

 MOTOROLA SOLUTIONS	 TESTING CERT # 2518.01																																				
DECLARATION OF COMPLIANCE SAR ASSESSMENT Part 2 of 2																																					
Motorola Solutions Inc. EME Test Laboratory 8000 West Sunrise Blvd Fort Lauderdale, FL. 33322	Date of Report: 10/31/2013 Report Revision: B Report ID: SR11745_PMU1630A Rev B 131031																																				
<table> <tr> <td>Responsible Engineer:</td> <td>Veeramani Veerapan (Sr.EME Engineer)</td> </tr> <tr> <td>Report Author:</td> <td>Veeramani Veerapan (Sr.EME Engineer)</td> </tr> <tr> <td>Date/s Tested:</td> <td>09/09/13-09/17/13</td> </tr> <tr> <td>Manufacturer/Location:</td> <td>Motorola, Penang</td> </tr> <tr> <td>Sector/Group/Div.:</td> <td>EMS</td> </tr> <tr> <td>Date submitted for test:</td> <td>08/23/13</td> </tr> <tr> <td>DUT Description:</td> <td>Handheld Portable-Frequency band of 806-824MHz & 851-869MHz, 2.402-2.480GHz (Bluetooth), Non-GOB</td> </tr> <tr> <td>Test TX mode(s):</td> <td>TDMA(PTT); CW (Bluetooth)</td> </tr> <tr> <td>Max. Power output:</td> <td>2.4W (800 band), 10.0mW (Bluetooth)</td> </tr> <tr> <td>Nominal Power:</td> <td>2.0W(800 band), 2.5mW (Bluetooth)</td> </tr> <tr> <td>Tx Frequency Bands:</td> <td>806-824MHz & 851-869MHz, 2.402-2.480GHz (Bluetooth)</td> </tr> <tr> <td>Signaling type:</td> <td>TDMA; FHSS (Bluetooth)</td> </tr> <tr> <td>Model(s) Tested:</td> <td>PMUF1630A</td> </tr> <tr> <td>Model(s) Certified:</td> <td>PMUF1630A</td> </tr> <tr> <td>Serial Number(s):</td> <td>806TPR1014</td> </tr> <tr> <td>Classification:</td> <td>Occupational/Controlled</td> </tr> <tr> <td>FCC ID:</td> <td>AZ489FT5866; Rule Part 90 (806-824MHz, 851-869MHz)</td> </tr> <tr> <td>IC ID:</td> <td>109U-89FT5866</td> </tr> </table>		Responsible Engineer:	Veeramani Veerapan (Sr.EME Engineer)	Report Author:	Veeramani Veerapan (Sr.EME Engineer)	Date/s Tested:	09/09/13-09/17/13	Manufacturer/Location:	Motorola, Penang	Sector/Group/Div.:	EMS	Date submitted for test:	08/23/13	DUT Description:	Handheld Portable-Frequency band of 806-824MHz & 851-869MHz, 2.402-2.480GHz (Bluetooth), Non-GOB	Test TX mode(s):	TDMA(PTT); CW (Bluetooth)	Max. Power output:	2.4W (800 band), 10.0mW (Bluetooth)	Nominal Power:	2.0W(800 band), 2.5mW (Bluetooth)	Tx Frequency Bands:	806-824MHz & 851-869MHz, 2.402-2.480GHz (Bluetooth)	Signaling type:	TDMA; FHSS (Bluetooth)	Model(s) Tested:	PMUF1630A	Model(s) Certified:	PMUF1630A	Serial Number(s):	806TPR1014	Classification:	Occupational/Controlled	FCC ID:	AZ489FT5866; Rule Part 90 (806-824MHz, 851-869MHz)	IC ID:	109U-89FT5866
Responsible Engineer:	Veeramani Veerapan (Sr.EME Engineer)																																				
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The test results clearly demonstrate compliance with FCC Occupational/Controlled RF Exposure limits of 8 W/kg averaged over 1 gram per the requirements of 47 CFR 2.1093(d). The 10 grams result is not applicable to FCC filing. Results outside FCC bands are not applicable for FCC compliance demonstration. The test results clearly demonstrate compliance with ICNIRP (1998) Guidelines for limiting exposure in time-varying electric, magnetic, and electromagnetic fields (up to 300 GHz), Health Physics 74, 494-522 RF Exposure limits of 10 W/kg averaged over 10grams of contiguous tissue.																																					
Based on the information and the testing results provided herein, the undersigned certifies that when used as stated in the operating instructions supplied, said product complies with the national and international reference standards and guidelines listed in section 3.0 of this report. This report shall not be reproduced without written approval from an officially designated representative of the Motorola Solutions Inc EME Laboratory. I attest to the accuracy of the data and assume full responsibility for the completeness of these measurements. This reporting format is consistent with the suggested guidelines of the TIA TSB-150 December 2004. The results and statements contained in this report pertain only to the device(s) evaluated.																																					
 Deanna Zakharia EMS EME Lab Senior Resource Manager, Laboratory Director Approval Date: 10/31/2013	Certification Date: 10/30/2013 Certification No. L1131020																																				

APPENDIX C

Test System Check Scans

Motorola Solutions, Inc. EME Laboratory

Date/Time: 9/10/2013 9:31:54 AM

Robot#: DASY5-FL-3 | Run#: AvG-SYSP-900B-130910-01
 Dipole Model#: D900V2
 Phantom#: OVAL1022
 Tissue Temp: 20.5 (C)
 Serial#: 084
 Test Freq: 900 (MHz)
 Start Power: 250 (mW)
 Rotation (1D): 0.046 dB
 Adjusted SAR (1W): 10.96 mW/g (1g)

Comments:

Duty Cycle: 1:1, Medium parameters used: $f = 900$ MHz; $\sigma = 1.05$ mho/m; $\epsilon_r = 53.9$; $\rho = 1000$ kg/m³

Probe: ES3DV3 - SN3147, Frequency: 900 MHz, ConvF(5.99, 5.99, 5.99); Calibrated: 1/28/2013

Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/System Performance Check/Dipole Area Scan 1 (41x51x1):

Interpolated grid: $dx=1.500$ mm, $dy=1.500$ mm

Reference Value = **not measured**; Power Drift = 0.01 dB

Fast SAR: SAR(1 g) = 2.76 mW/g; SAR(10 g) = 1.81 mW/g (SAR corrected for target medium)

Maximum value of SAR (interpolated) = 2.95 W/kg

Below 2 GHz-Rev.1/System Performance Check/0-Degree Cube (5x5x7)/Cube 0:

Measurement grid: $dx=7.5$ mm, $dy=7.5$ mm, $dz=5$ mm

Reference Value = 53.988 V/m; Power Drift = 0.01 dB

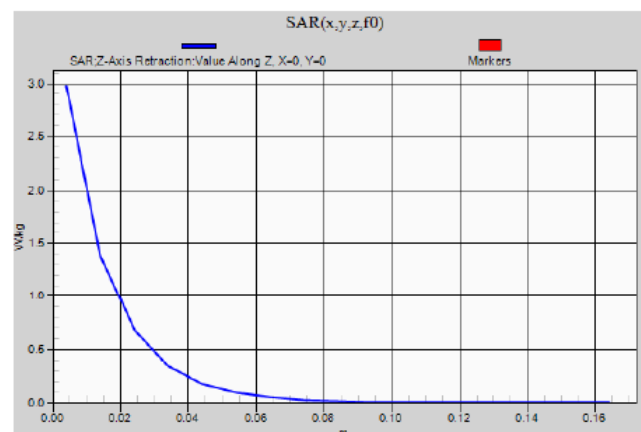
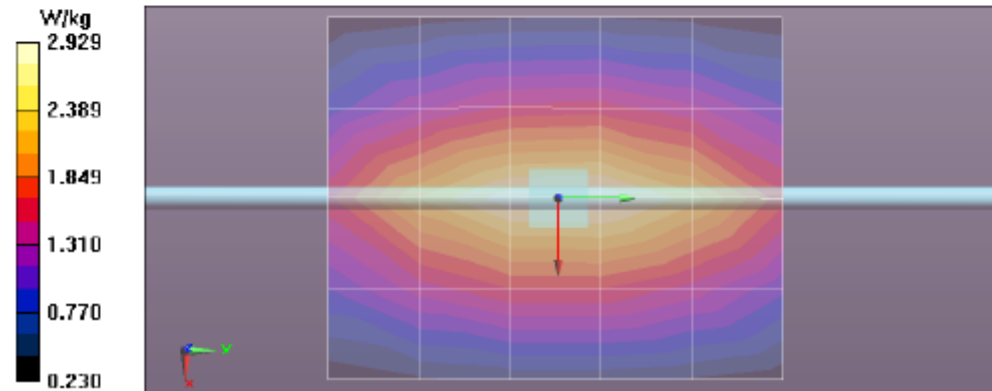
Peak SAR (extrapolated) = 4.039 mW/g

SAR(1 g) = 2.74 mW/g; SAR(10 g) = 1.78 mW/g (SAR corrected for target medium)

Maximum value of SAR (measured) = 2.98 W/kg

Below 2 GHz-Rev.1/System Performance Check/Z-Axis Retraction (1x1x17): Measurement

grid: $dx=20$ mm, $dy=20$ mm, $dz=10$ mm



Motorola Solutions, Inc. EME Laboratory

Date/Time: 9/11/2013 9:50:04 AM

Robot#: DASY5-FL-3 | Run#: HvH-SYSP-900H-130911-01
 Dipole Model#: D900V2
 Phantom#: OVAL1019
 Tissue Temp: 20.7 (C)
 Serial#: 084
 Test Freq: 900 (MHz)
 Start Power: 250 (mW)
 Rotation (1D): 0.044 dB
 Adjusted SAR (1W): 10.84 mW/g (1g)

Comments:

Duty Cycle: 1:1, Medium parameters used: $f = 900$ MHz; $\sigma = 0.95$ mho/m; $\epsilon_r = 42.1$; $\rho = 1000$ kg/m³
 Probe: ES3DV3 - SN3147, , Frequency: 900 MHz, ConvF(6.14, 6.14, 6.14); Calibrated: 1/28/2013
 Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/System Performance Check/Dipole Area Scan 2 (41x81x1):

Interpolated grid: dx=1.500 mm, dy=1.500 mm

Reference Value = 55.712 V/m; Power Drift = 0.02 dB

Fast SAR: SAR(1 g) = 2.71 mW/g; SAR(10 g) = 1.77 mW/g (SAR corrected for target medium)

Maximum value of SAR (interpolated) = 2.86 W/kg

Below 2 GHz-Rev.1/System Performance Check/0-Degree Cube (5x5x7)/Cube 0:

Measurement grid: dx=7.5mm, dy=7.5mm, dz=5mm

Reference Value = 55.712 V/m; Power Drift = 0.02 dB

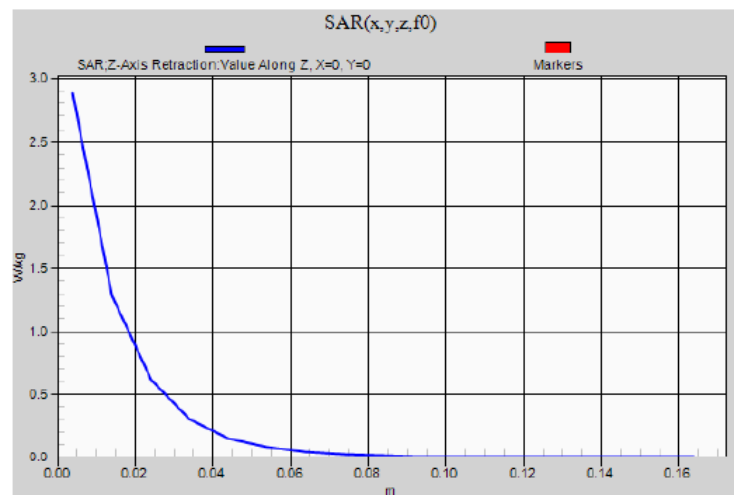
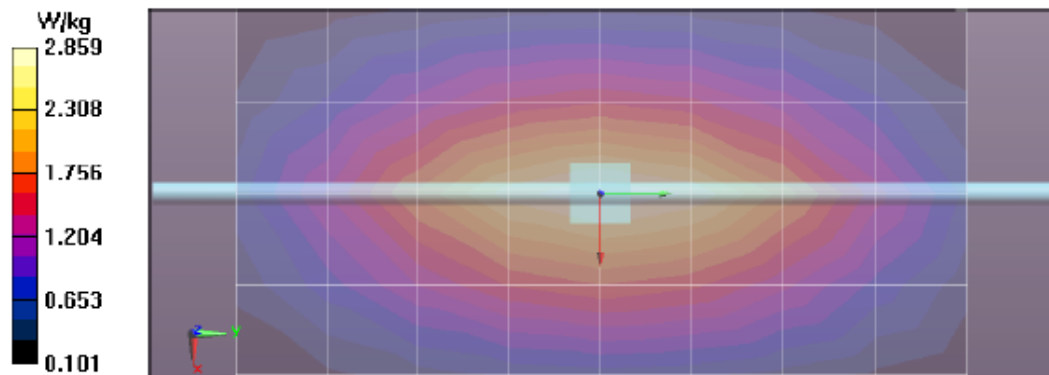
Peak SAR (extrapolated) = 3.993 mW/g

SAR(1 g) = 2.71 mW/g; SAR(10 g) = 1.74 mW/g (SAR corrected for target medium)

Maximum value of SAR (measured) = 2.88 W/kg

Below 2 GHz-Rev.1/System Performance Check/Z-Axis Retraction (1x1x17): Measurement

grid: dx=20mm, dy=20mm, dz=10mm



Motorola Solutions, Inc. EME Laboratory
Date/Time: 9/13/2013 8:07:02 AM

Robot#: DASY5-FL-3 | Run#: HvH-SYSP-900B-130913-01
Dipole Model#: D900V2
Phantom#: OVAL1022
Tissue Temp: 21.8 (C)
Serial#: 084
Test Freq: 900 (MHz)
Start Power: 250 (mW)
Rotation (1D): 0.046 dB
Adjusted SAR (1W): 10.84 mW/g (1g)

Comments:

