
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
IMST GmbH
Carl-Friedrich-Gauß-Str. 2
D-47475 Kamp-Lintfort

Customer
Siemens Information & Communication Mobile LLC
16475 West Bernado Drive, Suite 400
San Diego CA 92127

The test results only relate to the items tested.
This report shall not be reproduced except in full without the written
approval of the testing laboratory.

Table of Contents

1	SAR DISTRIBUTION PLOTS, PCS 1900 HEAD WITHOUT FLASH.....	3
2	SAR DISTRIBUTION PLOTS, PCS 1900 HEAD WITH FLASH	15
3	SAR DISTRIBUTION PLOTS, PCS 1900 BODY WITH HEADSET (GAP = 22 MM).....	27
4	SAR DISTRIBUTION PLOTS, PCS 1900 BODY WITH DATA CABLE (GAP = 22 MM).....	30
5	SAR DISTRIBUTION PLOTS, PCS 1900 BODY PTT MODE (GAP = 25 MM).....	33
6	SAR Z-AXIS SCANS (VALIDATION).....	36
7	SAR Z-AXIS SCANS (MEASUREMENTS).....	37

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

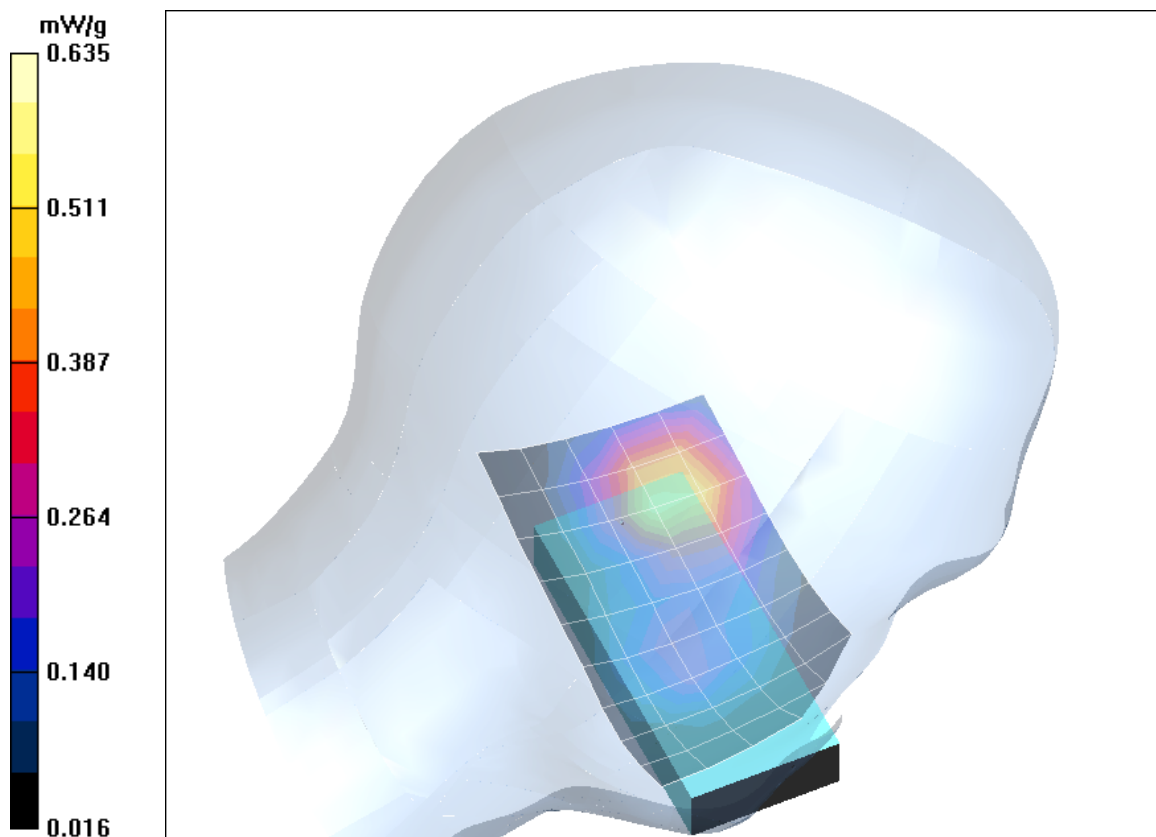


Fig. 1: SAR distribution for PCS 1900, channel 661, cheek position, left side of head, Standard. (21.10.2004; Ambient Temperature: 22.0° C; Liquid Temperature: 20.7° C).

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

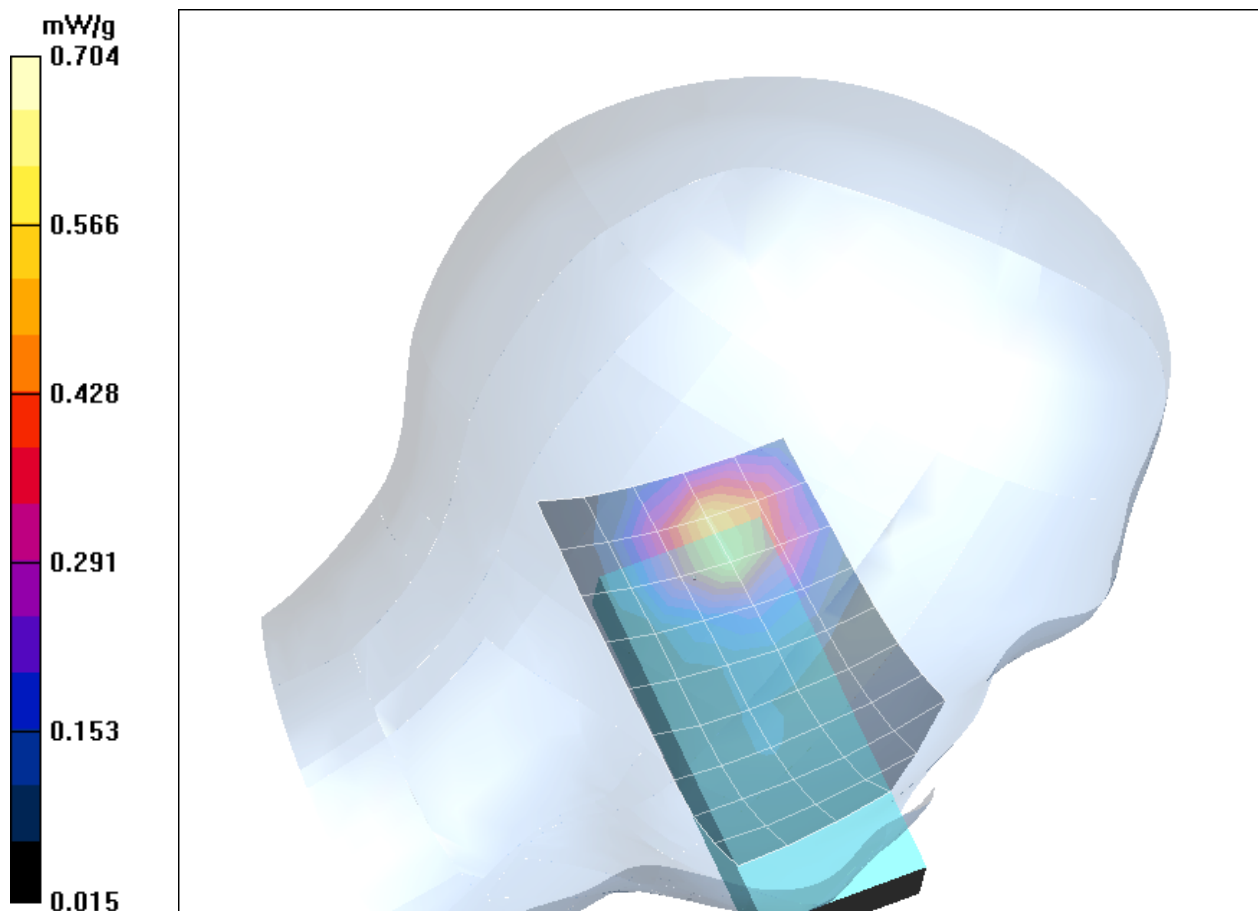


Fig. 2: SAR distribution for PCS 1900, channel 661, tilted position, left side of head, Standard. (21.10.2004; Ambient Temperature: 22.0° C; Liquid Temperature : 20.7° C).

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

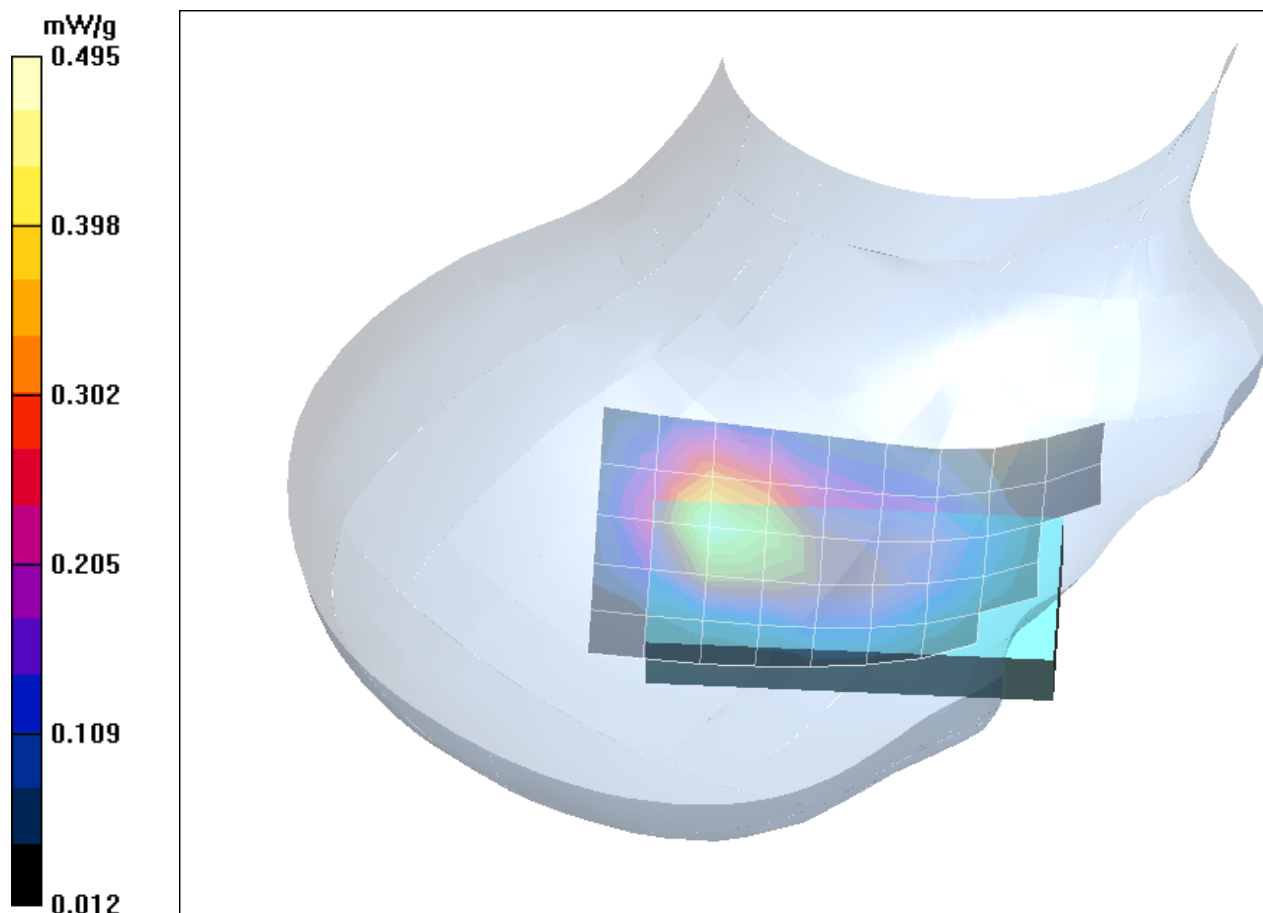


Fig. 3: SAR distribution for PCS 1900, channel 661, cheek position, right side of head, Standard. (21.10.2004; Ambient Temperature: 22.0° C; Liquid Temperature : 20.7° C).

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, $\epsilon_r = 38.7$; $\rho = 1000 \text{ kg/m}^3$

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 (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

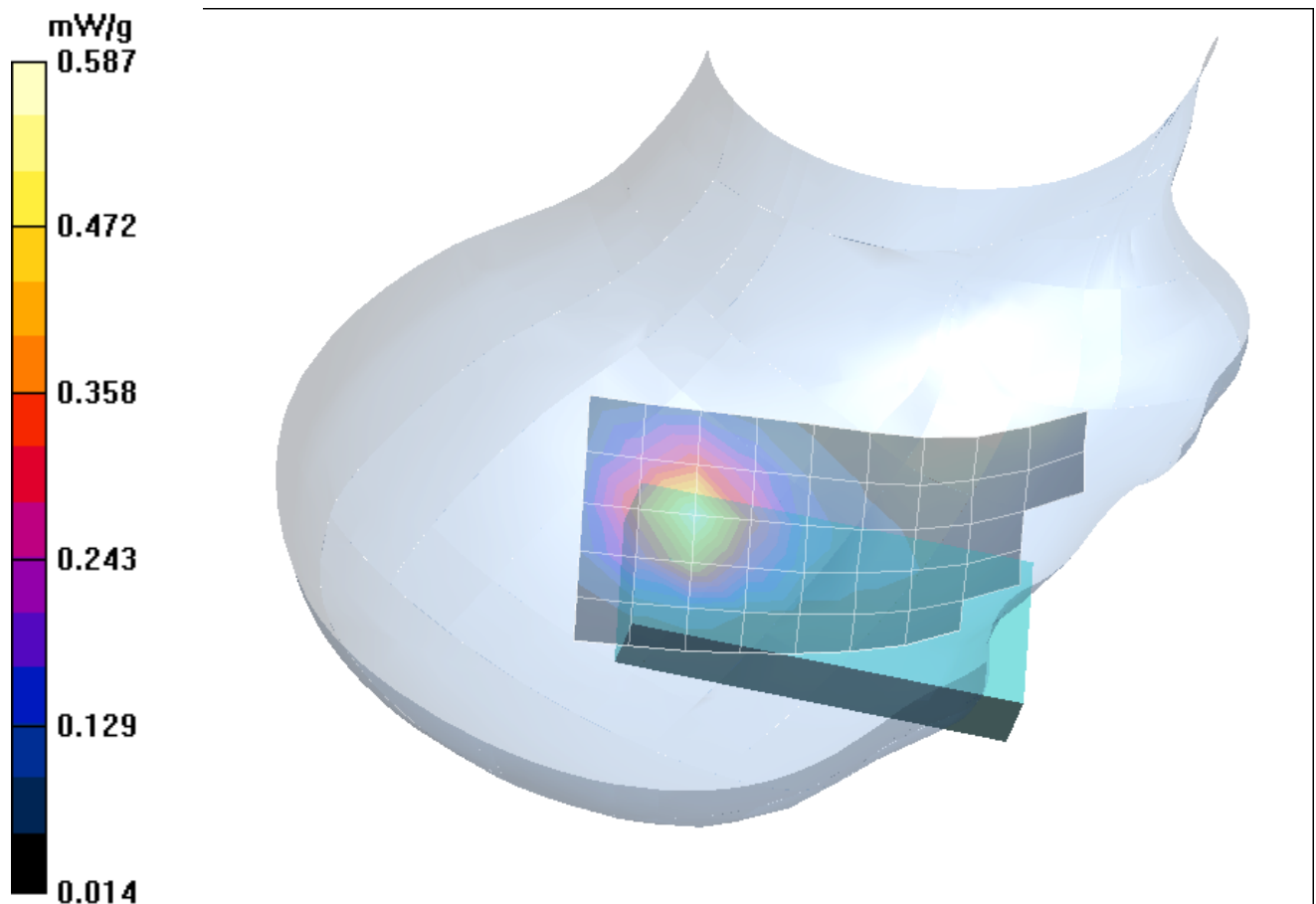


Fig. 4: SAR distribution for PCS 1900, channel 661, tilted position, right side of head, Standard. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.7° C).

