Band	BW (MHz)	Mod.	RB Size	RB offset	Test Position	Ch.	Result 1g (W/Kg)	Power Drift(%)	Max. Turn-up Power(dBm)	Meas. Output Power(dBm)	Scaled SAR (W/Kg)	Meas. No.
LTE Band 2	20M	QPSK	1	0	Right Cheek	19100	0.132	1.33	24	23.45	**0.150**	11
			50	0	Right Cheek	19100	0.102	0.04	23	22.76	0.108	/
			1	0	Right Tilt	19100	0.083	3.70	24	23.45	0.094	/
			50	0	Right Tilt	19100	0.065	-3.47	23	22.76	0.069	/
			1	0	Left Cheek	19100	0.092	0.70	24	23.45	0.104	/
			50	0	Left Cheek	19100	0.070	-2.25	23	22.76	0.074	/
			1	0	Left Tilt	19100	0.048	-2.40	24	23.45	0.054	/
			50	0	Left Tilt	19100	0.033	-2.63	23	22.76	0.035	/
LTE Band 4	20M	QPSK	1	0	Right Cheek	20300	0.052	1.61	24	23.09	**0.064**	13
			50	0	Right Cheek	20300	0.037	-2.03	23	22.36	0.043	/
			1	0	Right Tilt	20300	0.025	0.91	24	23.09	0.031	/
			50	0	Right Tilt	20300	0.017	-2.71	23	22.36	0.020	/
			1	0	Left Cheek	20300	0.045	-2.50	24	23.09	0.055	/
			50	0	Left Cheek	20300	0.029	0.78	23	22.36	0.034	/
			1	0	Left Tilt	20300	0.023	-3.31	24	23.09	0.028	/
			50	0	Left Tilt	20300	0.016	-1.08	23	22.36	0.019	/
LTE Band 5	10M	QPSK	1	0	Right Cheek	20600	0.062	3.00	24	23.51	**0.069**	15
			25	0	Right Cheek	20600	0.045	1.32	23	22.80	0.047	/
			1	0	Right Tilt	20600	0.034	1.20	24	23.51	0.038	/
			25	0	Right Tilt	20600	0.026	-2.05	23	22.80	0.027	/
			1	0	Left Cheek	20600	0.055	1.70	24	23.51	0.062	/
			25	0	Left Cheek	20600	0.042	-0.27	23	22.80	0.044	/
			1	0	Left Tilt	20600	0.028	-1.97	24	23.51	0.031	/
			25	0	Left Tilt	20600	0.015	3.36	23	22.80	0.016	/
LTE Band 7	20M	QPSK	1	0	Right Cheek	20850	0.122	-3.88	21	20.78	**0.128**	17
			50	0	Right Cheek	20850	0.096	3.14	21	20.04	0.120	/
			1	0	Right Tilt	20850	0.073	0.19	21	20.78	0.077	/
			50	0	Right Tilt	20850	0.051	2.85	21	20.04	0.064	/
			1	0	Left Cheek	20850	0.106	0.96	21	20.78	0.112	/
			50	0	Left Cheek	20850	0.078	-1.07	21	20.04	0.097	/
			1	0	Left Tilt	20850	0.049	-1.06	21	20.78	0.052	/
			50	0	Left Tilt	20850	0.032	3.17	21	20.04	0.040	/

