
Appendix for the Report

Dosimetric Assessment of the Siemens CX70 (FCC ID: PWX-CX70)

According to the FCC Requirements

SAR Distribution Plots

October 27, 2004
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The test results only relate to the items tested.
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1 SAR Distribution Plots, PCS 1900 Head without Flash

Test Laboratory: IMST GmbH; File Name: [Stdvplm_1.da4](#)

DUT: Siemens; Type: CX 70; Serial: 004999003401170

Program Name: Cheek Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Left/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.546 mW/g

Cheek Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 19 V/m; Power Drift = -0.008 dB

Peak SAR (extrapolated) = 0.925 W/kg

SAR(1 g) = 0.578 mW/g; SAR(10 g) = 0.338 mW/g

Maximum value of SAR (measured) = 0.635 mW/g

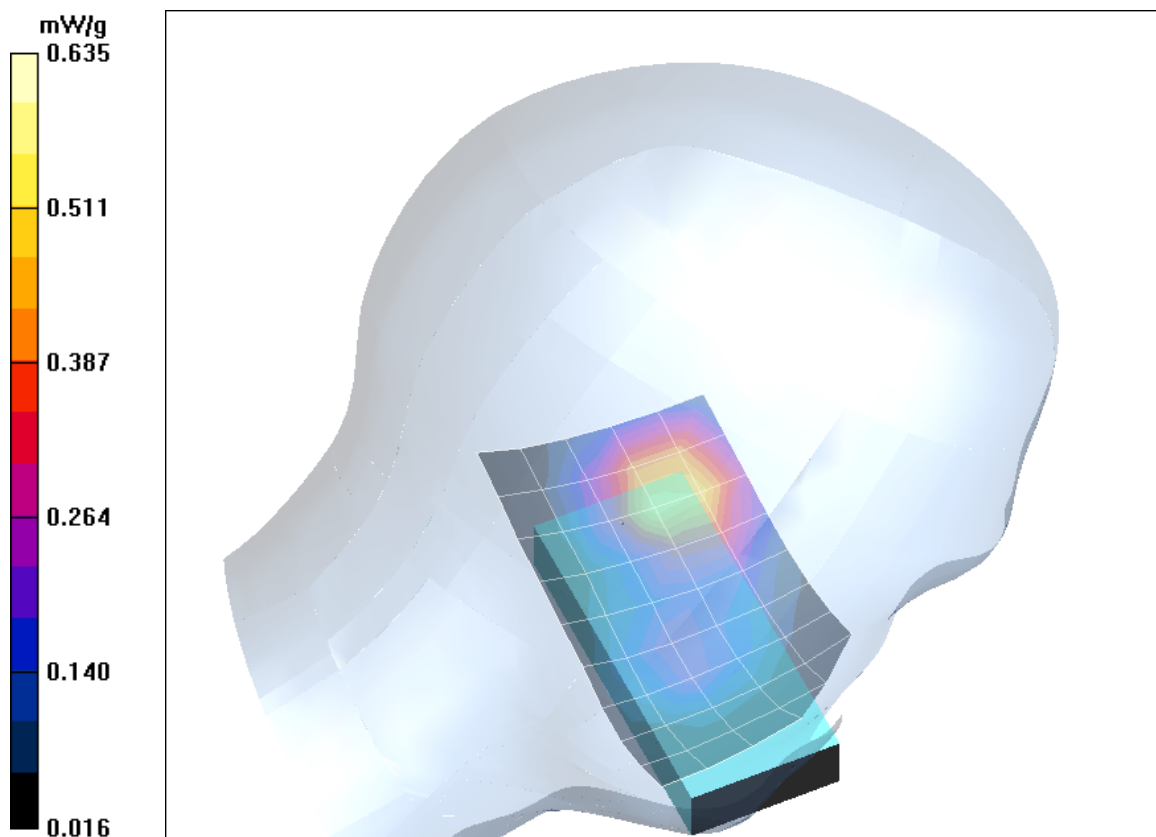


Fig. 1: SAR distribution for PCS 1900, channel 661, cheek position, left side of head, Standard. (21.10.2004; Ambient Temperature: 22.0° C; Liquid Temperature: 20.7° C).

Test Laboratory: IMST GmbH; **File Name:** [Stdvplm_2.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Tilted Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000 \text{ kg/m}^3$

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Left/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.580 mW/g

Tilted Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 21.8 V/m; Power Drift = -0.016 dB

Peak SAR (extrapolated) = 1.01 W/kg

SAR(1 g) = 0.630 mW/g; SAR(10 g) = 0.362 mW/g

Maximum value of SAR (measured) = 0.704 mW/g

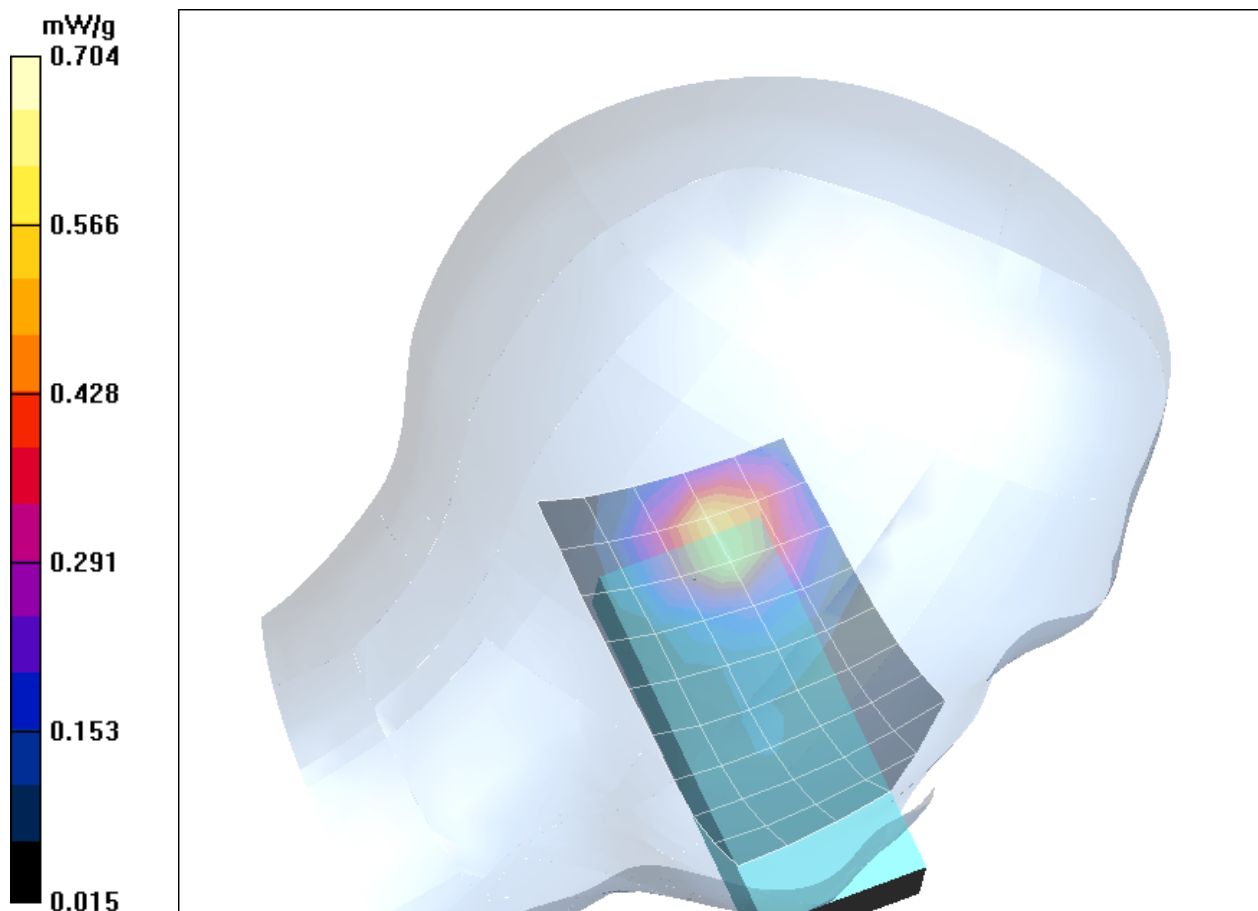


Fig. 2: SAR distribution for PCS 1900, channel 661, tilted position, left side of head, Standard. (21.10.2004; Ambient Temperature: 22.0° C; Liquid Temperature : 20.7° C).

Test Laboratory: IMST GmbH; **File Name:** [Stdvprm_1.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Cheek Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Right/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.483 mW/g

Cheek Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 17.7 V/m; Power Drift = -0.119 dB

Peak SAR (extrapolated) = 0.678 W/kg

SAR(1 g) = 0.455 mW/g; SAR(10 g) = 0.278 mW/g

Maximum value of SAR (measured) = 0.495 mW/g

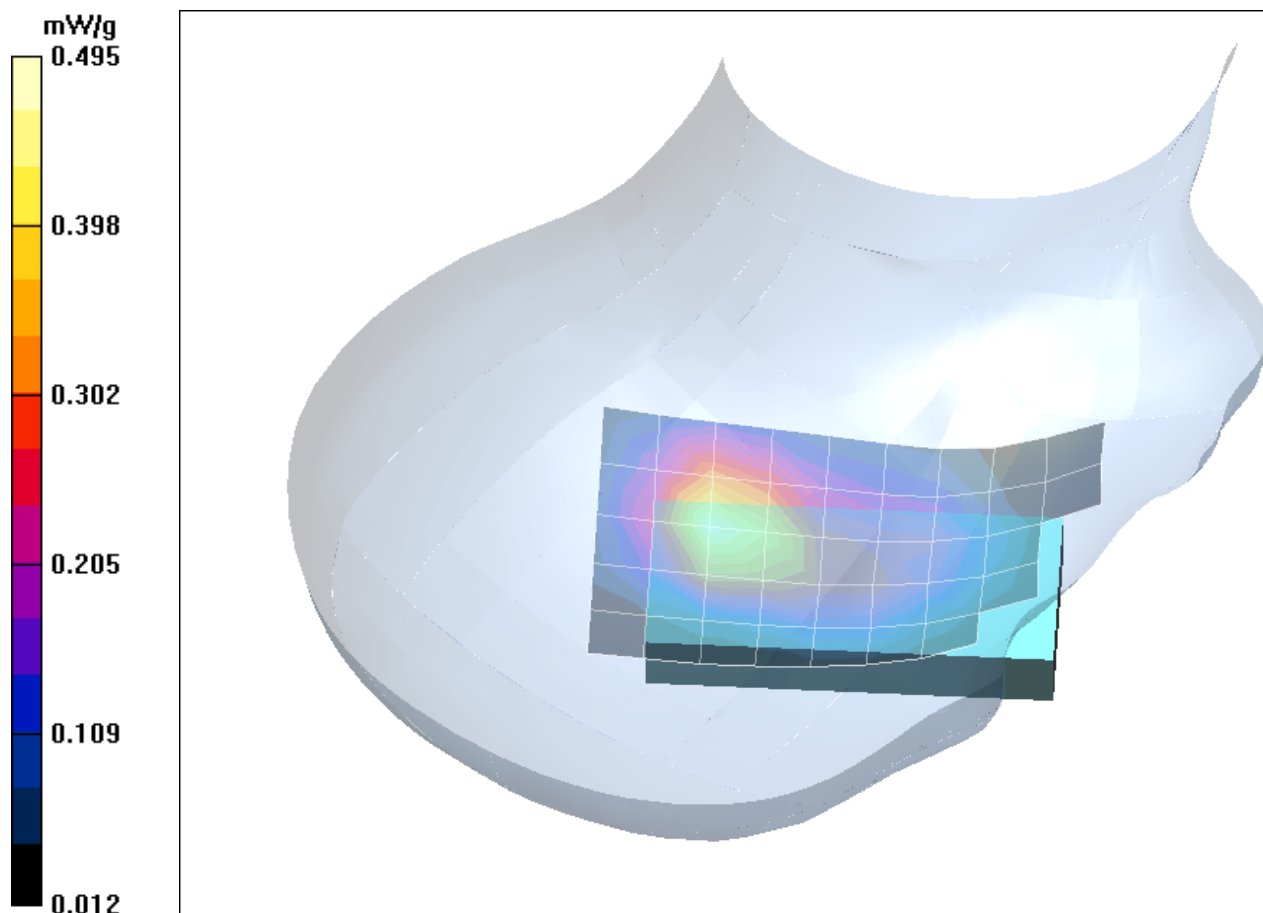


Fig. 3: SAR distribution for PCS 1900, channel 661, cheek position, right side of head, Standard. (21.10.2004; Ambient Temperature: 22.0° C; Liquid Temperature : 20.7° C).

Test Laboratory: IMST GmbH; **File Name:** [Stdvprm_2.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Tilted Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Right/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.581 mW/g

Tilted Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 20.8 V/m; Power Drift = 0.034 dB

Peak SAR (extrapolated) = 0.814 W/kg

SAR(1 g) = 0.530 mW/g; SAR(10 g) = 0.310 mW/g

Maximum value of SAR (measured) = 0.587 mW/g

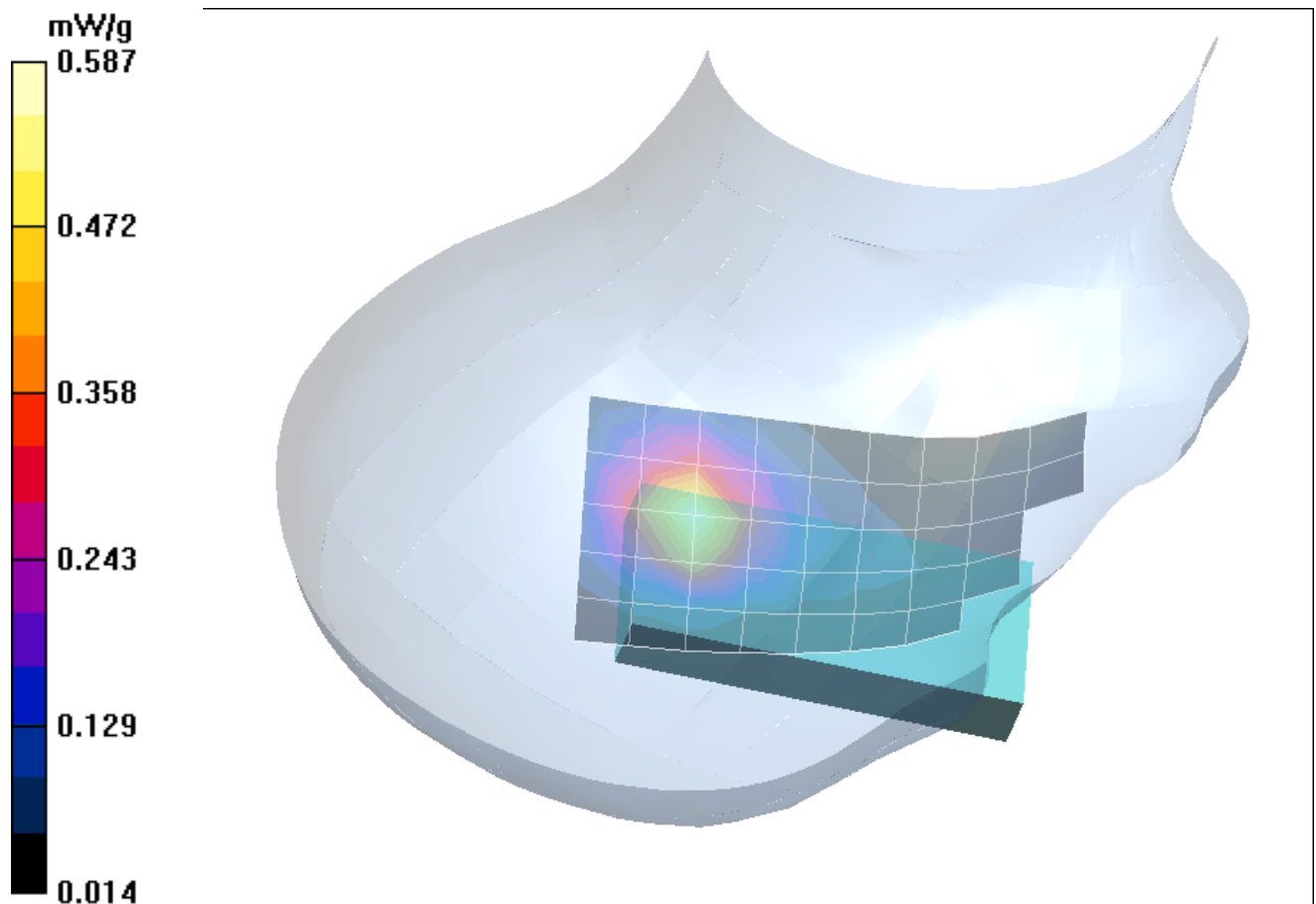


Fig. 4: SAR distribution for PCS 1900, channel 661, tilted position, right side of head, Standard. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.7° C).