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

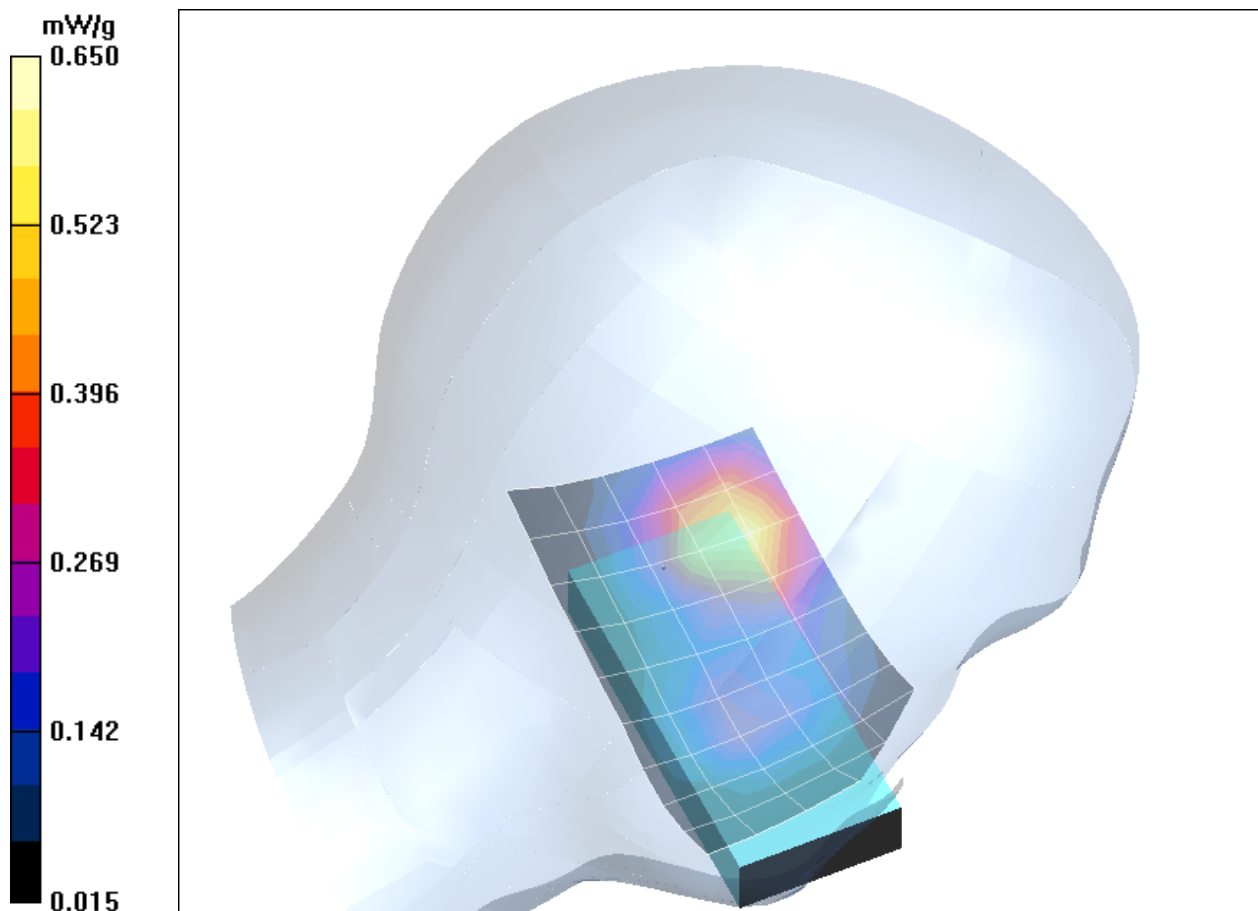


Fig. 5: SAR distribution for PCS 1900, channel 661, cheek position, left side of head, Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature: 20.6° C).

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

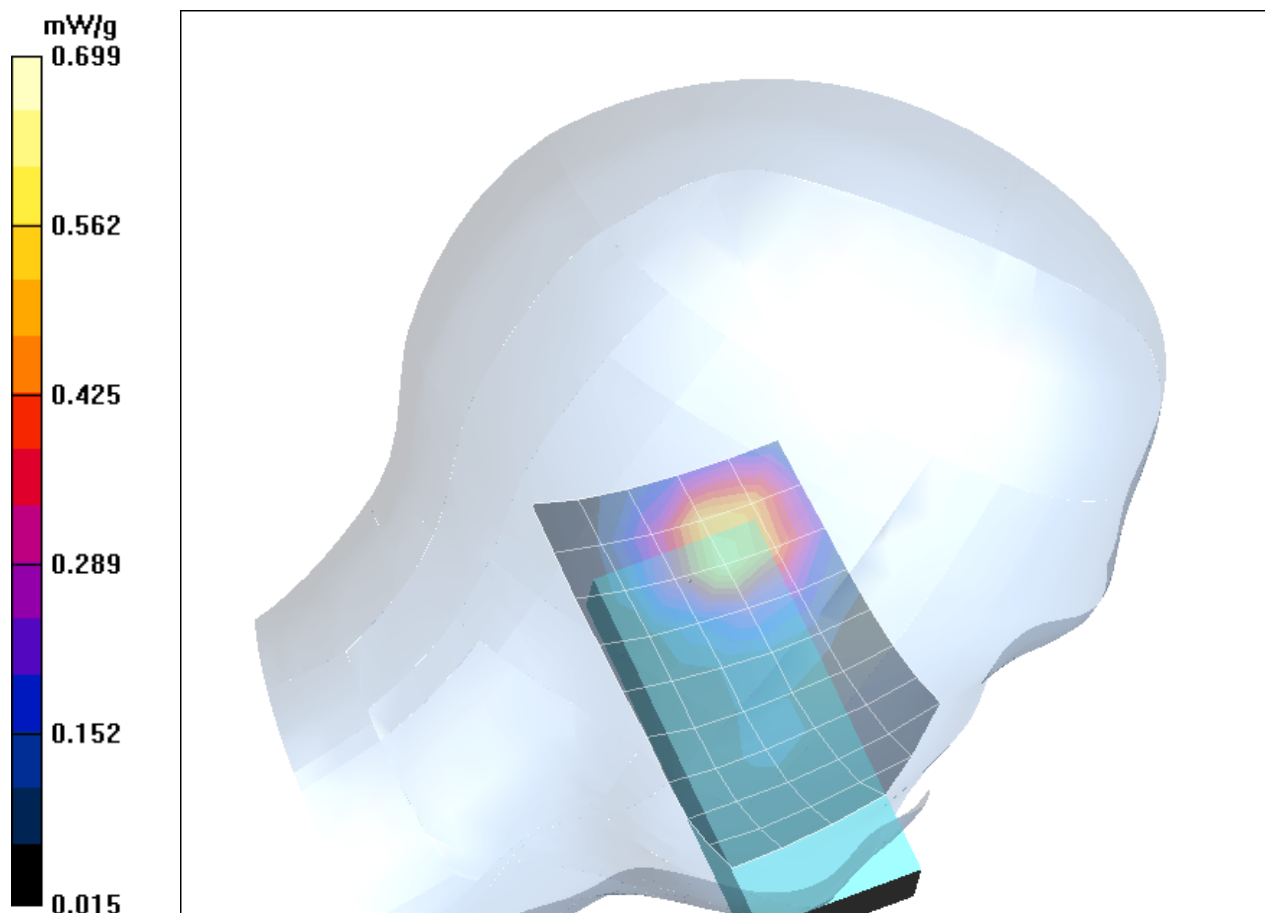


Fig. 6: SAR distribution for PCS 1900, channel 661, tilted position, left side of head, Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.6° C)

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

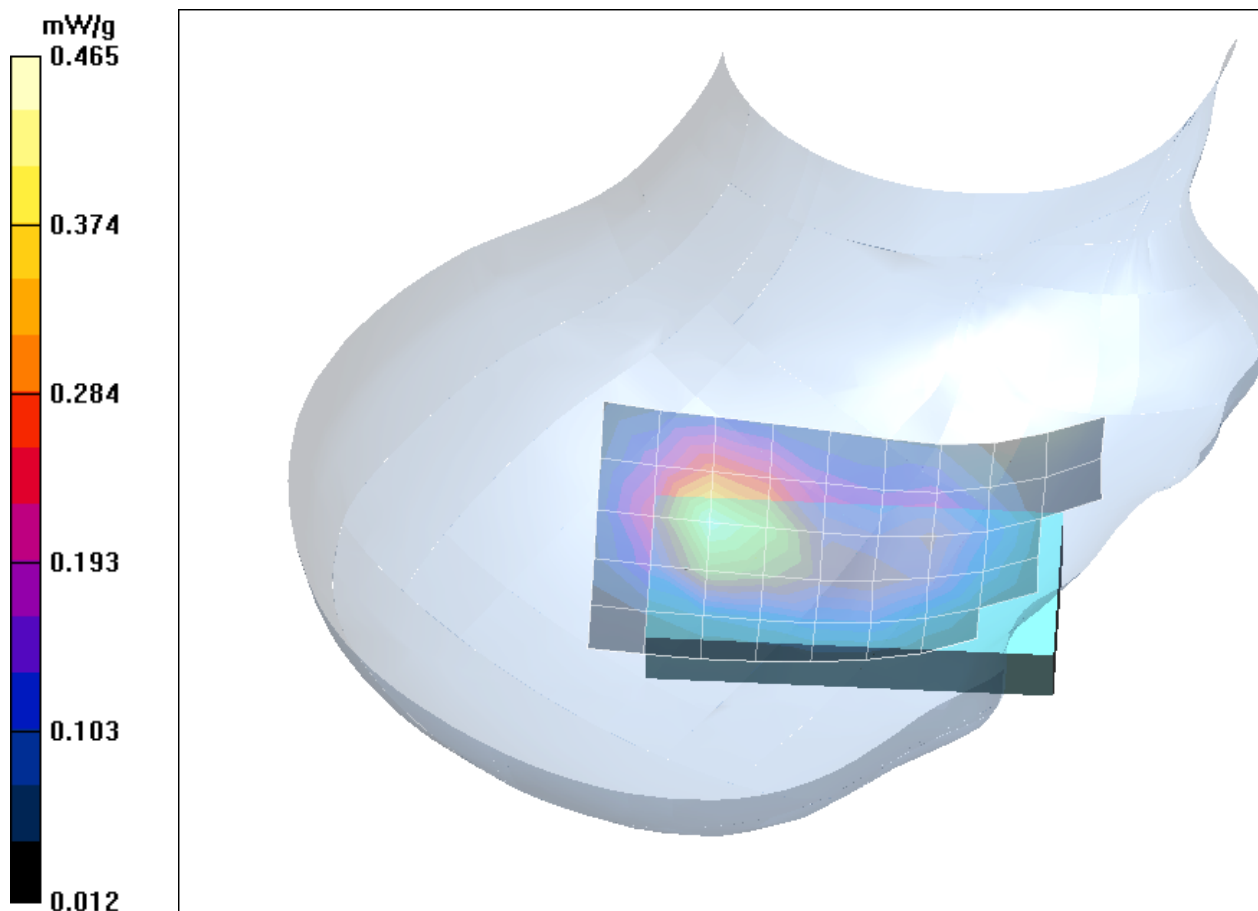


Fig. 7: SAR distribution for PCS 1900, channel 661, cheek position, right side of head, Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.7° C).

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

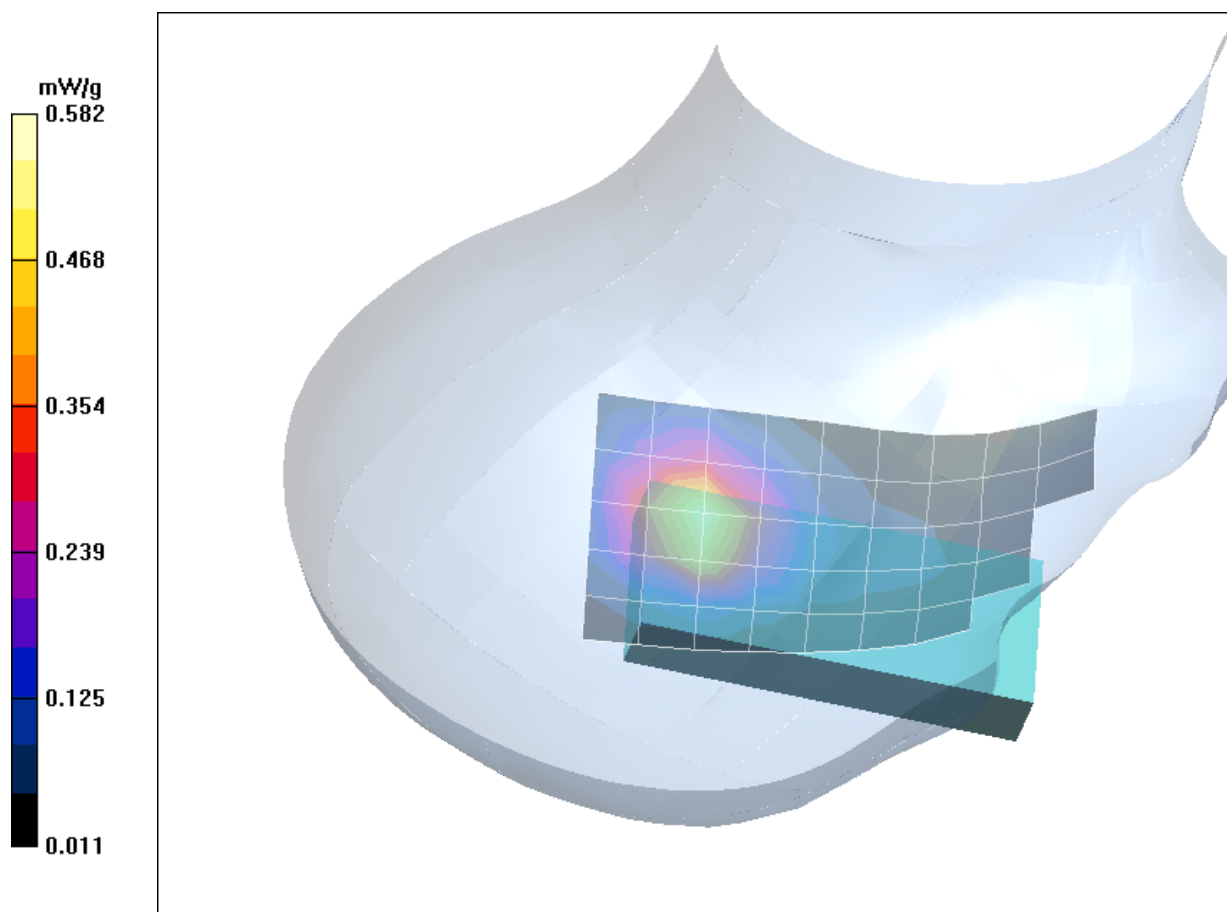


Fig. 8: SAR distribution for PCS 1900, channel 661, tilted position, right side of head, Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.7° C).

