DAkkS
Deutsche
Akkreditierungsstelle
D-PL-12139-01-01

The Testcenter facility 'Dosimetric Test Lab' within IMST GmbH is accredited by the German National 'Deutsche Akkreditierungsstelle GmbH (DAkkS)' for testing according to the scope as listed in the accreditation certificate: D-PL-12139-01-01.

Appendix for the Report

Dosimetric Assessment of the Portable Device RTX8111 (FCC ID: T7HCT8111) (IC: 4979B-CT8111)

According to the FCC Requirements SAR Distribution Plots

January 26, 2012

IMST GmbH
Carl-Friedrich-Gauß-Str. 2
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Customer

RTX Products Hong Kong Ltd.
11/F, CAC Tower, 165 Hoi Bun Road
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1 SAR Distribution Plots, Head Measurements, Antenna 1

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name: RTX8111_yplm_1_ant1.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.45 mho/m; ε_r = 38.9; ρ = 1000 kg/m^3
Phantom section: Left Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.07, 8.07, 8.07); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Cheek Left/Area Scan (8x14x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.078 mW/g
Cheek Left/Zoom Scan (7x7x7)/Cube 1: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 5.99 V/m; Power Drift = 0.032 dB
Peak SAR (extrapolated) = 0.122 W/kg
SAR(1 g) = 0.073 mW/g; SAR(10 g) = 0.041 mW/g
Maximum value of SAR (measured) = 0.079 mW/g

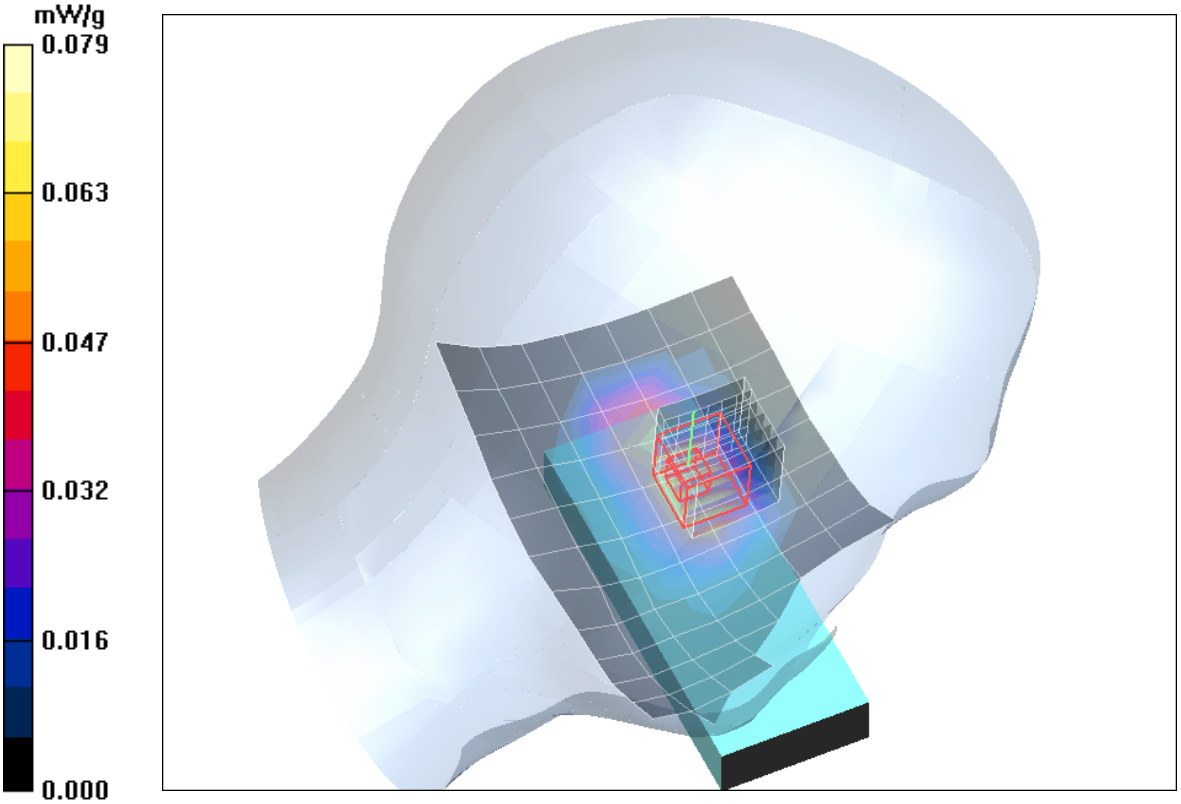

Fig. 1: SAR distribution for DECT US, antenna 1, channel 2, cheek position, left side of head (January 19, 2012; Ambient Temperature: 21.5°C; Liquid Temperature: 21.3°C).

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name: RTX8111_yplm_2_ant1.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.45 mho/m; ε_r = 38.9; ρ = 1000 kg/m^3
Phantom section: Left Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.07, 8.07, 8.07); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Tilted Left/Area Scan (8x14x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.040 mW/g
Tilted Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 4.94 V/m; Power Drift = 0.037 dB
Peak SAR (extrapolated) = 0.064 W/kg
SAR(1 g) = 0.038 mW/g; SAR(10 g) = 0.021 mW/g
Maximum value of SAR (measured) = 0.042 mW/g

