Appendix D Highest SAR Test Plots

2.4GHz Ant 1/Edge 1 11b 2472MHz

Communication System: UID 0, #WLAN 11a/b/g/n (0); Communication System Band: 11b/g/n (2.4G); Frequency: 2472 MHz;Duty Cycle: 1:1

Medium parameters used (interpolated): f = 2472 MHz; σ = 2.022 S/m; ε_r = 51.748; ρ = 1000 kg/m^3

Phantom section: Flat Section

DASY Configuration:

Probe: EX3DV4 - SN3922; ConvF(7.7, 7.7, 7.7) @ 2472 MHz; Calibrated: 2020/08/17

Sensor-Surface: 1.4mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1372; Calibrated: 2020/08/12

Phantom: ELI v4.0 (20deg probe tilt); Type: QDOVA001BB; Serial: TP:1045

Measurement SW: DASY52, Version 52.10 (3);SEMCAD X Version 14.6.13 (7474)

2.4GHz Ant 1/Edge 1 11b 2472MHz/Area Scan (51x101x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Info: Interpolated medium parameters used for SAR evaluation.

Maximum value of SAR (interpolated) = 0.690 W/kg

2.4GHz Ant 1/Edge 1 11b 2472MHz/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 19.26 V/m; Power Drift = 0.06 dB

Peak SAR (extrapolated) = 0.893 W/kg

SAR(1 g) = 0.431 W/kg; SAR(10 g) = 0.194 W/kg

Smallest distance from peaks to all points 3 dB below = 8.5 mm
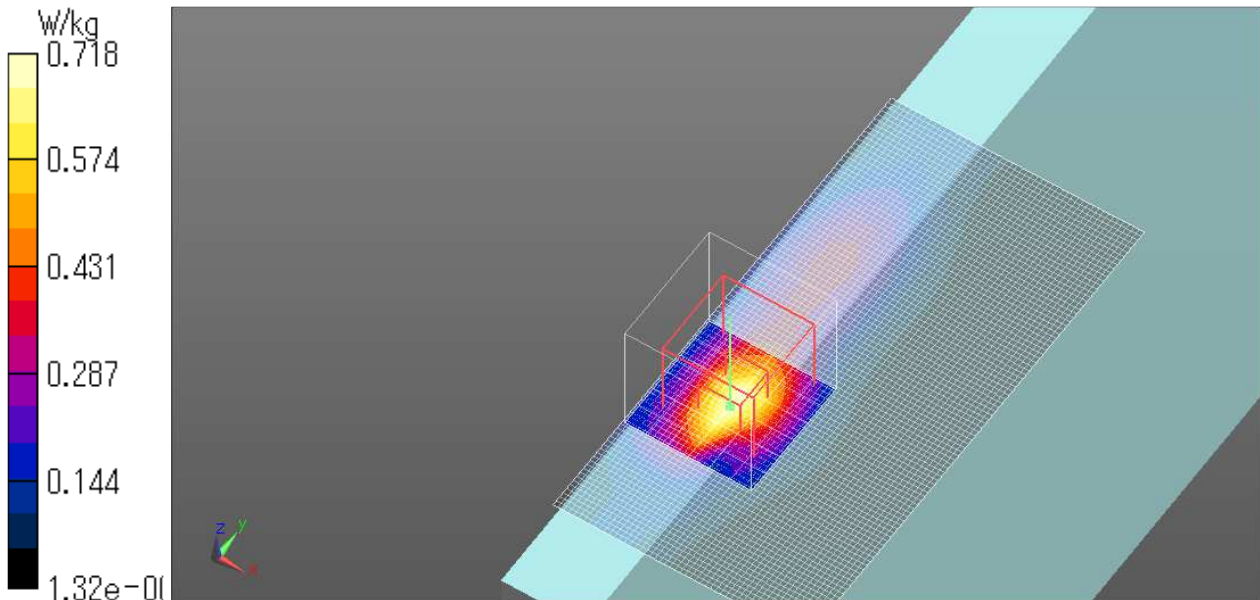
Ratio of SAR at M2 to SAR at M1 = 52.1%

Info: Interpolated medium parameters used for SAR evaluation.

Maximum value of SAR (measured) = 0.718 W/kg

Ambient Temp. : 22.5 degree.C.   Liquid Temp.; 22.0 degree.C.

Liquid temp. is kept within the 2 degree.C. during the test.