Test Laboratory: IMST GmbH; File Name: [BUTyplm_1.da4](#)

DUT: Siemens; Type: CX 70; Serial: 004999003401170

Program Name: Cheek Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Left/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.594 mW/g

Cheek Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 17.7 V/m; Power Drift = 0.121 dB

Peak SAR (extrapolated) = 0.957 W/kg

SAR(1 g) = 0.595 mW/g; SAR(10 g) = 0.347 mW/g

Maximum value of SAR (measured) = 0.650 mW/g

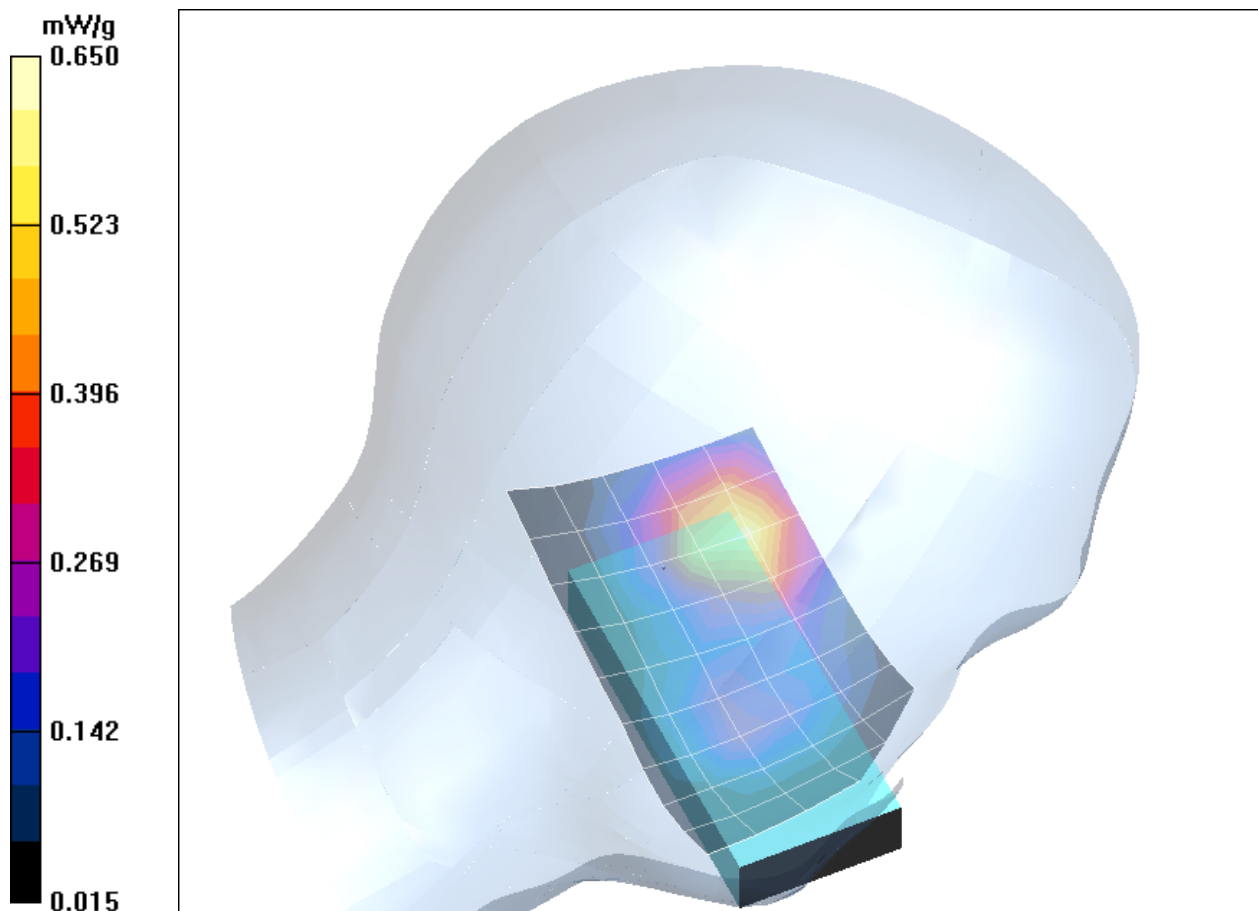


Fig. 5: SAR distribution for PCS 1900, channel 661, cheek position, left side of head, Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature: 20.6° C).

Test Laboratory: IMST GmbH; **File Name:** [BUTyplm 2.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Tilted Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Left/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.606 mW/g

Tilted Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 21 V/m; Power Drift = 0.015 dB

Peak SAR (extrapolated) = 1.02 W/kg

SAR(1 g) = 0.637 mW/g; SAR(10 g) = 0.367 mW/g

Maximum value of SAR (measured) = 0.699 mW/g

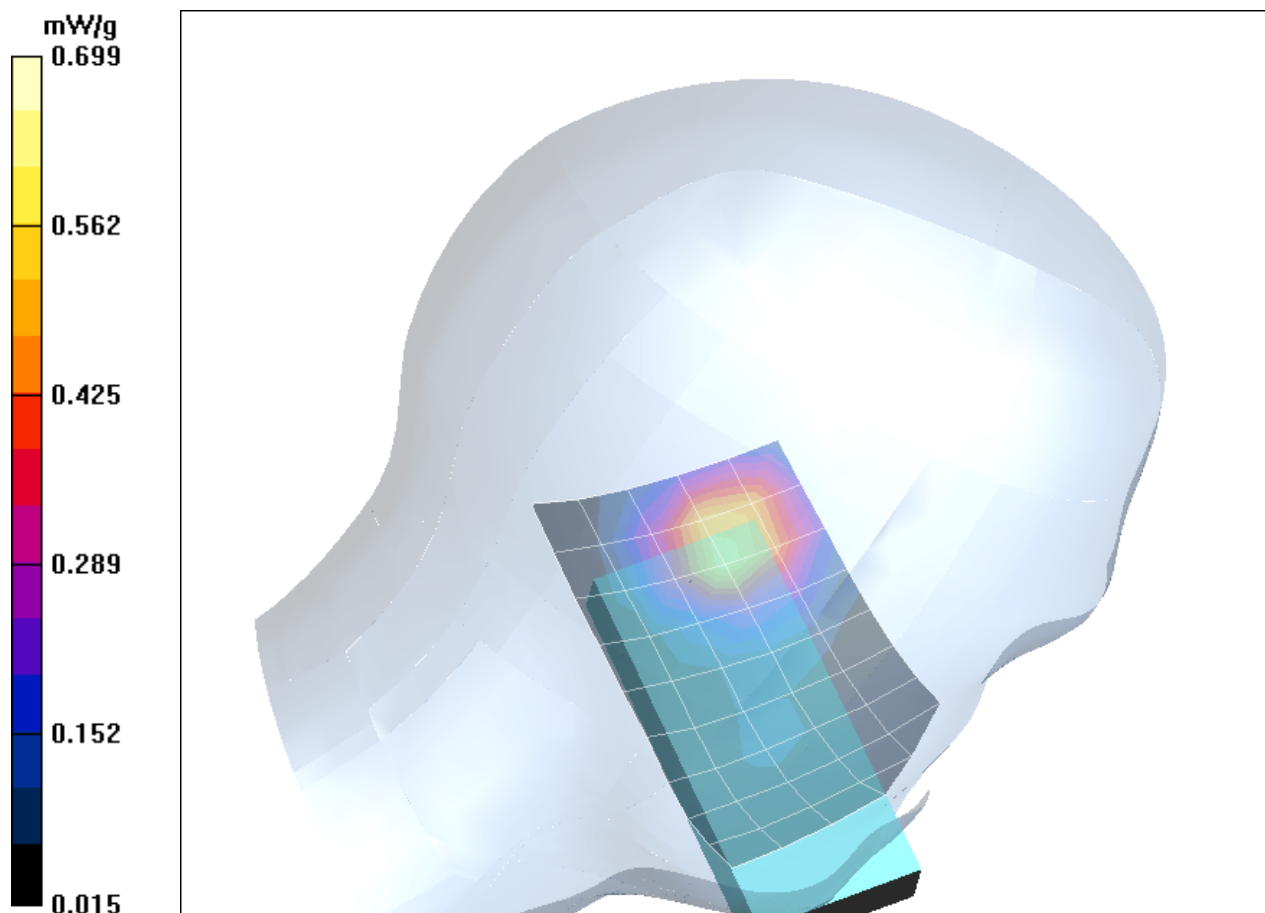


Fig. 6: SAR distribution for PCS 1900, channel 661, tilted position, left side of head, Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.6° C)

Test Laboratory: IMST GmbH; **File Name:** [BUTyprm 1.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Cheek Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Right/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.454 mW/g

Cheek Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 17.3 V/m; Power Drift = -0.027 dB

Peak SAR (extrapolated) = 0.642 W/kg

SAR(1 g) = 0.430 mW/g; SAR(10 g) = 0.261 mW/g

Maximum value of SAR (measured) = 0.465 mW/g

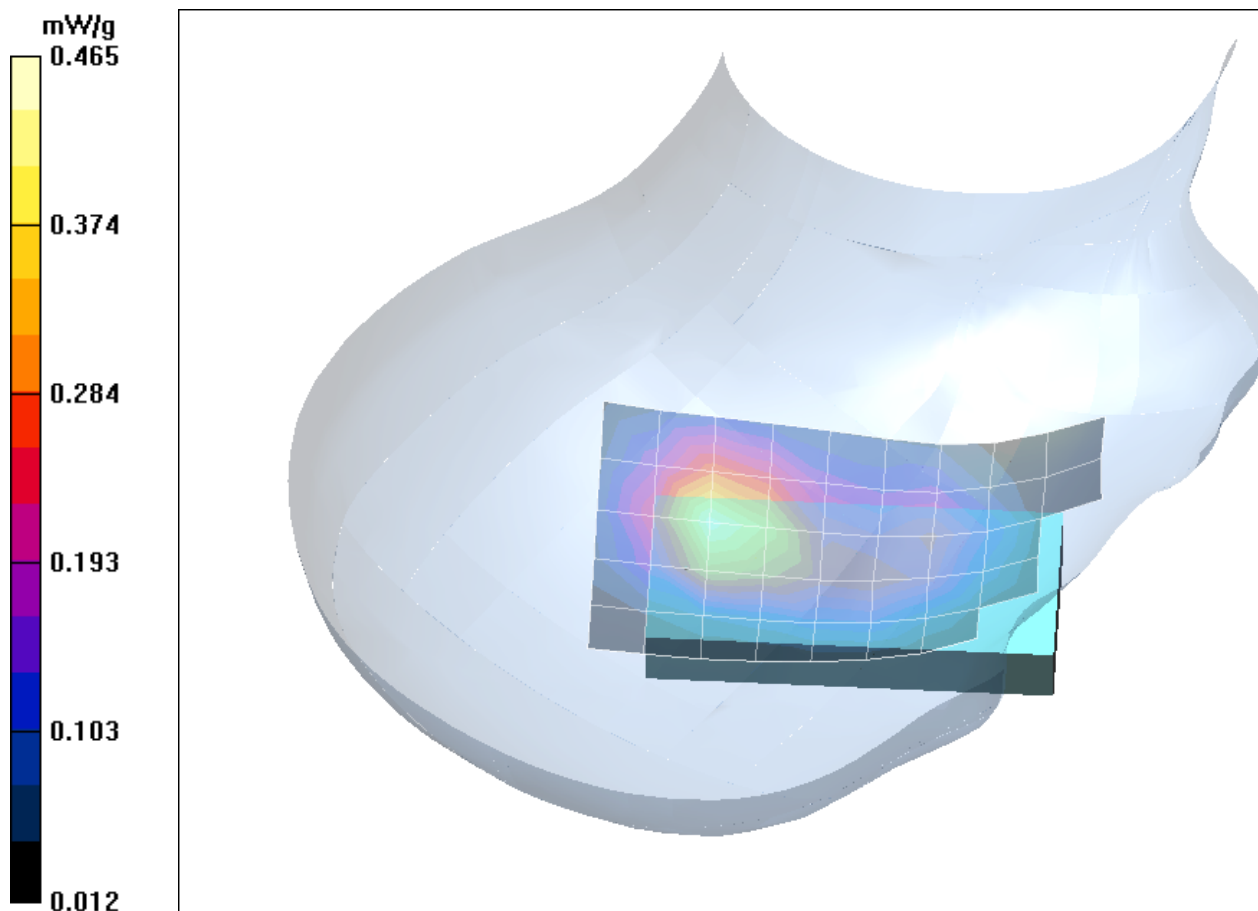


Fig. 7: SAR distribution for PCS 1900, channel 661, cheek position, right side of head, Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.7° C).

Test Laboratory: IMST GmbH; **File Name:** [BUTyprm 2.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Tilted Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Right/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.549 mW/g

Tilted Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 21 V/m; Power Drift = 0.170 dB

Peak SAR (extrapolated) = 0.809 W/kg

SAR(1 g) = 0.525 mW/g; SAR(10 g) = 0.308 mW/g

Maximum value of SAR (measured) = 0.582 mW/g

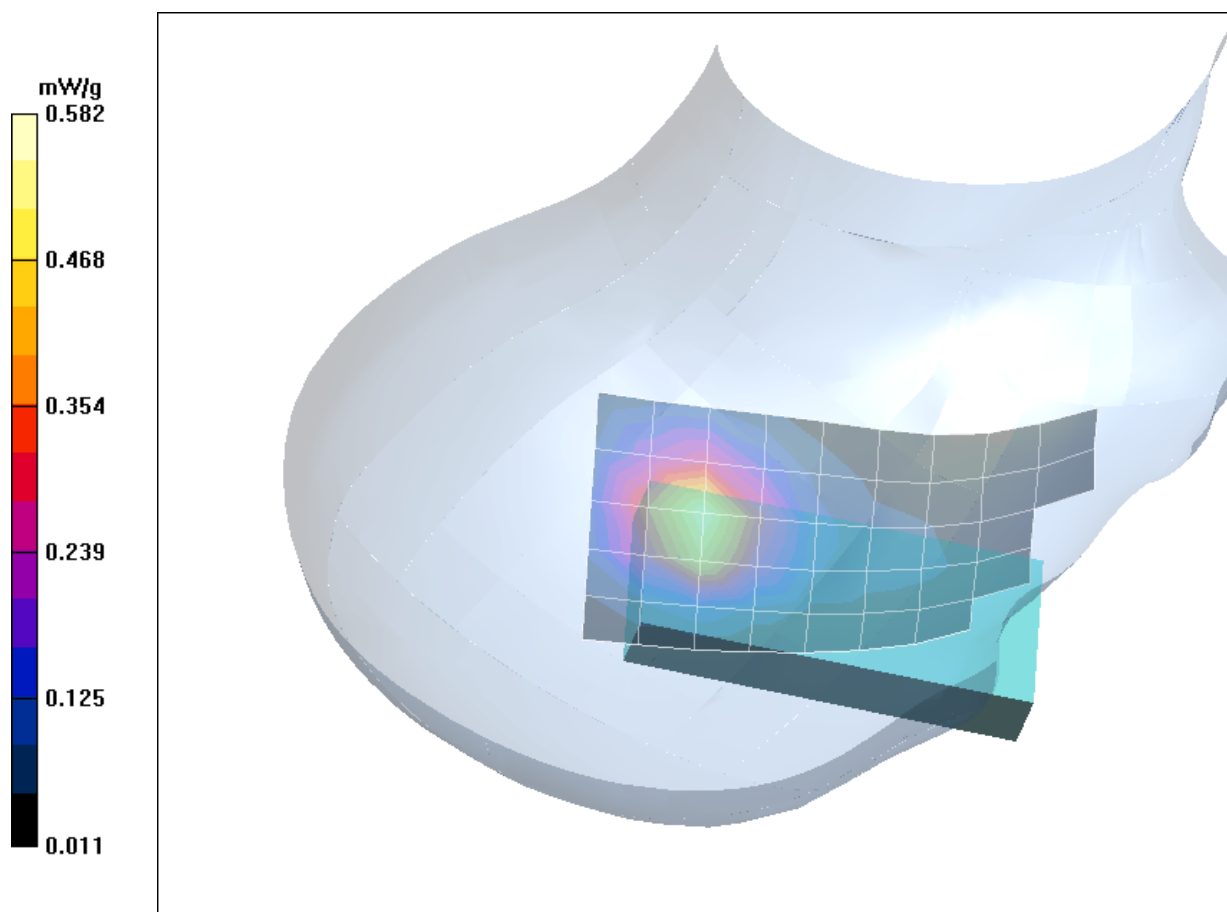


Fig. 8: SAR distribution for PCS 1900, channel 661, tilted position, right side of head, Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.7° C).

Test Laboratory: IMST GmbH; **File Name:** [ARCVplm_1.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Cheek Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Left/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.535 mW/g

Cheek Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 18.4 V/m; Power Drift = 0.068 dB

Peak SAR (extrapolated) = 0.894 W/kg

SAR(1 g) = 0.559 mW/g; SAR(10 g) = 0.326 mW/g

Maximum value of SAR (measured) = 0.611 mW/g

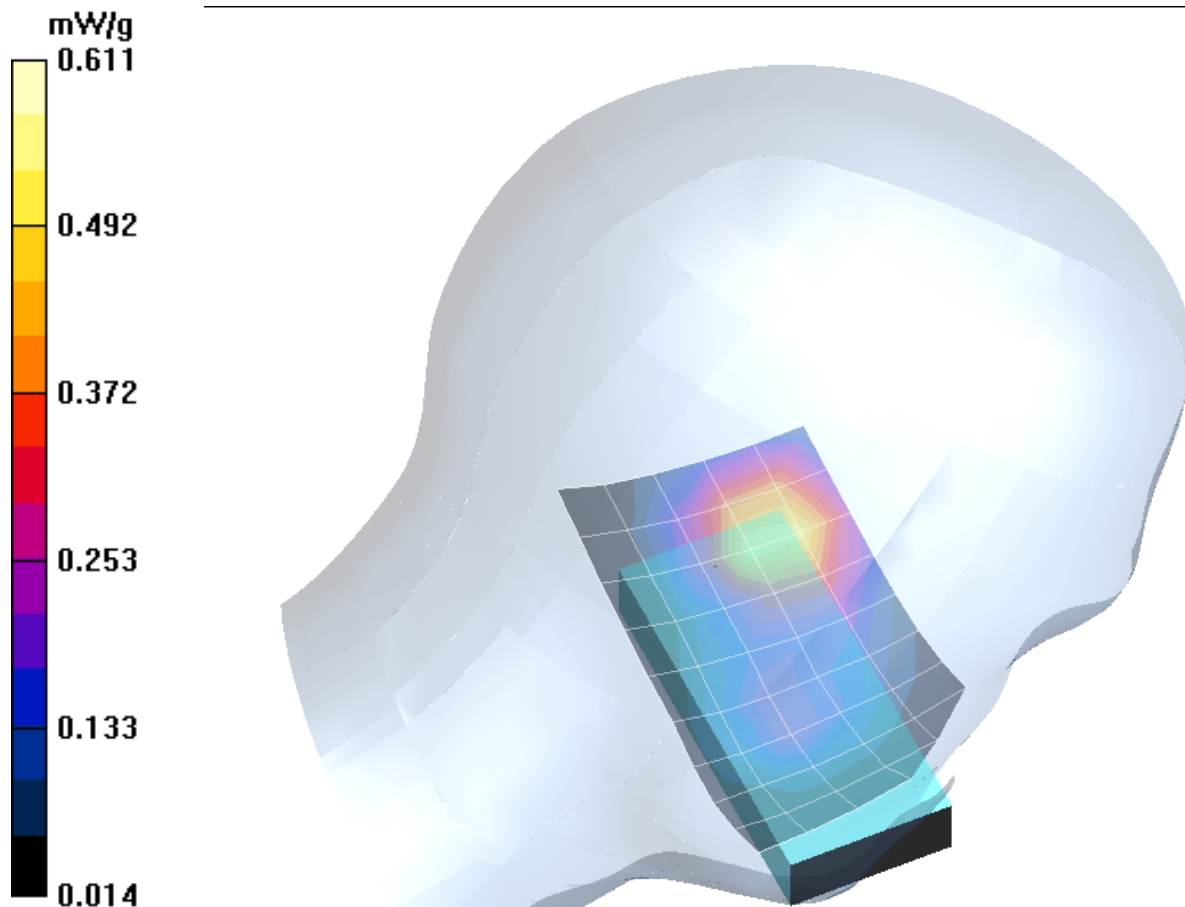


Fig. 9: SAR distribution for PCS 1900, channel 661, cheek position, left side of head, ARC. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature: 20.6° C).