Duty Cycle: 1:1, Medium parameters used: $f = 900$ MHz; $\sigma = 1.02$ mho/m; $\epsilon_r = 54.5$; $\rho = 1000$ kg/m³
Probe: ES3DV3 - SN3147, , Frequency: 900 MHz, ConvF(5.99, 5.99, 5.99); Calibrated: 1/28/2013
Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/System Performance Check/Dipole Area Scan 2 (41x81x1):

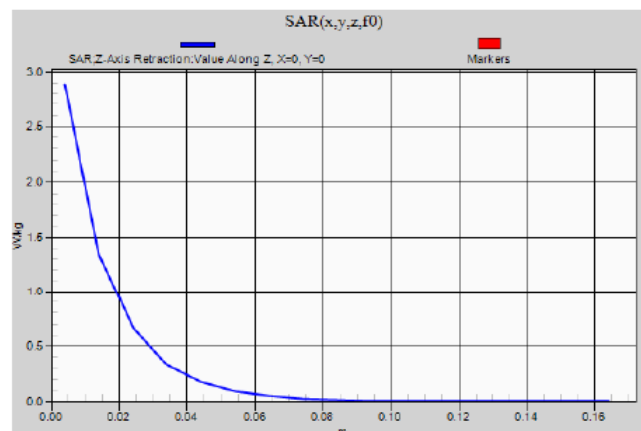
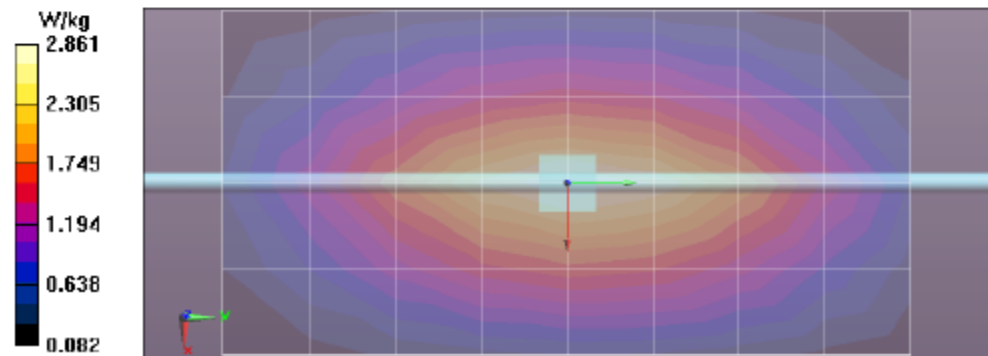
Interpolated grid: dx=1.500 mm, dy=1.500 mm
Reference Value = 53.939 V/m; Power Drift = 0.03 dB
Fast SAR: SAR(1 g) = 2.71 mW/g; SAR(10 g) = 1.76 mW/g (SAR corrected for target medium)
Maximum value of SAR (interpolated) = 2.87 W/kg

Below 2 GHz-Rev.1/System Performance Check/0-Degree Cube (5x5x7)/Cube 0:

Measurement grid: dx=7.5mm, dy=7.5mm, dz=5mm
Reference Value = 53.939 V/m; Power Drift = 0.03 dB
Peak SAR (extrapolated) = 3.897 mW/g
SAR(1 g) = 2.71 mW/g; SAR(10 g) = 1.75 mW/g (SAR corrected for target medium)
Maximum value of SAR (measured) = 2.88 W/kg

Below 2 GHz-Rev.1/System Performance Check/Z-Axis Retraction (1x1x17): Measurement

grid: dx=20mm, dy=20mm, dz=10mm
Maximum value of SAR (measured) = 2.89 W/kg



Motorola Solutions, Inc. EME Laboratory

Date/Time: 9/17/2013 7:28:51 AM

Robot#: DASY5-FL-3 | Run#: JsT-SYSP-900B-130917-01
 Dipole Model#: D900V2
 Phantom#: OVAL1022
 Tissue Temp: 21.5 (C)
 Serial#: 084
 Test Freq: 900 (MHz)
 Start Power: 250 (mW)
 Rotation (1D): 0.04 dB
 Adjusted SAR (1W): 10.96 mW/g (1g)

Comments:

Duty Cycle: 1:1, Medium parameters used: $f = 900$ MHz; $\sigma = 1.07$ mho/m; $\epsilon_r = 54.1$; $\rho = 1000$ kg/m³
 Probe: ES3DV3 - SN3147, Frequency: 900 MHz, ConvF(5.99, 5.99, 5.99); Calibrated: 1/28/2013
 Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/System Performance Check/Dipole Area Scan 2 (5x9x1): Measurement

grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 3.00 W/kg

Below 2 GHz-Rev.1/System Performance Check/0-Degree Cube (5x5x7)/Cube 0:

Measurement grid: dx=7.5mm, dy=7.5mm, dz=5mm

Reference Value = 53.906 V/m; Power Drift = 0.01 dB

Peak SAR (extrapolated) = 4.102 mW/g

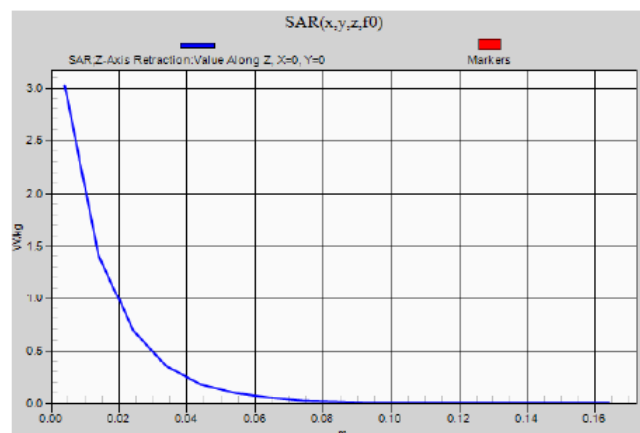
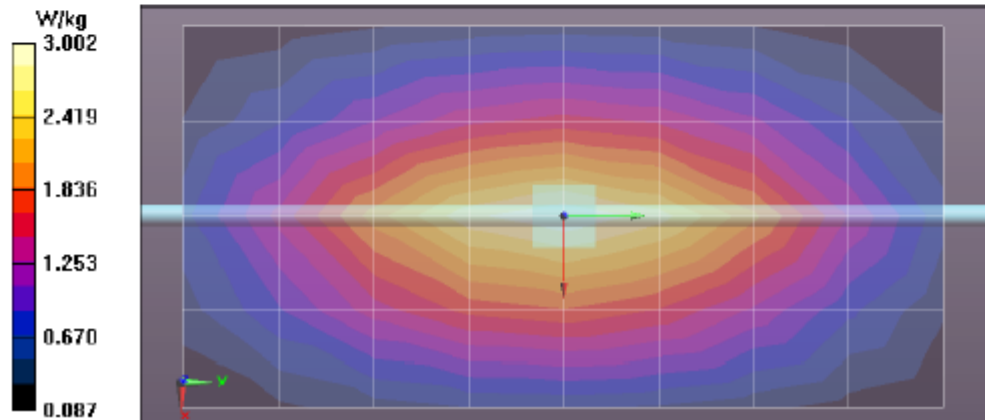
SAR(1 g) = 2.74 mW/g; SAR(10 g) = 1.79 mW/g (SAR corrected for target medium)

Maximum value of SAR (measured) = 3.03 W/kg

Below 2 GHz-Rev.1/System Performance Check/Z-Axis Retraction (1x1x17): Measurement

grid: dx=20mm, dy=20mm, dz=10mm

Maximum value of SAR (measured) = 3.02 W/kg



APPENDIX D
Worse case for Band 806-824MHz and 851-869MHz DUT Scans
(Shortened Scan and Highest SAR configurations)

Shortened Scan Result Table 26

Motorola Solutions, Inc. EME Laboratory

Date/Time: 9/17/2013 3:56:04 PM

Robot#: DASY5-FL-3 | Run#: HvH-Ab-130917-09
 Model#: PMUF1630A
 Phantom#: OVAL1022
 Tissue Temp: 20.8 (C)
 Serial#: 806TPR1014
 Antenna: PMAF4017A
 Test Freq: 806.0000 (MHz)
 Battery: HKNN4013A
 Carry Acc: PMLN5956A
 Audio Acc: None(BT)
 Start Power: 2.27 (W)

Comments: Shorten scan.

