

APPENDIX B PLOTS OF THE SAR MEASUREMENTS

Plots of the measured SAR distributions inside the phantom are given in this Appendix for the “Lap Arm Held” and “Tablet” tested configurations. The spatial peak SAR values were assessed with the procedure described in this report.

Table 22: 5200 MHz Band SAR Measurement Plot Numbers

Plot 1	Lap Arm Held Position – Ant A -- Prescan	CH#157
Plot 2	Lap Arm Held Position – Ant B -- Prescan	CH#157
Plot 3	Lap Arm Held Position – Ant B	CH#36
Plot 4	Lap Arm Held Position – Ant B	CH#52
Plot 5	Lap Arm Held Position – Ant B	CH#64
Z-Axis graphs	Z-Axis graphs for Plots 3 to 5	
Plot 6	Tablet Position – Ant A -- Prescan	CH#157
Plot 7	Tablet Position – Ant A	CH#36
Plot 8	Tablet Position – Ant A	CH#52
Plot 9	Tablet Position – Ant A	CH#64
Z-Axis graphs	Z-Axis graphs for Plots 7 to 9	
Plot 10	Edge On Position – Ant A	CH#36
Plot 11	Edge On Position – Ant A	CH#52
Plot 12	Edge On Position – Ant A	CH#64
Z-Axis graphs	Z-Axis graphs for Plots 10 – 12	
Plot 13	Edge On Position – Ant B	CH#36
Plot 14	Edge On Position – Ant B	CH#52
Plot 15	Edge On Position – Ant B	CH#64
Z-axis graphs	Z-Axis graphs for Plots 13 to 15	
	WLAN with Bluetooth On	
Plot 16	Arm Held Position With Blue tooth Ant B	CH#64
Plot 17	Tablet Position With Blue tooth Ant A	CH#36
Plot 18	Edge On Position With Blue tooth Ant B	CH#64
Z-axis graphs	Z-Axis graphs for Plots 16 to 18	

Table 23: 5600 MHz Band SAR Measurement Plot Numbers

Plot 19	Lap Arm Held Position – Ant B	CH#100
Plot 20	Lap Arm Held Position – Ant B	CH#120
Plot 21	Lap Arm Held Position – Ant B	CH#140
Z-axis graphs	Z-Axis graphs for Plots 19 to 21	
Plot 22	Tablet – Ant A	CH#100
Plot 23	Tablet – Ant A	CH#120
Plot 24	Tablet – Ant A	CH#140
Z-axis graphs	Z-Axis graphs for Plots 22 to 24	
Plot 25	Edge On – Ant A	CH#100
Plot 26	Edge On – Ant A	CH#120
Plot 27	Edge On – Ant A	CH#140
Z-axis graphs	Z-Axis graphs for Plots 25 to 27	
Plot 28	Edge On – Ant B	CH#100
Plot 29	Edge On – Ant B	CH#120
Plot 30	Edge On – Ant B	CH#140
Z-axis graphs	Z-Axis graphs for Plots 28 - 30	
	WLAN with Bluetooth On	
Plot 31	Lap Arm Held Position With Blue tooth Ant B	CH#100
Plot 32	Edge On Position With Blue tooth Ant A	CH#140
Plot 33	Edge On Position With Blue tooth Ant B	CH#140
Z-axis graphs	Z-Axis graphs for Plots 31 to 33	

Table 24: 5GHz Validation Plot

Plot 34	Validation 5800 MHz 16 th August 2006
Plot 35	Validation 5800 MHz 17 th August 2006
Plot 36	Validation 5200 MHz 18 th August 2006
Z-Axis Graphs	Z-Axis graphs for Plots 33 to 36

Test Date: 16 August 2006

File Name: [Arm Held OFDM 5.6 GHz Antenna A Bluetooth On Prescan 16-08-06.da4](#)

DUT: Fujitsu Tablet Osian with Atheros XB62 11abg Module; Type: XB62; Serial: MAC:0011F5-D82570

* Communication System: OFDM 5770 MHz; Frequency: 5785 MHz; Duty Cycle: 1:1

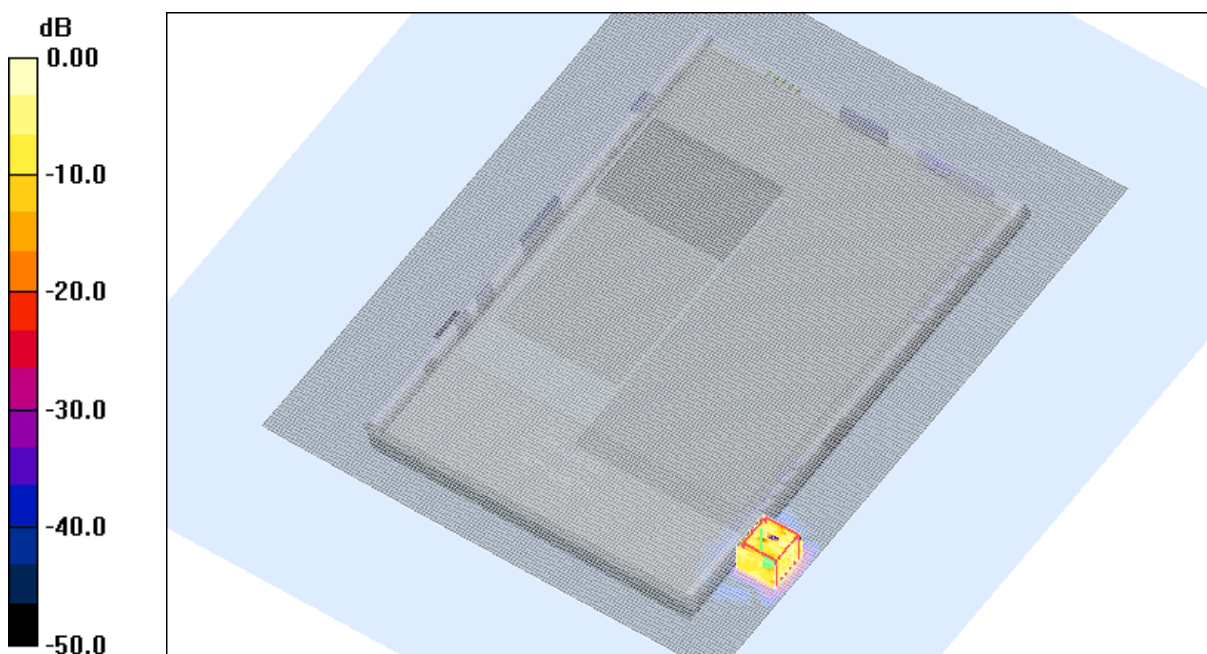
* Medium parameters used: $\sigma = 6.26605 \text{ mho/m}$, $\epsilon_r = 45.4795$; $\rho = 1000 \text{ kg/m}^3$

