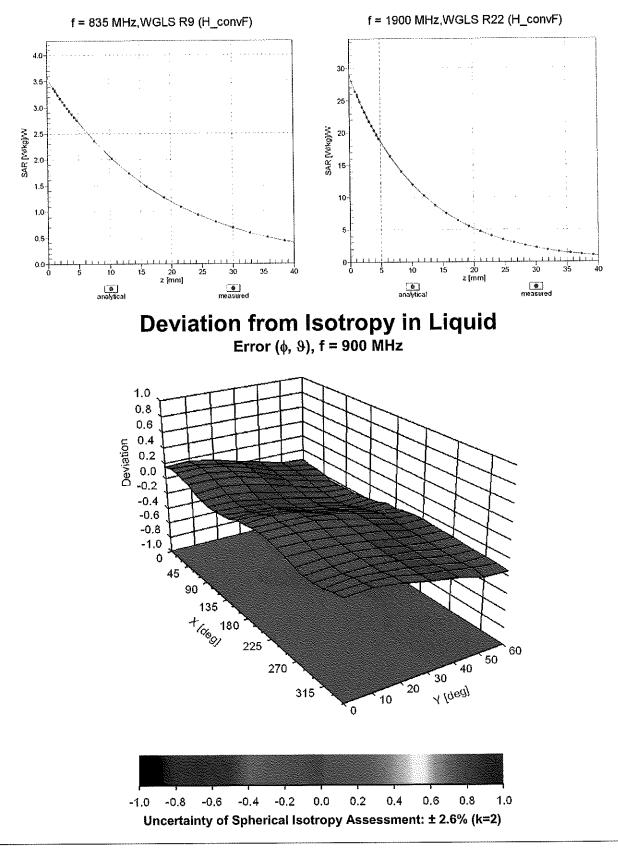


# Receiving Pattern ( $\phi$ ), $\vartheta = 0^{\circ}$

Uncertainty of Axial Isotropy Assessment: ± 0.5% (k=2)



Uncertainty of Linearity Assessment: ± 0.6% (k=2)



## **Conversion Factor Assessment**

## **Appendix: Modulation Calibration Parameters**

UID	Rev	Communication System Name	Group	PAR (dB)	Unc <sup>E</sup> (k=2)
0		CW	CW	0.00	±4.7 %
10010	CAA	SAR Validation (Square, 100ms, 10ms)	Test	10.00	± 9.6 %
10011	CAB	UMTS-FDD (WCDMA)	WCDMA	2.91	±9.6%
10012	CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 1 Mbps)	WLAN	1.87	±9.6 %
10013	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps)	WLAN	9.46	± 9.6 %
10021	DAC	GSM-FDD (TDMA, GMSK)	GSM	9.39	±9.6 %
10023	DAC	GPRS-FDD (TDMA, GMSK, TN 0)	GSM	9.57	±9.6 %
10024	DAC	GPRS-FDD (TDMA, GMSK, TN 0-1)	GSM	6.56	± 9.6 %
10025	DAC	EDGE-FDD (TDMA, 8PSK, TN 0)	GSM	12.62	± 9.6 %
10026	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-1)	GSM	9.55	± 9.6 %
10027	DAC	GPRS-FDD (TDMA, GMSK, TN 0-1-2)	GSM	4.80	± 9.6 %
10028	DAC	GPRS-FDD (TDMA, GMSK, TN 0-1-2-3)	GSM	3.55	±9.6%
10029	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-1-2)	GSM	7.78	± 9.6 %
10030	CAA	IEEE 802.15.1 Bluetooth (GFSK, DH1)	Bluetooth	5.30	± 9.6 %
10031	CAA	IEEE 802.15.1 Bluetooth (GFSK, DH3)	Bluetooth	1.87	± 9.6 %
10032	CAA	IEEE 802.15.1 Bluetooth (GFSK, DH5)	Bluetooth	1.16	± 9.6 %
10033	CAA	IEEE 802.15.1 Bluetooth (PI/4-DQPSK, DH1)	Bluetooth	7.74	± 9.6 %
10034	CAA	IEEE 802.15.1 Bluetooth (PI/4-DQPSK, DH3)	Bluetooth	4.53	±9.6 %
10035	CAA	IEEE 802.15.1 Bluetooth (PI/4-DQPSK, DH5)	Bluetooth	3.83	±9.6 %
10036	CAA	IEEE 802.15.1 Bluetooth (8-DPSK, DH1)	Bluetooth	8.01	±9.6 %
10037	CAA	IEEE 802.15.1 Bluetooth (8-DPSK, DH3)	Bluetooth	4.77	±9.6%
10038	CAA	IEEE 802.15.1 Bluetooth (8-DPSK, DH5)	Bluetooth	4.10	±9.6 %
10039	CAB	CDMA2000 (1xRTT, RC1)	CDMA2000	4.57	± 9.6 %
10042	CAB	IS-54 / IS-136 FDD (TDMA/FDM, PI/4-DQPSK, Halfrate)	AMPS	7.78	± 9.6 %
10044	CAA	IS-91/EIA/TIA-553 FDD (FDMA, FM)	AMPS	0.00	± 9.6 %
10048	CAA	DECT (TDD, TDMA/FDM, GFSK, Full Slot, 24)	DECT	13.80	±9.6 %
10049	CAA	DECT (TDD, TDMA/FDM, GFSK, Double Slot, 12)	DECT	10.79	± 9.6 %
10056	CAA	UMTS-TDD (TD-SCDMA, 1.28 Mcps)	TD-SCDMA	11.01	±9.6%
10058	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-1-2-3)	GSM	6.52	± 9.6 %
10059	CAB	IEEE 802.11b WIFI 2.4 GHz (DSSS, 2 Mbps)	WLAN	2.12	± 9.6 %
10060	CAB	IEEE 802.11b WIFI 2.4 GHz (DSSS, 5.5 Mbps)	WLAN	2.83	± 9.6 %
10061	CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 11 Mbps)	WLAN	3.60	± 9.6 %
10062	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 6 Mbps)	WLAN	8.68	± 9.6 %
10063	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 9 Mbps)	WLAN	8.63	± 9.6 %
10064	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 12 Mbps)	WLAN	9.09	± 9.6 %
10065	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 18 Mbps)	WLAN	9.00	± 9.6 %
10066	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 24 Mbps)	WLAN	9.38	± 9.6 %
10067	CAC	IEEE 802.11a/h WIFI 5 GHz (OFDM, 36 Mbps)	WLAN	10.12	± 9.6 %
10068	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 48 Mbps)	WLAN	10.12	± 9.6 %
10069	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 54 Mbps)	WLAN	10.56	± 9.6 %
10071	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 9 Mbps)	WLAN	9.83	± 9.6 %
10072	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 12 Mbps)	WLAN	9.62	± 9.6 %
10073	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 18 Mbps)	WLAN	9.94	± 9.6 %
10074	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 24 Mbps)	WLAN	10.30	± 9.6 %
10075	CAB	IEEE 802.11g WIFI 2.4 GHz (DSSS/OFDM, 36 Mbps)	WLAN	10.30	± 9.6 %
10076	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 48 Mbps)	WLAN	10.94	± 9.6 %
10077	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 54 Mbps)	WLAN	11.00	± 9.6 %
10081	CAB	CDMA2000 (1xRTT, RC3)	CDMA2000	3.97	± 9.6 %
10082	CAB	IS-54 / IS-136 FDD (TDMA/FDM, PI/4-DQPSK, Fullrate)	AMPS		
10090	DAC	GPRS-FDD (TDMA, GMSK, TN 0-4)	AWPS	4.77	±9.6 % ±9.6 %
10097	CAB	UMTS-FDD (HSDPA)	WCDMA	6.56 3.98	
10097	CAB	UMTS-FDD (HSUPA, Subtest 2)	WCDMA		$\pm 9.6\%$
10098	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-4)		3.98	$\pm 9.6\%$
10100	CAE		GSM	9.55	±9.6%
		LTE-FDD (SC-FDMA, 100% RB, 20 MHz, QPSK)	LTE-FDD	5.67	± 9.6 %
10101		LTE-FDD (SC-FDMA, 100% RB, 20 MHz, 16-QAM)	LTE-FDD	6.42	± 9.6 %
10102	CAE	LTE-FDD (SC-FDMA, 100% RB, 20 MHz, 64-QAM)	LTE-FDD	6.60	± 9.6 %
10103		LTE-TDD (SC-FDMA, 100% RB, 20 MHz, QPSK)	LTE-TDD	9.29	± 9.6 %
10104	CAG	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, 16-QAM)	LTE-TDD	9.97	± 9.6 %
10105	CAG	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, 64-QAM)	LTE-TDD	10.01	± 9.6 %
10108	CAG	LTE-FDD (SC-FDMA, 100% RB, 10 MHz, QPSK)	LTE-FDD	5.80	± 9.6 %

10109	CAG	LTE-FDD (SC-FDMA, 100% RB, 10 MHz, 16-QAM)	LTE-FDD	6.43	±9.6 %
10110	CAG	LTE-FDD (SC-FDMA, 100% RB, 5 MHz, QPSK)	LTE-FDD	5.75	± 9.6 %
10111	CAG	LTE-FDD (SC-FDMA, 100% RB, 5 MHz, 16-QAM)	LTE-FDD	6.44	±9.6 %
10112	CAG	LTE-FDD (SC-FDMA, 100% RB, 10 MHz, 64-QAM)	LTE-FDD	6.59	± 9.6 %
10113	CAG	LTE-FDD (SC-FDMA, 100% RB, 5 MHz, 64-QAM)	LTE-FDD	6.62	±9.6 %
10114	CAC	IEEE 802.11n (HT Greenfield, 13.5 Mbps, BPSK)	WLAN	8.10	±9.6%
10115	CAC	IEEE 802.11n (HT Greenfield, 81 Mbps, 16-QAM)	WLAN	8.46	±9.6%
10116	CAC	IEEE 802.11n (HT Greenfield, 135 Mbps, 64-QAM)	WLAN	8.15	± 9.6 %
10117	CAC	IEEE 802.11n (HT Mixed, 13.5 Mbps, BPSK)	WLAN	8.07	±9.6 %
10118	CAC	IEEE 802.11n (HT Mixed, 81 Mbps, 16-QAM)	WLAN	8.59	±9.6 %
10119	CAC	IEEE 802.11n (HT Mixed, 135 Mbps, 64-QAM)	WLAN	8.13	± 9.6 %
10140	CAE	LTE-FDD (SC-FDMA, 100% RB, 15 MHz, 16-QAM)	LTE-FDD	6.49	±9.6%
10141	CAE	LTE-FDD (SC-FDMA, 100% RB, 15 MHz, 64-QAM)	LTE-FDD	6.53	± 9.6 %
10142	CAE	LTE-FDD (SC-FDMA, 100% RB, 3 MHz, QPSK)	LTE-FDD	5.73	± 9.6 %
10143	CAE	LTE-FDD (SC-FDMA, 100% RB, 3 MHz, 16-QAM)	LTE-FDD	6.35	± 9.6 %
10144	CAE	LTE-FDD (SC-FDMA, 100% RB, 3 MHz, 64-QAM)	LTE-FDD	6.65	± 9.6 %
10145	CAF	LTE-FDD (SC-FDMA, 100% RB, 1.4 MHz, QPSK)	LTE-FDD	5.76	±9.6 %
10146	CAF	LTE-FDD (SC-FDMA, 100% RB, 1.4 MHz, 16-QAM)	LTE-FDD	6.41	± 9.6 %
10147	CAF	LTE-FDD (SC-FDMA, 100% RB, 1.4 MHz, 64-QAM)	LTE-FDD	6.72	± 9.6 %
10149	CAE	LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-QAM)	LTE-FDD	6.42	± 9.6 %
10150	CAE	LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 64-QAM)	LTE-FDD	6.60	±9.6 %
10151	CAG	LTE-TDD (SC-FDMA, 50% RB, 20 MHz, QPSK)	LTE-TDD	9.28	±9.6 %
10152	CAG	LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 16-QAM)	LTE-TDD	9.92	±9.6 %
10153	CAG	LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 64-QAM)	LTE-TDD	10.05	± 9.6 %
10154	CAG	LTE-FDD (SC-FDMA, 50% RB, 10 MHz, QPSK)	LTE-FDD	5.75	±9.6 %
10155	CAG	LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM)	LTE-FDD	6.43	± 9.6 %
10156	CAG	LTE-FDD (SC-FDMA, 50% RB, 5 MHz, QPSK)	LTE-FDD	5.79	±9.6 %
10157	CAG	LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM)	LTE-FDD	6.49	±9.6 %
10158	CAG	LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM)	LTE-FDD	6.62	±9.6 %
10159	CAG	LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM)	LTE-FDD	6.56	±9.6 %
10160	CAE	LTE-FDD (SC-FDMA, 50% RB, 15 MHz, QPSK)	LTE-FDD	5.82	±9.6 %
10161	CAE	LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)	LTE-FDD	6.43	± 9.6 %
10162	CAE	LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 64-QAM)	LTE-FDD	6.58	±9.6 %
10166	CAF	LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, QPSK)	LTE-FDD	5.46	± 9.6 %
10167	CAF	LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)	LTE-FDD	6.21	± 9,6 %
10168	CAF	LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM)	LTE-FDD	6.79	±9.6%
10169	CAE	LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)	LTE-FDD	5.73	± 9.6 %
10170	CAE	LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)	LTE-FDD	6.52	± 9.6 %
10171	AAE	LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)	LTE-FDD	6.49	± 9.6 %
10172	CAG	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK)	LTE-TDD	9.21	± 9.6 %
10173	CAG	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10174	CAG	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10175	CAG		LTE-FDD	5.72	± 9.6 %
10176	CAG	LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM)	LTE-FDD	6.52	± 9.6 %
10177	CAI	LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)	LTE-FDD	5.73	± 9.6 %
10178	CAG	LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)	LTE-FDD	6.52	±9.6 %
10178	CAG	LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)	LTE-FDD	6.50	± 9.6 %
10173	CAG	LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)	LTE-FDD	6.50	± 9.6 %
10180	CAE	LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)	LTE-FDD	5.72	± 9.6 %
10182	CAE	LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)	LTE-FDD	6.52	± 9.6 %
10182	AAD	LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)	LTE-FDD	6.50	± 9.6 %
10183	CAE	LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)	LTE-FDD	5.73	± 9.6 %
10185	CAE	LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)	LTE-FDD	6.51	± 9.6 %
10185	AAE	LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)	LTE-FDD	6.50	± 9.6 %
10188		LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)	LTE-FDD	5.73	± 9.6 %
10187	CAF	LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)	LTE-FDD	6.52	± 9.6 %
10188	AAF	LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)	LTE-FDD	6.50	± 9.6 %
10189	CAC	IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)	WLAN	8.09	± 9.6 %
10193	CAC	IEEE 802.11n (HT Greenfield, 39 Mbps, 16 GA)	WLAN	8.12	± 9.6 %
		IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)	WLAN	8.21	± 9.6 %
10195		IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)	WLAN	8.10	± 9.6 %
10196		IEEE 802.11n (HT Mixed, 6.3 Mbps, BP3N)	WLAN	8.13	± 9.6 %
10197	CAC	IEEE 802.11n (HT Mixed, 59 Mbps, 16-QAM)	WLAN	8.27	± 9.6 %
10198		IEEE 802.11n (HT Mixed, 65 Mibbs, 04-0AM)	WLAN	8.03	± 9.6 %
10219	CAC		· · · · · · · · ·		

10220	CAC	IEEE 802.11n (HT Mixed, 43.3 Mbps, 16-QAM)	WLAN	8.13	± 9.6 %
10221	CAC	IEEE 802.11n (HT Mixed, 72.2 Mbps, 64-QAM)	WLAN	8.27	± 9.6 %
10222	CAC	IEEE 802.11n (HT Mixed, 15 Mbps, BPSK)	WLAN	8.06	± 9.6 %
10223	CAC	IEEE 802.11n (HT Mixed, 90 Mbps, 16-QAM)	WLAN	8.48	±9.6 %
10224	CAC	IEEE 802.11n (HT Mixed, 150 Mbps, 64-QAM)	WLAN	8.08	± 9.6 %
10225	CAB	UMTS-FDD (HSPA+)	WCDMA	5.97	±9.6%
10226	CAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)	LTE-TDD	9.49	± 9.6 %
10227	CAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)	LTE-TDD	10.26	± 9.6 %
10228	CAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)	LTE-TDD	9.22	±9.6 %
10229	CAD	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10230	CAD	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10231	CAD	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, QPSK)	LTE-TDD	9.19	±9.6 %
10232	CAG	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)	LTE-TDD	9.48	±9.6 %
10233	CAG	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10234	CAG	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK)	LTE-TDD	9.21	± 9.6 %
10235	CAG	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10236	CAG	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10237	CAG	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, QPSK)	LTE-TDD	9.21	± 9.6 %
10238	CAF	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10239	CAF	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10240	CAF	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, QPSK)	LTE-TDD	9.21	±9.6 %
10241	CAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)	LTE-TDD	9.82	±9.6 %
10242	CAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM)	LTE-TDD	9.86	±9.6 %
10243	CAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, QPSK)	LTE-TDD	9.46	± 9.6 %
10244	CAD	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 16-QAM)	LTE-TDD	10.06	±9.6 %
10245	CAD	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 64-QAM)	LTE-TDD	10.06	± 9.6 %
10246	CAD	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, QPSK)	LTE-TDD	9.30	± 9.6 %
10247	CAG	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM)	LTE-TDD	9.91	± 9.6 %
10248	CAG	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM)	LTE-TDD	10.09	±9.6 %
10249	CAG	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, QPSK)	LTE-TDD	9.29	±9.6 %
10250	CAG	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM)	LTE-TDD	9.81	±9.6 %
10251	CAG	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM)	LTE-TDD	10.17	±9.6 %
10252	CAG	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, QPSK)	LTE-TDD	9.24	±9.6 %
10253	CAF	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)	LTE-TDD	9.90	±9.6%
10254	CAF	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 64-QAM)	LTE-TDD	10.14	±9.6 %
10255	CAF	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, QPSK)	LTE-TDD	9.20	±9.6 %
10256	CAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, 16-QAM)	LTE-TDD	9.96	±9.6%
10257	CAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, 64-QAM)	LTE-TDD	10.08	±9.6 %
10258	CAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, QPSK)	LTE-TDD	9.34	±9.6 %
10259	CAD	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, 16-QAM)	LTE-TDD	9.98	± 9.6 %
10260	CAD	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, 64-QAM)	LTE-TDD	9.97	±9.6 %
10261	CAD	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, QPSK)	LTE-TDD	9.24	±9.6 %
10262	CAG	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, 16-QAM)	LTE-TDD	9.83	± 9.6 %
10263	CAG	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, 64-QAM)	LTE-TDD	10.16	± 9.6 %
10264	CAG	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, QPSK)	LTE-TDD	9.23	±9.6 %
10265	CAG	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, 16-QAM)	LTE-TDD	9.92	±9.6 %
10266	CAG	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, 64-QAM)	LTE-TDD	10.07	± 9.6 %
10267	CAG	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, QPSK)	LTE-TDD	9.30	±9.6%
10268	CAF	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, 16-QAM)	LTE-TDD	10.06	±9.6%
10269	CAF	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, 64-QAM)	LTE-TDD	10.13	±9.6%
10270	CAF	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, QPSK)	LTE-TDD	9.58	±9.6%
10274	CAB	UMTS-FDD (HSUPA, Subtest 5, 3GPP Rel8.10)	WCDMA	4.87	± 9.6 %
10275	CAB	UMTS-FDD (HSUPA, Subtest 5, 3GPP Rel8.4)	WCDMA	3.96	± 9.6 %
10277	CAA	PHS (QPSK)	PHS	11.81	± 9.6 %
10278	CAA	PHS (QPSK, BW 884MHz, Rolloff 0.5)	PHS	11.81	± 9.6 %
10279	CAA	PHS (QPSK, BW 884MHz, Rolloff 0.38)	PHS	12.18	±9.6%
10290	AAB	CDMA2000, RC1, SO55, Full Rate	CDMA2000	3.91	± 9.6 %
10291	AAB	CDMA2000, RC3, SO55, Full Rate	CDMA2000	3.46	± 9.6 %
10292	AAB	CDMA2000, RC3, SO32, Full Rate	CDMA2000	3.39	±9.6 %
10293	AAB	CDMA2000, RC3, SO3, Full Rate	CDMA2000	3.50	± 9.6 %
10295	AAB	CDMA2000, RC1, SO3, 1/8th Rate 25 fr.	CDMA2000	12.49	± 9.6 %
10297	AAD	LTE-FDD (SC-FDMA, 50% RB, 20 MHz, QPSK)	LTE-FDD	5.81	± 9.6 %
10298	AAD	LTE-FDD (SC-FDMA, 50% RB, 3 MHz, QPSK)	LTE-FDD	5.72	±9.6 %
10299	AAD	LTE-FDD (SC-FDMA, 50% RB, 3 MHz, 16-QAM)	LTE-FDD	6.39	± 9.6 %

10300	AAD	LTE-FDD (SC-FDMA, 50% RB, 3 MHz, 64-QAM)	LTE-FDD	6.60	±9.6 %
10301	AAA	IEEE 802.16e WiMAX (29:18, 5ms, 10MHz, QPSK, PUSC)	WIMAX	12.03	± 9.6 %
10302	AAA	IEEE 802.16e WIMAX (29:18, 5ms, 10MHz, QPSK, PUSC, 3 CTRL symbols)	WIMAX	12.57	±9.6 %
10303	AAA	IEEE 802.16e WIMAX (31:15, 5ms, 10MHz, 64QAM, PUSC)	WIMAX	12.52	±9.6 %
10304	AAA	IEEE 802.16e WIMAX (29:18, 5ms, 10MHz, 64QAM, PUSC)	WIMAX	11.86	±9.6 %
10305	AAA	IEEE 802.16e WIMAX (31:15, 10ms, 10MHz, 64QAM, PUSC, 15 symbols)	WIMAX	15.24	± 9.6 %
10306	AAA	IEEE 802.16e WIMAX (29:18, 10ms, 10MHz, 64QAM, PUSC, 18 symbols)	WIMAX	14.67	± 9.6 %
10307	AAA	IEEE 802.16e WiMAX (29:18, 10ms, 10MHz, QPSK, PUSC, 18 symbols)	WiMAX	14.49	± 9.6 %
10308	AAA	IEEE 802.16e WIMAX (29:18, 10ms, 10MHz, 16QAM, PUSC)	Wimax	14.46	±9.6 %
10309	AAA	IEEE 802.16e WIMAX (29:18, 10ms, 10MHz, 16QAM, AMC 2x3, 18 symbols)	WIMAX	14.58	±9.6 %
10310	AAA	IÉEE 802.16e WIMAX (29:18, 10ms, 10MHz, QPSK, AMC 2x3, 18 symbols)	WIMAX	14.57	±9.6 %
10311	AAD	LTE-FDD (SC-FDMA, 100% RB, 15 MHz, QPSK)	LTE-FDD	6.06	± 9.6 %
10313	AAA	IDEN 1:3	IDEN	10.51	± 9.6 %
10314	AAA	IDEN 1:6	IDEN	13.48	± 9.6 %
10315	AAB	IEEE 802.11b WIFI 2.4 GHz (DSSS, 1 Mbps, 96pc duty cycle)	WLAN	1.71	± 9.6 %
10316	AAB	IEEE 802.11g WiFi 2.4 GHz (ERP-OFDM, 6 Mbps, 96pc duty cycle)	WLAN	8.36	± 9.6 %
10317	AAC	IEEE 802.11a WiFi 5 GHz (OFDM, 6 Mbps, 96pc duty cycle)	WLAN	8.36	± 9.6 %
10352	AAA	Pulse Waveform (200Hz, 10%)	Generic	10.00	± 9.6 %
10353	AAA	Pulse Waveform (200Hz, 20%)	Generic	6.99	± 9.6 %
10354	AAA	Pulse Waveform (200Hz, 40%)	Generic	3.98	± 9.6 %
10355	AAA	Pulse Waveform (200Hz, 60%)	Generic	2.22	± 9.6 %
10356	AAA	Pulse Waveform (200Hz, 80%)	Generic	0.97	±9.6 %
10387	AAA	QPSK Waveform, 1 MHz	Generic	5.10	± 9.6 %
10388	AAA	QPSK Waveform, 10 MHz	Generic	5.22	± 9.6 %
10396	AAA	64-QAM Waveform, 100 kHz	Generic	6.27	± 9.6 %
10399	AAA	64-QAM Waveform, 40 MHz	Generic	6.27	± 9.6 %
10400	AAD	IEEE 802.11ac WiFi (20MHz, 64-QAM, 99pc duty cycle)	WLAN	8.37	± 9.6 %
10401	AAD	IEEE 802.11ac WiFi (40MHz, 64-QAM, 99pc duty cycle)	WLAN	8.60	± 9.6 %
10402	AAD	IEEE 802.11ac WiFi (80MHz, 64-QAM, 99pc duty cycle)	WLAN	8.53	± 9.6 %
10403	AAB	CDMA2000 (1xEV-DO, Rev. 0)	CDMA2000	3.76	± 9.6 %
10404	AAB	CDMA2000 (1xEV-DO, Rev. A)	CDMA2000	3.77	± 9.6 %
10406	AAB	CDMA2000, RC3, SO32, SCH0, Full Rate	CDMA2000	5.22	± 9.6 %
10410	AAG	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, QPSK, UL Subframe=2,3,4,7,8,9, Subframe Conf=4)	LTE-TDD	7.82	± 9.6 %
10414	AAA	WLAN CCDF, 64-QAM, 40MHz	Generic	8,54	± 9.6 %
10415	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 1 Mbps, 99pc duty cycle)	WLAN	1.54	± 9.6 %
10416	AAA	IEEE 802.11g WiFi 2.4 GHz (ERP-OFDM, 6 Mbps, 99pc duty cycle)	WLAN	8.23	± 9.6 %
10417	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 6 Mbps, 99pc duty cycle)	WLAN	8.23	± 9.6 %
10418	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps, 99pc duty cycle, Long preambule)	WLAN	8.14	± 9.6 %
10419	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps, 99pc duty cycle, Short preambule)	WLAN	8.19	± 9.6 %
				1 0 22	± 9.6 %
10422	AAB	IEEE 802.11n (HT Greenfield, 7.2 Mbps, BPSK)	WLAN	8.32	
10422 10423	AAB AAB	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM)	WLAN	8.47	± 9.6 %
		IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM)	WLAN WLAN	8.47 8.40	± 9.6 %
10423	AAB	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM)	WLAN WLAN WLAN	8.47 8.40 8.41	± 9.6 % ± 9.6 %
10423 10424	AAB AAB	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM) IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK) IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM)	WLAN WLAN WLAN WLAN	8.47 8.40 8.41 8.45	± 9.6 %       ± 9.6 %       ± 9.6 %
10423 10424 10425	AAB AAB AAB	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM) IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK) IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM)	WLAN WLAN WLAN WLAN WLAN	8.47 8.40 8.41 8.45 8.41	± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %
10423 10424 10425 10426	AAB AAB AAB AAB	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM) IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK) IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM) LTE-FDD (OFDMA, 5 MHz, E-TM 3.1)	WLAN WLAN WLAN WLAN WLAN LTE-FDD	8.47 8.40 8.41 8.45 8.41 8.28	± 9.6 % ± 9.6 % ± 9.6 % ± 9.6 %
10423 10424 10425 10426 10427	AAB AAB AAB AAB AAB	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM) IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK) IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM)	WLAN WLAN WLAN WLAN LTE-FDD LTE-FDD	8.47 8.40 8.41 8.45 8.41 8.28 8.38	$\begin{array}{r} \pm 9.6 \% \\ \pm 9.6 \% \end{array}$
10423 10424 10425 10426 10427 10430	AAB AAB AAB AAB AAB AAD	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM) IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK) IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM) LTE-FDD (OFDMA, 5 MHz, E-TM 3.1)	WLAN WLAN WLAN WLAN LTE-FDD LTE-FDD LTE-FDD	8.47 8.40 8.41 8.45 8.41 8.28 8.38 8.38 8.34	$\begin{array}{c} \pm 9.6 \% \\ \pm 9.6 \% \end{array}$
10423 10424 10425 10426 10427 10430 10431 10432	AAB AAB AAB AAB AAB AAD AAD AAC	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM)IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM)IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK)IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM)IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM)IEEE 70D (OFDMA, 5 MHz, E-TM 3.1)LTE-FDD (OFDMA, 10 MHz, E-TM 3.1)LTE-FDD (OFDMA, 15 MHz, E-TM 3.1)	WLAN WLAN WLAN WLAN LTE-FDD LTE-FDD	8.47 8.40 8.41 8.45 8.41 8.28 8.38	$\begin{array}{c} \pm \ 9.6 \ \% \\ \pm \ 9.6 \ \% \end{array}$
10423 10424 10425 10426 10427 10430 10431 10432 10433	AAB AAB AAB AAB AAB AAD AAD AAD AAC AAC	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM)IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM)IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK)IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM)IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM)LTE-FDD (OFDMA, 5 MHz, E-TM 3.1)LTE-FDD (OFDMA, 10 MHz, E-TM 3.1)LTE-FDD (OFDMA, 15 MHz, E-TM 3.1)LTE-FDD (OFDMA, 20 MHz, E-TM 3.1)LTE-FDD (OFDMA, 20 MHz, E-TM 3.1)	WLAN WLAN WLAN WLAN LTE-FDD LTE-FDD LTE-FDD	8.47 8.40 8.41 8.45 8.41 8.28 8.38 8.38 8.34	$\begin{array}{c} \pm 9.6 \% \\ \pm 9.6 \% \end{array}$
10423 10424 10425 10426 10427 10430 10431 10432	AAB AAB AAB AAB AAB AAD AAD AAC	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM)IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM)IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK)IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM)IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM)IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM)IEE-FDD (OFDMA, 5 MHz, E-TM 3.1)LTE-FDD (OFDMA, 10 MHz, E-TM 3.1)LTE-FDD (OFDMA, 15 MHz, E-TM 3.1)LTE-FDD (OFDMA, 20 MHz, E-TM 3.1)UCDMA (BS Test Model 1, 64 DPCH)LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL	WLAN WLAN WLAN WLAN LTE-FDD LTE-FDD LTE-FDD LTE-FDD	8.47 8.40 8.41 8.45 8.41 8.28 8.38 8.38 8.34 8.34	$\begin{array}{c} \pm 9.6 \% \\ \pm 9.6 \% \end{array}$
10423 10424 10425 10426 10427 10430 10431 10432 10433 10434 10435	AAB AAB AAB AAB AAD AAD AAD AAC AAC AAA AAF	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM) IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK) IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM) LTE-FDD (OFDMA, 5 MHz, E-TM 3.1) LTE-FDD (OFDMA, 10 MHz, E-TM 3.1) LTE-FDD (OFDMA, 15 MHz, E-TM 3.1) LTE-FDD (OFDMA, 20 MHz, E-TM 3.1) LTE-FDD (OFDMA, 20 MHz, E-TM 3.1) LTE-FDD (OFDMA, 20 MHz, E-TM 3.1) LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	WLAN WLAN WLAN WLAN LTE-FDD LTE-FDD LTE-FDD LTE-FDD WCDMA LTE-TDD	8.47           8.40           8.41           8.45           8.41           8.28           8.38           8.34           8.34           8.60           7.82	$\begin{array}{c} \pm 9.6 \% \\ \pm 9.6 \% \end{array}$
10423 10424 10425 10426 10427 10430 10431 10432 10433 10434 10435 10447	AAB AAB AAB AAB AAD AAD AAD AAC AAC AAA AAF AAD	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM)IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM)IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK)IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM)IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM)IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM)LTE-FDD (OFDMA, 5 MHz, E-TM 3.1)LTE-FDD (OFDMA, 10 MHz, E-TM 3.1)LTE-FDD (OFDMA, 15 MHz, E-TM 3.1)LTE-FDD (OFDMA, 20 MHz, E-TM 3.1)LTE-FDD (OFDMA, 20 MHz, E-TM 3.1)LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK, ULSubframe=2,3,4,7,8,9)LTE-FDD (OFDMA, 5 MHz, E-TM 3.1, Clipping 44%)	WLAN WLAN WLAN WLAN LTE-FDD LTE-FDD LTE-FDD WCDMA LTE-TDD LTE-FDD	8.47 8.40 8.41 8.45 8.41 8.28 8.38 8.34 8.34 8.34 8.60 7.82 7.56	± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %           ± 9.6 %
10423 10424 10425 10426 10427 10430 10431 10432 10433 10434 10435	AAB AAB AAB AAB AAD AAD AAD AAC AAC AAA AAF	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM) IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK) IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM) IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM) LTE-FDD (OFDMA, 5 MHz, E-TM 3.1) LTE-FDD (OFDMA, 10 MHz, E-TM 3.1) LTE-FDD (OFDMA, 15 MHz, E-TM 3.1) LTE-FDD (OFDMA, 20 MHz, E-TM 3.1) LTE-FDD (OFDMA, 20 MHz, E-TM 3.1) LTE-FDD (OFDMA, 20 MHz, E-TM 3.1) LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	WLAN WLAN WLAN WLAN LTE-FDD LTE-FDD LTE-FDD LTE-FDD WCDMA LTE-TDD	8.47           8.40           8.41           8.45           8.41           8.28           8.38           8.34           8.34           8.60           7.82	± 9.6 %         ± 9.6 %         ± 9.6 %         ± 9.6 %         ± 9.6 %