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

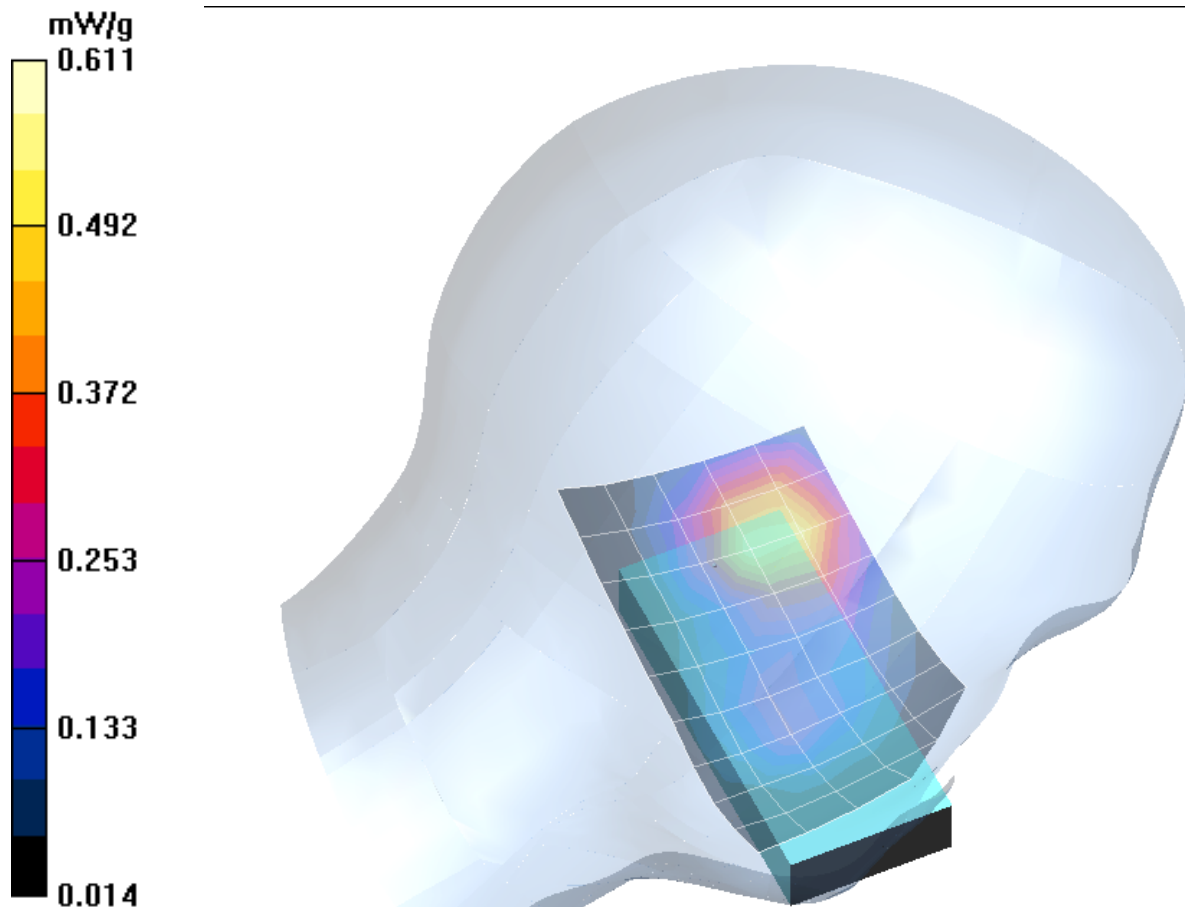


Fig. 9: SAR distribution for PCS 1900, channel 661, cheek position, left side of head, ARC. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature: 20.6° C).

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

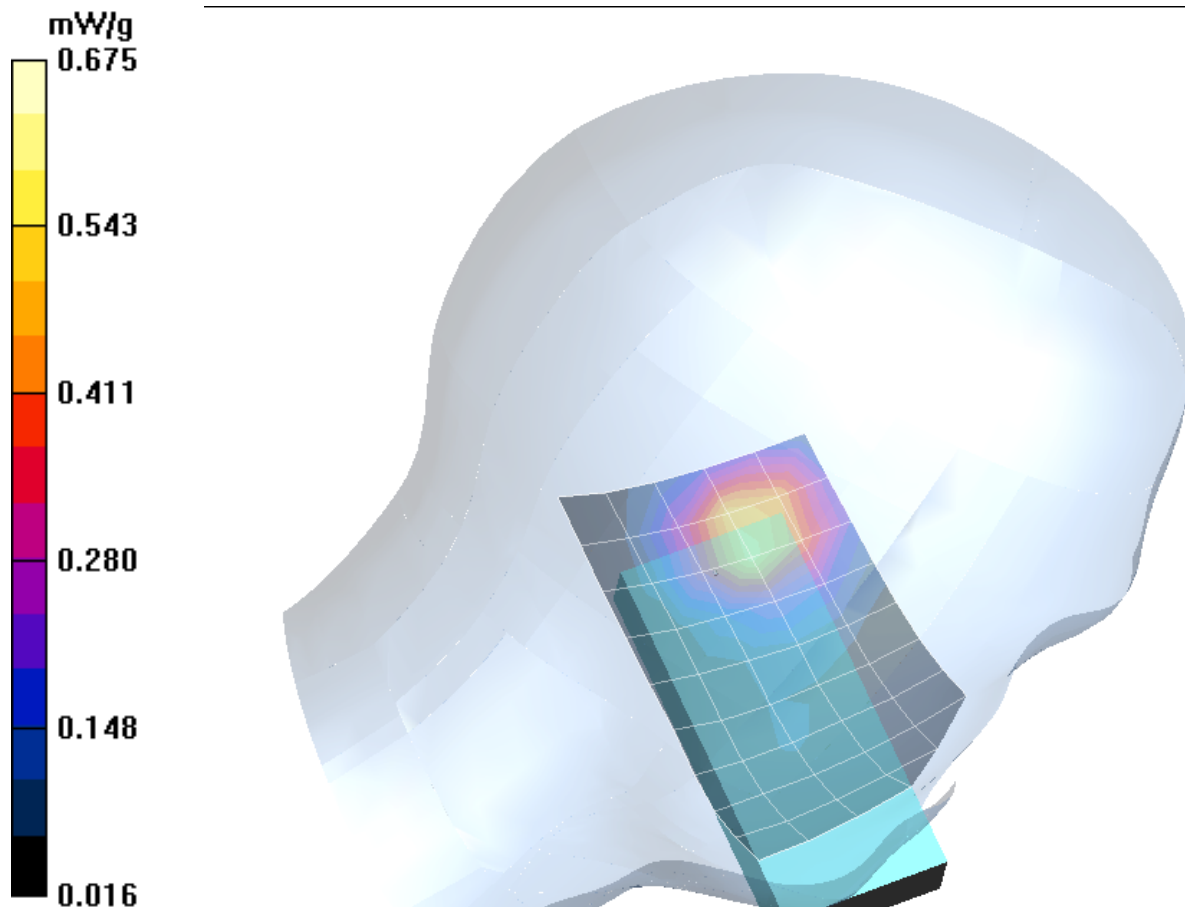


Fig. 10: SAR distribution for PCS 1900, channel 661, tilted position, left side of head, ARC. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature: 20.6° C).

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

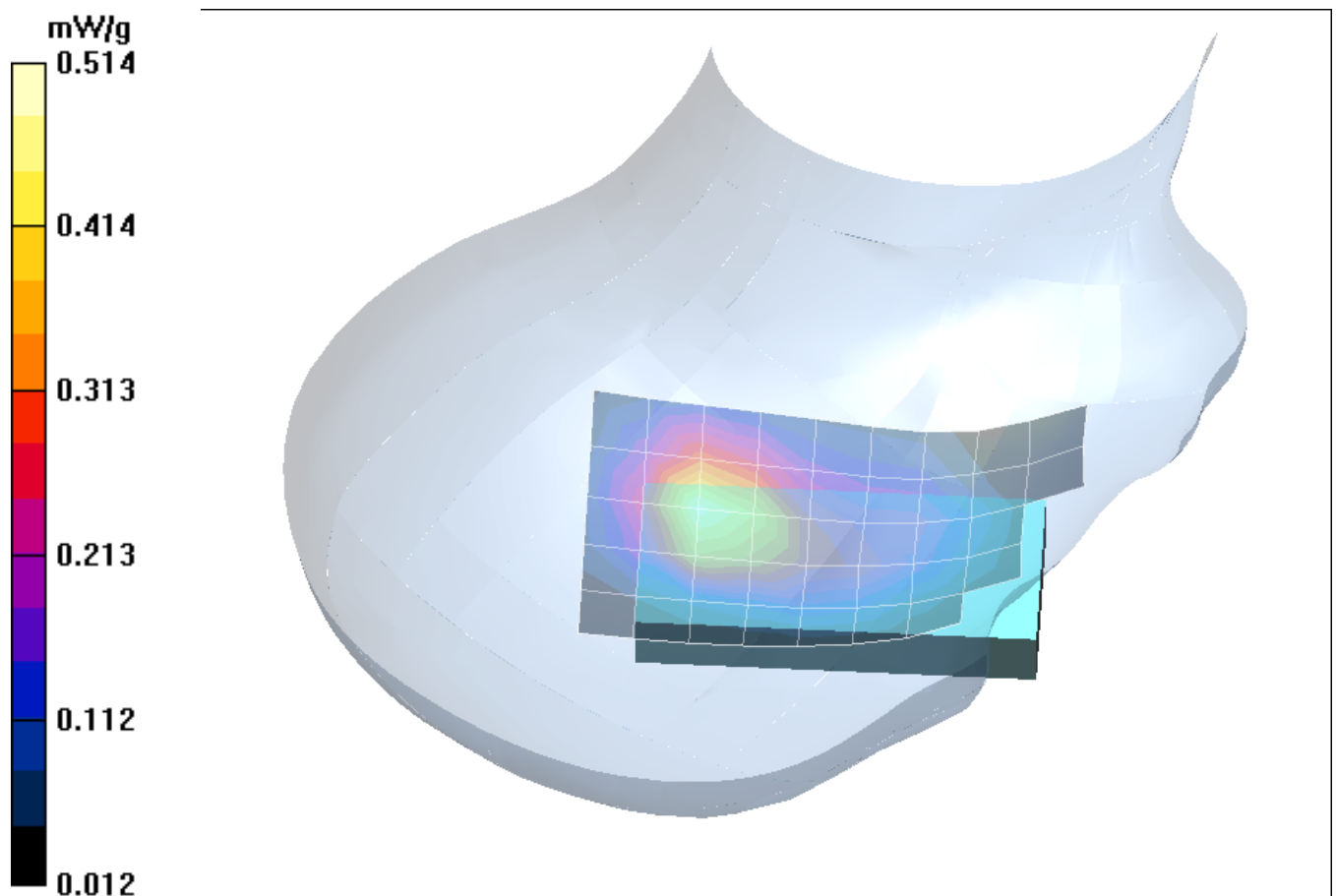


Fig. 11: SAR distribution for PCS 1900, channel 661, cheek position, right side of head, ARC. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature: 20.6° C).

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

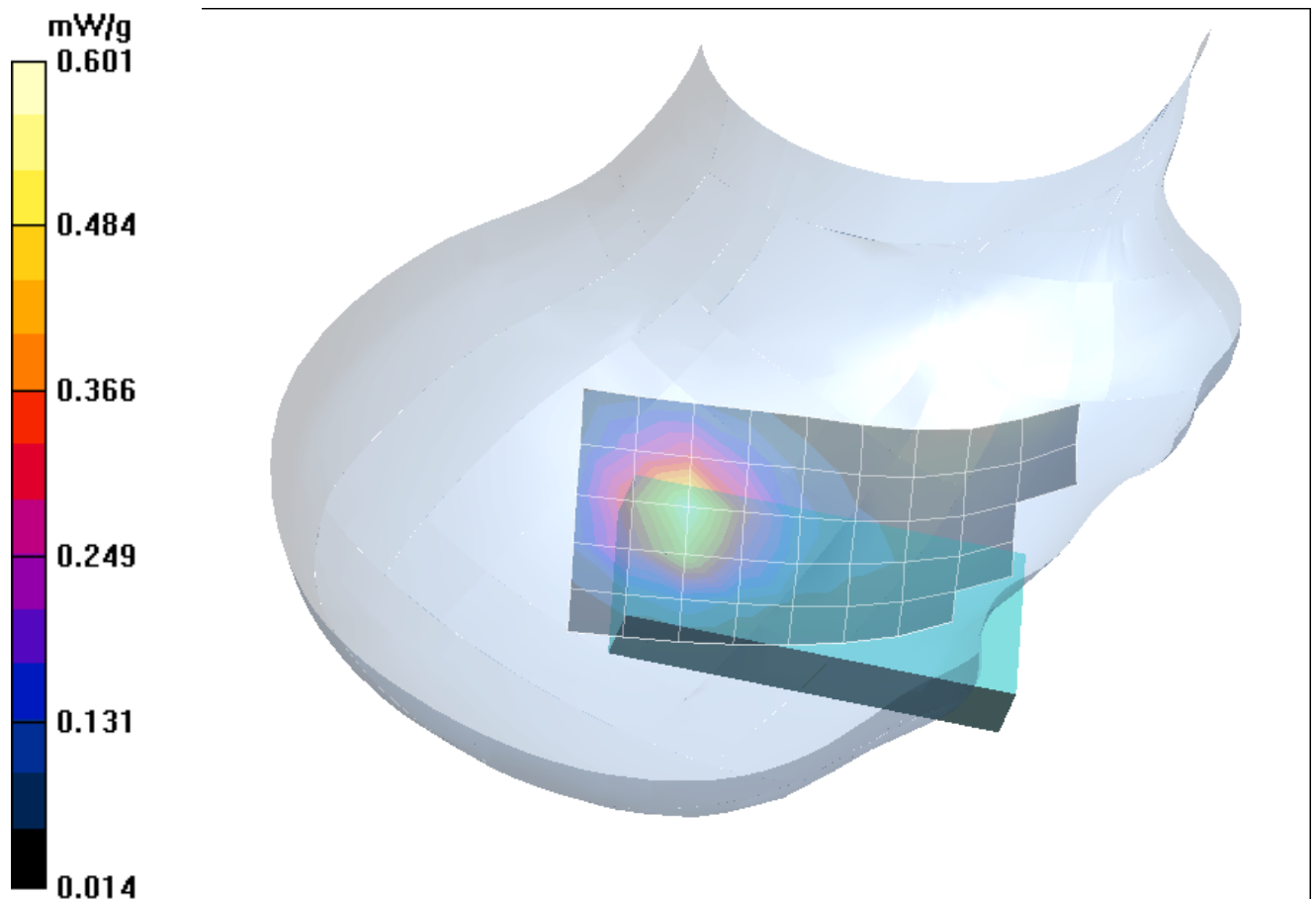


Fig. 12: SAR distribution for PCS 1900, channel 661, tilted position, right side of head, ARC. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature: 20.7° C).

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

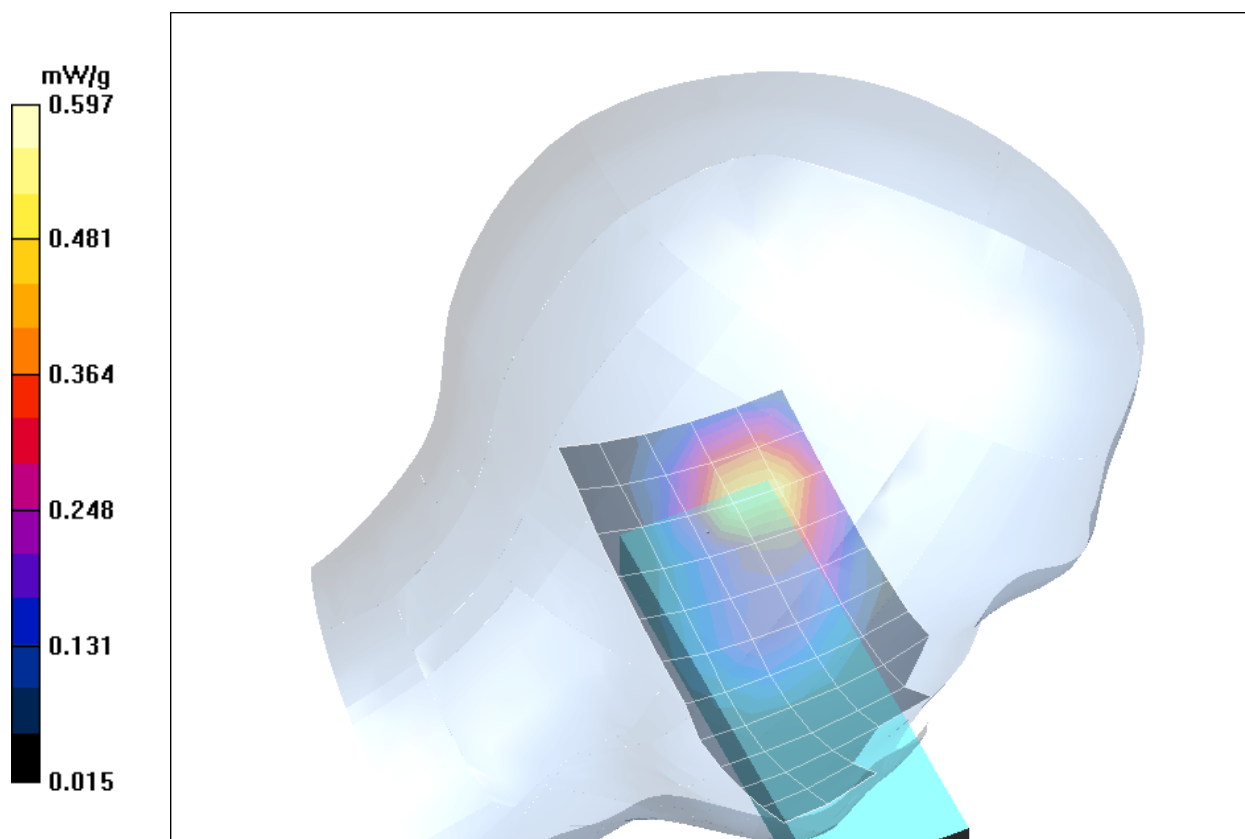


Fig. 13: SAR distribution for PCS 1900, channel 661, cheek position, left side of head, Standard. (21.10.2004; Ambient Temperature: 21.8° C; Liquid Temperature : 20.8° C).

