

Appendix A

System Validation Plots

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1. D2450V2-SN: 904 Validation Plot 3

1. D2450V2-SN: 904 Validation Plot

Date: 21.04.2025

Test Laboratory: Guangdong Dongdian Testing Service Co., Ltd.

2450

DUT: Dipole 2450 MHz D2450V2; Type: D2450V2; Serial: D2450V2 - SN:904

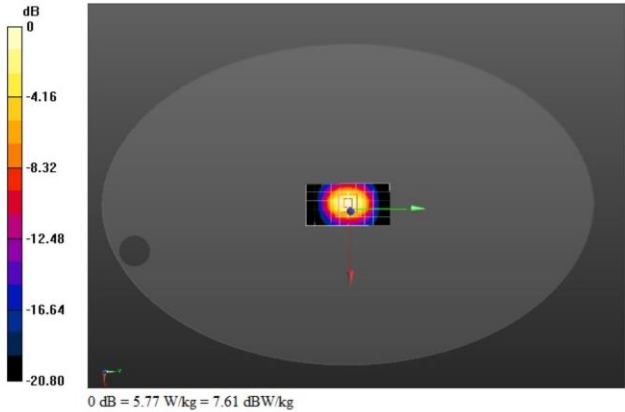
Communication System: UID 0, CW (0); Communication System Band: D2450 (2450.0 MHz); Frequency: 2450 MHz; Communication System PAR: 0 dB; PMF: 1
Medium parameters used: $f = 2450$ MHz; $\sigma = 1.78$ S/m; $\epsilon_r = 38.482$; $\rho = 1000$ kg/m³
Phantom section: Flat Section
Measurement Standard: DASYS (IEEE/IEC/ANSI C63.19-2011)

DASY Configuration:

- Probe: EX3DV4 - SN3906; ConvF(7.95, 7.95, 7.95) @ 2450 MHz; Calibrated: 29.04.2024
- Sensor-Surface: 3mm (Mechanical Surface Detection), Sensor-Surface: 4mm (Mechanical Surface Detection), $z = 1.0, 31.0$
- Electronics: DAE4 Sn1366; Calibrated: 29.04.2024
- Phantom: ELI v5.0; Type: QDOVA002AA; Serial: TP:1197
- DASY52 52.10.4(1535); SEMCAD X 14.6.14(7501)

Configuration/tilt/Area Scan (6x11x1): Measurement grid: $dx=10$ mm, $dy=10$ mm
Maximum value of SAR (measured) = 6.01 W/kg

Configuration/tilt/Zoom Scan (7x7x7)/Cube 0: Measurement grid: $dx=5$ mm, $dy=5$ mm, $dz=5$ mm
Reference Value = 57.28 V/m; Power Drift = -0.07 dB
Peak SAR (extrapolated) = 10.6 W/kg
SAR(1 g) = 5.09 W/kg; SAR(10 g) = 2.39 W/kg
Smallest distance from peaks to all points 3 dB below = 10 mm
Ratio of SAR at M2 to SAR at M1 = 50%
Maximum value of SAR (measured) = 5.77 W/kg



2. D5GV2-SN: 1148 Validation Plot

Date: 23.04.2025

Test Laboratory: Guangdong Dongdian Testing Service Co., Ltd.

5G

DUT: Dipole D5GHzV2; Type: D5GHzV2; Serial: D5GHzV2 - SN 1148

Communication System: UID 0, CW (0); Communication System Band: D5GHz (5000.0 - 6000.0 MHz); Frequency: 5200 MHz; Communication System PAR: 0 dB; PMF: 1

Medium parameters used: $f = 5200$ MHz; $\sigma = 4.487$ S/m; $\epsilon_r = 36.961$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

Measurement Standard: DASYS (IEEE/IEC/ANSI C63.19-2011)

DASY Configuration:

- Probe: EX3DV4 - SN3906; ComF(5.65, 5.65, 5.65) @ 5200 MHz; Calibrated: 29.04.2024
- Sensor-Surface: 3mm (Mechanical Surface Detection), Sensor-Surface: 4mm (Mechanical Surface Detection), $z = 1.0, 25.0$
- Electronics: DAE4 Sn1366; Calibrated: 29.04.2024
- Phantom: ELI v5.0; Type: QDOVA002AA; Serial: TP-1197
- DASY52 52.10.4(1535); SEMCAD X 14.6.14(7501)