10451	AAA	W-CDMA (BS Test Model 1, 64 DPCH, Clipping 44%)	WCDMA	7.59	± 9.6 %
10456	AAB	IEEE 802.11ac WiFi (160MHz, 64-QAM, 99pc duty cycle)	WLAN	8.63	± 9.6 %
10457	AAA	UMTS-FDD (DC-HSDPA)	WCDMA	6.62	± 9.6 %
10458	AAA	CDMA2000 (1xEV-DO, Rev. B, 2 carriers)	CDMA2000	6.55	± 9.6 %
10459	AAA	CDMA2000 (1xEV-DO, Rev. B, 3 carriers)	CDMA2000	8.25	± 9.6 %
10460	AAA	UMTS-FDD (WCDMA, AMR)	WCDMA	2.39	± 9.6 %
10461	AAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10462	AAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.30	±9.6 %
10463	AAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.56	± 9.6 %
10464	AAC	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10465	AAC	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10466	AAC	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	± 9.6 %
10467	AAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10468	AAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10469	AAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.56	± 9.6 %
10470	AAF	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10471	AAF	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10472	AAF	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	± 9.6 %
10473	AAE	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10474	AAE	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10475	AAE	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	±9.6 %
10477	AAF	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10478	AAF	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	±9.6 %
10479	AAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.74	± 9.6 %
10480	AAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.18	±9.6 %
10481	AAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.45	± 9.6 %
10482	AAC	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.71	±9.6 %
10483	AAC	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.39	± 9.6 %
10484	AAC	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.47	± 9.6 %
10485	AAF	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.59	± 9.6 %
10486	AAF	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.38	±9.6 %
10487	AAF	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.60	± 9.6 %
10488	AAF	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.70	± 9.6 %
10489	AAF	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.31	± 9.6 %
10490	AAF	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.54	± 9.6 %
10491	AAE	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.74	±9.6 %

10492	AAE	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM, UL	LTE-TDD	8.41	± 9.6 %
		Subframe=2,3,4,7,8,9) LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 64-QAM, UL	LTE-TDD	8.55	± 9.6 %
10493	AAE	Subframe=2,3,4,7,8,9)			
10494	AAF	LTE-TDD (SC-FDMA, 50% RB, 20 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.74	±9.6 %
10495	AAF	LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 16-QAM, UL	LTE-TDD	8.37	± 9.6 %
10496	AAF	Subframe=2,3,4,7,8,9) LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.54	±9.6 %
10497	AAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.67	± 9.6 %
10498	AAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.40	± 9.6 %
10499	AAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, 64-QAM, UL Subframe=2.3.4.7.8.9)	LTE-TDD	8.68	± 9.6 %
10500	AAC	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, QPSK, UL Subframe=2.3.4,7.8.9)	LTE-TDD	7.67	±9.6 %
10501	AAC	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.44	± 9.6 %
10502	AAC	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.52	± 9.6 %
10503	AAF	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, QPSK, UL Subframe=2.3,4,7,8,9)	LTE-TDD	7.72	± 9.6 %
10504	AAF	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.31	± 9.6 %
10505	AAF	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.54	± 9.6 %
10506	AAF	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.74	± 9.6 %
10507	AAF	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.36	±9.6 %
10508	AAF	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.55	± 9.6 %
10509	AAE	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, QPSK, UL Subframe=2.3.4.7.8.9)	LTE-TDD	7.99	±9.6 %
10510	AAE	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, 16-QAM, UL Subframe=2.3.4.7.8.9)	LTE-TDD	8.49	±9.6 %
10511	AAE	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.51	± 9.6 %
10512	AAF	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.74	±9.6 %
10513	AAF	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.42	± 9.6 %
10514	AAF	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.45	±9.6 %
10515	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 2 Mbps, 99pc duty cycle)	WLAN	1.58	± 9.6 %
10516	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 5.5 Mbps, 99pc duty cycle)	WLAN	1.57	± 9.6 %
10517	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 11 Mbps, 99pc duty cycle)	WLAN	1.58	± 9.6 %
10518	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 9 Mbps, 99pc duty cycle)	WLAN	8.23	± 9.6 %
10519	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 12 Mbps, 99pc duty cycle)	WLAN	8.39	± 9.6 %
10520	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 18 Mbps, 99pc duty cycle)	WLAN	8.12	± 9.6 %
10521	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 24 Mbps, 99pc duty cycle)	WLAN	7.97	± 9.6 %
10522	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 36 Mbps, 99pc duty cycle)	WLAN	8.45	± 9.6 %
10523	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 48 Mbps, 99pc duty cycle)	WLAN	8.08	± 9.6 %
10524	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 54 Mbps, 99pc duty cycle)	WLAN	8.27	± 9.6 %
10525	AAB	IEEE 802.11ac WiFi (20MHz, MCS0, 99pc duty cycle)	WLAN	8.36	± 9.6 %
10526	AAB	IEEE 802.11ac WiFi (20MHz, MCS1, 99pc duty cycle)	WLAN	8.42	± 9.6 %
10527	AAB	IEEE 802.11ac WiFi (20MHz, MCS2, 99pc duty cycle)	WLAN	8.21	± 9.6 %
10528	AAB	IEEE 802.11ac WiFi (20MHz, MCS3, 99pc duty cycle)	WLAN	8.36	± 9.6 %
10529	AAB	IEEE 802.11ac WiFi (20MHz, MCS4, 99pc duty cycle)	WLAN	8.36	± 9.6 %
10531	AAB	IEEE 802.11ac WiFi (20MHz, MCS6, 99pc duty cycle)	WLAN	8.43	$\pm 9.6\%$
10532	AAB	IEEE 802.11ac WiFi (20MHz, MCS7, 99pc duty cycle)	WLAN	8.29	± 9.6 %
10533	AAB	IEEE 802.11ac WiFi (20MHz, MCS8, 99pc duty cycle)	WLAN	8.38	$\pm 9.6\%$
10534	AAB	IEEE 802.11ac WiFi (40MHz, MCS0, 99pc duty cycle)	WLAN	8.45	± 9.6 %

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10535	AAB	IEEE 802.11ac WiFi (40MHz, MCS1, 99pc duty cycle)	WLAN	8.45	± 9.6 %
10536	AAB	IEEE 802.11ac WiFI (40MHz, MCS2, 99pc duty cycle)	WLAN	8.32	± 9.6 %
10537	AAB	IEEE 802.11ac WiFi (40MHz, MCS3, 99pc duty cycle)	WLAN	8.44	± 9.6 %
10538	AAB	IEEE 802.11ac WiFi (40MHz, MCS4, 99pc duty cycle)	WLAN	8.54	± 9.6 %
10540	AAB	IEEE 802.11ac WiFi (40MHz, MCS6, 99pc duty cycle)	WLAN	8.39	± 9.6 %
10541	AAB	IEEE 802.11ac WiFi (40MHz, MCS7, 99pc duty cycle)	WLAN	8.46	± 9.6 %
10542	AAB	IEEE 802.11ac WiFi (40MHz, MCS8, 99pc duty cycle)	WLAN	8.65	± 9.6 %
10543	AAB	IEEE 802.11ac WiFi (40MHz, MCS9, 99pc duty cycle)	WLAN	8.65	± 9.6 %
10544	AAB	IEEE 802.11ac WiFi (80MHz, MCS0, 99pc duty cycle)	WLAN	8.47	± 9.6 %
10545	AAB	IEEE 802.11ac WiFi (80MHz, MCS1, 99pc duty cycle)	WLAN	8.55	± 9.6 %
10546	AAB	IEEE 802.11ac WiFi (80MHz, MCS2, 99pc duty cycle)	WLAN	8.35	± 9.6 %
10547	AAB	IEEE 802.11ac WiFi (80MHz, MCS3, 99pc duty cycle)	WLAN	8.49	
10548	AAB	IEEE 802.11ac WiFi (80MHz, MCS4, 99pc duty cycle)	WLAN	8.37	± 9.6 %
10550	AAB	IEEE 802.11ac WiFi (80MHz, MCS6, 99pc duty cycle)	WLAN		± 9.6 %
10551	AAB	IEEE 802.11ac WiFi (80MHz, MCS7, 99pc duty cycle)		8.38	± 9.6 %
10552	AAB	IEEE 802.11ac WiFi (80MHz, MCS8, 99pc duty cycle)	WLAN	8.50	± 9.6 %
10553	AAB		WLAN	8.42	± 9.6 %
10554		IEEE 802.11ac WIFI (80MHz, MCS9, 99pc duty cycle)	WLAN	8,45	± 9.6 %
	AAC	IEEE 802.11ac WIFI (160MHz, MCS0, 99pc duty cycle)	WLAN	8.48	± 9.6 %
10555	AAC	IEEE 802.11ac WiFi (160MHz, MCS1, 99pc duty cycle)	WLAN	8.47	± 9.6 %
10556	AAC	IEEE 802.11ac WiFi (160MHz, MCS2, 99pc duty cycle)	WLAN	8.50	± 9.6 %
10557	AAC	IEEE 802.11ac WiFi (160MHz, MCS3, 99pc duty cycle)	WLAN	8.52	± 9.6 %
10558	AAC	IEEE 802.11ac WiFi (160MHz, MCS4, 99pc duty cycle)	WLAN	8.61	± 9.6 %
10560	AAC	IEEE 802.11ac WiFi (160MHz, MCS6, 99pc duty cycle)	WLAN	8.73	± 9.6 %
10561	AAC	IEEE 802.11ac WiFi (160MHz, MCS7, 99pc duty cycle)	WLAN	8.56	± 9.6 %
10562	AAC	IEEE 802.11ac WiFi (160MHz, MCS8, 99pc duty cycle)	WLAN	8.69	± 9.6 %
10563	AAC	IEEE 802.11ac WiFi (160MHz, MCS9, 99pc duty cycle)	WLAN	8.77	± 9.6 %
10564	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 9 Mbps, 99pc duty	WLAN	8.25	± 9.6 %
		cycle)		0.20	1 2 3.0 78
10565	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 12 Mbps, 99pc duty	WLAN	8.45	± 9.6 %
		cycle)		0.40	1 1 0.0 70
10566	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 18 Mbps, 99pc duty	WLAN	8.13	± 9.6 %
	1000	cycle)	VVLAIN	0.15	19.0 %
10567	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 24 Mbps, 99pc duty	WLAN		+069/
10007			VVLAN	8.00	±9.6 %
10568	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 36 Mbps, 99pc duty	34/1.431	0.07	1000
10000		cvde)	WLAN	8.37	±9.6 %
10569	AAA		10/1 0.01		1000
10009	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 48 Mbps, 99pc duty	WLAN	8.10	± 9.6 %
10570	A A A				
10570	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 54 Mbps, 99pc duty	WLAN	8.30	± 9.6 %
40574					
10571	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 1 Mbps, 90pc duty cycle)	WLAN	1.99	± 9.6 %
10572	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 2 Mbps, 90pc duty cycle)	WLAN	1.99	± 9.6 %
10573	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 5.5 Mbps, 90pc duty cycle)	WLAN	1.98	± 9.6 %
10574	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 11 Mbps, 90pc duty cycle)	WLAN	1.98	± 9.6 %
10575	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps, 90pc duty	WLAN	8.59	± 9.6 %
		cycle)			
10576	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 9 Mbps, 90pc duty	WLAN	8.60	± 9.6 %
		cycle)			
10577	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 12 Mbps, 90pc duty	WLAN	8.70	± 9.6 %
		cycle)			
10578	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 18 Mbps, 90pc duty	WLAN	8.49	± 9.6 %
		cycle)			
10579	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 24 Mbps, 90pc duty	WLAN	8.36	± 9.6 %
		cycle)			
10580	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 36 Mbps, 90pc duty	WLAN	8.76	± 9.6 %
	1	cycle)	1 1 1 1 1	0.10	20.0 /0
10581	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 48 Mbps, 90pc duty	WLAN	8.35	± 9.6 %
	1.0.0	cycle)		0.50	1 3.0 %
10582	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 54 Mbps, 90pc duty		0.07	+060/
10002	1 ~~~~		WLAN	8.67	± 9.6 %
40500				+	
10583	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 6 Mbps, 90pc duty cycle)	WLAN	8.59	± 9.6 %
10584	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 9 Mbps, 90pc duty cycle)	WLAN	8.60	± 9.6 %
		IEEE 802.11a/h WiFi 5 GHz (OFDM, 12 Mbps, 90pc duty cycle)	WLAN	8.70	± 9.6 %
10585	AAB				
10585 10586 10587	AAB AAB AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 18 Mbps, 90pc duty cycle) IEEE 802.11a/h WiFi 5 GHz (OFDM, 18 Mbps, 90pc duty cycle)	WLAN WLAN	8.49	± 9.6 % ± 9.6 %

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10588	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 36 Mbps, 90pc duty cycle)	WLAN	8.76	<u>±9.6 %</u>
10589	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 48 Mbps, 90pc duty cycle)	WLAN	8.35	±9.6 %
10590	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 54 Mbps, 90pc duty cycle)	WLAN	8.67	± 9.6 %
10591	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS0, 90pc duty cycle)	WLAN	8.63	± 9.6 %
10592	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS1, 90pc duty cycle)	WLAN	8.79	±9.6 %
10593	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS2, 90pc duty cycle)	WLAN	8.64	±9.6 %
10594	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS3, 90pc duty cycle)	WLAN	8.74	± 9.6 %
10595	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS4, 90pc duty cycle)	WLAN	8.74	± 9.6 %
10596	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS5, 90pc duty cycle)	WLAN	8.71	±9.6 %
10597	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS6, 90pc duty cycle)	WLAN	8.72	± 9.6 %
10598	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS7, 90pc duty cycle)	WLAN	8.50	± 9.6 %
10599	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS0, 90pc duty cycle)	WLAN	8.79	± 9.6 %
10600	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS1, 90pc duty cycle)	WLAN	8.88	±9.6 %
10601	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS2, 90pc duty cycle)	WLAN	8.82	±9.6 %
10602	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS3, 90pc duty cycle)	WLAN	8.94	± 9.6 %
10603	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS4, 90pc duty cycle)	WLAN	9.03	±9.6 %
10604	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS5, 90pc duty cycle)	WLAN	8.76	±9.6%
10605	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS6, 90pc duty cycle)	WLAN	8.97	± 9.6 %
10606	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS7, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10607	AAB	IEEE 802.11ac WiFi (20MHz, MCS0, 90pc duty cycle)	WLAN	8.64	± 9.6 %
10608	AAB	IEEE 802.11ac WiFi (20MHz, MCS1, 90pc duty cycle)	WLAN	8.77	±9.6 %
10609	AAB	IEEE 802.11ac WiFi (20MHz, MCS2, 90pc duty cycle)	WLAN	8.57	± 9.6 %
10610	AAB	IEEE 802.11ac WiFi (20MHz, MCS3, 90pc duty cycle)	WLAN	8.78	± 9.6 %
10611	AAB	IEEE 802.11ac WiFI (20MHz, MCS4, 90pc duty cycle)	WLAN	8.70	± 9.6 %
10612	AAB	IEEE 802.11ac WiFi (20MHz, MCS5, 90pc duty cycle)	WLAN	8.77	± 9.6 %
10613	AAB	IEEE 802.11ac WiFi (20MHz, MCS6, 90pc duty cycle)	WLAN	8.94	± 9.6 %
10614	AAB	IEEE 802.11ac WiFi (20MHz, MCS7, 90pc duty cycle)	WLAN	8.59	± 9.6 %
10615	AAB	IEEE 802.11ac WiFi (20MHz, MCS8, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10616	AAB	IEEE 802.11ac WiFi (40MHz, MCS0, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10617	AAB	IEEE 802.11ac WiFi (40MHz, MCS1, 90pc duty cycle)	WLAN	8.81	± 9.6 %
10618	AAB	IEEE 802.11ac WiFi (40MHz, MCS2, 90pc duty cycle)	WLAN	8.58	± 9.6 %
10619	AAB	IEEE 802.11ac WiFi (40MHz, MCS3, 90pc duty cycle)	WLAN	8.86	±9.6 %
10620	AAB	IEEE 802.11ac WiFi (40MHz, MCS4, 90pc duty cycle)	WLAN	8.87	± 9.6 %
10621	AAB	IEEE 802.11ac WiFi (40MHz, MCS5, 90pc duty cycle)	WLAN	8.77	± 9.6 %
10622	AAB	IEEE 802.11ac WiFi (40MHz, MCS6, 90pc duty cycle)	WLAN	8.68	± 9.6 %
10623	AAB	IEEE 802.11ac WiFi (40MHz, MCS7, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10624	AAB	IEEE 802.11ac WiFi (40MHz, MCS8, 90pc duty cycle)	WLAN	8.96	± 9.6 %
10625	AAB	IEEE 802.11ac WiFi (40MHz, MCS9, 90pc duty cycle)	WLAN	8.96	± 9.6 %
10626	AAB	IEEE 802.11ac WiFi (80MHz, MCS0, 90pc duty cycle)	WLAN	8.83	± 9.6 %
10627	AAB	IEEE 802.11ac WiFi (80MHz, MCS1, 90pc duty cycle)	WLAN	8.88	± 9.6 %
10628	AAB	IEEE 802.11ac WiFi (80MHz, MCS2, 90pc duty cycle)	WLAN	8.71	± 9.6 %
10629	AAB	IEEE 802.11ac WiFi (80MHz, MCS3, 90pc duty cycle)	WLAN	8.85	± 9.6 %
10630	AAB	IEEE 802.11ac WiFi (80MHz, MCS4, 90pc duty cycle)	WLAN	8.72	± 9.6 %
10631	AAB	IEEE 802.11ac WiFi (80MHz, MCS5, 90pc duty cycle)	WLAN	8.81	± 9.6 %
10632	AAB	IEEE 802.11ac WiFi (80MHz, MCS6, 90pc duty cycle)	WLAN	8.74	± 9.6 %
10633	AAB	IEEE 802.11ac WiFi (80MHz, MCS7, 90pc duty cycle)	WLAN	8.83	± 9.6 %
10634	AAB	IEEE 802.11ac WiFi (80MHz, MCS8, 90pc duty cycle)	WLAN	8.80	± 9.6 %
10635	AAB	IEEE 802.11ac WiFi (80MHz, MCS9, 90pc duty cycle)	WLAN	8.81	± 9.6 %
10636	AAC	IEEE 802.11ac WiFi (160MHz, MCS0, 90pc duty cycle)	WLAN	8.83	± 9.6 %
10637	AAC	IEEE 802.11ac WiFi (160MHz, MCS1, 90pc duty cycle)	WLAN	8.79	± 9.6 %
10638	AAC	IEEE 802.11ac WiFi (160MHz, MCS2, 90pc duty cycle)	WLAN	8.86	± 9.6 %
10639	AAC	IEEE 802.11ac WiFi (160MHz, MCS3, 90pc duty cycle)	WLAN	8.85	± 9.6 %
10640	AAC	IEEE 802.11ac WiFi (160MHz, MCS4, 90pc duty cycle)	WLAN	8.98	± 9.6 %
10641	AAC	IEEE 802.11ac WiFi (160MHz, MCS5, 90pc duty cycle)	WLAN	9.06	± 9.6 %
10041	AAC	IEEE 802.11ac WiFi (160MHz, MCS6, 90pc duty cycle)	WLAN	9.06	± 9.6 %
10642		IEEE 802.11ac WiFi (160MHz, MCS7, 90pc duty cycle)	WLAN	8.89	± 9.6 %
	AAC				
10642	AAC AAC	IEEE 802.11ac WiFi (160MHz, MCS8, 90pc duty cycle)	WLAN	9.05	± 9.6 %
10642 10643		IEEE 802.11ac WiFi (160MHz, MCS8, 90pc duty cycle) IEEE 802.11ac WiFi (160MHz, MCS9, 90pc duty cycle)	WLAN	9.11	±9.6 %
10642 10643 10644	AAC	IEEE 802.11ac WiFi (160MHz, MCS8, 90pc duty cycle) IEEE 802.11ac WiFi (160MHz, MCS9, 90pc duty cycle) LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK, UL Subframe=2,7)	WLAN LTE-TDD	9.11 11.96	± 9.6 % ± 9.6 %
10642 10643 10644 10645	AAC AAC	IEEE 802.11ac WiFi (160MHz, MCS8, 90pc duty cycle) IEEE 802.11ac WiFi (160MHz, MCS9, 90pc duty cycle) LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK, UL Subframe=2,7) LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL Subframe=2,7)	WLAN LTE-TDD LTE-TDD	9.11 11.96 11.96	± 9.6 %       ± 9.6 %       ± 9.6 %
10642 10643 10644 10645 10646	AAC AAC AAG	IEEE 802.11ac WiFi (160MHz, MCS8, 90pc duty cycle) IEEE 802.11ac WiFi (160MHz, MCS9, 90pc duty cycle) LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK, UL Subframe=2,7) LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL Subframe=2,7) CDMA2000 (1x Advanced)	WLAN LTE-TDD LTE-TDD CDMA2000	9.11 11.96 11.96 3.45	± 9.6 %         ± 9.6 %         ± 9.6 %
10642 10643 10644 10645 10646 10647	AAC AAC AAG AAF	IEEE 802.11ac WiFi (160MHz, MCS8, 90pc duty cycle) IEEE 802.11ac WiFi (160MHz, MCS9, 90pc duty cycle) LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK, UL Subframe=2,7) LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL Subframe=2,7) CDMA2000 (1x Advanced) LTE-TDD (OFDMA, 5 MHz, E-TM 3.1, Clipping 44%)	WLAN LTE-TDD LTE-TDD CDMA2000 LTE-TDD	9.11 11.96 11.96 3.45 6.91	$\begin{array}{c} \pm \ 9.6 \ \% \\ \pm \ 9.6 \ \% \end{array}$
10642 10643 10644 10645 10646 10647 10648	AAC AAC AAG AAF AAA	IEEE 802.11ac WiFi (160MHz, MCS8, 90pc duty cycle) IEEE 802.11ac WiFi (160MHz, MCS9, 90pc duty cycle) LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK, UL Subframe=2,7) LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL Subframe=2,7) CDMA2000 (1x Advanced)	WLAN LTE-TDD LTE-TDD CDMA2000	9.11 11.96 11.96 3.45	± 9.6 %         ± 9.6 %         ± 9.6 %