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, $\epsilon_r = 38.7$; $\rho = 1000 \text{ kg/m}^3$

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) = 0.632 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

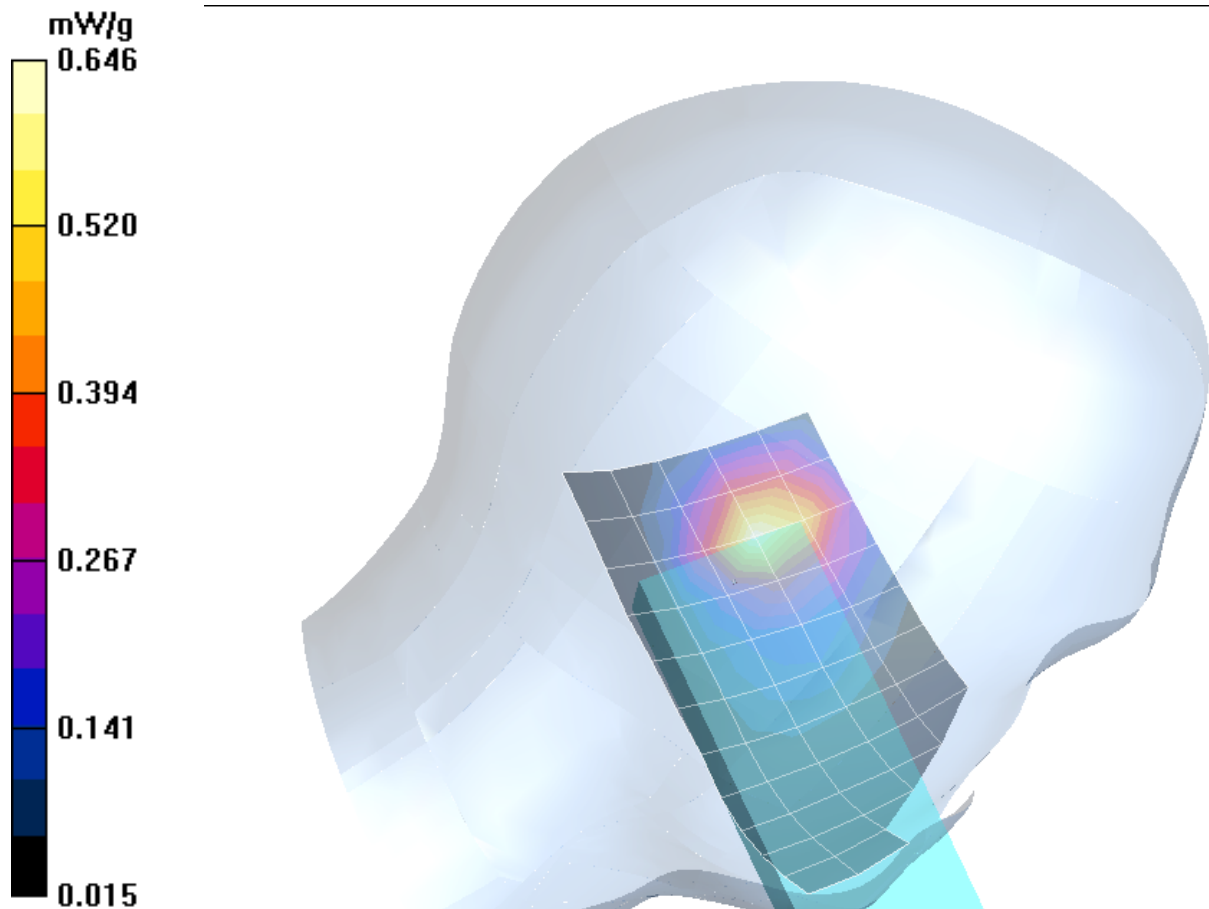


Fig. 14: SAR distribution for PCS 1900, channel 661, tilted position, left side of head, Standard. (21.10.2004; Ambient Temperature: 21.8° C; Liquid Temperature : 20.8° C).

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

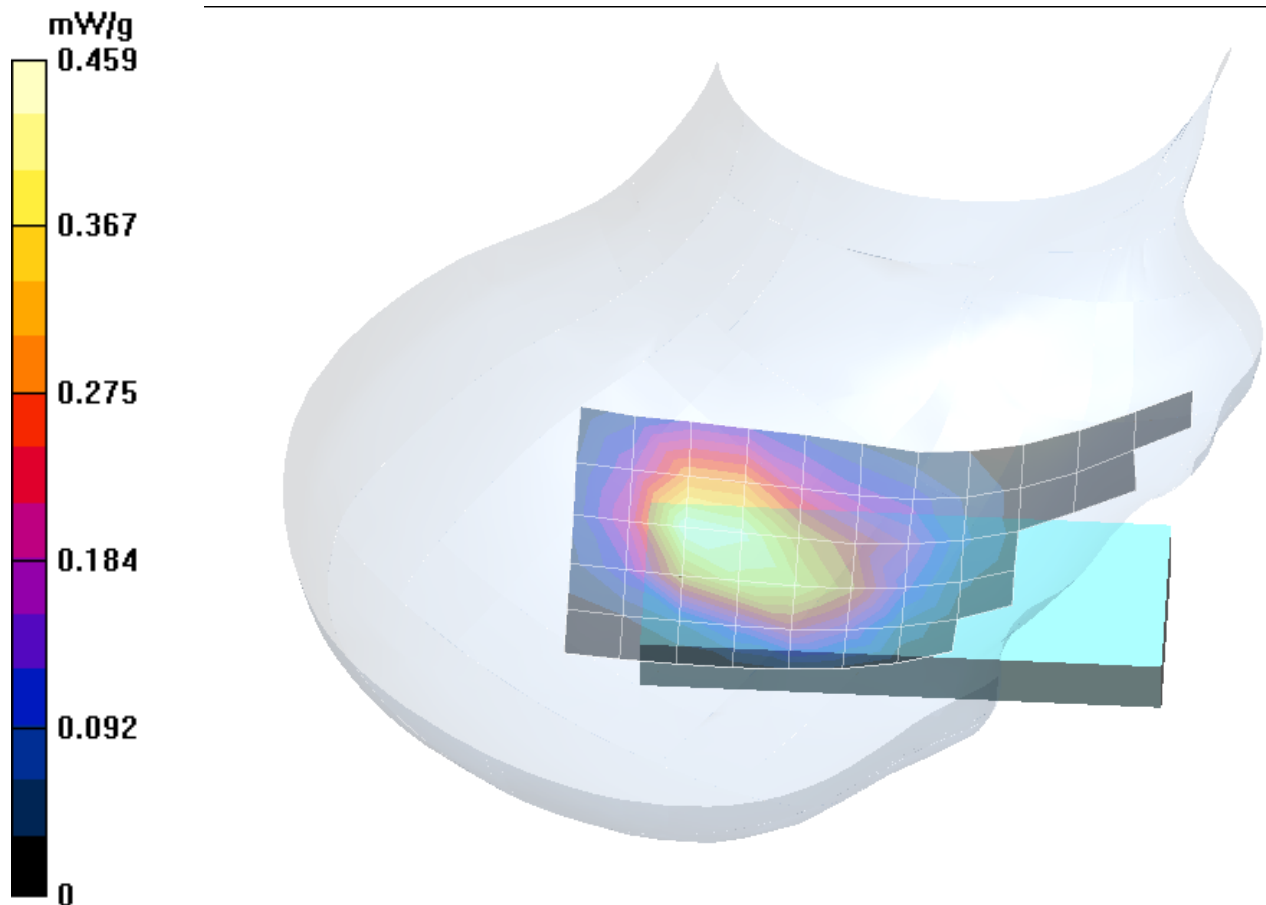


Fig. 15: SAR distribution for PCS 1900, channel 661, cheek position, right side of head, Standard. (21.10.2004; Ambient Temperature: 21.7° C; Liquid Temperature : 20.8° C).

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

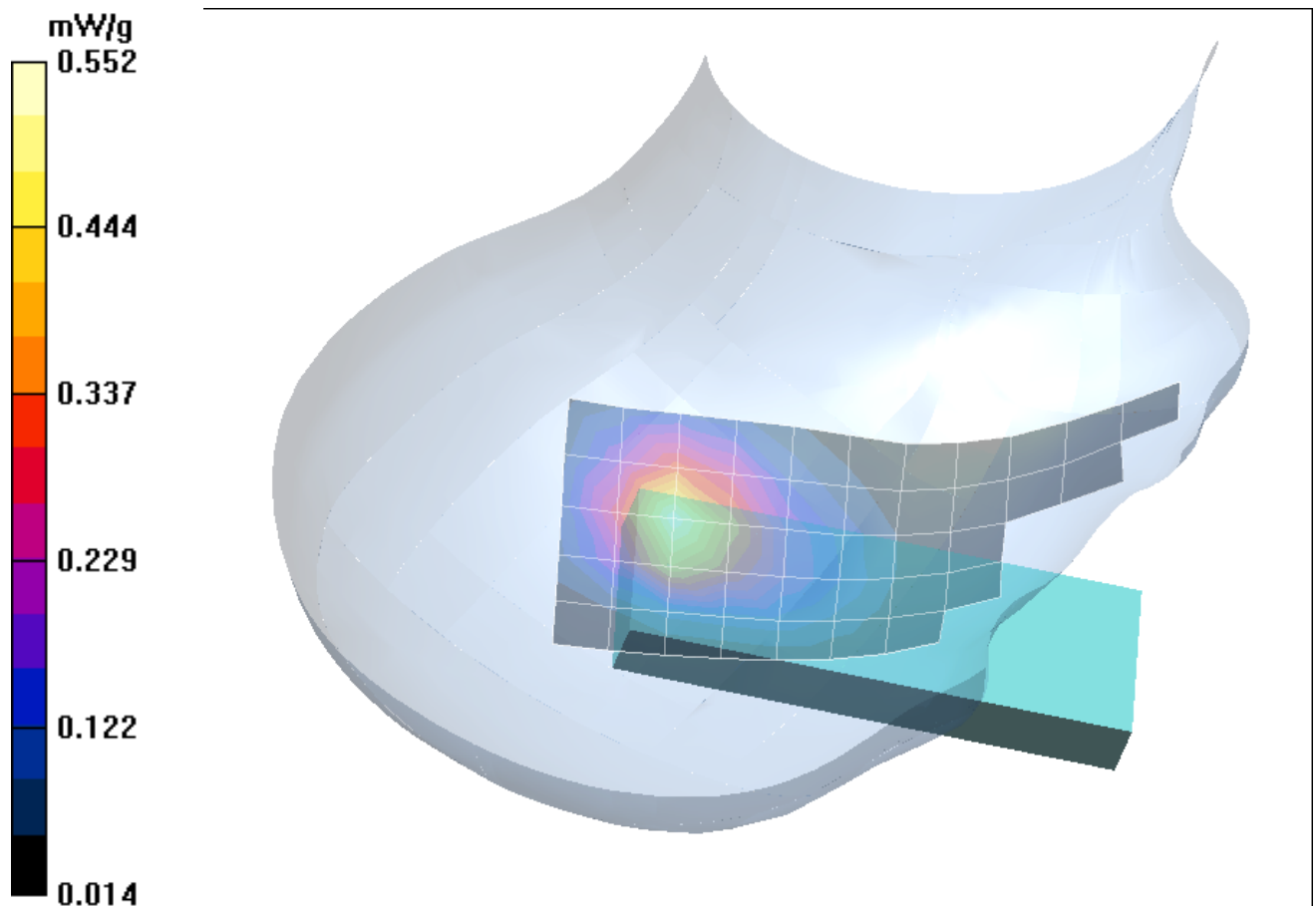


Fig. 16: SAR distribution for PCS 1900, channel 661, tilted position, right side of head, Standard. (21.10.2004; Ambient Temperature: 21.8 °C; Liquid Temperature : 20.8° C)

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

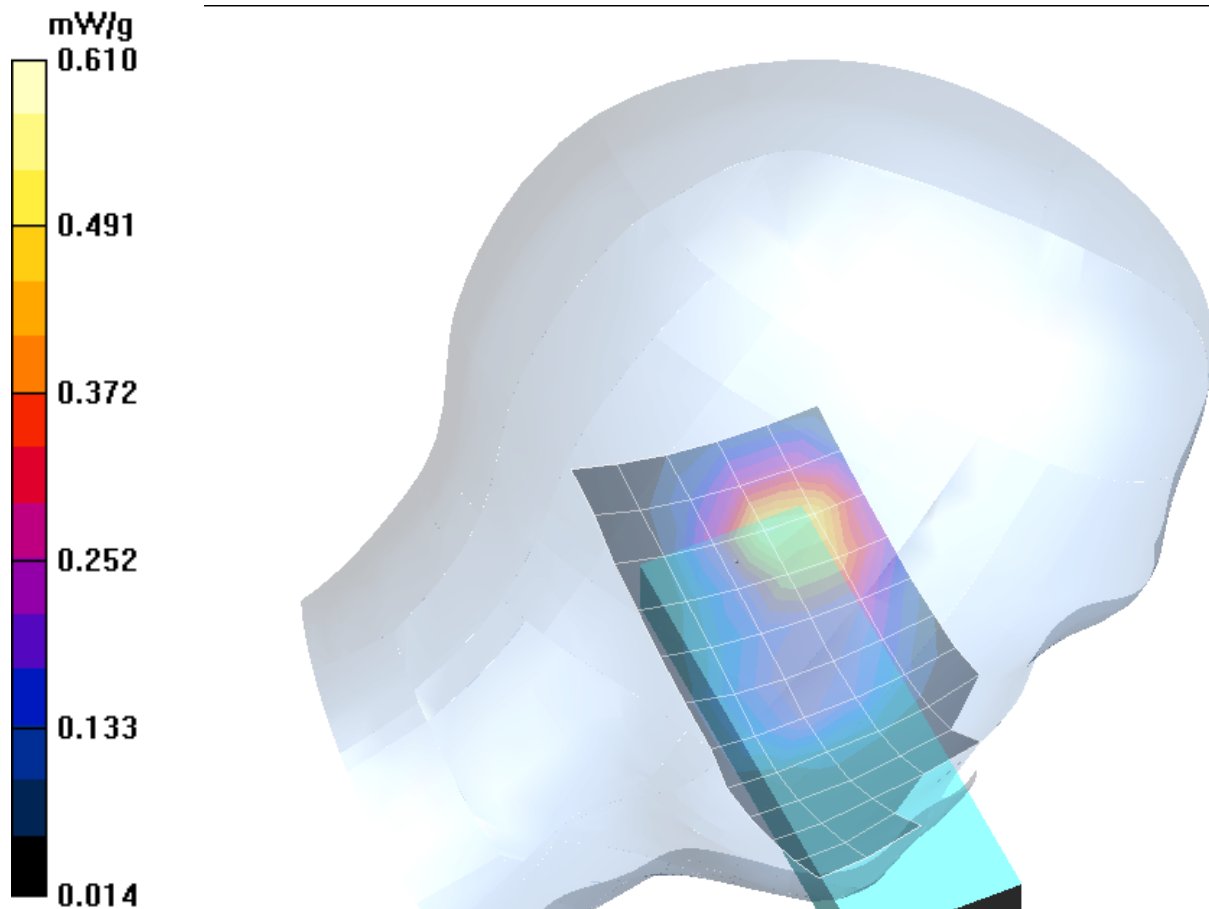


Fig. 17: SAR distribution for PCS 1900, channel 661, cheek position, left side of head Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.6° C).