Configuration/5200/Area Scan (6x11x1): Measurement grid: $dx=10$ mm, $dy=10$ mm

Maximum value of SAR (measured) = 12.1 W/kg

Configuration/5200/Zoom Scan (7x7x7)/Cube 0: Measurement grid: $dx=5$ mm, $dy=5$ mm, $dz=1.4$ mm

Reference Value = 39.61 V/m; Power Drift = 0.11 dB

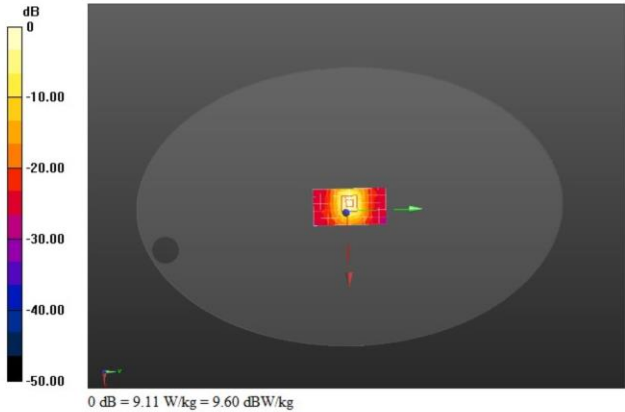
Peak SAR (extrapolated) = 29.3 W/kg

SAR(1 g) = 7.81 W/kg; SAR(10 g) = 2.27 W/kg

Smallest distance from peaks to all points 3 dB below = 7.6 mm

Ratio of SAR at M2 to SAR at M1 = 67.9%

Maximum value of SAR (measured) = 9.11 W/kg



Date: 23.04.2025

Test Laboratory: Guangdong Dongdian Testing Service Co., Ltd.

5G

DUT: Dipole D5GHzV2; Type: D5GHzV2; Serial: D5GHzV2 - SN 1148

Communication System: UID 0, CW (0); Communication System Band: D5GHz (5000.0 - 6000.0 MHz); Frequency: 5300 MHz; Communication System PAR: 0 dB; PMF: 1

Medium parameters used: $f = 5300 \text{ MHz}$; $\sigma = 4.628 \text{ S/m}$; $\epsilon_r = 36.705$; $\rho = 1000 \text{ kg/m}^3$

Phantom section: Flat Section

Measurement Standard: DASY5 (IEEE/IEC/ANSI C63.19-2011)

DASY Configuration:

- Probe: EX3DV4 - SN3906; ComF(5.51, 5.51, 5.51) @ 5300 MHz; Calibrated: 29.04.2024
- Sensor-Surface: 3mm (Mechanical Surface Detection), Sensor-Surface: 4mm (Mechanical Surface Detection), $z = 1.0, 25.0$
- Electronics: DAE4 Sn1366; Calibrated: 29.04.2024
- Phantom: ELI v5.0; Type: QDOVA002AA; Serial: TP-1197
- DASY52 52.10.4(1535); SEMCAD X 14.6.14(7501)

Configuration/5300/Area Scan (6x11x1): Measurement grid: $dx=10\text{mm}$, $dy=10\text{mm}$

Maximum value of SAR (measured) = 9.76 W/kg

Configuration/5300/Zoom Scan (7x7x7)/Cube 0: Measurement grid: $dx=5\text{mm}$, $dy=5\text{mm}$, $dz=1.4\text{mm}$

Reference Value = 37.72 V/m; Power Drift = 0.18 dB

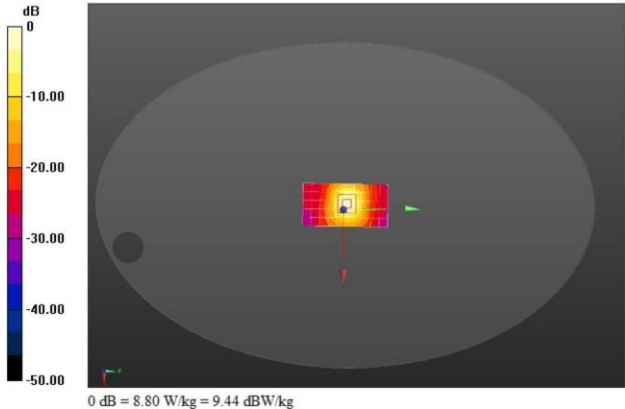
Peak SAR (extrapolated) = 28.8 W/kg

SAR(1 g) = 7.59 W/kg; SAR(10 g) = 2.2 W/kg

Smallest distance from peaks to all points 3 dB below = 7.3 mm

Ratio of SAR at M2 to SAR at M1 = 67.3%

Maximum value of SAR (measured) = 8.80 W/kg



Date: 23.04.2025

Test Laboratory: Guangdong Dongdian Testing Service Co., Ltd.