10655         AAE         LTE-TDD (OFDMA, 20 MHz, E-TM 3.1, Clipping 44%)         LTE-TDD           10658         AAA         Pulse Waveform (200Hz, 10%)         Test           10659         AAA         Pulse Waveform (200Hz, 20%)         Test           10660         AAA         Pulse Waveform (200Hz, 40%)         Test           10661         AAA         Pulse Waveform (200Hz, 60%)         Test           10661         AAA         Pulse Waveform (200Hz, 60%)         Test           10662         AAA         Pulse Waveform (200Hz, 80%)         Test           10662         AAA         Pulse Waveform (200Hz, 80%)         Test           10670         AAA         Bluetooth Low Energy         Bluetooth           10671         AAA         IEEE 802.11ax (20MHz, MCS0, 90pc duty cycle)         WLAN           10672         AAA         IEEE 802.11ax (20MHz, MCS1, 90pc duty cycle)         WLAN	7.21 10.00 6.99 3.98 2.22	$\begin{array}{r} \pm 9.6 \% \\ \pm 9.6 \% \\ \pm 9.6 \% \\ \pm 9.6 \% \end{array}$
10659         AAA         Pulse Waveform (200Hz, 20%)         Test           10660         AAA         Pulse Waveform (200Hz, 20%)         Test           10661         AAA         Pulse Waveform (200Hz, 40%)         Test           10661         AAA         Pulse Waveform (200Hz, 60%)         Test           10662         AAA         Pulse Waveform (200Hz, 60%)         Test           10662         AAA         Pulse Waveform (200Hz, 80%)         Test           10670         AAA         Bluetooth Low Energy         Bluetooth           10671         AAA         IEEE 802.11ax (20MHz, MCS0, 90pc duty cycle)         WLAN           10672         AAA         IEEE 802.11ax (20MHz, MCS1, 90pc duty cycle)         WLAN	6.99 3.98	± 9.6 %
10660         AAA         Pulse Waveform (200Hz, 40%)         Test           10661         AAA         Pulse Waveform (200Hz, 60%)         Test           10662         AAA         Pulse Waveform (200Hz, 80%)         Test           10662         AAA         Pulse Waveform (200Hz, 80%)         Test           10670         AAA         Bluetooth Low Energy         Bluetooth           10671         AAA         IEEE 802.11ax (20MHz, MCS0, 90pc duty cycle)         WLAN           10672         AAA         IEEE 802.11ax (20MHz, MCS1, 90pc duty cycle)         WLAN	3.98	
10661         AAA         Pulse Waveform (200Hz, 60%)         Test           10662         AAA         Pulse Waveform (200Hz, 80%)         Test           10670         AAA         Bluetooth Low Energy         Bluetooth           10671         AAA         IEEE 802.11ax (20MHz, MCS0, 90pc duty cycle)         WLAN           10672         AAA         IEEE 802.11ax (20MHz, MCS1, 90pc duty cycle)         WLAN		+96%
10662         AAA         Pulse Waveform (200Hz, 80%)         Test           10670         AAA         Bluetooth Low Energy         Bluetooth           10671         AAA         IEEE 802.11ax (20MHz, MCS0, 90pc duty cycle)         WLAN           10672         AAA         IEEE 802.11ax (20MHz, MCS1, 90pc duty cycle)         WLAN	2.22	
10670         AAA         Bluetooth Low Energy         Bluetooth           10671         AAA         IEEE 802.11ax (20MHz, MCS0, 90pc duty cycle)         WLAN           10672         AAA         IEEE 802.11ax (20MHz, MCS1, 90pc duty cycle)         WLAN		± 9.6 %
10671         AAA         IEEE 802.11ax (20MHz, MCS0, 90pc duty cycle)         WLAN           10672         AAA         IEEE 802.11ax (20MHz, MCS1, 90pc duty cycle)         WLAN	0.97	± 9.6 %
10672 AAA IEEE 802.11ax (20MHz, MCS1, 90pc duty cycle) WLAN	2.19	±9.6 %
	9.09	±9.6 %
	8.57	± 9.6 %
10673 AAA IEEE 802.11ax (20MHz, MCS2, 90pc duty cycle) WLAN	8.78	± 9.6 %
10674 AAA IEEE 802.11ax (20MHz, MCS3, 90pc duty cycle) WLAN	8.74	±9.6 %
10675 AAA IEEE 802.11ax (20MHz, MCS4, 90pc duty cycle) WLAN	8.90	± 9.6 %
10676 AAA IEEE 802.11ax (20MHz, MCS5, 90pc duty cycle) WLAN	8.77	± 9.6 %
10677 AAA IEEE 802.11ax (20MHz, MCS6, 90pc duty cycle) WLAN	8.73	±9.6 %
10678 AAA IEEE 802.11ax (20MHz, MCS7, 90pc duty cycle) WLAN	8.78	±9.6 %
10679 AAA IEEE 802.11ax (20MHz, MCS8, 90pc duty cycle) WLAN	8.89	±9.6 %
10680 AAA IEEE 802.11ax (20MHz, MCS9, 90pc duty cycle) WLAN	8.80	± 9.6 %
10681 AAA IEEE 802.11ax (20MHz, MCS10, 90pc duty cycle) WLAN	8.62	± 9.6 %
10682 AAA IEEE 802.11ax (20MHz, MCS11, 90pc duty cycle) WLAN	8.83	± 9.6 %
10683 AAA IEEE 802.11ax (20MHz, MCS0, 99pc duty cycle) WLAN	8.42	± 9.6 %
10684 AAA IEEE 802.11ax (20MHz, MCS1, 99pc duty cycle) WLAN	8.26	± 9.6 %
10685 AAA IEEE 802.11ax (20MHz, MCS2, 99pc duty cycle) WLAN	8.33	± 9.6 %
10686 AAA IEEE 802.11ax (20MHz, MCS3, 99pc duty cycle) WLAN	8.28	± 9.6 %
10687 AAA IEEE 802.11ax (20MHz, MCS4, 99pc duty cycle) WLAN	8.45	± 9.6 %
10688 AAA IEEE 802.11ax (20MHz, MCS5, 99pc duty cycle) WLAN	8.29	± 9.6 %
10689         AAA         IEEE 802.11ax (20MHz, MCS6, 99pc duty cycle)         WLAN	8.55	± 9.6 %
10690 AAA IEEE 802.11ax (20MHz, MCS7, 99pc duty cycle) WLAN	8.29	± 9.6 %
10691         AAA         IEEE 802.11ax (20MHz, MCS8, 99pc duty cycle)         WLAN	8.25	± 9.6 %
10692     AAA     IEEE 802.11ax (20MHz, MCS9, 99pc duty cycle)     WLAN	8.29	± 9.6 %
10693     AAA     IEEE 802.11ax (20MHz, MCS10, 99pc duty cycle)     WLAN	8.25	± 9.6 %
10694     AAA     IEEE 802.11ax (20MHz, MCS11, 99pc duty cycle)     WLAN	8.57	± 9.6 %
10695         AAA         IEEE 802.11ax (40MHz, MCS0, 90pc duty cycle)         WLAN	8.78	± 9.6 %
10696         AAA         IEEE 802.11ax (40MHz, MCS1, 90pc duty cycle)         WLAN	8.91	± 9.6 %
10697 AAA IEEE 802.11ax (40MHz, MCS2, 90pc duty cycle) WLAN	8.61	± 9.6 %
10698 AAA IEEE 802.11ax (40MHz, MCS3, 90pc duty cycle) WLAN	8.89	± 9.6 %
10609         AAA         IEEE 802.11ax (40MHz, MCS4, 90pc duty cycle)         WEAN	8.82	± 9.6 %
10000         AAA         IEEE 802.11ax (40MHz, MCS5, 90pc duty cycle)         WEAN           10700         AAA         IEEE 802.11ax (40MHz, MCS5, 90pc duty cycle)         WEAN	8.73	± 9.6 %
10701 AAA IEEE 802.11ax (40MHz, MCS6, 90pc duty cycle) WLAN	8.86	± 9.6 %
10702         AAA         IEEE 802.11ax (40MHz, MCS7, 90pc duty cycle)         WEAN	8.70	± 9.6 %
10702         7444         IEEE 802.11ax (40MHz, MC88, 90pc duty cycle)         WEAN           10703         AAA         IEEE 802.11ax (40MHz, MC88, 90pc duty cycle)         WLAN	8.82	± 9.6 %
10704 AAA IEEE 802.11ax (40MHz, MCS9, 90pc duty cycle) WLAN	8.56	± 9.6 %
10705 AAA IEEE 802.11ax (40MHz, MCS3, 30pc duty cycle) WLAN		± 9.6 %
10705         AAA         IEEE 802.11ax (40MHz, MCS10, 50pc duty cycle)         WEAN           10706         AAA         IEEE 802.11ax (40MHz, MCS11, 90pc duty cycle)         WEAN	8.69	
	8.66	± 9.6 %
10707         AAA         IEEE 802.11ax (40MHz, MCS0, 99pc duty cycle)         WLAN           10708         AAA         IEEE 802.11ax (40MHz, MCS1, 99pc duty cycle)         WLAN	8.32 8.55	± 9.6 %
10700         AAA         TEEE 802.11ak (40MHz, MCS1, 99pc duty cycle)         WLAN           10709         AAA         IEEE 802.11ak (40MHz, MCS2, 99pc duty cycle)         WLAN		± 9.6 %
10709         AAA         TEEE 802.11ax (40MHz, MCS2, 99pc duty cycle)         WLAN           10710         AAA         IEEE 802.11ax (40MHz, MCS3, 99pc duty cycle)         WLAN	8.33	$\pm 9.6\%$
10710         AAA         TEEE 802.11ax (400MHz, MCS3, 99pc duty cycle)         WLAN           10711         AAA         IEEE 802.11ax (400MHz, MCS4, 99pc duty cycle)         WLAN	8.29 8.39	± 9.6 % ± 9.6 %
10711         AAA         TEEE 802.11ax (40MHz, MCS4, 99pc duty cycle)         WLAN           10712         AAA         IEEE 802.11ax (40MHz, MCS5, 99pc duty cycle)         WLAN		$\pm 9.6\%$ $\pm 9.6\%$
	8.67	1
	8.33	± 9.6 %
	8.26	± 9.6 %
	8.45	± 9.6 %
10716 AAA IEEE 802.11ax (40MHz, MCS9, 99pc duty cycle) WLAN	8.30	± 9.6 %
10717         AAA         IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle)         WLAN           10718         AAA         IEEE 802.11ax (40MHz, MCS11, 99pc duty cycle)         WLAN	8.48	± 9.6 %
	8.24	± 9.6 %
10719         AAA         IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle)         WLAN           10720         AAA         IEEE 802.11ax (80MHz, MCS1, 90pc duty cycle)         WLAN	8.81	± 9.6 %
10720 AAA IEEE 802.11ax (80MHz, MCS1, 90pc duty cycle) WLAN	8.87	± 9.6 %
10721 AAA IEEE 802.11ax (80MHz, MCS2, 90pc duty cycle) WLAN	8.76	± 9.6 %
10722 AAA IEEE 802.11ax (80MHz, MCS3, 90pc duty cycle) WLAN	8.55	±9.6%
10723 AAA IEEE 802.11ax (80MHz, MCS4, 90pc duty cycle) WLAN	8.70	± 9.6 %
10724 AAA IEEE 802.11ax (80MHz, MCS5, 90pc duty cycle) WLAN	8.90	± 9.6 %
10725 AAA IEEE 802.11ax (80MHz, MCS6, 90pc duty cycle) WLAN	8.74	± 9.6 %
10726 AAA IEEE 802.11ax (80MHz, MCS7, 90pc duty cycle) WLAN	8.72	± 9.6 %
10727 AAA IEEE 802.11ax (80MHz, MCS8, 90pc duty cycle) WLAN	8.66	± 9.6 %

10728	AAA	IEEE 802.11ax (80MHz, MCS9, 90pc duty cycle)	WLAN	8.65	±9.6 %
10729	AAA	IEEE 802.11ax (80MHz, MCS10, 90pc duty cycle)	WLAN	8.64	± 9.6 %
10730	AAA	IEEE 802.11ax (80MHz, MCS11, 90pc duty cycle)	WLAN	8.67	± 9.6 %
10731	AAA	IEEE 802.11ax (80MHz, MCS0, 99pc duty cycle)	WLAN	8.42	± 9.6 %
10732	AAA	IEEE 802.11ax (80MHz, MCS1, 99pc duty cycle)	WLAN	8.46	± 9.6 %
10733	AAA	IEEE 802.11ax (80MHz, MCS2, 99pc duty cycle)	WLAN	8.40	± 9.6 %
10734	AAA	IEEE 802.11ax (80MHz, MCS3, 99pc duty cycle)	WLAN	8.25	± 9.6 %
10735	AAA	IEEE 802.11ax (80MHz, MCS4, 99pc duty cycle)	WLAN	8.33	± 9.6 %
10736	AAA	IEEE 802.11ax (80MHz, MCS5, 99pc duty cycle)	WLAN	8.27	± 9.6 %
10737	AAA	IEEE 802.11ax (80MHz, MCS6, 99pc duty cycle)	WLAN	8.36	± 9.6 %
10738	AAA	IEEE 802.11ax (80MHz, MCS7, 99pc duty cycle)	WLAN	8.42	±9.6 %
10739	AAA	IEEE 802.11ax (80MHz, MCS8, 99pc duty cycle)	WLAN	8.29	± 9.6 %
10739	AAA	IEEE 802.11ax (80MHz, MCS9, 99pc duty cycle)	WLAN	8.48	± 9.6 %
10740	AAA	IEEE 802.11ax (80MHz, MCS10, 99pc duty cycle)	WLAN	8.40	± 9.6 %
			WLAN	8.43	± 9.6 %
10742	AAA	IEEE 802.11ax (80MHz, MCS11, 99pc duty cycle)	WLAN	8.94	± 9.6 %
10743	AAA	IEEE 802.11ax (160MHz, MCS0, 90pc duty cycle)	WLAN	9.16	± 9.6 %
10744	AAA	IEEE 802.11ax (160MHz, MCS1, 90pc duty cycle)			
10745	AAA	IEEE 802.11ax (160MHz, MCS2, 90pc duty cycle)	WLAN	8.93	± 9.6 %
10746	AAA	IEEE 802.11ax (160MHz, MCS3, 90pc duty cycle)	WLAN	9.11	± 9.6 %
10747	AAA	IEEE 802.11ax (160MHz, MCS4, 90pc duty cycle)	WLAN	9.04	± 9.6 %
10748	AAA	IEEE 802.11ax (160MHz, MCS5, 90pc duty cycle)	WLAN	8.93	± 9.6 %
10749	AAA	IEEE 802.11ax (160MHz, MCS6, 90pc duty cycle)	WLAN	8.90	± 9.6 %
10750	AAA	IEEE 802.11ax (160MHz, MCS7, 90pc duty cycle)	WLAN	8.79	± 9.6 %
10751	AAA	IEEE 802.11ax (160MHz, MCS8, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10752	AAA	IEEE 802.11ax (160MHz, MCS9, 90pc duty cycle)	WLAN	8.81	± 9.6 %
10753	AAA	IEEE 802.11ax (160MHz, MCS10, 90pc duty cycle)	WLAN	9.00	± 9.6 %
10754	AAA	IEEE 802.11ax (160MHz, MCS11, 90pc duty cycle)	WLAN	8.94	± 9.6 %
10755	AAA	IEEE 802.11ax (160MHz, MCS0, 99pc duty cycle)	WLAN	8.64	± 9.6 %
10756	AAA	IEEE 802.11ax (160MHz, MCS1, 99pc duty cycle)	WLAN	8.77	± 9.6 %
10757	AAA	IEEE 802.11ax (160MHz, MCS2, 99pc duty cycle)	WLAN	8.77	±9.6 %
10758	AAA	IEEE 802.11ax (160MHz, MCS3, 99pc duty cycle)	WLAN	8,69	±9.6 %
10759	AAA	IEEE 802.11ax (160MHz, MCS4, 99pc duty cycle)	WLAN	8.58	± 9.6 %
10760	AAA	IEEE 802.11ax (160MHz, MCS5, 99pc duty cycle)	WLAN	8.49	± 9.6 %
10761	AAA	IEEE 802.11ax (160MHz, MCS6, 99pc duty cycle)	WLAN	8.58	± 9.6 %
10762	AAA	IEEE 802.11ax (160MHz, MCS7, 99pc duty cycle)	WLAN	8,49	± 9.6 %
10763	AAA	IEEE 802.11ax (160MHz, MCS8, 99pc duty cycle)	WLAN	8.53	± 9.6 %
		IEEE 802.11ax (160MHz, MCS9, 99pc duty cycle)	WLAN	8.54	± 9.6 %
10764	AAA	IEEE 802.11ax (160MHz, MCS0, 99pc duty cycle)	WLAN	8.54	± 9.6 %
10765		IEEE 802.11ax (160MHz, MCS10, 39pc duty cycle)	WLAN	8.51	± 9.6 %
10766	AAA		5G NR FR1	7.99	± 9.6 %
10767	AAA	5G NR (CP-OFDM, 1 RB, 5 MHz, QPSK, 15 kHz)	TDD	1.55	1 2 3.0 %
	<u> </u>			8.01	± 9.6 %
10768	AAA	5G NR (CP-OFDM, 1 RB, 10 MHz, QPSK, 15 kHz)	5G NR FR1	0.01	1 9.0 %
			TDD	9.01	± 9.6 %
10769	AAA	5G NR (CP-OFDM, 1 RB, 15 MHz, QPSK, 15 kHz)	5G NR FR1	8.01	± 9.0 %
				0.00	1000
10770	AAA	5G NR (CP-OFDM, 1 RB, 20 MHz, QPSK, 15 kHz)	5G NR FR1	8.02	± 9.6 %
				0.00	
10771	AAA	5G NR (CP-OFDM, 1 RB, 25 MHz, QPSK, 15 kHz)	5G NR FR1	8.02	± 9.6 %
			TDD		
10772	AAA	5G NR (CP-OFDM, 1 RB, 30 MHz, QPSK, 15 kHz)	5G NR FR1	8.23	± 9.6 %
10773	AAA	5G NR (CP-OFDM, 1 RB, 40 MHz, QPSK, 15 kHz)	5G NR FR1	8.03	± 9.6 %
			TDD		
10774	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, QPSK, 15 kHz)	5G NR FR1	8.02	± 9.6 %
1			TDD		
10776	AAA	5G NR (CP-OFDM, 50% RB, 10 MHz, QPSK, 15 kHz)	5G NR FR1	8.30	± 9.6 %
	1		TDD		
10778	AAA	5G NR (CP-OFDM, 50% RB, 20 MHz, QPSK, 15 kHz)	5G NR FR1	8.34	± 9.6 %
	1		TDD		
	AAA	5G NR (CP-OFDM, 50% RB, 30 MHz, QPSK, 15 kHz)	5G NR FR1	8.38	± 9.6 %
10780	1		TDD		
10780					
		5G NR (CP-OEDM 50% RB, 40 MHz, OPSK, 15 kHz)	5G NR FR1	8.38	± 9.6 %
10780 10781	AAA	5G NR (CP-OFDM, 50% RB, 40 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.38	± 9.6 %
		5G NR (CP-OFDM, 50% RB, 40 MHz, QPSK, 15 kHz) 5G NR (CP-OFDM, 50% RB, 50 MHz, QPSK, 15 kHz)		8.38 8.43	± 9.6 %

		·····		·	
10783	AAA	5G NR (CP-OFDM, 100% RB, 5 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.31	± 9.6 %
10784	AAA	5G NR (CP-OFDM, 100% RB, 10 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.29	± 9.6 %
10785	AAA	5G NR (CP-OFDM, 100% RB, 15 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.40	± 9.6 %
10786	AAA	5G NR (CP-OFDM, 100% RB, 20 MHz, QPSK, 15 kHz)	5G NR FR1	8.35	± 9.6 %
10787	AAA	5G NR (CP-OFDM, 100% RB, 25 MHz, QPSK, 15 kHz)	TDD 5G NR FR1 TDD	8.44	± 9.6 %
10788	AAA	5G NR (CP-OFDM, 100% RB, 30 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.39	± 9.6 %
10789	AAA	5G NR (CP-OFDM, 100% RB, 40 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.37	± 9.6 %
10790	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.39	± 9.6 %
10791	AAA	5G NR (CP-OFDM, 1 RB, 5 MHz, QPSK, 30 kHz)	5G NR FR1	7.83	± 9.6 %
10792	AAA	5G NR (CP-OFDM, 1 RB, 10 MHz, QPSK, 30 kHz)	TDD 5G NR FR1 TDD	7.92	± 9.6 %
10793	AAA	5G NR (CP-OFDM, 1 RB, 15 MHz, QPSK, 30 kHz)	5G NR FR1	7,95	± 9.6 %
10794	AAA	5G NR (CP-OFDM, 1 RB, 20 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	7.82	± 9.6 %
10795	AAA	5G NR (CP-OFDM, 1 RB, 25 MHz, QPSK, 30 kHz)	5G NR FR1	7.84	± 9.6 %
10796	AAA	5G NR (CP-OFDM, 1 RB, 30 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	7.82	± 9.6 %
10797	AAA	5G NR (CP-OFDM, 1 RB, 40 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	8.01	± 9.6 %
10798	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	7.89	± 9.6 %
10799	AAA	5G NR (CP-OFDM, 1 RB, 60 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	7.93	± 9.6 %
10801	AAA	5G NR (CP-OFDM, 1 RB, 80 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	7.89	± 9.6 %
10802	AAA	5G NR (CP-OFDM, 1 RB, 90 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	7.87	± 9.6 %
10803	AAA	5G NR (CP-OFDM, 1 RB, 100 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	7.93	± 9.6 %
10805	AAA	5G NR (CP-OFDM, 50% RB, 10 MHz, QPSK, 30 kHz)	5G NR FR1	8.34	± 9.6 %
10806	AAA	5G NR (CP-OFDM, 50% RB, 15 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	8.37	± 9.6 %
10809	AAA	5G NR (CP-OFDM, 50% RB, 30 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	8.34	± 9.6 %
10810	AAA	5G NR (CP-OFDM, 50% RB, 40 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	8.34	± 9.6 %
10812	AAA	5G NR (CP-OFDM, 50% RB, 60 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	8.35	± 9.6 %
10817	AAA	5G NR (CP-OFDM, 100% RB, 5 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	8.35	± 9.6 %
10818		5G NR (CP-OFDM, 100% RB, 10 MHz, QPSK, 30 kHz)	TDD		
			5G NR FR1 TDD	8.34	± 9.6 %
10819	AAA	5G NR (CP-OFDM, 100% RB, 15 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.33	± 9.6 %
10820	AAA	5G NR (CP-OFDM, 100% RB, 20 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.30	± 9.6 %
10821	AAA	5G NR (CP-OFDM, 100% RB, 25 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.41	±9.6 %
10822	AAA	5G NR (CP-OFDM, 100% RB, 30 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.41	±9.6 %
10823	AAA	5G NR (CP-OFDM, 100% RB, 40 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.36	±9.6 %
10824	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.39	±9.6%

40005		5G NR (CP-OFDM, 100% RB, 60 MHz, QPSK, 30 kHz)	5G NR FR1	8.41	± 9.6 %
10825	AAA	·	TDD		
10827	AAA	5G NR (CP-OFDM, 100% RB, 80 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.42	±9.6 %
10828	AAA	5G NR (CP-OFDM, 100% RB, 90 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.43	± 9.6 %
10829	AAA	5G NR (CP-OFDM, 100% RB, 100 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.40	± 9.6 %
10830	ААА	5G NR (CP-OFDM, 1 RB, 10 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.63	± 9.6 %
10831	AAA	5G NR (CP-OFDM, 1 RB, 15 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.73	± 9,6 %
10832	AAA	5G NR (CP-OFDM, 1 RB, 20 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.74	± 9.6 %
10833	ААА	5G NR (CP-OFDM, 1 RB, 25 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.70	± 9.6 %
10834	AAA	5G NR (CP-OFDM, 1 RB, 30 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.75	± 9.6 %
10835	AAA	5G NR (CP-OFDM, 1 RB, 40 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.70	±9.6 %
10836	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.66	± 9.6 %
10837	AAA	5G NR (CP-OFDM, 1 RB, 60 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.68	± 9.6 %
10839	AAA	5G NR (CP-OFDM, 1 RB, 80 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.70	± 9.6 %
10840	AAA	5G NR (CP-OFDM, 1 RB, 90 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.67	±9.6 %
10841	AAA	5G NR (CP-OFDM, 1 RB, 100 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.71	± 9.6 %
10843	AAA	5G NR (CP-OFDM, 50% RB, 15 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.49	± 9.6 %
10844	AAA	5G NR (CP-OFDM, 50% RB, 20 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.34	± 9.6 %
10846	AAA	5G NR (CP-OFDM, 50% RB, 30 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.41	± 9.6 %
10854		5G NR (CP-OFDM, 100% RB, 10 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.34	± 9.6 %
10855	AAA	5G NR (CP-OFDM, 100% RB, 15 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.36	± 9.6 %
10856	AAA	5G NR (CP-OFDM, 100% RB, 20 MHz, QPSK, 60 kHz)	5G NR FR1	8.37	± 9.6 %
10857	AAA	5G NR (CP-OFDM, 100% RB, 25 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.35	± 9.6 %
10858	AAA	5G NR (CP-OFDM, 100% RB, 30 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.36	± 9.6 %
10859	AAA	5G NR (CP-OFDM, 100% RB, 40 MHz, QPSK, 60 kHz)	5G NR FR1	8.34	± 9.6 %
10860	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, QPSK, 60 kHz)	5G NR FR1	8.41	± 9.6 %
10861	AAA	5G NR (CP-OFDM, 100% RB, 60 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.40	± 9.6 %
10863	AAA	5G NR (CP-OFDM, 100% RB, 80 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.41	± 9.6 %
10864	AAA	5G NR (CP-OFDM, 100% RB, 90 MHz, QPSK, 60 kHz)	5G NR FR1	8.37	± 9.6 %
10865	AAA	5G NR (CP-OFDM, 100% RB, 100 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.41	± 9.6 %
10866	AAA	5G NR (DFT-s-OFDM, 1 RB, 100 MHz, QPSK, 30 kHz)	5G NR FR1	5.68	± 9.6 %
10868	AAA	5G NR (DFT-s-OFDM, 100% RB, 100 MHz, QPSK, 30 kHz)	TDD 5G NR FR1	5.89	± 9.6 %
10869	AAA	5G NR (DFT-s-OFDM, 1 RB, 100 MHz, QPSK, 120 kHz)	5G NR FR2	5.75	± 9.6 %
	1	1	TDD	1	± 9.6 %

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10871	AAA	5G NR (DFT-s-OFDM, 1 RB, 100 MHz, 16QAM, 120 kHz)			
10872			5G NR FR2 TDD	5.75	± 9.6 %
	AAA	5G NR (DFT-s-OFDM, 100% RB, 100 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	6.52	± 9.6 %
10873	AAA	5G NR (DFT-s-OFDM, 1 RB, 100 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	6.61	± 9.6 %
10874	AAA	5G NR (DFT-s-OFDM, 100% RB, 100 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	6.65	± 9.6 %
10875	AAA	5G NR (CP-OFDM, 1 RB, 100 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	7.78	± 9.6 %
10876	AAA	5G NR (CP-OFDM, 100% RB, 100 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	8.39	± 9.6 %
10877	AAA	5G NR (CP-OFDM, 1 RB, 100 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	7.95	± 9.6 %
10878	AAA	5G NR (CP-OFDM, 100% RB, 100 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	8.41	± 9.6 %
10879	AAA	5G NR (CP-OFDM, 1 RB, 100 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	8.12	± 9.6 %
10880	AAA	5G NR (CP-OFDM, 100% RB, 100 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	8.38	± 9.6 %
10881	AAA	5G NR (DFT-s-OFDM, 1 RB, 50 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	5.75	± 9.6 %
10882	AAA	5G NR (DFT-s-OFDM, 100% RB, 50 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	5.96	± 9.6 %
10883	AAA	5G NR (DFT-s-OFDM, 1 RB, 50 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	6.57	± 9.6 %
10884	AAA	5G NR (DFT-s-OFDM, 100% RB, 50 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	6.53	± 9.6 %
10885	AAA	5G NR (DFT-s-OFDM, 1 RB, 50 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	6.61	± 9.6 %
10886	AAA	5G NR (DFT-s-OFDM, 100% RB, 50 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	6.65	± 9.6 %
10887	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	7.78	± 9.6 %
10888	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, QPSK, 120 kHz)	5G NR FR2	8.35	±9.6 %
10889	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	8.02	± 9.6 %
10890	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	8.40	± 9.6 %
10891	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, 64QAM, 120 kHz)	5G NR FR2	8.13	± 9.6 %
10892	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	8.41	± 9.6 %

<sup>E</sup> Uncertainty is determined using the max. deviation from linear response applying rectangular distribution and is expressed for the square of the field value.

## **Calibration Laboratory of**

Schmid & Partner Engineering AG Zeughausstrasse 43, 8004 Zurich, Switzerland BC-MRA



S Schweizerischer Kalibrierdienst Service suisse d'étalonnage Servizio svizzero di taratura

Swiss Calibration Service

Accreditation No.: SCS 0108

Accredited by the Swiss Accreditation Service (SAS)

The Swiss Accreditation Service is one of the signatories to the EA Multilateral Agreement for the recognition of calibration certificates

Client PC Test

Certificate No: E)		

## **CALIBRATION CERTIFICATE**

Object	EX3DV4 - SN:7570					
Calibration procedure(s)	√ 1 QA CAL-01.v9, QA CAL-23.v5, QA CAL-25.v7 Calibration procedure for dosimetric E-field probes 1/1⊥	5/20				
Calibration date:	December 11, 2019					
This calibration certificate documents the traceability to national standards, which realize the physical units of measurements (SI). The measurements and the uncertainties with confidence probability are given on the following pages and are part of the certificate.						
All calibrations have been conducted in the closed laboratory facility: environment temperature (22 ± 3)°C and humidity < 70%.						

Calibration Equipment used (M&TE critical for calibration)

Primary Standards	ID	Cal Date (Certificate No.) Scheduled Calibration	
Power meter NRP	SN: 104778	03-Apr-19 (No. 217-02892/02893)	Apr-20
Power sensor NRP-Z91	SN: 103244	03-Apr-19 (No. 217-02892)	Apr-20
Power sensor NRP-Z91	SN: 103245	03-Apr-19 (No. 217-02893)	Apr-20
Reference 20 dB Attenuator	SN: S5277 (20x)	04-Apr-19 (No. 217-02894)	Apr-20
DAE4	SN: 660	07-Oct-19 (No. DAE4-660_Oct19)	Oct-20
Reference Probe ES3DV2	SN: 3013	31-Dec-18 (No. ES3-3013_Dec18)	Dec-19
Secondary Standards	ID	Check Date (in house) Scheduled Check	
Power meter E4419B	SN: GB41293874	06-Apr-16 (in house check Jun-18)	In house check: Jun-20
Power sensor E4412A	SN: MY41498087	06-Apr-16 (in house check Jun-18)	In house check: Jun-20
Power sensor E4412A	SN: 000110210	06-Apr-16 (in house check Jun-18)	In house check: Jun-20
RF generator HP 8648C	SN: US3642U01700	04-Aug-99 (in house check Jun-18)	In house check: Jun-20
Network Analyzer E8358A	SN: US41080477	31-Mar-14 (in house check Oct-19)	In house check: Oct-20

	Name	Function	Signature
Calibrated by:	Leif Klysner	Laboratory Technician	Sil Million -
			ny ny
Approved by:	Katja Pokovic	Technical Manager	a k
			14 15
			Issued: December 11, 2019

This calibration certificate shall not be reproduced except in full without written approval of the laboratory.

### Calibration Laboratory of

Schmid & Partner Engineering AG Zeughausstrasse 43, 8004 Zurich, Switzerland





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### Glossary:

TSL	tissue simulating liquid
NORMx,y,z	sensitivity in free space
ConvF	sensitivity in TSL / NORMx,y,z
DCP	diode compression point
CF	crest factor (1/duty_cycle) of the RF signal
A, B, C, D	modulation dependent linearization parameters
Polarization φ	φ rotation around probe axis
Polarization 9	9 rotation around an axis that is in the plane normal to probe axis (at measurement center),
	i.e., $\vartheta = 0$ is normal to probe axis
Connector Angle	information used in DASY system to align probe sensor X to the robot coordinate system

### Calibration is Performed According to the Following Standards:

- a) IEEE Std 1528-2013, "IEEE Recommended Practice for Determining the Peak Spatial-Averaged Specific Absorption Rate (SAR) in the Human Head from Wireless Communications Devices: Measurement Techniques", June 2013
- b) IEC 62209-1, ", "Measurement procedure for the assessment of Specific Absorption Rate (SAR) from handheld and body-mounted devices used next to the ear (frequency range of 300 MHz to 6 GHz)", July 2016
- c) IEC 62209-2, "Procedure to determine the Specific Absorption Rate (SAR) for wireless communication devices
- used in close proximity to the human body (frequency range of 30 MHz to 6 GHz)", March 2010 d) KDB 865664, "SAR Measurement Requirements for 100 MHz to 6 GHz"

### Methods Applied and Interpretation of Parameters:

- NORMx,y,z: Assessed for E-field polarization 9 = 0 (f ≤ 900 MHz in TEM-cell; f > 1800 MHz: R22 waveguide). NORMx,y,z are only intermediate values, i.e., the uncertainties of NORMx,y,z does not affect the E<sup>2</sup>-field uncertainty inside TSL (see below *ConvF*).
- NORM(f)x,y,z = NORMx,y,z \* frequency\_response (see Frequency Response Chart). This linearization is implemented in DASY4 software versions later than 4.2. The uncertainty of the frequency response is included in the stated uncertainty of ConvF.
- DCPx,y,z: DCP are numerical linearization parameters assessed based on the data of power sweep with CW signal (no uncertainty required). DCP does not depend on frequency nor media.
- PAR: PAR is the Peak to Average Ratio that is not calibrated but determined based on the signal characteristics
- *Ax,y,z; Bx,y,z; Cx,y,z; Dx,y,z; VRx,y,z: A, B, C, D* are numerical linearization parameters assessed based on the data of power sweep for specific modulation signal. The parameters do not depend on frequency nor media. *VR* is the maximum calibration range expressed in RMS voltage across the diode.
- ConvF and Boundary Effect Parameters: Assessed in flat phantom using E-field (or Temperature Transfer Standard for f ≤ 800 MHz) and inside waveguide using analytical field distributions based on power measurements for f > 800 MHz. The same setups are used for assessment of the parameters applied for boundary compensation (alpha, depth) of which typical uncertainty values are given. These parameters are used in DASY4 software to improve probe accuracy close to the boundary. The sensitivity in TSL corresponds to NORMx,y,z \* ConvF whereby the uncertainty corresponds to that given for ConvF. A frequency dependent ConvF is used in DASY version 4.4 and higher which allows extending the validity from ± 50 MHz to ± 100 MHz.
- Spherical isotropy (3D deviation from isotropy): in a field of low gradients realized using a flat phantom exposed by a patch antenna.
- Sensor Offset: The sensor offset corresponds to the offset of virtual measurement center from the probe tip (on probe axis). No tolerance required.
- Connector Angle: The angle is assessed using the information gained by determining the NORMx (no uncertainty required).