Duty Cycle: 1:1.99986, Medium parameters used: $f = 806$ MHz; $\sigma = 0.97$ mho/m; $\epsilon_r = 54.3$; $\rho = 1000$ kg/m³
 Probe: ES3DV3 - SN3147, , Frequency: 806 MHz, ConvF(5.99, 5.99, 5.99); Calibrated: 1/28/2013
 Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/Ab Scan/1-Area Scan (41x101x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Reference Value = 44.418 V/m; Power Drift = -0.26 dB

Fast SAR: SAR(1 g) = 2.52 mW/g; SAR(10 g) = 1.74 mW/g (SAR corrected for target medium)

Maximum value of SAR (interpolated) = 2.68 W/kg

Below 2 GHz-Rev.1/Ab Scan/3-Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=7.5mm,

dy=7.5mm, dz=5mm

Reference Value = 53.731 V/m; Power Drift = -0.26 dB

Peak SAR (extrapolated) = 3.426 mW/g

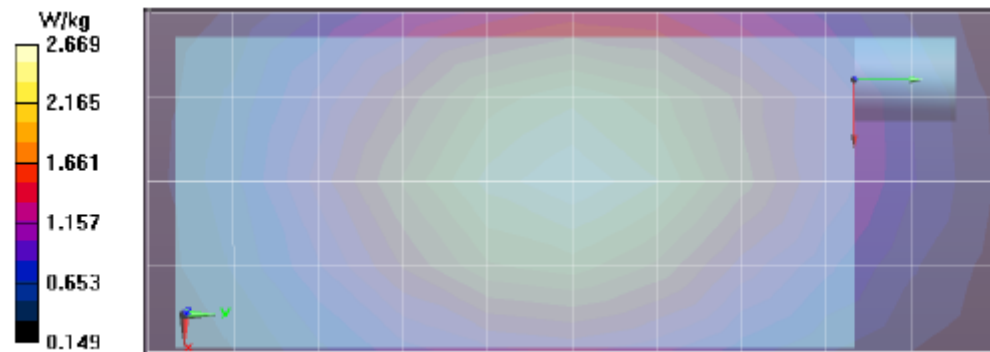
SAR(1 g) = 2.52 mW/g; SAR(10 g) = 1.84 mW/g (SAR corrected for target medium)

Maximum value of SAR (measured) = 2.66 W/kg

Below 2 GHz-Rev.1/Ab Scan/4-Z-Axis Scan (1x1x17): Measurement grid: dx=20mm, dy=20mm,

dz=10mm

Maximum value of SAR (measured) = 2.58 W/kg



Shortened scan reflect highest SAR producing configuration; approximate run time is 12 minutes.

Representative full scan run time was 21 minutes.

“Shortened” scan max calculated SAR using SAR drift: 1-g Avg. = 1.41 mW/g; 10-g Avg. = 1.03 mW/g.

Zoom scan max calculated SAR using SAR drift (see part 1 table 18): 1-g Avg. = 1.34 mW/g; 10-g Avg. = 0.94 mW/g.

Body - Highest SAR Configuration Result Table 18

Motorola Solutions, Inc. EME Laboratory

Date/Time: 9/13/2013 2:11:25 PM

Robot#: DASY5-FL-3 | Run#: HvH-Ab-130913-02
 Model#: PMUF1630A
 Phantom#: OVAL1022
 Tissue Temp: 21.4 (C)
 Serial#: 806TPR1014
 Antenna: PMAF4017A
 Test Freq: 806.0000 (MHz)
 Battery: HKN4013A
 Carry Acc: PMLN5956A
 Audio Acc: None(BT)
 Start Power: 2.36 (W)

Comments:

Duty Cycle: 1:1.99986, Medium parameters used: $f = 806 \text{ MHz}$; $\sigma = 0.97 \text{ mho/m}$; $\epsilon_r = 54.6$; $\rho = 1000 \text{ kg/m}^3$

Probe: ES3DV3 - SN3147, , Frequency: 806 MHz, ConvF(5.99, 5.99, 5.99); Calibrated: 1/28/2013

Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/Ab Scan/1-Area Scan (41x101x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Reference Value = 43.867 V/m; Power Drift = -0.26 dB

Fast SAR: SAR(1 g) = 2.44 mW/g; SAR(10 g) = 1.7 mW/g (SAR corrected for target medium)

Maximum value of SAR (interpolated) = 2.59 W/kg

Below 2 GHz-Rev.1/Ab Scan/3-Zoom Scan (21x26x36)/Cube 0: Interpolated grid: $dx=1.500 \text{ mm}$,
 $dy=1.500 \text{ mm}$, $dz=1.000 \text{ mm}$

Reference Value = 43.867 V/m; Power Drift = -0.40 dB

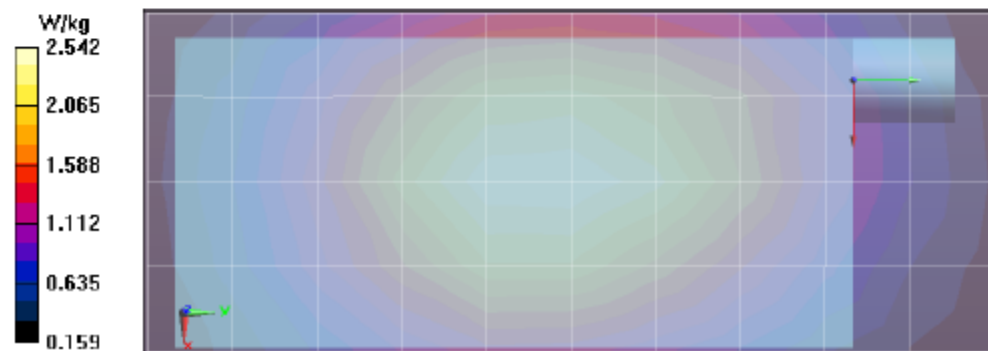
Peak SAR (extrapolated) = **Not Specified** mW/g

Fast SAR: SAR(1 g) = 2.4 mW/g; SAR(10 g) = 1.69 mW/g (SAR corrected for target medium)

Maximum value of SAR (interpolated) = 3.13 W/kg

Below 2 GHz-Rev.1/Ab Scan/4-Z-Axis Scan (1x1x17): Measurement grid: $dx=20\text{mm}$, $dy=20\text{mm}$,
 $dz=10\text{mm}$

Maximum value of SAR (measured) = 2.49 W/kg



Face - Highest SAR Configuration Result Table 23

Motorola Solutions, Inc. EME Laboratory

Date/Time: 9/11/2013 10:43:46 AM

Robot#: DASY5-FL-3 | Run#: HvH-Face-130911-02
 Model#: PMUF1630A
 Phantom#: OVAL1019
 Tissue Temp: 20.6 (C)
 Serial#: 806TPR1014
 Antenna: PMAF4017A
 Test Freq: 806.0000 (MHz)
 Battery: HKNN4013A
 Carry Acc: None
 Audio Acc: None
 Start Power: 2.35 (W)

Comments: @ front.

