

## 15.13 SAR test plots for LTE Band 13

### LTE Band 13 Edge1 0mm 1RB Reduced Power 782MHz

Communication System: UID 0, LTE (0); Communication System Band: Band 13; Frequency: 782 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated):  $f = 782$  MHz;  $\sigma = 0.966$  S/m;  $\epsilon_r = 55.282$ ;  $\rho = 1000$  kg/m<sup>3</sup>

Phantom section: Flat Section

Measurement Standard: DASYS5 (IEEE/IEC/ANSI C63.19-2007)

DASY5 Configuration

Probe: EX3DV4 - SN3917; ConvF(9.99, 9.99, 9.99); Calibrated: 2013/05/14;

Sensor-Surface: 2mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1369; Calibrated: 2013/05/13

Phantom: ELI v5.0 SN1203; Type: QDOVA002AA;

Measurement SW: DASYS2, Version 52.8 (7);

**Area Scan 2 (51x101x1):** Interpolated grid:  $dx=1.500$  mm,  $dy=1.500$  mm

Maximum value of SAR (interpolated) = 1.42 W/kg

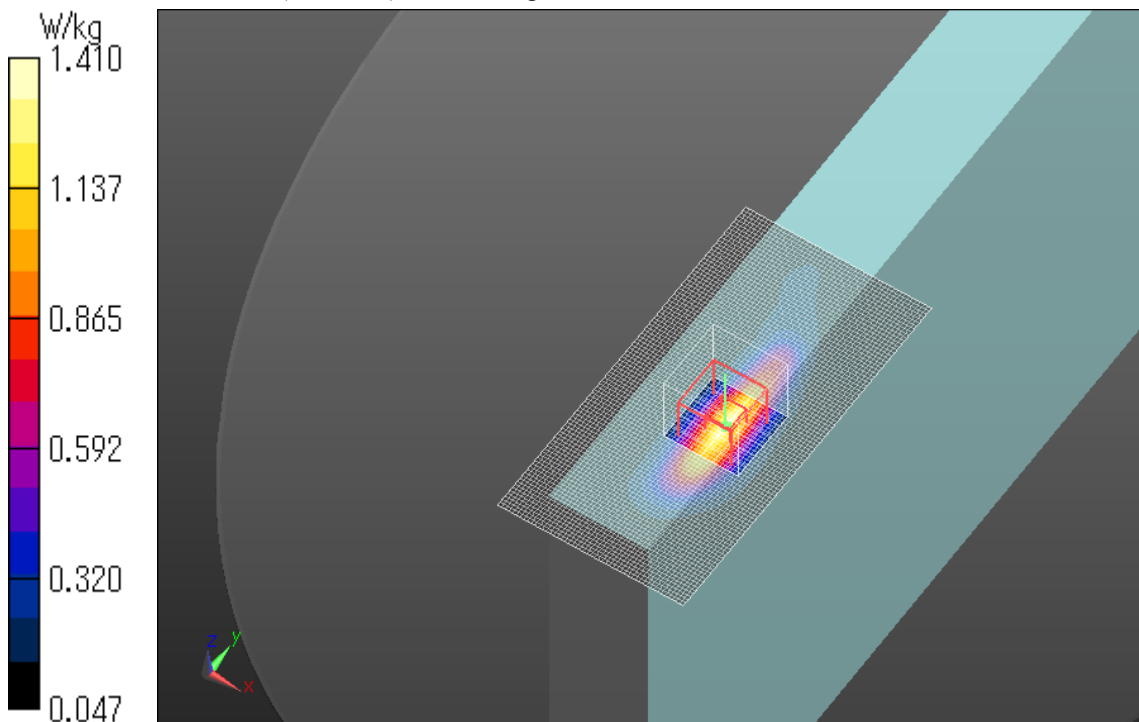
**Zoom Scan (7x7x7)/Cube 0:** Measurement grid:  $dx=5$ mm,  $dy=5$ mm,  $dz=5$ mm

Reference Value = 6.095 V/m; Power Drift = 0.05 dB

Peak SAR (extrapolated) = 1.91 W/kg

**SAR(1 g) = 0.922 W/kg; SAR(10 g) = 0.483 W/kg**

Maximum value of SAR (measured) = 1.41 W/kg



Plot No.1

**LTE Band 13 Edge1 0mm 25%RB Reduced Power 782MHz**

Communication System: UID 0, LTE (0); Communication System Band: Band 13; Frequency: 782 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated):  $f = 782$  MHz;  $\sigma = 0.966$  S/m;  $\epsilon_r = 55.282$ ;  $\rho = 1000$  kg/m<sup>3</sup>

Phantom section: Flat Section

Measurement Standard: DASYS (IEEE/IEC/ANSI C63.19-2007)

DASY5 Configuration

Probe: EX3DV4 - SN3917; ConvF(9.99, 9.99, 9.99); Calibrated: 2013/05/14;

Sensor-Surface: 2mm (Mechanical Surface Detection (Locations From Previous Scan Used)),

Sensor-Surface: 2mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1369; Calibrated: 2013/05/13

Phantom: ELI v5.0 SN1203; Type: QDOVA002AA;

Measurement SW: DASYS2, Version 52.8 (7);