Date: 2021/02/15

2.4GHz Ant 2/Rear tilt(Edge 1 side)11b 2412MHz

Communication System: UID 0, #WLAN 11a/b/g/n (0); Communication System Band: 11b/g/n (2.4G); Frequency: 2412 MHz;Duty Cycle: 1:1

Medium parameters used (interpolated): f = 2412 MHz; σ = 1.969 S/m; ε_r = 51.652; ρ = 1000 kg/m^3

Phantom section: Flat Section

DASY Configuration:

Probe: EX3DV4 - SN3922; ConvF(7.7, 7.7, 7.7) @ 2412 MHz; Calibrated: 2020/08/17

Sensor-Surface: 1.4mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1372; Calibrated: 2020/08/12

Phantom: ELI v4.0 (20deg probe tilt); Type: QDOVA001BB; Serial: TP:1045

Measurement SW: DASY52, Version 52.10 (3);SEMCAD X Version 14.6.13 (7474)

2.4GHz Ant 2/Rear tilt(Edge 1 side)11b 2412MHz/Area Scan (51x71x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm

Info: Interpolated medium parameters used for SAR evaluation.

Maximum value of SAR (interpolated) = 1.31 W/kg

2.4GHz Ant 2/Rear tilt(Edge 1 side)11b 2412MHz/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 28.44 V/m; Power Drift = -0.12 dB

Peak SAR (extrapolated) = 2.17 W/kg

SAR(1 g) = 0.850 W/kg; SAR(10 g) = 0.320 W/kg

Smallest distance from peaks to all points 3 dB below = 5 mm
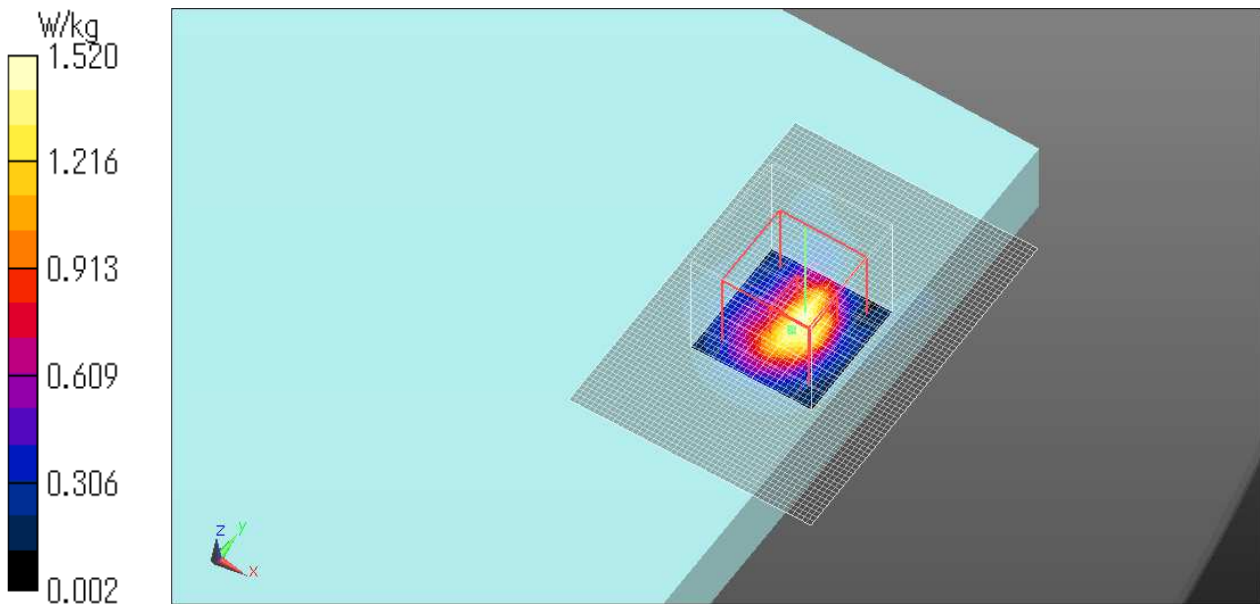
Ratio of SAR at M2 to SAR at M1 = 45.5%

Info: Interpolated medium parameters used for SAR evaluation.

Maximum value of SAR (measured) = 1.52 W/kg

Ambient Temp. : 22.5 degree.C.   Liquid Temp.; 22.0 degree.C.

Liquid temp. is kept within the 2 degree.C. during the test.