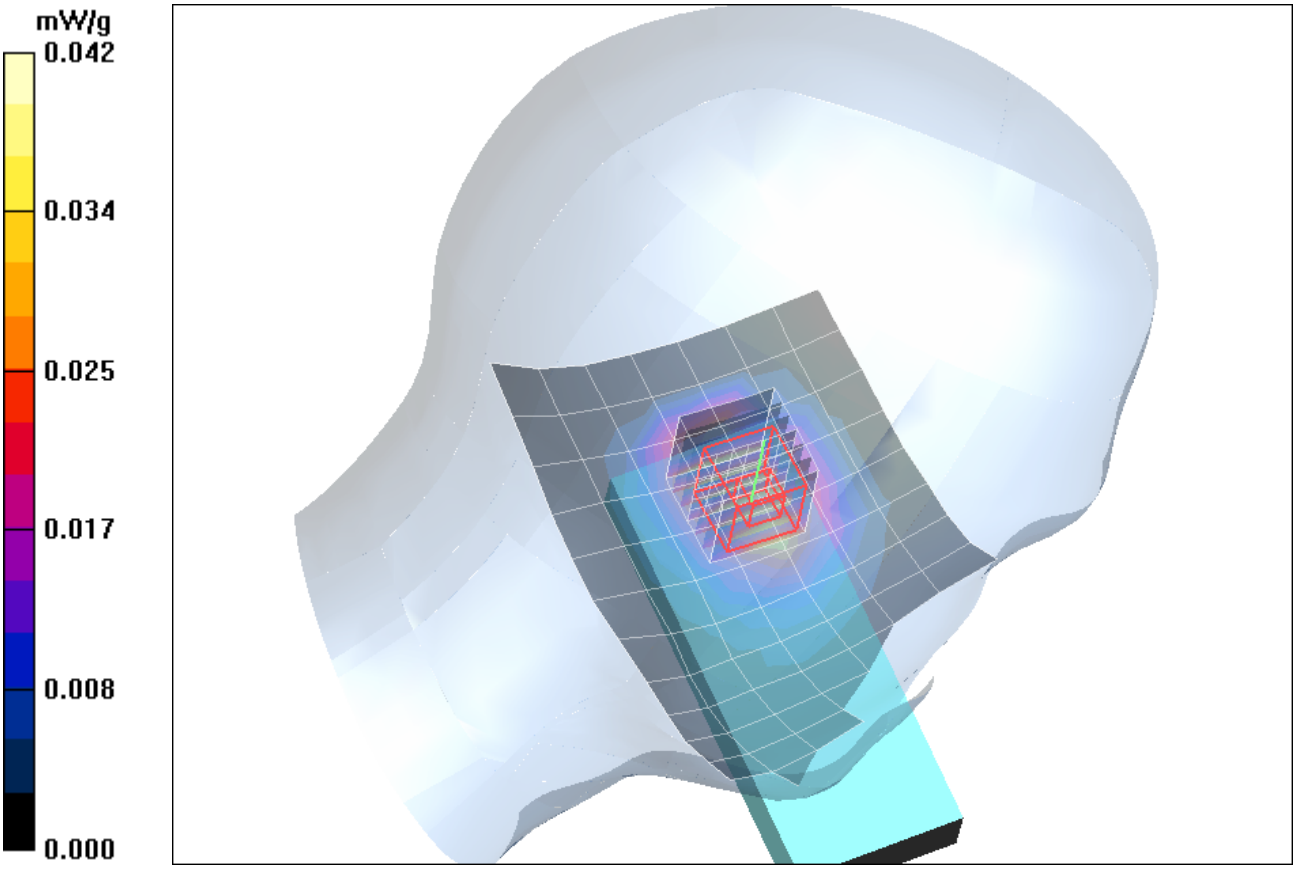

Fig. 2: SAR distribution for DECT US, antenna 1, channel 2, tilted position, left side of head (January 19, 2012; Ambient Temperature: 21.5°C; Liquid Temperature: 21.3°C).

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name: RTX8111_yprm_1_ant1.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.45 mho/m; ε_r = 38.9; ρ = 1000 kg/m^3
Phantom section: Right Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.07, 8.07, 8.07); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Cheek Right/Area Scan (8x14x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.056 mW/g
Cheek Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 5.51 V/m; Power Drift = 0.007 dB
Peak SAR (extrapolated) = 0.088 W/kg
SAR(1 g) = 0.055 mW/g; SAR(10 g) = 0.033 mW/g
Maximum value of SAR (measured) = 0.060 mW/g

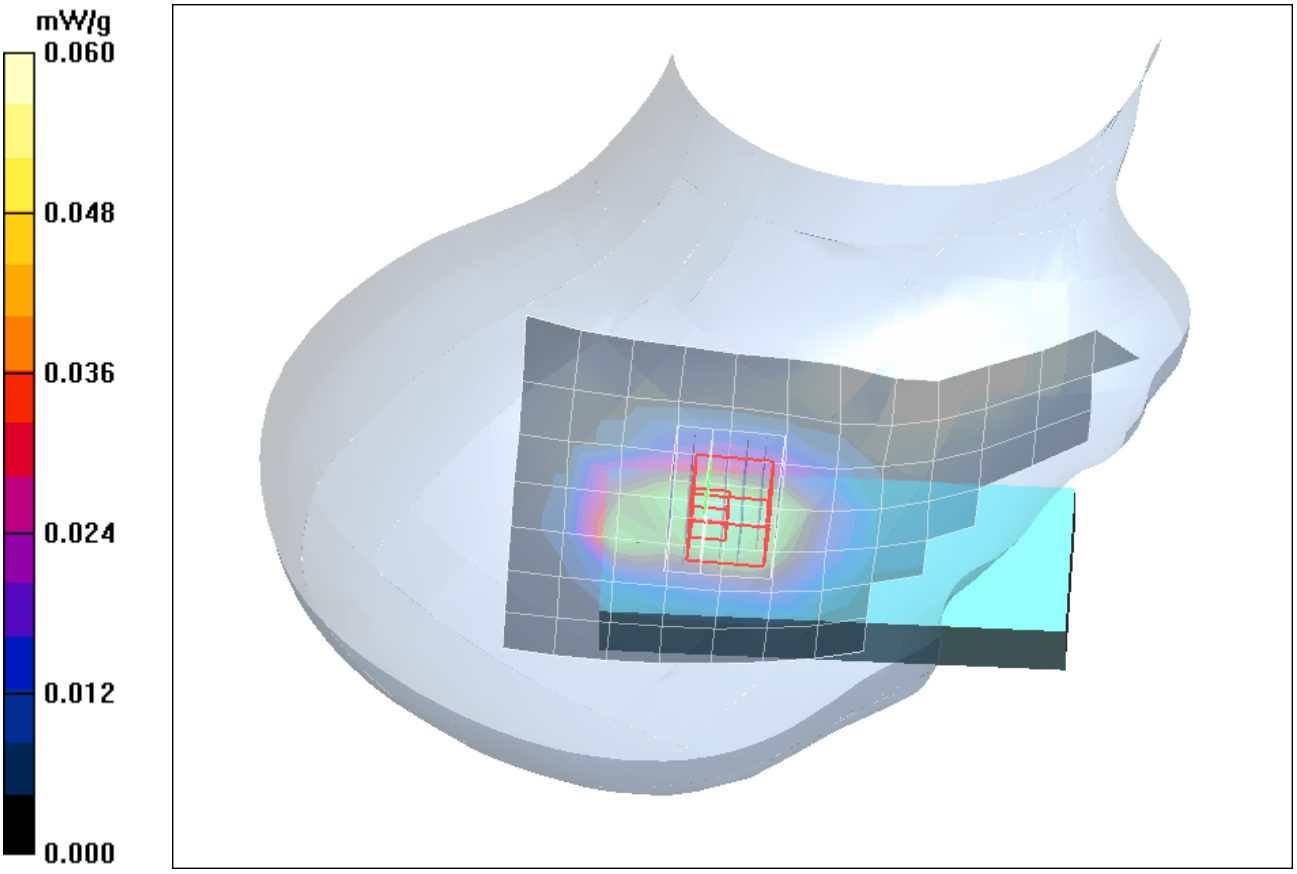

Fig. 3: SAR distribution for DECT US, antenna 1, channel 2, cheek position, right side of head (January 19, 2012; Ambient Temperature: 21.5°C; Liquid Temperature: 21.3°C).

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name: RTX8111_yprm_2_ant1.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.45 mho/m; ε_r = 38.9; ρ = 1000 kg/m^3
Phantom section: Right Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.07, 8.07, 8.07); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Tilted Right/Area Scan (8x14x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.031 mW/g
Tilted Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 4.47 V/m; Power Drift = 0.088 dB
Peak SAR (extrapolated) = 0.059 W/kg
SAR(1 g) = 0.029 mW/g; SAR(10 g) = 0.017 mW/g
Maximum value of SAR (measured) = 0.034 mW/g