**Area Scan 2 (51x101x1):** Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 1.46 W/kg

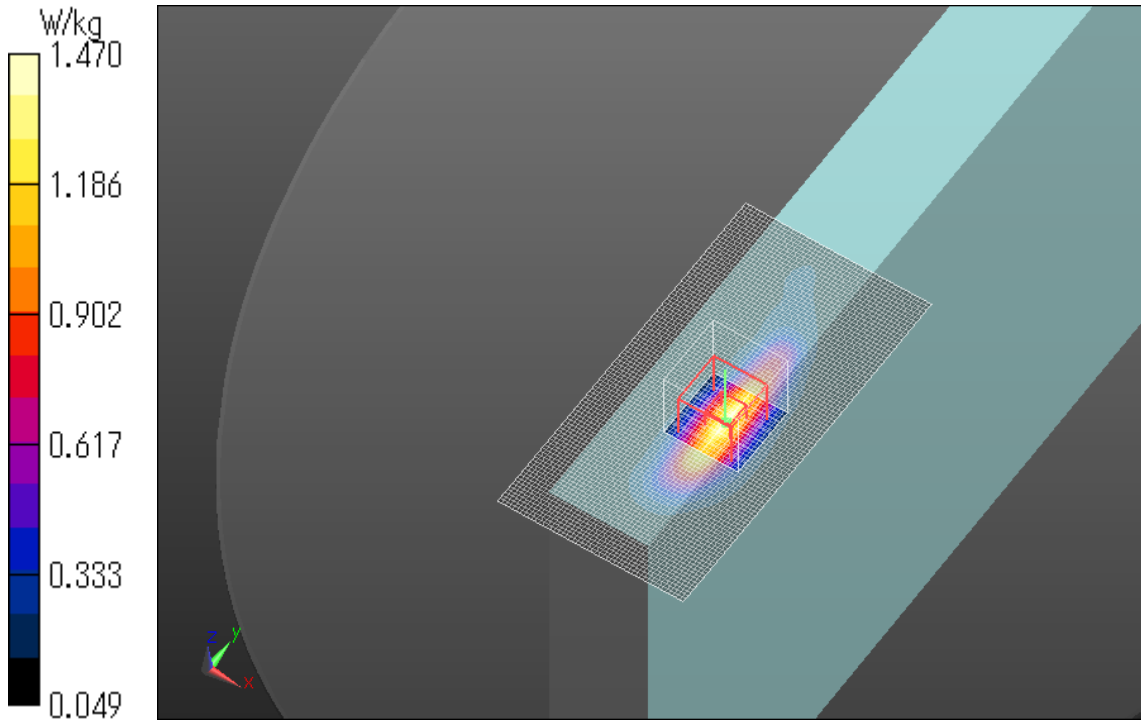
**Zoom Scan (7x7x7)/Cube 0:** Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 6.095 V/m; Power Drift = 0.03 dB

Peak SAR (extrapolated) = 1.98 W/kg

**SAR(1 g) = 0.962 W/kg; SAR(10 g) = 0.501 W/kg**

Maximum value of SAR (measured) = 1.47 W/kg



**Plot No.2**

**LTE Band 13 Edge1 0mm 25%RB Reduced Power 782MHz**

Communication System: UID 0, LTE (0); Communication System Band: Band 13; Frequency: 782 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated):  $f = 782$  MHz;  $\sigma = 0.966$  S/m;  $\epsilon_r = 55.282$ ;  $\rho = 1000$  kg/m<sup>3</sup>

Phantom section: Flat Section

Measurement Standard: DASYS5 (IEEE/IEC/ANSI C63.19-2007)

DASY5 Configuration

Probe: EX3DV4 - SN3917; ConvF(9.99, 9.99, 9.99); Calibrated: 2013/05/14;

Sensor-Surface: 2mm (Mechanical Surface Detection)