Date: 2021/02/15

5.3GHz Ant 1/Edge 1 11ac80 5290MHz

Communication System: UID 0, #WLAN 5GHz (0); Communication System Band: WLAN 5GHz Low; Frequency: 5290 MHz;Duty Cycle: 1:1

Medium parameters used: f = 5290 MHz; σ = 5.587 S/m; ε_r = 46.674; ρ = 1000 kg/m^3

Phantom section: Flat Section

DASY Configuration:

Probe: EX3DV4 - SN3922; ConvF(4.8, 4.8, 4.8) @ 5290 MHz; Calibrated: 2020/08/17

Sensor-Surface: 1.4mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1372; Calibrated: 2020/08/12

Phantom: ELI v4.0 (20deg probe tilt); Type: QDOVA001BB; Serial: TP:1045

Measurement SW: DASY52, Version 52.10 (3);SEMCAD X Version 14.6.13 (7474)

5.3GHz Ant 1/Edge 1 11ac80 5290MHz/Area Scan 3 (61x81x1): Interpolated grid: dx=1.000 mm, dy=1.000 mm

Maximum value of SAR (interpolated) = 0.985 W/kg

5.3GHz Ant 1/Edge 1 11ac80 5290MHz/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm

Reference Value = 15.40 V/m; Power Drift = -0.12 dB

Peak SAR (extrapolated) = 1.63 W/kg

SAR(1 g) = 0.410 W/kg; SAR(10 g) = 0.137 W/kg

Smallest distance from peaks to all points 3 dB below = 5.8 mm
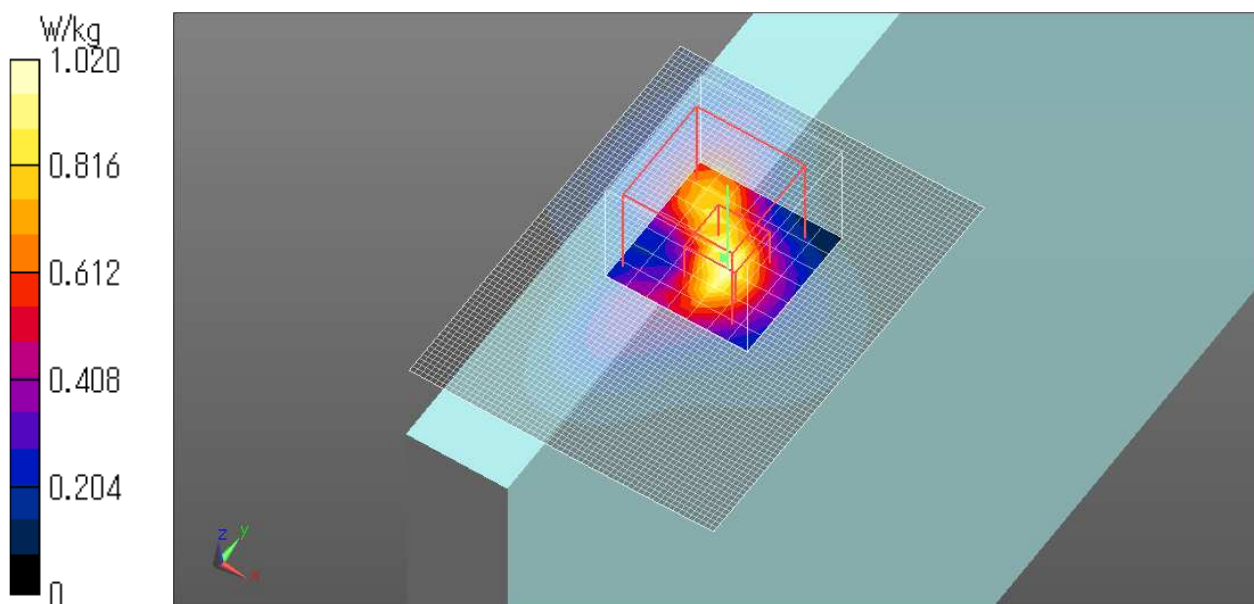
Ratio of SAR at M2 to SAR at M1 = 66%

Maximum value of SAR (measured) = 1.02 W/kg

Ambient Temp. : 22.5 degree.C.   Liquid Temp.; 22.0 degree.C.

Liquid temp. is kept within the 2 degree.C. during the test.

Date: 2021/02/17

5.3GHz Ant 2/ Rear tilt(Edge 1 side) 11ac80 5290MHz

Communication System: UID 0, #WLAN 5GHz (0); Communication System Band: WLAN 5GHz Low; Frequency: 5290 MHz;Duty Cycle: 1:1
Medium parameters used: f = 5290 MHz; σ = 5.587 S/m; ε_r = 46.674; ρ = 1000 kg/m^3
Phantom section: Flat Section

DASY Configuration:

Probe: EX3DV4 - SN3922; ConvF(4.8, 4.8, 4.8) @ 5290 MHz; Calibrated: 2020/08/17
Sensor-Surface: 1.4mm (Mechanical Surface Detection)
Electronics: DAE4 Sn1372; Calibrated: 2020/08/12
Phantom: ELI v4.0 (20deg probe tilt); Type: QDOVA001BB; Serial: TP:1045
Measurement SW: DASY52, Version 52.10 (3);SEMCAD X Version 14.6.13 (7474)