- Electronics: DAE3 Sn442; Probe: EX3DV4 - SN3563; ConvF(3.64, 3.64, 3.64)

- Phantom: Flat Phantom 10.1; Serial: P 10.1; Phantom section: Flat 2.2 Section

Channel 157 Test/Area Scan (151x201x1): Measurement grid: dx=20mm, dy=20mm

Maximum value of SAR (interpolated) = 0.034 mW/g



0 dB = 0.037mW/g

SAR MEASUREMENT PLOT 1

Ambient Temperature
Liquid Temperature
Humidity

20.3 Degrees Celsius
19.8 Degrees Celsius
35.0 %

Test Date: 16 August 2006

File Name: [Arm Held OFDM 5.6 GHz Antenna B Bluetooth Off Prescan 16-08-06.da4](#)

DUT: Fujitsu Tablet Osian with Atheros XB62 11abg Module; Type: XB62; Serial: MAC:0011F5-D82570

* Communication System: OFDM 5770 MHz; Frequency: 5785 MHz; Duty Cycle: 1:1

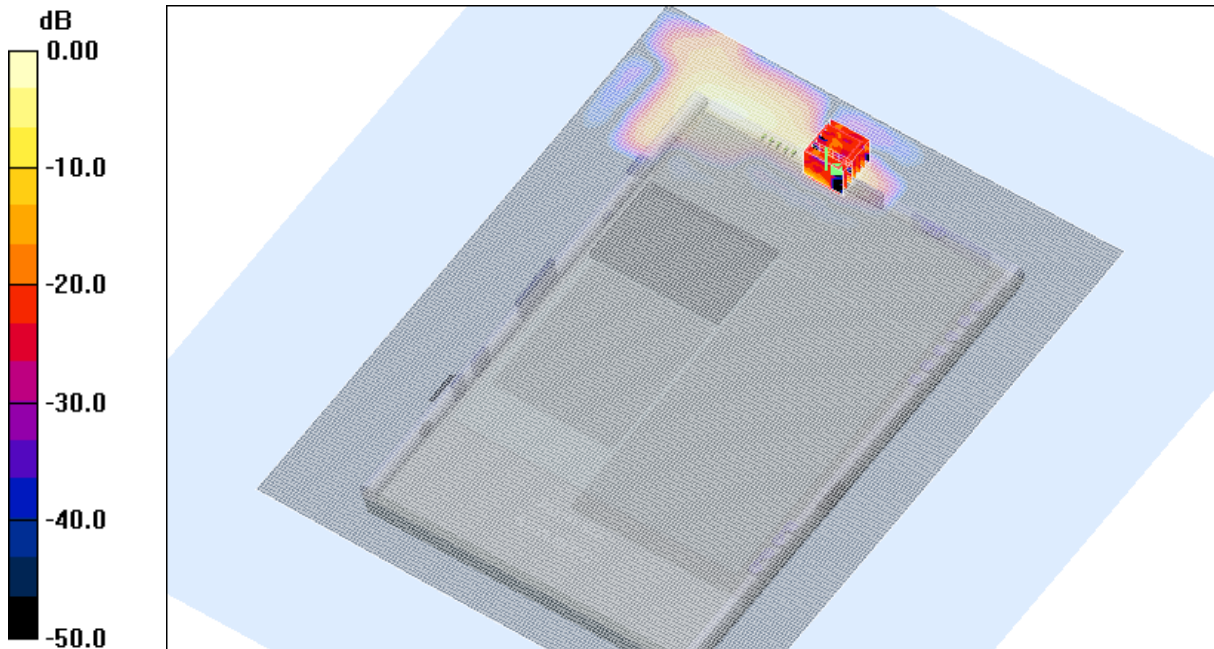
* Medium parameters used: $\sigma = 6.26605$ mho/m, $\epsilon_r = 45.4795$; $\rho = 1000$ kg/m³

- Electronics: DAE3 Sn442; Probe: EX3DV4 - SN3563; ConvF(3.64, 3.64, 3.64)

- Phantom: Flat Phantom 10.1; Serial: P 10.1; Phantom section: Flat 2.2 Section

Channel 157 Test/Area Scan (151x201x1): Measurement grid: dx=20mm, dy=20mm

Maximum value of SAR (interpolated) = 0.935 mW/g



0 dB = 1.54mW/g

SAR MEASUREMENT PLOT 2

Ambient Temperature
Liquid Temperature
Humidity

20.3 Degrees Celsius
19.8 Degrees Celsius
35.0 %

Test Date: 18 August 2006

File Name: [Arm Held OFDM 5.2 GHz Antenna B Bluetooth Off 18-08-06.da4](#)

DUT: Fujitsu Tablet Osian with Atheros XB62 11abg Module; Type: XB62; Serial: MAC:0011F5-D82570

* Communication System: OFDM 5250 MHz; Frequency: 5180 MHz; Duty Cycle: 1:1

* Medium parameters used: $\sigma = 5.25148$ mho/m, $\epsilon_r = 47.1715$; $\rho = 1000$ kg/m³

- Electronics: DAE3 Sn442; Probe: EX3DV4 - SN3563; ConvF(3.84, 3.84, 3.84)