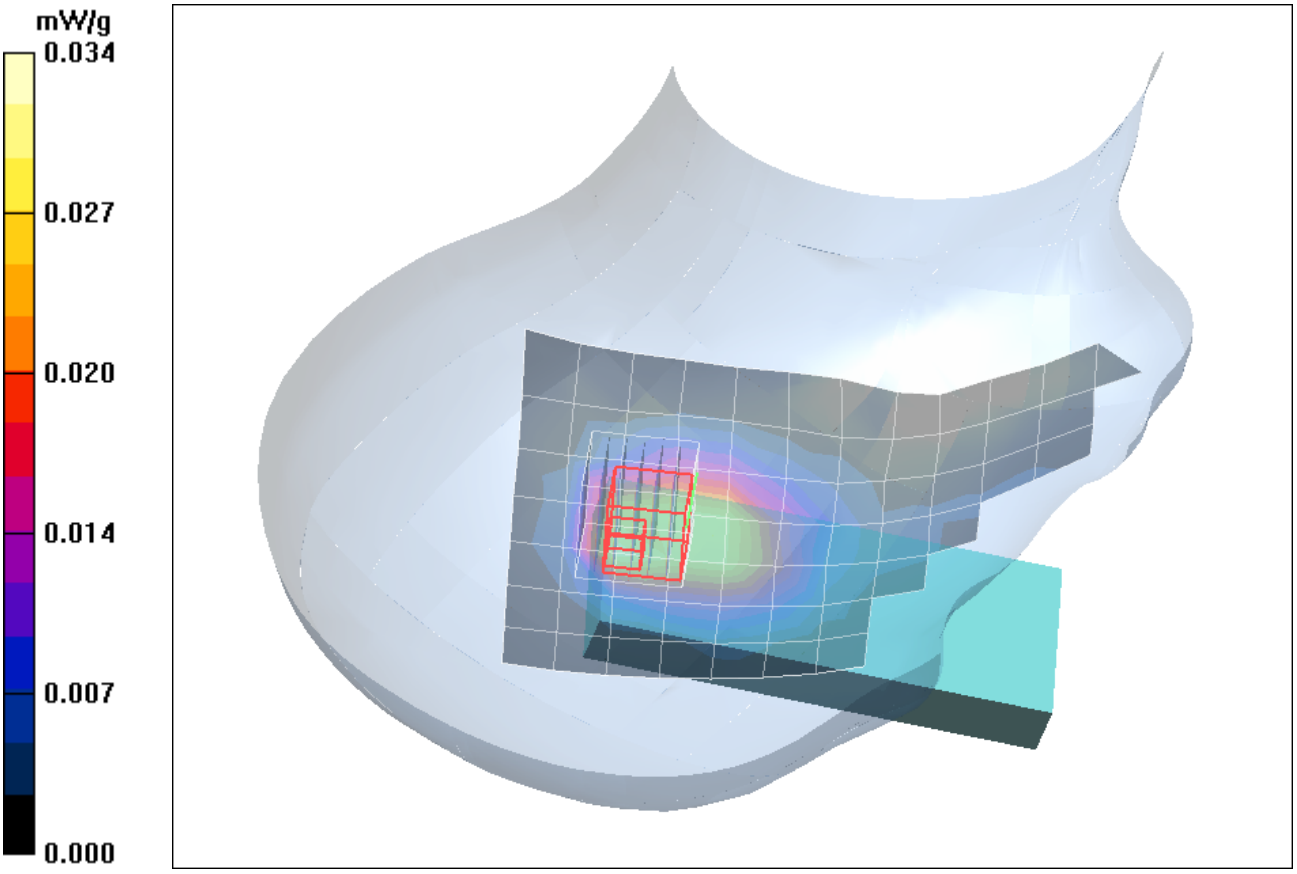

Fig. 4: SAR distribution for DECT US, antenna 1, channel 2, tilted position, right side of head (January 19, 2012; Ambient Temperature: 21.5°C; Liquid Temperature: 21.3°C)

2 SAR Distribution Plots, Head Measurements, Antenna 2

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name: RTX8111_yplm_1_ant2.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.45 mho/m; ε_r = 38.9; ρ = 1000 kg/m^3
Phantom section: Left Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.07, 8.07, 8.07); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Cheek Left/Area Scan (8x14x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.020 mW/g
Cheek Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 3.32 V/m; Power Drift = -0.022 dB
Peak SAR (extrapolated) = 0.037 W/kg
SAR(1 g) = 0.020 mW/g; SAR(10 g) = 0.011 mW/g
Maximum value of SAR (measured) = 0.022 mW/g

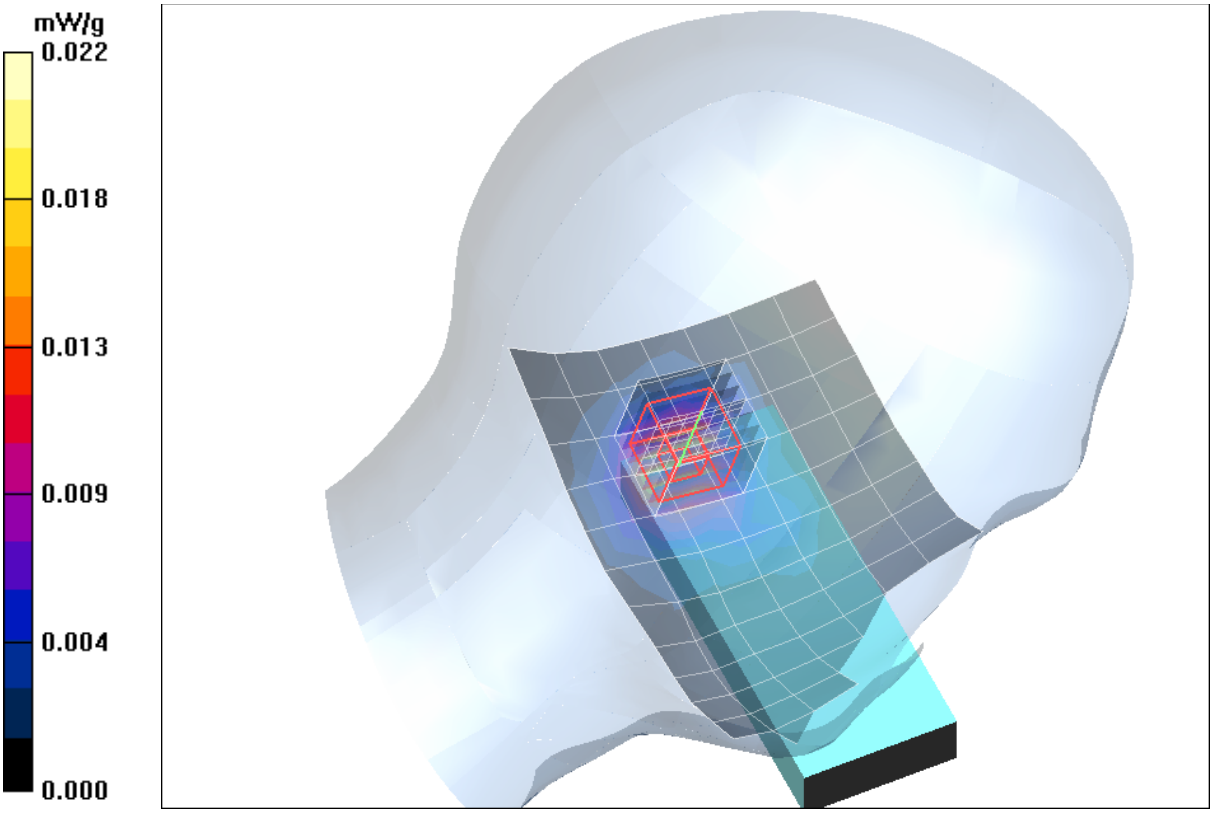

Fig. 5: SAR distribution for DECT US, antenna 2, channel 2, cheek position, left side of head (January 19, 2012; Ambient Temperature: 21.5°C; Liquid Temperature: 21.3°C).

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name: RTX8111_yplm_2_ant2.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.45 mho/m; ε_r = 38.9; ρ = 1000 kg/m^3
Phantom section: Left Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.07, 8.07, 8.07); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Tilted Left/Area Scan (8x14x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.014 mW/g
Tilted Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 2.96 V/m; Power Drift = 0.084 dB
Peak SAR (extrapolated) = 0.026 W/kg
SAR(1 g) = 0.015 mW/g; SAR(10 g) = 0.00769 mW/g
Maximum value of SAR (measured) = 0.016 mW/g