5.3GHz Ant 2/Rear tilt(Edge 1 side) 11ac80 5290MHz/Area Scan (61x91x1): Interpolated grid: dx=1.000 mm, dy=1.000 mm
Maximum value of SAR (interpolated) = 2.10 W/kg

5.3GHz Ant 2/Rear tilt(Edge 1 side) 11ac80 5290MHz/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm
Reference Value = 20.80 V/m; Power Drift = -0.04 dB
Peak SAR (extrapolated) = 3.30 W/kg
SAR(1 g) = 0.741 W/kg; SAR(10 g) = 0.235 W/kg
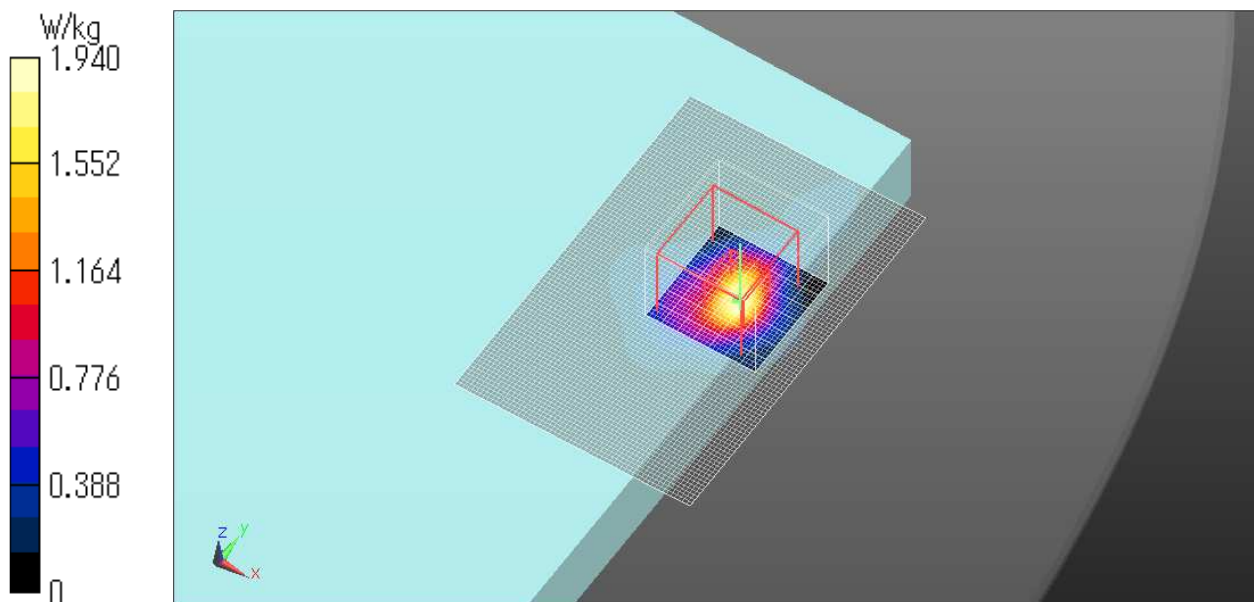Smallest distance from peaks to all points 3 dB below = 5.8 mm
Ratio of SAR at M2 to SAR at M1 = 62.4%
Maximum value of SAR (measured) = 1.94 W/kg

Ambient Temp. : 22.5 degree.C.   Liquid Temp.; 22.0 degree.C.
Liquid temp. is kept within the 2 degree.C. during the test.
Date: 2021/02/17

5.5GHz Ant 1/Edge 1 11ac80 5690MHz

Communication System: UID 0, #WLAN 5GHz (0); Communication System Band: WLAN 5GHz Mid; Frequency: 5690 MHz;Duty Cycle: 1:1

Medium parameters used: f = 5690 MHz; σ = 6.13 S/m; ε_r = 45.99; ρ = 1000 kg/m^3

Phantom section: Flat Section

DASY Configuration:

Probe: EX3DV4 - SN3922; ConvF(4.07, 4.07, 4.07) @ 5690 MHz; Calibrated: 2020/08/17

Sensor-Surface: 1.4mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1372; Calibrated: 2020/08/12

Phantom: ELI v4.0 (20deg probe tilt); Type: QDOVA001BB; Serial: TP:1045

Measurement SW: DASY52, Version 52.10 (3);SEMCAD X Version 14.6.13 (7474)

5.5GHz Ant 1/Edge 1 11ac80 5690MHz/Area Scan (91x61x1): Interpolated grid: dx=1.000 mm, dy=1.000 mm

Maximum value of SAR (interpolated) = 0.983 W/kg

5.5GHz Ant 1/Edge 1 11ac80 5690MHz/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm

Reference Value = 15.41 V/m; Power Drift = 0.02 dB

Peak SAR (extrapolated) = 2.06 W/kg

SAR(1 g) = 0.433 W/kg; SAR(10 g) = 0.135 W/kg

Smallest distance from peaks to all points 3 dB below = 5.8 mm

Ratio of SAR at M2 to SAR at M1 = 61.5%

Maximum value of SAR (measured) = 1.14 W/kg

5.5GHz Ant 1/Edge 1 11ac80 5690MHz/Zoom Scan 2 (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm

Reference Value = 15.41 V/m; Power Drift = 0.02 dB

Peak SAR (extrapolated) = 1.96 W/kg

SAR(1 g) = 0.394 W/kg; SAR(10 g) = 0.134 W/kg

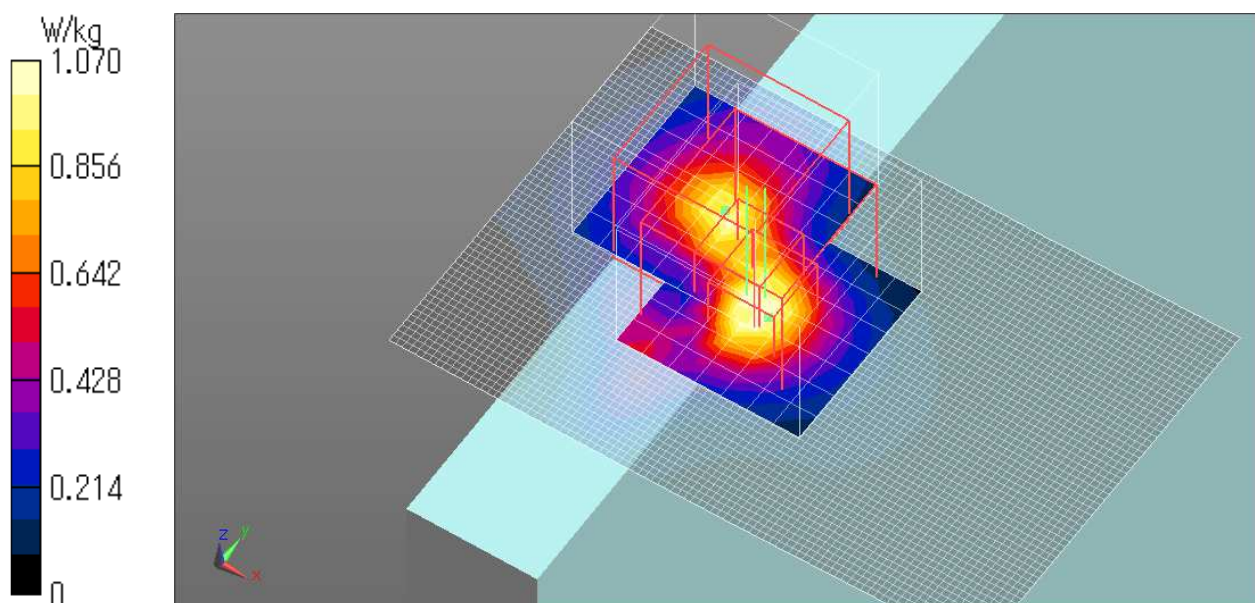Smallest distance from peaks to all points 3 dB below = 5.1 mm

Ratio of SAR at M2 to SAR at M1 = 59.6%

Maximum value of SAR (measured) = 1.07 W/kg

Ambient Temp. : 22.5 degree.C.   Liquid Temp.; 22.0 degree.C.

Liquid temp. is kept within the 2 degree.C. during the test.