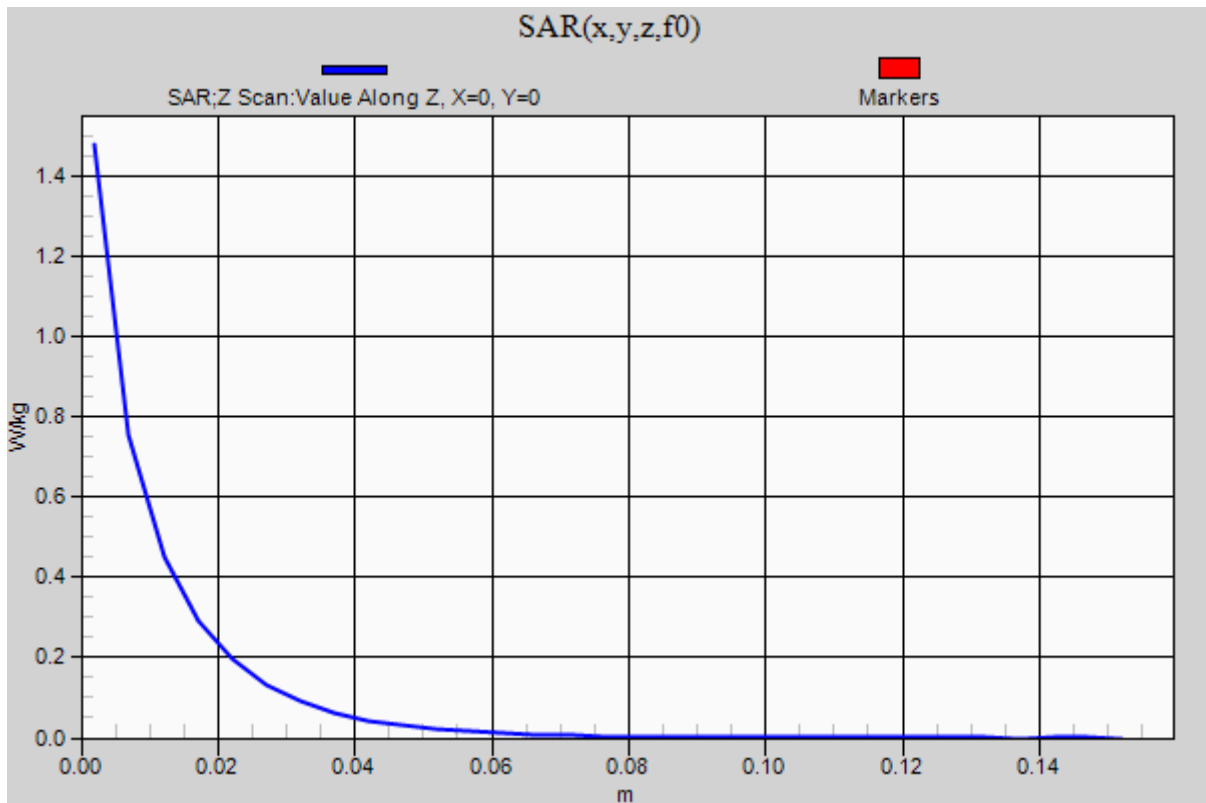
Electronics: DAE4 Sn1369; Calibrated: 2013/05/13

Phantom: ELI v5.0 SN1203; Type: QDOVA002AA;

Measurement SW: DASYS2, Version 52.8 (7);

**Z Scan (1x1x31):** Measurement grid: dx=20mm, dy=20mm, dz=5mm

Maximum value of SAR (measured) = 1.48 W/kg



**LTE Band 13 Edge1 0mm 50%RB Reduced Power 782MHz**

Communication System: UID 0, LTE (0); Communication System Band: Band 13; Frequency: 782 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated):  $f = 782$  MHz;  $\sigma = 0.966$  S/m;  $\epsilon_r = 55.282$ ;  $\rho = 1000$  kg/m<sup>3</sup>

Phantom section: Flat Section

Measurement Standard: DASYS5 (IEEE/IEC/ANSI C63.19-2007)

DASY5 Configuration

Probe: EX3DV4 - SN3917; ConvF(9.99, 9.99, 9.99); Calibrated: 2013/05/14;

Sensor-Surface: 2mm (Mechanical Surface Detection (Locations From Previous Scan Used)),

Sensor-Surface: 2mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1369; Calibrated: 2013/05/13

Phantom: ELI v5.0 SN1203; Type: QDOVA002AA;

Measurement SW: DASYS2, Version 52.8 (7);

**Area Scan 2 (51x101x1):** Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 1.43 W/kg

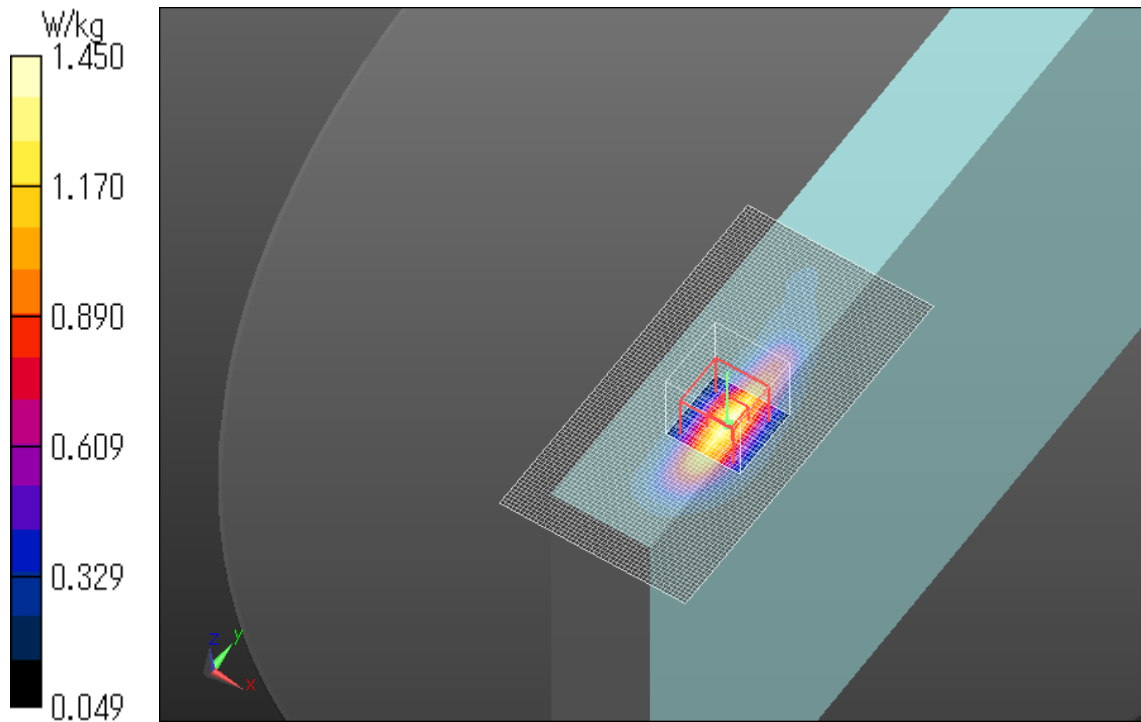
**Zoom Scan (7x7x7)/Cube 0:** Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 6.108 V/m; Power Drift = -0.04 dB