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

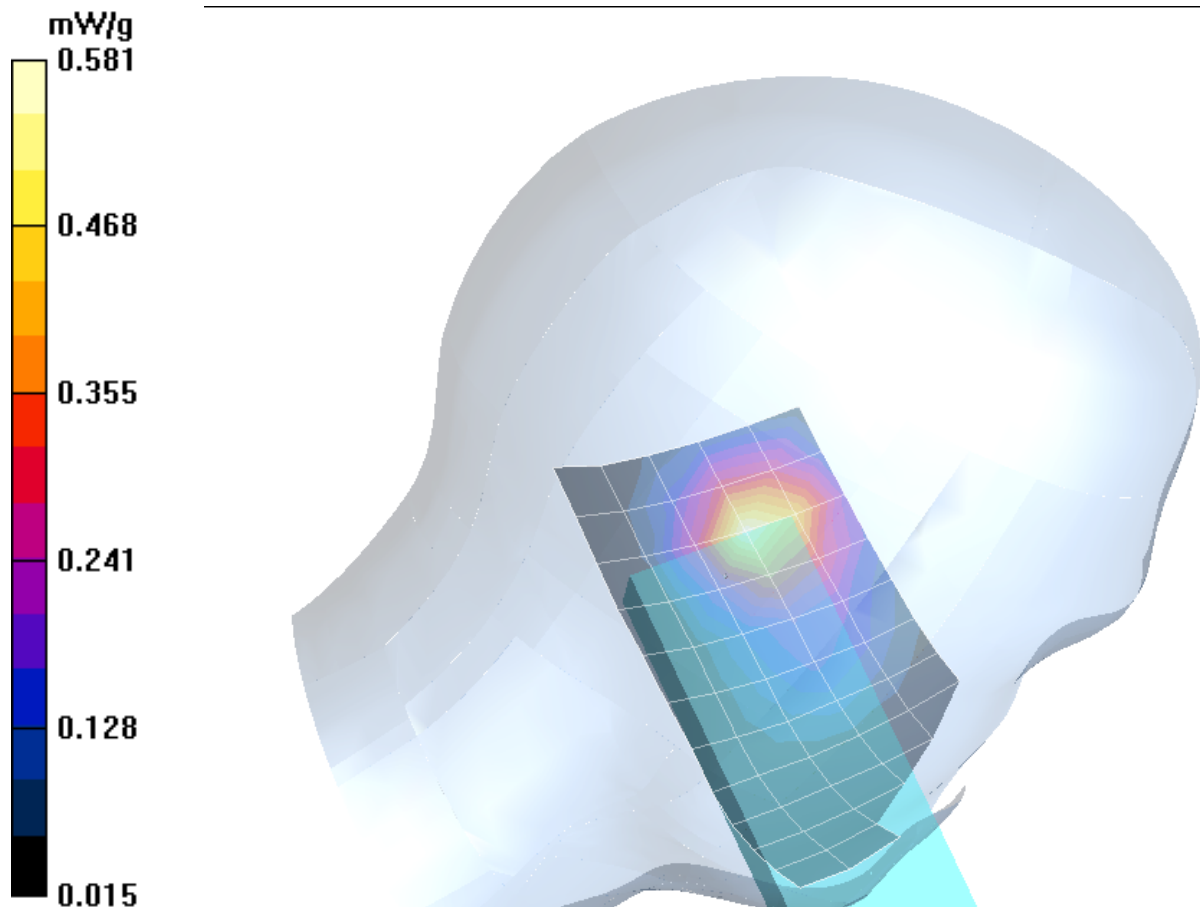


Fig. 18: SAR distribution for PCS 1900, channel 661, tilted position, left side of head Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.6° C).

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

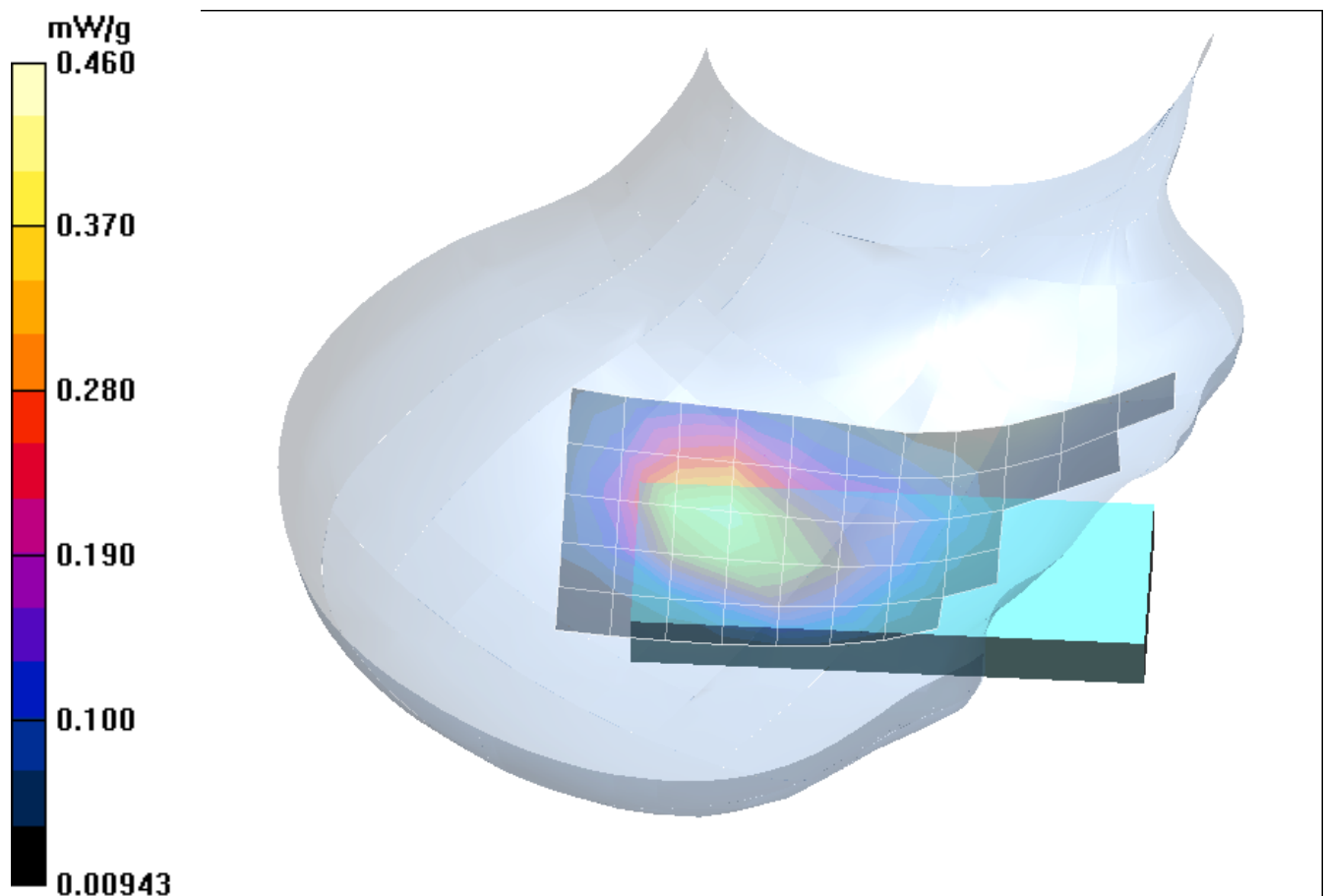


Fig. 19: SAR distribution for PCS 1900, channel 661, cheek position, right side of head Butterfly. (21.10.2004; Ambient Temperature: 21.9° C; Liquid Temperature : 20.7° C).

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

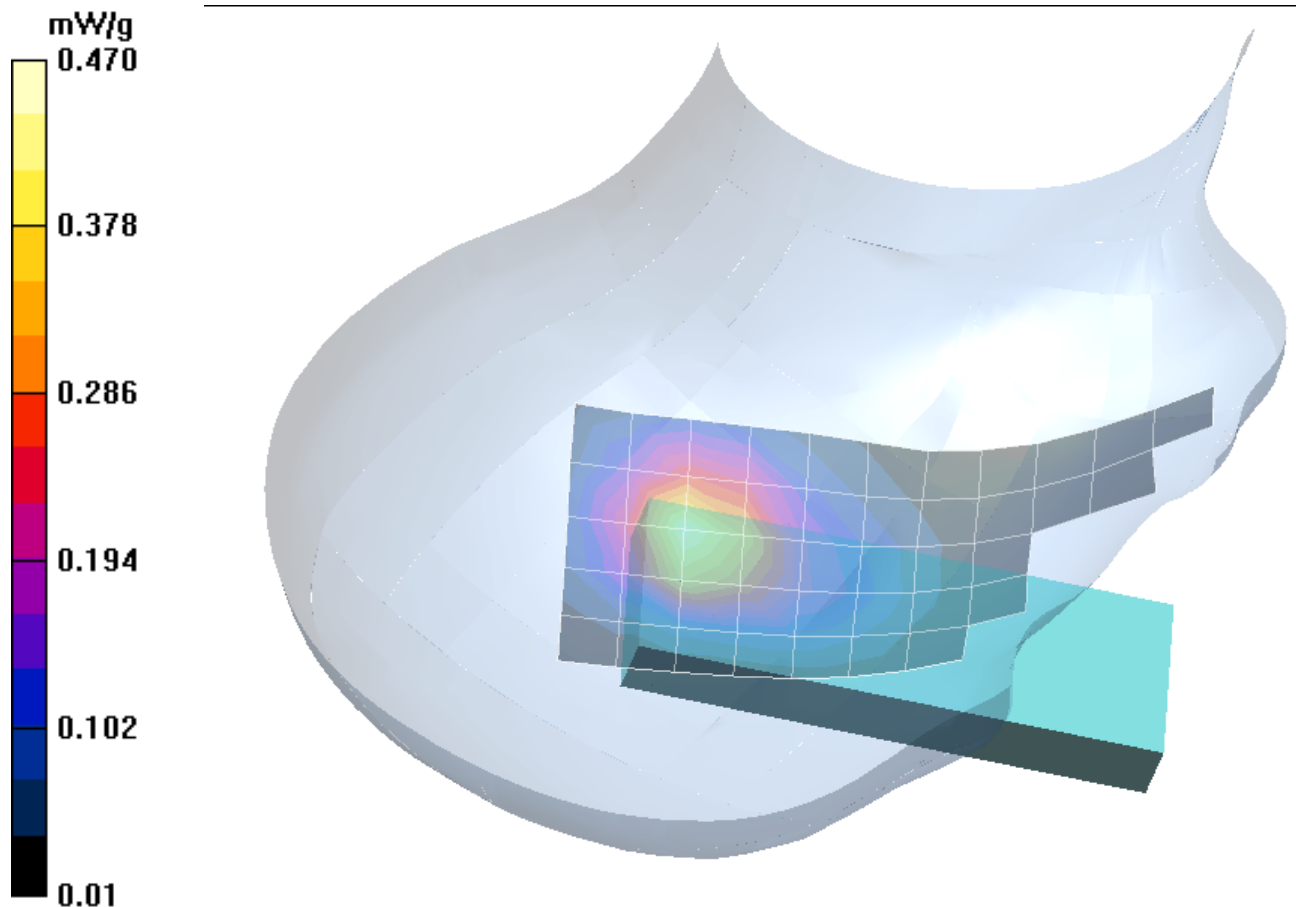


Fig. 20: SAR distribution for PCS 1900, channel 661, tilted position, right side of head Butterfly. (21.10.2004; Ambient Temperature: 21.8° C; Liquid Temperature :20.7° C).

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

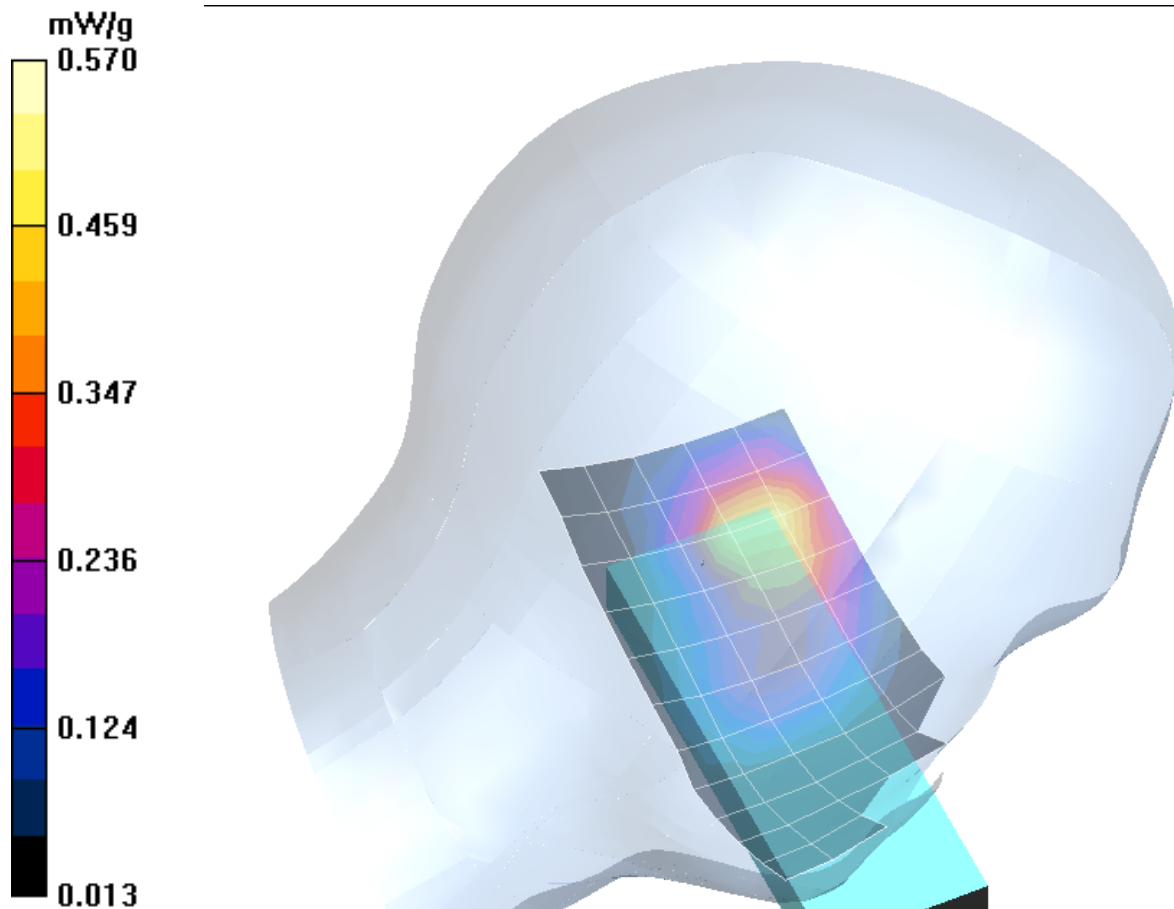


Fig. 21: SAR distribution for PCS 1900, channel 661, cheek position, left side of head ARC. (21.10.2004; Ambient Temperature: 21.7° C; Liquid Temperature : 20.7° C).