#### **Basic Calibration Parameters**

	Sensor X	Sensor Y	Sensor Z	Unc (k=2)
Norm $(\mu V/(V/m)^2)^A$	0.55	0.61	0.65	± 10.1 %
DCP (mV) <sup>B</sup>	100.0	99.9	102.2	

#### **Calibration Results for Modulation Response**

UID	Communication System Name		A dB	B dBõV	С	D dB	VR mV	Max dev.	Max Unc <sup>E</sup> (k=2)
0	CW	X	0.00	0.00	1.00	0.00	155.3	± 3.3 %	±47%
	***	Y	0.00	0.00	1.00		155.6		
		Z	0.00	0.00	1.00		146.7		
10352-	Pulse Waveform (200Hz, 10%)	X	15.00	88.52	19.84	10.00	60.0	± 3.7 %	±9.6 %
AAA		Y	15.00	87.53	19.55		60.0	]	
		Z	15.00	89.05	20.77		60.0		
10353-	Pulse Waveform (200Hz, 20%)	X	15.00	92.03	20.57	6.99	80.0	± 2.4 %	±9.6 %
AAA		Y	15.00	89.15	19.09		80.0		
		Z	15.00	90.24	20.44		80.0		
10354-	Pulse Waveform (200Hz, 40%)	X	15.00	98.97	22.59	3.98	95.0	± 1.2 %	±9.6 %
AAA		Y	15.00	90.18	17.98		95.0		
		Z	15.00	93.72	20.87		95.0		
10355-	Pulse Waveform (200Hz, 60%)	X	15.00	108.57	25.61	2.22	120.0	± 1.2 %	± 9.6 %
AAA		Υ	15.00	87.55	15.24		120.0		
		Z	15.00	99.27	22.20		120.0		
10387-	QPSK Waveform, 1 MHz	X	0.49	60.00	6.71	0.00	150.0	± 2.9 %	± 9.6 %
AAA		Y	0.54	60.00	6.92		150.0		
		Z	0.78	62.97	10.11		150.0		
10388-	QPSK Waveform, 10 MHz	Х	2.24	69.18	16.39	0.00	150.0	± 1.1 %	± 9.6 %
AAA		Y	2.08	67.31	15.14		150.0		
		Z	2.36	69.28	16.39		150.0		
10396-	64-QAM Waveform, 100 kHz	X	2.72	70.63	18.97	3.01	150.0	±0.7 %	± 9.6 %
AAA		Y	2.64	68.42	17.78	ļ	150.0		
		Z	3.62	74.34	20.51		150.0		
10399-	64-QAM Waveform, 40 MHz	X	3.51	67.66	16.09	0.00	150.0	± 1.9 %	± 9.6 %
AAA		Y	3.44	66.91	15.57		150.0	_	
		Z	3.58	67.67	16.07		150.0		
10414-	WLAN CCDF, 64-QAM, 40MHz	X	4.62	65.47	15.47	0.00	150.0	± 4.0 %	± 9.6 %
AAA		Y	4.82	65.73	15.57	ļ	150.0	]	
		Z	4.91	65.94	15.70		150.0		

Note: For details on UID parameters see Appendix

The reported uncertainty of measurement is stated as the standard uncertainty of measurement multiplied by the coverage factor k=2, which for a normal distribution corresponds to a coverage probability of approximately 95%.

<sup>A</sup> The uncertainties of Norm X,Y,Z do not affect the E<sup>2</sup>-field uncertainty inside TSL (see Pages 5 and 6).

 <sup>6</sup> Numerical linearization parameter: uncertainty not required.
 <sup>E</sup> Uncertainty is determined using the max. deviation from linear response applying rectangular distribution and is expressed for the square of the field value.

#### C1 C2 T1 T2 **T**3 T4 T5 T6 α **V**<sup>-1</sup> fF fF ms.V⁻² ms.V⁻¹ V-2 V<sup>-1</sup> ms Х 35.0 258.18 34.77 12.24 0.04 5.10 1.03 0.18 1.01 Y 41.0 313.23 36.90 11.55 0.30 5.10 0.48 1.01 0.00 Ζ 46.5 342.21 34.77 21.26 0.28 5.10 1.75 0.22 1.01

## Sensor Model Parameters

### **Other Probe Parameters**

Sensor Arrangement	Triangular
Connector Angle (°)	127.3
Mechanical Surface Detection Mode	enabled
Optical Surface Detection Mode	disabled
Probe Overall Length	337 mm
Probe Body Diameter	10 mm
Tip Length	9 mm
Tip Diameter	2.5 mm
Probe Tip to Sensor X Calibration Point	1 mm
Probe Tip to Sensor Y Calibration Point	1 mm
Probe Tip to Sensor Z Calibration Point	1 mm
Recommended Measurement Distance from Surface	1.4 mm

f (MHz) <sup>C</sup>	Relative Permittivity <sup>F</sup>	Conductivity (S/m) <sup>F</sup>	ConvF X	ConvF Y	ConvF Z	Alpha <sup>G</sup>	Depth <sup>G</sup> (mm)	Unc (k=2)
750	41.9	0.89	10.16	10.16	10.16	0.54	0.80	± 12.0 %
835	41.5	0.90	9.85	9.85	9.85	0.51	0.80	± 12.0 %
1640	40.2	1.31	8.71	8.71	8.71	0.29	0.80	± 12.0 %
1750	40.1	1.37	8.68	8.68	8.68	0.43	0.80	± 12.0 %
1900	40.0	1.40	8.29	8.29	8.29	0.36	0.80	± 12.0 %
2300	39.5	1.67	7.98	7.98	7.98	0.35	0.80	± 12.0 %
2450	39.2	1.80	7.52	7.52	7.52	0.36	0.91	± 12.0 %
2600	39.0	1.96	7.28	7.28	7.28	0.36	0.99	± 12.0 %

### Calibration Parameter Determined in Head Tissue Simulating Media

<sup>c</sup> Frequency validity above 300 MHz of ± 100 MHz only applies for DASY v4.4 and higher (see Page 2), else it is restricted to ± 50 MHz. The uncertainty is the RSS of the ConvF uncertainty at calibration frequency and the uncertainty for the indicated frequency band. Frequency validity below 300 MHz is  $\pm$  10, 25, 40, 50 and 70 MHz for ConvF assessments at 30, 64, 128, 150 and 220 MHz respectively. Validity of ConvF assessed at 6 MHz is 4-9 MHz, and ConvF assessed at 13 MHz is 9-19 MHz. Above 5 GHz frequency validity can be extended to  $\pm$  110 MHz. <sup>F</sup> At frequencies below 3 GHz, the validity of tissue parameters ( $\epsilon$  and  $\sigma$ ) can be relaxed to  $\pm$  10% if liquid compensation formula is applied to measured SAR values. At frequencies above 3 GHz, the validity of tissue parameters ( $\epsilon$  and  $\sigma$ ) is restricted to  $\pm$  5%. The uncertainty is the RSS of the ConvF assessed to  $\pm$  10% of the ConvF asses to  $\pm$  10% of the ConvF assessed to  $\pm$ 

the ConvF uncertainty for indicated target tissue parameters.

Alpha/Depth are determined during calibration. SPEAG warrants that the remaining deviation due to the boundary effect after compensation is always less than ± 1% for frequencies below 3 GHz and below ± 2% for frequencies between 3-6 GHz at any distance larger than half the probe tip diameter from the boundary.

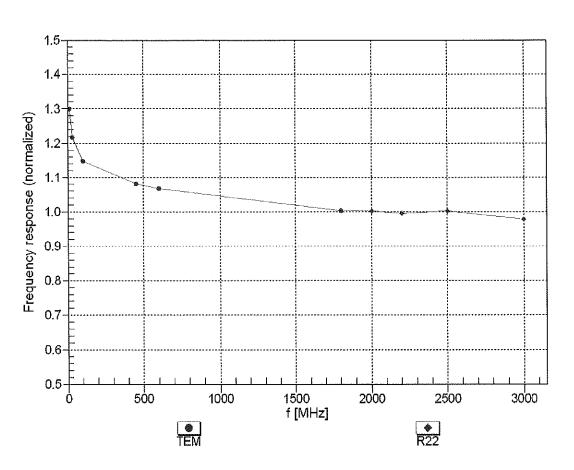
f (MHz) <sup>C</sup>	Relative Permittivity <sup>F</sup>	Conductivity (S/m) <sup>F</sup>	ConvF X	ConvF Y	ConvF Z	Alpha <sup>G</sup>	Depth <sup>G</sup> (mm)	Unc (k=2)
750	55.5	0.96	10.26	10.26	10.26	0.50	0.84	± 12.0 %
835	55.2	0.97	9.83	9.83	9.83	0.55	0.80	± 12.0 %
1640	53.7	1.42	8.64	8.64	8.64	0.33	0.97	± 12.0 %
1750	53.4	1.49	8.48	8.48	8.48	0.41	0.85	± 12.0 %
1900	53.3	1.52	8.09	8.09	8.09	0.41	0.80	± 12.0 %
2300	52.9	1.81	7.73	7.73	7.73	0.38	0.90	± 12.0 %
2450	52.7	1.95	7.55	7.55	7.55	0.34	0.95	± 12.0 %
2600	52.5	2.16	7.30	7.30	7.30	0.33	0.95	± 12.0 %

#### Calibration Parameter Determined in Body Tissue Simulating Media

<sup>C</sup> Frequency validity above 300 MHz of ± 100 MHz only applies for DASY v4.4 and higher (see Page 2), else it is restricted to ± 50 MHz. The uncertainty is the RSS of the ConvF uncertainty at calibration frequency and the uncertainty for the indicated frequency band. Frequency validity below 300 MHz is ± 10, 25, 40, 50 and 70 MHz for ConvF assessments at 30, 64, 128, 150 and 220 MHz respectively. Validity of ConvF assessed at 6 MHz is 9-19 MHz. Above 5 GHz frequency validity can be extended to ± 110 MHz.

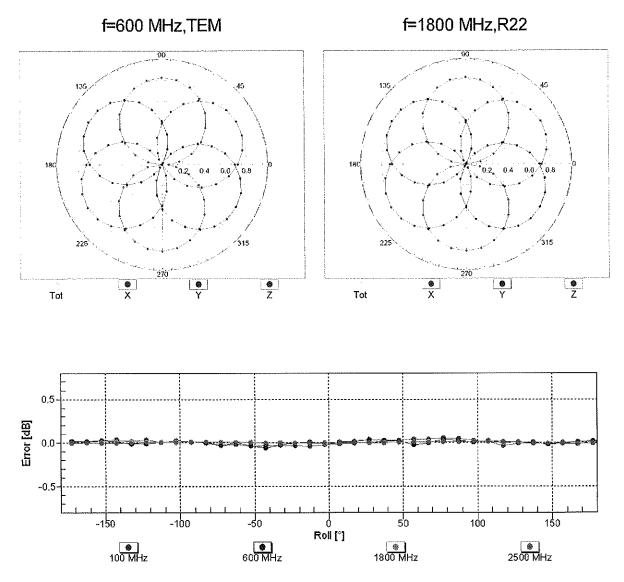
<sup>F</sup> At frequencies below 3 GHz, the validity of tissue parameters ( $\varepsilon$  and  $\sigma$ ) can be relaxed to ± 10% if liquid compensation formula is applied to measured SAR values. At frequencies above 3 GHz, the validity of tissue parameters ( $\varepsilon$  and  $\sigma$ ) is restricted to ± 5%. The uncertainty is the RSS of the ConvF uncertainty for indicated target tissue parameters.

<sup>G</sup> Alpha/Depth are determined during calibration. SPEAG warrants that the remaining deviation due to the boundary effect after compensation is always less than  $\pm$  1% for frequencies below 3 GHz and below  $\pm$  2% for frequencies between 3-6 GHz at any distance larger than half the probe tip diameter from the boundary.



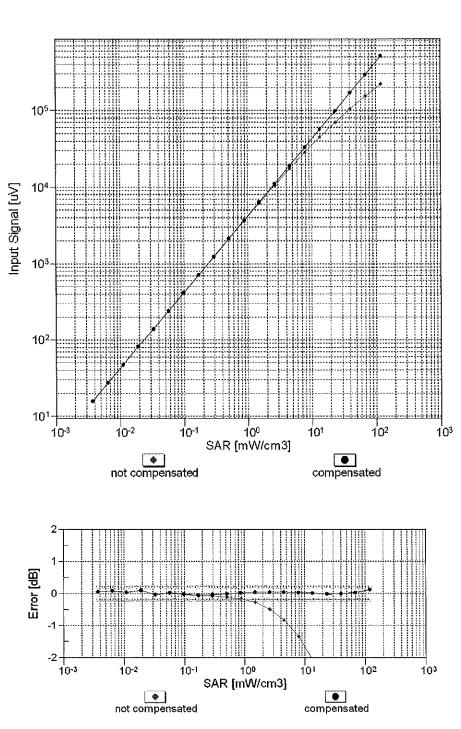
## Frequency Response of E-Field (TEM-Cell:ifi110 EXX, Waveguide: R22)

Uncertainty of Frequency Response of E-field: ± 6.3% (k=2)



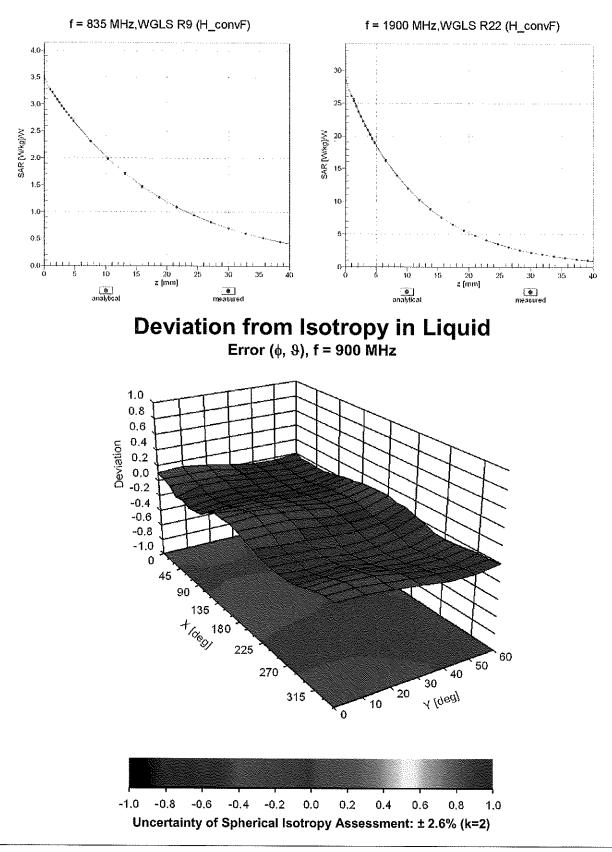
# Receiving Pattern ( $\phi$ ), $\vartheta = 0^{\circ}$

Uncertainty of Axial Isotropy Assessment: ± 0.5% (k=2)



## Dynamic Range f(SAR<sub>head</sub>) (TEM cell , f<sub>eval</sub>= 1900 MHz)

Uncertainty of Linearity Assessment: ± 0.6% (k=2)



## **Conversion Factor Assessment**

## **Appendix: Modulation Calibration Parameters**

UID	Rev	Communication System Name	Group	PAR (dB)	Unc <sup>E</sup> (k=2)
0		CW	CW	0.00	± 4.7 %
10010	CAA	SAR Validation (Square, 100ms, 10ms)	Test	10.00	± 9.6 %
10011	CAB	UMTS-FDD (WCDMA)	WCDMA	2.91	± 9.6 %
10012	CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 1 Mbps)	WLAN	1.87	± 9.6 %
10013	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps)	WLAN	9.46	± 9.6 %
10021	DAC	GSM-FDD (TDMA, GMSK)	GSM	9.39	± 9.6 %
10023	DAC	GPRS-FDD (TDMA, GMSK, TN 0)	GSM	9.57	± 9.6 %
10024	DAC	GPRS-FDD (TDMA, GMSK, TN 0-1)	GSM	6.56	± 9.6 %
10025	DAC	EDGE-FDD (TDMA, 8PSK, TN 0)	GSM	12.62	± 9.6 %
10026	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-1)	GSM	9.55	± 9.6 %
10027	DAC	GPRS-FDD (TDMA, GMSK, TN 0-1-2)	GSM	4.80	± 9.6 %
10028	DAC	GPRS-FDD (TDMA, GMSK, TN 0-1-2-3)	GSM	3.55	$\pm 9.6 \%$
10029	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-1-2)	GSM	7.78	$\pm 9.6\%$
10030	CAA	IEEE 802.15.1 Bluetooth (GFSK, DH1)	Bluetooth	5.30	$\pm 9.6\%$
10031	CAA	IEEE 802.15.1 Bluetooth (GFSK, DH3)	Bluetooth		
10032	CAA	IEEE 802.15.1 Bluetooth (GFSK, DH5)	Bluetooth	1.87	± 9.6 %
10033	CAA	IEEE 802.15.1 Bluetooth (PI/4-DQPSK, DH1)		1.16	± 9.6 %
10034	CAA	IEEE 802.15.1 Bluetooth (PI/4-DQPSK, DH3)	Bluetooth	7.74	± 9.6 %
10035	CAA	IEEE 802.15.1 Bluetooth (PI/4-DQPSK, DH5)	Bluetooth	4.53	± 9.6 %
10036	CAA	IEEE 802.15.1 Bluetooth (8-DPSK, DH1)	Bluetooth	3.83	± 9.6 %
10037	CAA	IEEE 802.15.1 Bluetooth (8-DPSK, DH1)	Bluetooth	8.01	± 9.6 %
10038	CAA	IEEE 802.15.1 Bluetooth (8-DPSK, DH3)	Bluetooth	4.77	±9.6 %
0039	CAB	CDMA2000 (1xRTT, RC1)	Bluetooth	4.10	± 9.6 %
0042	CAB	IS 54 / IS 126 EDD /TRMA/EDM DVA DODOV // // //	CDMA2000	4.57	± 9.6 %
0042	CAB	IS-54 / IS-136 FDD (TDMA/FDM, PI/4-DQPSK, Halfrate)	AMPS	7.78	± 9.6 %
0048	CAA	IS-91/EIA/TIA-553 FDD (FDMA, FM)	AMPS	0.00	± 9.6 %
0048		DECT (TDD, TDMA/FDM, GFSK, Full Slot, 24)	DECT	13.80	± 9.6 %
	CAA	DECT (TDD, TDMA/FDM, GFSK, Double Slot, 12)	DECT	10.79	± 9.6 %
0056	CAA	UMTS-TDD (TD-SCDMA, 1.28 Mcps)	TD-SCDMA	11.01	± 9.6 %
0058	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-1-2-3)	GSM	6.52	± 9.6 %
0059	CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 2 Mbps)	WLAN	2.12	± 9.6 %
10060	CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 5.5 Mbps)	WLAN	2.83	± 9.6 %
0061	CAB	IEEE 802.11b WiFi 2.4 GHz (DSSS, 11 Mbps)	WLAN	3.60	± 9.6 %
10062	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 6 Mbps)	WLAN	8.68	± 9.6 %
0063	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 9 Mbps)	WLAN	8.63	± 9.6 %
0064	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 12 Mbps)	WLAN	9.09	± 9.6 %
0065	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 18 Mbps)	WLAN	9.00	± 9.6 %
0066	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 24 Mbps)	WLAN	9.38	± 9.6 %
0067	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 36 Mbps)	WLAN	10.12	± 9.6 %
0068	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 48 Mbps)	WLAN	10.24	± 9.6 %
0069	CAC	IEEE 802.11a/h WiFi 5 GHz (OFDM, 54 Mbps)	WLAN	10.56	± 9.6 %
0071	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 9 Mbps)	WLAN	9.83	± 9.6 %
0072	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 12 Mbps)	WLAN	9.62	$\pm 9.6\%$
0073	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 18 Mbps)	WLAN	9.94	$\pm 9.6\%$
0074	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 24 Mbps)	WLAN	10.30	$\pm 9.6\%$
0075	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 36 Mbps)	WLAN	10.30	$\pm 9.6\%$
0076	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 48 Mbps)	WLAN	10.94	$\pm 9.6\%$
0077	CAB	IEEE 802.11g WiFi 2.4 GHz (DSSS/OFDM, 54 Mbps)	WLAN	11.00	$\pm 9.6\%$
0081	CAB	CDMA2000 (1xRTT, RC3)	CDMA2000	3.97	
0082	CAB	IS-54 / IS-136 FDD (TDMA/FDM, PI/4-DQPSK, Fullrate)	AMPS	4.77	$\pm 9.6\%$
0090	DAC	GPRS-FDD (TDMA, GMSK, TN 0-4)	GSM		$\pm 9.6\%$
0097	CAB	UMTS-FDD (HSDPA)		6.56	$\pm 9.6\%$
0098	CAB	UMTS-FDD (HSUPA, Subtest 2)		3.98	± 9.6 %
0099	DAC	EDGE-FDD (TDMA, 8PSK, TN 0-4)	WCDMA	3.98	± 9.6 %
0100	CAE	LTE-FDD (SC-FDMA, 100% RB, 20 MHz, QPSK)	GSM	9.55	± 9.6 %
0101	CAE	TE-EDD (SC-EDMA 100% PB 20 MILL 40 CANA	LTE-FDD	5.67	± 9.6 %
0102	CAE	LTE-FDD (SC-FDMA, 100% RB, 20 MHz, 16-QAM)	LTE-FDD	6.42	± 9.6 %
0102		LTE-FDD (SC-FDMA, 100% RB, 20 MHz, 64-QAM)	LTE-FDD	6.60	± 9.6 %
		LTE-TDD (SC-FDMA, 100% RB, 20 MHz, QPSK)	LTE-TDD	9.29	± 9.6 %
0104	CAG	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, 16-QAM)	LTE-TDD	9.97	± 9.6 %
0105	CAG	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, 64-QAM)	LTE-TDD	10.01	± 9.6 %
0108	CAG	LTE-FDD (SC-FDMA, 100% RB, 10 MHz, QPSK)	LTE-FDD	5.80	± 9.6 %