- Phantom: Flat Phantom 10.1; Serial: P 10.1; Phantom section: Flat 2.2 Section

Channel 036 Test/Area Scan (101x81x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (interpolated) = 2.08 mW/g

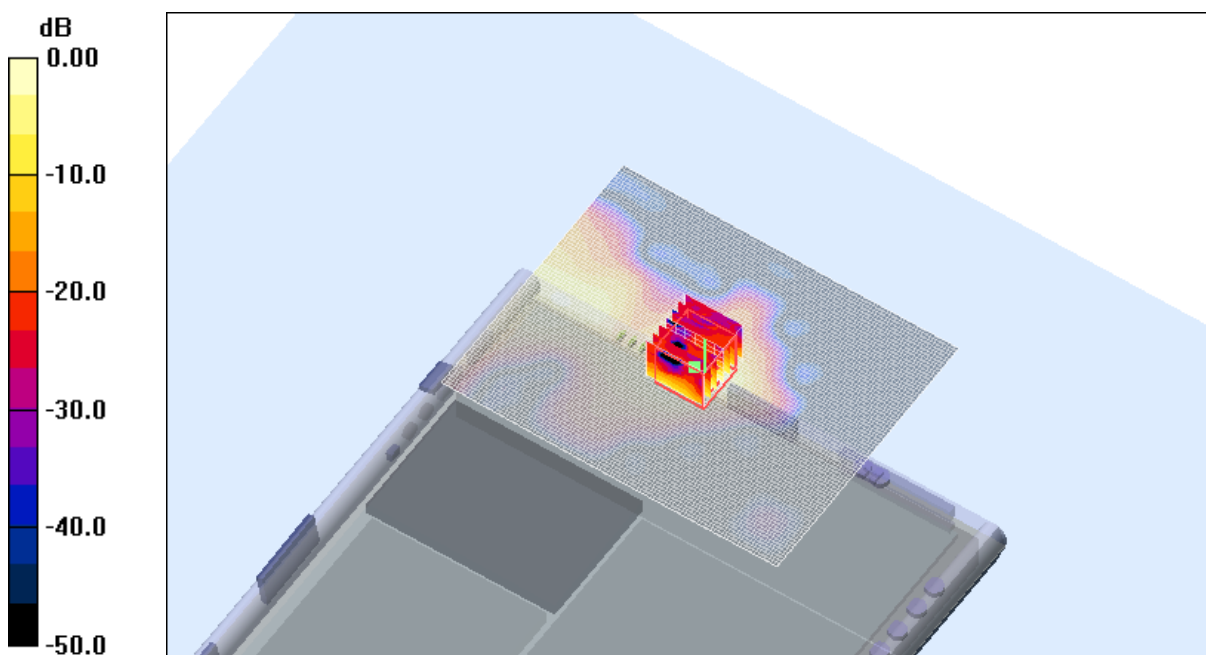
Channel 036 Test/Zoom Scan (7x7x8)/Cube 0: Measurement grid: dx=4.3mm, dy=4.3mm, dz=3mm

Reference Value = 20.7 V/m; Power Drift = 0.189 dB

Peak SAR (extrapolated) = 4.22 W/kg

SAR(1 g) = 0.917 mW/g; SAR(10 g) = 0.212 mW/g

Maximum value of SAR (measured) = 2.05 mW/g



0 dB = 2.05mW/g

SAR MEASUREMENT PLOT 3

Ambient Temperature
Liquid Temperature
Humidity

20.2 Degrees Celsius
19.8 Degrees Celsius
35.0 %

Test Date: 18 August 2006

File Name: [Arm Held OFDM 5.2 GHz Antenna B Bluetooth Off 18-08-06.da4](#)

DUT: Fujitsu Tablet Osian with Atheros XB62 11abg Module; Type: XB62; Serial: MAC:0011F5-D82570

* Communication System: OFDM 5250 MHz; Frequency: 5260 MHz; Duty Cycle: 1:1

* Medium parameters used: $\sigma = 5.42358$ mho/m, $\epsilon_r = 47.0414$; $\rho = 1000$ kg/m³

- Electronics: DAE3 Sn442; Probe: EX3DV4 - SN3563; ConvF(3.84, 3.84, 3.84)

- Phantom: Flat Phantom 10.1; Serial: P 10.1; Phantom section: Flat 2.2 Section

Channel 052 Test/Area Scan (101x81x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (interpolated) = 0.975 mW/g

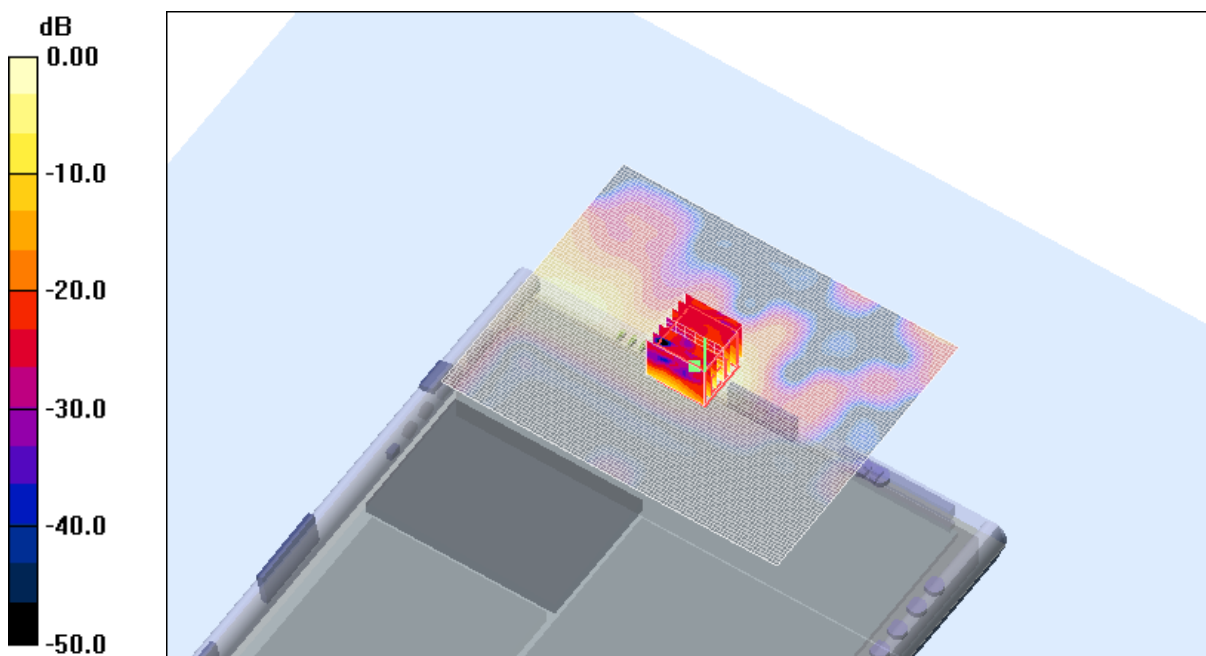
Channel 052 Test/Zoom Scan (7x7x8)/Cube 0: Measurement grid: dx=4.3mm, dy=4.3mm, dz=3mm

