

## **APPENDIX F**

### **The Validation Measurements**

**DUT: Dipole 835 MHz; Serial: 451**  
**Program Name: 835MHz Dipole Validation 2005.08.10**  
**Procedure Name: 835MHz @ 250mW**

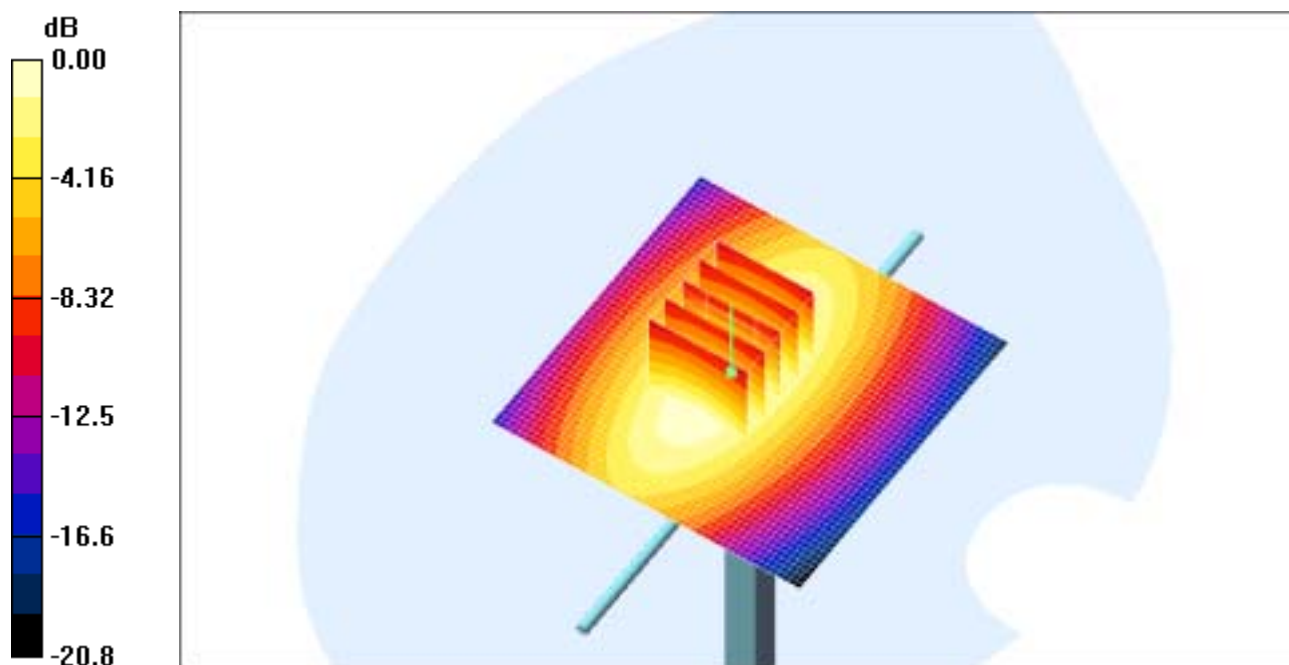
Communication System: CW; Frequency: 835 MHz; Duty Cycle: 1:1  
Medium parameters used:  $f = 835$  MHz;  $\sigma = 0.89$  mho/m;  $\epsilon_r = 40.4$ ;  $\rho = 1000$  kg/m<sup>3</sup>  
Phantom section: Flat Section

DASY4 Configuration:  
- Probe: ES3DV2 - SN3017; ConvF(6.33, 6.33, 6.33); Calibrated: 2004-09-24  
- Sensor-Surface: 4mm (Mechanical Surface Detection)  
- Electronics: DAE3 Sn468; Calibrated: 2004-12-07  
- Phantom: SAM 835/900 MHz; Type: SAM; Serial: TP-1141  
- Measurement SW: DASY4, V4.5 Build 19; Postprocessing SW: SEMCAD, V1.8 Build 146

**835MHz @ 250mW/Zoom Scan (5x5x7)/Cube 0:** Measurement grid: dx=8mm, dy=8mm, dz=5mm  
Reference Value = 52.7 V/m; Power Drift = -0.014 dB  
Peak SAR (extrapolated) = 3.59 W/kg  
**SAR(1 g) = 2.41 mW/g**

Maximum value of SAR (measured) = 2.59 mW/g

**835MHz @ 250mW/Area Scan (51x51x1):** Measurement grid: dx=20mm, dy=20mm  
Maximum value of SAR (interpolated) = 2.64 mW/g