#### EX3DV4- SN:7570

10109         CAG         LTE-FDD         6.5.75         ± 9.9.5%           10110         CAG         LTE-FDD         6.5.75         ± 9.9.5%           10111         CAG         LTE-FDD         6.5.75         ± 9.9.5%           10111         CAG         LTE-FDD         6.5.75         ± 9.9.5%           10113         CAG         LTE-FDD         6.5.76         ± 9.9.5%           10116         CAG         LEEE 49.211n (LTT Generalized, 55 Mays, 84-CAM)         WTAN         8.0.9           10116         CAG         LEEE 50.211n (LTT Mixed, 81 Mays, 64-CAM)         WTAN         8.9.9         ± 9.9.5%           10141         CAE         LTE-FDD (5.2-FDMA, 100% KB, 3 MHz, 16-CAM)         UTE-FDD         5.3.3         ± 9.8.5%           10142         CAE         LTE-FDD (5.2-FDMA, 100% KB, 3 MHz, 16-CAM)         LTE-FDD         5.5.3         ± 9.8.5%           10142 <t< th=""><th></th><th></th><th></th><th></th><th></th><th></th></t<>						
1011         CAG         TITE-FDD         SC4FDAA         100%         RB. 0 MHz, 64-CAM)         TITE-FDD         6.59         ± 8.8 %           10112         CAG         TIEF-FDD         SC4FDAA         100%         RB. 0 MHz, 64-CAM)         TITE-FDD         6.59         ± 8.8 %           10113         CAG         TIEF-FDD         SC4FDAA         100%         RB. 0 MHz, 64-CAM)         TIEF-FDD         6.59         ± 8.8 %           10116         CAC         TIEEE BD2         116 (TH Greenfield, 81 Mbps, 16-CAM)         WULAN         8.16         ± 8.0 %           10116         CAC         TIEEE BD2         116 (TH Greenfield, 158 Mbps, 64-CAM)         WULAN         8.59         ± 8.0 %           10116         CAC         TIEEE BD2         116 (TH Mxed, 135 Mbps, 64-CAM)         WULAN         8.59         ± 8.0 %           10116         CAC         TIEE FDD         SC3         ± 8.0 %         TIE-FDD         6.43         ± 8.0 %           10142         CAE         TIE-FDD         SC3         ± 8.0 %         TIE-FDD         5.73         ± 8.0 %           10142         CAE         TIE-FDD         SC3         ± 8.0 %         TIE-FDD         5.53         ± 8.0 %           10142         CAE	10109	CAG		LTE-FDD	6.43	± 9.6 %
16112         CAG         TTE-FDD         6.52         ±9.6 %           16113         CAG         TTE-FDD         6.52         ±9.6 %           16114         CAC         IEEE R02.11n (HT Greenfield, 13.5 Mps, 16-OAM)         WLAN         8.40         ± 9.6 %           16115         CAC         IEEE R02.11n (HT Greenfield, 13.6 Mps, 16-OAM)         WLAN         8.40         ± 29.6 %           16116         CAC         IEEE R02.11n (HT Greenfield, 13.6 Mps, 64-OAM)         WLAN         8.07         ± 29.6 %           16117         CAC         IEEE R02.11n (HT Mwsd, 13.6 Mps, 64-OAM)         WLAN         8.13         ± 29.6 %           16116         CAC         IEEE R02.11n (HT Mwsd, 15.8 Mps, 64-OAM)         WLAN         8.13         ± 29.6 %           16116         CAC         IEEE R02.11n (HT Mwsd, 18.8 Mps, 16-OAM)         UTE-FDD         6.33         ± 29.6 %           16141         CAE         ITE-FDD (SC-FDMA, 100% RB, 18.14 MHz, 16-OAM)         UTE-FDD         6.33         ± 29.6 %           16142         CAE         ITE-FDD (SC-FDMA, 100% RB, 13.4 MHz, 16-OAM)         UTE-FDD         6.62         ± 29.6 %           16142         CAE         ITE-FDD (SC-FDMA, 100% RB, 14.4 MHz, 16-OAM)         ITE-FDD         6.62         ± 29.6 %         10.66	10110	CAG	LTE-FDD (SC-FDMA, 100% RB, 5 MHz, QPSK)			
1011         CAG         TTF-FDD         (SC-FDMA, 100% RB, 5 MHz, 64-QAM)         LTE-FDD         6.82         ± 9.8 %           10116         CAC         IEEE 802.11n (HT Greenfield, 35 Mbps, 64-QAM)         WLAN         8.10         ± 9.8 %           10116         CAC         IEEE 802.11n (HT Greenfield, 135 Mbps, 64-QAM)         WLAN         8.15         ± 9.8 %           10117         CAC         IEEE 802.11n (HT Mixed, 135 Mbps, 64-QAM)         WLAN         8.59         ± 9.8 %           10118         CAC         IEEE 802.11n (HT Mixed, 135 Mbps, 64-QAM)         WLAN         8.59         ± 9.8 %           10119         CAC         IEEE 802.11n (HT Mixed, 135 Mbps, 64-QAM)         WLAN         8.59         ± 9.8 %           10141         CAE         ITE-FDD (SC-FDMA, 100% RB, 13 MHz, 14-QAM)         LTE-FDD (S.5.3         ± 9.8 %           10142         CAE         ITE-FDD (SC-FDMA, 100% RB, 3 MHz, 16-QAM)         LTE-FDD (S.5.7         ± 9.6 %           10143         CAE         ITE-FDD (SC-FDMA, 100% RB, 14 MHz, QPSK)         LTE-FDD (S.7.6         ± 9.6 %           10144         CAE         ITE-FDD (SC-FDMA, 100% RB, 12 MHz, 16-QAM)         LTE-FDD (SC-FDMA, 50% RB, 20 MH	10111	CAG	LTE-FDD (SC-FDMA, 100% RB, 5 MHz, 16-QAM)			
10113         CAG         LTE-FDD         6.62         ± 9.6 %           10114         CAC         IEEE 502.11n (HT Greenfield, 35 Mbps, 64-CAM)         WLAN         8.10         ± 9.6 %           10116         CAC         IEEE 502.11n (HT Greenfield, 35 Mbps, 64-CAM)         WLAN         8.16         ± 9.6 %           10117         CAC         IEEE 502.11n (HT Mixed, 135 Mbps, 64-CAM)         WLAN         8.57         ± 9.6 %           10118         CAC         IEEE 502.11n (HT Mixed, 135 Mbps, 64-CAM)         WLAN         8.59         ± 9.6 %           10119         CAC         IEEE 502.11n (HT Mixed, 135 Mbps, 64-CAM)         WLAN         8.59         ± 9.6 %           10140         CAC         IEEE 502.11n (HT Mixed, 135 Mbps, 64-CAM)         ITE-FDD         6.43         ± 9.6 %           10141         CAE         ITE-FDD (5C-FDMA, 100% RB, 15 MHz, 64-CAM)         ITE-FDD         6.73         ± 9.6 %           10142         CAE         ITE-FDD (5C-FDMA, 100% RB, 13 MHz, 16-CAM)         ITE-FDD         6.41         ± 9.6 %           10144         CAE         ITE-FDD (5C-FDMA, 100% RB, 14 MHz, 46-CAM)         ITE-FDD         6.42         ± 9.6 %           10146         CAF         ITE-FDD (5C-FDMA, 50% RB, 20 MHz, 6-CAM)         ITE-FDD         6.42         <	10112	CAG		LTE-FDD		
10116         CAC         IEEE 802.11n (HT Generifield 31 Mbps, 16-CAM)         WLAN         8.46         ± 9.8 %           10116         CAC         IEEE 802.11n (HT Maxed, 135 Mbps, 80-CAM)         WLAN         8.16         ± 9.8 %           10116         CAC         IEEE 802.11n (HT Maxed, 135 Mbps, 90-CAM)         WLAN         8.97         ± 9.8 %           10116         CAC         IEEE 802.11n (HT Maxed, 125 Mbps, 10-CAM)         WLAN         8.97         ± 9.8 %           10140         CAC         IEEE 802.11n (HT Maxed, 125 Mbps, 10-CAM)         WLAN         8.13         ± 9.6 %           10140         CAE         ITE-FDD (5C-FDMA, 100% RB, 15 MHz, 16-CAM)         ITE-FDD (5.3         ± 9.6 %           10142         CAE         ITE-FDD (5C-FDMA, 100% RB, 3 MHz, 16-CAM)         ITE-FDD (5.65 ± 9.6 %           10144         CAE         ITE-FDD (5C-FDMA, 100% RB, 14 MHz, 16-CAM)         ITE-FDD (5.65 ± 9.6 %           10146         CAF         ITE-FDD (5C-FDMA, 100% RB, 2 MHz, 16-CAM)         ITE-FDD (5.42 ± 9.6 %           10146         CAF         ITE-FDD (5C-FDMA, 50% RB, 2 MHz, 16-CAM)         ITE-FDD (5.42 ± 9.6 %           10146         CAF         ITE-FDD (5C-FDMA, 50% RB, 2 MHz, 16-CAM)         ITE-FDD (5.42 ± 9.6 %           10146         CAF         ITE-FDD (5C-FDMA, 50% RB, 2 MHz, 16-CA	10113	CAG	LTE-FDD (SC-FDMA, 100% RB, 5 MHz, 64-QAM)			
10116         CAC         Life B 202 110 (HT Generifield 135 Milps, B4-CAM)         WLAN         8.16         ± 9.8 %           10117         CAC         IEEE 802 110 (HT Mixed, B1 Mbps, 16-CAM)         WLAN         8.07         ± 9.8 %           10118         CAC         IEEE 802 110 (HT Mixed, B1 Mbps, 16-CAM)         WLAN         8.13         ± 9.8 %           10149         CAC         IEEE 802 110 (HT Mixed, B1 Mbps, 16-CAM)         UTE-FDD         6.49         ± 9.8 %           10141         CAE         ITE-FDD (SC-FDMA, 100% RB, 3 MHz, 0FSK)         UTE-FDD         6.33         ± 9.6 %           10142         CAE         ITE-FDD (SC-FDMA, 100% RB, 3 MHz, 0FSK)         UTE-FDD         6.65         ± 9.6 %           10143         CAE         ITE-FDD (SC-FDMA, 100% RB, 3 MHz, 0FSK)         UTE-FDD         6.66         ± 9.6 %           10144         CAE         ITE-FDD (SC-FDMA, 100% RB, 3 MHz, 0FSAM)         LTE-FDD         6.61         ± 9.6 %           10147         CAE         ITE-FDD (SC-FDMA, 100% RB, 20 MHz, 16-CAM)         LTE-FDD         6.61         ± 9.6 %           10143         CAE         ITE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-CAM)         LTE-FDD         6.61         ± 9.6 %           10144         CAE         ITE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-CAM)	10114	CAC	IEEE 802.11n (HT Greenfield, 13.5 Mbps, BPSK)			
10117         CAC         IEEE 802.110 (HT Mared, 136 Mbps, BPSK)         WLAN         8.07         ±9.8 %           10118         CAC         IEEE 802.110 (HT Mared, 130 Mbps, 80-CAM)         WLAN         8.59         ±9.8 %           10140         CAC         IEEE 802.110 (HT Mared, 130 Mbps, 80-CAM)         UTE-FDD         6.49         ±9.8 %           10140         CAE         LTE-FDD (SC-FDMA, 100% RB, 15 MHz, 64-CAM)         LTE-FDD         5.73         ±9.8 %           10142         CAE         LTE-FDD (SC-FDMA, 100% RB, 3 MHz, 16-CAM)         LTE-FDD         5.73         ±9.8 %           10143         CAE         LTE-FDD (SC-FDMA, 100% RB, 3 MHz, 16-CAM)         LTE-FDD         6.85         ±9.8 %           10144         CAE         LTE-FDD (SC-FDMA, 100% RB, 1.4 MHz, 40-CAM)         LTE-FDD         6.41         ±9.8 %           10146         CAF         LTE-FDD (SC-FDMA, 100% RB, 1.4 MHz, 40-CAM)         LTE-FDD         6.42         ±9.8 %           10146         CAF         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-CAM)         LTE-FDD         6.42         ±9.8 %           10156         CAG         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 6-CAM)         LTE-FDD         6.42         ±9.8 %           10156         CAG         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 6-CAM)	10115	CAC	IEEE 802.11n (HT Greenfield, 81 Mbps, 16-QAM)			
TOTIS         CAC         IEEE 802.11n (HT Mixed, 81 Mbps, 16-CAM)         WLAN         8.59         ± 9.6 %.           TOTIG         CAC         IEEE 802.11n (HT Mixed, 158 Mbps, 64-CAM)         ITE+FDD         6.49         ± 9.6 %.           TOTIG         CAE         ITE+FDD (SC-FDMA, 100% RB, 15 MHz, 64-CAM)         ITE+FDD         6.53         ± 9.6 %.           TOTIG         CAE         ITE+FDD (SC-FDMA, 100% RB, 3 MHz, 64-CAM)         ITE+FDD         6.55         ± 9.6 %.           TOTIG         CAE         ITE+FDD (SC-FDMA, 100% RB, 3 MHz, 64-CAM)         ITE+FDD         6.76         ± 9.6 %.           TOTIG         CAF         ITE+FDD (SC-FDMA, 100% RB, 14 MHz, 15-CAM)         ITE+FDD         6.76         ± 9.6 %.           TOTIG         CAF         ITE+FDD (SC-FDMA, 100% RB, 14 MHz, 15-CAM)         ITE+FDD         6.72         ± 9.6 %.           TOTIG         CAF         ITE+FDD (SC-FDMA, 50% RB, 20 MHz, 46-CAM)         ITE+FDD         6.42         ± 9.6 %.           TOTIG         CAG         ITE+FDD (SC-FDMA, 50% RB, 20 MHz, 46-CAM)         ITE+FDD         6.42         ± 9.6 %.           TOTIG         CAG         ITE+FDD (SC-FDMA, 50% RB, 20 MHz, 46-CAM)         ITE+FDD         6.42         ± 9.6 %.           TOTIG         CAG         ITE+FDD (SC-FDMA, 50% RB, 20 M	10116	CAC				
TOTO         CAC         TEEE 802 11n (HT Attood, 135 Mbps, 64-CAM)         WLAN         8.13         ±9.8 %           TOTAD         CAE         LTE-FDD         GC-FDMA, 100% RB, 15 MHz, 64-CAM)         LTE-FDD         6.53         ±9.0 %           TOTAD         CAE         LTE-FDD         GC-FDMA, 100% RB, 31 MHz, 64-CAM)         LTE-FDD         6.53         ±9.0 %           TOTAD         CAE         LTE-FDD         GC-FDMA, 100% RB, 31 MHz, 64-CAM)         LTE-FDD         6.86         ±9.6 %           TOTAD         CAF         LTE-FDD         GC-FDMA, 100% RB, 31 MHz, 64-CAM)         LTE-FDD         6.76         ±9.6 %           TOTAD         GC-FDMA, 100% RB, 14 MHz, 16-CAM)         LTE-FDD         6.76         ±9.6 %           TOTAD         GC-FDMA, 100% RB, 14 MHz, 16-CAM)         LTE-FDD         6.76         ±9.6 %           TOTAD         GC-FDMA, 50% RB, 20 MHz, 64-CAM)         LTE-FDD         6.60         ±9.6 %           TOTAD         GC-FDMA, 50% RB, 20 MHz, 64-CAM)         LTE-FDD         6.60         ±9.6 %           TOTS         CAE         LTE-FDD         GC-FDMA, 50% RB, 20 MHz, 64-CAM)         LTE-FDD         5.76         ±9.0 %           TOTS         CAG         LTE-FDD         GC-FDMA, 50% RB, 20 MHz, 64-CAM)         LTE-FDD	10117	CAC	IEEE 802.11n (HT Mixed, 13.5 Mbps, BPSK)			
10140         CAE         LTE-FDD         6.49         ± 9.69.%           10141         CAE         LTE-FDD         6.53         ± 9.6 %           10142         CAE         LTE-FDD         6.53         ± 9.6 %           10142         CAE         LTE-FDD         6.53         ± 9.6 %           10143         CAE         LTE-FDD         6.56         ± 9.6 %           10144         CAE         LTE-FDD         6.56         ± 9.6 %           10144         CAE         LTE-FDD         6.56         ± 9.6 %           10146         CAF         LTE-FDD         6.76         ± 9.6 %           10146         CAF         LTE-FDD         6.76         ± 9.6 %           10147         CAF         LTE-FDD         105-CFDMA, 500% RB, 20 MHz, 16-CAM)         LTE-FDD         6.42         ± 9.6 %           10151         CAG         LTE-FDD         105-CFDMA, 500% RB, 20 MHz, 16-CAM)         LTE-FDD         9.28 %         1015           10152         CAG         LTE-FDD         105-CFDMA, 500% RB, 20 MHz, 46-CAM)         LTE-FDD         9.08 %         1016         4.29.6 %         1015         CAG         11E-FDD         9.08 %         1016         4.29.6 %         1015         C	10118	CAC				
10141         CAE         11TE-FDD         65.3         ± 9.6 %           10142         CAE         LTE-FDD         SC-70A         100% RB 3 MHz, 16-CAM         LTE-FDD         6.73         ± 9.6 %           10143         CAE         LTE-FDD         SC-70MA, 100% RB 3 MHz, 16-CAM         LTE-FDD         6.65         ± 9.6 %           10144         CAE         LTE-FDD         SC-FDMA, 100% RB 1 A MHz, 16-CAM         LTE-FDD         6.67         ± 9.6 %           10146         CAF         LTE-FDD         SC-FDMA, 100% RB 1 A MHz, 16-CAM         LTE-FDD         6.76         ± 9.6 %           10147         CAF         LTE-FDD         SC-FDMA, 100% RB 1 A MHz, 16-CAM         LTE-FDD         6.41         ± 9.6 %           10147         CAF         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 64-CAM)         LTE-FDD         6.42         ± 9.6 %           10150         CAE         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 0FSK)         LTE-FDD         6.64         ± 9.6 %           10152         CAG         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-CAM)         LTE-FDD         5.76         ± 9.6 %           10154         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 16-CAM)         LTE-FDD         5.79         ± 9.6 %           10155         CAG         LTE-FDD	10119	CAC				
10143         CAE         ITE-FDD         (5.72         19.8 %           10143         CAE         ITE-FDD         (5.73         19.8 %           10143         CAE         ITE-FDD         (5.67         19.8 %)           10144         CAE         ITE-FDD         (5.67         19.8 %)           10145         CAF         ITE-FDD         (5.67         19.8 %)           10146         CAF         ITE-FDD         (5.67         19.8 %)           10147         CAF         ITE-FDD         (5.67         19.8 %)           10147         CAF         ITE-FDD         (5.67         19.8 %)           10147         CAF         ITE-FDD         (5.67         19.8 %)           10149         CAE         ITE-FDD         (5.67         19.6 %)           10151         CAG         ITE-FDD         (5.67         19.6 %)           10152         CAG         ITE-FDD         (5.67         19.6 %)         ITE-FDD         6.80 %           10153         CAG         ITE-FDD         (5.67         19.8 %)         ITE-FDD         5.73         19.8 %           10155         CAG         ITE-FDD         (5.67         19.8 %)         ITE-FDD	10140	CAE				
10143         CAE         LTE-FDD         (6.35         ±9.6%)           10144         CAE         LTE-FDD         (6.35         ±9.6%)           10144         CAE         LTE-FDD         (5C-FDMA, 100% RB, 14 MHz, G4-OAM)         LTE-FDD         6.76         ±9.6%)           10146         CAF         LTE-FDD         (5C-FDMA, 100% RB, 14 MHz, G4-OAM)         LTE-FDD         6.72         ±9.6%)           10147         CAE         LTE-FDD         (5C-FDMA, 50% RB, 20 MHz, 64-OAM)         LTE-FDD         6.42         ±9.6%)           10150         CAE         LTE-FDD         (5C-FDMA, 50% RB, 20 MHz, 64-OAM)         LTE-FDD         9.28         ±9.6%)           10151         CAG         LTE-TDD         (5C-FDMA, 50% RB, 20 MHz, 64-OAM)         LTE-FDD         9.28         ±9.6%)           10152         CAG         LTE-FDD         (5C-FDMA, 50% RB, 20 MHz, 16-OAM)         LTE-FDD         5.78         ±9.6%)           10154         CAG         LTE-FDD         (5C-FDMA, 50% RB, 10 MHz, 16-OAM)         LTE-FDD         6.43         ±9.6%           10156         CAG         LTE-FDD         (5C-FDMA, 50% RB, 10 MHz, 16-OAM)         LTE-FDD         6.42         ±9.6%           10156         CAG         LTE-FDD         (5C-	10141	CAE				
10144         CAE         LTE-FDD         (SC-FDMA, 100%, RB, 14, MHz, QPSK)         LTE-FDD         6.65         19.6 %           10146         CAF         LTE-FDD         (SC-FDMA, 100%, RB, 14, MHz, QPSK)         LTE-FDD         6.71         19.6 %           10147         CAF         LTE-FDD         (SC-FDMA, 100%, RB, 14, MHz, 46-CAM)         LTE-FDD         6.72         19.6 %           10149         CAE         LTE-FDD         (SC-FDMA, 50%, RB, 20, MHz, 16-CAM)         LTE-FDD         6.42         ±9.6 %           10151         CAG         LTE-FDD         (SC-FDMA, 50%, RB, 20, MHz, 0F-CAM)         LTE-FDD         6.42         ±9.6 %           10152         CAG         LTE-FDD         (SC-FDMA, 50%, RB, 20, MHz, 0F-CAM)         LTE-FDD         9.82         ±9.6 %           10153         CAG         LTE-FDD         (SC-FDMA, 50%, RB, 10, MHz, 0FOK)         LTE-FDD         5.75         ±9.6 %           10156         CAG         LTE-FDD         (SC-FDMA, 50%, RB, 10, MHz, 0FOK)         LTE-FDD         5.75         ±9.6 %           10156         CAG         LTE-FDD         (SC-FDMA, 50%, RB, 10, MHz, 0FOK)         LTE-FDD         5.78         ±9.6 %           10156         CAG         LTE-FDD         (SC-FDMA, 50%, RB, 5, MHz, 16-QAM)         L		CAE				
10146         CAF         LTE-FDD         5.76         ± 9.6%           10146         CAF         LTE-FDD         5.76         ± 9.6%           10147         CAF         LTE-FDD         56.71         ± 9.6%           10149         CAE         LTE-FDD         56.72         ± 9.6%           10149         CAE         LTE-FDD         56.72         ± 9.6%           10150         CAE         LTE-FDD         56.72         ± 9.6%           10150         CAE         LTE-TDD         105.79MA, 50% RB, 20 MHz, 64-GAM)         LTE-TDD         9.28         ± 9.6%           10152         CAG         LTE-TDD         105.79MA, 50% RB, 20 MHz, 16-GAM)         LTE-TDD         9.28         ± 9.6%           10153         CAG         LTE-TDD         105.79MA, 50% RB, 10 MHz, 16-GAM)         LTE-FDD         5.78         ± 9.6%           10156         CAG         LTE-FDD         105.79MA, 50% RB, 10 MHz, 0F-SK)         LTE-FDD         6.43         ± 9.6%           10156         CAG         LTE-FDD         15.78         ± 9.6%         10166         CAG         LTE-FDD         6.42         ± 9.6%           10156         CAG         LTE-FDD         15.79         ± 9.6%         10166	10143	CAE	LTE-FDD (SC-FDMA, 100% RB, 3 MHz, 16-QAM)			
10:14         CAF         LTE-FDD         SC-FDMA, 100% RB, 14 MHz, 16-GAM)         LTE-FDD         6.41         ± 9.6 %           10:147         CAF         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-GAM)         LTE-FDD         6.42         ± 9.6 %           10:151         CAG         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 0F-GAM)         LTE-FDD         6.42         ± 9.6 %           10:151         CAG         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 0F-GAM)         LTE-FDD         9.28         ± 9.6 %           10:152         CAG         LTE-FDD (SC-FDMA, 50% RB, 20 MHz, 16-GAM)         LTE-TDD         9.28         ± 9.6 %           10:152         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 0PSK)         LTE-FDD         9.6 %           10:153         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 0PSK)         LTE-FDD         5.75         ± 9.6 %           10:154         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 0F-GAM)         LTE-FDD         5.79         ± 9.6 %           10:155         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 16-GAM)         LTE-FDD         6.49         ± 9.6 %           10:156         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM)         LTE-FDD         6.62         ± 9.6 %           10:167         CAG         LTE-FDD (SC-FDMA, 50% RB, 16 MHz, 0F-QAM)<	10144	CAE			~	
10:147         CAF         LTTE-FDD         (SC-FDMA, 100%, RB, 14 MHz, 16-QAM)         LTE-FDD         6.72         ± 9.6 %           10149         CAE         LTE-FDD (SC-FDMA, 50%, RB, 20 MHz, 16-QAM)         LTE-FDD         6.42         ± 9.6 %           10150         CAE         LTE-FDD (SC-FDMA, 50%, RB, 20 MHz, 16-QAM)         LTE-FDD         9.28         ± 9.6 %           10151         CAG         LTE-TDD (SC-FDMA, 50%, RB, 20 MHz, 16-QAM)         LTE-TDD         9.28         ± 9.6 %           10152         CAG         LTE-TDD (SC-FDMA, 50%, RB, 20 MHz, 64-QAM)         LTE-TDD         9.02         ± 9.6 %           10155         CAG         LTE-TDD (SC-FDMA, 50%, RB, 50 MHz, QPSK)         LTE-FDD         6.43         ± 9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50%, RB, 50 MHz, QPSK)         LTE-FDD         6.42         ± 9.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50%, RB, 50 MHz, 64-QAM)         LTE-FDD         6.62         ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50%, RB, 50 MHz, 64-QAM)         LTE-FDD         6.62         ± 9.6 %           10160         CAE         LTE-FDD (SC-FDMA, 50%, RB, 15 MHz, 64-QAM)         LTE-FDD         5.84         ± 9.6 %           101616         CAF         LTE-FDD (SC-	10145	CAF				
10160         CAE         LTE-FDD         SC-FDMA, 50% RB, 20 MHz, 16-CAM         LTE-FDD         6.42         ± 9.6 %           10150         CAE         LTE-FDD         SC-FDMA, 50% RB, 20 MHz, 46-CAM         LTE-FDD         9.28         ± 9.6 %           10151         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 46-CAM)         LTE-TDD         9.28         ± 9.6 %           10153         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 46-CAM)         LTE-TDD         9.28         ± 9.6 %           10154         CAG         LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 46-CAM)         LTE-TDD         5.75         ± 9.6 %           10155         CAG         LTE-FDD (SC-FDMA, 50% RB, 50 MHz, 16-CAM)         LTE-FDD         5.79         ± 9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50% RB, 50 MHz, 16-CAM)         LTE-FDD         6.43         ± 9.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50% RB, 50 MHz, 64-CAM)         LTE-FDD         6.64         ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50% RB, 50 MHz, 64-CAM)         LTE-FDD         6.62         ± 9.6 %           10168         CAG         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 64-CAM)         LTE-FDD         6.62         ± 9.6 %           101616         CAF         LTE-FDD	10146	CAF	LTE-FDD (SC-FDMA, 100% RB, 1.4 MHz, 16-QAM)			
10130         CAE         LTE-FDD         Sci %           10151         CAG         LTE-TDD         Sci %         Mitz, QPSK)         LTE-TDD         9.28         ± 9.6 %           10152         CAG         LTE-TDD         Sci %         Mitz, QPSK)         LTE-TDD         9.38         ± 9.6 %           10153         CAG         LTE-TDD         Sci %         Mitz, 16-CAM)         LTE-TDD         9.36 %           10154         CAG         LTE-TDD         Sci %         Mitz, 16-CAM)         LTE-TDD         5.75 ± 9.8 %           10155         CAG         LTE-FDD         Sci %         Mitz, 16-CAM)         LTE-FDD         5.7 ± 9.8 %           10156         CAG         LTE-FDD         Sci %         Mitz, 16-CAM)         LTE-FDD         5.7 ± 9.8 %           10156         CAG         LTE-FDD         Sci %         Mitz, 16-CAM)         LTE-FDD         6.49 ± 9.6 %           10156         CAG         LTE-FDD         Sci %         Mitz, 16-CAM)         LTE-FDD         6.48 ± 9.6 %           10160         CAE         LTE-FDD         Sci % 9.6 %         Mitz, 46-CAM)         LTE-FDD         6.48 ± 9.6 %           10161         CAE         LTE-FDD         Sci % 9.6 %         Mitz, 46-CAM)	1					
10151         CAG         LTE-TDD         9.28         19.28         19.08           10152         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 16-QAM)         LTE-TDD         9.92         19.8 %           10153         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 16-QAM)         LTE-TDD         10.05         19.8 %           10154         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, QPSK)         LTE-FDD         6.4.3 ± 9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM)         LTE-FDD         6.4.3 ± 9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM)         LTE-FDD         6.4.9 ± 9.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 0FSK)         LTE-FDD         6.4.9 ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.4.8 ± 9.6 %           10160         CAG         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         5.8 ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.84 ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 16-QAM)         LTE-FDD         6.84 ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50	·····	*···				
10152         CAG         LTE-TDD         9.92         ± 9.6 %           10153         CAG         LTE-TDD         (SC-FDMA, 50% RB, 20 MHz, 64-QAM)         LTE-TDD         10.05         ± 9.6 %           10154         CAG         LTE-TDD         (SC-FDMA, 50% RB, 10 MHz, 0FSK)         LTE-FDD         5.75         ± 9.6 %           10155         CAG         LTE-FDD         (SC-FDMA, 50% RB, 50 MHz, 0FSK)         LTE-FDD         5.79         ± 9.6 %           10156         CAG         LTE-FDD         (SC-FDMA, 50% RB, 50 MHz, 0FSK)         LTE-FDD         6.49         ± 9.6 %           10158         CAG         LTE-FDD         (SC-FDMA, 50% RB, 50 MHz, 0F-QAM)         LTE-FDD         6.49         ± 9.6 %           10159         CAG         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.43         ± 9.6 %           10160         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 0PSK)         LTE-FDD         6.43         ± 9.6 %           10161         CAE         LTE-FDD         (SC-FDMA, 50% RB, 14 MHz, 0PSK)         LTE-FDD         6.43         ± 9.6 %           10162         CAF         LTE-FDD         (SC-FDMA, 50% RB, 14 MHz, 0PSK)         LTE-FDD         6.43         ± 9.6 %						
TOTES         CAG         LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 64-OAM)         LTE-TDD         10.05         ± 9.6 %           10154         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, QPSK)         LTE-FDD         5.75         ± 9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, QPSK)         LTE-FDD         5.79         ± 9.6 %           10156         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, QPSK)         LTE-FDD         6.64         ± 9.6 %           10157         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, G+QAM)         LTE-FDD         6.62         ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, G+QAM)         LTE-FDD         6.62         ± 9.6 %           10160         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, G+QAM)         LTE-FDD         6.43         ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, G+QAM)         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, QPSK)         LTE-FDD         6.44         ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, QPSK)         LTE-FDD         6.49         ± 9.6 %           10176         CAE         LTE-FDD (SC-FDMA, 18, 20 MHz, 16-QAM)						
10154         CAG         LTE-FDD         S.75         ± 9.6 %           10155         CAG         LTE-FDD         (SC-FDMA, 50% RB, 10 MHz, 16-QAM)         LTE-FDD         5.79         ± 9.6 %           10156         CAG         LTE-FDD         (SC-FDMA, 50% RB, 5 MHz, 16-QAM)         LTE-FDD         5.79         ± 9.6 %           10157         CAG         LTE-FDD         (SC-FDMA, 50% RB, 5 MHz, 16-QAM)         LTE-FDD         6.49         ± 9.6 %           10158         CAG         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.56         ± 9.6 %           10160         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         5.82         ± 9.6 %           10161         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         5.64         ± 9.6 %           10162         CAE         LTE-FDD         (SC-FDMA, 50% RB, 14 MHz, 04-QAM)         LTE-FDD         6.64         ± 9.6 %           10168         CAF         LTE-FDD         (SC-FDMA, 50% RB, 14 MHz, 04-QAM)         LTE-FDD         6.79         ± 9.6 %           10170         CAE         LTE-FDD         (SC-FDMA, 16%, 20 MHz, 0PSK)         LTE-FDD         6.73         ± 9.6 %						
ID165         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM)         LTE-FDD         6.43         ± 9.6 %           10165         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, QPSK)         LTE-FDD         6.79         ± 9.6 %           10167         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM)         LTE-FDD         6.62         ± 9.6 %           10168         CAG         LTE-FDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM)         LTE-FDD         6.56         ± 9.6 %           10160         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         5.82         ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.44         ± 9.6 %           10163         CAE         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 16-QAM)         LTE-FDD         6.74         ± 9.6 %           10164         CAE         LTE-FDD (SC-FDMA, 18, 20 MHz, 14-QAM)         LTE-FDD         6.72         ± 9.6 %           10166         CAE         LTE-FDD (SC-FDMA, 18, 20 MHz, 16-QAM)         LTE-FDD         6.73         ± 9.6 %           10176         CAE         LTE-FDD (SC-FDMA, 18, 20 MHz, 16-QAM)         <						
Dite         Dite         FDD         SC-FDMA, 50% RB, 6 MHz, 0PSK)         LTE-FDD         5.79         ± 9.6 %           10157         CAG         LTE-FDD         (SC-FDMA, 50% RB, 10 MHz, 64-QAM)         LTE-FDD         6.69         ± 9.6 %           10158         CAG         LTE-FDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM)         LTE-FDD         6.62         ± 9.6 %           10160         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         5.82         ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         5.82         ± 9.6 %           10161         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         5.48         ± 9.6 %           10162         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 04-QAM)         LTE-FDD         6.43         ± 9.6 %           10163         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 04-QAM)         LTE-FDD         6.79         ± 9.6 %           10164         CAF         LTE-FDD (SC-FDMA, 180, 20 MHz, 40-QAM)         LTE-FDD         6.79         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 180, 20 MHz, 40-QAM)         LTE-FDD         6.79         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 1						
10157         CAG         LTE-FDD         (SC-FDMA, 50% RB, 6 MHz, 16-QAM)         LTE-FDD         6.49         ± 9.6 %           10158         CAG         LTE-FDD         (SC-FDMA, 50% RB, 10 MHz, 64-QAM)         LTE-FDD         6.62         ± 9.8 %           10160         CAG         LTE-FDD         (SC-FDMA, 50% RB, 5 MHz, 44-QAM)         LTE-FDD         6.52         ± 9.6 %           10160         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 64-QAM)         LTE-FDD         6.43         ± 9.6 %           10161         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.46         ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 64-QAM)         LTE-FDD         6.21         ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 64-QAM)         LTE-FDD         6.21         ± 9.6 %           10168         CAE         LTE-FDD (SC-FDMA, 178, 20 MHz, 16-QAM)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 178, 20 MHz, 20-SK)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 178, 20 MHz, 46-QAM)         LTE-FDD         6.49         ± 9.6 %           10172				and with the second		
10168         CAG         LTE-FDD         (SC-FDMA, 50% RB, 10 MHz, 64-QAM)         LTE-FDD         6.62         ± 9.6 %           10160         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 64-QAM)         LTE-FDD         6.56         ± 9.6 %           10160         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 64-QAM)         LTE-FDD         6.43         ± 9.6 %           10161         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 64-QAM)         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD         (SC-FDMA, 50% RB, 14 MHz, 0PSK)         LTE-FDD         6.58         ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 0PSK)         LTE-FDD         6.79         ± 9.6 %           10168         CAE         LTE-FDD (SC-FDMA, 18D, 20 MHz, 16-QAM)         LTE-FDD         6.79         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 16-QAM)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 16-QAM)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 40-QAM)         LTE-FDD         6.72         ± 9.6 %           10176						
10156         CAG         LTE-FDD         (SC-FDMA, 50% RB, 5 MHz, QPSK)         LTE-FDD         6.56         ± 9.6 %           10160         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, QPSK)         LTE-FDD         6.42         ± 9.6 %           10161         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, QPSK)         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD         (SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.64         ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, QPSK)         LTE-FDD         6.71         ± 9.6 %           10168         CAF         LTE-FDD (SC-FDMA, 10% RB, 14 MHz, 04-QAM)         LTE-FDD         6.73         ± 9.6 %           10169         CAE         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 04-QAM)         LTE-FDD         6.52         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 04-QAM)         LTE-FDD         6.52         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 04-QAM)         LTE-FDD         6.52         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 04-QAM)         LTE-FDD         9.6 %           10174         CAG         LTE-FDD (SC-FDMA						
10160         CAE         LTE-FDD         S6.2         ± 9.6         %           10161         CAE         LTE-FDD         SC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.43         ± 9.6         %           10162         CAE         LTE-FDD         SC-FDMA, 50% RB, 15 MHz, 64-QAM)         LTE-FDD         6.58         ± 9.6         %           10166         CAF         LTE-FDD         SC-FDMA, 50% RB, 1.4 MHz, 0F-QAM)         LTE-FDD         6.78         ± 9.6         %           10167         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 0F-QAM)         LTE-FDD         6.71         ± 9.6         %           10168         CAF         LTE-FDD (SC-FDMA, 178, 20 MHz, 64-QAM)         LTE-FDD         6.73         ± 9.6         %           10170         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-FDD         6.52         ± 9.6         %           10171         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-FDD         6.52         ± 9.6         %           10172         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-FDD         6.43         ± 9.6         %           10172         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-FDD         9.6						
10161         CAE         LTE-FDD         GC-FDMA, 50% RB, 15 MHz, 16-QAM)         LTE-FDD         6.43         ± 9.6 %           10162         CAE         LTE-FDD (SC-FDMA, 50% RB, 15 MHz, 04-QAM)         LTE-FDD         6.58         ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 04-QAM)         LTE-FDD         5.46         ± 9.6 %           10167         CAF         LTE-FDD (SC-FDMA, 50% RB, 14 MHz, 04-QAM)         LTE-FDD         6.21         ± 9.6 %           10168         CAF         LTE-FDD (SC-FDMA, 18, 20 MHz, 04-QAM)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 06-QAM)         LTE-FDD         6.49         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 06-QAM)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 06-QAM)         LTE-FDD         9.21         ± 9.6 %           10173         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 04-QAM)         LTE-FDD         9.21         ± 9.6 %           10174         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 04-QAM)         LTE-FDD         9.21         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 04-QAM						
1016         CAE         LTE-FDD         GCS-FDMA, GO% RB, 15 MHz, 64-QAM)         LTE-FDD         6.58         ± 9.6 %           10166         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, QPSK)         LTE-FDD         5.46         ± 9.6 %           10167         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.79         ± 9.6 %           10168         CAF         LTE-FDD (SC-FDMA, 18, 20 MHz, QPSK)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 18, 20 MHz, 16-QAM)         LTE-FDD         5.73         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 18, 20 MHz, 16-QAM)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-FDD (SC-FDMA, 18, 20 MHz, QPSK)         LTE-TDD         9.21         ± 9.6 %           10172         CAG         LTE-TDD (SC-FDMA, 18, 20 MHz, QPSK)         LTE-TDD         9.48         ± 9.6 %           10174         CAG         LTE-FDD (SC-FDMA, 18, 10 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 18, 10 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 18, 10 MHz, QPSK)         LTE-FDD<	and the second se					
10166         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, QPSK)         LTE-FDD         5.46         ± 9.6 %           10167         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.21         ± 9.6 %           10168         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.79         ± 9.6 %           10169         CAE         LTE-FDD (SC-FDMA, 1RB, 20 MHz, QPSK)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 04-QAM)         LTE-FDD         6.49         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 04-QAM)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-TDD (SC-FDMA, 1RB, 20 MHz, 04-QAM)         LTE-FDD         9.21         ± 9.6 %           10173         CAG         LTE-FDD (SC-FDMA, 1RB, 20 MHz, 04-QAM)         LTE-FDD         9.48         ± 9.6 %           10174         CAG         LTE-FDD (SC-FDMA, 1RB, 10 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1RB, 5 MHz, 16-QAM)         LTE-FDD         5.73         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1RB, 10 MHz, 04-QAM)         LTE-FDD<						
10167         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.21         ± 9.6 %           10168         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.79         ± 9.6 %           10169         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-FDD         6.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)         LTE-FDD         9.21         ± 9.6 %           10173         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)         LTE-TDD         9.48         ± 9.6 %           10174         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM)         LTE-FDD         5.72         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD						
10168         CAF         LTE-FDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.79         ± 9.6 %           10169         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10170         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-TDD         9.21         ± 9.6 %           10173         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-TDD         9.48         ± 9.6 %           10174         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-TDD         9.48         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, GPSK)         LTE-FDD         5.72         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, GPSK)         LTE-FDD         5.72         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, GPSK)         LTE-FDD         5.72         ± 9.6 %           10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, GA-QAM)         LTE-FDD						
10163         CAE         LTE-FDD         (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10170         CAE         LTE-FDD         (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10171         AAE         LTE-FDD         (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-FDD         9.21         ± 9.6 %           10172         CAG         LTE-TDD         (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-TDD         9.21         ± 9.6 %           10173         CAG         LTE-TDD         (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-TDD         9.24         ± 9.6 %           10174         CAG         LTE-TDD         (SC-FDMA, 1 RB, 10 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10180         C	1					
10103         CAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-FDD         6.49         ± 9.6 %           10172         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-TDD         9.21         ± 9.6 %           10173         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-TDD         9.48         ± 9.6 %           10174         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-TDD         9.48         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, G4-QAM)         LTE-FDD         5.72         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, GPSK)         LTE-FDD         5.73         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, GPSK)         LTE-FDD         5.73         ± 9.6 %           10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, GAQM)         LTE-FDD         5.72         ± 9.6 %           10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, G4-QAM)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, G4-QAM)         LTE-FDD						
1010         0.112         0.12         1.12         0.101         1.12         0.44         ± 9.6 %           10171         AAE         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-TDD         9.21         ± 9.6 %           10173         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)         LTE-TDD         9.48         ± 9.6 %           10174         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM)         LTE-TDD         10.25         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, G4-QAM)         LTE-FDD         6.52         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, G4-QAM)         LTE-FDD         6.52         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, G4-QAM)         LTE-FDD         6.52         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, G4-QAM)         LTE-						
1011         1012         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK)         LTE-TDD         9.21         ± 9.6 %           10173         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-TDD         9.48         ± 9.6 %           10174         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-TDD         10.25         ± 9.6 %           10175         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-TDD         10.25         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM)         LTE-FDD         5.72         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         <						
1012         0.00         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-CAM)         LTE-TDD         9.48         ± 9.6 %           10173         CAG         LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-CAM)         LTE-TDD         10.25         ± 9.6 %           10175         CAG         LTE-FDD (SC-FDMA, 1 RB, 20 MHz, 0PSK)         LTE-FDD         5.72         ± 9.6 %           10176         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 0PSK)         LTE-FDD         5.72         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 0PSK)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 0AQM)         LTE-FDD         5.73         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD			LTE-FDD (SC-FDMA, I RD, 20 MHz, 04-QAM)			
1010         CAG         LTE-TDD         (SC-FDMA, 1 RB, 20 MHz, 64-QAM)         LTE-TDD         10.25         ± 9.6 %           10175         CAG         LTE-FDD         (SC-FDMA, 1 RB, 10 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10176         CAG         LTE-FDD         (SC-FDMA, 1 RB, 10 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10177         CAI         LTE-FDD         (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10178         CAG         LTE-FDD         (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10179         CAG         LTE-FDD         (SC-FDMA, 1 RB, 5 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD         (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD         (SC-FDMA, 1 RB, 15 MHz, 0PSK)         LTE-FDD         6.50         ± 9.6 %           10182         CAE         LTE-FDD         (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10183         AAD         LTE-FDD         (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50						
10175         CAG         LTE-FDD         S.72         ± 9.6 %           10176         CAG         LTE-FDD         (SC-FDMA, 1 RB, 10 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10177         CAI         LTE-FDD         (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10178         CAG         LTE-FDD         (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10179         CAG         LTE-FDD         (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10179         CAG         LTE-FDD         (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD         (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD         (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10182         CAE         LTE-FDD         (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         6.51         ± 9.6 %           10184         CAE         L						
10176         CAG         LTE-FDD         (S.2         ± 9.6 %           10177         CAI         LTE-FDD         (S.2         ± 9.6 %           10177         CAI         LTE-FDD         (S.2         ± 9.6 %           10178         CAG         LTE-FDD         (S.73)         ± 9.6 %           10179         CAG         LTE-FDD         (S.2         ± 9.6 %           10180         CAG         LTE-FDD         (S.2         ± 9.6 %           10181         CAE         LTE-FDD         (S.C-FDMA, 1 RB, 10 MHz, 04-QAM)         LTE-FDD         6.50         ± 9.6 %           10182         CAE         LTE-FDD         (S.C-FDMA, 1 RB, 15 MHz, 0PSK)         LTE-FDD         6.50         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 0PSK)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 04-QAM)         LTE-FDD         6.51         ± 9.6 %           10185 <td></td> <td></td> <td>LIE-100 (SC-EDMA 1 RB 10 MHz OPSK)</td> <td></td> <td></td> <td></td>			LIE-100 (SC-EDMA 1 RB 10 MHz OPSK)			
10177         CAI         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.52         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)         LTE-FDD         6.51         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.51         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD			1  TE-EDD (SC-EDMA, 1  RB, 10  MHz, 40  GeV)			
10178         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         6.51         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.51         ± 9.6 %           10186         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10186         CAE         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD <td></td> <td></td> <td></td> <td></td> <td></td> <td></td>						
10179         CAG         LTE-FDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.51         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 14 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         5.73         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FD						
10180         CAG         LTE-FDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         5.73         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 0PSK)         LTE-FDD         5.73         ± 9.6 %           10186         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10186         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 0PSK)         LTE-FDD         5.73         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN						
10181         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, QPSK)         LTE-FDD         5.72         ± 9.6 %           10182         CAE         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         5.73         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10186         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.51         ± 9.6 %           10186         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, GA-QAM)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN						
10182CAELTE-FDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)LTE-FDD6.52± 9.6 %10183AADLTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)LTE-FDD6.50± 9.6 %10184CAELTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)LTE-FDD5.73± 9.6 %10185CAELTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)LTE-FDD6.51± 9.6 %10186AAELTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)LTE-FDD6.50± 9.6 %10187CAFLTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)LTE-FDD5.73± 9.6 %10188CAFLTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)LTE-FDD5.73± 9.6 %10189AAFLTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)LTE-FDD6.52± 9.6 %10189CACIEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)WLAN8.09± 9.6 %10194CACIEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)WLAN8.12± 9.6 %10196CACIEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)WLAN8.10± 9.6 %10196CACIEEE 802.11n (HT Mixed, 6.5 Mbps, 64-QAM)WLAN8.13± 9.6 %10198CACIEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)WLAN8.13± 9.6 %10198CACIEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)WLAN8.13± 9.6 %						
10183         AAD         LTE-FDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         6.51         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN </td <td></td> <td></td> <td></td> <td></td> <td></td> <td></td>						
10106         14.3         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10184         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.51         ± 9.6 %           10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.50         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10189         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, BPSK)         WLAN <td></td> <td></td> <td></td> <td></td> <td></td> <td></td>						
10185         CAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)         LTE-FDD         6.51         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 39 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.13         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM) <t< td=""><td></td><td></td><td></td><td></td><td>5.73</td><td></td></t<>					5.73	
10186         AAE         LTE-FDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %						
10187         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)         LTE-FDD         5.73         ± 9.6 %           10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %					6.50	
10188         CAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)         LTE-FDD         6.52         ± 9.6 %           10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 39 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.11         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %					5,73	
10189         AAF         LTE-FDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)         LTE-FDD         6.50         ± 9.6 %           10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 39 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.10         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %	· · · · · · · · · · · · · · · · · · ·					
10193         CAC         IEEE 802.11n (HT Greenfield, 6.5 Mbps, BPSK)         WLAN         8.09         ± 9.6 %           10194         CAC         IEEE 802.11n (HT Greenfield, 39 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.12         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.21         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %				LTE-FDD	6.50	± 9.6 %
10194         CAC         IEEE 802.11n (HT Greenfield, 39 Mbps, 16-QAM)         WLAN         8.12         ± 9.6 %           10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.21         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.10         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %					8.09	± 9.6 %
10195         CAC         IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)         WLAN         8.21         ± 9.6 %           10196         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.13         ± 9.6 %				WLAN	8.12	± 9.6 %
10196         CAC         IEEE 802.11n (HT Mixed, 6.5 Mbps, BPSK)         WLAN         8.10         ± 9.6 %           10197         CAC         IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %			IEEE 802.11n (HT Greenfield, 65 Mbps, 64-QAM)		8.21	± 9.6 %
10197         CAC         IEEE 802.11n (HT Mixed, 39 Mbps, 16-QAM)         WLAN         8.13         ± 9.6 %           10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %						± 9.6 %
10198         CAC         IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)         WLAN         8.27         ± 9.6 %						
			IEEE 802.11n (HT Mixed, 65 Mbps, 64-QAM)			
			IEEE 802.11n (HT Mixed, 7.2 Mbps, BPSK)	WLAN	8.03	± 9.6 %