Peak SAR (extrapolated) = 1.98 W/kg

**SAR(1 g) = 0.948 W/kg; SAR(10 g) = 0.493 W/kg**

Maximum value of SAR (measured) = 1.45 W/kg



**Plot No.3**

**LTE Band 13 Rear 0mm 1RB Full Power 782MHz**

Communication System: UID 0, LTE (0); Communication System Band: Band 13; Frequency: 782 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated):  $f = 782 \text{ MHz}$ ;  $\sigma = 0.966 \text{ S/m}$ ;  $\epsilon_r = 55.282$ ;  $\rho = 1000 \text{ kg/m}^3$

Phantom section: Flat Section

Measurement Standard: DASY5 (IEEE/IEC/ANSI C63.19-2007)

DASY5 Configuration

Probe: EX3DV4 - SN3917; ConvF(9.99, 9.99, 9.99); Calibrated: 2013/05/14;

Sensor-Surface: 2mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1369; Calibrated: 2013/05/13

Phantom: ELI v5.0 SN1203; Type: QDOVA002AA;

Measurement SW: DASY52, Version 52.8 (7);

**Area Scan 2 2 (81x111x1):** Interpolated grid:  $dx=1.500 \text{ mm}$ ,  $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) =  $0.207 \text{ W/kg}$

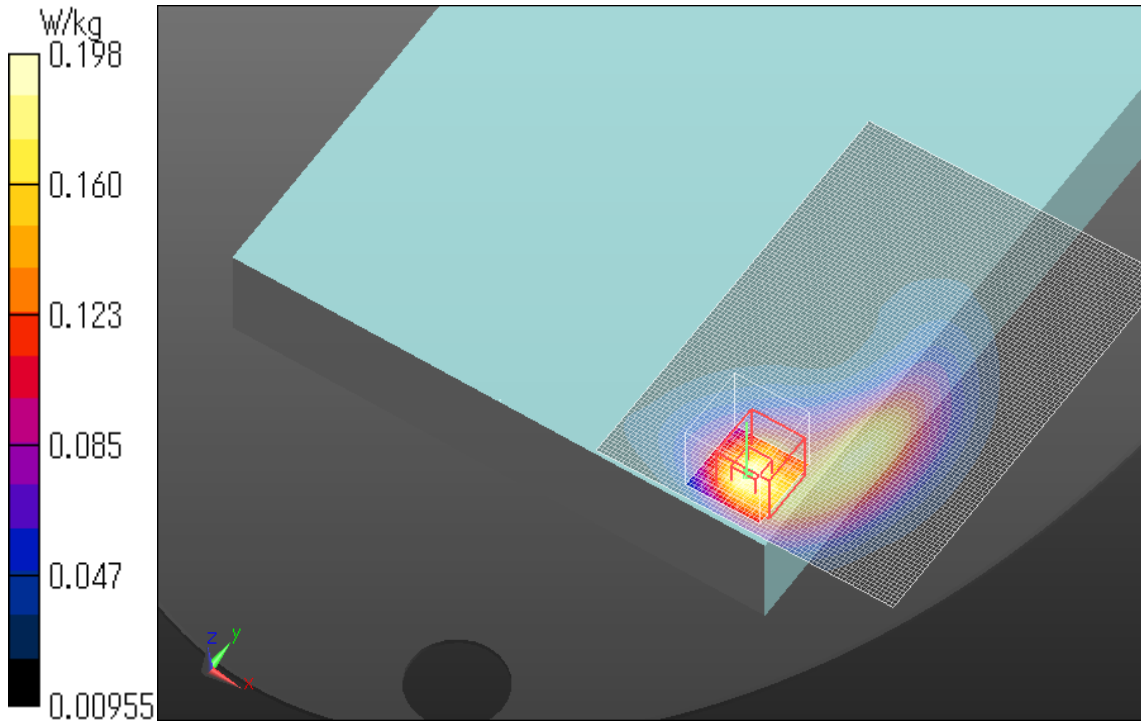
**Zoom Scan (7x7x7)/Cube 0:** Measurement grid:  $dx=5\text{mm}$ ,  $dy=5\text{mm}$ ,  $dz=5\text{mm}$