Reference Value = 18.5 V/m; Power Drift = -0.018 dB

Peak SAR (extrapolated) = 4.45 W/kg

SAR(1 g) = 0.845 mW/g; SAR(10 g) = 0.185 mW/g

Maximum value of SAR (measured) = 2.07 mW/g



0 dB = 2.07mW/g

SAR MEASUREMENT PLOT 4

Ambient Temperature
Liquid Temperature
Humidity

20.2 Degrees Celsius
19.8 Degrees Celsius
35.0 %

Test Date: 18 August 2006

File Name: [Arm Held OFDM 5.2 GHz Antenna B Bluetooth Off 18-08-06.da4](#)

DUT: Fujitsu Tablet Osian with Atheros XB62 11abg Module; Type: XB62; Serial: MAC:0011F5-D82570

* Communication System: OFDM 5250 MHz; Frequency: 5320 MHz; Duty Cycle: 1:1

* Medium parameters used: $\sigma = 5.53558$ mho/m, $\epsilon_r = 46.9381$; $\rho = 1000$ kg/m³

- Electronics: DAE3 Sn442; Probe: EX3DV4 - SN3563; ConvF(3.84, 3.84, 3.84)

- Phantom: Flat Phantom 10.1; Serial: P 10.1; Phantom section: Flat 2.2 Section

Channel 064 Test/Area Scan (101x81x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (interpolated) = 2.73 mW/g

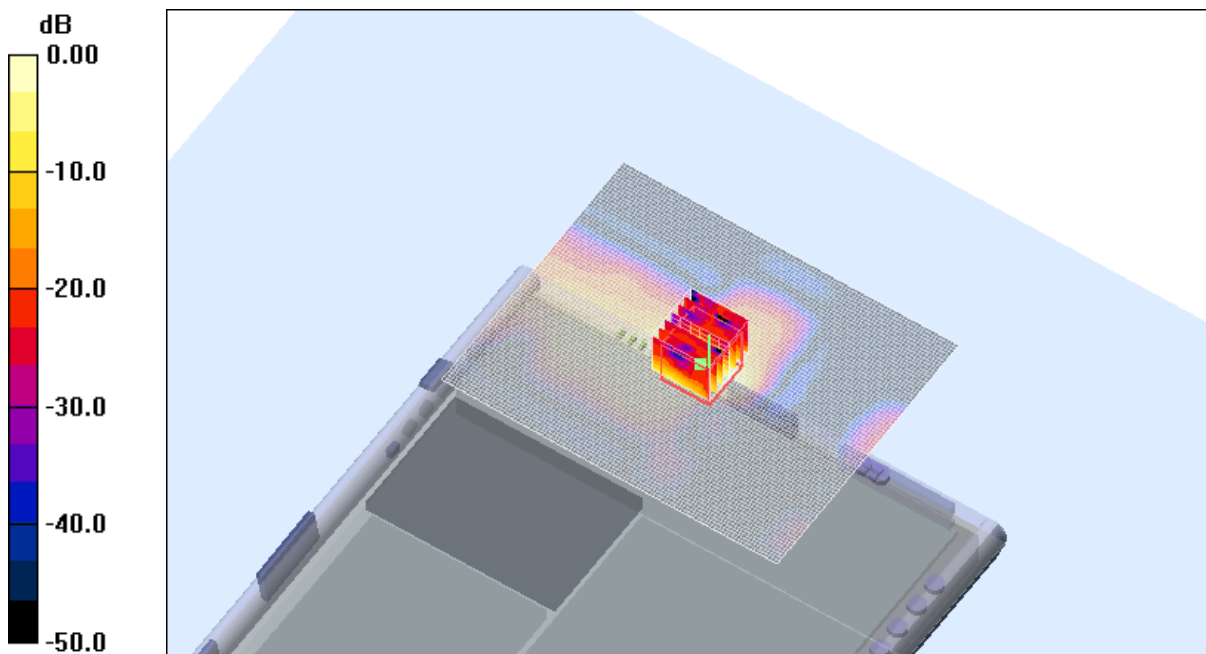
Channel 064 Test/Zoom Scan (7x7x8)/Cube 0: Measurement grid: dx=4.3mm, dy=4.3mm, dz=3mm