5G

DUT: Dipole D5GHzV2; Type: D5GHzV2; Serial: D5GHzV2 - SN 1148

Communication System: UID 0, CW (0); Communication System Band: D5GHz (5000.0 - 6000.0 MHz); Frequency: 5500 MHz; Communication System PAR: 0 dB; PMF: 1

Medium parameters used: $f = 5500 \text{ MHz}$; $\sigma = 4.822 \text{ S/m}$; $\epsilon_r = 35.942$; $\rho = 1000 \text{ kg/m}^3$

Phantom section: Flat Section

Measurement Standard: DASY5 (IEEE/IEC/ANSI C63.19-2011)

DASY Configuration:

- Probe: EX3DV4 - SN3906; ComF(5.06, 5.06, 5.06) @ 5500 MHz; Calibrated: 29.04.2024
- Sensor-Surface: 3mm (Mechanical Surface Detection), Sensor-Surface: 4mm (Mechanical Surface Detection), $z = 1.0, 25.0$
- Electronics: DAE4 Sn1366; Calibrated: 29.04.2024
- Phantom: ELI v5.0; Type: QDOVA002AA; Serial: TP-1197
- DASY52 52.10.4(1535); SEMCAD X 14.6.14(7501)

Configuration/5500/Area Scan (6x11x1): Measurement grid: $dx=10\text{mm}$, $dy=10\text{mm}$

Maximum value of SAR (measured) = 9.28 W/kg

Configuration/5500/Zoom Scan (7x7x8)/Cube 0: Measurement grid: $dx=5\text{mm}$, $dy=5\text{mm}$, $dz=1.4\text{mm}$

Reference Value = 38.20 V/m; Power Drift = 0.15 dB

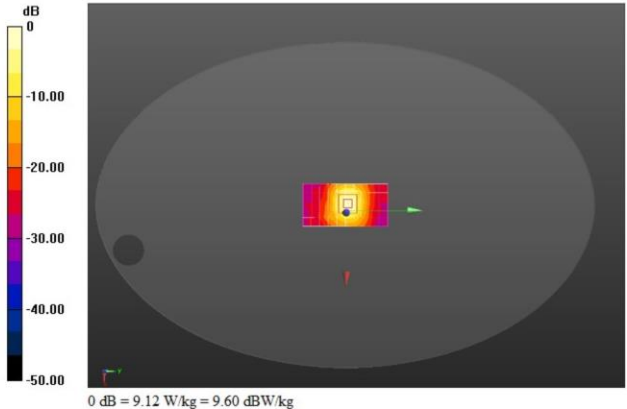
Peak SAR (extrapolated) = 31.4 W/kg

SAR(1 g) = 8 W/kg; SAR(10 g) = 2.3 W/kg

Smallest distance from peaks to all points 3 dB below = 7.6 mm

Ratio of SAR at M2 to SAR at M1 = 66.2%

Maximum value of SAR (measured) = 9.12 W/kg



Date: 23.04.2025

Test Laboratory: Guangdong Dongdian Testing Service Co., Ltd.

5G

DUT: Dipole D5GHzV2; Type: D5GHzV2; Serial: D5GHzV2 - SN 1148

Communication System: UID 0, CW (0); Communication System Band: D5GHz (5000.0 - 6000.0 MHz); Frequency: 5600 MHz;Communication System PAR: 0 dB; PMF: 1

Medium parameters used: $f = 5600$ MHz; $\sigma = 4.92$ S/m; $\epsilon_r = 35.746$; $\rho = 1000$ kg/m³

Phantom section: Flat Section

Measurement Standard: DASYS (IEEE/IEC/ANSI C63.19-2011)

DASY Configuration:

- Probe: EX3DV4 - SN3906; ComF(4.9, 4.9, 4.9) @ 5600 MHz; Calibrated: 29.04.2024
- Sensor-Surface: 3mm (Mechanical Surface Detection), Sensor-Surface: 4mm (Mechanical Surface Detection), $z = 1.0, 25.0$
- Electronics: DAE4 Sn1366; Calibrated: 29.04.2024
- Phantom: ELI v5.0; Type: QDOVA002AA; Serial: TP-1197
- DASY52 52.10.4(1535); SEMCAD X 14.6.14(7501)

Configuration/5600/Area Scan (6x11x1): Measurement grid: $dx=10$ mm, $dy=10$ mm

Maximum value of SAR (measured) = 9.60 W/kg

Configuration/5600/Zoom Scan (7x7x8)/Cube 0: Measurement grid: $dx=5$ mm, $dy=5$ mm, $dz=1.4$ mm

Reference Value = 39.53 V/m; Power Drift = 0.14 dB

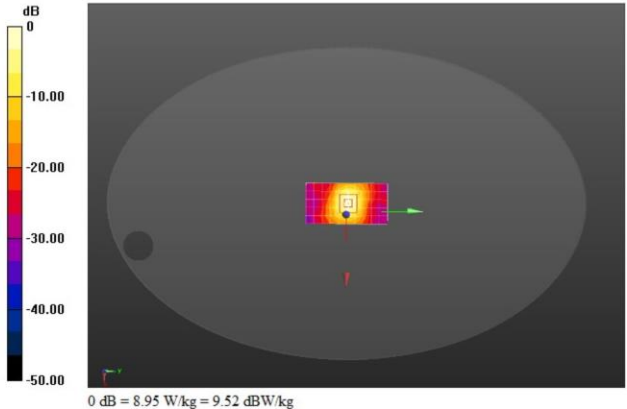
Peak SAR (extrapolated) = 32.2 W/kg

SAR(1 g) = 7.99 W/kg; SAR(10 g) = 2.3 W/kg

Smallest distance from peaks to all points 3 dB below = 8 mm

Ratio of SAR at M2 to SAR at M1 = 65.4%

Maximum value of SAR (measured) = 8.95 W/kg



Date: 23.04.2025

Test Laboratory: Guangdong Dongdian Testing Service Co., Ltd.

5G

DUT: Dipole D5GHzV2; Type: D5GHzV2; Serial: D5GHzV2 - SN 1148

Communication System: UID 0, CW (0); Communication System Band: D5GHz (5000.0 - 6000.0 MHz); Frequency: 5800 MHz; Communication System PAR: 0 dB; PMF: 1

Medium parameters used: $f = 5800\text{ MHz}$; $\sigma = 5.121\text{ S/m}$; $\epsilon_r = 35.309$; $\rho = 1000\text{ kg/m}^3$

Phantom section: Flat Section

Measurement Standard: DASY5 (IEEE/IEC/ANSI C63.19-2011)

DASY Configuration:

- Probe: EX3DV4 - SN3906; ComF(4.98, 4.98, 4.98) @ 5800 MHz; Calibrated: 29.04.2024
- Sensor-Surface: 3mm (Mechanical Surface Detection), Sensor-Surface: 4mm (Mechanical Surface Detection), $z = 1.0, 31.0$
- Electronics: DAE4 Sn1366; Calibrated: 29.04.2024
- Phantom: ELI v5.0; Type: QDOVA002AA; Serial: TP-1197
- DASY52 52.10.4(1535); SEMCAD X 14.6.14(7501)

Configuration/5800/Area Scan (6x11x1): Measurement grid: $dx=10\text{mm}$, $dy=10\text{mm}$

Maximum value of SAR (measured) = 9.59 W/kg

Configuration/5800/Zoom Scan (7x7x8)/Cube 0: Measurement grid: $dx=5\text{mm}$, $dy=5\text{mm}$, $dz=1.4\text{mm}$

Reference Value = 38.39 V/m; Power Drift = 0.12 dB

Peak SAR (extrapolated) = 31.3 W/kg

SAR(1 g) = 7.51 W/kg; SAR(10 g) = 2.17 W/kg

Smallest distance from peaks to all points 3 dB below = 7.6 mm

Ratio of SAR at M2 to SAR at M1 = 64.4%

Maximum value of SAR (measured) = 8.22 W/kg