Reference Value =  $13.551 \text{ V/m}$ ; Power Drift =  $-0.17 \text{ dB}$

Peak SAR (extrapolated) =  $0.251 \text{ W/kg}$

**SAR(1 g) =  $0.144 \text{ W/kg}$ ; SAR(10 g) =  $0.086 \text{ W/kg}$**

Maximum value of SAR (measured) =  $0.198 \text{ W/kg}$



**Plot No.4**

**LTE Band 13 Rear 0mm 25%RB Full Power 782MHz**

Communication System: UID 0, LTE (0); Communication System Band: Band 13; Frequency: 782 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated):  $f = 782$  MHz;  $\sigma = 0.966$  S/m;  $\epsilon_r = 55.282$ ;  $\rho = 1000$  kg/m<sup>3</sup>

Phantom section: Flat Section

Measurement Standard: DASYS5 (IEEE/IEC/ANSI C63.19-2007)

DASY5 Configuration

Probe: EX3DV4 - SN3917; ConvF(9.99, 9.99, 9.99); Calibrated: 2013/05/14;

Sensor-Surface: 2mm (Mechanical Surface Detection (Locations From Previous Scan Used)),

Sensor-Surface: 2mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1369; Calibrated: 2013/05/13

Phantom: ELI v5.0 SN1203; Type: QDOVA002AA;

Measurement SW: DASYS2, Version 52.8 (7);

**Area Scan 2 2 (81x111x1):** Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.149 W/kg

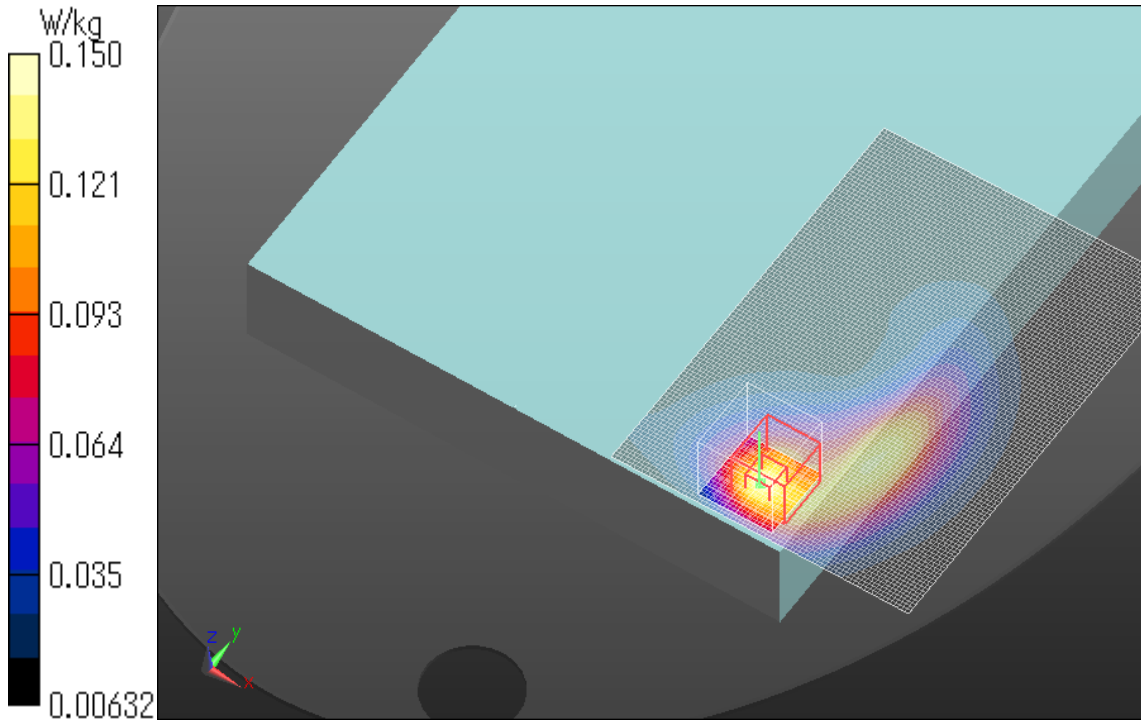
**Zoom Scan (7x7x7)/Cube 0:** Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 12.852 V/m; Power Drift = -0.10 dB

Peak SAR (extrapolated) = 0.193 W/kg

**SAR(1 g) = 0.107 W/kg; SAR(10 g) = 0.064 W/kg**

Maximum value of SAR (measured) = 0.150 W/kg



**Plot No.5**

**LTE Band 13 Edge1 16mm 1RB Full Power 782MHz**

Communication System: UID 0, LTE (0); Communication System Band: Band 13; Frequency: 782 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated):  $f = 782$  MHz;  $\sigma = 0.966$  S/m;  $\epsilon_r = 55.282$ ;  $\rho = 1000$  kg/m<sup>3</sup>

Phantom section: Flat Section

Measurement Standard: DASYS5 (IEEE/IEC/ANSI C63.19-2007)

DASY5 Configuration

Probe: EX3DV4 - SN3917; ConvF(9.99, 9.99, 9.99); Calibrated: 2013/05/14;

Sensor-Surface: 2mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1369; Calibrated: 2013/05/13

Phantom: ELI v5.0 SN1203; Type: QDOVA002AA;

Measurement SW: DASYS2, Version 52.8 (7);