Test Laboratory: IMST GmbH; **File Name:** [ARCVplm 2.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Tilted Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Left/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.572 mW/g

Tilted Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 20.8 V/m; Power Drift = 0.029 dB

Peak SAR (extrapolated) = 0.970 W/kg

SAR(1 g) = 0.609 mW/g; SAR(10 g) = 0.352 mW/g

Maximum value of SAR (measured) = 0.675 mW/g

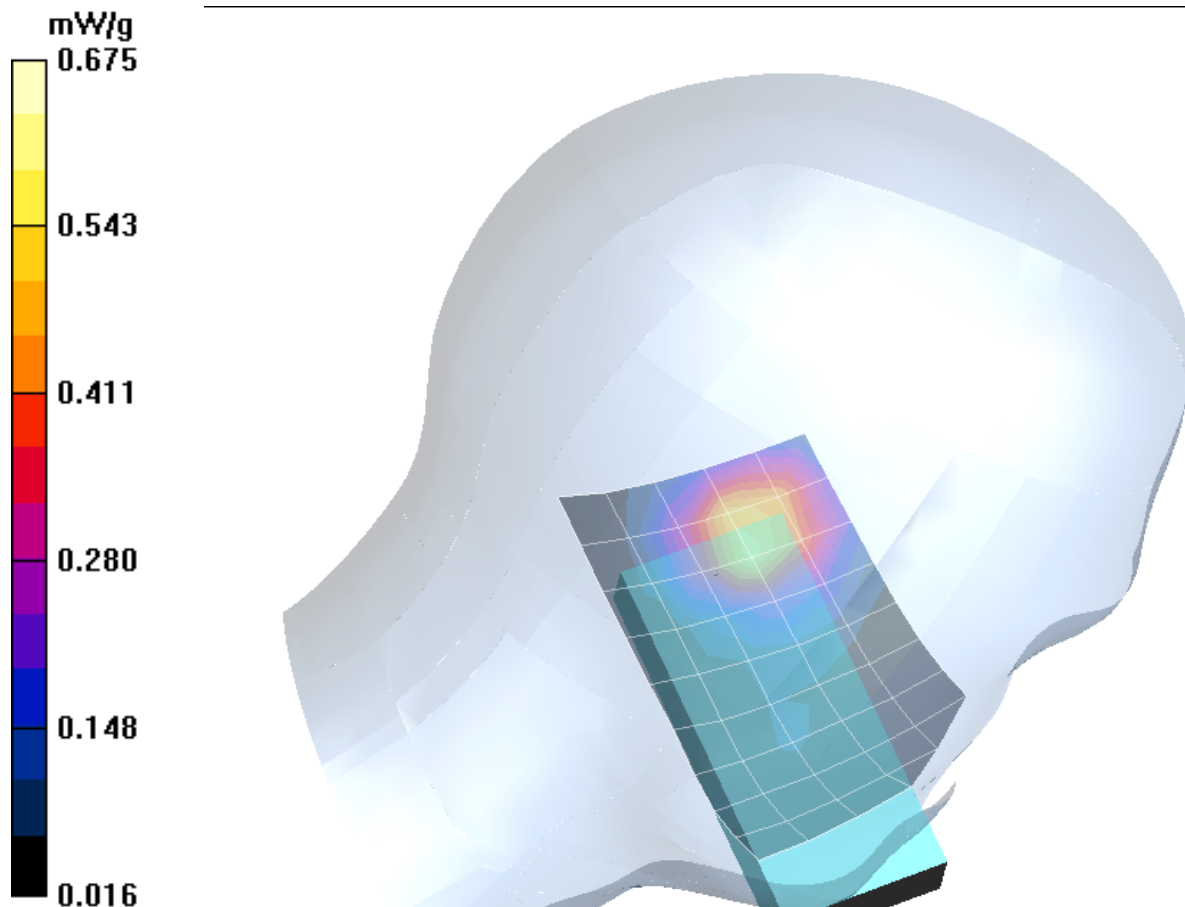


Fig. 10: SAR distribution for PCS 1900, channel 661, tilted position, left side of head, ARC. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature: 20.6° C).

Test Laboratory: IMST GmbH; **File Name:** [ARCyprm_1.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Cheek Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Right/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.499 mW/g

Cheek Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 18.5 V/m; Power Drift = -0.101 dB

Peak SAR (extrapolated) = 0.710 W/kg

SAR(1 g) = 0.476 mW/g; SAR(10 g) = 0.288 mW/g

Maximum value of SAR (measured) = 0.514 mW/g

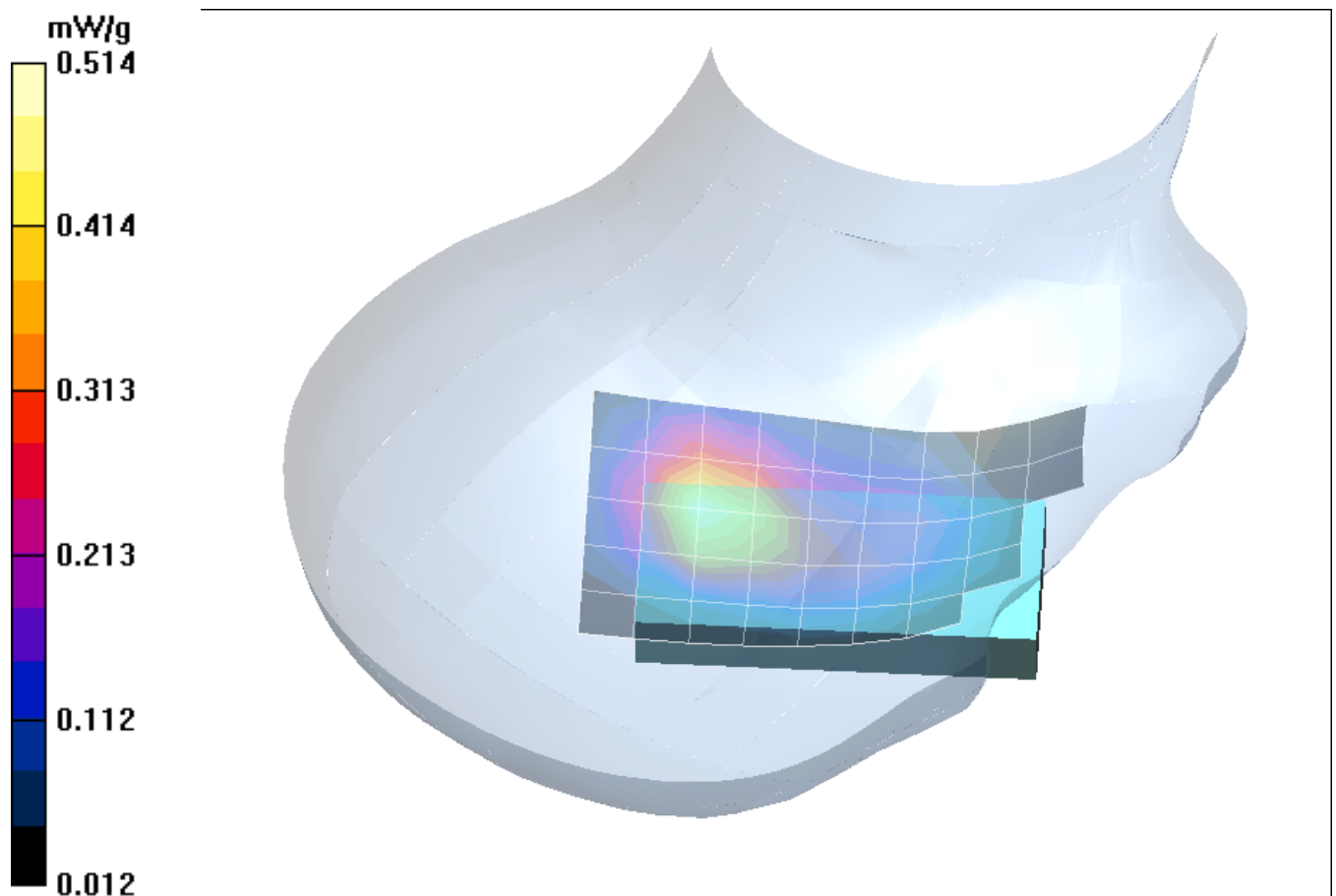


Fig. 11: SAR distribution for PCS 1900, channel 661, cheek position, right side of head, ARC. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature: 20.6° C).

Test Laboratory: IMST GmbH; File Name: [ARCyprm_2.da4](#)

DUT: Siemens; Type: CX 70; Serial: 004999003401170

Program Name: Tilted Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Right/Area Scan (6x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.589 mW/g

Tilted Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 21.5 V/m; Power Drift = 0.056 dB

Peak SAR (extrapolated) = 0.847 W/kg

SAR(1 g) = 0.551 mW/g; SAR(10 g) = 0.322 mW/g

Maximum value of SAR (measured) = 0.601 mW/g

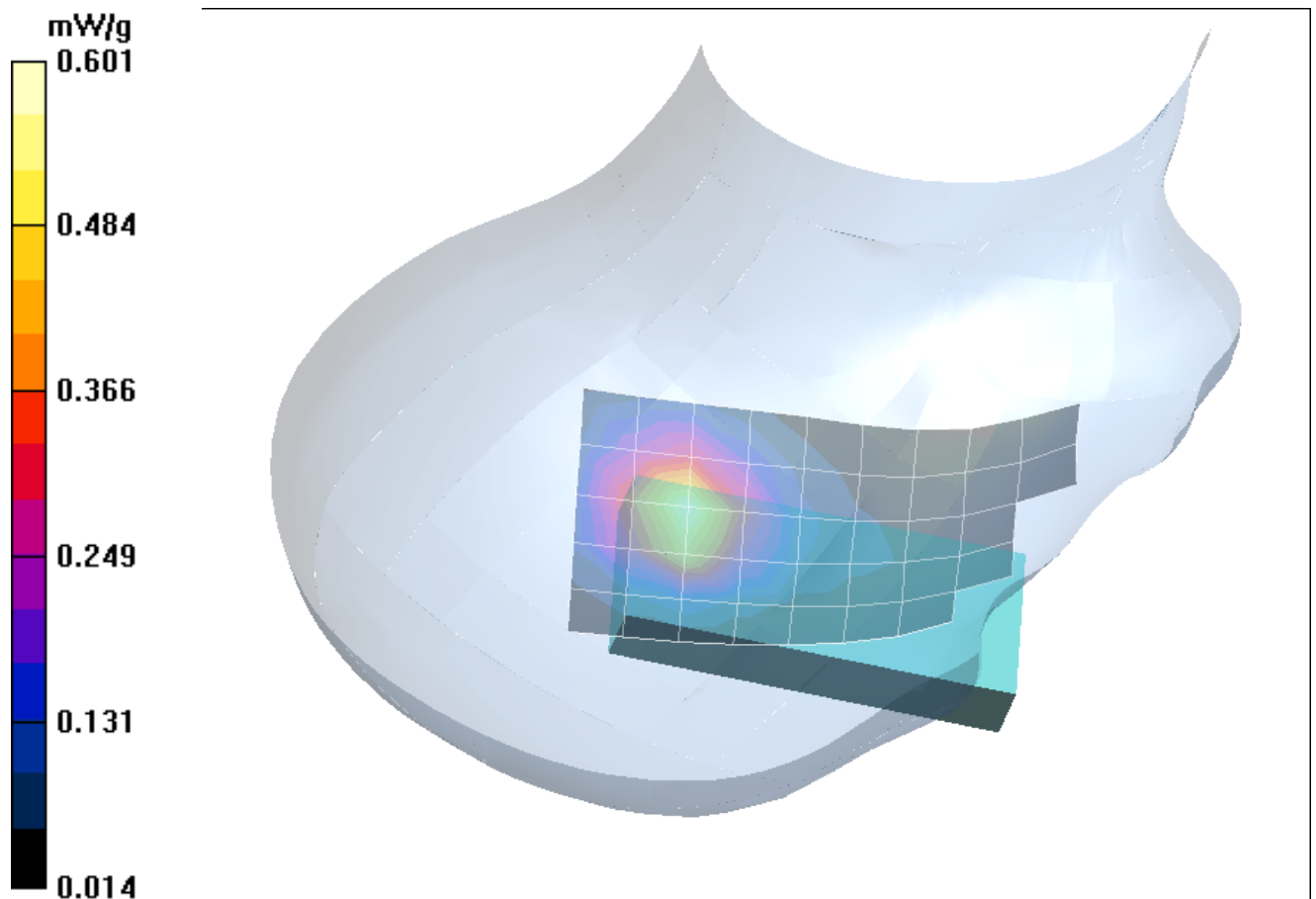


Fig. 12: SAR distribution for PCS 1900, channel 661, tilted position, right side of head, ARC. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature: 20.7° C).

2 SAR Distribution Plots, PCS 1900 Head with Flash

Test Laboratory: IMST GmbH; File Name: [STDvplm_1_flash.da4](#)

DUT: Siemens; Type: CX 70 + Flash; Serial: 004999003401170

Program Name: Cheek Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Left/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.530 mW/g

Cheek Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 18.2 V/m; Power Drift = -0.041 dB

Peak SAR (extrapolated) = 0.880 W/kg

SAR(1 g) = 0.546 mW/g; SAR(10 g) = 0.317 mW/g

Maximum value of SAR (measured) = 0.597 mW/g

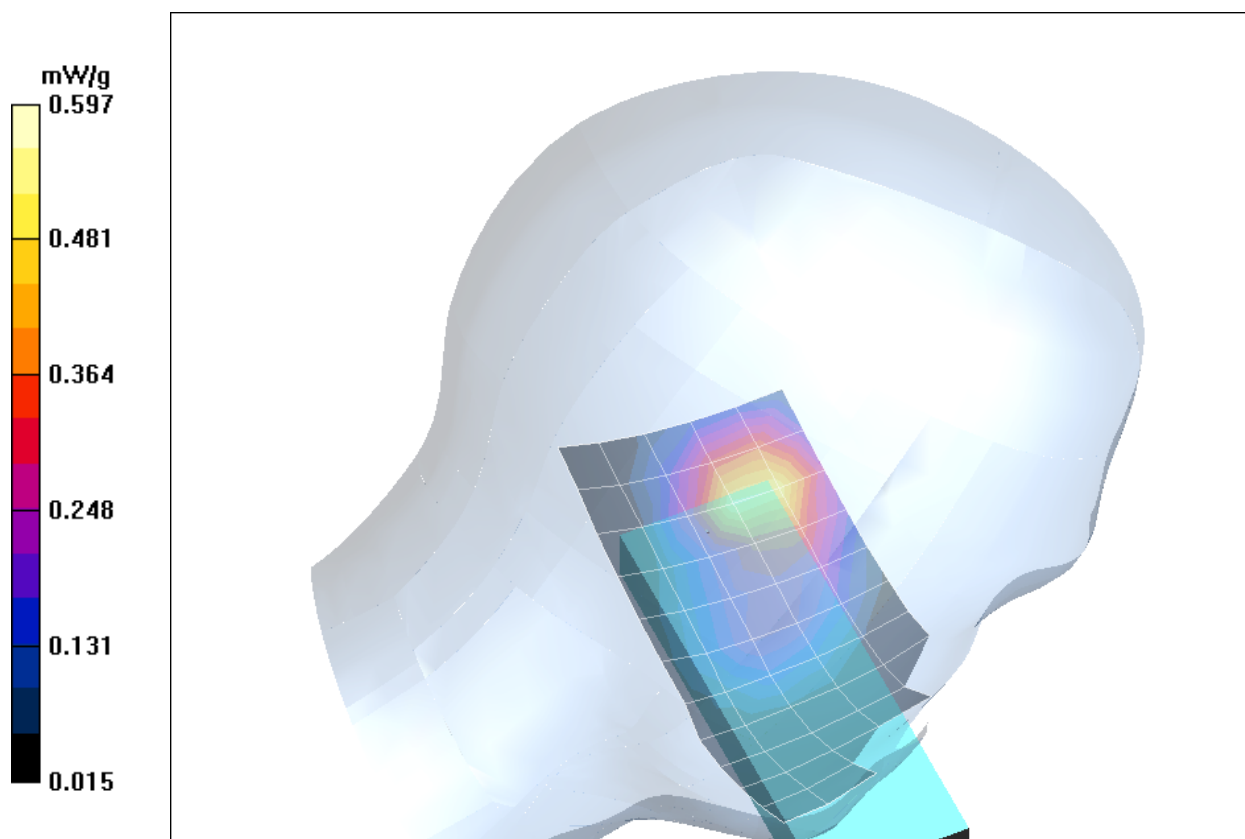


Fig. 13: SAR distribution for PCS 1900, channel 661, cheek position, left side of head, Standard. (21.10.2004; Ambient Temperature: 21.8° C; Liquid Temperature : 20.8° C).

