

APPENDIX F

The Validation Measurements

SAMSUNG FCC ID : A3LSGHT309H -- GSM1900 Head SAR

DUT: Dipole 1900 MHz; Serial: 5d023

Program Name: 1900 Dipole Validation 2005.08.23

Procedure Name: 1900MHz @250mW

Procedure Notes: Meas.Tissue Temp(celsius)-22.0;Test Date-23/Aug/2005[OET Bulletin 65-Supplement C, July 2001]

Communication System: CW; Frequency: 1900 MHz;Duty Cycle: 1:1

Medium parameters used: $f = 1900 \text{ MHz}$; $\sigma = 1.39 \text{ mho/m}$; $\epsilon_r = 39.8$; $\rho = 1000 \text{ kg/m}^3$

Phantom section: Flat Section

DASY4 Configuration:

- Probe: EX3DV4 - SN3537; ConvF(8.29, 8.29, 8.29); Calibrated: 2004-12-15
- Sensor-Surface: 4mm (Mechanical Surface Detection)
- Electronics: DAE3 Sn468; Calibrated: 2004-12-07
- Phantom: SAM 1800/1900 MHz; Type: SAM; Serial: TP-1248
- Measurement SW: DASY4, V4.5 Build 19; Postprocessing SW: SEMCAD, V1.8 Build 146

1900MHz @250mW/Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=8\text{mm}$, $dy=8\text{mm}$, $dz=5\text{mm}$

Reference Value = 88.8 V/m ; Power Drift = -0.023 dB

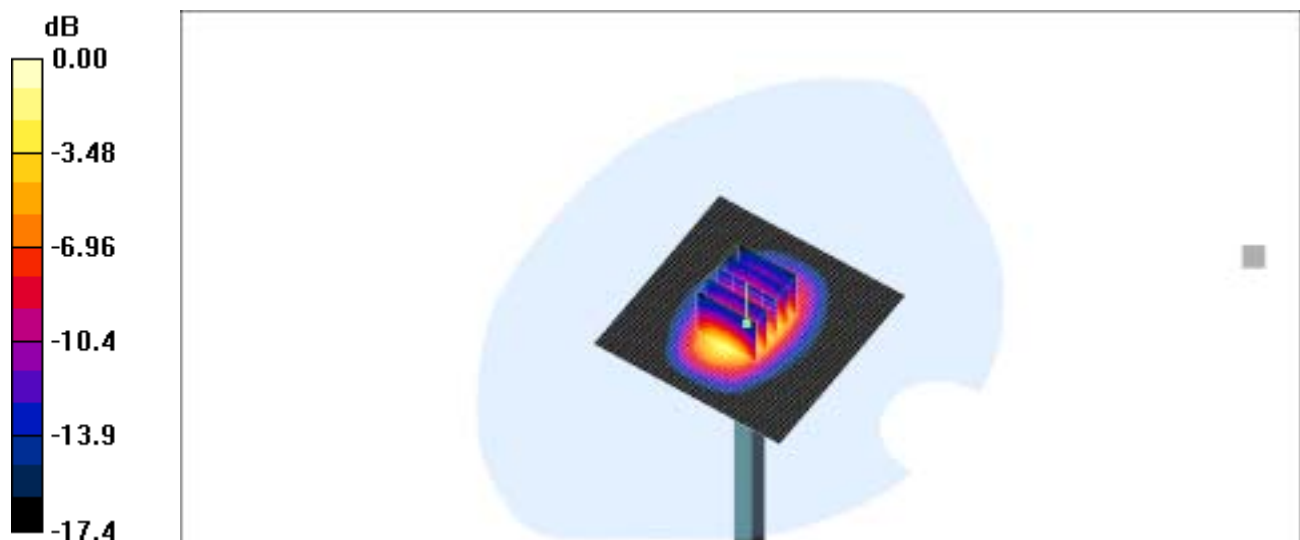
Peak SAR (extrapolated) = 18.2 W/kg

SAR(1 g) = 9.81 mW/g

Maximum value of SAR (measured) = 11.0 mW/g

1900MHz @250mW/Area Scan (51x51x1): Measurement grid: $dx=20\text{mm}$, $dy=20\text{mm}$

Maximum value of SAR (interpolated) = 14.9 mW/g



0 dB = 11.0 mW/g