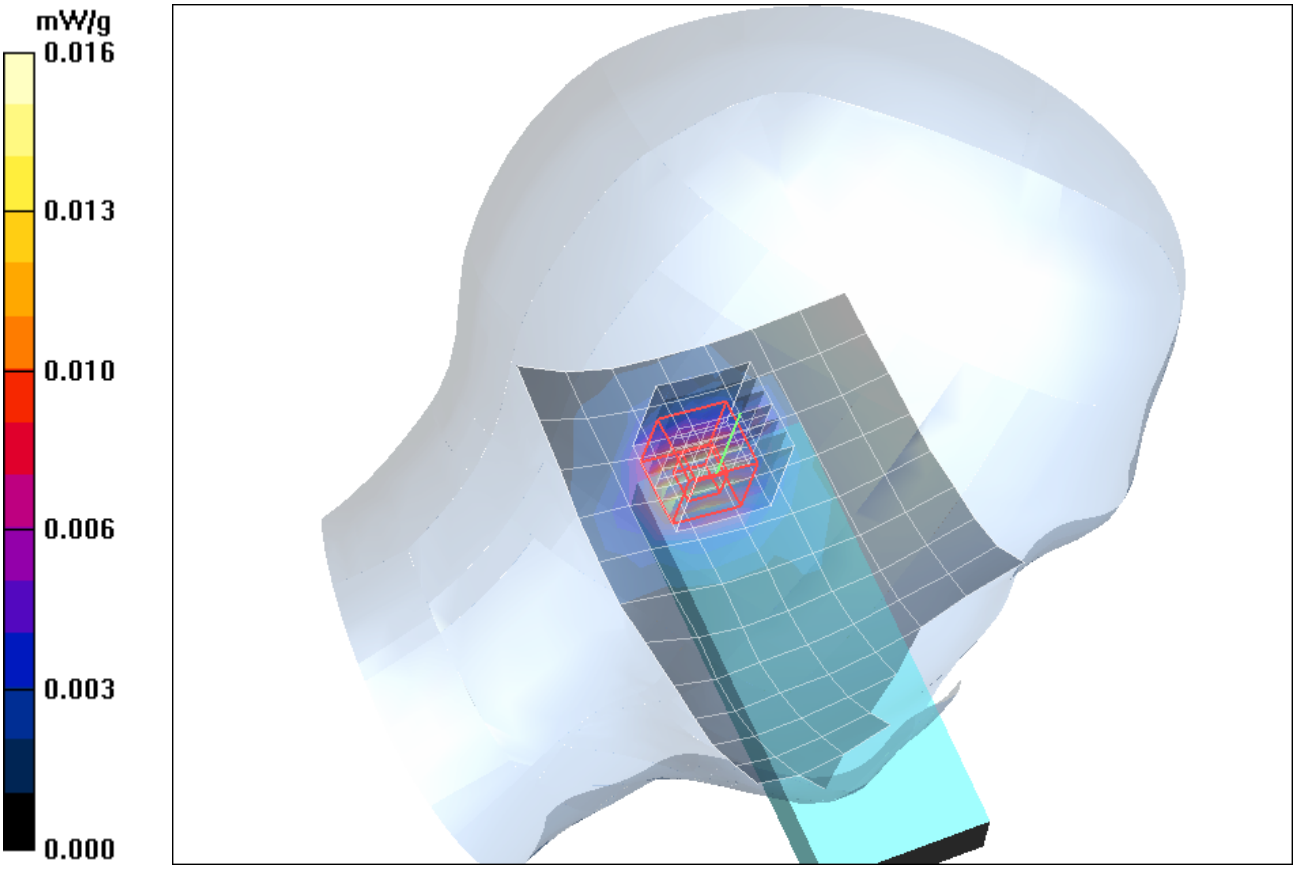

Fig. 6: SAR distribution for DECT US, antenna 2, channel 2, tilted position, left side of head (January 19, 2012; Ambient Temperature: 21.5°C; Liquid Temperature: 21.3°C).

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name: RTX8111_yprm_1_ant2.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.45 mho/m; ε_r = 38.9; ρ = 1000 kg/m^3
Phantom section: Right Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.07, 8.07, 8.07); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Cheek Right/Area Scan (8x14x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.031 mW/g
Cheek Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 3.17 V/m; Power Drift = 0.140 dB
Peak SAR (extrapolated) = 0.059 W/kg
SAR(1 g) = 0.029 mW/g; SAR(10 g) = 0.015 mW/g
Maximum value of SAR (measured) = 0.033 mW/g

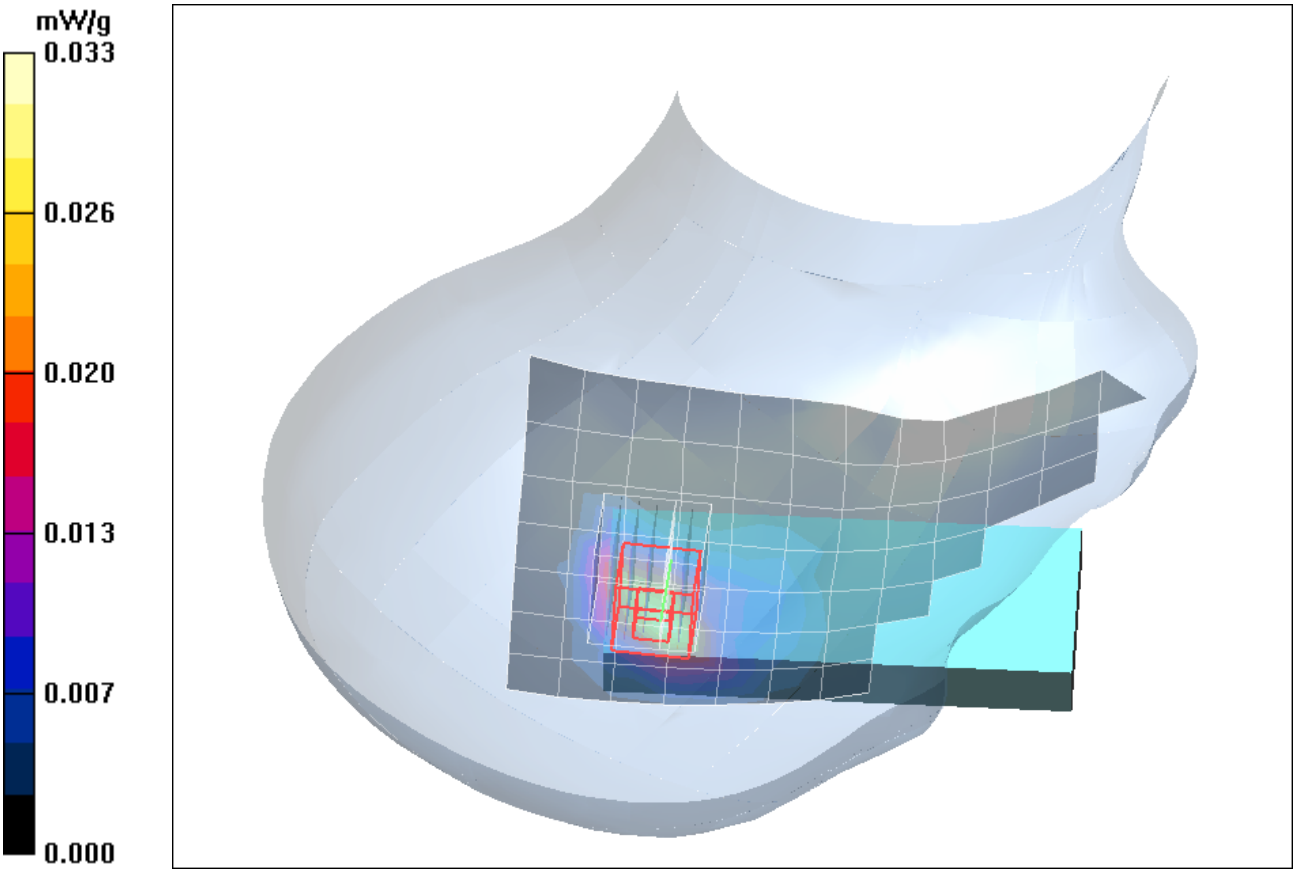

Fig. 7: SAR distribution for DECT US, antenna 2, channel 2, cheek position, right side of head (January 19, 2012; Ambient Temperature: 21.5°C; Liquid Temperature: 21.3°C).