Duty Cycle: 1:1.99986, Medium parameters used: $f = 806 \text{ MHz}$; $\sigma = 0.89 \text{ mho/m}$; $\epsilon_r = 42.6$; $\rho = 1000 \text{ kg/m}^3$
 Probe: ES3DV3 - SN3147, Frequency: 806 MHz, ConvF(6.14, 6.14, 6.14); Calibrated: 1/28/2013
 Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/Face Scan/1-Area Scan (41x101x1): Interpolated grid: $dx=1.500 \text{ mm}$, $dy=1.500 \text{ mm}$

Reference Value = 42.111 V/m; Power Drift = -0.20 dB

Fast SAR: SAR(1 g) = 1.87 mW/g; SAR(10 g) = 1.31 mW/g (SAR corrected for target medium)

Maximum value of SAR (interpolated) = 1.94 W/kg

Below 2 GHz-Rev.1/Face Scan/3-Zoom Scan (5x5x7)/Cube 0: Measurement grid: $dx=7.5\text{mm}$, $dy=7.5\text{mm}$, $dz=5\text{mm}$

Reference Value = 42.111 V/m; Power Drift = -0.32 dB

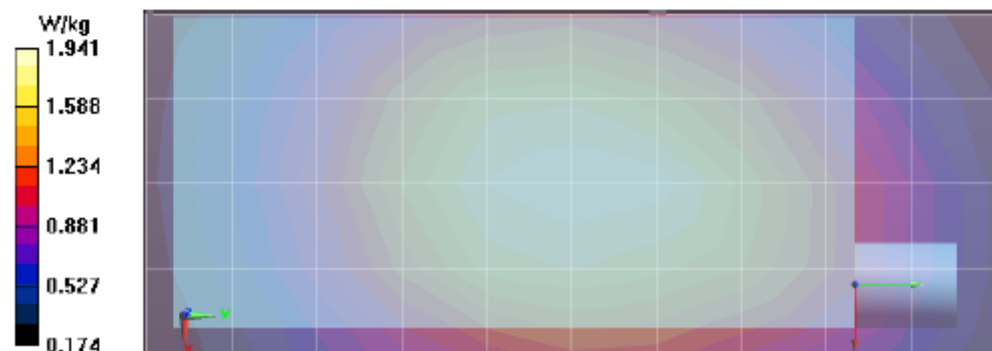
Peak SAR (extrapolated) = 2.562 mW/g

SAR(1 g) = 1.89 mW/g; SAR(10 g) = 1.39 mW/g (SAR corrected for target medium)

Maximum value of SAR (measured) = 1.96 W/kg

Below 2 GHz-Rev.1/Face Scan/4-Z-Axis Scan (1x1x17): Measurement grid: $dx=20\text{mm}$, $dy=20\text{mm}$, $dz=10\text{mm}$

Maximum value of SAR (measured) = 1.93 W/kg



APPENDIX E
DUT Scans - FCC Part 90 (806-824MHz & 851-869MHz)

Assessments at the Body with body worn PMLN5956A

Table 17

Motorola Solutions, Inc. EME Laboratory
Date/Time: 9/10/2013 12:43:09 PM

Robot#: DASY5-FL-3 | Run#: AvG-Ab-130910-02
Model#: PMUF1630A
Phantom#: OVAL1022
Tissue Temp: 20.3 (C)
Serial#: 806TPR1014
Antenna: PMAF4017A
Test Freq: 806.0000 (MHz)
Battery: HKNN4013A
Carry Acc: PMLN5956A
Audio Acc: PMLN5957A
Start Power: 2.33 (W)

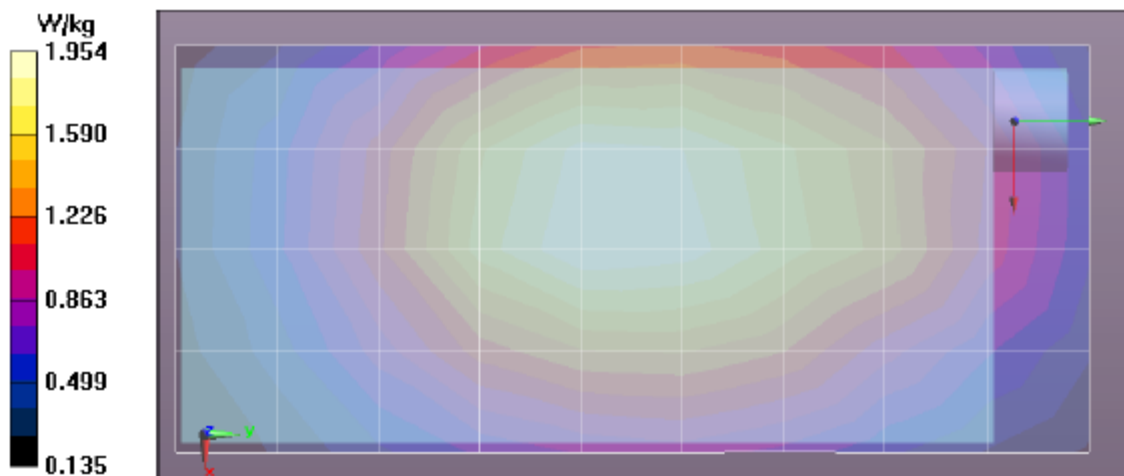
Comments:

Duty Cycle: 1:1.99986, Medium parameters used: $f = 806$ MHz; $\sigma = 0.97$ mho/m; $\epsilon_r = 54.1$; $\rho = 1000$ kg/m³
Probe: ES3DV3 - SN3147, , Frequency: 806 MHz, ConvF(5.99, 5.99, 5.99); Calibrated: 1/28/2013
Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/Ab Scan/1-Area Scan (41x91x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm
Reference Value = 41.820 V/m; Power Drift = -0.18 dB
Fast SAR: SAR(1 g) = 1.93 mW/g; SAR(10 g) = 1.34 mW/g (SAR corrected for target medium)
Maximum value of SAR (interpolated) = 2.04 W/kg

Below 2 GHz-Rev.1/Ab Scan/3-Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=7.5mm, dy=7.5mm, dz=5mm
Reference Value = 41.820 V/m; Power Drift = -0.34 dB
Peak SAR (extrapolated) = 2.459 mW/g
SAR(1 g) = 1.9 mW/g; SAR(10 g) = 1.41 mW/g (SAR corrected for target medium)
Maximum value of SAR (measured) = 2.02 W/kg

Below 2 GHz-Rev.1/Ab Scan/4-Z-Axis Scan (1x1x17): Measurement grid: dx=20mm, dy=20mm, dz=10mm
Maximum value of SAR (measured) = 1.97 W/kg



Assessment at the Body with other audio accessories

Assessment per “KDB 643646 D01 Body SAR Test Consideration for Audio Accessories without Built-in Antenna; Sec 1, A. when overall < 4.0 W/kg, SAR tested for that audio accessory is not necessary.” This was applicable to all remaining accessories.

