Appendix A. System Check Data

Test Laboratory: DEKRA Date: 2024-05-14

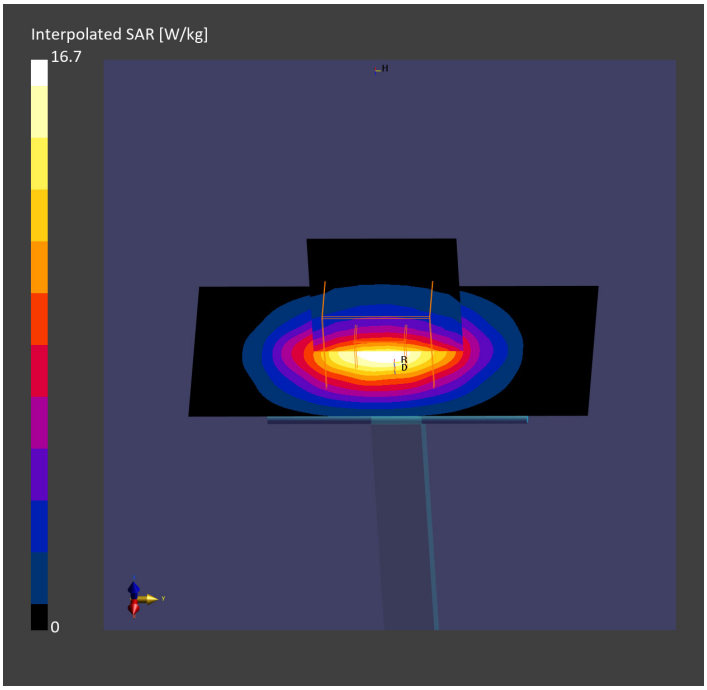
System Performance Check_2450MHz-Head

Communication System: UID 0--, CW; Frequency: 2450.000 MHz
Medium parameters used: f = 2450.000 MHz; Conductivity = 1.78 S/m; Permittivity = 40.2
Phantom section: Flat
DASY Configuration:

- Probe: EX3DV4 - SN7728; ConvF(7.16, 7.7, 7.45); Calibrated: 2023-11-22
- Sensor-Surface: 1.4 mm
- Electronics: DAE4 Sn916; Calibrated: 2023-11-29
- Phantom: ELI V8.0 (20deg probe tilt)
- Measurement SW: V16.2.4.2524

Area Scan (40.0 mm x 80.0 mm): Measurement grid: 10.0 mm x 10.0 mm
SAR (1 g) = 12.8 W/kg; SAR (10 g) = 5.91 W/kg

Zoom Scan (30.0 mm x 30.0 mm x 30.0 mm): Measurement grid: 5.0 mm x 5.0 mm x 1.5 mm
Power Drift = 0.01 dB
SAR(1 g) = 12.8 W/kg; SAR(10 g) = 6.03 W/kg
Smallest distance from peaks to all points 3 dB below = 9.0
Ratio of SAR at M2 to SAR at M1 = 81.1