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name: RTX8111_yprm_2_ant2.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.45 mho/m; ε_r = 38.9; ρ = 1000 kg/m^3
Phantom section: Right Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.07, 8.07, 8.07); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Tilted Right/Area Scan (8x14x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.019 mW/g
Tilted Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 2.90 V/m; Power Drift = 0.155 dB
Peak SAR (extrapolated) = 0.037 W/kg
SAR(1 g) = 0.020 mW/g; SAR(10 g) = 0.010 mW/g
Maximum value of SAR (measured) = 0.023 mW/g

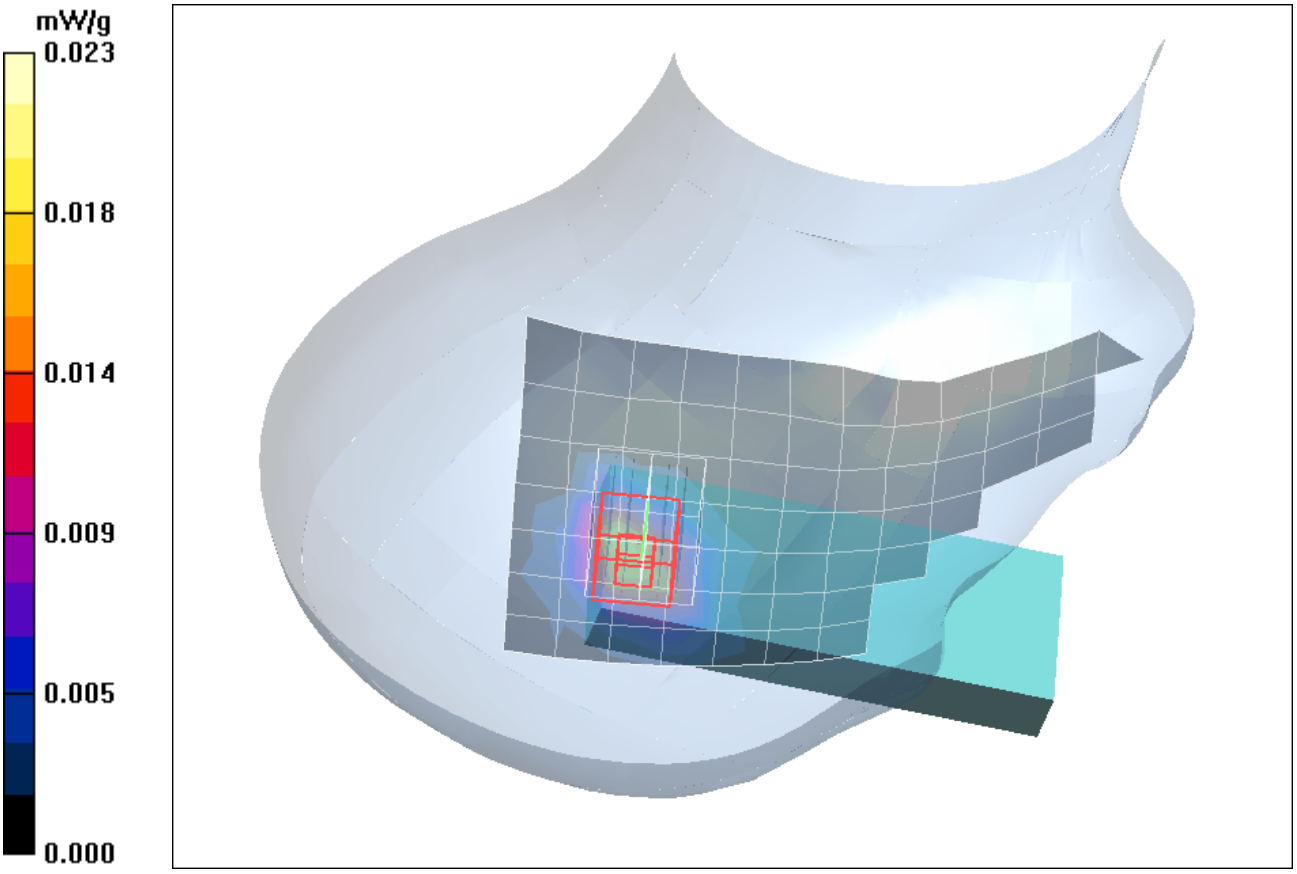

Fig. 8: SAR distribution for DECT US, antenna 2, channel 2, tilted position, right side of head (January 19, 2012; Ambient Temperature: 21.5°C; Liquid Temperature: 21.3°C)

3 SAR Distribution Plots, Body Measurements, Antenna 1

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name:
RTX8111_yphm_1_dspl_up_hs_ant1.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.58 mho/m; ε_r = 53; ρ = 1000 kg/m^3
Phantom section: Flat Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.03, 8.03, 8.03); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Body/Area Scan (7x12x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.083 mW/g
Body/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 2.78 V/m; Power Drift = 0.118 dB
Peak SAR (extrapolated) = 0.215 W/kg
SAR(1 g) = 0.102 mW/g; SAR(10 g) = 0.048 mW/g
Maximum value of SAR (measured) = 0.116 mW/g

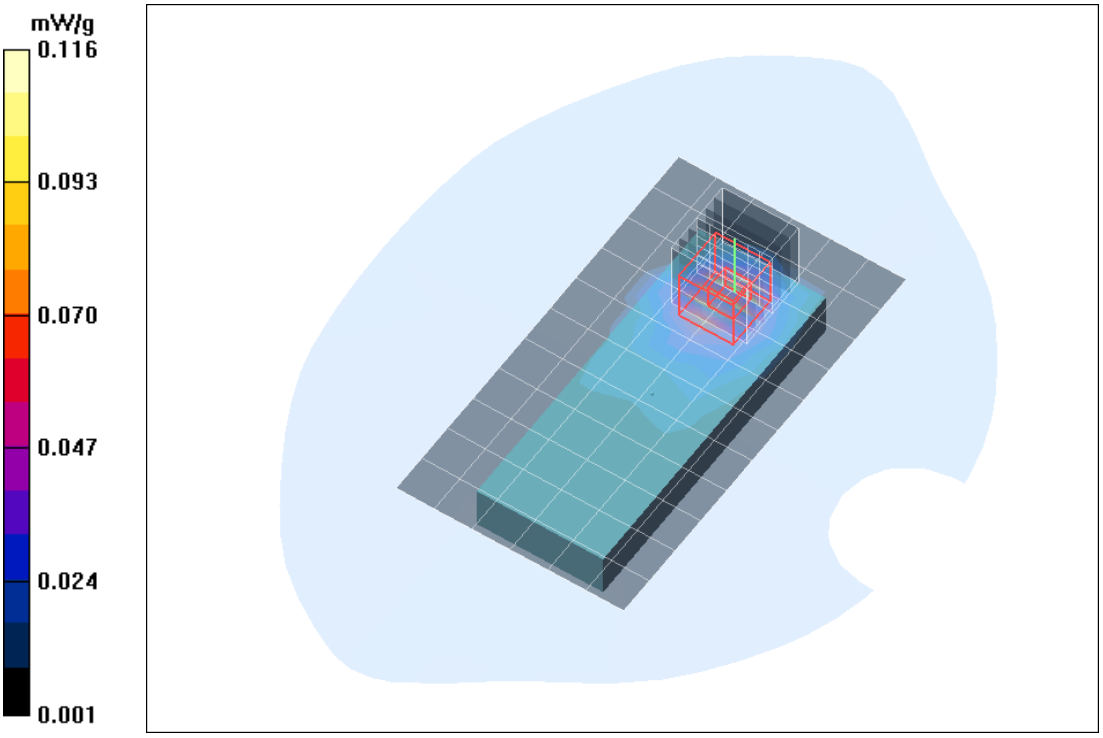

Fig. 9: SAR distribution for DECT US, antenna 1, channel 2, body worn configuration, display towards the phantom, with headset and 0 mm distance (January 17, 2012; Ambient Temperature: 21.3° C; Liquid Temperature: 21.1° C).