Test Laboratory: IMST GmbH; **File Name:** [STDyplm 2 flash.da4](#)

DUT: Siemens; **Type:** CX 70 + Flash; **Serial:** 004999003401170

Program Name: Tilted Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Left/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.632 mW/g

Tilted Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 19.4 V/m; Power Drift = 0.077 dB

Peak SAR (extrapolated) = 0.940 W/kg

SAR(1 g) = 0.588 mW/g; SAR(10 g) = 0.337 mW/g

Maximum value of SAR (measured) = 0.646 mW/g

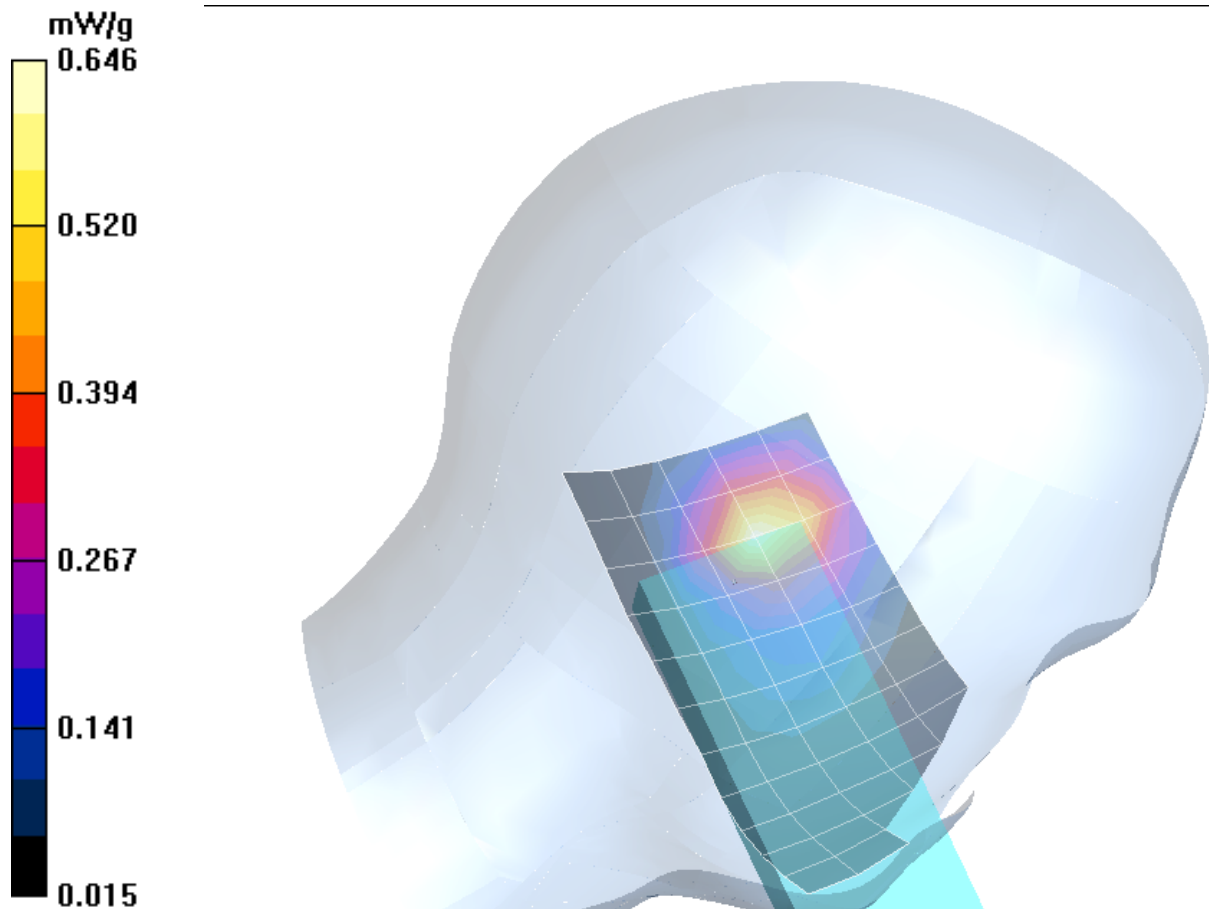


Fig. 14: SAR distribution for PCS 1900, channel 661, tilted position, left side of head, Standard. (21.10.2004; Ambient Temperature: 21.8° C; Liquid Temperature : 20.8° C).

Test Laboratory: IMST GmbH; File Name: [STDyprm_1_flash.da4](#)

DUT: Siemens; Type: CX 70 + Flash; Serial: 004999003401170

Program Name: Cheek Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Right/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.459 mW/g

Cheek Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 18.0 V/m; Power Drift = -0.002 dB

Peak SAR (extrapolated) = 0.677 W/kg

SAR(1 g) = 0.455 mW/g; SAR(10 g) = 0.285 mW/g

Maximum value of SAR (measured) = 0.495 mW/g

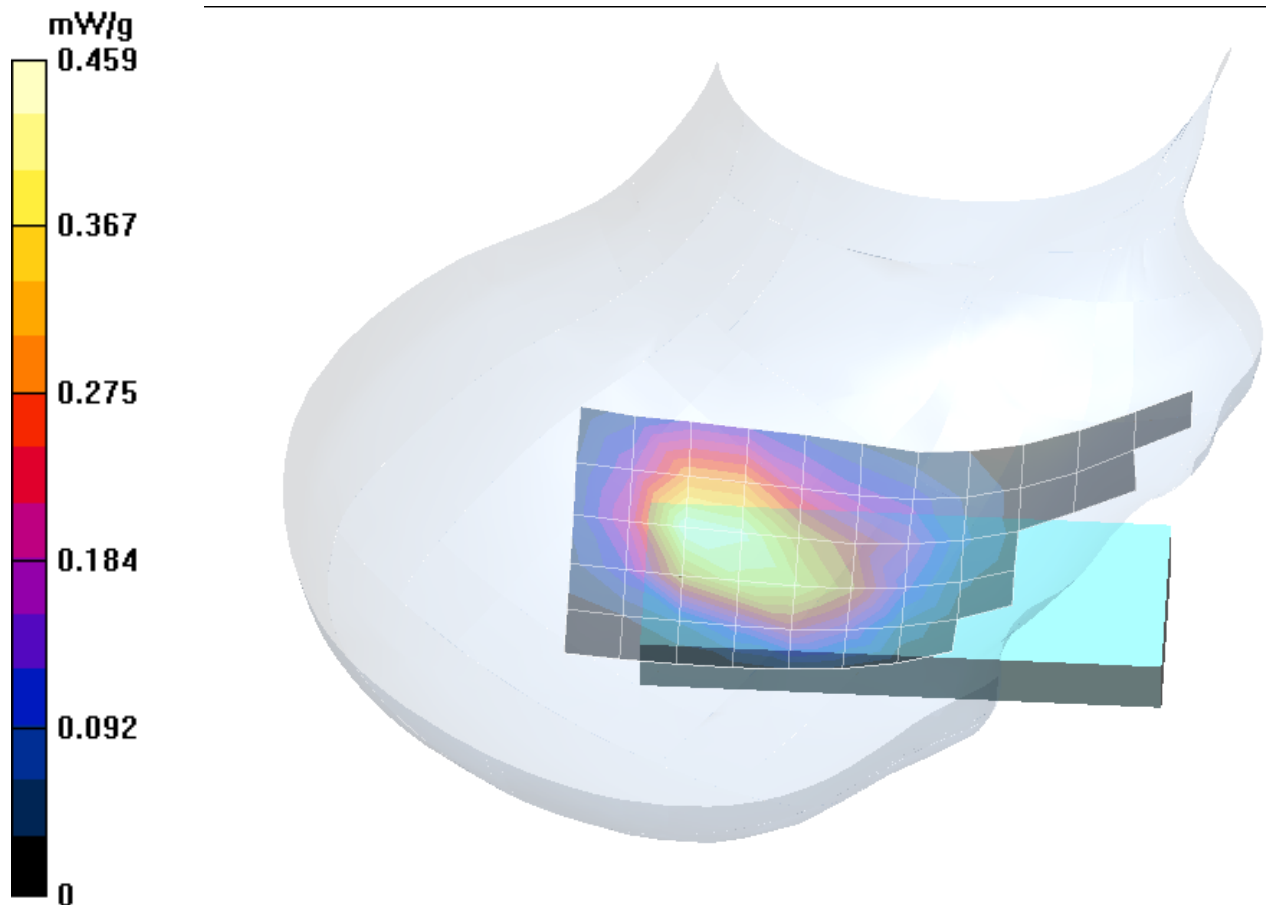


Fig. 15: SAR distribution for PCS 1900, channel 661, cheek position, right side of head, Standard. (21.10.2004; Ambient Temperature: 21.7° C; Liquid Temperature : 20.8° C).

Test Laboratory: IMST GmbH; **File Name:** [STDyprm 2 flash.da4](#)

DUT: Siemens; **Type:** CX 70 + Flash; **Serial:** 004999003401170

Program Name: Tilted Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Right/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.549 mW/g

Tilted Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 20.6 V/m; Power Drift = 0.128 dB

Peak SAR (extrapolated) = 0.780 W/kg

SAR(1 g) = 0.505 mW/g; SAR(10 g) = 0.300 mW/g

Maximum value of SAR (measured) = 0.552 mW/g

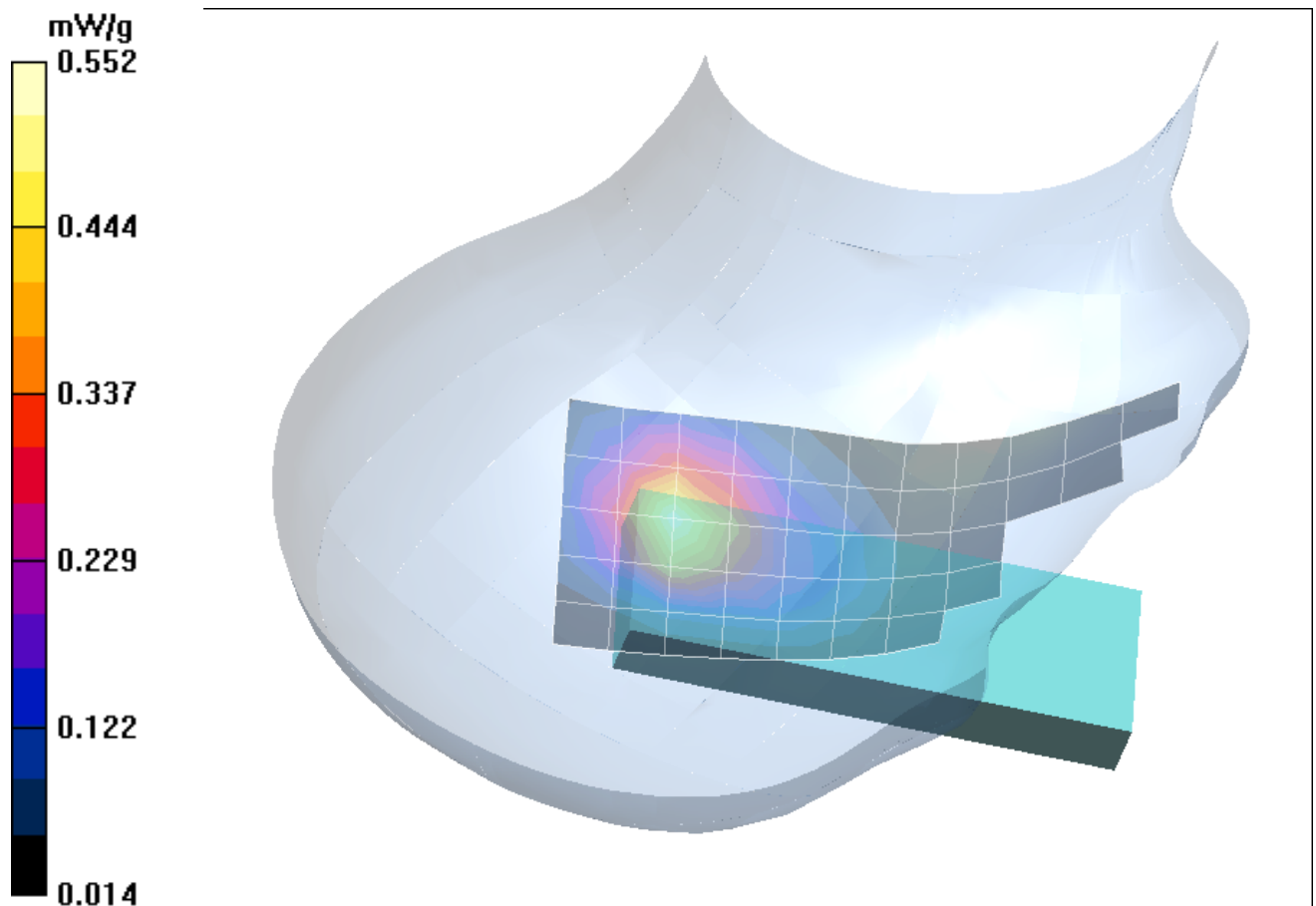


Fig. 16: SAR distribution for PCS 1900, channel 661, tilted position, right side of head, Standard. (21.10.2004; Ambient Temperature: 21.8 °C; Liquid Temperature : 20.8° C)

Test Laboratory: IMST GmbH; File Name: [BUTyplm_1_flash.da4](#)

DUT: Siemens; Type: CX 70 + Flash; Serial: 004999003401170

Program Name: Cheek Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Left/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.545 mW/g

Cheek Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 18.1 V/m; Power Drift = 0.186 dB

Peak SAR (extrapolated) = 0.892 W/kg

SAR(1 g) = 0.556 mW/g; SAR(10 g) = 0.321 mW/g

Maximum value of SAR (measured) = 0.610 mW/g

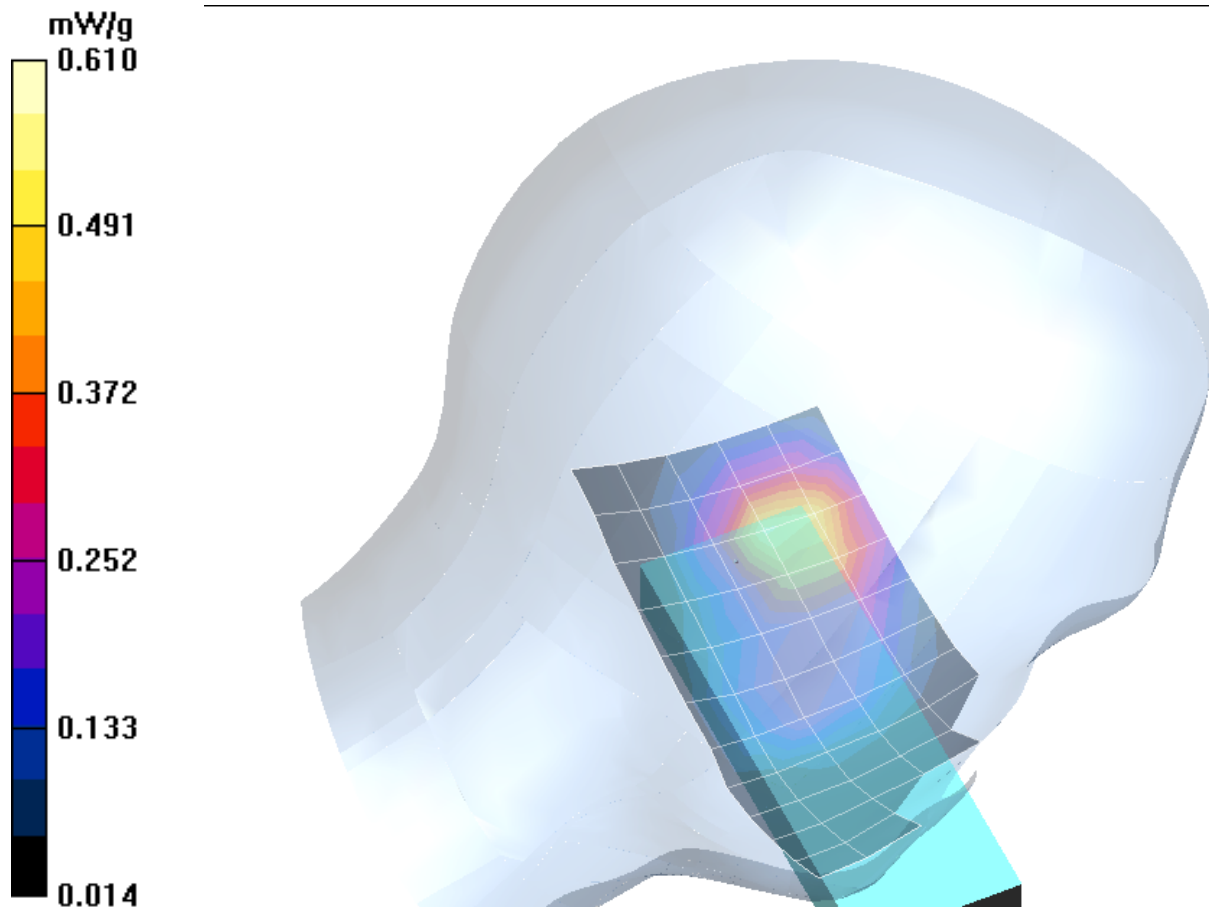


Fig. 17: SAR distribution for PCS 1900, channel 661, cheek position, left side of head Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.6° C).