Test Laboratory: DEKRA Date: 2024-05-15

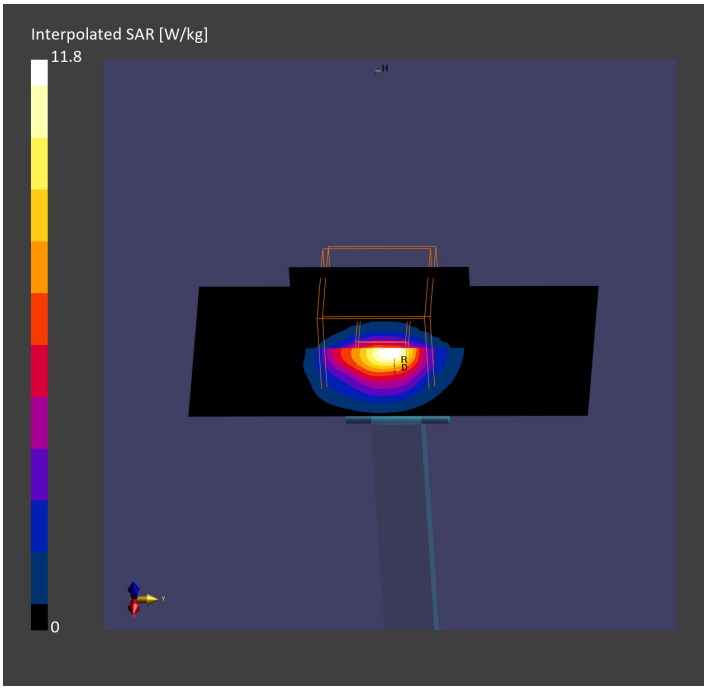
System Performance Check_5250MHz-Head

Communication System: UID 0--, CW; Frequency: 5250.000 MHz
Medium parameters used: f = 5250.000 MHz; Conductivity = 4.70 S/m; Permittivity = 36.5
Phantom section: Flat
DASY Configuration:

- Probe: EX3DV4 - SN7728; ConvF(5.61, 5.95, 5.67); Calibrated: 2023-11-22
- Sensor-Surface: 1.4 mm
- Electronics: DAE4 Sn916; Calibrated: 2023-11-29
- Phantom: ELI V8.0 (20deg probe tilt)
- Measurement SW: V16.2.2.1588

Area Scan (40.0 mm x 80.0 mm): Measurement grid: 10.0 mm x 10.0 mm
SAR (1 g) = 7.40 W/kg; SAR (10 g) = 2.14 W/kg

Zoom Scan (22.0 mm x 22.0 mm x 22.0 mm): Measurement grid: 4.0 mm x 4.0 mm x 1.4 mm
Power Drift = 0.05 dB
SAR(1 g) = 8.18 W/kg; SAR(10 g) = 2.34 W/kg
Smallest distance from peaks to all points 3 dB below = 7.4
Ratio of SAR at M2 to SAR at M1 = 63.3



Test Laboratory: DEKRA Date: 2024-05-15

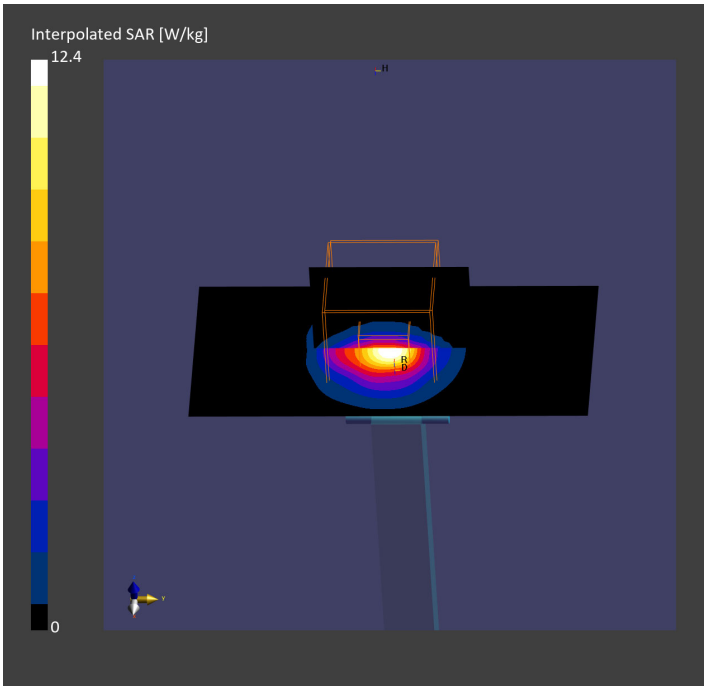
System Performance Check_5600MHz-Head

Communication System: UID 0--, CW; Frequency: 5600.000 MHz
Medium parameters used: f = 5600.000 MHz; Conductivity = 5.18 S/m; Permittivity = 35.5
Phantom section: Flat
DASY Configuration:

- Probe: EX3DV4 - SN7728; ConvF(5.09, 5.35, 5.13); Calibrated: 2023-11-22
- Sensor-Surface: 1.4 mm
- Electronics: DAE4 Sn916; Calibrated: 2023-11-29
- Phantom: ELI V8.0 (20deg probe tilt)
- Measurement SW: V16.2.4.2524

Area Scan (40.0 mm x 80.0 mm): Measurement grid: 10.0 mm x 10.0 mm
SAR (1 g) = 7.86 W/kg; SAR (10 g) = 2.25 W/kg

Zoom Scan (22.0 mm x 22.0 mm x 22.0 mm): Measurement grid: 4.0 mm x 4.0 mm x 1.4 mm
Power Drift = 0.10 dB
SAR(1 g) = 8.46 W/kg; SAR(10 g) = 2.46 W/kg
Smallest distance from peaks to all points 3 dB below = 7.6
Ratio of SAR at M2 to SAR at M1 = 64.1



Test Laboratory: DEKRA Date: 2024-05-15

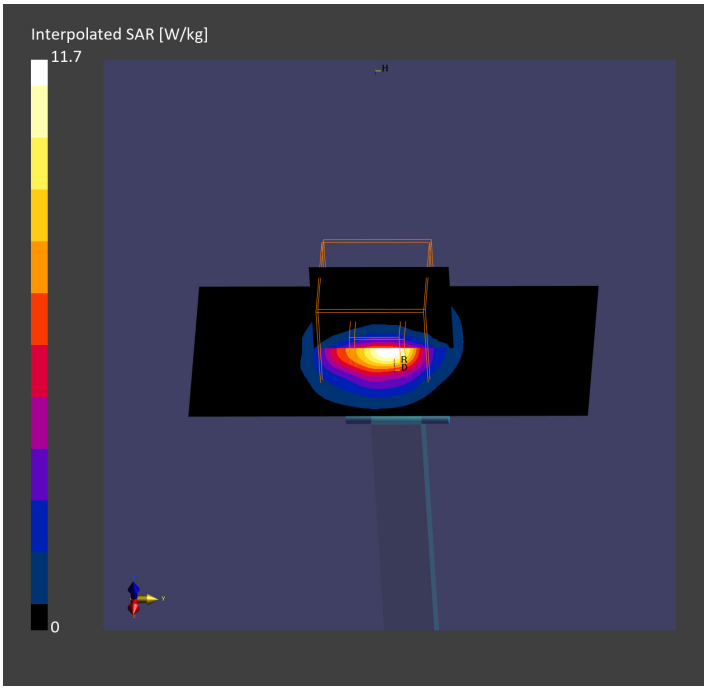
System Performance Check_5800MHz-Head

Communication System: UID 0--, CW; Frequency: 5800.000 MHz
Medium parameters used: f = 5800.000 MHz; Conductivity = 5.44 S/m; Permittivity = 34.9
Phantom section: Flat
DASY Configuration:

- Probe: EX3DV4 - SN7728; ConvF(5.09, 5.35, 5.13); Calibrated: 2023-11-22
- Sensor-Surface: 1.4 mm
- Electronics: DAE4 Sn916; Calibrated: 2023-11-29
- Phantom: ELI V8.0 (20deg probe tilt)
- Measurement SW: V16.2.4.2524

Area Scan (40.0 mm x 80.0 mm): Measurement grid: 10.0 mm x 10.0 mm
SAR (1 g) = 7.58 W/kg; SAR (10 g) = 2.21 W/kg

Zoom Scan (22.0 mm x 22.0 mm x 22.0 mm): Measurement grid: 4.0 mm x 4.0 mm x 1.4 mm
Power Drift = -0.16 dB
SAR(1 g) = 8.32 W/kg; SAR(10 g) = 2.37 W/kg
Smallest distance from peaks to all points 3 dB below = 7.2
Ratio of SAR at M2 to SAR at M1 = 60.9