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name:
RTX8111_yphm_2_dspl_down_hs_ant1.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.58 mho/m; ε_r = 53; ρ = 1000 kg/m^3
Phantom section: Flat Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.03, 8.03, 8.03); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Body/Area Scan (7x12x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.052 mW/g
Body/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 3.52 V/m; Power Drift = 0.068 dB
Peak SAR (extrapolated) = 0.096 W/kg
SAR(1 g) = 0.047 mW/g; SAR(10 g) = 0.024 mW/g

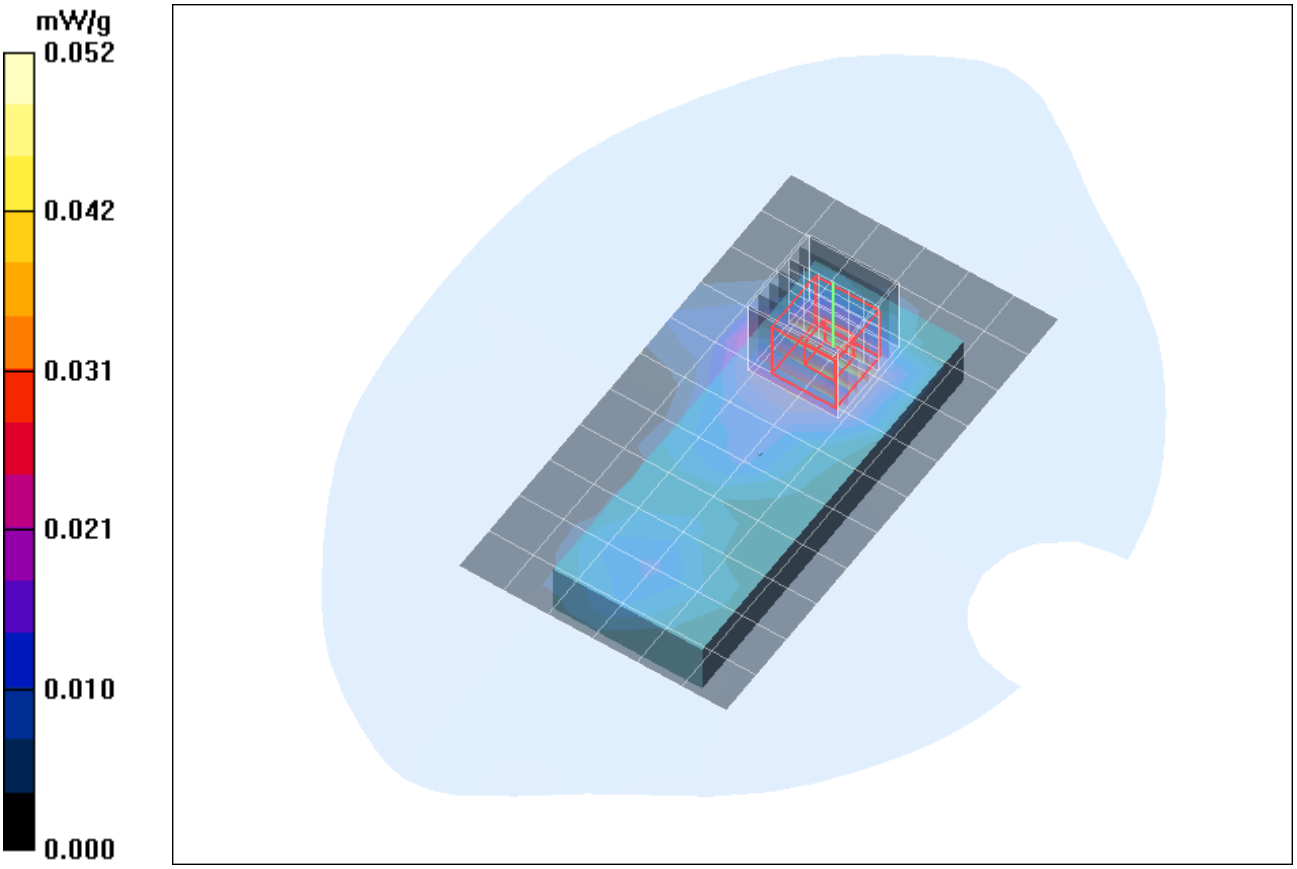

Fig. 10: SAR distribution for DECT US, antenna 1, channel 2, body worn configuration, display towards the ground, with headset and 0 mm distance (January 17, 2012; Ambient Temperature: 21.3° C; Liquid Temperature: 21.1° C).

4 SAR Distribution Plots, Body Measurements, Antenna 2

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name:
RTX8111_yphm_1_dspl_up_hs_ant2.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.58 mho/m; ε_r = 53; ρ = 1000 kg/m^3
Phantom section: Flat Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.03, 8.03, 8.03); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Body/Area Scan (7x12x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.044 mW/g
Body/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 1.18 V/m; Power Drift = 0.048 dB
Peak SAR (extrapolated) = 0.086 W/kg
SAR(1 g) = 0.040 mW/g; SAR(10 g) = 0.020 mW/g
Maximum value of SAR (measured) = 0.046 mW/g

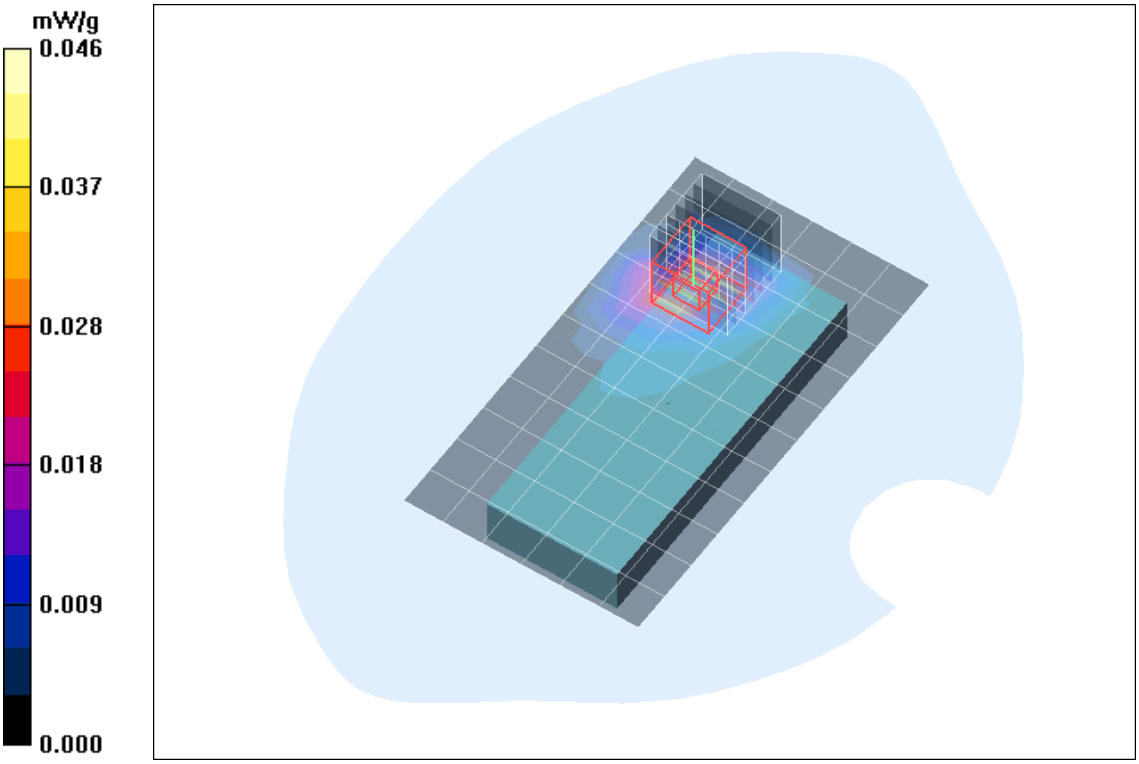

Fig. 11: SAR distribution for DECT US, antenna 2, channel 2, body worn configuration, display towards the phantom, with headset and 0 mm distance (January 17, 2012; Ambient Temperature: 21.3° C; Liquid Temperature: 21.1° C).