**Area Scan 2 (51x101x1):** Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.348 W/kg

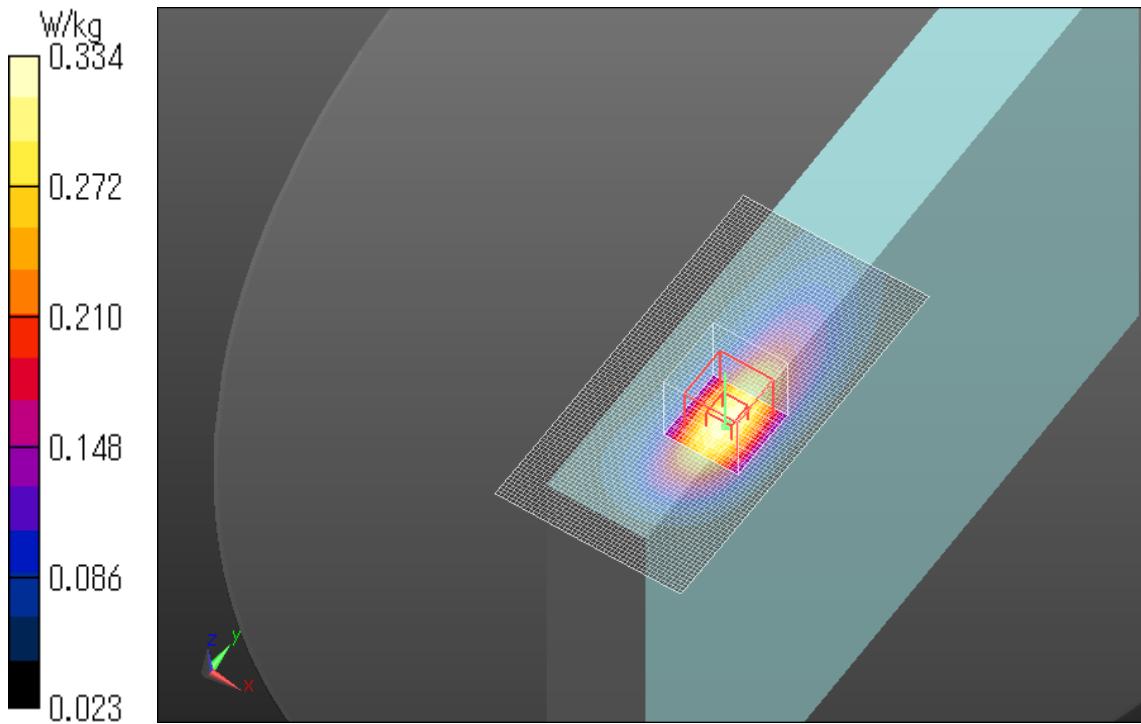
**Zoom Scan (7x7x7)/Cube 0:** Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 7.005 V/m; Power Drift = -0.07 dB

Peak SAR (extrapolated) = 0.388 W/kg

**SAR(1 g) = 0.266 W/kg; SAR(10 g) = 0.171 W/kg**

Maximum value of SAR (measured) = 0.334 W/kg



**Plot No.6**

**LTE Band 13 Edge1 16mm 25%RB Full Power 782MHz**

Communication System: UID 0, LTE (0); Communication System Band: Band 13; Frequency: 782 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated):  $f = 782$  MHz;  $\sigma = 0.966$  S/m;  $\epsilon_r = 55.282$ ;  $\rho = 1000$  kg/m<sup>3</sup>

Phantom section: Flat Section

Measurement Standard: DASYS5 (IEEE/IEC/ANSI C63.19-2007)

DASY5 Configuration

Probe: EX3DV4 - SN3917; ConvF(9.99, 9.99, 9.99); Calibrated: 2013/05/14;

Sensor-Surface: 2mm (Mechanical Surface Detection (Locations From Previous Scan Used)),

Sensor-Surface: 2mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1369; Calibrated: 2013/05/13

Phantom: ELI v5.0 SN1203; Type: QDOVA002AA;

Measurement SW: DASYS2, Version 52.8 (7);