Reference Value = 23.0 V/m; Power Drift = -0.180 dB

Peak SAR (extrapolated) = 6.94 W/kg

SAR(1 g) = 1.54 mW/g; SAR(10 g) = 0.362 mW/g

Maximum value of SAR (measured) = 2.45 mW/g



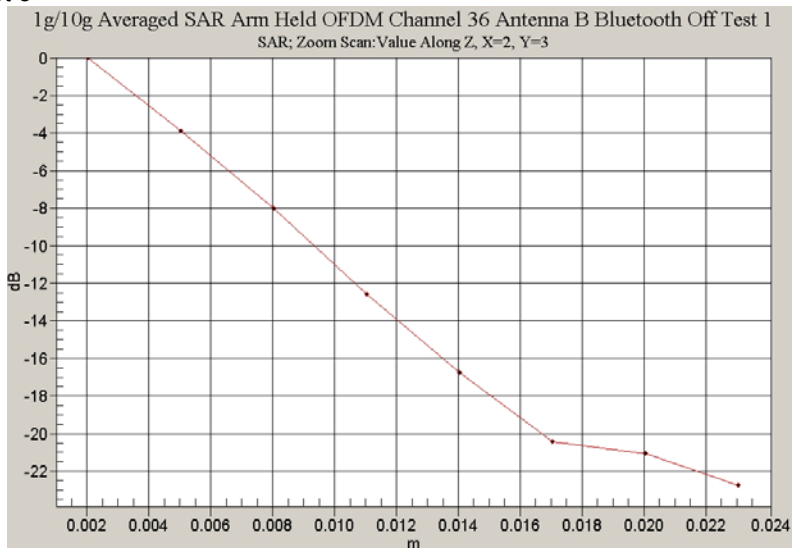
0 dB = 2.45mW/g

SAR MEASUREMENT PLOT 5

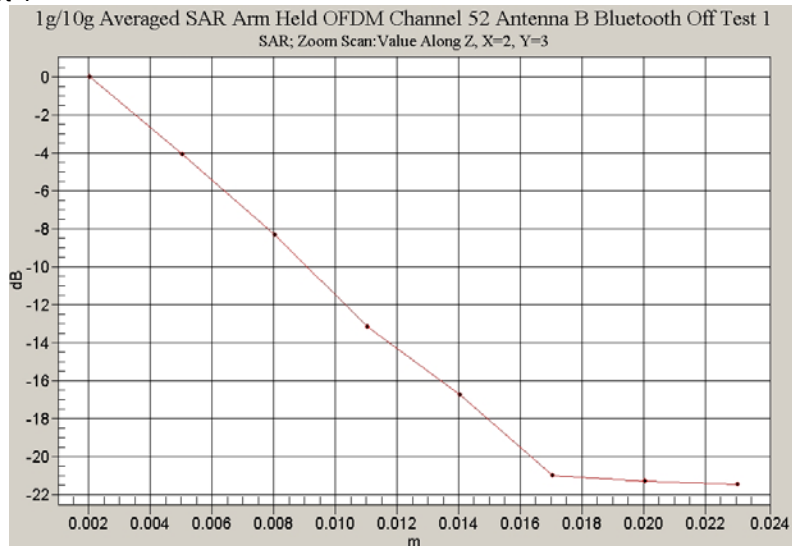
Ambient Temperature
Liquid Temperature
Humidity

20.2 Degrees Celsius
19.8 Degrees Celsius
35.0 %

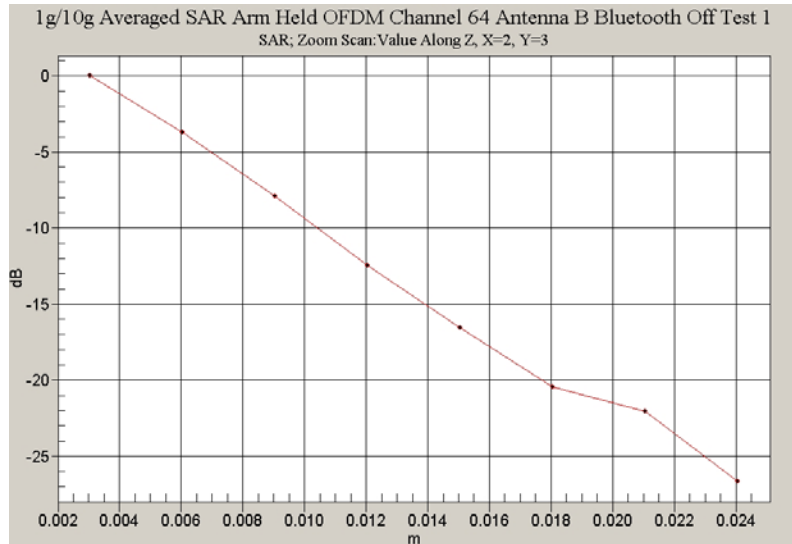
Z-Axis graph for plot 3



Z-Axis graph for plot 4



Z-Axis graph for plot 5



Test Date: 15 August 2006

File Name: [Tablet OFDM 5.6 GHz Antenna A Bluetooth On Prescan 15-08-06.da4](#)

DUT: Fujitsu Tablet Osian with Atheros XB62 11abg Module; Type: XB62; Serial: MAC:0011F5-D82570