12.2 Body-worn and Hotspot SAR

Band	Mode	Test Position	Ch.	Result 1g (W/Kg)	Power Drift(%)	Max.Turn-up Power(dBm)	Meas.Output Power(dBm)	Scaled SAR (W/Kg)	Meas. No.
GSM 850	EGPRS Data-4 Slot	Front side	251	0.164	-1.62	30	29.96	0.166	/
		Back side	251	0.193	2.52	30	29.96	**0.195**	2
		Left Edge	251	0.076	0.71	30	29.96	0.077	/
		Right Edge	251	0.113	2.61	30	29.96	0.114	/
		Bottom Edge	251	0.151	0.35	30	29.96	0.152	/
GSM1900	EGPRS Data-4 Slot	Front side	661	0.244	-3.07	28	27.22	0.292	/
		Back side	661	0.296	1.20	28	27.22	**0.354**	4
		Left Edge	661	0.112	-2.13	28	27.22	0.134	/
		Right Edge	661	0.158	0.26	28	27.22	0.189	/
		Bottom Edge	661	0.263	-1.73	28	27.22	0.315	/
WCDMA II	RMC	Front side	9262	0.485	1.26	23	22.71	0.518	/
		Back side	9262	0.539	-0.78	23	22.71	**0.576**	6
		Left Edge	9262	0.247	-0.02	23	22.71	0.264	/
		Right Edge	9262	0.322	1.77	23	22.71	0.344	/
		Bottom Edge	9262	0.387	-0.56	23	22.71	0.414	/
WCDMA V	RMC	Front side	4233	0.063	-2.46	22	21.24	0.075	/
		Back side	4233	0.082	1.31	22	21.24	**0.098**	8
		Left Edge	4233	0.026	-2.52	22	21.24	0.031	/
		Right Edge	4233	0.041	-3.45	22	21.24	0.049	/
		Bottom Edge	4233	0.049	-2.37	22	21.24	0.058	/

Band	Mode	Test Position	Ch.	Result 1g (W/Kg)	Power Drift(%)	Max.Turn-up Power(dBm)	Meas.Output Power(dBm)	Duty cycle(%)	Scaled SAR (W/Kg)	Meas. No.
WLAN	802.11b	Front side	1	0.016	1.51	14	13.12	100	0.020	/
		Back side	1	0.049	-1.64	14	13.12	100	**0.060**	10
		Left side	1	0.011	0.77	14	13.12	100	0.013	/
		Top side	1	0.008	-2.70	14	13.12	100	0.010	/

Note:

1. The test separation of all above table is 10mm.
2. Per KDB 447498 D01, the reported SAR is the measured SAR value adjusted for maximum tune-up tolerance.
   a. Tune-up scaling Factor = tune-up limit power (mW) / EUT RF power (mW), where tune-up limit is the maximum rated power among all production units.
   b. For WWAN: Scaled SAR(W/kg)= Measured SAR(W/kg)*Tune-up Scaling Factor
3. Per KDB 248227- When the highest reported SAR for DSSS is adjusted by the ratio of OFDM to DSSS specified maximum output power and the adjusted SAR is ≤1.2 W/kg. (The highest reported SAR for DSSS is adjusted by the ratio of OFDM to DSSS specified maximum output power was 0.032 W/Kg for Body)
4. When the user enables the personal Wireless router functions for the handsets, actual operations include simultaneous transmission of both the Wi-Fi transmitting frequency and thus cannot be evaluated for SAR under actual use conditions. The “Portable Hotspot” feature on the handset was NOT activated, to ensure the SAR measurements were evaluated for a single transmission frequency RF signal.