**Area Scan 2 (51x101x1):** Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.284 W/kg

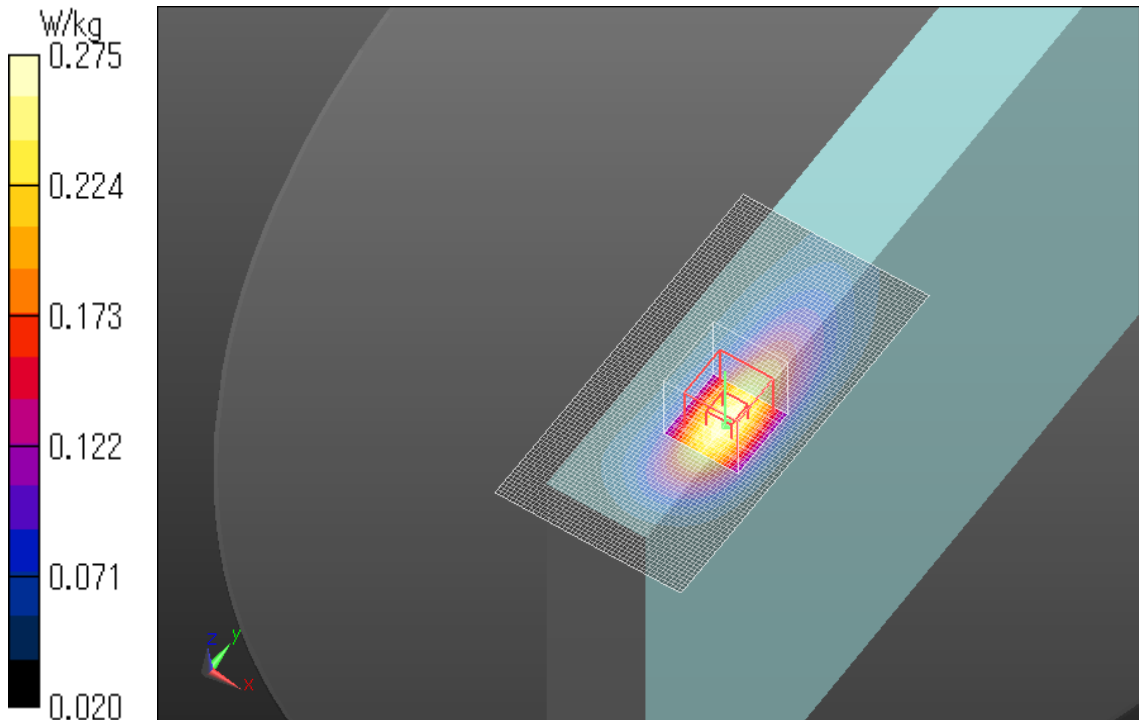
**Zoom Scan (7x7x7)/Cube 0:** Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 6.092 V/m; Power Drift = -0.05 dB

Peak SAR (extrapolated) = 0.321 W/kg

**SAR(1 g) = 0.219 W/kg; SAR(10 g) = 0.141 W/kg**

Maximum value of SAR (measured) = 0.275 W/kg



**Plot No.7**

**LTE Band 13 Edge4 0mm 1RB Full Power 782MHz**

Communication System: UID 0, LTE (0); Communication System Band: Band 13; Frequency: 782 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated):  $f = 782$  MHz;  $\sigma = 0.966$  S/m;  $\epsilon_r = 55.282$ ;  $\rho = 1000$  kg/m<sup>3</sup>

Phantom section: Flat Section

Measurement Standard: DASYS5 (IEEE/IEC/ANSI C63.19-2007)

DASY5 Configuration

Probe: EX3DV4 - SN3917; ConvF(9.99, 9.99, 9.99); Calibrated: 2013/05/14;

Sensor-Surface: 2mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1369; Calibrated: 2013/05/13

Phantom: ELI v5.0 SN1203; Type: QDOVA002AA;

Measurement SW: DASYS2, Version 52.8 (7);

**Area Scan 2 (61x161x1):** Interpolated grid: dx=1.500 mm, dy=1.500 mm

Maximum value of SAR (interpolated) = 0.304 W/kg

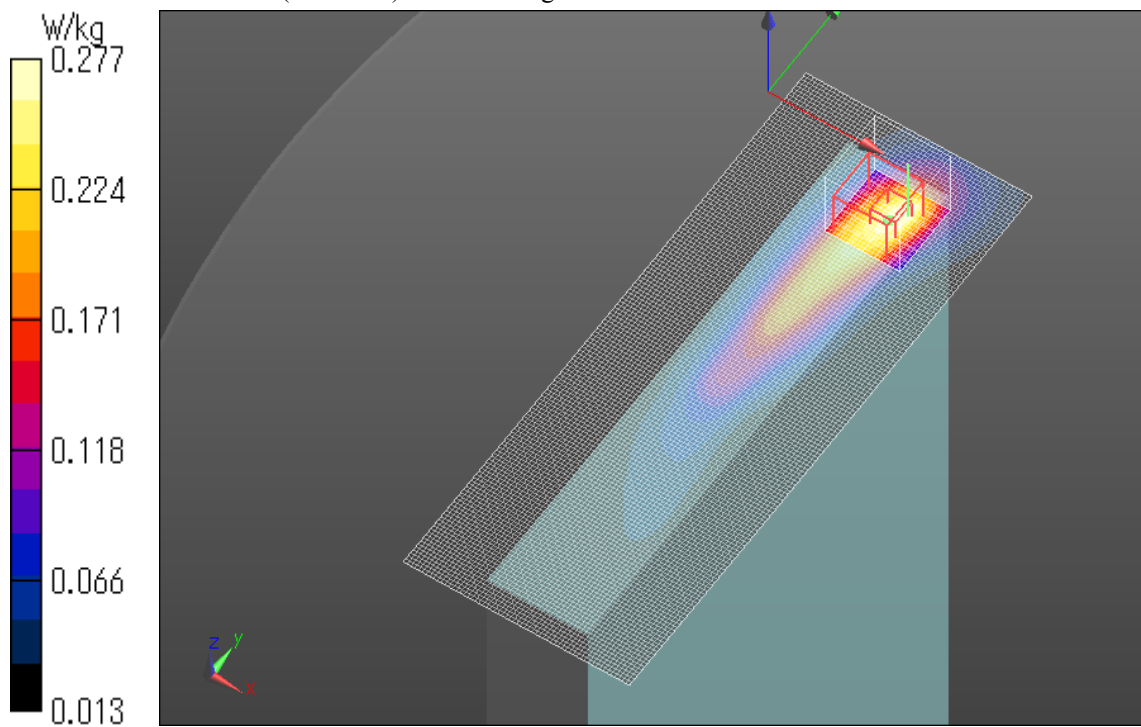
**Zoom Scan (7x7x7)/Cube 0:** Measurement grid: dx=5mm, dy=5mm, dz=5mm