* Communication System: OFDM 5770 MHz; Frequency: 5785 MHz; Duty Cycle: 1:1

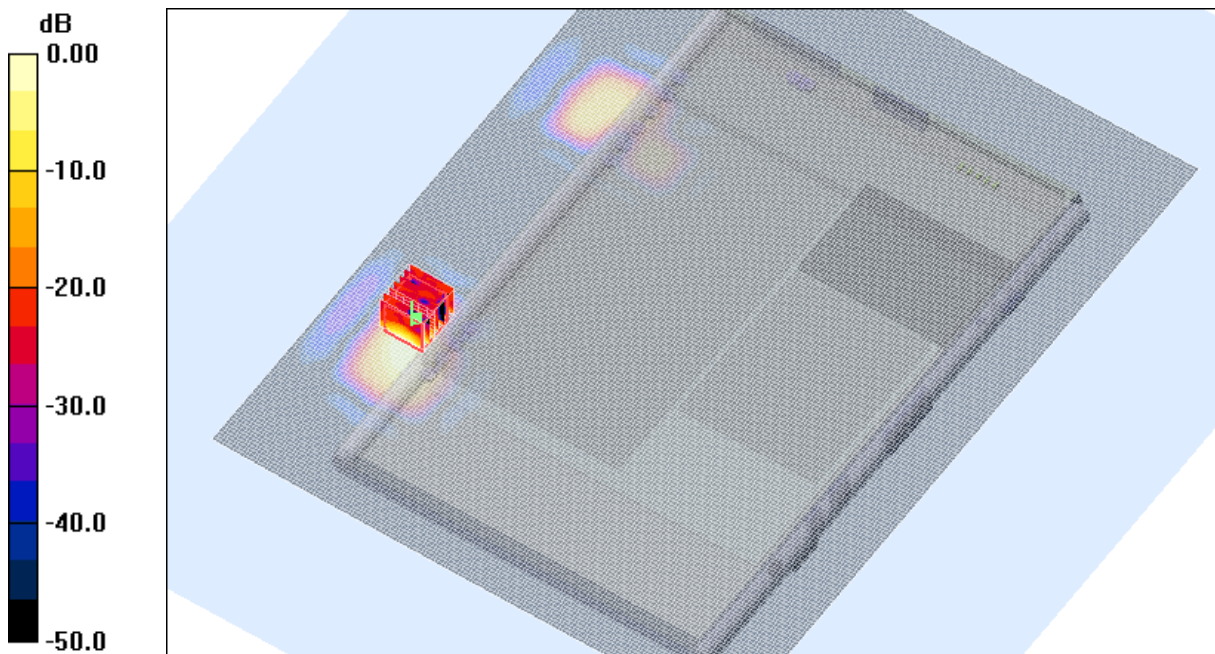
* Medium parameters used: $\sigma = 6.32477$ mho/m, $\epsilon_r = 46.0159$; $\rho = 1000$ kg/m³

- Electronics: DAE3 Sn442; Probe: EX3DV4 - SN3563; ConvF(3.64, 3.64, 3.64)

- Phantom: Flat Phantom 10.1; Serial: P 10.1; Phantom section: Flat 2.2 Section

Channel 157 Test/Area Scan (151x201x1): Measurement grid: dx=20mm, dy=20mm

Maximum value of SAR (interpolated) = 1.32 mW/g



0 dB = 2.11mW/g

SAR MEASUREMENT PLOT 6

Ambient Temperature
Liquid Temperature
Humidity

20.4 Degrees Celsius
19.9 Degrees Celsius
41.0 %

Test Date: 18 August 2006

File Name: [Tablet OFDM 5.2 GHz Ant A Bluetooth Off 17-08-06.da4](#)

DUT: Fujitsu Tablet Osian with Atheros XB62 11abg Module; Type: XB62; Serial: MAC:0011F5-D82570

* Communication System: OFDM 5250 MHz; Frequency: 5180 MHz; Duty Cycle: 1:1

* Medium parameters used: $\sigma = 5.25148$ mho/m, $\epsilon_r = 47.1715$; $\rho = 1000$ kg/m³

- Electronics: DAE3 Sn442; Probe: EX3DV4 - SN3563; ConvF(3.84, 3.84, 3.84)

- Phantom: Flat Phantom 10.1; Serial: P 10.1; Phantom section: Flat 2.2 Section

Channel 036 Test/Area Scan (101x81x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (interpolated) = 1.14 mW/g

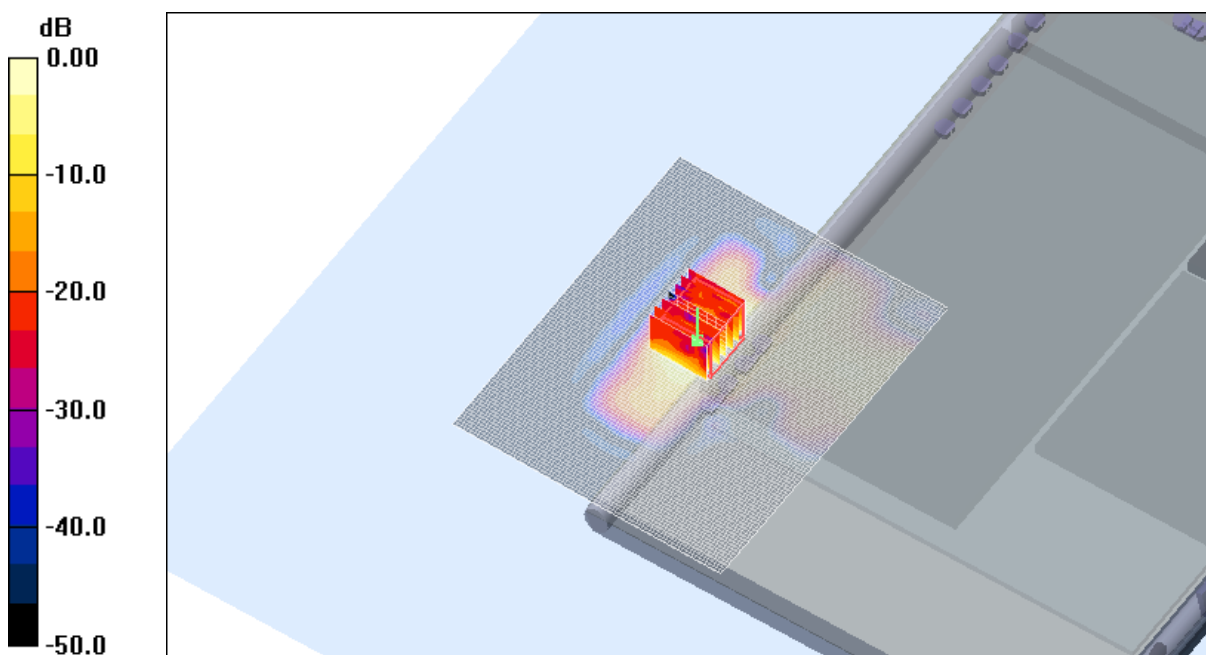
Channel 036 Test/Zoom Scan (7x7x8)/Cube 0: Measurement grid: dx=4.3mm, dy=4.3mm, dz=3mm