Test Laboratory: DEKRA Date: 2024-05-07

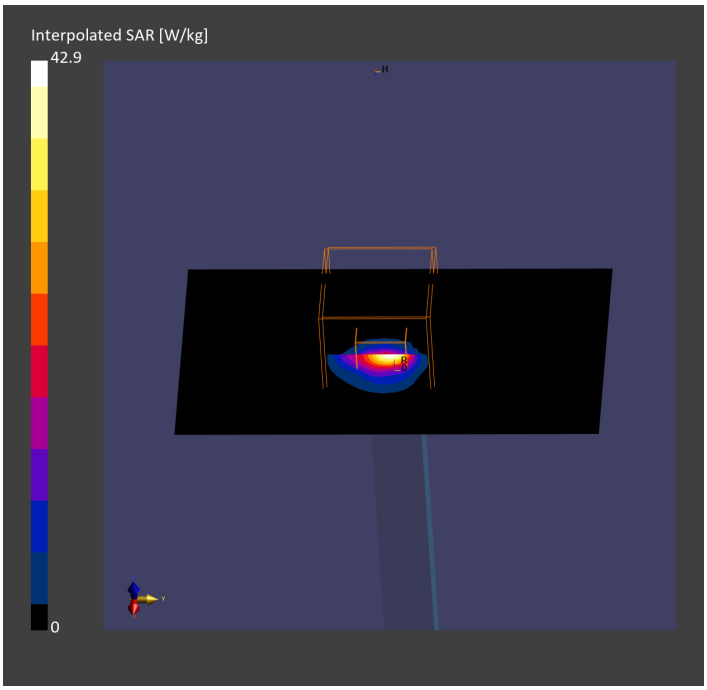
System Performance Check_6500MHz-Head

Communication System: UID 0--, CW; Frequency: 6500.000 MHz
Medium parameters used: f = 6500.000 MHz; Conductivity = 6.03 S/m; Permittivity = 35.1
Phantom section: Flat
DASY Configuration:

- Probe: EX3DV4 - SN7728; ConvF(5.4, 5.64, 5.34); Calibrated: 2023-11-22
- Sensor-Surface: 1.4 mm
- Electronics: DAE4 Sn916; Calibrated: 2023-11-29
- Phantom: ELI V8.0 (20deg probe tilt)
- Measurement SW: V16.2.4.2524

Area Scan (51.0 mm x 85.0 mm): Measurement grid: 8.5 mm x 8.5 mm
SAR (1 g) = 23.1 W/kg; SAR (10 g) = 4.66 W/kg

Zoom Scan (22.0 mm x 22.0 mm x 22.0 mm): Measurement grid: 3.4 mm x 3.4 mm x 1.4 mm
Power Drift = -0.14 dB
SAR(1 g) = 26.6 W/kg; SAR(10 g) = 4.97 W/kg
psAPD (4.0cm2, sq) = 121 W/m2
Smallest distance from peaks to all points 3 dB below = 4.4
Ratio of SAR at M2 to SAR at M1 = 51.2



System Performance Check_10GHz
Device under Test Properties

Model, Manufacturer	Dimensions [mm]	IMEI	DUT Type
5G Verification Source 10 GHz	100.0 x 100.0 x 100.0	SN-2006	

Exposure Conditions

Phantom Section	Position, Test Distance [mm]	Band	Group, UID	Frequency [MHz], Channel Number	Conversion Factor
5G Air	FRONT, 10.00	Validation band	CW, 0--	10000.0, 10000	1.0

Hardware Setup

Phantom	Medium	Probe, Calibration Date	DAE, Calibration Date
mmWave- 1068	Air---	EUmmWV4 - SN9546_F1-55GHz, 2024-04-18	DAE4 Sn1651, 2024-02-15

Scan Setup

	5G Scan
Grid Extents [mm]	60.0 x 60.0
Grid Steps [lambda]	0.125 x 0.125
Sensor Surface [mm]	10.0
MAIA	N/A

Measurement Results

	5G Scan
Date	2024-05-08
Avg. Area [cm^2]	4.00
psPDn+ [W/m^2]	182
psPDtot+ [W/m^2]	183
psPDmod+ [W/m^2]	187
E_{max} [V/m]	300
Power Drift [dB]	-0.01