0 dB = 2.64mW/g

**DUT: Dipole 1900 MHz; Serial: 5d023**  
**Program Name: 1900MHz Dipole Validation 2005.08.11**  
**Procedure Name: 1900MHz @ 250mW**

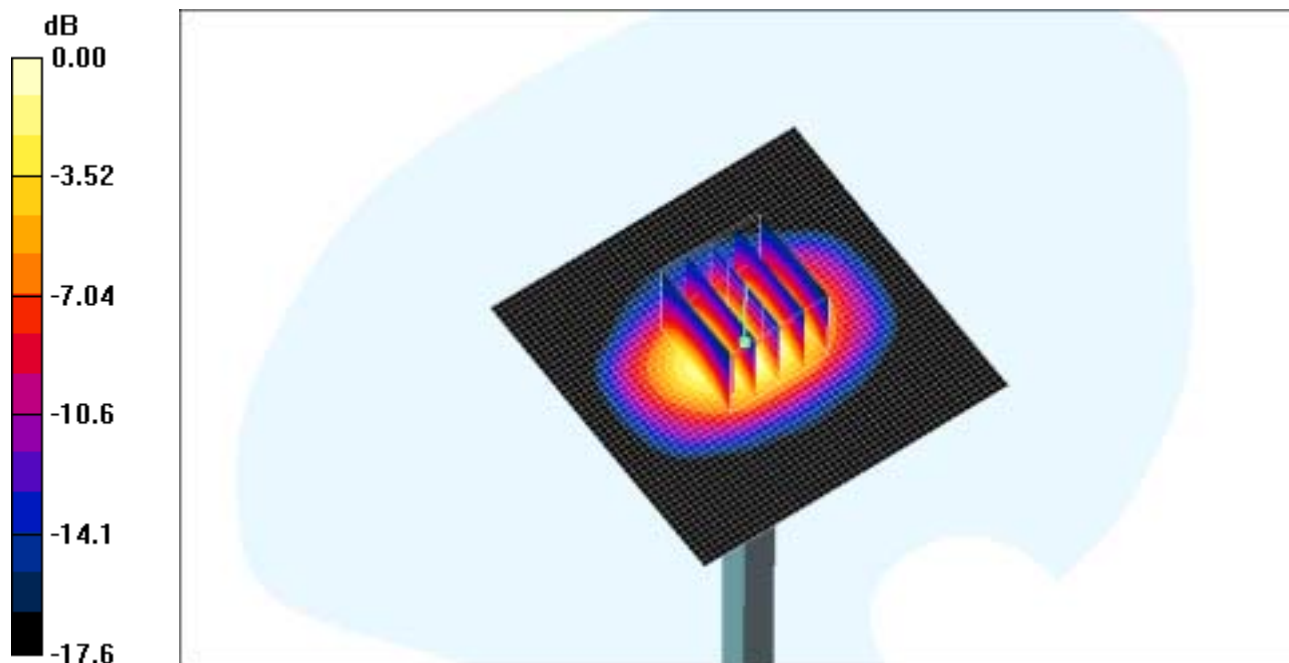
Communication System: CW; Frequency: 1900 MHz; Duty Cycle: 1:1  
Medium parameters used:  $f = 1900$  MHz;  $\sigma = 1.4$  mho/m;  $\epsilon_r = 38.8$ ;  $\rho = 1000$  kg/m<sup>3</sup>  
Phantom section: Flat Section

DASY4 Configuration:  
- Probe: ES3DV2 - SN3017; ConvF(5.11, 5.11, 5.11); Calibrated: 2004-09-24  
- Sensor-Surface: 4mm (Mechanical Surface Detection)  
- Electronics: DAE3 Sn468; Calibrated: 2004-12-07  
- Phantom: SAM 1800/1900 MHz; Type: SAM; Serial: TP-1143  
- Measurement SW: DASY4, V4.5 Build 19; Postprocessing SW: SEMCAD, V1.8 Build 146

**1900MHz @ 250mW/Area Scan (51x51x1):** Measurement grid: dx=20mm, dy=20mm  
Maximum value of SAR (interpolated) = 16.4 mW/g

**1900MHz @ 250mW/Zoom Scan (5x5x7)/Cube 0:** Measurement grid: dx=8mm, dy=8mm, dz=5mm  
Reference Value = 91.8 V/m; Power Drift = -0.054 dB  
Peak SAR (extrapolated) = 18.1 W/kg  
**SAR(1 g) = 10.2 mW/g**

Maximum value of SAR (measured) = 11.4 mW/g



0 dB = 11.4mW/g