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

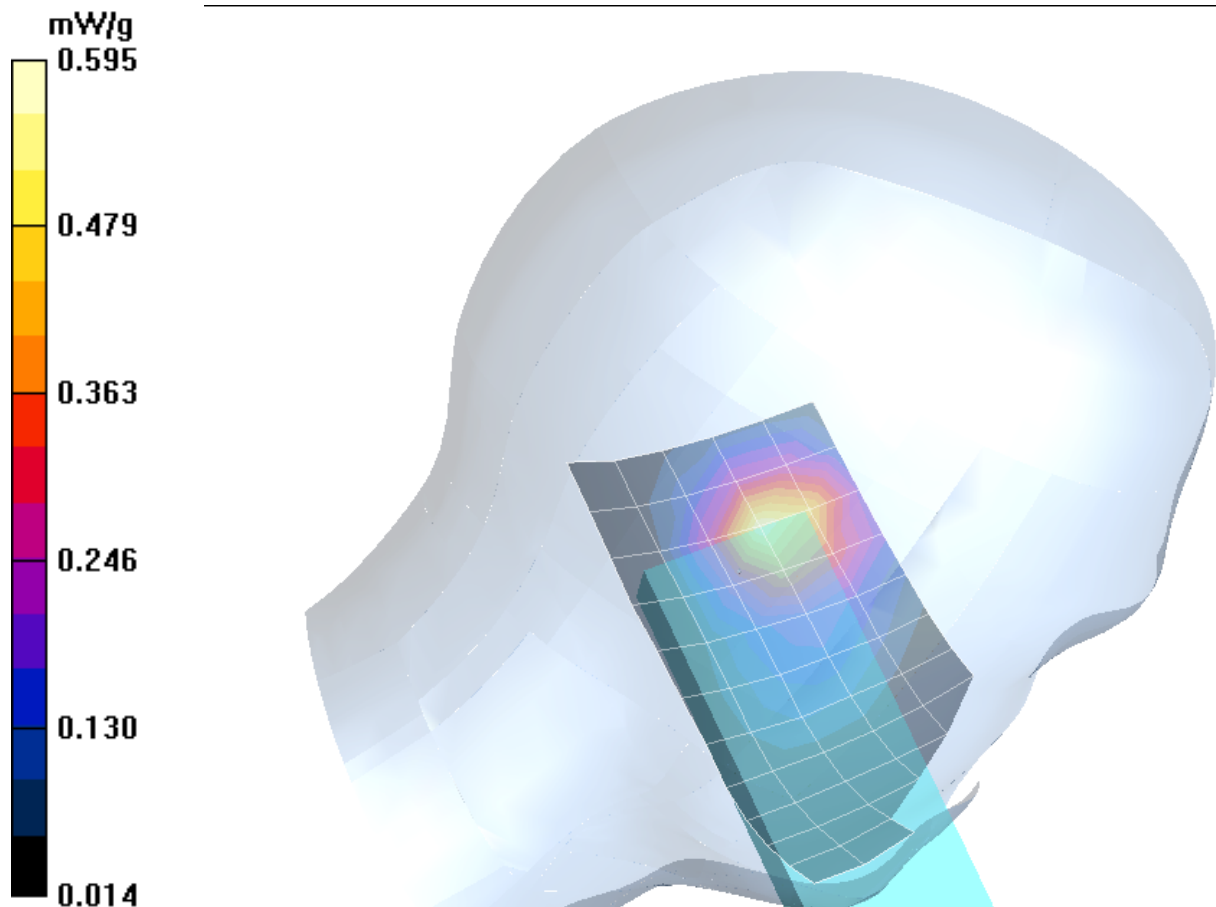


Fig. 22: SAR distribution for PCS 1900, channel 661, tilted position, left side of head ARC. (21.10.2004; Ambient Temperature: 21.6° C; Liquid Temperature : 20.7° C).

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

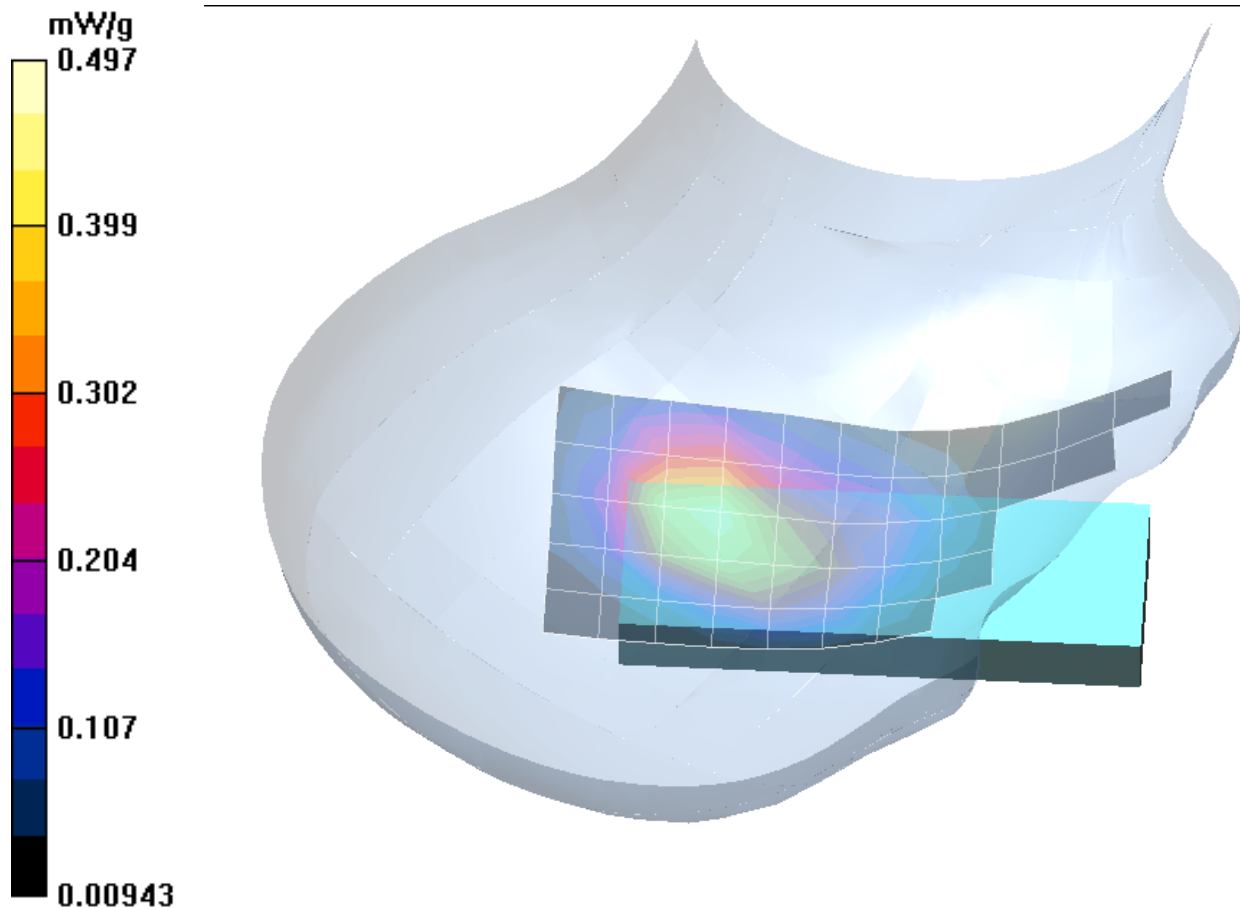


Fig. 23: SAR distribution for PCS 1900, channel 661, cheek position, right side of head ARC. (21.10.2004; Ambient Temperature: 21.7° C; Liquid Temperature : 20.7° C).

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, $\epsilon_r = 38.7$; $\rho = 1000$ 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) = 0.471 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

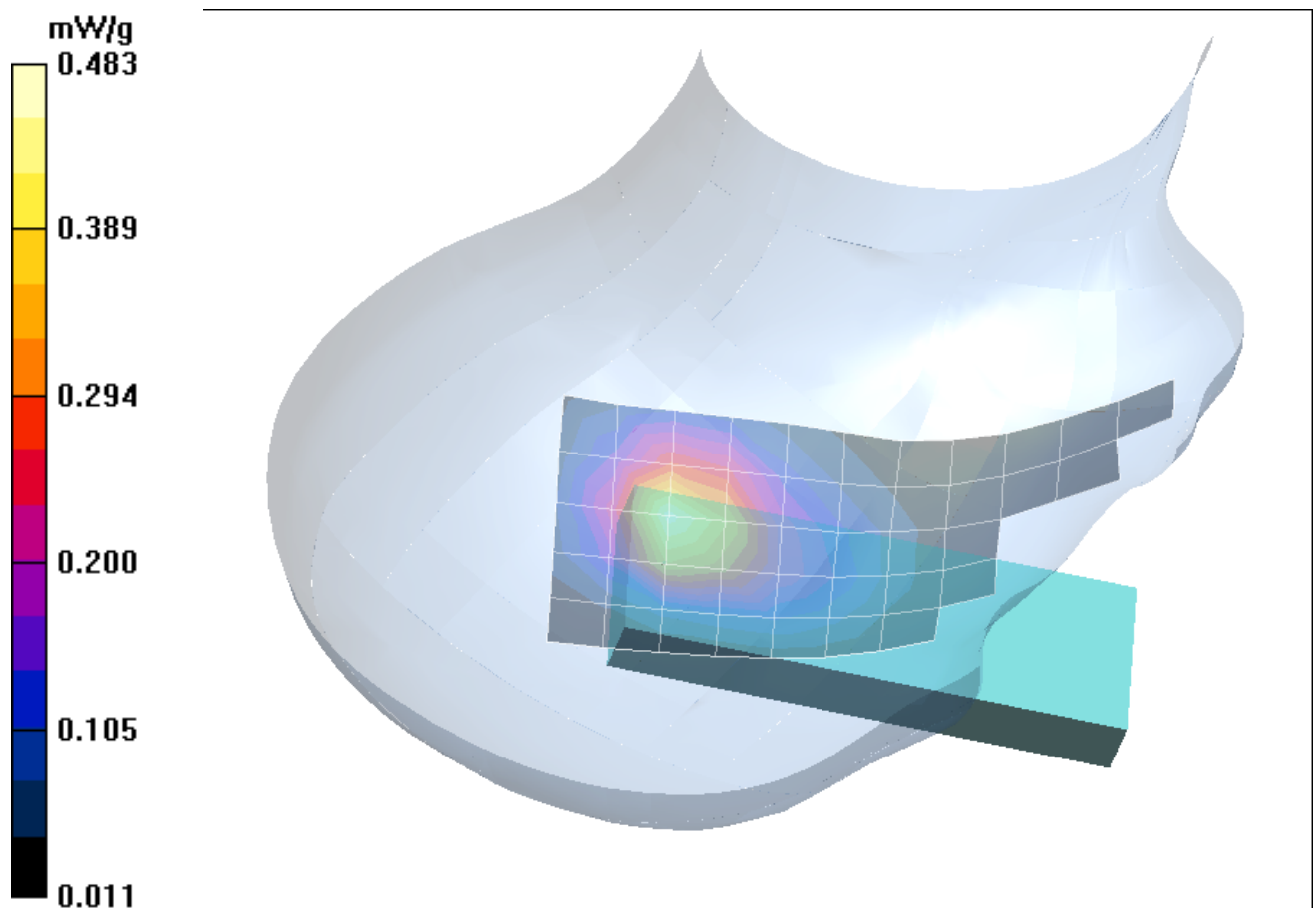


Fig. 24: SAR distribution for PCS 1900, channel 661, tilted position, right side of head ARC. (21.10.2004; Ambient Temperature: 21.7° C; Liquid Temperature : 20.7° C).

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

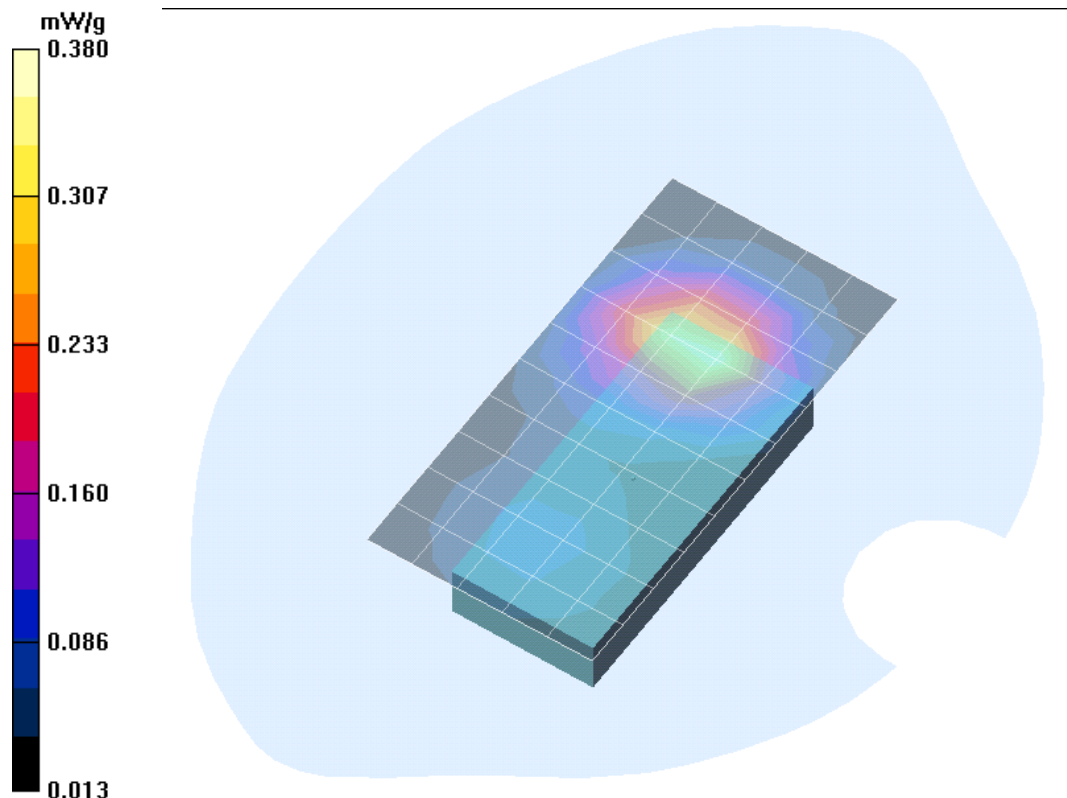


Fig. 25: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, Standard cover, (29.10.2004; Ambient Temperature: 21.6° C; Liquid Temperature : 20.6° C).

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

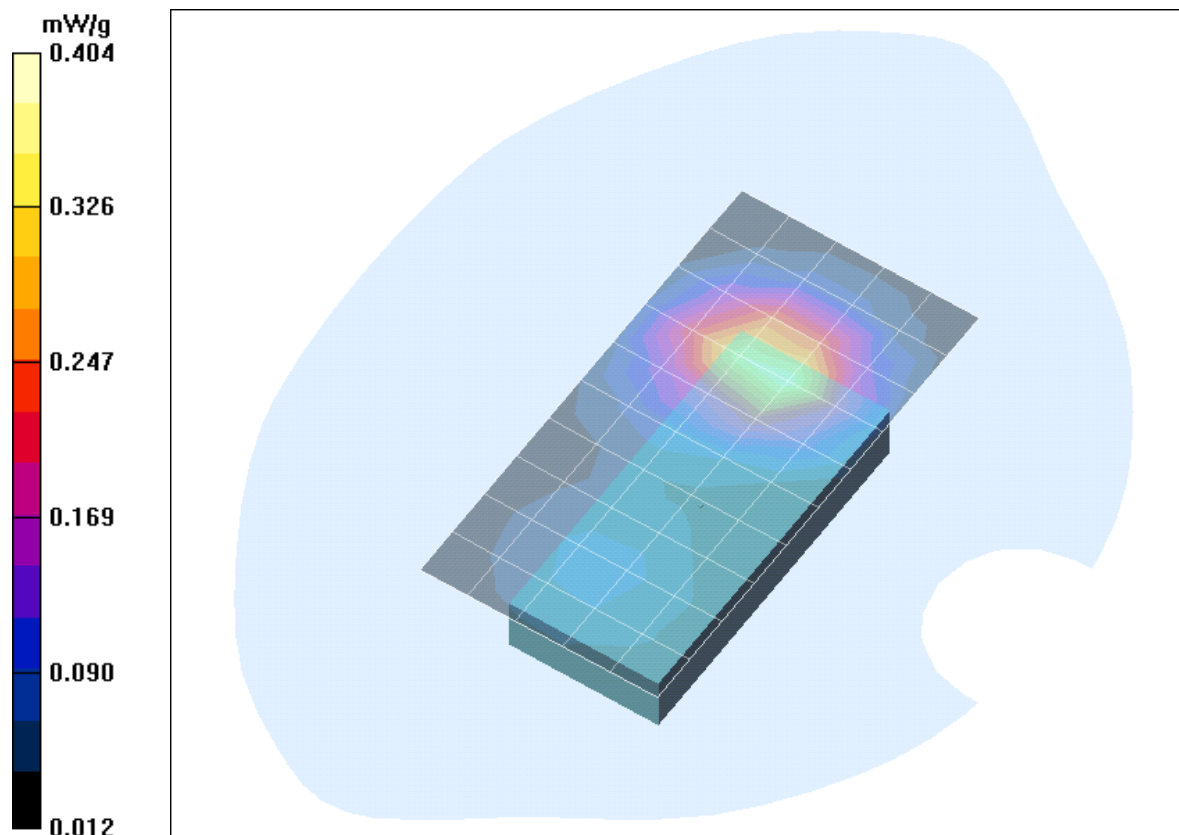


Fig. 26: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, Butterfly cover, (29.10.2004; Ambient Temperature: 21.5° C; Liquid Temperature : 20.6° C).