Test Laboratory: IMST GmbH; **File Name:** [BUTyplm 2 flash.da4](#)

DUT: Siemens; **Type:** CX 70 + Flash; **Serial:** 004999003401170

Program Name: Tilted Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000 \text{ kg/m}^3$

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Left/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.567 mW/g

Tilted Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 18.8 V/m; Power Drift = -0.169 dB

Peak SAR (extrapolated) = 0.867 W/kg

SAR(1 g) = 0.531 mW/g; SAR(10 g) = 0.303 mW/g

Maximum value of SAR (measured) = 0.581 mW/g

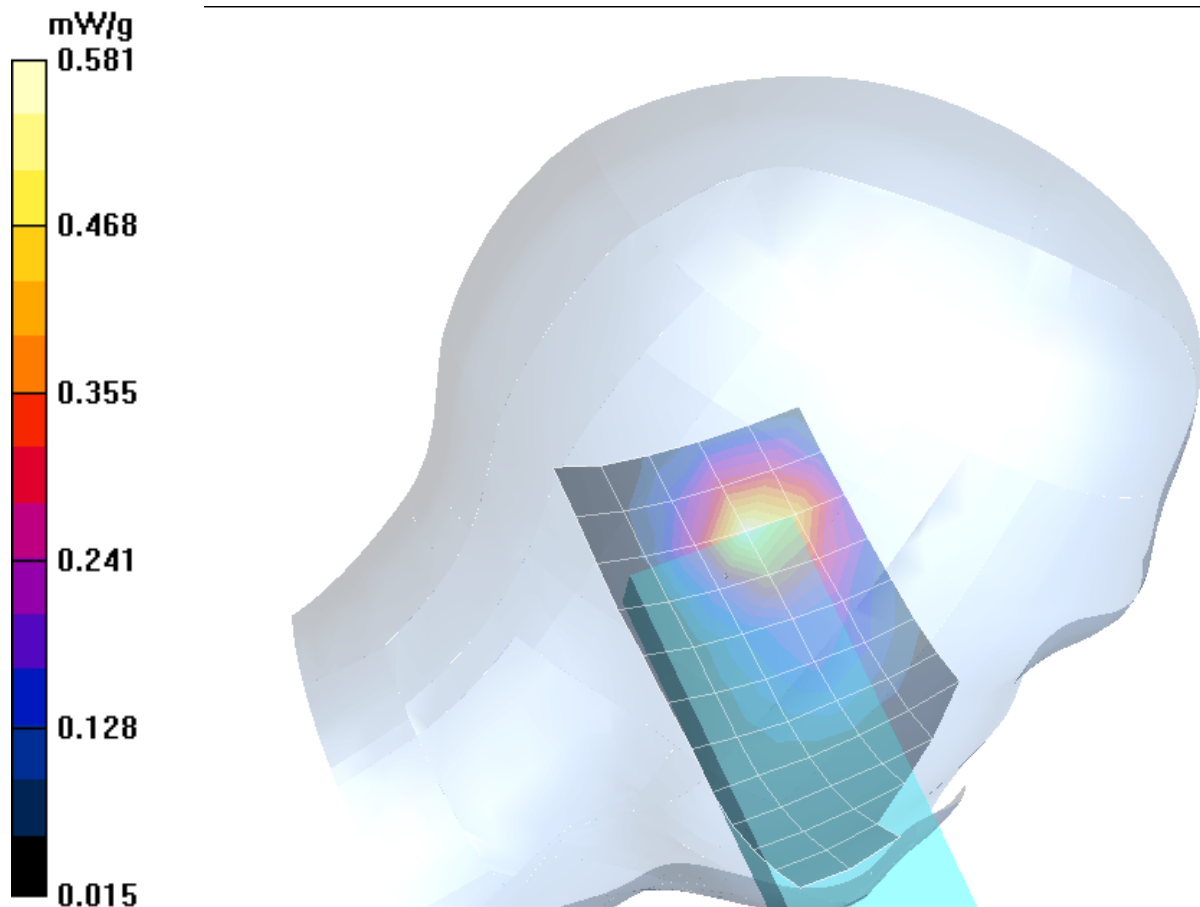


Fig. 18: SAR distribution for PCS 1900, channel 661, tilted position, left side of head Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.6° C).

Test Laboratory: IMST GmbH; **File Name:** [BUTyprm_1_flash.da4](#)

DUT: Siemens; **Type:** CX 70 + Flash; **Serial:** 004999003401170

Program Name: Cheek Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Right/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.422 mW/g

Cheek Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 17.7 V/m; Power Drift = -0.107 dB

Peak SAR (extrapolated) = 0.629 W/kg

SAR(1 g) = 0.426 mW/g; SAR(10 g) = 0.265 mW/g

Maximum value of SAR (measured) = 0.460 mW/g

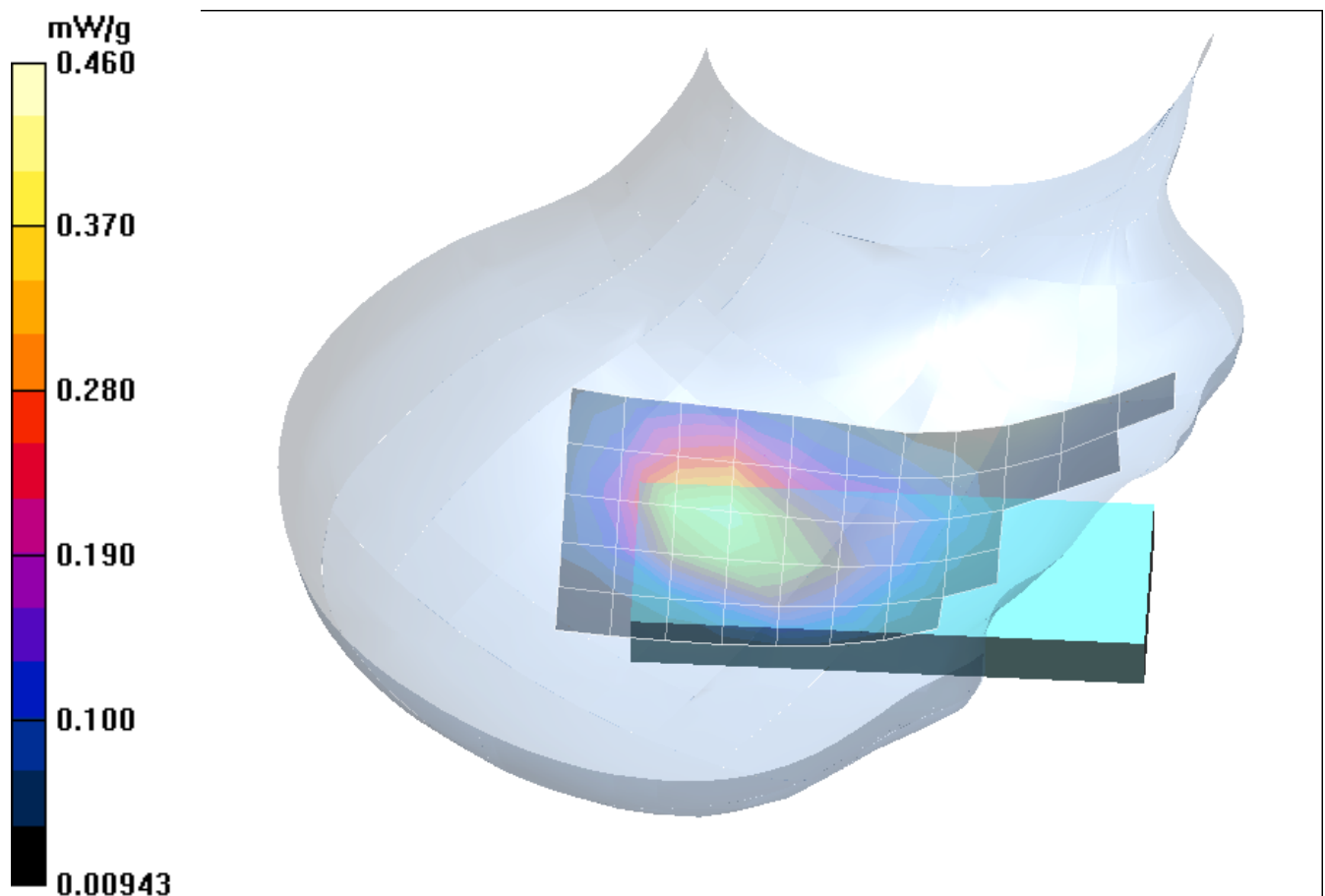


Fig. 19: SAR distribution for PCS 1900, channel 661, cheek position, right side of head Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.7° C).

Test Laboratory: IMST GmbH; **File Name:** [BUTyprm 2 flash.da4](#)

DUT: Siemens; **Type:** CX 70 + Flash; **Serial:** 004999003401170

Program Name: Tilted Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Right/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.453 mW/g

Tilted Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 19.1 V/m; Power Drift = 0.053 dB

Peak SAR (extrapolated) = 0.678 W/kg

SAR(1 g) = 0.434 mW/g; SAR(10 g) = 0.257 mW/g

Maximum value of SAR (measured) = 0.470 mW/g

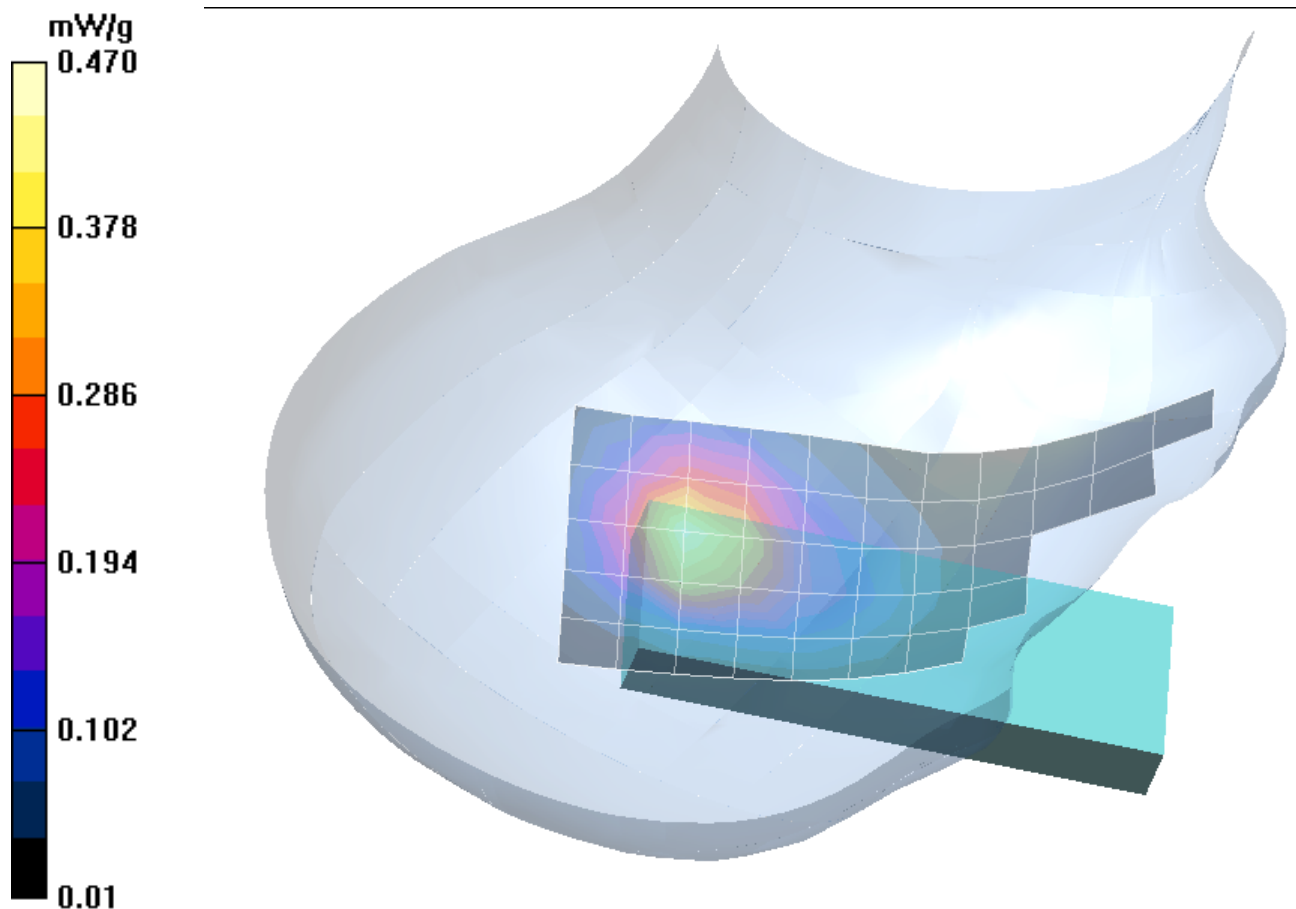


Fig. 20: SAR distribution for PCS 1900, channel 661, tilted position, right side of head Butterfly. (21.10.2004; Ambient Temperature: 21.8° C; Liquid Temperature :20.7° C).

Test Laboratory: IMST GmbH; **File Name:** [ARCVplm_1_flash.da4](#)

DUT: Siemens; **Type:** CX 70 + Flash; **Serial:** 004999003401170

Program Name: Cheek Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000$ kg/m³

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Left/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.490 mW/g

Cheek Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 17.2 V/m; Power Drift = 0.007 dB

Peak SAR (extrapolated) = 0.844 W/kg

SAR(1 g) = 0.519 mW/g; SAR(10 g) = 0.298 mW/g

Maximum value of SAR (measured) = 0.570 mW/g

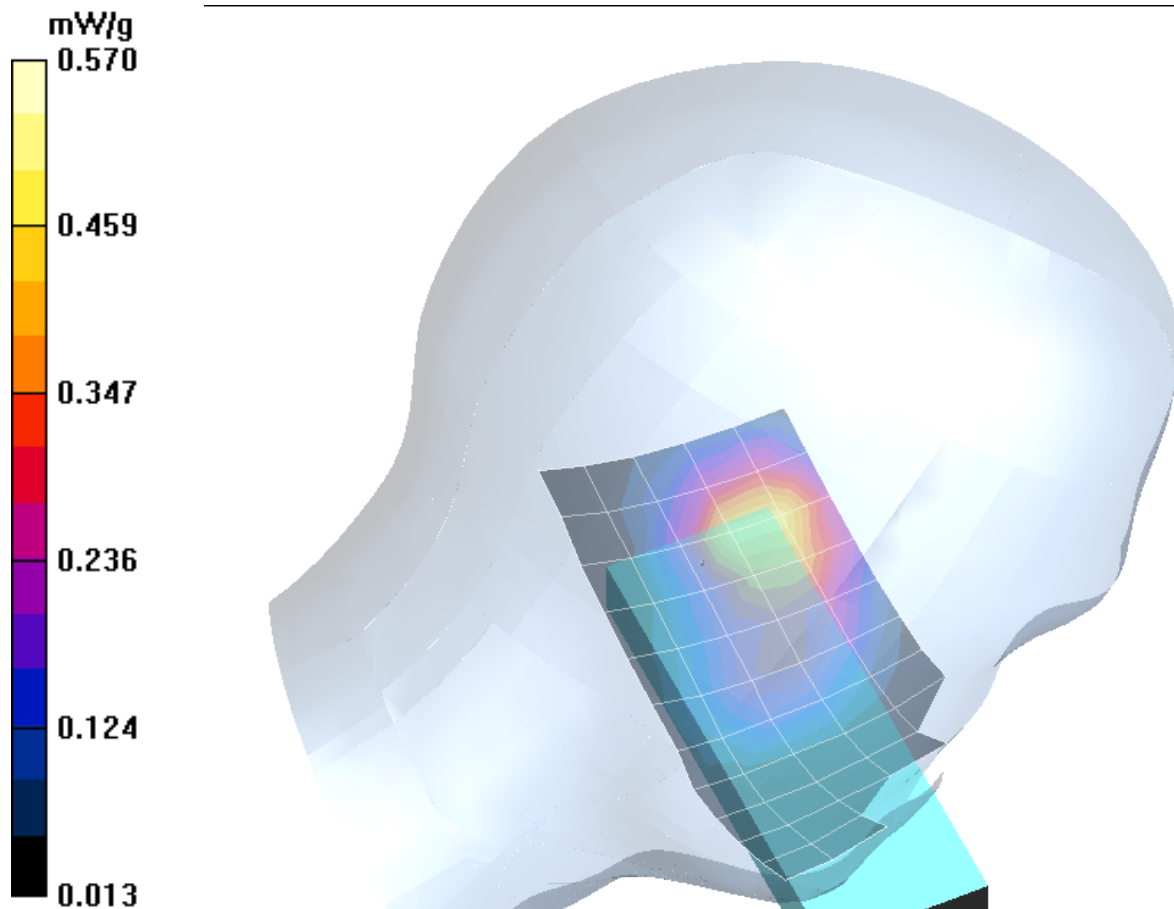


Fig. 21: SAR distribution for PCS 1900, channel 661, cheek position, left side of head ARC. (21.10.2004; Ambient Temperature: 21.7° C; Liquid Temperature : 20.7° C).

Test Laboratory: IMST GmbH; **File Name:** [ARCVplm 2 flash.da4](#)

DUT: Siemens; **Type:** CX 70 + Flash; **Serial:** 004999003401170

Program Name: Tilted Left

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000 \text{ kg/m}^3$

Phantom section: Left Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Left/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.560 mW/g

Tilted Left/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 19 V/m; Power Drift = 0.090 dB

Peak SAR (extrapolated) = 0.862 W/kg

SAR(1 g) = 0.535 mW/g; SAR(10 g) = 0.307 mW/g

Maximum value of SAR (measured) = 0.595 mW/g

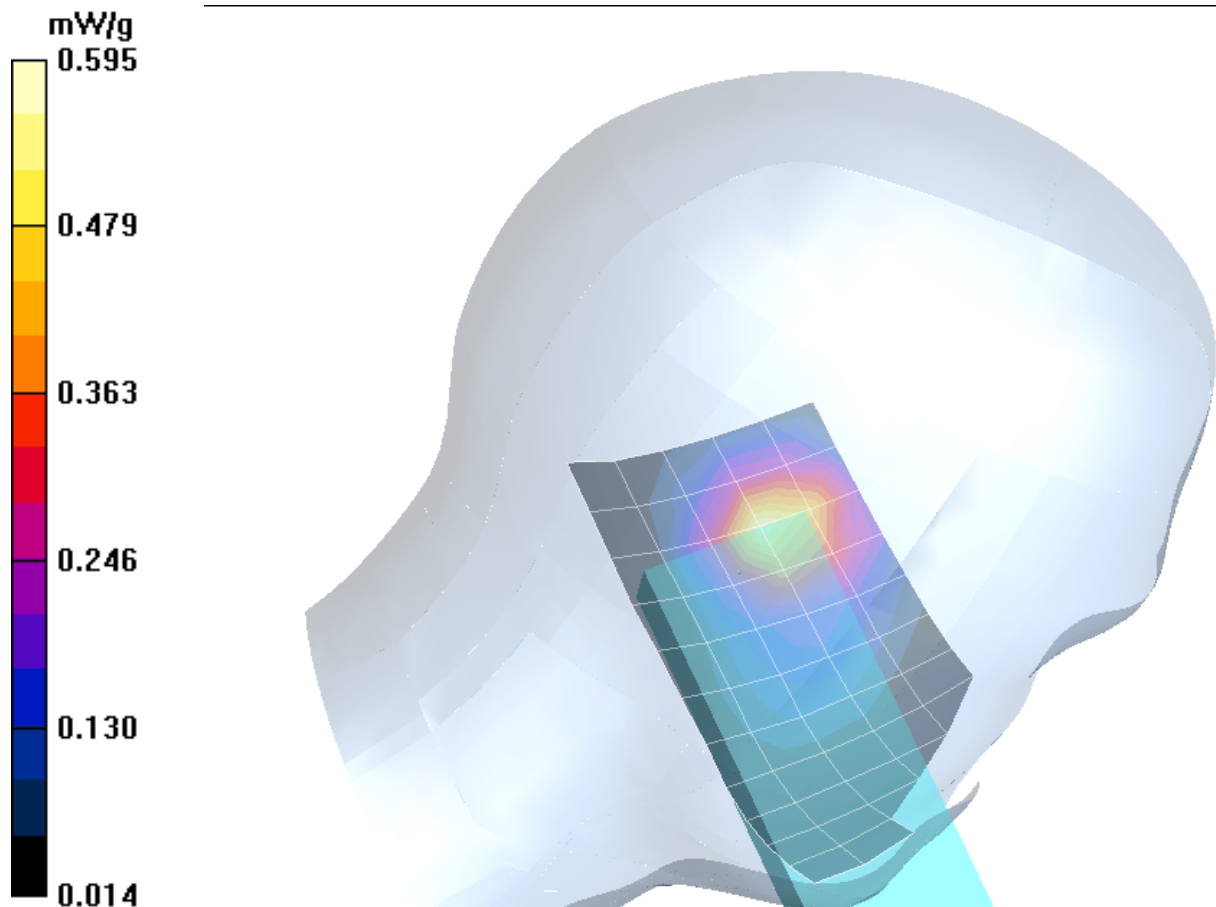


Fig. 22: SAR distribution for PCS 1900, channel 661, tilted position, left side of head ARC. (21.10.2004; Ambient Temperature: 21.6° C; Liquid Temperature : 20.7° C).