Assessment of wireless BT configuration

Table 18

Motorola Solutions, Inc. EME Laboratory
Date/Time: 9/13/2013 2:11:25 PM

Robot#: DASY5-FL-3 | Run#: HvH-Ab-130913-02
Model#: PMUF1630A
Phantom#: OVAL1022
Tissue Temp: 21.4 (C)
Serial#: 806TPR1014
Antenna: PMAF4017A
Test Freq: 806.0000 (MHz)
Battery: HKNN4013A
Carry Acc: PMLN5956A
Audio Acc: None(BT)
Start Power: 2.36 (W)

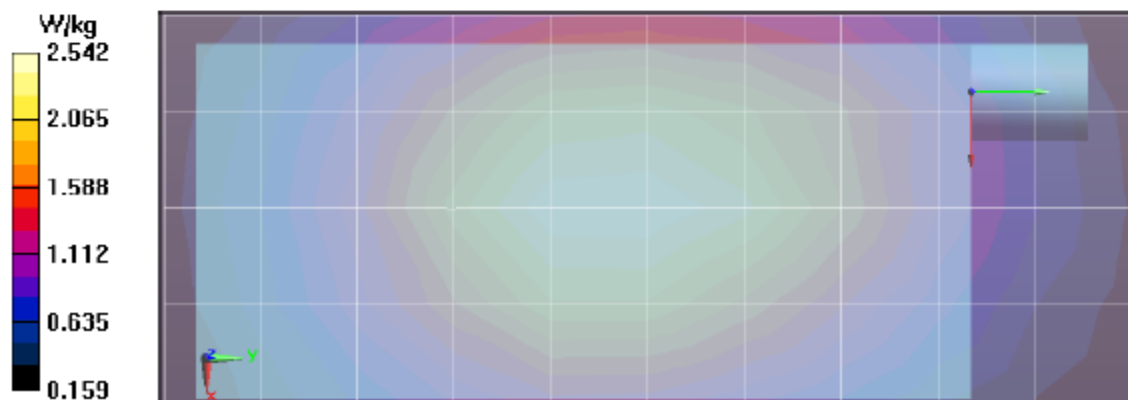
Comments:

Duty Cycle: 1:1.99986, Medium parameters used: $f = 806$ MHz; $\sigma = 0.97$ mho/m; $\epsilon_r = 54.6$; $\rho = 1000$ kg/m³
Probe: ES3DV3 - SN3147, , Frequency: 806 MHz, ConvF(5.99, 5.99, 5.99); Calibrated: 1/28/2013
Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/Ab Scan/1-Area Scan (41x101x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm
Reference Value = 43.867 V/m; Power Drift = -0.26 dB
Fast SAR: SAR(1 g) = 2.44 mW/g; SAR(10 g) = 1.7 mW/g (SAR corrected for target medium)
Maximum value of SAR (interpolated) = 2.59 W/kg

Below 2 GHz-Rev.1/Ab Scan/3-Zoom Scan (21x26x36)/Cube 0: Interpolated grid: dx=1.500 mm, dy=1.500 mm, dz=1.000 mm
Reference Value = 43.867 V/m; Power Drift = -0.40 dB
Peak SAR (extrapolated) = **Not Specified** mW/g
Fast SAR: SAR(1 g) = 2.4 mW/g; SAR(10 g) = 1.69 mW/g (SAR corrected for target medium)
Maximum value of SAR (interpolated) = 3.13 W/kg

Below 2 GHz-Rev.1/Ab Scan/4-Z-Axis Scan (1x1x17): Measurement grid: dx=20mm, dy=20mm, dz=10mm
Maximum value of SAR (measured) = 2.49 W/kg



Assessments at the Body with body worn PMLN5956A

Table 20

Motorola Solutions, Inc. EME Laboratory

Date/Time: 9/10/2013 2:33:52 PM

Robot#: DASY5-FL-3 | Run#: AvG-Ab-130910-03
 Model#: PMUF1630A
 Phantom#: OVAL1022
 Tissue Temp: 20.3 (C)
 Serial#: 806TPR1014
 Antenna: PMAF4017A
 Test Freq: 869.0000 (MHz)
 Battery: HKNN4013A
 Carry Acc: PMLN5956A
 Audio Acc: PMLN5957A
 Start Power: 2.30(W)

Comments:

Duty Cycle: 1:1.99986, Medium parameters used: $f = 869$ MHz; $\sigma = 1.01$ mho/m; $\epsilon_r = 53.1$; $\rho = 1000$ kg/m³
 Probe: ES3DV3 - SN3147, , Frequency: 869 MHz, ConvF(5.99, 5.99, 5.99); Calibrated: 1/28/2013
 Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/Ab Scan/1-Area Scan (41x91x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Reference Value = 35.284 V/m; Power Drift = -0.26 dB

Fast SAR: SAR(1 g) = 1.5 mW/g; SAR(10 g) = 1.04 mW/g (SAR corrected for target medium)

Maximum value of SAR (interpolated) = 1.59 W/kg

Below 2 GHz-Rev.1/Ab Scan/1-Area Scan (5x10x1): Measurement grid: dx=15mm, dy=15mm

Maximum value of SAR (measured) = 1.51 W/kg

Below 2 GHz-Rev.1/Ab Scan/3-Zoom Scan (5x6x7)/Cube 0: Measurement grid: dx=7.5mm, dy=7.5mm, dz=5mm

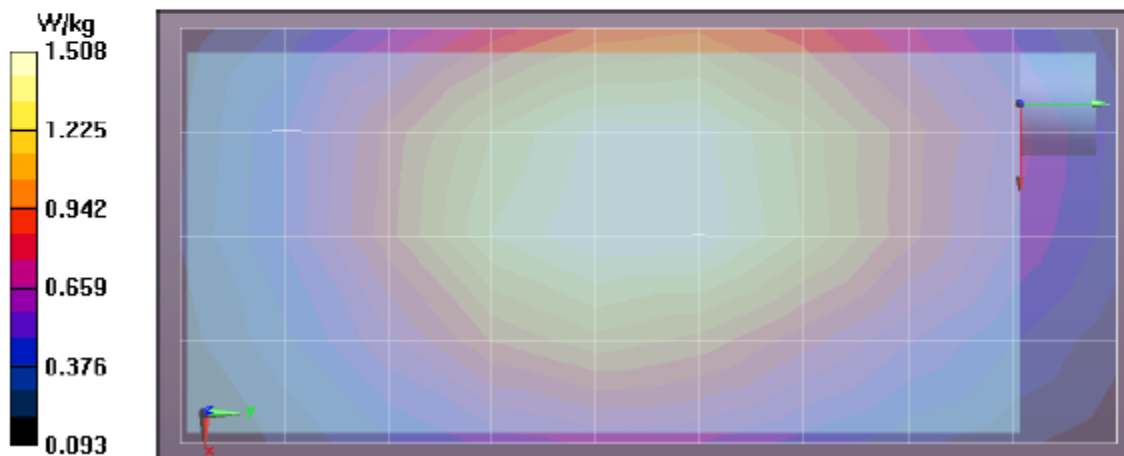
Reference Value = 35.284 V/m; Power Drift = -0.39 dB

Peak SAR (extrapolated) = 1.869 mW/g

SAR(1 g) = 1.44 mW/g; SAR(10 g) = 1.06 mW/g (SAR corrected for target medium)

Below 2 GHz-Rev.1/Ab Scan/4-Z-Axis Scan (1x1x17): Measurement grid: dx=20mm, dy=20mm, dz=10mm

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



Assessment at the Body with other audio accessories

Assessment per “KDB 643646 D01 Body SAR Test Consideration for Audio Accessories without Built-in Antenna; Sec 1, A. when overall < 4.0 W/kg, SAR tested for that audio accessory is not necessary.” This was applicable to all remaining accessories.