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

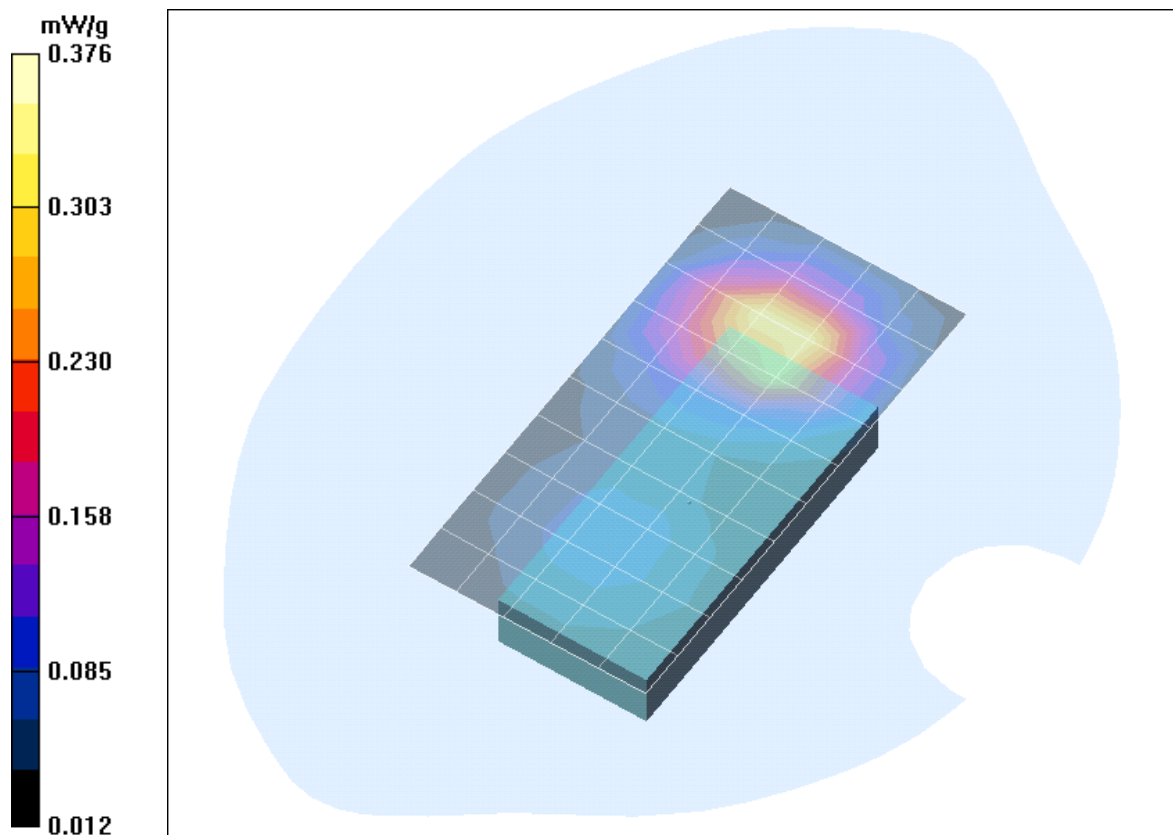


Fig. 27: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, ARC cover (29.10.2004; Ambient Temperature: 21.5° C; Liquid Temperature : 20.6° C).

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, $\epsilon_r = 54$; $\rho = 1000 \text{ kg/m}^3$

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

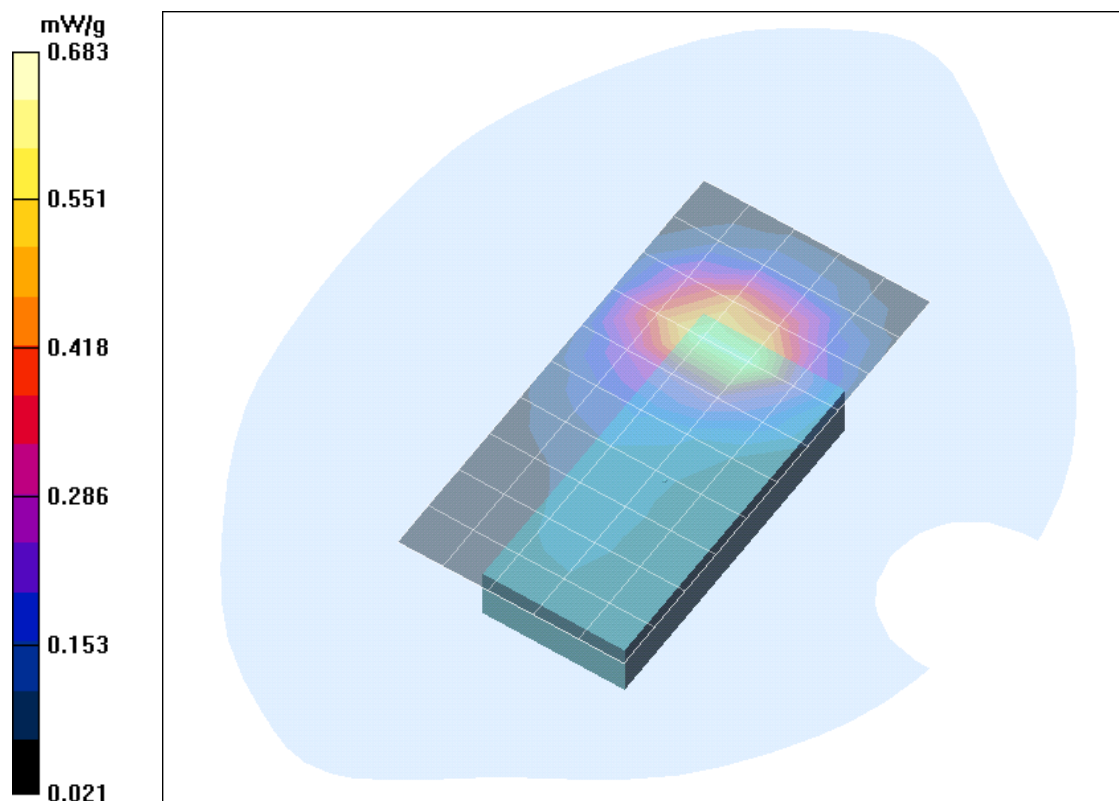


Fig. 28: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, Standard cover with data cable, 2 TX (29.10.2004; Ambient Temperature: 21.6° C; Liquid Temperature : 20.6° C).

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

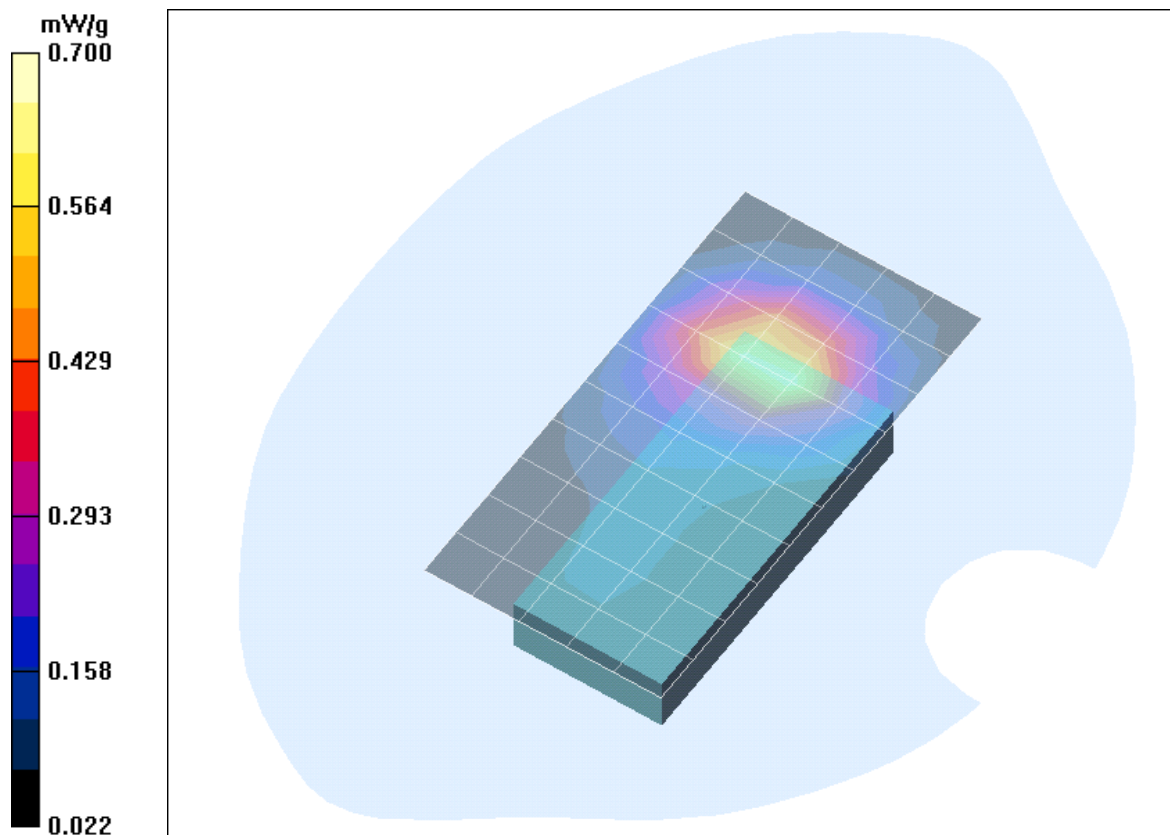


Fig. 29: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, Butterfly cover with data cable, 2 TX (29.10.2004; Ambient Temperature: 21.5° C; Liquid Temperature : 20.6 C).

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

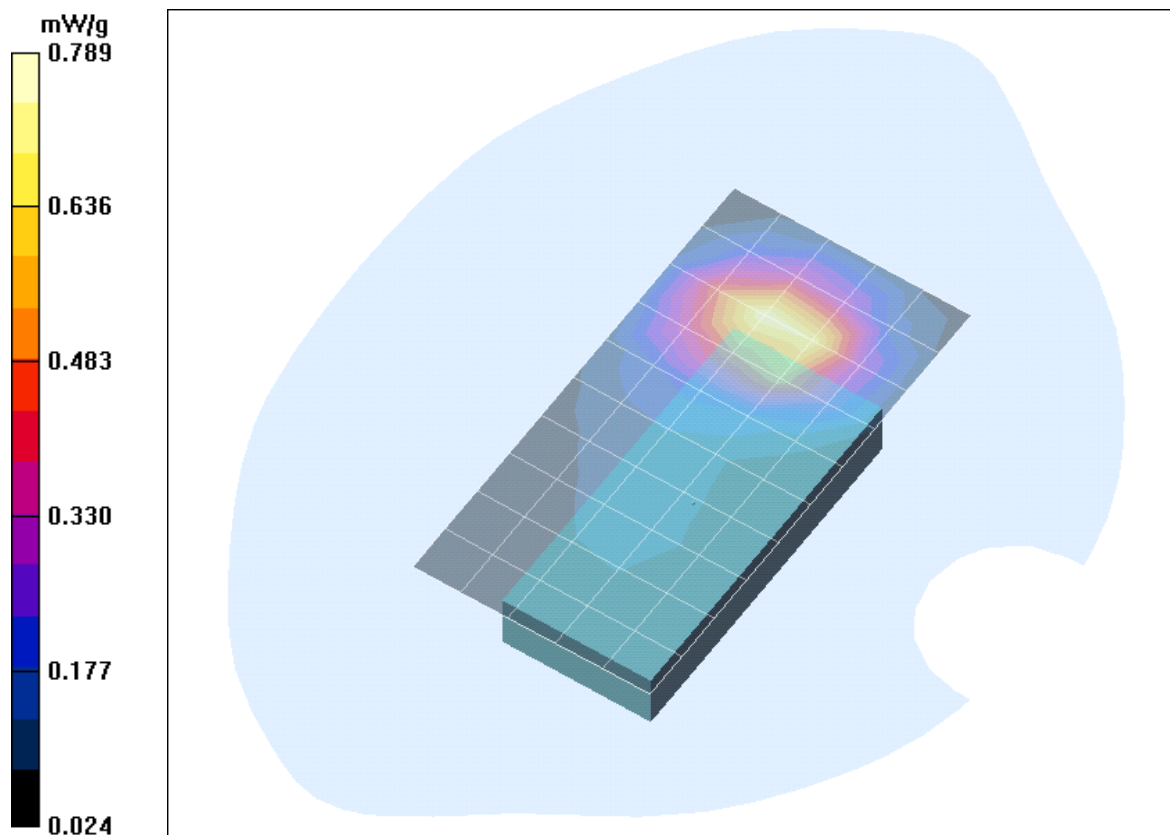


Fig. 30: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, ARC cover with data cable, 2 TX (29.10.2004; Ambient Temperature: 21.5° C; Liquid Temperature : 20.6° C).

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

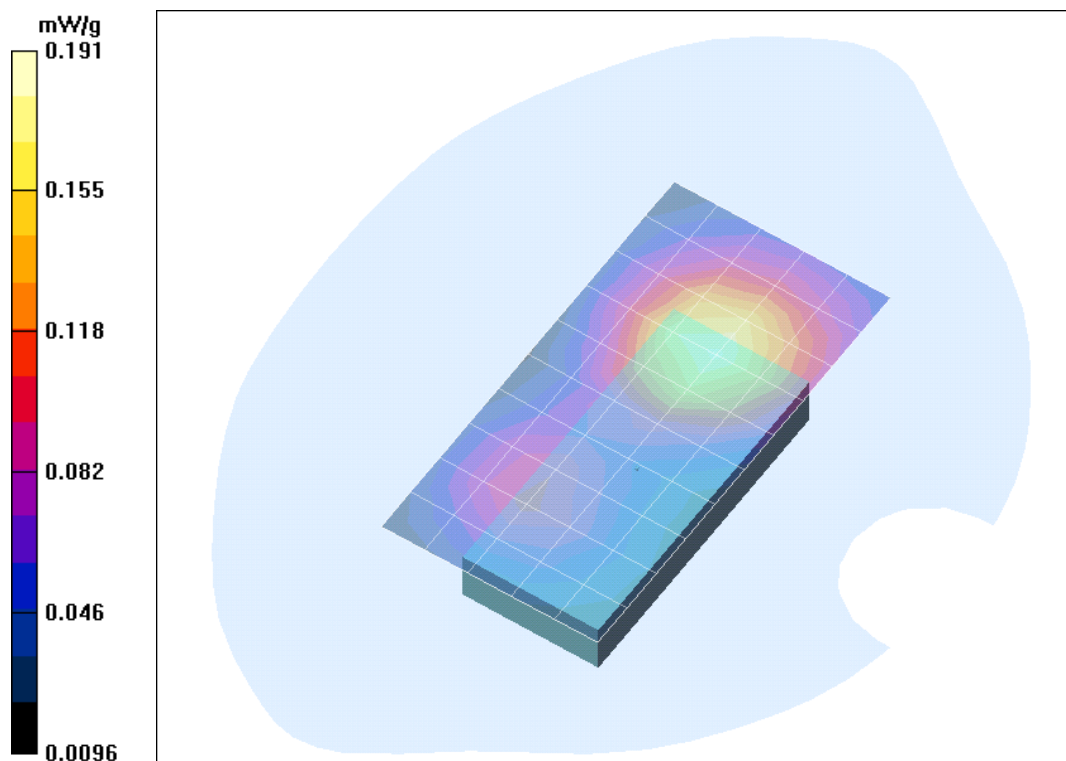


Fig. 31: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the ground, Standard cover in PTT mode, 2 TX (06.08.2004; Ambient Temperature: 22.9° C; Liquid Temperature : 21.5° C).