Reference Value = 4.188 V/m; Power Drift = 0.18 dB

Peak SAR (extrapolated) = 0.380 W/kg

**SAR(1 g) = 0.204 W/kg; SAR(10 g) = 0.122 W/kg**

Maximum value of SAR (measured) = 0.277 W/kg



**Plot No.8**

**LTE Band 13 Edge4 0mm 25%RB Full Power 782MHz**

Communication System: UID 0, LTE (0); Communication System Band: Band 13; Frequency: 782 MHz; Duty Cycle: 1:1

Medium parameters used (interpolated):  $f = 782 \text{ MHz}$ ;  $\sigma = 0.966 \text{ S/m}$ ;  $\epsilon_r = 55.282$ ;  $\rho = 1000 \text{ kg/m}^3$

Phantom section: Flat Section

Measurement Standard: DASY5 (IEEE/IEC/ANSI C63.19-2007)

DASY5 Configuration

Probe: EX3DV4 - SN3917; ConvF(9.99, 9.99, 9.99); Calibrated: 2013/05/14;

Sensor-Surface: 2mm (Mechanical Surface Detection (Locations From Previous Scan Used)),

Sensor-Surface: 2mm (Mechanical Surface Detection)

Electronics: DAE4 Sn1369; Calibrated: 2013/05/13

Phantom: ELI v5.0 SN1203; Type: QDOVA002AA;

Measurement SW: DASY52, Version 52.8 (7);

**Area Scan 2 (61x161x1):** Interpolated grid:  $dx=1.500 \text{ mm}$ ,  $dy=1.500 \text{ mm}$

Maximum value of SAR (interpolated) =  $0.235 \text{ W/kg}$

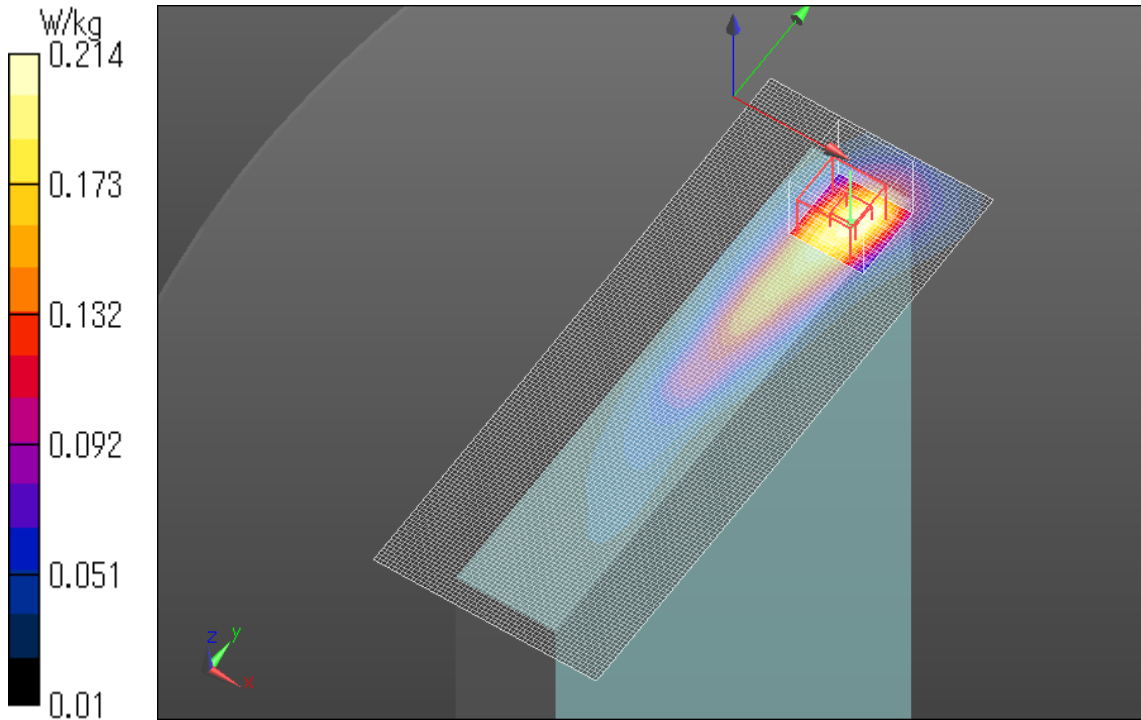
**Zoom Scan (7x7x7)/Cube 0:** Measurement grid:  $dx=5\text{mm}$ ,  $dy=5\text{mm}$ ,  $dz=5\text{mm}$

Reference Value =  $3.992 \text{ V/m}$ ; Power Drift =  $0.01 \text{ dB}$

Peak SAR (extrapolated) =  $0.292 \text{ W/kg}$

**SAR(1 g) =  $0.160 \text{ W/kg}$ ; SAR(10 g) =  $0.096 \text{ W/kg}$**

Maximum value of SAR (measured) =  $0.214 \text{ W/kg}$



**Plot No.9**