Assessment of wireless BT configuration

Table 21

Motorola Solutions, Inc. EME Laboratory
Date/Time: 9/13/2013 2:45:04 PM

Robot#: DASY5-FL-3 | Run#: HvH-Ab-130913-03
Model#: PMUF1630A
Phantom#: OVAL1022
Tissue Temp: 21.4 (C)
Serial#: 806TPR1014
Antenna: PMAF4017A
Test Freq: 869.0000 (MHz)
Battery: HKNN4013A
Carry Acc: PMLN5956A
Audio Acc: None(BT)
Start Power: 2.40 (W)

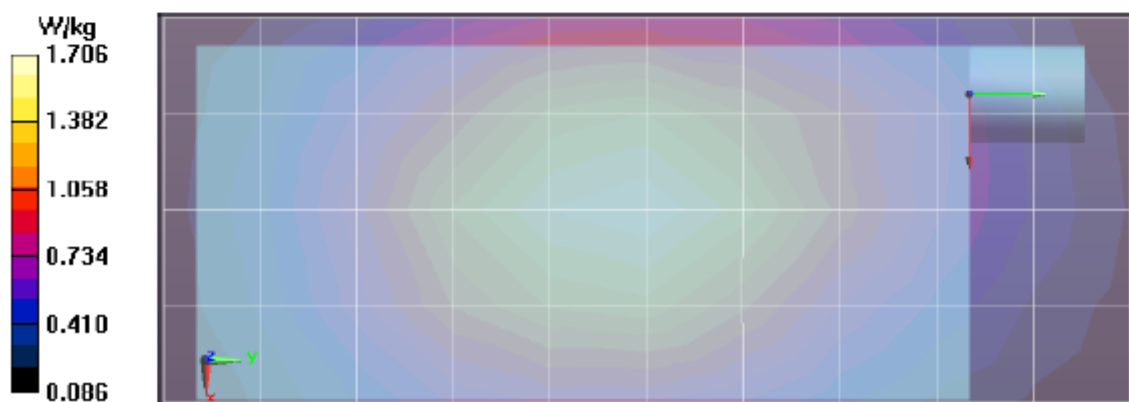
Comments:

Duty Cycle: 1:1.99986, Medium parameters used: $f = 869$ MHz; $\sigma = 0.99$ mho/m; $\epsilon_r = 53.6$; $\rho = 1000$ kg/m³
Probe: ES3DV3 - SN3147, , Frequency: 869 MHz, ConvF(5.99, 5.99, 5.99); Calibrated: 1/28/2013
Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/Ab Scan/1-Area Scan (41x101x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm
Reference Value = 34.188 V/m; Power Drift = -0.33 dB
Fast SAR: SAR(1 g) = 1.63 mW/g; SAR(10 g) = 1.12 mW/g (SAR corrected for target medium)
Maximum value of SAR (interpolated) = 1.72 W/kg

Below 2 GHz-Rev.1/Ab Scan/3-Zoom Scan (21x21x36)/Cube 0: Interpolated grid: dx=1.500 mm, dy=1.500 mm, dz=1.000 mm
Reference Value = 34.188 V/m; Power Drift = -0.43 dB
Peak SAR (extrapolated) = **Not Specified** mW/g
Fast SAR: SAR(1 g) = 1.58 mW/g; SAR(10 g) = 1.1 mW/g (SAR corrected for target medium)
Maximum value of SAR (interpolated) = 2.17 W/kg

Below 2 GHz-Rev.1/Ab Scan/4-Z-Axis Scan (1x1x17): Measurement grid: dx=20mm, dy=20mm, dz=10mm
Maximum value of SAR (measured) = 1.55 W/kg



Assessments at the Face

Table 23

Motorola Solutions, Inc. EME Laboratory

Date/Time: 9/11/2013 10:43:46 AM

Robot#: DASY5-FL-3 | Run#: HvH-Face-130911-02
 Model#: PMUF1630A
 Phantom#: OVAL1019
 Tissue Temp: 20.6 (C)
 Serial#: 806TPR1014
 Antenna: PMAF4017A
 Test Freq: 806.0000 (MHz)
 Battery: HKNN4013A
 Carry Acc: None
 Audio Acc: None
 Start Power: 2.35 (W)

Comments: @ front.

Duty Cycle: 1:1.99986, Medium parameters used: $f = 806$ MHz; $\sigma = 0.89$ mho/m; $\epsilon_r = 42.6$; $\rho = 1000$ kg/m³
 Probe: ES3DV3 - SN3147, , Frequency: 806 MHz, ConvF(6.14, 6.14, 6.14); Calibrated: 1/28/2013
 Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/Face Scan/1-Area Scan (41x101x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Reference Value = 42.111 V/m; Power Drift = -0.20 dB

Fast SAR: SAR(1 g) = 1.87 mW/g; SAR(10 g) = 1.31 mW/g (SAR corrected for target medium)

Maximum value of SAR (interpolated) = 1.94 W/kg

Below 2 GHz-Rev.1/Face Scan/3-Zoom Scan (5x5x7)/Cube 0: Measurement grid: dx=7.5mm, dy=7.5mm, dz=5mm

Reference Value = 42.111 V/m; Power Drift = -0.32 dB

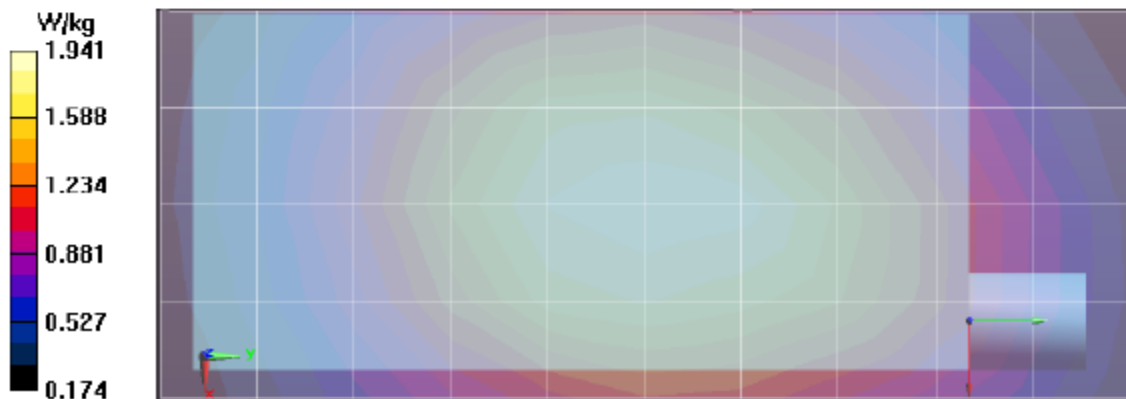
Peak SAR (extrapolated) = 2.562 mW/g

SAR(1 g) = 1.89 mW/g; SAR(10 g) = 1.39 mW/g (SAR corrected for target medium)