Test Laboratory: Imst GmbH, DASY Yellow (II); File Name:
RTX8111_yphm_2_dspl_down_hs_ant2.da4

DUT: RTX; Type: 8111;
Program Name: DECT

Communication System: DECT US; Frequency: 1924.99 MHz;Duty Cycle: 1:24
Medium parameters used: f = 1924.99 MHz; σ = 1.58 mho/m; ε_r = 53; ρ = 1000 kg/m^3
Phantom section: Flat Section

DASY4 Configuration:
- Probe: EX3DV4 - SN3536; ConvF(8.03, 8.03, 8.03); Calibrated: 26.09.2011
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 21.09.2011
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.7 Build 80; Postprocessing SW: SEMCAD, V1.8 Build 186

Body/Area Scan (7x12x1): Measurement grid: dx=15mm, dy=15mm
Maximum value of SAR (measured) = 0.052 mW/g
Body/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 3.38 V/m; Power Drift = 0.195 dB
Peak SAR (extrapolated) = 0.107 W/kg
SAR(1 g) = 0.057 mW/g; SAR(10 g) = 0.029 mW/g
Maximum value of SAR (measured) = 0.064 mW/g

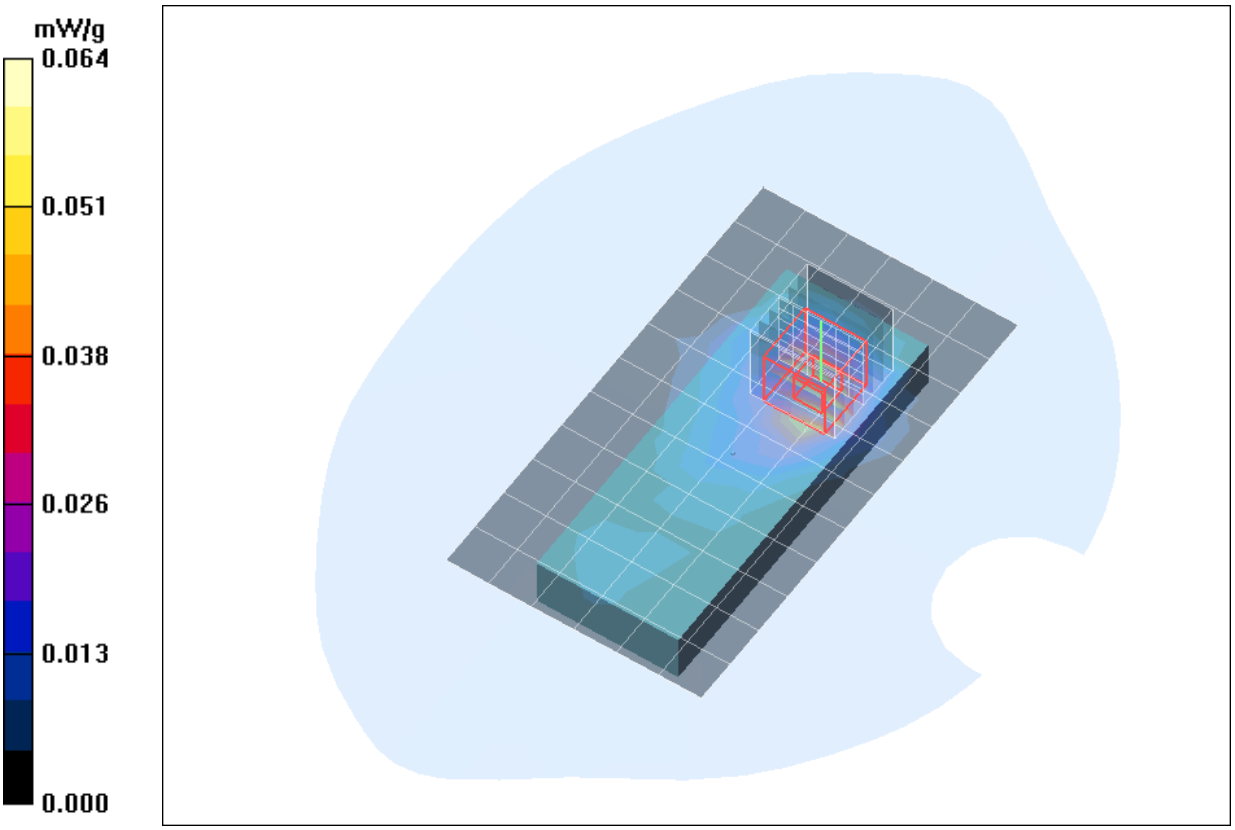

Fig. 12: SAR distribution for DECT US, antenna 2, channel 2, body worn configuration, display towards the ground, with headset and 0 mm distance (January 17, 2012; Ambient Temperature: 21.3° C; Liquid Temperature: 21.1° C).

5 SAR Z-Axis Scans (Validation)

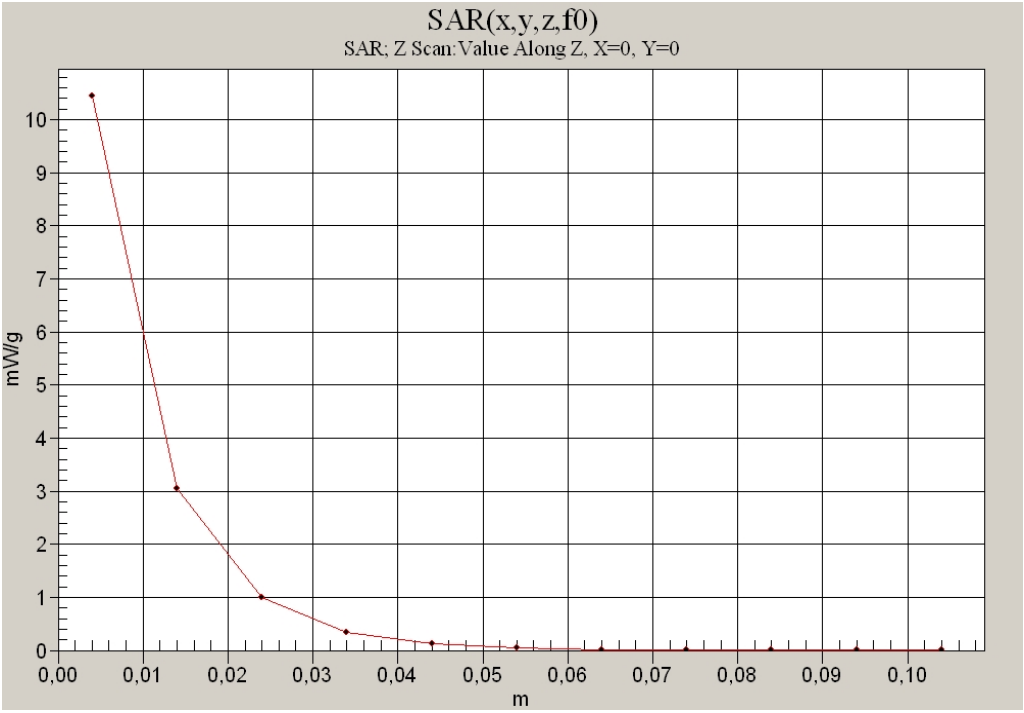

Fig. 13: SAR versus liquid depth, 1900 MHz, head (January 19, 2012; Ambient Temperature: 21.5° C; Liquid Temperature : 21.3° C).