Reference Value = 19.1 V/m; Power Drift = -0.440 dB

Peak SAR (extrapolated) = 3.07 W/kg

SAR(1 g) = 0.835 mW/g; SAR(10 g) = 0.244 mW/g

Maximum value of SAR (measured) = 1.64 mW/g



0 dB = 1.64mW/g

SAR MEASUREMENT PLOT 7

Ambient Temperature
Liquid Temperature
Humidity

20.2 Degrees Celsius
19.8 Degrees Celsius
35.0 %

Test Date: 18 August 2006

File Name: [Tablet OFDM 5.2 GHz Ant A Bluetooth Off 17-08-06.da4](#)

DUT: Fujitsu Tablet Osian with Atheros XB62 11abg Module; Type: XB62; Serial: MAC:0011F5-D82570

* Communication System: OFDM 5250 MHz; Frequency: 5260 MHz; Duty Cycle: 1:1

* Medium parameters used: $\sigma = 5.42358$ mho/m, $\epsilon_r = 47.0414$; $\rho = 1000$ kg/m³

- Electronics: DAE3 Sn442; Probe: EX3DV4 - SN3563; ConvF(3.84, 3.84, 3.84)

- Phantom: Flat Phantom 10.1; Serial: P 10.1; Phantom section: Flat 2.2 Section

Channel 052 Test/Area Scan (101x81x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (interpolated) = 0.886 mW/g

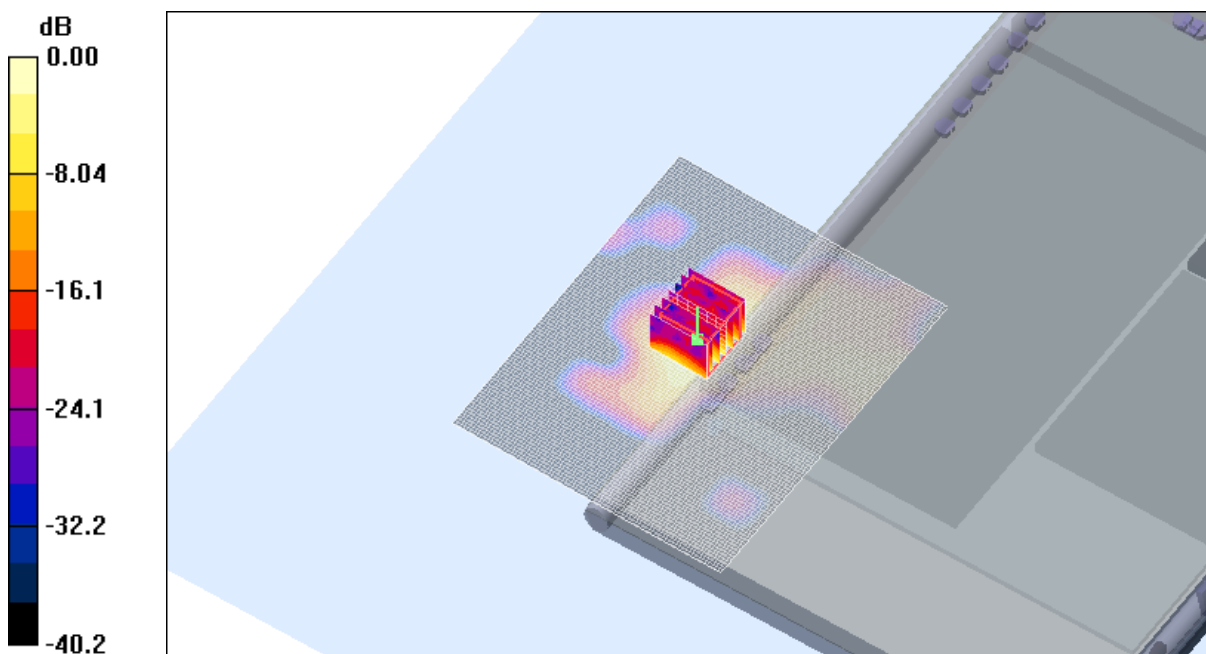
Channel 052 Test/Zoom Scan (7x7x8)/Cube 0: Measurement grid: dx=4.3mm, dy=4.3mm, dz=3mm

Reference Value = 17.4 V/m; Power Drift = 0.020 dB

Peak SAR (extrapolated) = 2.65 W/kg

SAR(1 g) = 0.750 mW/g; SAR(10 g) = 0.225 mW/g

Maximum value of SAR (measured) = 1.46 mW/g



0 dB = 1.46mW/g

SAR MEASUREMENT PLOT 8

Ambient Temperature
Liquid Temperature
Humidity

20.2 Degrees Celsius
19.8 Degrees Celsius
35.0 %

Test Date: 18 August 2006

File Name: [Tablet OFDM 5.2 GHz Ant A Bluetooth Off 17-08-06.da4](#)

DUT: Fujitsu Tablet Osian with Atheros XB62 11abg Module; Type: XB62; Serial: MAC:0011F5-D82570

* Communication System: OFDM 5250 MHz; Frequency: 5320 MHz; Duty Cycle: 1:1

* Medium parameters used: $\sigma = 5.53558$ mho/m, $\epsilon_r = 46.9381$; $\rho = 1000$ kg/m³

- Electronics: DAE3 Sn442; Probe: EX3DV4 - SN3563; ConvF(3.84, 3.84, 3.84)

- Phantom: Flat Phantom 10.1; Serial: P 10.1; Phantom section: Flat 2.2 Section

Channel 064 Test/Area Scan (101x81x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (interpolated) = 1.02 mW/g