Date: 2021/02/22

5.5GHz Ant 2/ Rear tilt(Edge 1 side) 11ac80 5690MHz

Communication System: UID 0, #WLAN 5GHz (0); Communication System Band: WLAN 5GHz Mid; Frequency: 5690 MHz;Duty Cycle: 1:1
Medium parameters used: f = 5690 MHz; σ = 6.13 S/m; $ε_r$ = 45.99; ρ = 1000 kg/m³
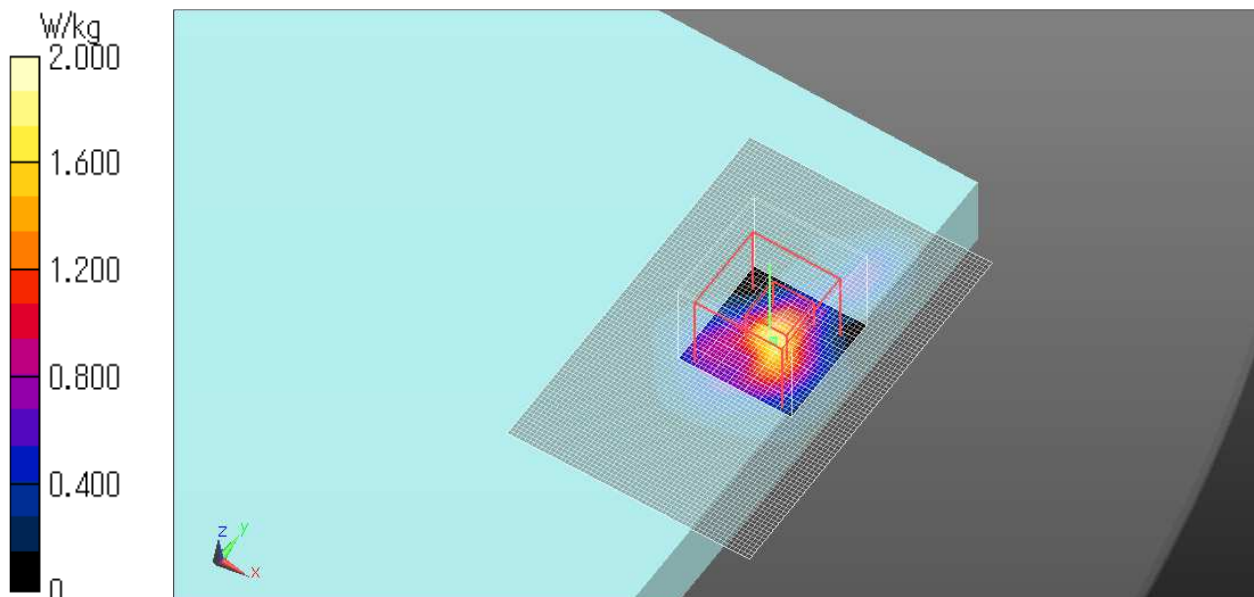Phantom section: Flat Section

DASY Configuration:

Probe: EX3DV4 - SN3922; ConvF(4.07, 4.07, 4.07) @ 5690 MHz; Calibrated: 2020/08/17
Sensor-Surface: 1.4mm (Mechanical Surface Detection (Locations From Previous Scan Used)), Sensor-Surface: 1.4mm (Mechanical Surface Detection)
Electronics: DAE4 Sn1372; Calibrated: 2020/08/12
Phantom: ELI v4.0 (20deg probe tilt); Type: QDOVA001BB; Serial: TP:1045
Measurement SW: DASY52, Version 52.10 (3);SEMCAD X Version 14.6.13 (7474)

5.5GHz Ant 2/Rear tilt(Edge 1 side) 11ac80 5690MHz/Area Scan (61x91x1): Interpolated grid: dx=1.000 mm, dy=1.000 mm
Maximum value of SAR (interpolated) = 1.66 W/kg

5.5GHz Ant 2/Rear tilt(Edge 1 side) 11ac80 5690MHz/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm
Reference Value = 19.69 V/m; Power Drift = 0.01 dB
Peak SAR (extrapolated) = 3.79 W/kg
SAR(1 g) = 0.768 W/kg; SAR(10 g) = 0.229 W/kg
Smallest distance from peaks to all points 3 dB below = 5.1 mm
Ratio of SAR at M2 to SAR at M1 = 60.4%
Maximum value of SAR (measured) = 2.00 W/kg

Ambient Temp. : 22.5 degree.C.   Liquid Temp.; 22.0 degree.C.
Liquid temp. is kept within the 2 degree.C. during the test.
Date: 2021/02/22

5.8GHz Ant 1/Edge 1 11ac80 5775MHz/

Communication System: UID 0, #WLAN 5GHz (0); Communication System Band: WLAN 5GHz High; Frequency: 5775 MHz;Duty Cycle: 1:1

Medium parameters used: f = 5775 MHz; σ = 6.255 S/m; ε_r = 45.883; ρ = 1000 kg/m^3

Phantom section: Flat Section

DASY Configuration:

Probe: EX3DV4 - SN3922; ConvF(4.14, 4.14, 4.14) @ 5775 MHz; Calibrated: 2020/08/17

Sensor-Surface: 1.4mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1372; Calibrated: 2020/08/12

Phantom: ELI v4.0 (20deg probe tilt); Type: QDOVA001BB; Serial: TP:1045

Measurement SW: DASY52, Version 52.10 (3);SEMCAD X Version 14.6.13 (7474)

5.8GHz Ant 1/Edge 1 11ac80 5775MHz/Area Scan (91x61x1): Interpolated grid: dx=1.000 mm, dy=1.000 mm

Maximum value of SAR (interpolated) = 1.11 W/kg

5.8GHz Ant 1/Edge 1 11ac80 5775MHz/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm

Reference Value = 15.86 V/m; Power Drift = -0.06 dB

Peak SAR (extrapolated) = 2.37 W/kg

SAR(1 g) = 0.507 W/kg; SAR(10 g) = 0.173 W/kg

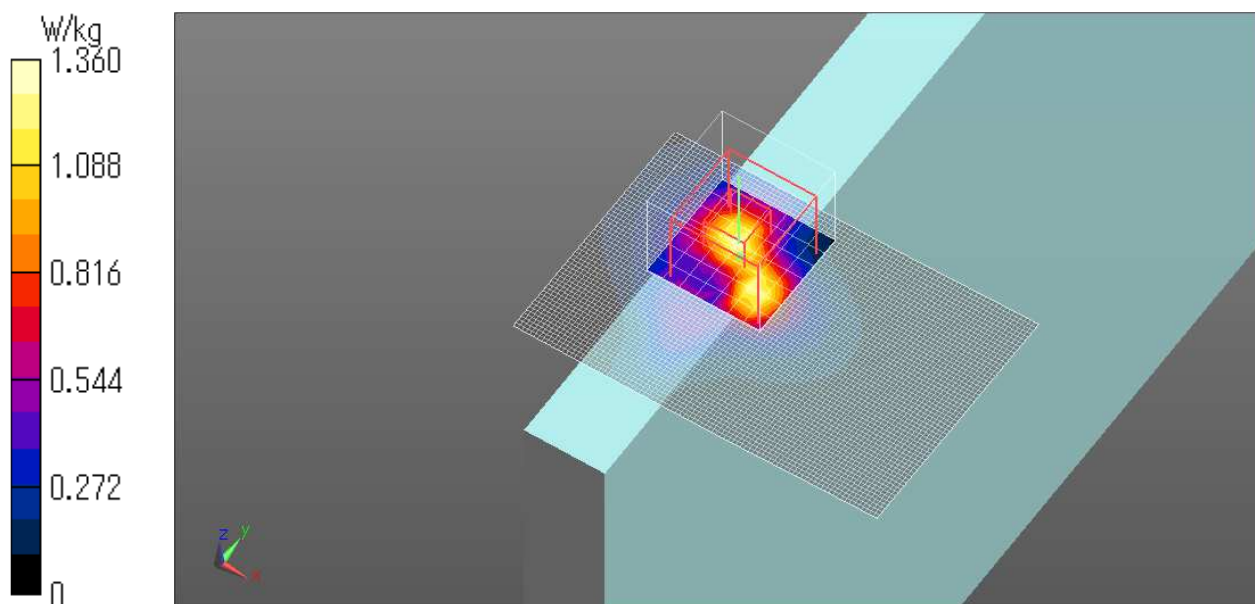Smallest distance from peaks to all points 3 dB below = 6.4 mm

Ratio of SAR at M2 to SAR at M1 = 60.5%

Maximum value of SAR (measured) = 1.36 W/kg

Ambient Temp. : 22.5 degree.C.   Liquid Temp.; 22.0 degree.C.

Liquid temp. is kept within the 2 degree.C. during the test.

Date: 2021/02/24

5.8GHz Ant 2/ Rear tilt(Edge 1 side) 11ac80 5775MHz

Communication System: UID 0, #WLAN 5GHz (0); Communication System Band: WLAN 5GHz High; Frequency: 5775 MHz;Duty Cycle: 1:1
Medium parameters used: f = 5775 MHz; σ = 6.255 S/m; ε_r = 45.883; ρ = 1000 kg/m^3
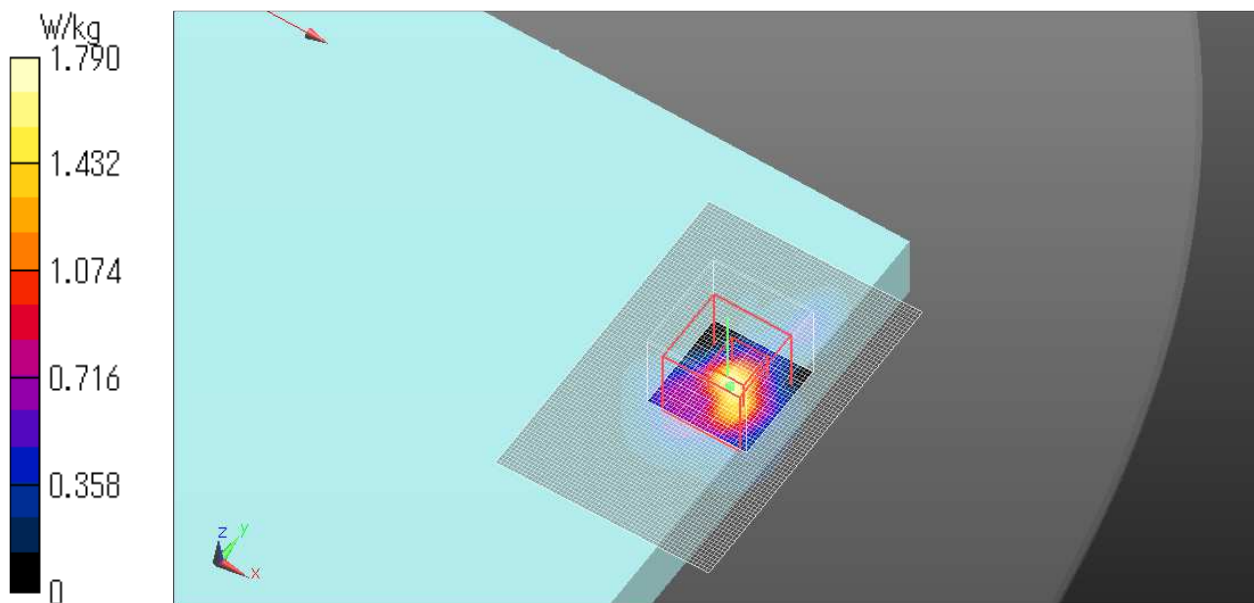Phantom section: Flat Section