Test Laboratory: IMST GmbH; File Name: [ARCVprm_1_flash.da4](#)

DUT: Siemens; Type: CX 70 + Flash; Serial: 004999003401170

Program Name: Cheek Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000 \text{ kg/m}^3$

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Cheek Right/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.455 mW/g

Cheek Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 18.1 V/m; Power Drift = 0.001 dB

Peak SAR (extrapolated) = 0.679 W/kg

SAR(1 g) = 0.458 mW/g; SAR(10 g) = 0.284 mW/g

Maximum value of SAR (measured) = 0.497 mW/g

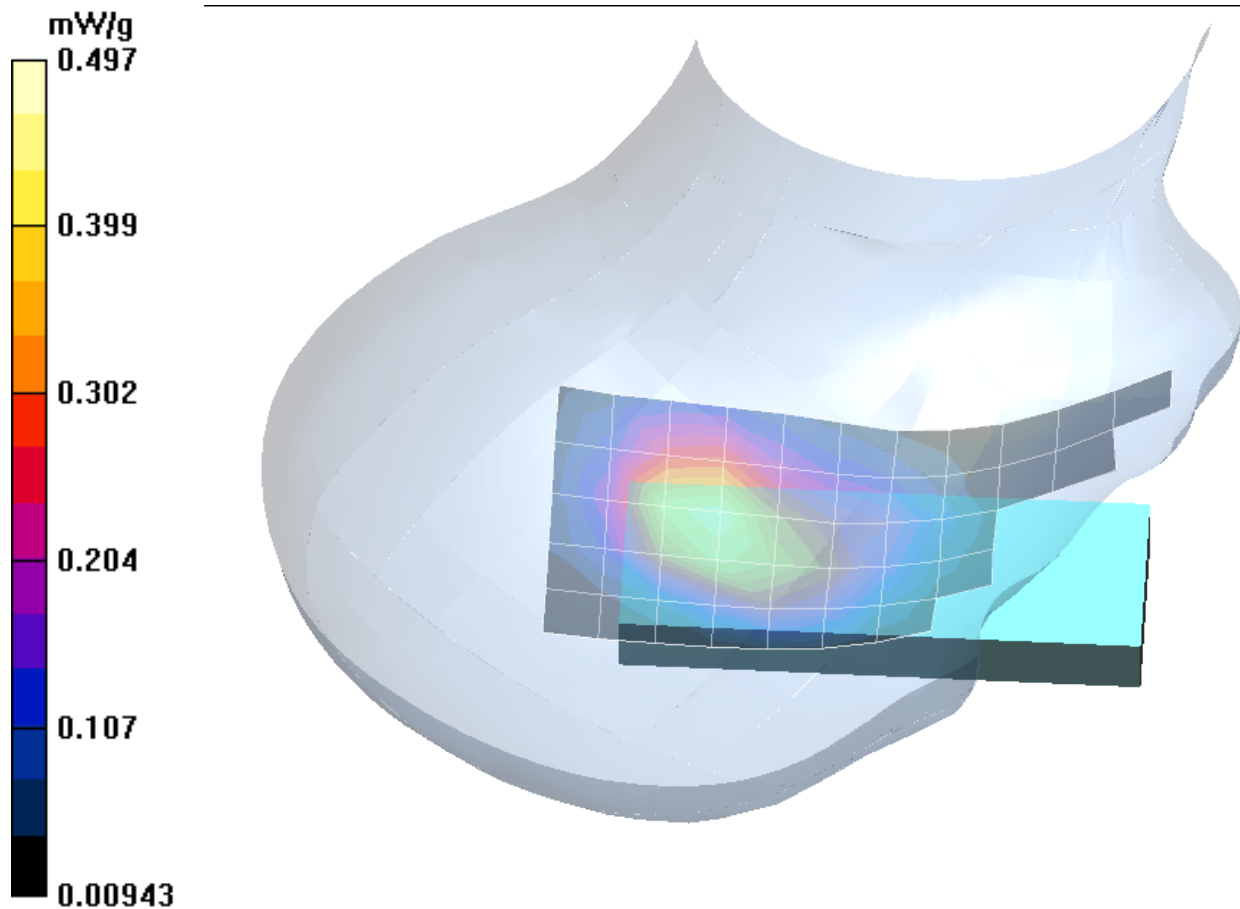


Fig. 23: SAR distribution for PCS 1900, channel 661, cheek position, right side of head ARC. (21.10.2004; Ambient Temperature: 21.7° C; Liquid Temperature : 20.7° C).

Test Laboratory: IMST GmbH; **File Name:** [ARCyprm_2_flash.da4](#)

DUT: Siemens; **Type:** CX 70 + Flash; **Serial:** 004999003401170

Program Name: Tilted Right

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.38$; mho/m, $\epsilon_r = 38.7$; $\rho = 1000 \text{ kg/m}^3$

Phantom section: Right Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(5.19, 5.19, 5.19); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Tilted Right/Area Scan (6x12x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.471 mW/g

Tilted Right/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 19.2 V/m; Power Drift = 0.029 dB

Peak SAR (extrapolated) = 0.680 W/kg

SAR(1 g) = 0.443 mW/g; SAR(10 g) = 0.264 mW/g

Maximum value of SAR (measured) = 0.483 mW/g

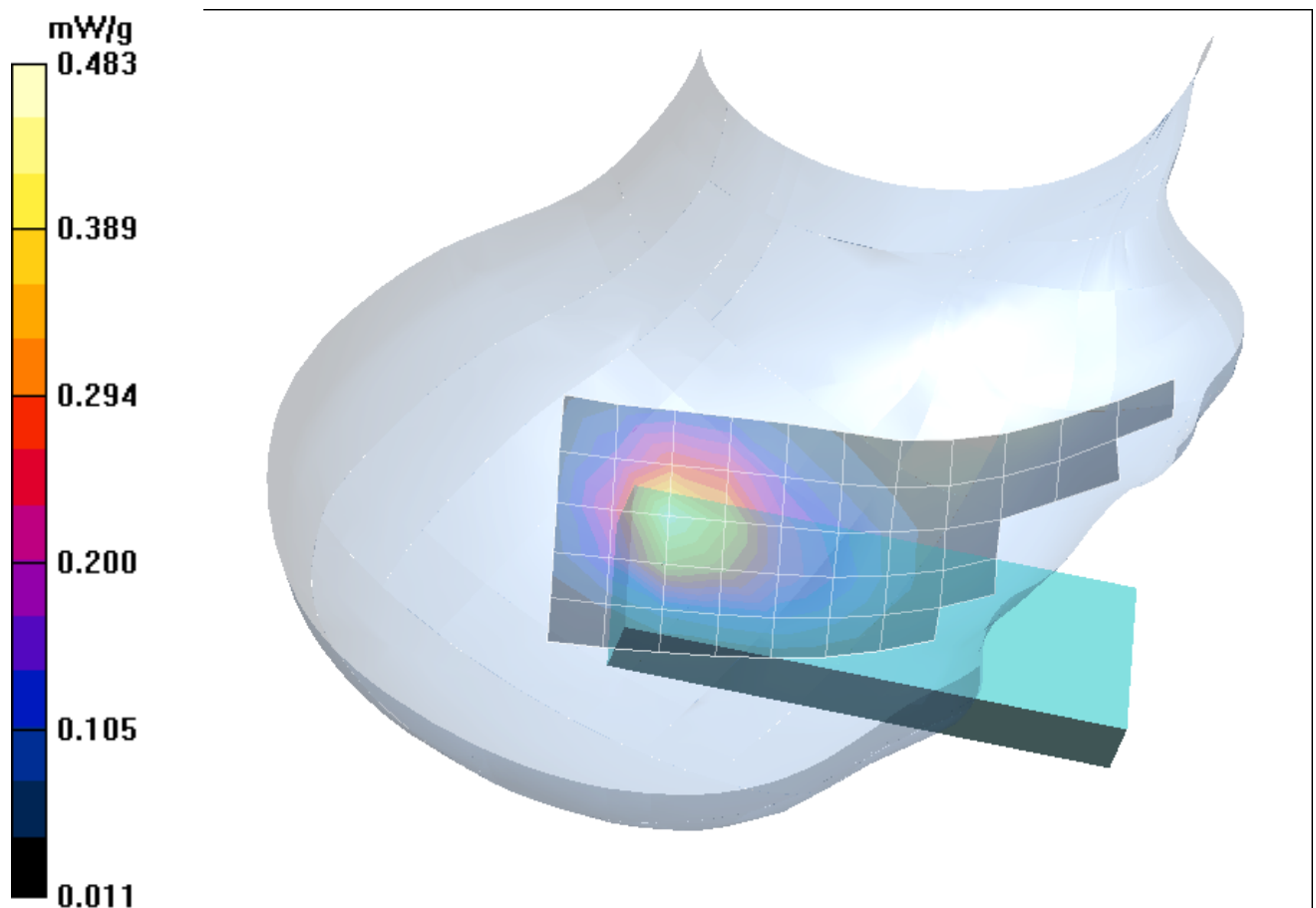


Fig. 24: SAR distribution for PCS 1900, channel 661, tilted position, right side of head ARC. (21.10.2004; Ambient Temperature: 21.7° C; Liquid Temperature : 20.7° C).

3 SAR Distribution Plots, PCS 1900 Body with headset (gap = 22 mm)

Test Laboratory: IMST GmbH; File Name: [STDvphm_3.da4](#)

DUT: Siemens; Type: CX 70; Serial: 004999003401170

Program Name: Body Worn

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.58$; mho/m, $\epsilon_r = 54$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(4.57, 4.57, 4.57); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Body Worn/Area Scan (6x11x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.361 mW/g

Body Worn/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 7.74 V/m; Power Drift = -0.015 dB

Peak SAR (extrapolated) = 0.565 W/kg

SAR(1 g) = 0.349 mW/g; SAR(10 g) = 0.207 mW/g

Maximum value of SAR (measured) = 0.380 mW/g

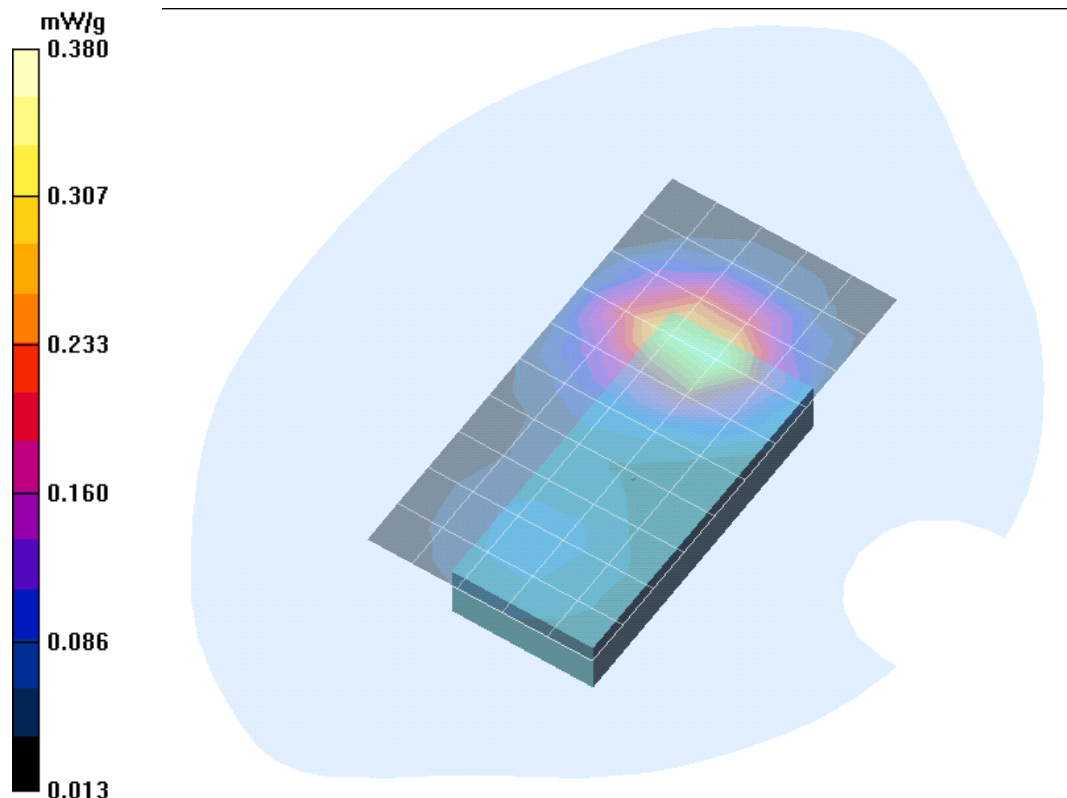


Fig. 25: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, Standard cover, (29.10.2004; Ambient Temperature: 21.6° C; Liquid Temperature : 20.6° C).

Test Laboratory: IMST GmbH; **File Name:** [BUTyphm_3.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Body Worn

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.58$; mho/m, $\epsilon_r = 54$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(4.57, 4.57, 4.57); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Body Worn/Area Scan (6x11x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.379 mW/g

Body Worn/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 7.64 V/m; Power Drift = 0.109 dB

Peak SAR (extrapolated) = 0.603 W/kg

SAR(1 g) = 0.370 mW/g; SAR(10 g) = 0.221 mW/g

Maximum value of SAR (measured) = 0.404 mW/g

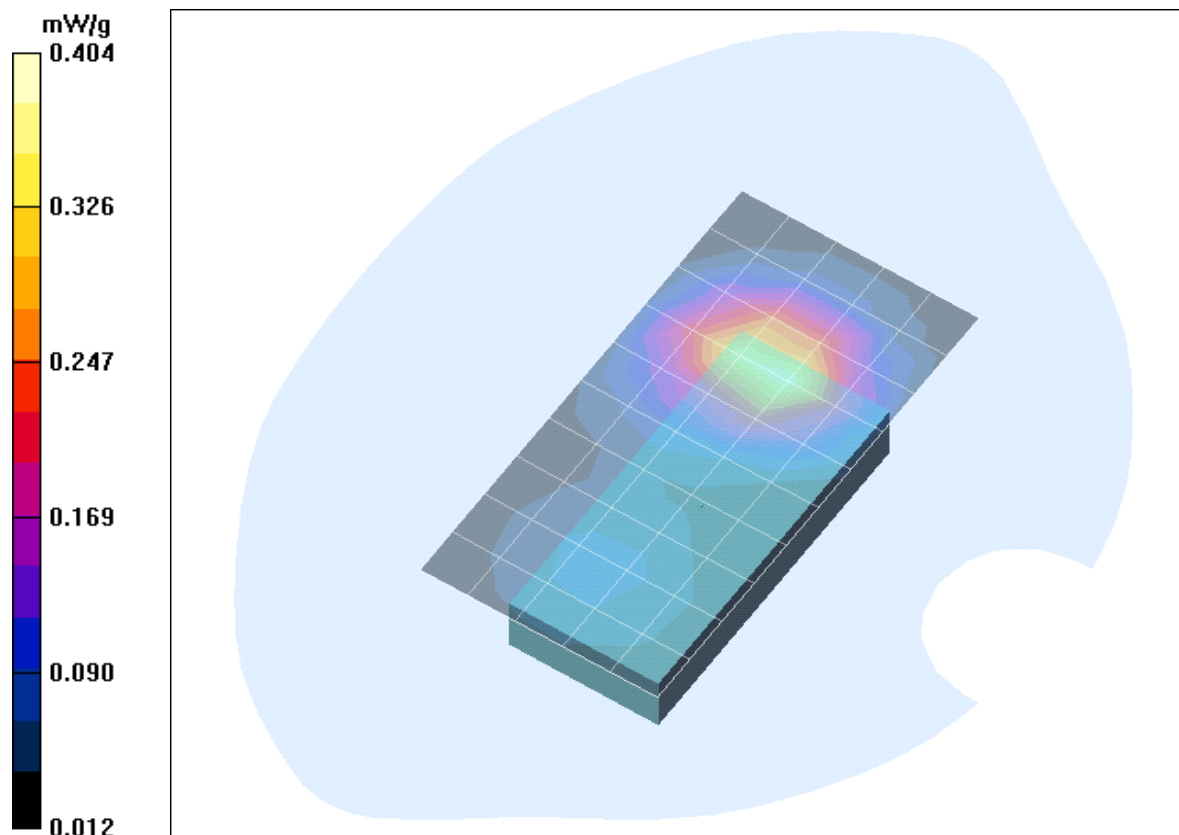


Fig. 26: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, Butterfly cover, (29.10.2004; Ambient Temperature: 21.5° C; Liquid Temperature : 20.6° C).