Maximum value of SAR (measured) = 1.96 W/kg

Below 2 GHz-Rev.1/Face Scan/4-Z-Axis Scan (1x1x17): Measurement grid: dx=20mm, dy=20mm, dz=10mm

Maximum value of SAR (measured) = 1.93 W/kg



Assessments at the Face

Table 25

Motorola Solutions, Inc. EME Laboratory
Date/Time: 9/11/2013 12:03:52 PM

Robot#: DASY5-FL-3 | Run#: HvH-Face-130911-03
Model#: PMUF1630A
Phantom#: OVAL1019
Tissue Temp: 20.5 (C)
Serial#: 806TPR1014
Antenna: PMAF4017A
Test Freq: 869.0000 (MHz)
Battery: HKNN4013A
Carry Acc: None
Audio Acc: None
Start Power: 2.38 (W)

Comments: @ front.

Duty Cycle: 1:1.99986, Medium parameters used: $f = 869$ MHz; $\sigma = 0.94$ mho/m; $\epsilon_r = 41.5$; $\rho = 1000$ kg/m³
Probe: ES3DV3 - SN3147, , Frequency: 869 MHz, ConvF(6.14, 6.14, 6.14); Calibrated: 1/28/2013
Electronics: DAE4 Sn1231, Calibrated: 3/12/2013

Below 2 GHz-Rev.1/Face Scan/1-Area Scan (41x101x1): Interpolated grid: dx=1.500 mm, dy=1.500 mm

Reference Value = 32.710 V/m; Power Drift = -0.22 dB

Fast SAR: SAR(1 g) = 1.21 mW/g; SAR(10 g) = 0.849 mW/g (SAR corrected for target medium)

Maximum value of SAR (interpolated) = 1.29 W/kg

Below 2 GHz-Rev.1/Face Scan/3-Zoom Scan (6x6x7)/Cube 0: Measurement grid: dx=7.5mm, dy=7.5mm, dz=5mm

Reference Value = 32.710 V/m; Power Drift = -0.35 dB

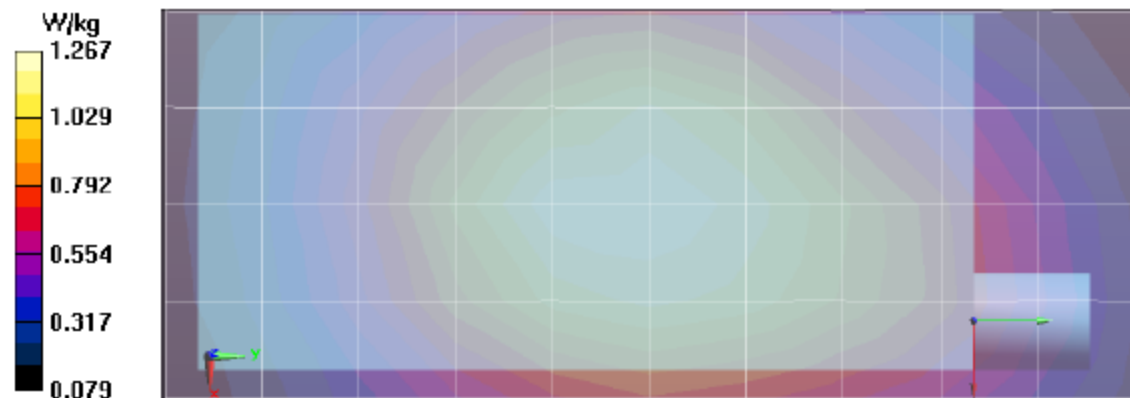
Peak SAR (extrapolated) = 1.605 mW/g

SAR(1 g) = 1.19 mW/g; SAR(10 g) = 0.874 mW/g (SAR corrected for target medium)

Maximum value of SAR (measured) = 1.26 W/kg

Below 2 GHz-Rev.1/Face Scan/4-Z-Axis Scan (1x1x17): Measurement grid: dx=20mm, dy=20mm, dz=10mm

Maximum value of SAR (measured) = 1.18 W/kg



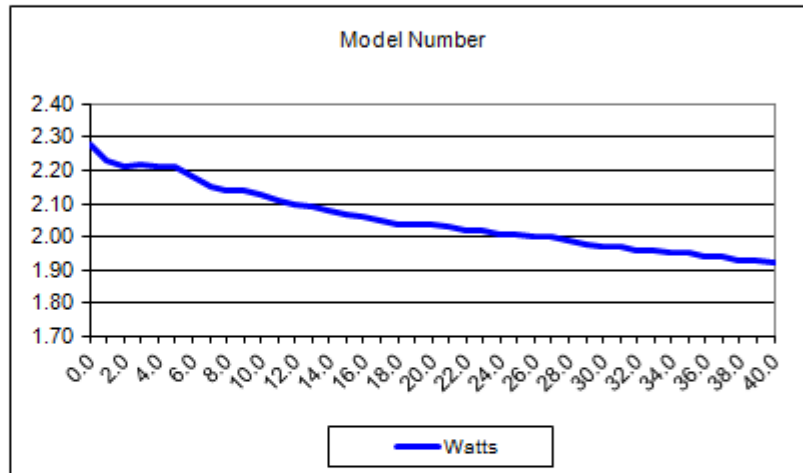
APPENDIX F
DUT Supplementary Data (Power slump)
Model # PMUF1630A
Serial # 806TPR1014

Battery # HKNN4013A
Frequency 806 MHz
Date 9/17/2013

Transmit Mode TDMA 2:1
Audio Accessory None

TX TIME **Measured Power**
 (minutes) Watts

0.0	2.28
1.0	2.23
2.0	2.21
3.0	2.22
4.0	2.21
5.0	2.21
6.0	2.18
7.0	2.15
8.0	2.14
9.0	2.14
10.0	2.13
11.0	2.11
12.0	2.10
13.0	2.09
14.0	2.08
15.0	2.07
16.0	2.06
17.0	2.05
18.0	2.04
19.0	2.04
20.0	2.04
21.0	2.03
22.0	2.02
23.0	2.02
24.0	2.01
25.0	2.01
26.0	2.00
27.0	2.00
28.0	1.99
29.0	1.98
30.0	1.97
31.0	1.97
32.0	1.96
33.0	1.96
34.0	1.95
35.0	1.95
36.0	1.94
37.0	1.94
38.0	1.93
39.0	1.93
40.0	1.92



APPENDIX G

DUT Test Position Photos

Photos available in Exhibit 7B

APPENDIX H
DUT, Body worn and audio accessories Photos

Photos available in Exhibit 7B