DASY Configuration:

Probe: EX3DV4 - SN3922; ConvF(4.14, 4.14, 4.14) @ 5775 MHz; Calibrated: 2020/08/17
Sensor-Surface: 1.4mm (Mechanical Surface Detection)
Electronics: DAE4 Sn1372; Calibrated: 2020/08/12
Phantom: ELI v4.0 (20deg probe tilt); Type: QDOVA001BB; Serial: TP:1045
Measurement SW: DASY52, Version 52.10 (3);SEMCAD X Version 14.6.13 (7474)

5.8GHz Ant 2/Rear tilt(Edge 1 side) 11ac80 5775MHz/Area Scan (61x91x1): Interpolated grid: dx=1.000 mm, dy=1.000 mm
Maximum value of SAR (interpolated) = 1.77 W/kg

5.8GHz Ant 2/Rear tilt(Edge 1 side) 11ac80 5775MHz/Zoom Scan (8x8x7)/Cube 0: Measurement grid: dx=4mm, dy=4mm, dz=1.4mm
Reference Value = 18.84 V/m; Power Drift = -0.15 dB
Peak SAR (extrapolated) = 3.53 W/kg
SAR(1 g) = 0.679 W/kg; SAR(10 g) = 0.202 W/kg
Smallest distance from peaks to all points 3 dB below = 5.4 mm
Ratio of SAR at M2 to SAR at M1 = 60.7%
Maximum value of SAR (measured) = 1.79 W/kg

Ambient Temp. : 22.5 degree.C.   Liquid Temp.; 22.0 degree.C.
Liquid temp. is kept within the 2 degree.C. during the test.
Date: 2021/02/24

BT/Rear tilt(Edge 1 side) DH5 2480MHz

Communication System: UID 0, #Bluetooth (0); Communication System Band: Bluetooth; Frequency: 2480 MHz;Duty Cycle: 1:1
Medium parameters used: f = 2480 MHz; σ = 2.031 S/m; $ε_r$ = 51.755; ρ = 1000 kg/m^3
Phantom section: Flat Section

DASY Configuration:
Probe: EX3DV4 - SN3922; ConvF(7.7, 7.7, 7.7) @ 2480 MHz; Calibrated: 2020/08/17

Sensor-Surface: 1.4mm (Mechanical Surface Detection)
Electronics: DAE4 Sn1372; Calibrated: 2020/08/12
Phantom: ELI v4.0 (20deg probe tilt); Type: QDOVA001BB; Serial: TP:1045
Measurement SW: DASY52, Version 52.10 (3);SEMCAD X Version 14.6.13 (7474)

BT/Rear tilt(Edge 1 side) DH5 2480MHz/Area Scan (51x71x1): Interpolated grid: dx=1.200 mm, dy=1.200 mm
Maximum value of SAR (interpolated) = 0.443 W/kg

BT/Rear tilt(Edge 1 side) DH5 2480MHz/Zoom Scan (7x7x7)/Cube 0: Measurement grid: dx=5mm, dy=5mm, dz=5mm
Reference Value = 13.78 V/m; Power Drift = -0.17 dB
Peak SAR (extrapolated) = 0.676 W/kg
SAR(1 g) = 0.257 W/kg; SAR(10 g) = 0.096 W/kg
Smallest distance from peaks to all points 3 dB below = 5.4 mm
Ratio of SAR at M2 to SAR at M1 = 42.4%
Maximum value of SAR (measured) = 0.502 W/kg

Ambient Temp. : 22.5 degree.C.   Liquid Temp.; 22.0 degree.C.
Liquid temp. is kept within the 2 degree.C. during the test.
Date: 2021/02/15