Test Laboratory: IMST GmbH; **File Name:** [ARCvphm_3.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Body Worn

Communication System: GSM 1900; Frequency: 1880 MHz; Duty Cycle: 1:8.3

Medium parameters used: $\sigma = 1.58$; mho/m, $\epsilon_r = 54$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(4.57, 4.57, 4.57); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Body Worn/Area Scan (6x11x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.330 mW/g

Body Worn/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 6.08 V/m; Power Drift = 0.075 dB

Peak SAR (extrapolated) = 0.562 W/kg

SAR(1 g) = 0.345 mW/g; SAR(10 g) = 0.205 mW/g

Maximum value of SAR (measured) = 0.376 mW/g

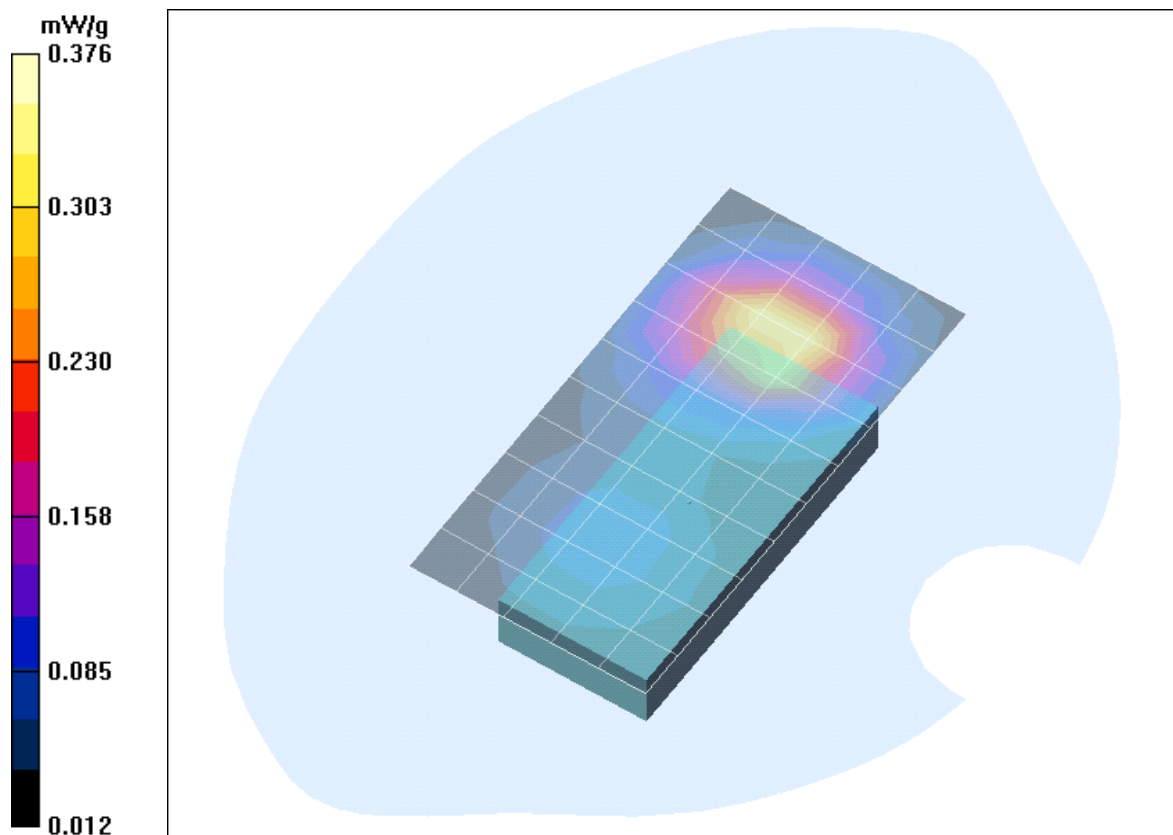


Fig. 27: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, ARC cover (29.10.2004; Ambient Temperature: 21.5° C; Liquid Temperature : 20.6° C).

4 SAR Distribution Plots, PCS 1900 Body with data cable (gap = 22 mm)

Test Laboratory: IMST GmbH; File Name: [Stdvphm_1.da4](#)

DUT: Siemens; Type: CX 70; Serial: 004999003401170

Program Name: Body Worn

Communication System: GPRS 1900; Frequency: 1880 MHz; Duty Cycle: 1:4

Medium parameters used: $\sigma = 1.58$; mho/m, $\epsilon_r = 54$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(4.57, 4.57, 4.57); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Body Worn/Area Scan (6x11x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.619 mW/g

Body Worn/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 10.5 V/m; Power Drift = 0.032 dB

Peak SAR (extrapolated) = 1.01 W/kg

SAR(1 g) = 0.628 mW/g; SAR(10 g) = 0.375 mW/g

Maximum value of SAR (measured) = 0.683 mW/g

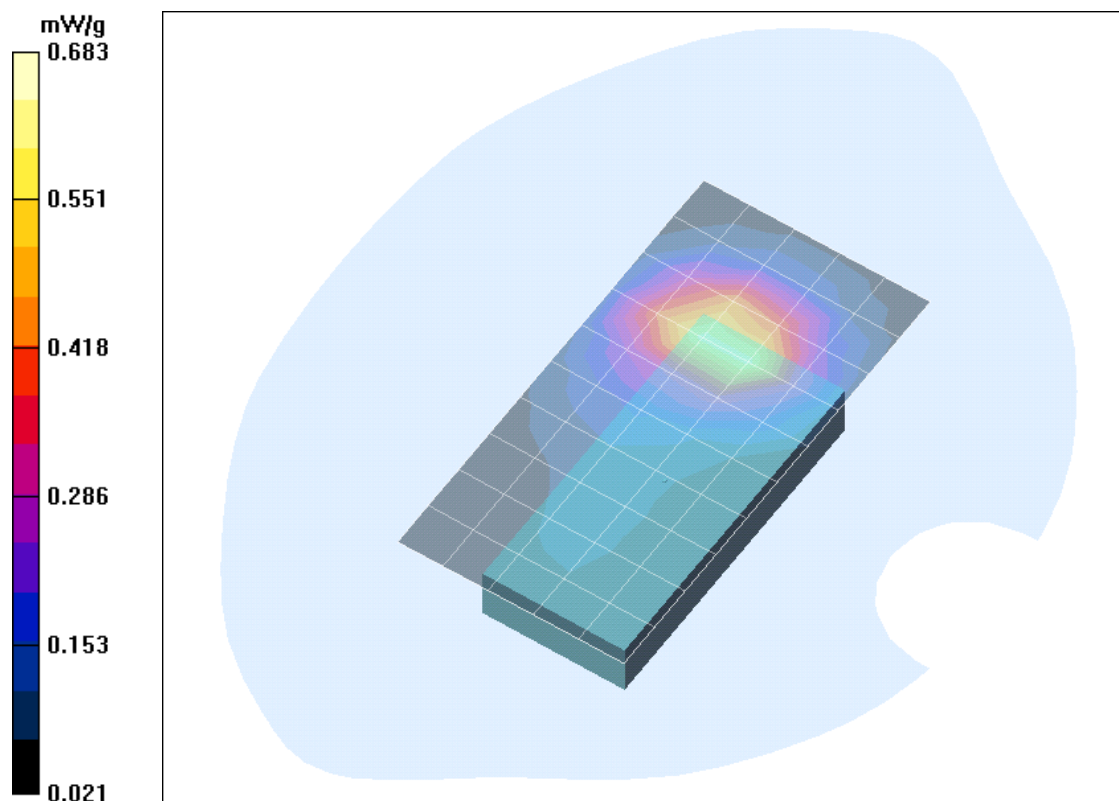


Fig. 28: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, Standard cover with data cable, 2 TX (29.10.2004; Ambient Temperature: 21.6° C; Liquid Temperature : 20.6° C).

Test Laboratory: IMST GmbH; **File Name:** [BUTyphm_1.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Body Worn

Communication System: GPRS 1900; Frequency: 1880 MHz; Duty Cycle: 1:4

Medium parameters used: $\sigma = 1.58$; mho/m, $\epsilon_r = 54$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(4.57, 4.57, 4.57); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Body Worn/Area Scan (6x11x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.649 mW/g

Body Worn/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 10.8 V/m; Power Drift = 0.058 dB

Peak SAR (extrapolated) = 1.06 W/kg

SAR(1 g) = 0.643 mW/g; SAR(10 g) = 0.384 mW/g

Maximum value of SAR (measured) = 0.700 mW/g

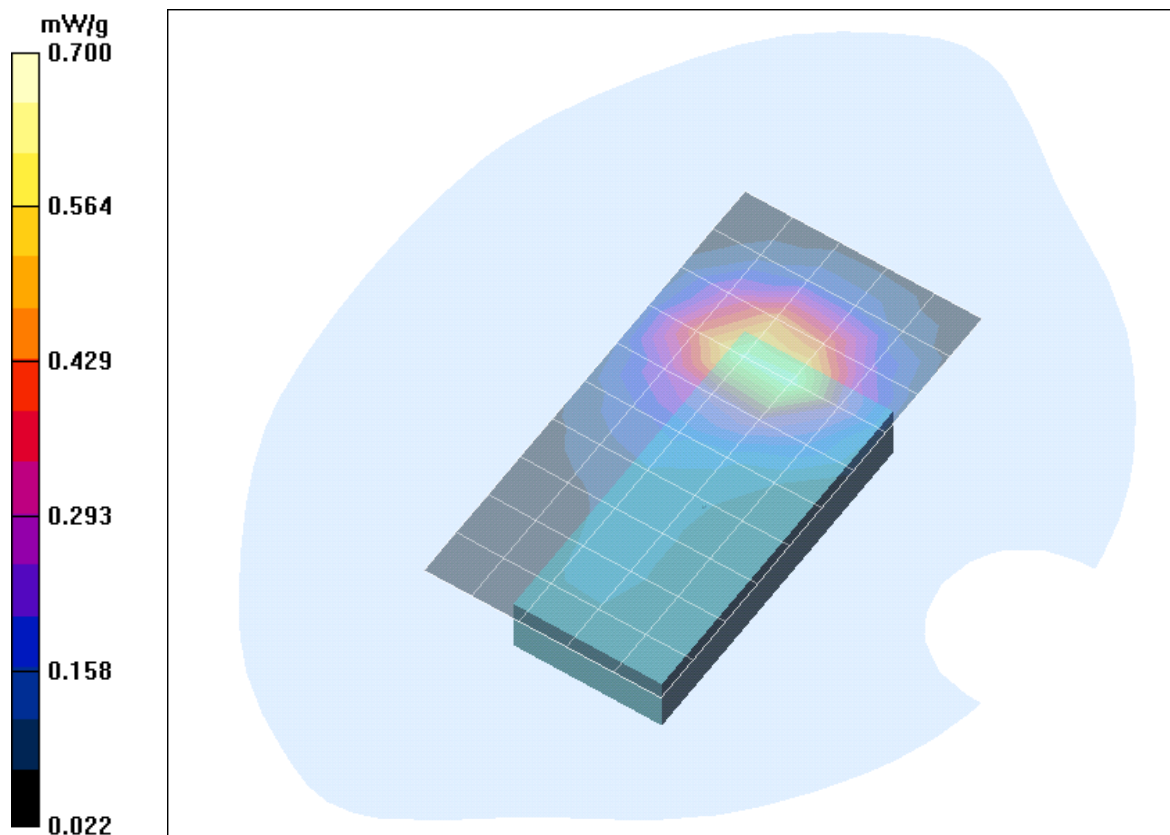


Fig. 29: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, Butterfly cover with data cable, 2 TX (29.10.2004; Ambient Temperature: 21.5° C; Liquid Temperature : 20.6 C).

Test Laboratory: IMST GmbH; **File Name:** [ARCvphm 1.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Body Worn

Communication System: GPRS 1900; Frequency: 1880 MHz; Duty Cycle: 1:4

Medium parameters used: $\sigma = 1.58$; mho/m, $\epsilon_r = 54$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(4.57, 4.57, 4.57); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Body Worn/Area Scan (6x11x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.739 mW/g

Body Worn/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 9.17 V/m; Power Drift = 0.096 dB

Peak SAR (extrapolated) = 1.16 W/kg

SAR(1 g) = 0.726 mW/g; SAR(10 g) = 0.432 mW/g

Maximum value of SAR (measured) = 0.789 mW/g

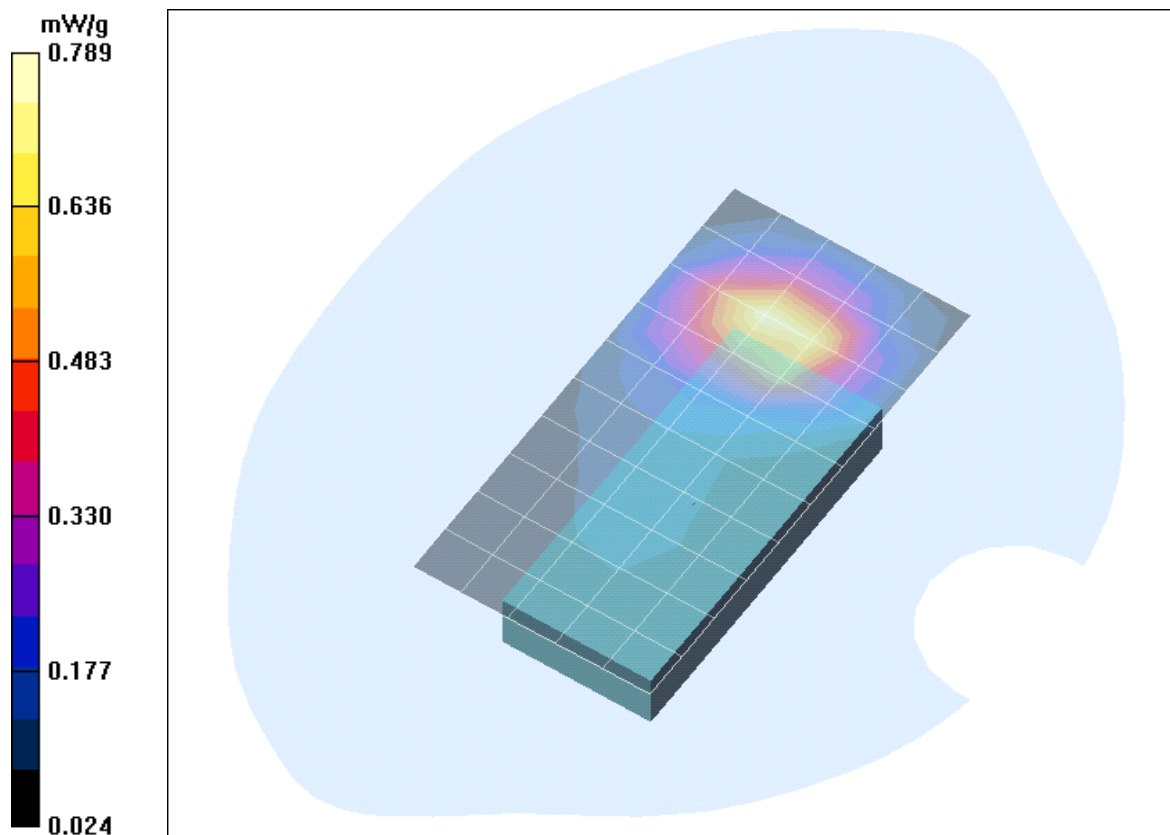


Fig. 30: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, ARC cover with data cable, 2 TX (29.10.2004; Ambient Temperature: 21.5° C; Liquid Temperature : 20.6° C).

5 SAR Distribution Plots, PCS 1900 Body PTT mode (gap = 25 mm)

Test Laboratory: IMST GmbH; File Name: [STDvphm_2.da4](#)

DUT: Siemens; Type: CX 70; Serial: 004999003401170

Program Name: Body Worn

Communication System: GPRS 1900; Frequency: 1880 MHz; Duty Cycle: 1:4

Medium parameters used: $\sigma = 1.58$; mho/m, $\epsilon_r = 54$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(4.57, 4.57, 4.57); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Body Worn/Area Scan (6x11x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.184 mW/g

Body Worn/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 7.98 V/m; Power Drift = 0.123 dB

Peak SAR (extrapolated) = 0.273 W/kg

SAR(1 g) = 0.179 mW/g; SAR(10 g) = 0.116 mW/g

Maximum value of SAR (measured) = 0.191 mW/g

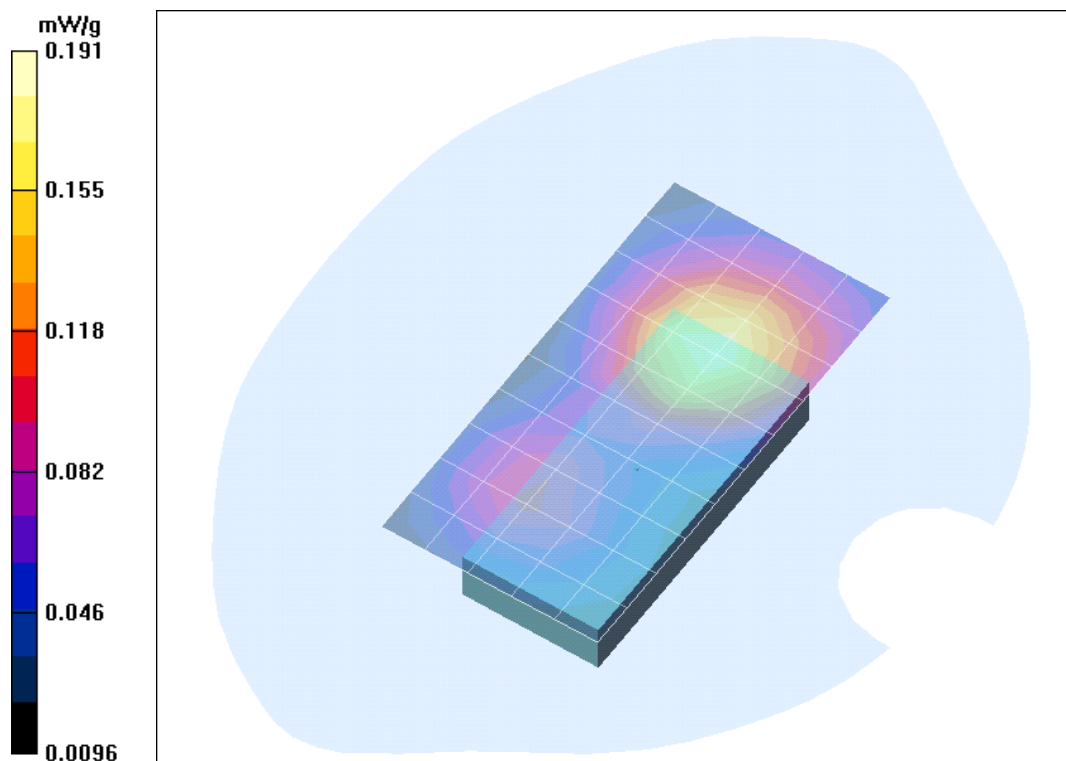


Fig. 31: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the ground, Standard cover in PTT mode, 2 TX (06.08.2004; Ambient Temperature: 22.9° C; Liquid Temperature : 21.5° C).

