



Appendix B. SAR Measurement Plots

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UMTS Band V Body
UMTS Band II Body
LTE Band XVII Body

Test Laboratory: HUAWEI SAR/HAC Lab

HWD32 UMTS Band V 4182CH Back Side 5mm

DUT: HWD32; Type: LTE USB Stick; Serial: SAR2

Communication System: UID 0, HW-UMTS-FDD(WCDMA) (0); Frequency: 836.4 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated): $f = 836.4$ MHz; $\sigma = 0.958$ S/m; $\epsilon_r = 53.692$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY Configuration:

- Probe: ES3DV3 - SN3168; ConvF(6.21, 6.21, 6.21); Calibrated: 2014-9-24;
- Sensor-Surface: 3mm (Mechanical Surface Detection), $z = 2.0, 32.0$
- Electronics: DAE4 Sn852; Calibrated: 2014-4-30
- Phantom: SAM4; Type: SAM; Serial: TP-1620
- DASY52 52.8.8(1222); SEMCAD X 14.6.10(7331)

Configuration/Body/Area Scan (7x10x1): Measurement grid: $dx=15$ mm, $dy=15$ mm

[Info: Interpolated medium parameters used for SAR evaluation.](#)

Maximum value of SAR (measured) = 0.650 W/kg

Configuration/Body/Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8$ mm, $dy=8$ mm, $dz=5$ mm

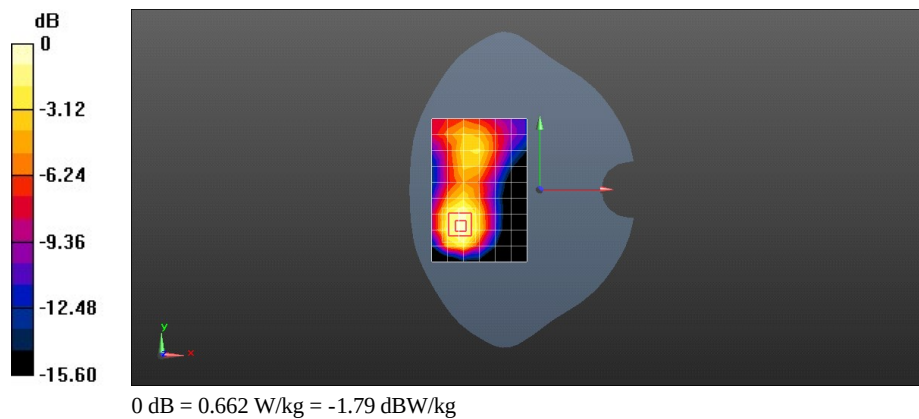
Reference Value = 2.057 V/m; Power Drift = -0.02 dB

Peak SAR (extrapolated) = 1.12 W/kg

SAR(1 g) = 0.575 W/kg; SAR(10 g) = 0.357 W/kg

[Info: Interpolated medium parameters used for SAR evaluation.](#)

Maximum value of SAR (measured) = 0.662 W/kg



Test Laboratory: HUAWEI SAR/HAC Lab

HWD32 UMTS Band II 9538CH Back Side 5mm-repeated

DUT: HWD32; Type: LTE USB Stick; Serial: SAR2

Communication System: UID 0, HW-UMTS-FDD(WCDMA) (0); Frequency: 1907.6 MHz; Duty Cycle: 1:1

Medium parameters used: $f = 1908$ MHz; $\sigma = 1.539$ S/m; $\epsilon_r = 51.605$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

DASY Configuration:

- Probe: ES3DV3 - SN3168; ConvF(4.72, 4.72, 4.72); Calibrated: 2014-9-24;
- Sensor-Surface: 3mm (Mechanical Surface Detection), $z = 2.0, 32.0$
- Electronics: DAE4 Sn852; Calibrated: 2014-4-30
- Phantom: SAM3; Type: SAM; Serial: TP-1597
- DASY52 52.8.8(1222); SEMCAD X 14.6.10(7331)

Configuration/Body/Area Scan (5x10x1): Measurement grid: $dx=15$ mm, $dy=15$ mm

Maximum value of SAR (measured) = 0.906 W/kg

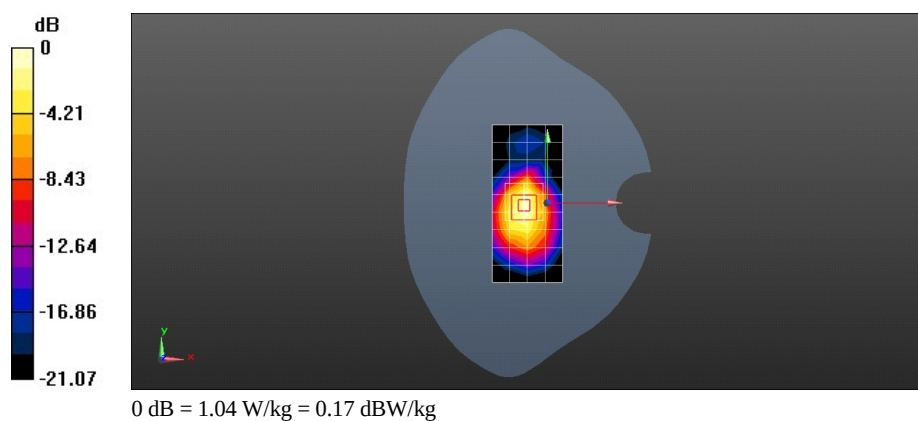
Configuration/Body/Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8$ mm, $dy=8$ mm, $dz=5$ mm

Reference Value = 24.32 V/m; Power Drift = 0.11 dB

Peak SAR (extrapolated) = 1.45 W/kg

SAR(1 g) = 0.843 W/kg; SAR(10 g) = 0.455 W/kg

Maximum value of SAR (measured) = 1.04 W/kg



Test Laboratory: HUAWEI SAR/HAC Lab

HWD32 LTE Band XVII 10M QPSK 1RB#0 23780CH Back Side 5mm

DUT: HWD32; Type: LTE USB Stick; Serial: SAR2

Communication System: UID 0, LTE-FDD (SC-FDMA, 10MHz, QPSK/16-QAM) (0); Frequency: 709 MHz; Duty Cycle: 1:1
Medium parameters used: $f = 709 \text{ MHz}$; $\sigma = 0.919 \text{ S/m}$; $\epsilon_r = 55.703$; $\rho = 1000 \text{ kg/m}^3$

Phantom section: Flat Section

DASY Configuration:

- Probe: ES3DV3 - SN3168; ConvF(6.21, 6.21, 6.21); Calibrated: 2014-9-24;
- Sensor-Surface: 3mm (Mechanical Surface Detection), $z = 2.0, 32.0$
- Electronics: DAE4 Sn852; Calibrated: 2014-4-30
- Phantom: SAM4; Type: SAM; Serial: TP-1620
- DASY52 52.8.8(1222); SEMCAD X 14.6.10(7331)

Configuration/Body/Area Scan (7x10x1): Measurement grid: $dx=15\text{mm}$, $dy=15\text{mm}$

Maximum value of SAR (measured) = 0.643 W/kg

Configuration/Body/Zoom Scan (6x7x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 23.50 V/m ; Power Drift = 0.12 dB

Peak SAR (extrapolated) = 1.06 W/kg

SAR(1 g) = 0.569 W/kg ; SAR(10 g) = 0.376 W/kg

Maximum value of SAR (measured) = 0.652 W/kg