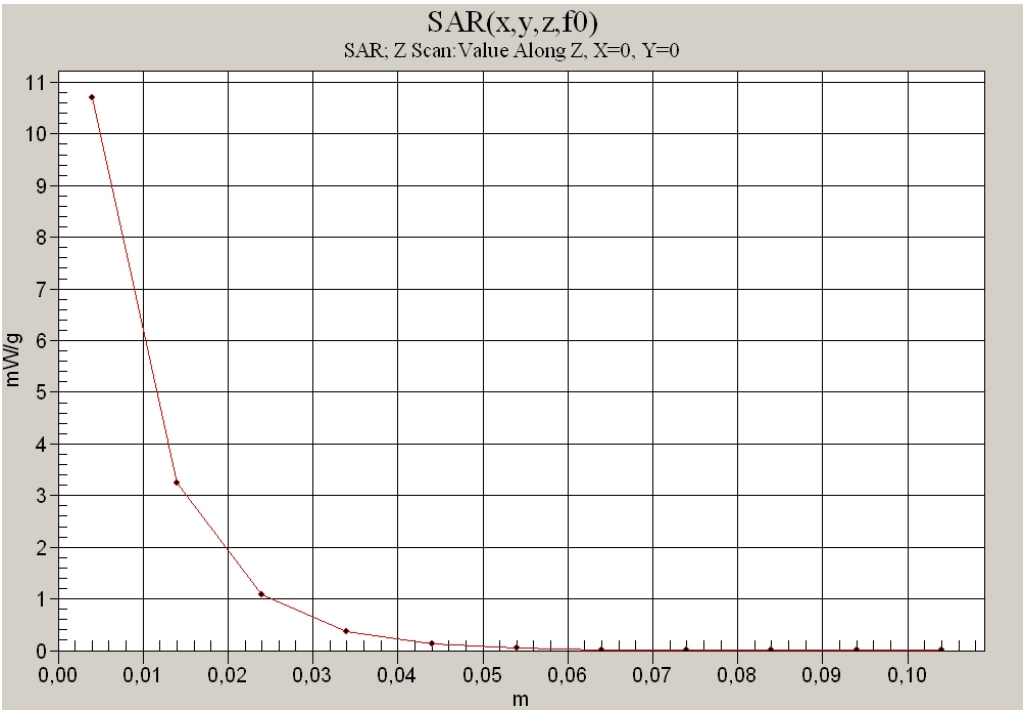

Fig. 14: SAR versus liquid depth, 1900 MHz, body (January 17, 2012; Ambient Temperature: 21.3° C; Liquid Temperature : 21.1° C).

6 SAR Z-Axis Scans (Measurements)

The following pictures show the plots of SAR versus liquid depth for the worst case values.

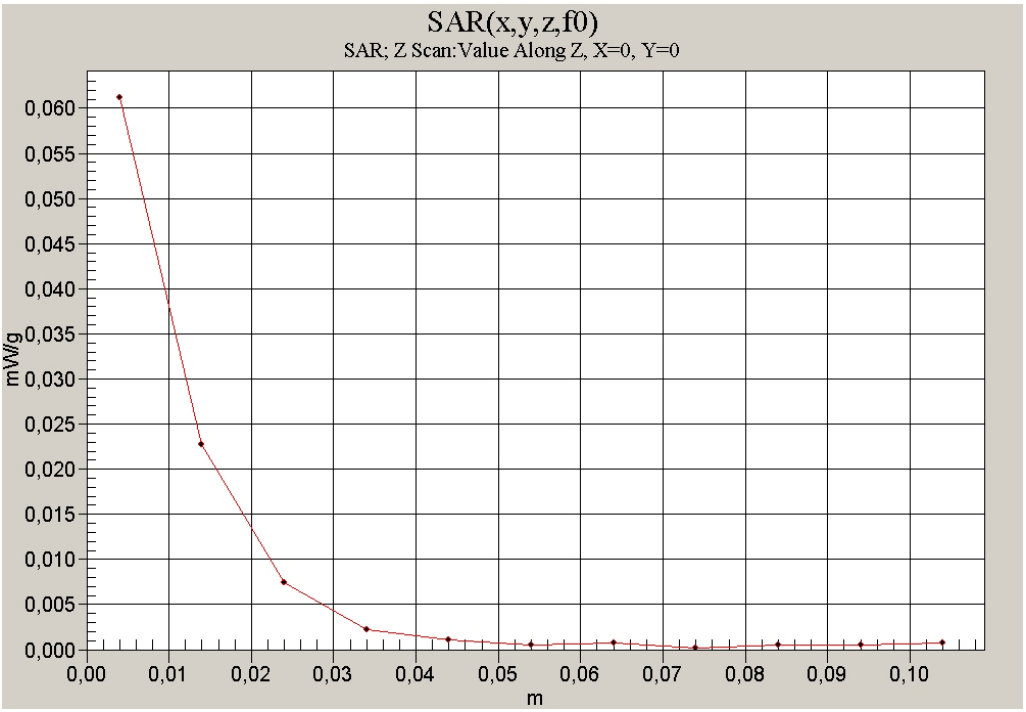

Fig. 15: SAR versus liquid depth, head: DECT US, antenna 1, channel 2, cheek position, left side of head (January 19, 2012; Ambient Temperature: 21.5° C; Liquid Temperature : 21.3° C).

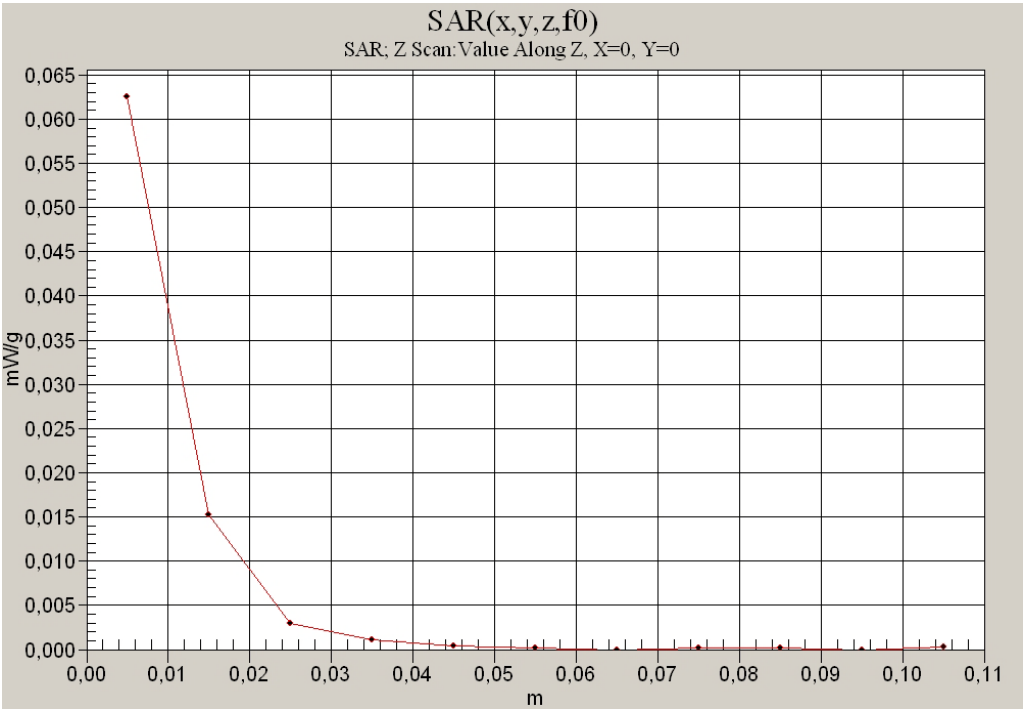

Fig. 16: SAR versus liquid depth, body: DECT US, antenna 1, channel 2, headset and 0 mm distance, display towards the phantom (January 17, 2012; Ambient Temperature: 21.3° C; Liquid Temperature: 21.1° C).