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

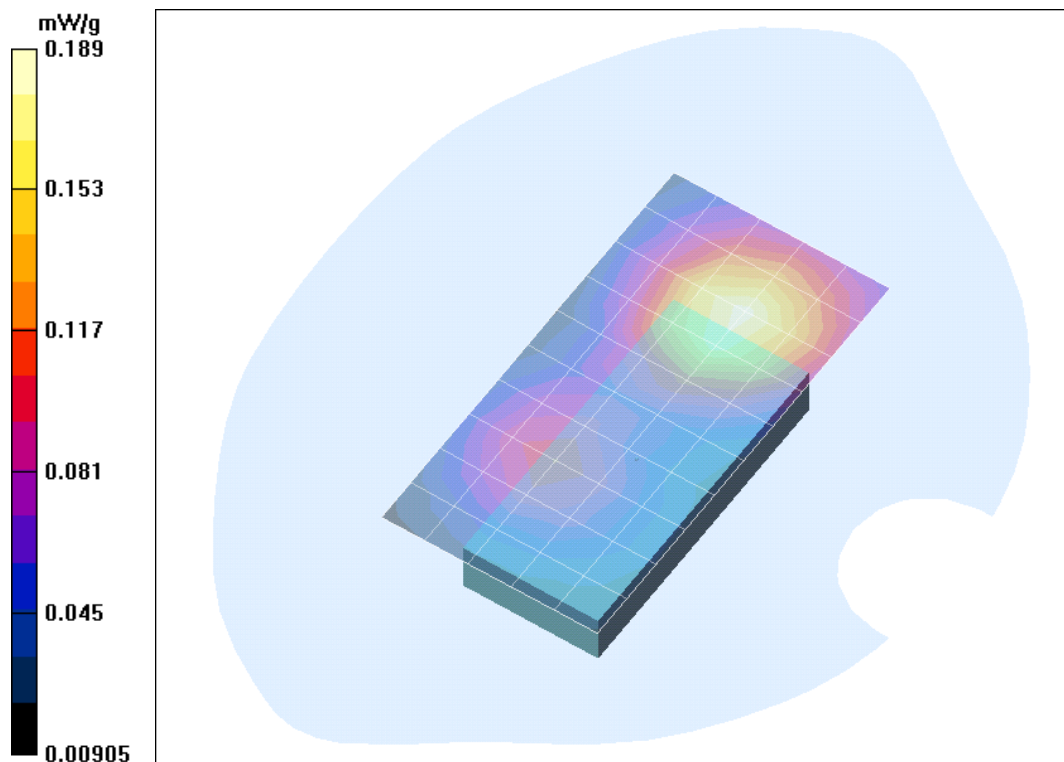


Fig. 32: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the phantom, BF cover in PTT mode, 2 TX (06.08.2004; Ambient Temperature: 22.6° C; Liquid Temperature : 21.1 C).

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

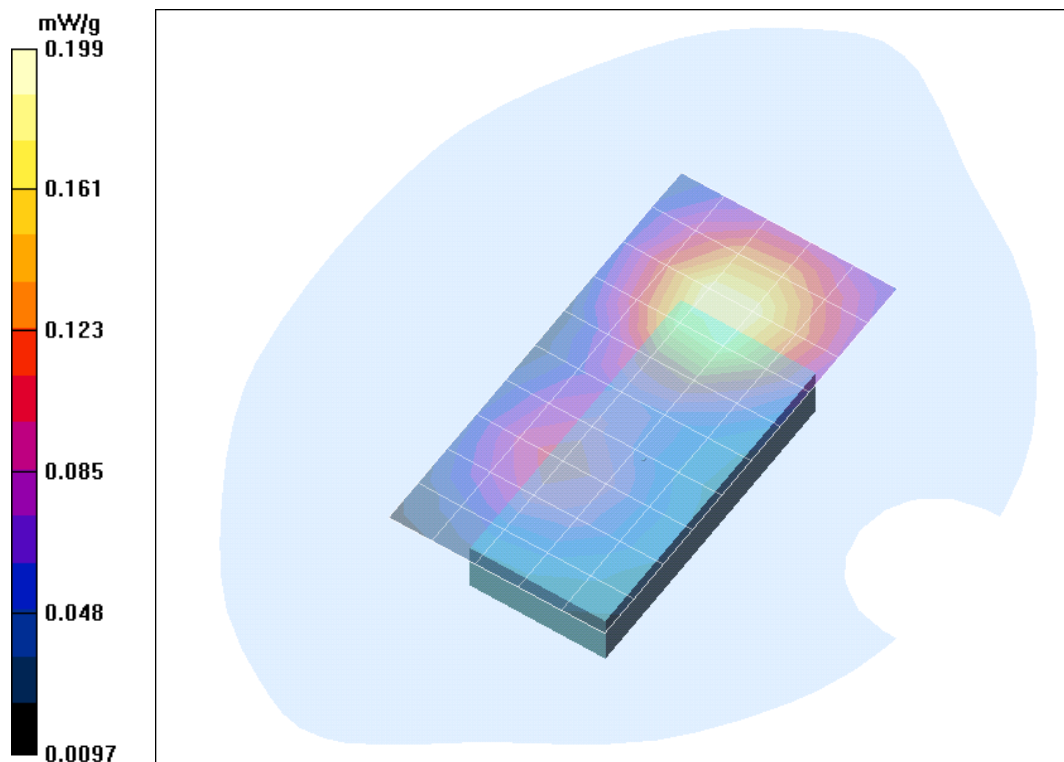


Fig. 33: SAR distribution for PCS 1900, channel 661, body worn configuration, antenna towards the ground, Butterfly cover in PTT mode, 2 TX (06.08.2004; Ambient Temperature: 22.8° C; Liquid Temperature : 21.3° C).

6 SAR z-axis scans (Validation)

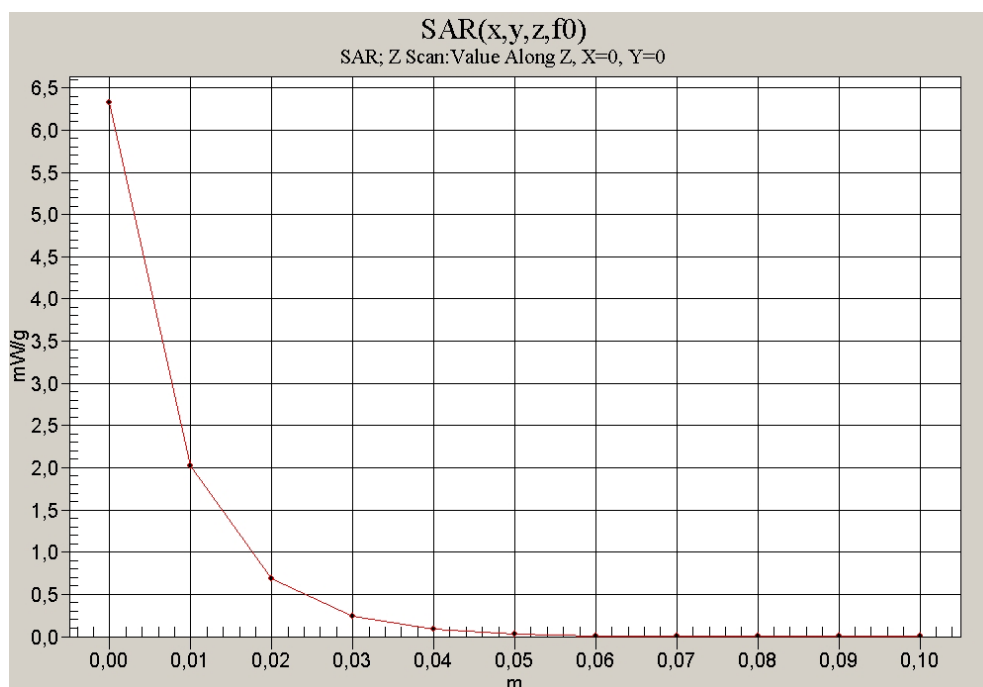


Fig. 34: SAR versus liquid depth, 1900 MHz, head (21.10.2004; Ambient Temperature: 22.0° C; Liquid Temperature : 20.8° C).

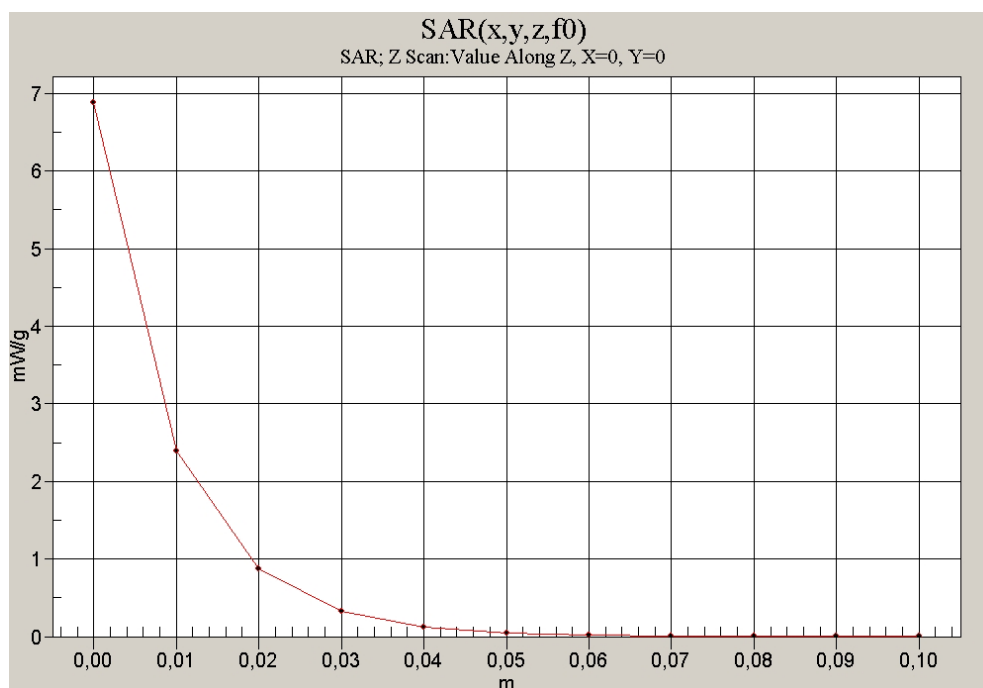


Fig. 35: SAR versus liquid depth, 1900 MHz, body (28.10.2004; Ambient Temperature: 22.2° C; Liquid Temperature : 20.7° C).

7 SAR z-axis scans (Measurements)

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

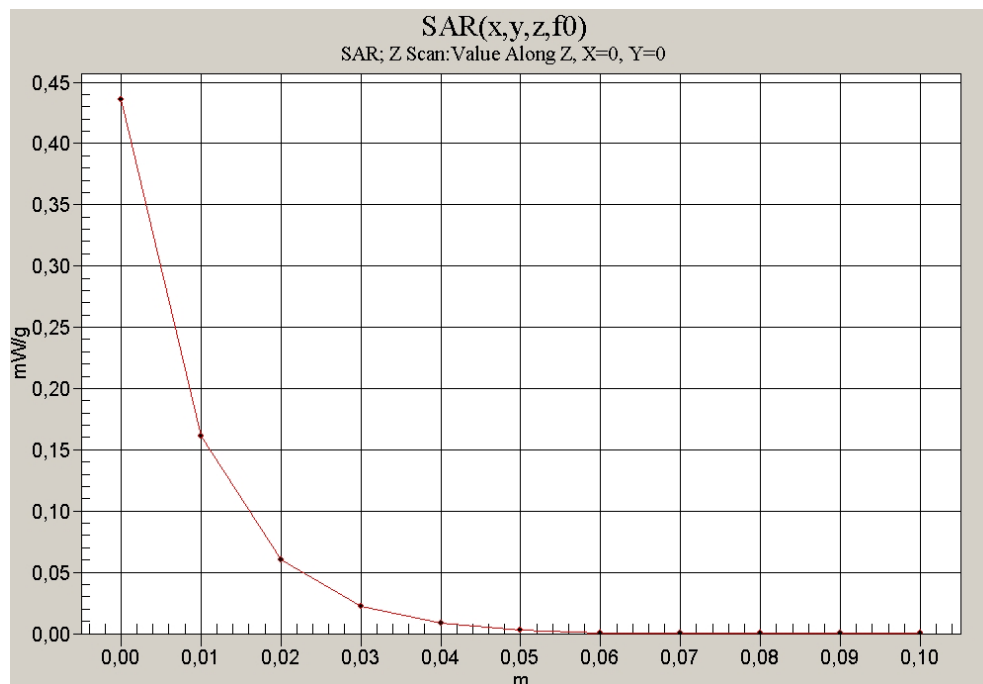


Fig. 36: SAR versus liquid depth, head: without flash, PCS 1900, channel 661, tilted position, left side of head with Butterfly cover. (21.10.2004, Ambient Temperature: 21.9° C; Liquid Temperature : 20.6° C).

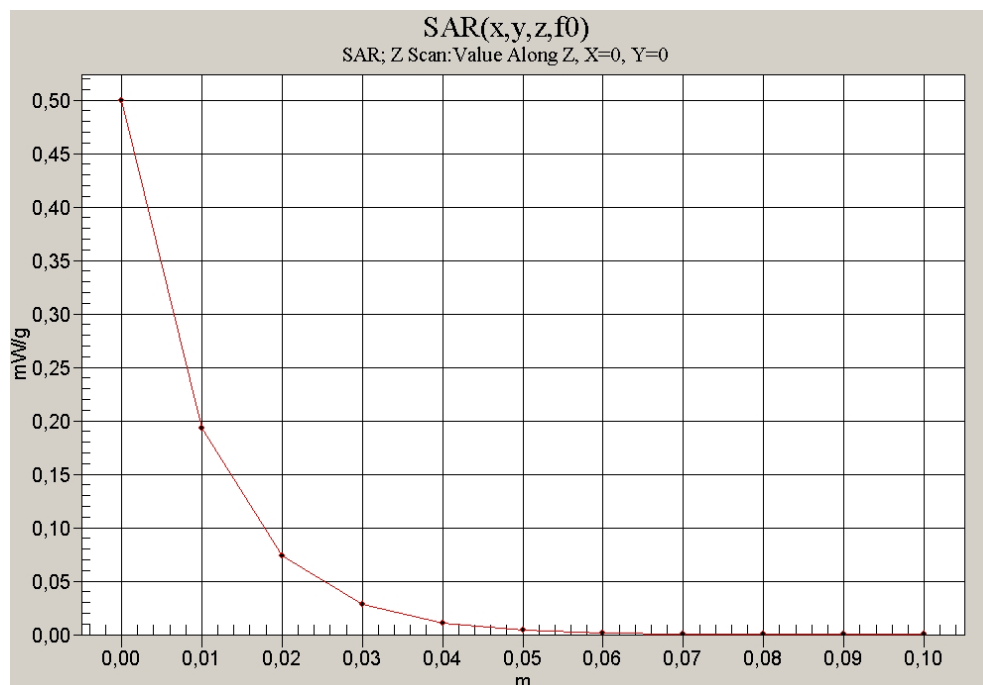


Fig. 37: SAR versus liquid depth: PCS 1900 body, channel 661, body worn configuration, antenna towards the phantom, GPRS Class 10 with data cable, ARC cover (29.10.2004, Ambient Temperature: 21.5° C; Liquid Temperature : 20.6° C).