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10220	CAC	IEEE 802.11n (HT Mixed, 43.3 Mbps, 16-QAM)	WLAN	8.13	±9.6 %
10221	CAC	IEEE 802.11n (HT Mixed, 72.2 Mbps, 64-QAM)	WLAN	8.27	± 9.6 %
10222	CAC	IEEE 802.11n (HT Mixed, 15 Mbps, BPSK)	WLAN	8.06	± 9.6 %
10223	CAC	IEEE 802.11n (HT Mixed, 90 Mbps, 16-QAM)	WLAN	8.48	±9.6 %
10224	CAC	IEEE 802.11n (HT Mixed, 150 Mbps, 64-QAM)	WLAN	8.08	± 9.6 %
10225	CAB	UMTS-FDD (HSPA+)	WCDMA	5.97	±9.6 %
10226	CAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM)	LTE-TDD	9.49	± 9.6 %
10227	CAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM)	LTE-TDD	10.26	± 9.6 %
10228	CAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK)	LTE-TDD	9.22	± 9.6 %
10229	CAD	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10230	CAD	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10231	CAD	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, QPSK)	LTE-TDD	9.19	± 9.6 %
10232	CAG	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10233	CAG	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10234	CAG	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK)	LTE-TDD	9.21	± 9.6 %
10235	CAG	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10236	CAG	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10237	CAG	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, QPSK)	LTE-TDD	9.21	± 9.6 %
10238	CAF	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM)	LTE-TDD	9.48	± 9.6 %
10239	CAF	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM)	LTE-TDD	10.25	± 9.6 %
10200	CAF	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, QPSK)	LTE-TDD	9.21	± 9.6 %
10240	CAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM)	LTE-TDD	9.21	± 9.6 %
10241	CAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 10-QAM)	LTE-TDD	9.86	$\pm 9.6\%$ $\pm 9.6\%$
10242	CAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, QPSK)	LTE-TDD	9.86	$\pm 9.6\%$ $\pm 9.6\%$
10243	CAD	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 16-QAM)			
10244	CAD	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 16-QAM) LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 64-QAM)	LTE-TDD	10.06	$\pm 9.6\%$
10245		LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 64-QAM) LTE-TDD (SC-FDMA, 50% RB, 3 MHz, QPSK)	LTE-TDD	10.06	±9.6%
10246	CAD		LTE-TDD	9.30	$\pm 9.6\%$
10247	CAG	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM) LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM)	LTE-TDD	9.91	± 9.6 %
10248	CAG		LTE-TDD	10.09	$\pm 9.6\%$
10249	CAG	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, QPSK)	LTE-TDD	9.29	$\pm 9.6\%$
10250	CAG	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM) LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM)	LTE-TDD	9.81	± 9.6 %
10251	CAG	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM) LTE-TDD (SC-FDMA, 50% RB, 10 MHz, QPSK)	LTE-TDD	10.17	$\pm 9.6\%$
10252	CAG	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, QPSK) LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM)	LTE-TDD	9.24	± 9.6 %
10253	CAF	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM) LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 64-QAM)	LTE-TDD	9.90	$\pm 9.6\%$
10254	CAF		LTE-TDD	10.14	±9.6%
10255	CAF	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, QPSK)	LTE-TDD	9.20	± 9.6 %
10256		LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, 16-QAM)	LTE-TDD	9.96	± 9.6 %
	CAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, 64-QAM)	LTE-TDD	10.08	± 9.6 %
10258	CAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, QPSK)	LTE-TDD	9.34	± 9.6 %
10259	CAD	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, 16-QAM)	LTE-TDD	9,98	± 9.6 %
10260	CAD	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, 64-QAM)	LTE-TDD	9.97	±9.6 %
10261	CAD	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, QPSK)	LTE-TDD	9.24	± 9.6 %
10262	CAG	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, 16-QAM)	LTE-TDD	9.83	± 9.6 %
10263	CAG	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, 64-QAM)	LTE-TDD	10.16	±9.6 %
10264	CAG	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, QPSK)	LTE-TDD	9.23	±9.6 %
10265	CAG	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, 16-QAM)	LTE-TDD	9.92	±9.6%
10266	CAG	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, 64-QAM)	LTE-TDD	10.07	±9.6 %
10267	CAG	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, QPSK)	LTE-TDD	9.30	<u>±9.6 %</u>
10268	CAF	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, 16-QAM)	LTE-TDD	10.06	± 9.6 %
10269	CAF	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, 64-QAM)	LTE-TDD	10.13	± 9.6 %
10270	CAF	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, QPSK)	LTE-TDD	9.58	± 9.6 %
10274	CAB	UMTS-FDD (HSUPA, Subtest 5, 3GPP Rel8.10)	WCDMA	4.87	± 9.6 %
10275	CAB	UMTS-FDD (HSUPA, Subtest 5, 3GPP Rel8.4)	WCDMA	3.96	± 9.6 %
10277	CAA	PHS (QPSK)	PHS	11.81	±9.6%
10278	CAA	PHS (QPSK, BW 884MHz, Rolloff 0.5)	PHS	11.81	± 9.6 %
10279	CAA	PHS (QPSK, BW 884MHz, Rolloff 0.38)	PHS	12.18	±9.6 %
10290	AAB	CDMA2000, RC1, SO55, Full Rate	CDMA2000	3.91	±9.6 %
10291	AAB	CDMA2000, RC3, SO55, Full Rate	CDMA2000	3.46	±9.6 %
10292	AAB	CDMA2000, RC3, SO32, Full Rate	CDMA2000	3.39	±9.6%
10293	AAB	CDMA2000, RC3, SO3, Full Rate	CDMA2000	3.50	±9.6 %
10295	AAB	CDMA2000, RC1, SO3, 1/8th Rate 25 fr.	CDMA2000	12.49	± 9.6 %
10297	AAD	LTE-FDD (SC-FDMA, 50% RB, 20 MHz, QPSK)	LTE-FDD	5.81	±9.6%
10298	AAD	LTE-FDD (SC-FDMA, 50% RB, 3 MHz, QPSK)	LTE-FDD	5.72	± 9.6 %
10299	AAD	LTE-FDD (SC-FDMA, 50% RB, 3 MHz, 16-QAM)	LTE-FDD	6.39	± 9.6 %
				1 0.00	0.0 /0

10300	AAD			6 60	+0.00/
10300	AAD	LTE-FDD (SC-FDMA, 50% RB, 3 MHz, 64-QAM) IEEE 802.16e WiMAX (29:18, 5ms, 10MHz, QPSK, PUSC)	LTE-FDD WIMAX	6.60 12.03	±9.6 % ±9.6 %
10302	AAA	IEEE 802.16e WIMAX (29.18, 5ms, 10MHz, QPSK, PUSC, 3 CTRL	WIMAX	12.03	$\pm 9.6\%$ $\pm 9.6\%$
10002		symbols)		12.07	± 9.0 %
10303	AAA	IEEE 802.16e WIMAX (31:15, 5ms, 10MHz, 64QAM, PUSC)	WIMAX	12.52	±9.6 %
10304	AAA	IEEE 802.16e WIMAX (29:18, 5ms, 10MHz, 64QAM, PUSC)	WIMAX	11.86	± 9.6 %
10305	AAA	IEEE 802.16e WIMAX (31:15, 10ms, 10MHz, 64QAM, PUSC, 15	WIMAX	15.24	± 9.6 %
		symbols)			
10306	AAA	IEEE 802.16e WIMAX (29:18, 10ms, 10MHz, 64QAM, PUSC, 18	WIMAX	14.67	± 9.6 %
		symbols)			
10307	AAA	IEEE 802.16e WIMAX (29:18, 10ms, 10MHz, QPSK, PUSC, 18	WIMAX	14.49	± 9.6 %
		symbols)			
10308	AAA	IEEE 802.16e WiMAX (29:18, 10ms, 10MHz, 16QAM, PUSC)	WIMAX	14.46	± 9.6 %
10309	AAA	IEEE 802.16e WiMAX (29:18, 10ms, 10MHz, 16QAM, AMC 2x3, 18	WiMAX	14.58	± 9.6 %
10010		symbols)			
10310	AAA	IEEE 802.16e WIMAX (29:18, 10ms, 10MHz, QPSK, AMC 2x3, 18	WiMAX	14.57	± 9.6 %
10311		symbols)		0.00	100%
10313	AAD AAA	LTE-FDD (SC-FDMA, 100% RB, 15 MHz, QPSK) iDEN 1:3	LTE-FDD	6.06	± 9.6 %
10313	AAA	iDEN 1.5	IDEN IDEN	10.51	± 9.6 %
10314	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 1 Mbps, 96pc duty cycle)		13.48	±9.6%
10315	AAB	IEEE 802.11g WiFi 2.4 GHz (ERP-OFDM, 6 Mbps, 96pc duty cycle)	WLAN	1.71 8.36	±9.6%
10317	AAC	IEEE 802.11g Wir12.4 GHz (CFDM, 6 Mbps, 96pc duty cycle)	WLAN	8.36	±9.6 % ±9.6 %
10352	AAA	Pulse Waveform (200Hz, 10%)	Generic	10.00	± 9.6 %
10353	AAA	Pulse Waveform (200Hz, 20%)	Generic	6.99	± 9.6 %
10354	AAA	Pulse Waveform (200Hz, 20%)	Generic	3.98	± 9.6 %
10355	AAA	Pulse Waveform (200Hz, 60%)	Generic	2.22	± 9.6 %
10356	AAA	Pulse Waveform (200Hz, 80%)	Generic	0.97	± 9.6 %
10387	AAA	QPSK Waveform, 1 MHz	Generic	5.10	± 9.6 %
10388	AAA	QPSK Waveform, 10 MHz	Generic	5.22	± 9.6 %
10396	AAA	64-QAM Waveform, 100 kHz	Generic	6.27	± 9.6 %
10399	AAA	64-QAM Waveform, 40 MHz	Generic	6.27	± 9.6 %
10400	AAD	IEEE 802.11ac WiFi (20MHz, 64-QAM, 99pc duty cycle)	WLAN	8.37	± 9.6 %
10401	AAD	IEEE 802.11ac WiFi (40MHz, 64-QAM, 99pc duty cycle)	WLAN	8.60	± 9.6 %
10402	AAD	IEEE 802.11ac WiFi (80MHz, 64-QAM, 99pc duty cycle)	WLAN	8.53	± 9.6 %
10403	AAB	CDMA2000 (1xEV-DO, Rev. 0)	CDMA2000	3.76	± 9.6 %
10404	AAB	CDMA2000 (1xEV-DO, Rev. A)	CDMA2000	3,77	± 9.6 %
10406	AAB	CDMA2000, RC3, SO32, SCH0, Full Rate	CDMA2000	5.22	± 9.6 %
10410	AAG	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, QPSK, UL	LTE-TDD	7.82	± 9.6 %
		Subframe=2,3,4,7,8,9, Subframe Conf=4)			
10414	AAA	WLAN CCDF, 64-QAM, 40MHz	Generic	8.54	± 9.6 %
10415	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 1 Mbps, 99pc duty cycle)	WLAN	1.54	±9.6 %
10416	AAA	IEEE 802.11g WiFi 2.4 GHz (ERP-OFDM, 6 Mbps, 99pc duty cycle)	WLAN	8.23	± 9.6 %
10417	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 6 Mbps, 99pc duty cycle)	WLAN	8.23	± 9.6 %
10418	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps, 99pc duty cycle,	WLAN	8.14	± 9.6 %
		Long preambule)			
10419	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps, 99pc duty cycle,	WLAN	8.19	± 9.6 %
		Short preambule)			
10422	AAB	IEEE 802.11n (HT Greenfield, 7.2 Mbps, BPSK)	WLAN	8.32	± 9.6 %
10423	AAB	IEEE 802.11n (HT Greenfield, 43.3 Mbps, 16-QAM)	WLAN	8.47	± 9.6 %
10424	AAB	IEEE 802.11n (HT Greenfield, 72.2 Mbps, 64-QAM)	WLAN	8.40	± 9.6 %
10425	AAB	IEEE 802.11n (HT Greenfield, 15 Mbps, BPSK)	WLAN	8.41	± 9.6 %
10426	AAB	IEEE 802.11n (HT Greenfield, 90 Mbps, 16-QAM)	WLAN	8.45	± 9.6 %
10427	AAB	IEEE 802.11n (HT Greenfield, 150 Mbps, 64-QAM)	WLAN	8.41	± 9.6 %
10430	AAD	LTE-FDD (OFDMA, 5 MHz, E-TM 3.1)	LTE-FDD	8.28	± 9.6 %
10431	AAD	LTE-FDD (OFDMA, 10 MHz, E-TM 3.1)	LTE-FDD	8.38	± 9.6 %
10432	AAC	LTE-FDD (OFDMA, 15 MHz, E-TM 3.1)	LTE-FDD	8.34	± 9.6 %
10433	AAC	LTE-FDD (OFDMA, 20 MHz, E-TM 3.1)	LTE-FDD	8.34	± 9.6 %
10434		W-CDMA (BS Test Model 1, 64 DPCH)		8.60	± 9.6 %
10435	AAF	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL	LTE-TDD	7.82	± 9.6 %
10447		Subframe=2,3,4,7,8,9)		7.50	+00%
10447 10448	AAD	LTE-FDD (OFDMA, 5 MHz, E-TM 3.1, Clipping 44%)	LTE-FDD	7.56	$\pm 9.6\%$
1 10440	AAD	LTE-FDD (OFDMA, 10 MHz, E-TM 3.1, Clippin 44%)	LTE-FDD	7.53	± 9,6 %
		$   TE_EDD (OEDMA   15 MHz E_TM 2 1 Oliving 4494)$		7 5 4	1 +0 6 0/
10449 10450	AAC AAC	LTE-FDD (OFDMA, 15 MHz, E-TM 3.1, Cliping 44%) LTE-FDD (OFDMA, 20 MHz, E-TM 3.1, Clipping 44%)	LTE-FDD LTE-FDD	7.51	± 9.6 % ± 9.6 %

10451	AAA	W-CDMA (BS Test Model 1, 64 DPCH, Clipping 44%)	WCDMA	7.59	± 9.6 %
10456	AAB	IEEE 802.11ac WiFi (160MHz, 64-QAM, 99pc duty cycle)	WLAN	8.63	± 9.6 %
10457	AAA	UMTS-FDD (DC-HSDPA)	WCDMA	6.62	± 9.6 %
10458	AAA	CDMA2000 (1xEV-DO, Rev. B, 2 carriers)	CDMA2000	6.55	± 9.6 %
10459	AAA	CDMA2000 (1xEV-DO, Rev. B, 3 carriers)	CDMA2000	8.25	± 9.6 %
10460	AAA	UMTS-FDD (WCDMA, AMR)	WCDMA	2.39	± 9.6 %
10461	AAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10462	AAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.30	± 9.6 %
10463	AAB	LTE-TDD (SC-FDMA, 1 RB, 1.4 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.56	± 9.6 %
10464	AAC	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10465	AAC	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10466	AAC	LTE-TDD (SC-FDMA, 1 RB, 3 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	± 9.6 %
10467	AAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10468	AAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10469	AAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.56	± 9.6 %
10470	AAF	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10471	AAF	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10472	AAF	LTE-TDD (SC-FDMA, 1 RB, 10 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	± 9.6 %
10473	AAE	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.82	± 9.6 %
10474	AAE	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10475	AAE	LTE-TDD (SC-FDMA, 1 RB, 15 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	± 9.6 %
10477	AAF	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.32	± 9.6 %
10478	AAF	LTE-TDD (SC-FDMA, 1 RB, 20 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.57	± 9.6 %
10479	AAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.74	± 9.6 %
10480	AAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.18	± 9.6 %
10481	AAB	LTE-TDD (SC-FDMA, 50% RB, 1.4 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.45	± 9.6 %
10482	AAC	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.71	± 9.6 %
10483	AAC	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.39	± 9.6 %
10484	AAC	LTE-TDD (SC-FDMA, 50% RB, 3 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.47	± 9.6 %
10485	AAF	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.59	± 9.6 %
10486	AAF	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.38	± 9.6 %
10487	AAF	LTE-TDD (SC-FDMA, 50% RB, 5 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.60	± 9.6 %
10488	AAF	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.70	± 9.6 %
10489	AAF	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.31	± 9.6 %
10490	AAF	LTE-TDD (SC-FDMA, 50% RB, 10 MHz, 64-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.54	± 9.6 %
10491	AAE	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, QPSK, UL Subframe=2,3,4,7,8,9)	LTE-TDD	7.74	± 9.6 %