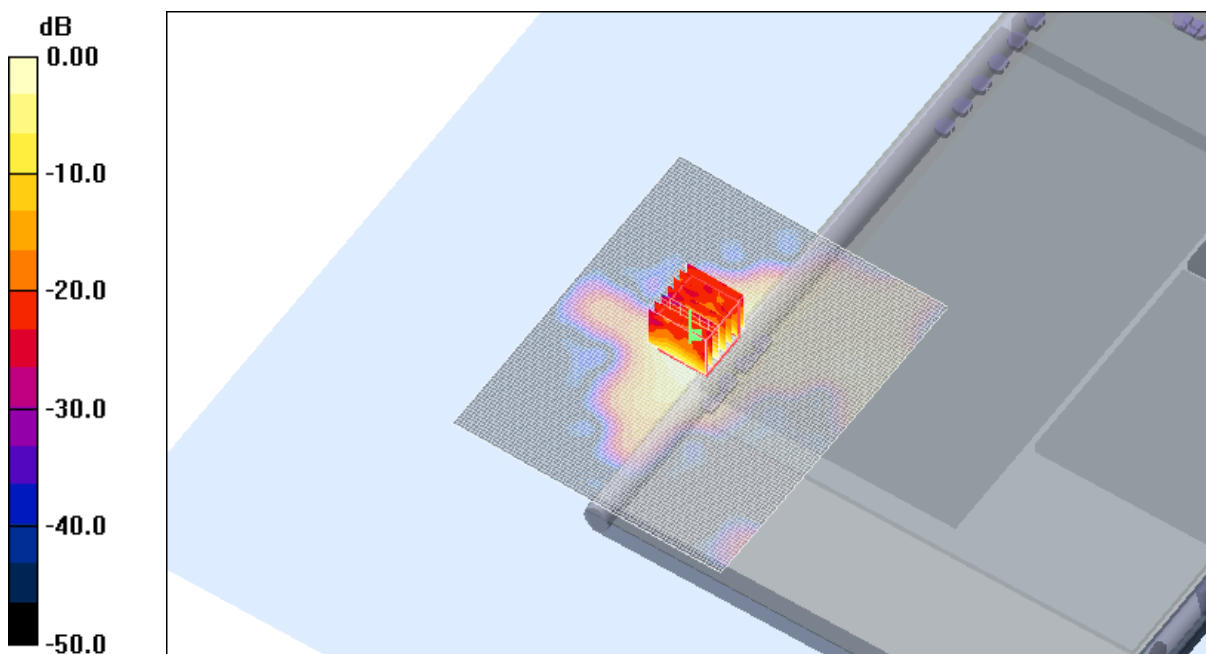
Channel 064 Test/Zoom Scan (7x7x8)/Cube 0: Measurement grid: dx=4.3mm, dy=4.3mm, dz=3mm

Reference Value = 16.6 V/m; Power Drift = -0.035 dB

Peak SAR (extrapolated) = 2.54 W/kg

SAR(1 g) = 0.686 mW/g; SAR(10 g) = 0.208 mW/g

Maximum value of SAR (measured) = 1.31 mW/g



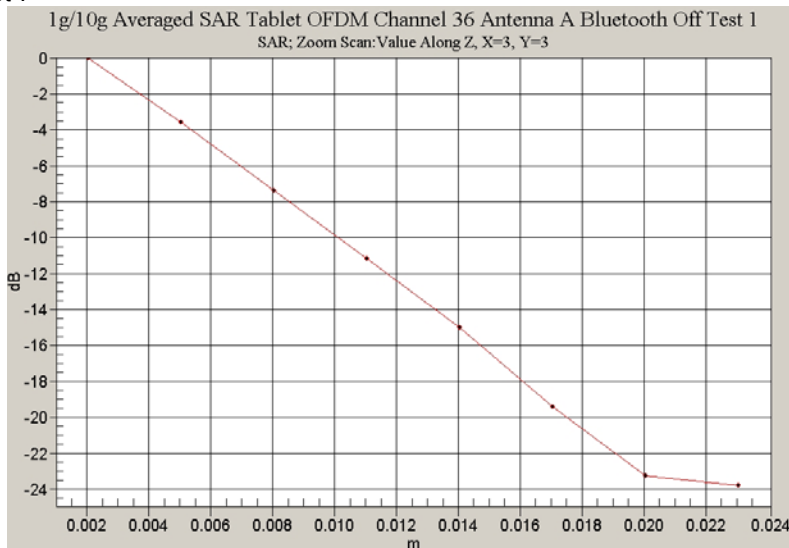
0 dB = 1.31mW/g

SAR MEASUREMENT PLOT 9

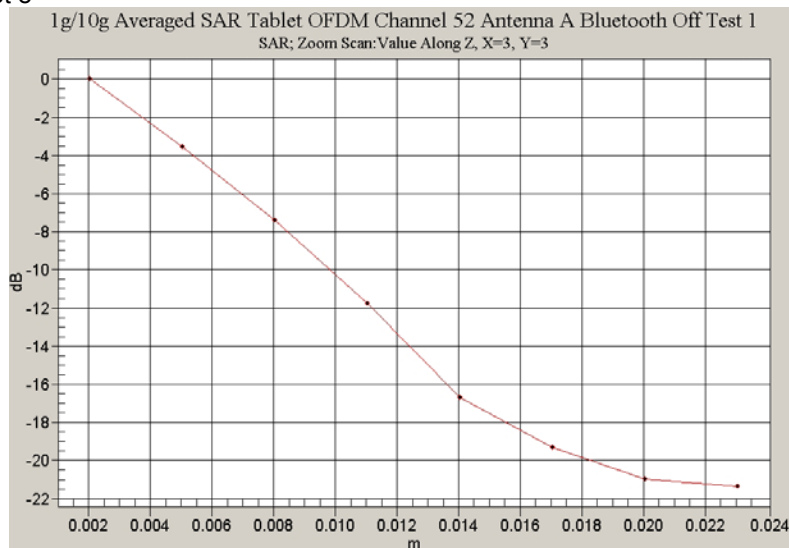
Ambient Temperature
Liquid Temperature
Humidity

20.2 Degrees Celsius
19.8 Degrees Celsius
35.0 %

Z-Axis graph for plot 7



Z-Axis graph for plot 8



Z-Axis graph for plot 9