Test Laboratory: IMST GmbH; **File Name:** [BUTyphm 2.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Body Worn

Communication System: GPRS 1900; Frequency: 1880 MHz; Duty Cycle: 1:4

Medium parameters used: $\sigma = 1.58$; mho/m, $\epsilon_r = 54$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(4.57, 4.57, 4.57); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Body Worn/Area Scan (6x11x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.184 mW/g

Body Worn/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 7.02 V/m; Power Drift = 0.045 dB

Peak SAR (extrapolated) = 0.271 W/kg

SAR(1 g) = 0.177 mW/g; SAR(10 g) = 0.114 mW/g

Maximum value of SAR (measured) = 0.189 mW/g

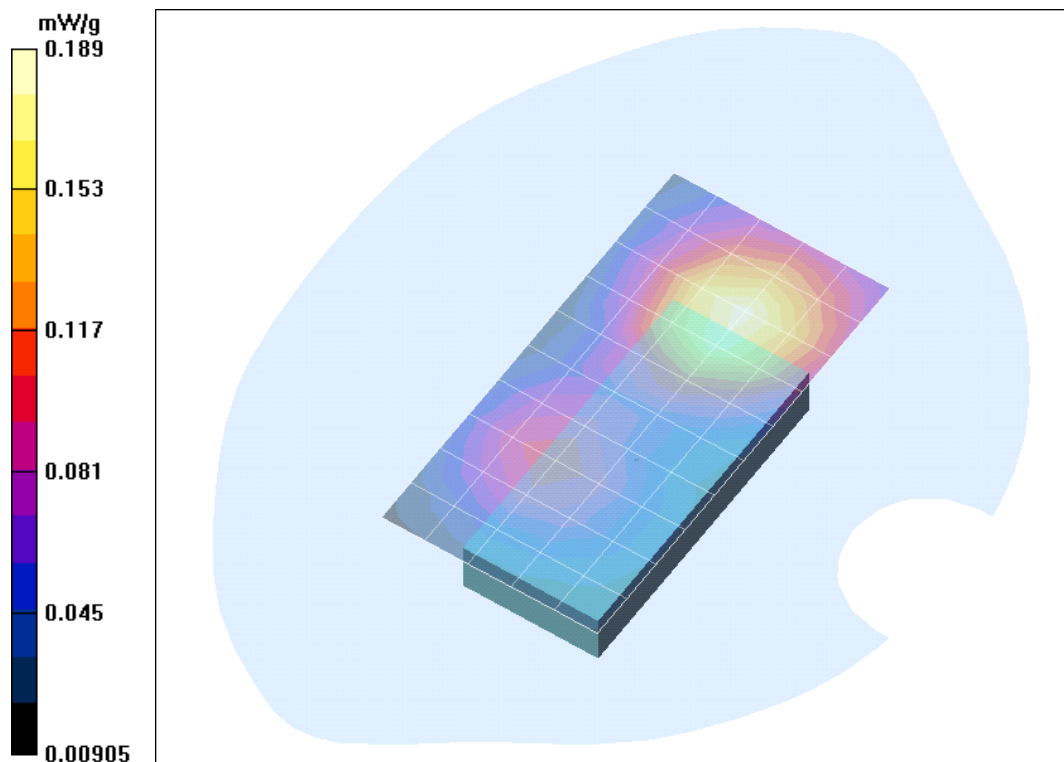


Fig. 32: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, BF cover in PTT mode, 2 TX (06.08.2004; Ambient Temperature: 22.6° C; Liquid Temperature : 21.1 C).

Test Laboratory: IMST GmbH; **File Name:** [ARCVphm 2.da4](#)

DUT: Siemens; **Type:** CX 70; **Serial:** 004999003401170

Program Name: Body Worn

Communication System: GPRS 1900; Frequency: 1880 MHz; Duty Cycle: 1:4

Medium parameters used: $\sigma = 1.58$; mho/m, $\epsilon_r = 54$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY4 Configuration:

- Probe: ET3DV6 - SN1579; ConvF(4.57, 4.57, 4.57); Calibrated: 01.09.2004
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE4 Sn631; Calibrated: 23.07.2004
- Phantom: SAM Glycol 1340; Type: QD 000 P40 CB; Serial: TP-1340
- Measurement SW: DASY4, V4.3 Build 22; Postprocessing SW: SEMCAD, V1.8 Build 127

Body Worn/Area Scan (6x11x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 0.184 mW/g

Body Worn/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 7.42 V/m; Power Drift = 0.092 dB

Peak SAR (extrapolated) = 0.285 W/kg

SAR(1 g) = 0.187 mW/g; SAR(10 g) = 0.121 mW/g

Maximum value of SAR (measured) = 0.199 mW/g

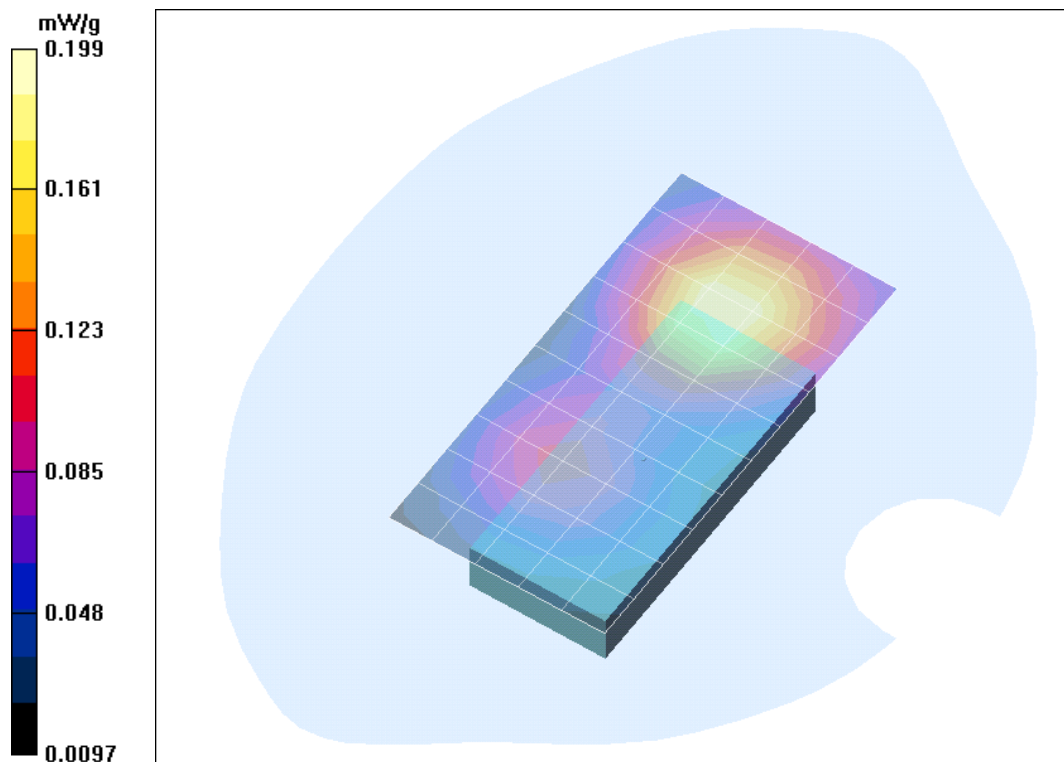


Fig. 33: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the ground, Butterfly cover in PTT mode, 2 TX (06.08.2004; Ambient Temperature: 22.8° C; Liquid Temperature : 21.3° C).

6 SAR z-axis scans (Validation)

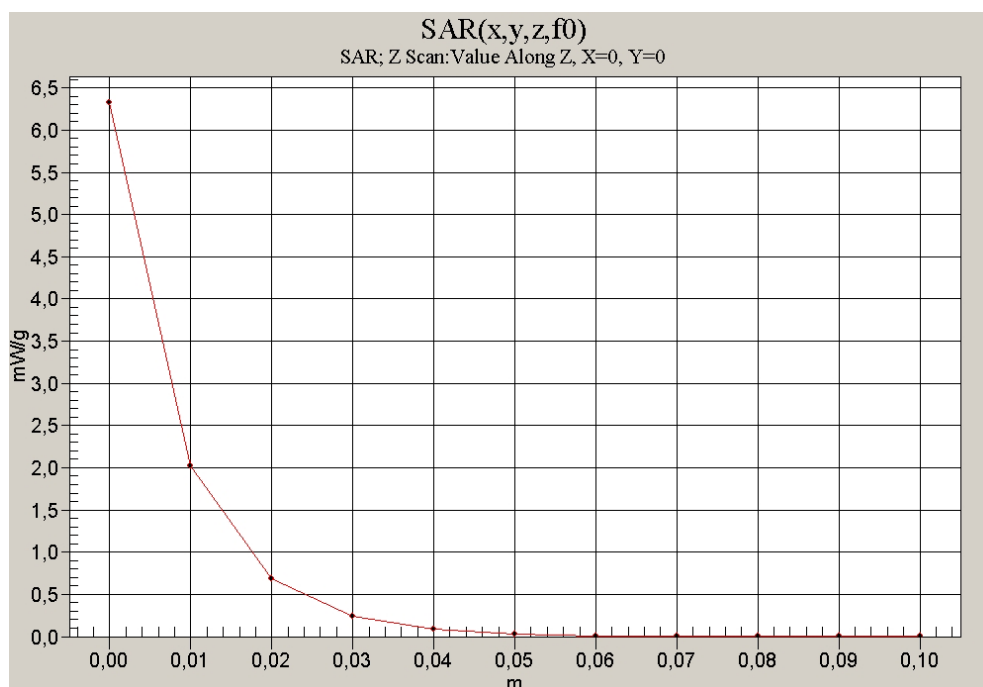


Fig. 34: SAR versus liquid depth, 1900 MHz, head (21.10.2004; Ambient Temperature: 22.0° C; Liquid Temperature : 20.8° C).

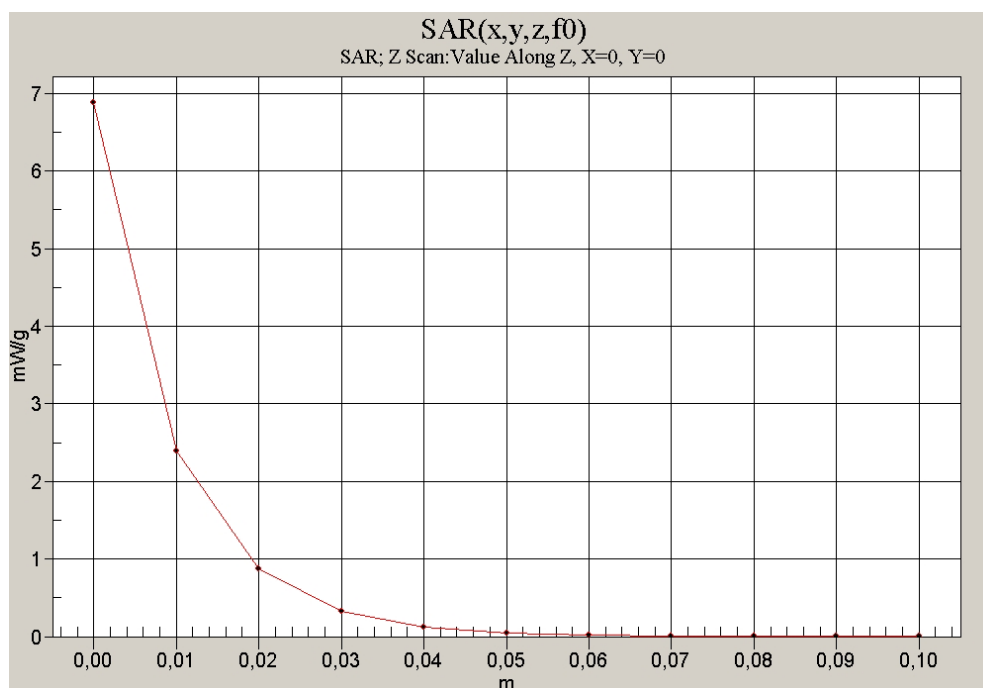


Fig. 35: SAR versus liquid depth, 1900 MHz, body (28.10.2004; Ambient Temperature: 22.2° C; Liquid Temperature : 20.7° C).

7 SAR z-axis scans (Measurements)

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

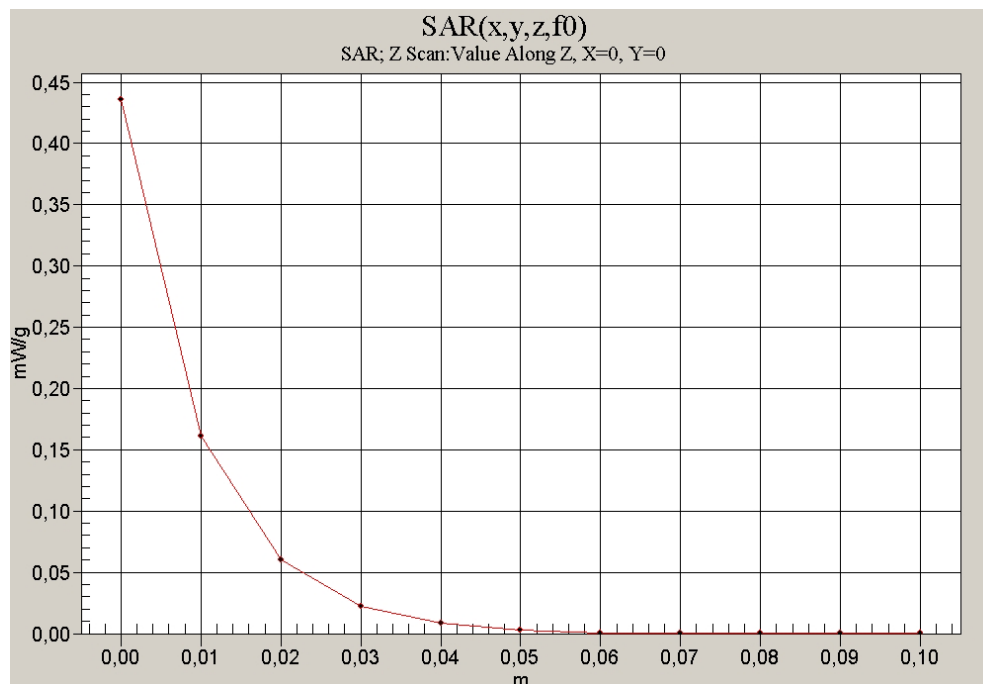


Fig. 36: SAR versus liquid depth, head: without flash, PCS 1900, channel 661, tilted position, left side of head with Butterfly cover. (21.10.2004, Ambient Temperature: 21.9° C; Liquid Temperature : 20.6° C).

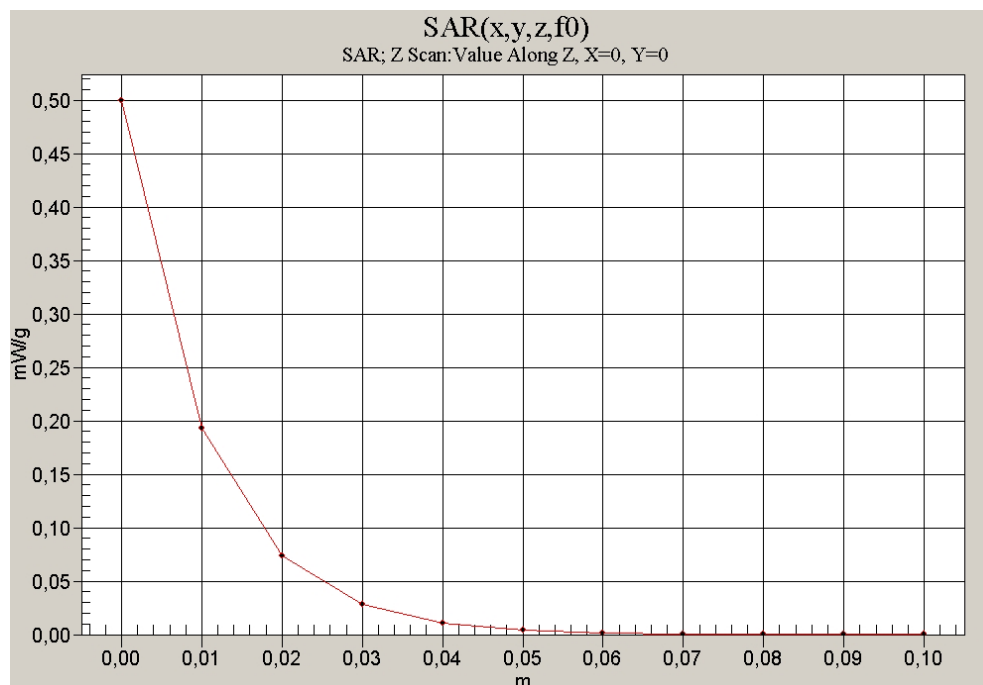


Fig. 37: SAR versus liquid depth: PCS 1900 body, channel 661, body worn configuration, antenna towards the phantom, GPRS Class 10 with data cable, ARC cover (29.10.2004, Ambient Temperature: 21.5° C; Liquid Temperature : 20.6° C).