10492	AAE	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.41	±9.6 %
10493	AAE	LTE-TDD (SC-FDMA, 50% RB, 15 MHz, 64-QAM, UL	LTE-TDD	8.55	± 9.6 %
10400		Subframe=2,3,4,7,8,9)		0.00	
10494	AAF	LTE-TDD (SC-FDMA, 50% RB, 20 MHz, QPSK, UL	LTE-TDD	7.74	± 9.6 %
	L	Subframe=2,3,4,7,8,9)		0.07	
10495	AAF	LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 16-QAM, UL	LTE-TDD	8.37	± 9.6 %
10496	AAF	Subframe=2,3,4,7,8,9) LTE-TDD (SC-FDMA, 50% RB, 20 MHz, 64-QAM, UL	LTE-TDD	8.54	± 9.6 %
10100	,	Subframe=2,3,4,7,8,9)			
10497	AAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, QPSK, UL	LTE-TDD	7.67	± 9.6 %
10100		Subframe=2,3,4,7,8,9)		0.40	1000
10498	AAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.40	±9.6 %
10499	AAB	LTE-TDD (SC-FDMA, 100% RB, 1.4 MHz, 64-QAM, UL	LTE-TDD	8.68	± 9.6 %
10100	1010	Subframe=2,3,4,7,8,9)		0.00	2010 /0
10500	AAC	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, QPSK, UL	LTE-TDD	7.67	±9.6 %
		Subframe=2,3,4,7,8,9)		0.44	
10501	AAC	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, 16-QAM, UL Subframe=2,3,4,7,8,9)	LTE-TDD	8.44	±9.6 %
10502	AAC	LTE-TDD (SC-FDMA, 100% RB, 3 MHz, 64-QAM, UL	LTE-TDD	8.52	± 9.6 %
10002		Subframe=2,3,4,7,8,9)		0.02	
10503	AAF	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, QPSK, UL	LTE-TDD	7.72	±9.6 %
		Subframe=2,3,4,7,8,9)			
10504	AAF	LTE-TDD (SC-FDMA, 100% RB, 5 MHz, 16-QAM, UL	LTE-TDD	8.31	±9.6 %
10505	AAF	Subframe=2,3,4,7,8,9) LTE-TDD (SC-FDMA, 100% RB, 5 MHz, 64-QAM, UL	LTE-TDD	8.54	± 9.6 %
10000		Subframe=2,3,4,7,8,9)		0.01	20.0 /0
10506	AAF	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, QPSK, UL	LTE-TDD	7.74	±9.6 %
		Subframe=2,3,4,7,8,9)			
10507	AAF	LTE-TDD (SC-FDMA, 100% RB, 10 MHz, 16-QAM, UL	LTE-TDD	8.36	± 9.6 %
10508	AAF	Subframe=2,3,4,7,8,9) LTE-TDD (SC-FDMA, 100% RB, 10 MHz, 64-QAM, UL	LTE-TDD	8.55	± 9.6 %
10300		Subframe=2,3,4,7,8,9)		0.00	10.0 %
10509	AAE	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, QPSK, UL	LTE-TDD	7.99	± 9.6 %
		Subframe=2,3,4,7,8,9)			
10510	AAE	LTE-TDD (SC-FDMA, 100% RB, 15 MHz, 16-QAM, UL	LTE-TDD	8.49	± 9.6 %
10511	AAE	Subframe=2,3,4,7,8,9) LTE-TDD (SC-FDMA, 100% RB, 15 MHz, 64-QAM, UL	LTE-TDD	8.51	± 9.6 %
10011	1010	Subframe=2,3,4,7,8,9)			
10512	AAF	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, QPSK, UL	LTE-TDD	7.74	± 9.6 %
		Subframe=2,3,4,7,8,9)			
10513	AAF	LTE-TDD (SC-FDMA, 100% RB, 20 MHz, 16-QAM, UL	LTE-TDD	8.42	± 9.6 %
10514	AAF	Subframe=2,3,4,7,8,9) LTE-TDD (SC-FDMA, 100% RB, 20 MHz, 64-QAM, UL	LTE-TDD	8.45	± 9.6 %
10014		Subframe=2,3,4,7,8,9)		0.10	0.0 //
10515	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 2 Mbps, 99pc duty cycle)	WLAN	1.58	± 9.6 %
10516	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 5.5 Mbps, 99pc duty cycle)	WLAN	1.57	± 9.6 %
10517	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 11 Mbps, 99pc duty cycle)	WLAN	1.58	± 9.6 %
10518 10519	AAB AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 9 Mbps, 99pc duty cycle) IEEE 802.11a/h WiFi 5 GHz (OFDM, 12 Mbps, 99pc duty cycle)	WLAN WLAN	8.23 8.39	± 9.6 % ± 9.6 %
10519	AAB	IEEE 802.11a/h WIFI 5 GHz (OFDM, 12 Mbps, 99pc duty cycle)	WLAN	8.12	± 9.6 %
10521	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 24 Mbps, 99pc duty cycle)	WLAN	7.97	± 9.6 %
10522	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 36 Mbps, 99pc duty cycle)	WLAN	8.45	± 9.6 %
10523	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 48 Mbps, 99pc duty cycle)	WLAN	8.08	± 9.6 %
10524	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 54 Mbps, 99pc duty cycle)	WLAN	8.27	± 9.6 %
10525	AAB	IEEE 802.11ac WiFi (20MHz, MCS0, 99pc duty cycle) IEEE 802.11ac WiFi (20MHz, MCS1, 99pc duty cycle)	WLAN WLAN	8.36 8.42	± 9.6 % ± 9.6 %
10526	AAB AAB	IEEE 802.11ac WiFi (20MHz, MCS1, 99pc duty cycle)	WLAN	8.21	± 9.6 %
10528	AAB	IEEE 802.11ac Will (20MHz, MCS3, 99pc duty cycle)	WLAN	8.36	± 9.6 %
10529	AAB	IEEE 802.11ac WiFi (20MHz, MCS4, 99pc duty cycle)	WLAN	8.36	± 9.6 %
10531	AAB	IEEE 802.11ac WiFi (20MHz, MCS6, 99pc duty cycle)	WLAN	8.43	± 9.6 %
10532	AAB	IEEE 802.11ac WiFi (20MHz, MCS7, 99pc duty cycle)	WLAN	8.29	$\pm 9.6\%$
10533	AAB AAB	IEEE 802.11ac WiFi (20MHz, MCS8, 99pc duty cycle) IEEE 802.11ac WiFi (40MHz, MCS0, 99pc duty cycle)	WLAN WLAN	8.38 8.45	± 9.6 % ± 9.6 %
10004	AND		YVL/UN	1 0.40	1 - 0.0 /0

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10535	AAB	IEEE 802.11ac WiFi (40MHz, MCS1, 99pc duty cycle)	WLAN	8.45	±9.6 %
10536	AAB	IEEE 802.11ac WiFi (40MHz, MCS2, 99pc duty cycle)	WLAN	8.32	±9.6 %
10537	AAB	IEEE 802.11ac WiFi (40MHz, MCS3, 99pc duty cycle)	WLAN	8.44	± 9.6 %
10538	AAB	IEEE 802.11ac WIFi (40MHz, MCS4, 99pc duty cycle)	WLAN	8.54	±9.6 %
10540	AAB	IEEE 802.11ac WiFi (40MHz, MCS6, 99pc duty cycle)	WLAN	8.39	±9.6 %
10541	AAB	IEEE 802.11ac WiFi (40MHz, MCS7, 99pc duty cycle)	WLAN	8.46	± 9.6 %
10542	AAB	IEEE 802.11ac WiFi (40MHz, MCS8, 99pc duty cycle)	WLAN	8.65	± 9.6 %
10543	AAB	IEEE 802.11ac WiFi (40MHz, MCS9, 99pc duty cycle)	WLAN	8.65	± 9.6 %
10544	AAB	IEEE 802.11ac WiFi (80MHz, MCS0, 99pc duty cycle)	WLAN	8.47	± 9.6 %
10545	AAB	IEEE 802.11ac WiFi (80MHz, MCS1, 99pc duty cycle)	WLAN	8.55	± 9.6 %
10546	AAB	IEEE 802.11ac WiFi (80MHz, MCS2, 99pc duty cycle)	WLAN	8.35	± 9.6 %
10547	AAB	IEEE 802.11ac WiFi (80MHz, MCS3, 99pc duty cycle)	WLAN	8.49	± 9.6 %
10548	AAB	IEEE 802.11ac WiFi (80MHz, MCS4, 99pc duty cycle)	WLAN	8.37	±9.6 %
10550	AAB	IEEE 802.11ac WiFi (80MHz, MCS6, 99pc duty cycle)	WLAN	8.38	± 9.6 %
10551	AAB	IEEE 802.11ac WiFi (80MHz, MCS7, 99pc duty cycle)	WLAN	8.50	±9.6 %
10552	AAB	IEEE 802.11ac WiFi (80MHz, MCS8, 99pc duty cycle)	WLAN	8.42	± 9.6 %
10553	AAB	IEEE 802.11ac WiFi (80MHz, MCS9, 99pc duty cycle)	WLAN	8.45	± 9.6 %
10554	AAC	IEEE 802.11ac WiFi (160MHz, MCS0, 99pc duty cycle)	WLAN	8.48	± 9.6 %
10555	AAC	IEEE 802.11ac WiFi (160MHz, MCS1, 99pc duty cycle)	WLAN	8.47	± 9.6 %
10556	AAC	IEEE 802.11ac WiFi (160MHz, MCS2, 99pc duty cycle)	WLAN	8.50	± 9.6 %
10557	AAC	IEEE 802.11ac WiFi (160MHz, MCS3, 99pc duty cycle)	WLAN	8.52	± 9.6 %
10558	AAC	IEEE 802.11ac WiFi (160MHz, MCS4, 99pc duty cycle)	WLAN	8.61	± 9.6 %
10560	AAC	IEEE 802.11ac WiFI (160MHz, MCS6, 99pc duty cycle)	WLAN	8.73	$\pm 9.6\%$
10561	AAC	IEEE 802.11ac WiFi (160MHz, MCS7, 99pc duty cycle)	WLAN	8.56	± 9.6 %
10562	AAC	IEEE 802.11ac WiFi (160MHz, MCS7, 99pc duty cycle)	WLAN	8.69	± 9.6 %
10563	AAC	IEEE 802.11ac WiFI (160MHz, MCS9, 99pc duty cycle)	WLAN		
10564	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 9 Mbps, 99pc duty		8.77	± 9.6 %
10004	AAA	cycle)	WLAN	8.25	± 9.6 %
10565	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 12 Mbps, 99pc duty	WLAN	0.45	1000
10000		cvcle)	VVLAN	8.45	± 9.6 %
10566	A A A		140 441		
10566	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 18 Mbps, 99pc duty	WLAN	8.13	± 9.6 %
40567					
10567	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 24 Mbps, 99pc duty	WLAN	8.00	± 9.6 %
40560	A A A				1000
10568	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 36 Mbps, 99pc duty	WLAN	8.37	± 9.6 %
10569					
10569	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 48 Mbps, 99pc duty	WLAN	8.10	± 9.6 %
10570	A A A				100%
10570	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 54 Mbps, 99pc duty	WLAN	8.30	± 9.6 %
40574					1000
10571	AAA	IEEE 802.11b WIFi 2.4 GHz (DSSS, 1 Mbps, 90pc duty cycle)	WLAN	1.99	± 9.6 %
10572	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 2 Mbps, 90pc duty cycle)	WLAN	1.99	± 9.6 %
10573	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 5.5 Mbps, 90pc duty cycle)	WLAN	1.98	± 9.6 %
10574	AAA	IEEE 802.11b WiFi 2.4 GHz (DSSS, 11 Mbps, 90pc duty cycle)	WLAN	1.98	±9.6 %
10575	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 6 Mbps, 90pc duty	WLAN	8.59	± 9.6 %
40===		cycle)			
10576	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 9 Mbps, 90pc duty	WLAN	8.60	± 9.6 %
	<b> </b>	cycle)			
10577	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 12 Mbps, 90pc duty	WLAN	8.70	±9.6 %
		cycle)			
10578	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 18 Mbps, 90pc duty	WLAN	8.49	± 9.6 %
		cycle)			
10579	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 24 Mbps, 90pc duty	WLAN	8.36	± 9.6 %
		cycle)			
10580	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 36 Mbps, 90pc duty	WLAN	8.76	± 9.6 %
	L	cycle)			
10581	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 48 Mbps, 90pc duty	WLAN	8.35	±9.6%
		cycle)			
10582	AAA	IEEE 802.11g WiFi 2.4 GHz (DSSS-OFDM, 54 Mbps, 90pc duty	WLAN	8.67	± 9.6 %
		cycle)			
10583	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 6 Mbps, 90pc duty cycle)	WLAN	8.59	± 9.6 %
10584	AAB	IEEE 802.11a/h WIFi 5 GHz (OFDM, 9 Mbps, 90pc duty cycle)	WLAN	8.60	± 9.6 %
10004					· · · · · · · · · · · · · · · · · · ·
10585	AAB	TEEE OUZ. I TA/IT WIFLO GHZ (OFDIN, 12 MDDS, 900C QUIV CVCIE)	IVVLAN	8.70	±9.6 %
}	AAB AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 12 Mbps, 90pc duty cycle) IEEE 802.11a/h WiFi 5 GHz (OFDM, 18 Mbps, 90pc duty cycle)	WLAN WLAN	8.70	$\pm 9.6\%$ $\pm 9.6\%$

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10588	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 36 Mbps, 90pc duty cycle)	WLAN	8.76	±9.6%
10589	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 48 Mbps, 90pc duty cycle)	WLAN	8.35	±9.6 %
10590	AAB	IEEE 802.11a/h WiFi 5 GHz (OFDM, 54 Mbps, 90pc duty cycle)	WLAN	8.67	±9.6 %
10591	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS0, 90pc duty cycle)	WLAN	8.63	± 9.6 %
10592	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS1, 90pc duty cycle)	WLAN	8.79	± 9.6 %
10593 10594	AAB AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS2, 90pc duty cycle)	WLAN	8.64	± 9.6 %
10594	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS3, 90pc duty cycle)	WLAN NI	8.74	± 9.6 %
10595	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS4, 90pc duty cycle) IEEE 802.11n (HT Mixed, 20MHz, MCS5, 90pc duty cycle)	WLAN	8.74	±9.6%
10597	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS3, 90pc duty cycle)	WLAN WLAN	8.71 8.72	±9.6 % ±9.6 %
10598	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS0, 30pc duty cycle)	WLAN	8.50	± 9.6 %
10599	AAB	IEEE 802.11n (HT Mixed, 20MHz, MCS0, 90pc duty cycle)	WLAN	8.79	± 9.6 %
10600	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS1, 90pc duty cycle)	WLAN	8.88	± 9.6 %
10601	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS2, 90pc duty cycle)	WLAN	8,82	± 9.6 %
10602	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS3, 90pc duty cycle)	WLAN	8,94	± 9.6 %
10603	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS4, 90pc duty cycle)	WLAN	9.03	± 9.6 %
10604	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS5, 90pc duty cycle)	WLAN	8,76	±9.6 %
10605	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS6, 90pc duty cycle)	WLAN	8.97	±9.6 %
10606	AAB	IEEE 802.11n (HT Mixed, 40MHz, MCS7, 90pc duty cycle)	WLAN	8.82	±9.6 %
10607	AAB	IEEE 802.11ac WiFi (20MHz, MCS0, 90pc duty cycle)	WLAN	8,64	± 9.6 %
10608	AAB	IEEE 802.11ac WiFi (20MHz, MCS1, 90pc duty cycle)	WLAN	8.77	±9.6 %
10609	AAB	IEEE 802.11ac WiFi (20MHz, MCS2, 90pc duty cycle)	WLAN	8.57	±9.6 %
10610	AAB	IEEE 802.11ac WiFi (20MHz, MCS3, 90pc duty cycle)	WLAN	8.78	± 9.6 %
10611	AAB	IEEE 802.11ac WiFi (20MHz, MCS4, 90pc duty cycle)	WLAN	8.70	±9.6 %
10612	AAB	IEEE 802.11ac WiFi (20MHz, MCS5, 90pc duty cycle)	WLAN	8.77	±9.6 %
10613	AAB	IEEE 802.11ac WiFi (20MHz, MCS6, 90pc duty cycle)	WLAN	8.94	±9.6 %
10614	AAB	IEEE 802.11ac WiFi (20MHz, MCS7, 90pc duty cycle)	WLAN	8.59	±9.6 %
10615	AAB	IEEE 802.11ac WiFi (20MHz, MCS8, 90pc duty cycle)	WLAN	8.82	±9.6 %
10616	AAB	IEEE 802.11ac WiFi (40MHz, MCS0, 90pc duty cycle)	WLAN	8.82	±9.6 %
10617	AAB	IEEE 802.11ac WiFi (40MHz, MCS1, 90pc duty cycle)	WLAN	8.81	±9.6 %
10618	AAB	IEEE 802.11ac WiFi (40MHz, MCS2, 90pc duty cycle)	WLAN	8.58	±9.6 %
10619	AAB AAB	IEEE 802.11ac WiFi (40MHz, MCS3, 90pc duty cycle)	WLAN	8.86	± 9.6 %
10620	AAB	IEEE 802.11ac WiFi (40MHz, MCS4, 90pc duty cycle)	WLAN	8.87	± 9.6 %
10622	AAB	IEEE 802.11ac WiFi (40MHz, MCS5, 90pc duty cycle) IEEE 802.11ac WiFi (40MHz, MCS6, 90pc duty cycle)	WLAN WLAN	8.77 8.68	±9.6 % ±9.6 %
10623	AAB	IEEE 802.11ac WiFi (40MHz, MCS7, 90pc duty cycle)	WLAN	8.82	± 9.6 %
10623	AAB	IEEE 802.11ac WiFi (40MHz, MCS8, 90pc duty cycle)	WLAN	8.96	± 9.6 %
10625	AAB	IEEE 802.11ac WiFi (40MHz, MCS9, 90pc duty cycle)	WLAN	8.96	±9.6%
10626	AAB	IEEE 802.11ac WIFi (80MHz, MCS0, 90pc duty cycle)	WLAN	8.83	± 9.6 %
10627	AAB	IEEE 802.11ac WiFi (80MHz, MCS1, 90pc duty cycle)	WLAN	8.88	± 9.6 %
10628	AAB	IEEE 802.11ac WiFi (80MHz, MCS2, 90pc duty cycle)	WLAN	8.71	± 9.6 %
10629	AAB	IEEE 802.11ac WiFI (80MHz, MCS3, 90pc duty cycle)	WLAN	8.85	± 9.6 %
10630	AAB	IEEE 802.11ac WiFi (80MHz, MCS4, 90pc duty cycle)	WLAN	8.72	±9.6 %
10631	AAB	IEEE 802.11ac WiFi (80MHz, MCS5, 90pc duty cycle)	WLAN	8.81	± 9.6 %
10632	AAB	IEEE 802.11ac WiFI (80MHz, MCS6, 90pc duty cycle)	WLAN	8.74	± 9.6 %
10633	AAB	IEEE 802.11ac WiFi (80MHz, MCS7, 90pc duty cycle)	WLAN	8.83	± 9.6 %
10634	AAB	IEEE 802.11ac WiFi (80MHz, MCS8, 90pc duty cycle)	WLAN	8.80	± 9.6 %
10635	AAB	IEEE 802.11ac WiFi (80MHz, MCS9, 90pc duty cycle)	WLAN	8.81	± 9.6 %
10636	AAC	IEEE 802.11ac WiFi (160MHz, MCS0, 90pc duty cycle)	WLAN	8.83	± 9.6 %
10637	AAC	IEEE 802.11ac WiFi (160MHz, MCS1, 90pc duty cycle)	WLAN	8.79	± 9.6 %
10638	AAC	IEEE 802.11ac WiFi (160MHz, MCS2, 90pc duty cycle)	WLAN	8.86	±9.6 %
10639	AAC	IEEE 802.11ac WiFi (160MHz, MCS3, 90pc duty cycle)	WLAN	8.85	± 9.6 %
10640	AAC	IEEE 802.11ac WiFi (160MHz, MCS4, 90pc duty cycle)	WLAN	8.98	± 9.6 %
10641	AAC	IEEE 802.11ac WiFi (160MHz, MCS5, 90pc duty cycle)	WLAN	9.06	± 9.6 %
10642	AAC	IEEE 802.11ac WiFi (160MHz, MCS6, 90pc duty cycle)	WLAN	9.06	± 9.6 %
10643	AAC	IEEE 802.11ac WiFi (160MHz, MCS7, 90pc duty cycle)	WLAN	8.89	± 9.6 %
10644	AAC AAC	IEEE 802.11ac WiFi (160MHz, MCS8, 90pc duty cycle)	WLAN	9.05	±9.6%
10645		IEEE 802.11ac WiFi (160MHz, MCS9, 90pc duty cycle)		9.11	±9.6%
10646	AAG AAF	LTE-TDD (SC-FDMA, 1 RB, 5 MHz, QPSK, UL Subframe=2,7) LTE-TDD (SC-FDMA, 1 RB, 20 MHz, QPSK, UL Subframe=2,7)		11.96	$\pm 9.6\%$
10648		CDMA2000 (1x Advanced)	LTE-TDD	11.96	$\pm 9.6\%$
10648	AAA	LTE-TDD (OFDMA, 5 MHz, E-TM 3.1, Clipping 44%)	CDMA2000 LTE-TDD	3.45 6.91	±9.6%
10653	AAE	LTE-TDD (OFDMA, 5 MHz, E-TM 3.1, Clipping 44%)	LTE-TDD	7.42	± 9.6 % ± 9.6 %
10654	AAD	LTE-TDD (OFDMA, 15 MHz, E-TM 3.1, Clipping 44%)	LTE-TDD	6.96	± 9.6 %
				0.00	1 2 0.0 /0

10655	AAE	LTE-TDD (OFDMA, 20 MHz, E-TM 3.1, Clipping 44%)	LTE-TDD	7.21	± 9.6 %
10658	AAA	Pulse Waveform (200Hz, 10%)	Test	10.00	±9.6 %
10659	AAA	Pulse Waveform (200Hz, 20%)	Test	6.99	±9.6 %
10660	AAA	Pulse Waveform (200Hz, 40%)	Test	3.98	± 9.6 %
10661	AAA	Pulse Waveform (200Hz, 60%)	Test	2.22	±9.6 %
10662	AAA	Pulse Waveform (200Hz, 80%)	Test	0.97	± 9.6 %
10670	AAA	Bluetooth Low Energy	Bluetooth	2.19	± 9.6 %
10671	AAA	JEEE 802.11ax (20MHz, MCS0, 90pc duty cycle)	WLAN	9.09	± 9.6 %
10672	AAA	IEEE 802.11ax (20MHz, MCS1, 90pc duty cycle)	WLAN	8.57	± 9.6 %
10673	AAA	IEEE 802.11ax (20MHz, MCS2, 90pc duty cycle)	WLAN	8.78	±9.6 %
10674	AAA	IEEE 802.11ax (20MHz, MCS3, 90pc duty cycle)	WLAN	8.74	± 9.6 %
10675	AAA	IEEE 802.11ax (20MHz, MCS4, 90pc duty cycle)	WLAN	8.90	± 9.6 %
10676	AAA	IEEE 802.11ax (20MHz, MCS5, 90pc duty cycle)	WLAN	8.77	± 9.6 %
10677	AAA	IEEE 802.11ax (20MHz, MCS6, 90pc duty cycle)	WLAN	8.73	± 9.6 %
10678	AAA	IEEE 802.11ax (20MHz, MCS7, 90pc duty cycle)	WLAN	8.78	± 9.6 %
10679	AAA	IEEE 802.11ax (20MHz, MCS8, 90pc duty cycle)	WLAN	8.89	
10680	AAA	IEEE 802.11ax (20MHz, MCS9, 90pc duty cycle)	WLAN		± 9.6 %
10681	AAA	IEEE 802.11ax (20MHz, MCS10, 90pc duty cycle)	WLAN	8.80	± 9.6 %
10682	AAA	IEEE 802.11ax (20MHz, MCS11, 90pc duty cycle)		8.62	± 9.6 %
10683	AAA	IEEE 802.11ax (20MHz, MCS), 99pc duty cycle)	WLAN	8.83	± 9.6 %
10684	AAA	IEEE 802.11ax (20MHz, MCS0, 99pc duty cycle)	WLAN	8.42	±9.6 %
10685	AAA	IEEE 802.11ax (20MHz, MCS1, 99pc duty cycle)	WLAN MILAN	8.26	± 9.6 %
10686	AAA	IEEE 802.11ax (20MHz, MCS2, 99pc duty cycle)	WLAN	8.33	± 9.6 %
10687	AAA		WLAN	8.28	±9.6 %
10688	AAA	IEEE 802.11ax (20MHz, MCS4, 99pc duty cycle)	WLAN	8.45	± 9.6 %
10689	AAA	IEEE 802.11ax (20MHz, MCS5, 99pc duty cycle)	WLAN	8.29	±9.6 %
		IEEE 802.11ax (20MHz, MCS6, 99pc duty cycle)	WLAN	8.55	±9.6 %
10690	AAA	IEEE 802.11ax (20MHz, MCS7, 99pc duty cycle)	WLAN	8.29	±9.6 %
10691	AAA	IEEE 802.11ax (20MHz, MCS8, 99pc duty cycle)	WLAN	8.25	±9.6 %
10692	AAA	IEEE 802.11ax (20MHz, MCS9, 99pc duty cycle)	WLAN	8.29	±9.6 %
10693	AAA	IEEE 802.11ax (20MHz, MCS10, 99pc duty cycle)	WLAN	8.25	±9.6%
10694	AAA	IEEE 802.11ax (20MHz, MCS11, 99pc duty cycle)	WLAN	8.57	± 9.6 %
10695	AAA	IEEE 802.11ax (40MHz, MCS0, 90pc duty cycle)	WLAN	8.78	±9.6%
10696	AAA	IEEE 802.11ax (40MHz, MCS1, 90pc duty cycle)	WLAN	8.91	± 9.6 %
10697	AAA	IEEE 802.11ax (40MHz, MCS2, 90pc duty cycle)	WLAN	8.61	±9.6 %
10698	AAA	IEEE 802.11ax (40MHz, MCS3, 90pc duty cycle)	WLAN	8.89	±9.6 %
10699	AAA	IEEE 802.11ax (40MHz, MCS4, 90pc duty cycle)	WLAN	8.82	±9.6 %
10700	AAA	IEEE 802.11ax (40MHz, MCS5, 90pc duty cycle)	WLAN	8.73	±9.6 %
10701	AAA	IEEE 802.11ax (40MHz, MCS6, 90pc duty cycle)	WLAN	8.86	±9.6 %
10702	AAA	IEEE 802.11ax (40MHz, MCS7, 90pc duty cycle)	WLAN	8.70	±9.6 %
10703	AAA	IEEE 802.11ax (40MHz, MCS8, 90pc duty cycle)	WLAN	8.82	±9.6 %
10704	AAA	IEEE 802.11ax (40MHz, MCS9, 90pc duty cycle)	WLAN	8.56	±9.6 %
10705	AAA	IEEE 802.11ax (40MHz, MCS10, 90pc duty cycle)	WLAN	8.69	± 9.6 %
10706	AAA	IEEE 802.11ax (40MHz, MCS11, 90pc duty cycle)	WLAN	8.66	± 9.6 %
10707	AAA	IEEE 802.11ax (40MHz, MCS0, 99pc duty cycle)	WLAN	8.32	± 9.6 %
10708	AAA	IEEE 802.11ax (40MHz, MCS1, 99pc duty cycle)	WLAN	8.55	$\pm 9.6\%$
10709	AAA	IEEE 802.11ax (40MHz, MCS2, 99pc duty cycle)	WLAN	8.33	$\pm 9.6\%$ $\pm 9.6\%$
10710	AAA	IEEE 802.11ax (40MHz, MCS3, 99pc duty cycle)	WLAN		
10711	AAA	IEEE 802.11ax (40MHz, MCS3, 99pc duty cycle)	WLAN	8.29	$\pm 9.6\%$
10712	AAA	IEEE 802.11ax (40MHz, MCS5, 99pc duty cycle)	WLAN	8.39	±9.6%
10712	AAA	IEEE 802.11ax (40MHz, MCS6, 99pc duty cycle)		8.67	± 9.6 %
10714	AAA	IEEE 802.11ax (40MHz, MCS6, 99pc duty cycle)	WLAN	8.33	± 9.6 %
10715	AAA		WLAN	8.26	± 9.6 %
	~~~~	IEEE 802.11ax (40MHz, MCS8, 99pc duty cycle)	WLAN	8.45	± 9.6 %
111/16		IEEE 802 11ov (40MHz MCSO COst duty such)		0 0 0	
10716	AAA	IEEE 802.11ax (40MHz, MCS9, 99pc duty cycle)	WLAN	8.30	± 9.6 %
10717	AAA	IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle)	WLAN WLAN	8.48	±9.6 %
10717 10718	AAA AAA	IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle) IEEE 802.11ax (40MHz, MCS11, 99pc duty cycle)	WLAN WLAN WLAN	8.48 8.24	± 9.6 % ± 9.6 %
10717 10718 10719	AAA AAA AAA	IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle) IEEE 802.11ax (40MHz, MCS11, 99pc duty cycle) IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle)	WLAN WLAN WLAN WLAN	8.48 8.24 8.81	± 9.6 % ± 9.6 % ± 9.6 %
10717 10718 10719 10720	AAA AAA AAA AAA	IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle) IEEE 802.11ax (40MHz, MCS11, 99pc duty cycle) IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS1, 90pc duty cycle)	WLAN WLAN WLAN WLAN WLAN	8.48 8.24 8.81 8.87	± 9.6 % ± 9.6 % ± 9.6 % ± 9.6 %
10717 10718 10719 10720 10721	AAA AAA AAA AAA AAA	IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle) IEEE 802.11ax (40MHz, MCS11, 99pc duty cycle) IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS1, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS2, 90pc duty cycle)	WLAN WLAN WLAN WLAN WLAN WLAN	8.48 8.24 8.81	$\begin{array}{c} \pm \ 9.6 \ \% \\ \pm \ 9.6 \ \% \end{array}$
10717 10718 10719 10720 10721 10722	AAA	IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle) IEEE 802.11ax (40MHz, MCS11, 99pc duty cycle) IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS1, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS2, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS3, 90pc duty cycle)	WLAN WLAN WLAN WLAN WLAN WLAN WLAN	8.48 8.24 8.81 8.87	± 9.6 % ± 9.6 % ± 9.6 % ± 9.6 %
10717 10718 10719 10720 10721 10722 10723	AAA	IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle) IEEE 802.11ax (40MHz, MCS11, 99pc duty cycle) IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS1, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS2, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS3, 90pc duty cycle) IEEE 802.11ax (80MHz, MCS4, 90pc duty cycle)	WLAN WLAN WLAN WLAN WLAN WLAN	8.48 8.24 8.81 8.87 8.76	$\begin{array}{c} \pm \ 9.6 \ \% \\ \pm \ 9.6 \ \% \end{array}$
10717           10718           10719           10720           10721           10722           10723           10724	AAA	IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle)IEEE 802.11ax (40MHz, MCS11, 99pc duty cycle)IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS1, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS2, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS3, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS4, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS5, 90pc duty cycle)	WLAN WLAN WLAN WLAN WLAN WLAN WLAN	8.48 8.24 8.81 8.87 8.76 8.55	$\begin{array}{c} \pm 9.6 \% \\ \pm 9.6 \% \end{array}$
10717           10718           10719           10720           10721           10722           10723           10724           10725	AAA           AAA	IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle)IEEE 802.11ax (40MHz, MCS11, 99pc duty cycle)IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS1, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS2, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS3, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS3, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS3, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS4, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS5, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS5, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS5, 90pc duty cycle)	WLAN WLAN WLAN WLAN WLAN WLAN WLAN	8.48 8.24 8.81 8.87 8.76 8.55 8.70	$\begin{array}{c} \pm 9.6 \% \\ \pm 9.6 \% \end{array}$
10717           10718           10719           10720           10721           10722           10723           10724	AAA	IEEE 802.11ax (40MHz, MCS10, 99pc duty cycle)IEEE 802.11ax (40MHz, MCS11, 99pc duty cycle)IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS1, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS2, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS3, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS4, 90pc duty cycle)IEEE 802.11ax (80MHz, MCS5, 90pc duty cycle)	WLAN WLAN WLAN WLAN WLAN WLAN WLAN WLAN	8.48 8.24 8.81 8.87 8.76 8.55 8.70 8.90	$\begin{array}{c} \pm 9.6 \% \\ \pm 9.6 \% \end{array}$

10728	AAA	IEEE 802.11ax (80MHz, MCS9, 90pc duty cycle)	WLAN	8.65	± 9.6 %
10728	AAA	IEEE 802.11ax (80MHz, MCS0, 90pc duty cycle)	WLAN	8.64	± 9.6 %
10729	AAA	IEEE 802.11ax (80MHz, MCS10, 30pc duty cycle)	WLAN	8.67	± 9.6 %
10731	AAA	IEEE 802.11ax (80MHz, MCS0, 99pc duty cycle)	WLAN	8.42	± 9.6 %
10732	AAA	IEEE 802.11ax (80MHz, MCS0, 99pc duty cycle)	WLAN	8.46	± 9.6 %
10732	AAA	IEEE 802.11ax (80MHz, MCS1, 95pc duty cycle)	WLAN	8.40	±9.6 %
			WLAN	8.25	± 9.6 %
10734	AAA	IEEE 802.11ax (80MHz, MCS3, 99pc duty cycle)	WLAN	8.33	$\pm 9.6\%$
10735	AAA	IEEE 802.11ax (80MHz, MCS4, 99pc duty cycle)			$\pm 9.6\%$
10736	AAA	IEEE 802.11ax (80MHz, MCS5, 99pc duty cycle)	WLAN	8.27	
10737	AAA	IEEE 802.11ax (80MHz, MCS6, 99pc duty cycle)	WLAN	8.36	± 9.6 %
10738	AAA	IEEE 802.11ax (80MHz, MCS7, 99pc duty cycle)	WLAN	8.42	± 9.6 %
10739	AAA	IEEE 802.11ax (80MHz, MCS8, 99pc duty cycle)	WLAN	8.29	± 9.6 %
10740	AAA	IEEE 802.11ax (80MHz, MCS9, 99pc duty cycle)	WLAN	8.48	± 9.6 %
10741	AAA	IEEE 802.11ax (80MHz, MCS10, 99pc duty cycle)	WLAN	8.40	± 9.6 %
10742	AAA	IEEE 802.11ax (80MHz, MCS11, 99pc duty cycle)	WLAN	8.43	± 9.6 %
10743	AAA	IEEE 802.11ax (160MHz, MCS0, 90pc duty cycle)	WLAN	8.94	± 9.6 %
10744	AAA	IEEE 802.11ax (160MHz, MCS1, 90pc duty cycle)	WLAN	9.16	± 9.6 %
10745	AAA	IEEE 802.11ax (160MHz, MCS2, 90pc duty cycle)	WLAN	8.93	± 9.6 %
10746	AAA	IEEE 802.11ax (160MHz, MCS3, 90pc duty cycle)	WLAN	9.11	± 9.6 %
10747	AAA	IEEE 802.11ax (160MHz, MCS4, 90pc duty cycle)	WLAN	9.04	± 9.6 %
10748	AAA	IEEE 802.11ax (160MHz, MCS5, 90pc duty cycle)	WLAN	8.93	± 9.6 %
10749	AAA	IEEE 802.11ax (160MHz, MCS6, 90pc duty cycle)	WLAN	8.90	±9.6 %
10750	AAA	IEEE 802.11ax (160MHz, MCS7, 90pc duty cycle)	WLAN	8.79	±9,6 %
10751	AAA	IEEE 802.11ax (160MHz, MCS8, 90pc duty cycle)	WLAN	8,82	± 9.6 %
10752		IEEE 802.11ax (160MHz, MCS9, 90pc duty cycle)	WLAN	8.81	± 9.6 %
	AAA		WLAN	9.00	± 9.6 %
10753	AAA	IEEE 802.11ax (160MHz, MCS10, 90pc duty cycle)			± 9.6 %
10754	AAA	IEEE 802.11ax (160MHz, MCS11, 90pc duty cycle)	WLAN	8.94	
10755	AAA	IEEE 802.11ax (160MHz, MCS0, 99pc duty cycle)	WLAN	8.64	± 9.6 %
10756	AAA	IEEE 802.11ax (160MHz, MCS1, 99pc duty cycle)	WLAN	8.77	± 9.6 %
10757	AAA	IEEE 802.11ax (160MHz, MCS2, 99pc duty cycle)	WLAN	8.77	± 9.6 %
10758	AAA	IEEE 802.11ax (160MHz, MCS3, 99pc duty cycle)	WLAN	8.69	± 9.6 %
10759	AAA	IEEE 802.11ax (160MHz, MCS4, 99pc duty cycle)	WLAN	8.58	± 9.6 %
10760	AAA	IEEE 802.11ax (160MHz, MCS5, 99pc duty cycle)	WLAN	8.49	± 9.6 %
10761	AAA	IEEE 802.11ax (160MHz, MCS6, 99pc duty cycle)	WLAN	8.58	± 9.6 %
10762	AAA	IEEE 802.11ax (160MHz, MCS7, 99pc duty cycle)	WLAN	8.49	±9.6 %
10763	AAA	IEEE 802.11ax (160MHz, MCS8, 99pc duty cycle)	WLAN	8.53	± 9.6 %
10764	AAA	IEEE 802.11ax (160MHz, MCS9, 99pc duty cycle)	WLAN	8.54	± 9.6 %
10765	AAA	IEEE 802.11ax (160MHz, MCS10, 99pc duty cycle)	WLAN	8.54	± 9.6 %
10766	AAA	IEEE 802.11ax (160MHz, MCS11, 99pc duty cycle)	WLAN	8.51	± 9.6 %
10767	AAA	5G NR (CP-OFDM, 1 RB, 5 MHz, QPSK, 15 kHz)	5G NR FR1	7.99	± 9.6 %
10/01	1,000		TDD		
10768	AAA	5G NR (CP-OFDM, 1 RB, 10 MHz, QPSK, 15 kHz)	5G NR FR1	8.01	± 9.6 %
10700			TDD	0.01	20.0 %
10769		5G NR (CP-OFDM, 1 RB, 15 MHz, QPSK, 15 kHz)	5G NR FR1	8.01	± 9.6 %
10709			TDD	0.01	2 0.0 70
10770	AAA	5G NR (CP-OFDM, 1 RB, 20 MHz, QPSK, 15 kHz)	5G NR FR1	8.02	± 9.6 %
10770	AAA	1 JOINK (CF-OFDIW, TRD, 20 WITZ, QFSR, TS KITZ)	TDD	0.02	1 3.0 /0
40774	1			0 0 2	+06%
10771	AAA	5G NR (CP-OFDM, 1 RB, 25 MHz, QPSK, 15 kHz)	5G NR FR1	8.02	± 9.6 %
				0.00	100%
10772	AAA	5G NR (CP-OFDM, 1 RB, 30 MHz, QPSK, 15 kHz)	5G NR FR1	8.23	± 9.6 %
			TDD		
10773	AAA	5G NR (CP-OFDM, 1 RB, 40 MHz, QPSK, 15 kHz)	5G NR FR1	8.03	± 9.6 %
ļ	_		TDD		
10774	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, QPSK, 15 kHz)	5G NR FR1	8.02	± 9.6 %
			TDD		
10776	AAA	5G NR (CP-OFDM, 50% RB, 10 MHz, QPSK, 15 kHz)	5G NR FR1	8.30	± 9.6 %
			TDD	ļ	
10778	AAA	5G NR (CP-OFDM, 50% RB, 20 MHz, QPSK, 15 kHz)	5G NR FR1	8.34	± 9.6 %
			TDD		
10780	AAA	5G NR (CP-OFDM, 50% RB, 30 MHz, QPSK, 15 kHz)	5G NR FR1	8.38	± 9.6 %
			TDD		
	AAA	5G NR (CP-OFDM, 50% RB, 40 MHz, QPSK, 15 kHz)	5G NR FR1	8.38	± 9.6 %
10781		· · · · · · · · · · · · · · · · · · ·		1	1
10781			TDD		
10781		5G NR (CP-OFDM, 50% RB, 50 MHz, QPSK, 15 kHz)	5G NR FR1	8.43	± 9.6 %

10783	AAA	5G NR (CP-OFDM, 100% RB, 5 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.31	± 9.6 %
10784	AAA	5G NR (CP-OFDM, 100% RB, 10 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.29	± 9.6 %
10785	AAA	5G NR (CP-OFDM, 100% RB, 15 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.40	± 9.6 %
10786	AAA	5G NR (CP-OFDM, 100% RB, 20 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.35	± 9.6 %
10787	AAA	5G NR (CP-OFDM, 100% RB, 25 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.44	± 9.6 %
10788	AAA	5G NR (CP-OFDM, 100% RB, 30 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.39	± 9.6 %
10789	AAA	5G NR (CP-OFDM, 100% RB, 40 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.37	± 9.6 %
10790	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, QPSK, 15 kHz)	5G NR FR1 TDD	8.39	± 9.6 %
10791	AAA	5G NR (CP-OFDM, 1 RB, 5 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.83	± 9.6 %
10792	AAA	5G NR (CP-OFDM, 1 RB, 10 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.92	± 9.6 %
10793	AAA	5G NR (CP-OFDM, 1 RB, 15 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.95	± 9.6 %
10794	AAA	5G NR (CP-OFDM, 1 RB, 20 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.82	± 9.6 %
10795	AAA	5G NR (CP-OFDM, 1 RB, 25 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.84	± 9.6 %
10796	AAA	5G NR (CP-OFDM, 1 RB, 30 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.82	± 9.6 %
10797	AAA	5G NR (CP-OFDM, 1 RB, 40 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.01	± 9.6 %
10798	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.89	± 9.6 %
10799	AAA	5G NR (CP-OFDM, 1 RB, 60 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.93	± 9.6 %
10801	AAA	5G NR (CP-OFDM, 1 RB, 80 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.89	± 9.6 %
10802	AAA	5G NR (CP-OFDM, 1 RB, 90 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.87	± 9.6 %
10803	AAA	5G NR (CP-OFDM, 1 RB, 100 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	7.93	± 9.6 %
10805	AAA	5G NR (CP-OFDM, 50% RB, 10 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.34	± 9.6 %
10806	AAA	5G NR (CP-OFDM, 50% RB, 15 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.37	± 9.6 %
10809	AAA	5G NR (CP-OFDM, 50% RB, 30 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.34	± 9.6 %
10810	AAA	5G NR (CP-OFDM, 50% RB, 40 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.34	± 9.6 %
10812	AAA	5G NR (CP-OFDM, 50% RB, 60 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.35	± 9.6 %
10817	AAA	5G NR (CP-OFDM, 100% RB, 5 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.35	± 9.6 %
10818	AAA	5G NR (CP-OFDM, 100% RB, 10 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.34	± 9.6 %
10819	AAA	5G NR (CP-OFDM, 100% RB, 15 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.33	±9.6 %
10820	AAA	5G NR (CP-OFDM, 100% RB, 20 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.30	± 9.6 %
10821	AAA	5G NR (CP-OFDM, 100% RB, 25 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.41	± 9.6 %
10822	AAA	5G NR (CP-OFDM, 100% RB, 30 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.41	± 9.6 %
10823	AAA	5G NR (CP-OFDM, 100% RB, 40 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.36	± 9.6 %
10824	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.39	± 9.6 %

10825	AAA	5G NR (CP-OFDM, 100% RB, 60 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.41	±9.6 %
10827	AAA	5G NR (CP-OFDM, 100% RB, 80 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.42	±9.6 %
10828	AAA	5G NR (CP-OFDM, 100% RB, 90 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.43	± 9.6 %
10829	AAA	5G NR (CP-OFDM, 100% RB, 100 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	8.40	± 9.6 %
10830	AAA	5G NR (CP-OFDM, 1 RB, 10 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.63	± 9.6 %
10831	AAA	5G NR (CP-OFDM, 1 RB, 15 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.73	± 9.6 %
10832	AAA	5G NR (CP-OFDM, 1 RB, 20 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.74	±9.6 %
10833	AAA	5G NR (CP-OFDM, 1 RB, 25 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.70	±9.6 %
10834	AAA	5G NR (CP-OFDM, 1 RB, 30 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.75	± 9.6 %
10835	AAA	5G NR (CP-OFDM, 1 RB, 40 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.70	± 9.6 %
10836	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.66	± 9.6 %
10837	AAA	5G NR (CP-OFDM, 1 RB, 60 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.68	± 9.6 %
10839	AAA	5G NR (CP-OFDM, 1 RB, 80 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.70	± 9.6 %
10840	AAA	5G NR (CP-OFDM, 1 RB, 90 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.67	± 9.6 %
10841	AAA	5G NR (CP-OFDM, 1 RB, 100 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	7.71	±9.6 %
10843	AAA	5G NR (CP-OFDM, 50% RB, 15 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.49	± 9.6 %
10844	AAA	5G NR (CP-OFDM, 50% RB, 20 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.34	± 9.6 %
10846	AAA	5G NR (CP-OFDM, 50% RB, 30 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.41	± 9.6 %
10854	AAA	5G NR (CP-OFDM, 100% RB, 10 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.34	± 9.6 %
10855	AAA	5G NR (CP-OFDM, 100% RB, 15 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.36	±9.6 %
10856	AAA	5G NR (CP-OFDM, 100% RB, 20 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.37	± 9.6 %
10857	AAA	5G NR (CP-OFDM, 100% RB, 25 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.35	± 9.6 %
10858	AAA	5G NR (CP-OFDM, 100% RB, 30 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.36	± 9.6 %
10859	AAA	5G NR (CP-OFDM, 100% RB, 40 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.34	± 9.6 %
10860	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.41	±9.6 %
10861	AAA	5G NR (CP-OFDM, 100% RB, 60 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.40	± 9.6 %
10863	AAA	5G NR (CP-OFDM, 100% RB, 80 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.41	± 9.6 %
10864	AAA	5G NR (CP-OFDM, 100% RB, 90 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.37	± 9.6 %
10865	AAA	5G NR (CP-OFDM, 100% RB, 100 MHz, QPSK, 60 kHz)	5G NR FR1 TDD	8.41	± 9.6 %
10866	AAA	5G NR (DFT-s-OFDM, 1 RB, 100 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	5.68	± 9.6 %
10868	AAA	5G NR (DFT-s-OFDM, 100% RB, 100 MHz, QPSK, 30 kHz)	5G NR FR1 TDD	5.89	± 9.6 %
10869	AAA	5G NR (DFT-s-OFDM, 1 RB, 100 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	5.75	±9.6 %
10870	AAA	5G NR (DFT-s-OFDM, 100% RB, 100 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	5.86	± 9.6 %

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10871	AAA	5G NR (DFT-s-OFDM, 1 RB, 100 MHz, 16QAM, 120 kHz)	5G NR FR2	5.75	± 9.6 %
40070			TDD		
10872	AAA	5G NR (DFT-s-OFDM, 100% RB, 100 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	6.52	± 9.6 %
10873	AAA	5G NR (DFT-s-OFDM, 1 RB, 100 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	6.61	± 9.6 %
10874	AAA	5G NR (DFT-s-OFDM, 100% RB, 100 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	6.65	± 9.6 %
10875	AAA	5G NR (CP-OFDM, 1 RB, 100 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	7.78	± 9.6 %
10876	AAA	5G NR (CP-OFDM, 100% RB, 100 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	8.39	± 9.6 %
10877	AAA	5G NR (CP-OFDM, 1 RB, 100 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	7.95	± 9.6 %
10878	AAA	5G NR (CP-OFDM, 100% RB, 100 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	8.41	± 9.6 %
10879	AAA	5G NR (CP-OFDM, 1 RB, 100 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	8.12	± 9.6 %
10880	AAA	5G NR (CP-OFDM, 100% RB, 100 MHz, 64QAM, 120 kHz)	5G NR FR2 TDD	8.38	± 9.6 %
10881	AAA	5G NR (DFT-s-OFDM, 1 RB, 50 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	5.75	± 9.6 %
10882	AAA	5G NR (DFT-s-OFDM, 100% RB, 50 MHz, QPSK, 120 kHz)	5G NR FR2 TDD	5.96	± 9.6 %
10883	AAA	5G NR (DFT-s-OFDM, 1 RB, 50 MHz, 16QAM, 120 kHz)	5G NR FR2 TDD	6.57	± 9.6 %
10884	AAA	5G NR (DFT-s-OFDM, 100% RB, 50 MHz, 16QAM, 120 kHz)	5G NR FR2	6.53	± 9.6 %
10885	AAA	5G NR (DFT-s-OFDM, 1 RB, 50 MHz, 64QAM, 120 kHz)	5G NR FR2	6.61	± 9.6 %
10886	AAA	5G NR (DFT-s-OFDM, 100% RB, 50 MHz, 64QAM, 120 kHz)	5G NR FR2	6.65	± 9.6 %
10887	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, QPSK, 120 kHz)	TDD 5G NR FR2	7.78	± 9.6 %
10888	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, QPSK, 120 kHz)	5G NR FR2	8.35	± 9.6 %
10889	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, 16QAM, 120 kHz)	5G NR FR2	8.02	± 9.6 %
10890	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, 16QAM, 120 kHz)	TDD 5G NR FR2	8.40	± 9.6 %
10891	AAA	5G NR (CP-OFDM, 1 RB, 50 MHz, 64QAM, 120 kHz)	TDD 5G NR FR2	8.13	± 9.6 %
10892	AAA	5G NR (CP-OFDM, 100% RB, 50 MHz, 64QAM, 120 kHz)	TDD 5G NR FR2 TDD	8.41	± 9.6 %

<sup>E</sup> Uncertainty is determined using the max. deviation from linear response applying rectangular distribution and is expressed for the square of the field value.

### **Calibration Laboratory of** Schmid & Partner **Engineering AG** Zeughausstrasse 43, 8004 Zurich, Switzerland

PC Test

Client



Schweizerischer Kalibrierdienst S

- Service suisse d'étalonnage С
  - Servizio svizzero di taratura
- S Swiss Calibration Service

Accreditation No.: SCS 0108

Accredited by the Swiss Accreditation Service (SAS) The Swiss Accreditation Service is one of the signatories to the EA Multilateral Agreement for the recognition of calibration certificates

Certificate No: D750V3-1054 Mar19/2

CALIBRATION C	ERTIFICATE	E (Replacement of No:D	0750V3-1154_Mar19)
Object	D750V3 - SN:10	54	
Calibration procedure(s)	QA CAL-05.v11 Calibration Proce	edure for SAR Validation Source	es between 0.7-3 GHz <sub>BN</sub> V 4 <sup>-29-201</sup> 9
			4-29-20-1
Calibration date:	March 18, 2019		
The measurements and the uncerta	ainties with confidence p ad in the closed laborato	ional standards, which realize the physical trobability are given on the following pages ary facility: environment temperature (22 $\pm$ 3)	and are part of the certificate.
Primary Standards	ID #	Cal Date (Certificate No.)	Scheduled Calibration
Power meter NRP	SN: 104778	04-Apr-18 (No. 217-02672/02673)	Apr-19
Power sensor NRP-Z91	SN: 103244	04-Apr-18 (No. 217-02672)	Apr-19
Power sensor NRP-Z91	SN: 103245	04-Apr-18 (No. 217-02673)	Apr-19
Reference 20 dB Attenuator	SN: 5058 (20k)	04-Apr-18 (No. 217-02682)	Apr-19
Type-N mismatch combination	SN: 5047.2 / 06327	04-Apr-18 (No. 217-02683)	Apr-19
Reference Probe EX3DV4	SN: 7349	31-Dec-18 (No. EX3-7349_Dec18)	Dec-19
DAE4	SN: 601	04-Oct-18 (No. DAE4-601_Oct18)	Oct-19
Secondary Standards	ID #	Check Date (in house)	Scheduled Check
Power meter E4419B	SN: GB39512475	07-Oct-15 (in house check Feb-19)	In house check: Oct-20
Power sensor HP 8481A	SN: US37292783	07-Oct-15 (in house check Oct-18)	In house check: Oct-20
Power sensor HP 8481A	SN: MY41092317	07-Oct-15 (in house check Oct-18)	In house check: Oct-20
RF generator R&S SMT-06	SN: 100972	15-Jun-15 (in house check Oct-18)	In house check: Oct-20
Network Analyzer Agilent E8358A	SN: US41080477	31-Mar-14 (in house check Oct-18)	In house check: Oct-19
	Name	Function	Signature
Calibrated by:	Manu Seitz	Laboratory Technician	and -
Approved by:	Katja Pokovic	Technical Manager	Ally
This calibration certificate shall not t	be reproduced except in	full without written approval of the laborato	Issued: April 12, 2019 ry.

## **Calibration Laboratory of**

Schmid & Partner Engineering AG Zeughausstrasse 43, 8004 Zurich, Switzerland





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## **Glossary:**

TSL	tissue simulating liquid
ConvF	sensitivity in TSL / NORM x,y,z
N/A	not applicable or not measured

## Calibration is Performed According to the Following Standards:

- a) IEEE Std 1528-2013, "IEEE Recommended Practice for Determining the Peak Spatial-Averaged Specific Absorption Rate (SAR) in the Human Head from Wireless Communications Devices: Measurement Techniques", June 2013
- b) IEC 62209-1, "Measurement procedure for the assessment of Specific Absorption Rate (SAR) from hand-held and body-mounted devices used next to the ear (frequency range of 300 MHz to 6 GHz)", July 2016
- c) IEC 62209-2, "Procedure to determine the Specific Absorption Rate (SAR) for wireless communication devices used in close proximity to the human body (frequency range of 30 MHz to 6 GHz)", March 2010
- d) KDB 865664, "SAR Measurement Requirements for 100 MHz to 6 GHz"

## Additional Documentation:

e) DASY4/5 System Handbook

## Methods Applied and Interpretation of Parameters:

- Measurement Conditions: Further details are available from the Validation Report at the end of the certificate. All figures stated in the certificate are valid at the frequency indicated.
- Antenna Parameters with TSL: The dipole is mounted with the spacer to position its feed point exactly below the center marking of the flat phantom section, with the arms oriented parallel to the body axis.
- Feed Point Impedance and Return Loss: These parameters are measured with the dipole positioned under the liquid filled phantom. The impedance stated is transformed from the measurement at the SMA connector to the feed point. The Return Loss ensures low reflected power. No uncertainty required.
- Electrical Delay: One-way delay between the SMA connector and the antenna feed point. No uncertainty required.
- SAR measured: SAR measured at the stated antenna input power.
- SAR normalized: SAR as measured, normalized to an input power of 1 W at the antenna . connector.
- SAR for nominal TSL parameters: The measured TSL parameters are used to calculate the nominal SAR result.

The reported uncertainty of measurement is stated as the standard uncertainty of measurement multiplied by the coverage factor k=2, which for a normal distribution corresponds to a coverage probability of approximately 95%.

Accreditation No.: SCS 0108

## **Measurement Conditions**

DASY system configuration, as far as not given on page 1.

DASY Version	DASY5	V52.10.2
Extrapolation	Advanced Extrapolation	
Phantom	Modular Flat Phantom	······································
Distance Dipole Center - TSL	15 mm	with Spacer
Zoom Scan Resolution	dx, dy, dz = 5.0 mm	
Frequency	750 MHz ± 1 MHz	

## **Head TSL parameters**

The following parameters and calculations were applied.

	Temperature	Permittivity	Conductivity
Nominal Head TSL parameters	22.0 °C	41.9	0.89 mho/m
Measured Head TSL parameters	(22.0 ± 0.2) °C	42.1 ± 6 %	0.89 mho/m ± 6 %
Head TSL temperature change during test	< 0.5 °C		

## SAR result with Head TSL

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	250 mW input power	2.07 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	8.29 W/kg ± 17.0 % (k=2)
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL SAR measured	condition 250 mW input power	1.37 W/kg

## **Body TSL parameters**

The following parameters and calculations were applied.

	Temperature	Permittivity	Conductivity
Nominal Body TSL parameters	22.0 °C	55.5	0.96 mho/m
Measured Body TSL parameters	(22.0 ± 0.2) °C	54.5 ± 6 %	0.98 mho/m ± 6 %
Body TSL temperature change during test	< 0.5 °C		177 Bir 18 19

## SAR result with Body TSL

SAR averaged over 1 cm <sup>3</sup> (1 g) of Body TSL	Condition	
SAR measured	250 mW input power	2.18 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	8.55 W/kg ± 17.0 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Body TSL	condition	
SAR measured	250 mW input power	1.44 W/kg
SAR for nominal Body TSL parameters	normalized to 1W	5.67 W/kg ± 16.5 % (k=2)

## Appendix (Additional assessments outside the scope of SCS 0108)

### Antenna Parameters with Head TSL

Impedance, transformed to feed point	54.5 Ω - 0.3 jΩ
Return Loss	- 27.2 dB

### Antenna Parameters with Body TSL

Impedance, transformed to feed point	50.2 Ω - 3.0 jΩ
Return Loss	- 30.3 dB

## General Antenna Parameters and Design

Electrical Delay (one direction)	1.035 ns

After long term use with 100W radiated power, only a slight warming of the dipole near the feedpoint can be measured.

The dipole is made of standard semirigid coaxial cable. The center conductor of the feeding line is directly connected to the second arm of the dipole. The antenna is therefore short-circuited for DC-signals. On some of the dipoles, small end caps are added to the dipole arms in order to improve matching when loaded according to the position as explained in the "Measurement Conditions" paragraph. The SAR data are not affected by this change. The overall dipole length is still according to the Standard.

No excessive force must be applied to the dipole arms, because they might bend or the soldered connections near the feedpoint may be damaged.

### Additional EUT Data

Manufactured by	SPEAG

## Appendix (Additional assessments outside the scope of SCS 0108)

### **Measurement Conditions**

DASY system configuration, as far as not given on page 1 and 3.

Ph	antom	SAM Head Phantom	For usage with cSAR3DV2-R/L

## SAR result with SAM Head (Top)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	250 mW input power	1.93 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	7.72 W/kg ± 17.5 % (k=2)
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL SAR measured	condition 250 mW input power	1.31 W/kg

## SAR result with SAM Head (Mouth)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	250 mW input power	2.05 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	8.20 W/kg ± 17.5 % (k=2)
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR measured	250 mW input power	1.39 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	5.55 W/kg ± 16.9 % (k=2)

## SAR result with SAM Head (Neck)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	250 mW input power	2.00 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	8.00 W/kg ± 17.5 % (k=2)

SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR measured	250 mW input power	1.38 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	5.51 W/kg ± 16.9 % (k=2)

## SAR result with SAM Head (Ear)

SAR averaged over 1 cm <sup>3</sup> (1 g) of Head TSL	Condition	
SAR measured	250 mW input power	1.66 W/kg
SAR for nominal Head TSL parameters	normalized to 1W	6.64 W/kg ± 17.5 % (k=2)
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL	condition	
SAR averaged over 10 cm <sup>3</sup> (10 g) of Head TSL SAR measured	condition 250 mW input power	1.14 W/kg