Band	BW (MHz)	Mod.	RB Size	RB offset	Test Position	Ch.	Result 1g (W/Kg)	Power Drift(%)	Max. Turn-up Power(dBm)	Meas. Output Power(dBm)	Scaled SAR (W/Kg)	Meas. No.
LTE Band 2	20M	QPSK	1	0	Front side	19100	0.192	1.74	24	23.45	0.218	/
			50	0	Front side	19100	0.135	-2.66	23	22.76	0.143	/
			1	0	Back Side	19100	0.507	-3.28	24	23.45	**0.575**	12
			50	0	Back Side	19100	0.412	-1.05	23	22.76	0.435	/
			1	0	Left Side	19100	0.136	-3.34	24	23.45	0.154	/
			50	0	Left Side	19100	0.083	-1.08	23	22.76	0.088	/
			1	0	Right Side	19100	0.198	2.87	24	23.45	0.225	/
			50	0	Right Side	19100	0.141	2.66	23	22.76	0.149	/
			1	0	Bottom Side	19100	0.385	-3.39	24	23.45	0.437	/
			50	0	Bottom Side	19100	0.297	1.54	23	22.76	0.314	/
LTE Band 4	20M	QPSK	1	0	Front side	20300	0.168	0.73	24	23.09	0.207	/
			50	0	Front side	20300	0.115	-2.58	23	22.36	0.133	/
			1	0	Back Side	20300	0.352	-3.87	24	23.09	**0.434**	14
			50	0	Back Side	20300	0.287	-2.36	23	22.36	0.333	/
			1	0	Left Side	20300	0.139	-1.66	24	23.09	0.171	/
			50	0	Left Side	20300	0.072	1.88	23	22.36	0.083	/
			1	0	Right Side	20300	0.197	1.72	24	23.09	0.243	/
			50	0	Right Side	20300	0.114	-3.41	23	22.36	0.132	/
			1	0	Bottom Side	20300	0.163	-1.39	24	23.09	0.201	/
			50	0	Bottom Side	20300	0.115	-3.22	23	22.36	0.133	/
LTE Band 5	10M	QPSK	1	0	Front side	20600	0.043	-2.41	24	23.51	0.048	/
			25	0	Front side	20600	0.025	3.76	23	22.80	0.026	/
			1	0	Back Side	20600	0.069	-3.11	24	23.51	**0.077**	16
			25	0	Back Side	20600	0.040	-2.87	23	22.80	0.042	/
			1	0	Left Side	20600	0.011	-0.96	24	23.51	0.012	/
			25	0	Left Side	20600	0.006	1.36	23	22.80	0.006	/
			1	0	Right Side	20600	0.025	3.18	24	23.51	0.028	/
			25	0	Right Side	20600	0.017	-1.67	23	22.80	0.018	/
			1	0	Bottom Side	20600	0.051	0.90	24	23.51	0.057	/
			25	0	Bottom Side	20600	0.034	2.43	23	22.80	0.036	/
LTE Band 7	20M	QPSK	1	0	Front side	20850	0.412	-2.63	21	20.78	0.433	/
			50	0	Front side	20850	0.343	3.55	21	20.04	0.428	/
			1	0	Back Side	20850	0.540	2.54	21	20.78	**0.568**	18
			50	0	Back Side	20850	0.428	-1.61	21	20.04	0.534	/
			1	0	Left Side	20850	0.145	-3.52	21	20.78	0.153	/
			50	0	Left Side	20850	0.083	-3.91	21	20.04	0.104	/
			1	0	Right Side	20850	0.241	0.95	21	20.78	0.254	/
			50	0	Right Side	20850	0.186	1.33	21	20.04	0.232	/
			1	0	Bottom Side	20850	0.311	1.62	21	20.78	0.327	/
			50	0	Bottom Side	20850	0.223	3.23	21	20.04	0.278	/

Simultaneous Multi-band Transmission Evaluation:

Application Simultaneous Transmission information:

Position	Simultaneous State
Head	1. GSM + 2.4GHz WLAN
	2. GSM + Bluetooth
	3. WCDMA + 2.4GHz WLAN
	4. WCDMA + Bluetooth
	5. LTE + 2.4GHz WLAN
	6. LTE + Bluetooth
Body	1. GSM + 2.4GHz WLAN
	2. GSM + Bluetooth
	3. WCDMA + 2.4GHz WLAN
	4. WCDMA + Bluetooth
	5. LTE + 2.4GHz WLAN
	6. LTE + Bluetooth

NOTE:

1. Bluetooth and WLAN can't simultaneous transmission at the same time.
2. For simultaneous transmission at head and body exposure position, 2 transmitters simultaneous transmission was the worst state.
3. Based upon KDB 447498 D01, BT SAR is excluded as below table.
4. If the test separation distance is <5mm, 5mm is used for excluded SAR calculation.
5. For minimum test separation distance≦50mm,Bluetooth standalone SAR is excluded according to [(max. power of channel, including tune-up tolerance, mW)/ (min. test separation distance, mm)·[√f (GHz) /x] ≦3.0 for 1-g SAR and ≦7.5 for 10-g extremity SAR
6. The reported SAR summation is calculated based on the same configuration and test position.
7. KDB 447498 / 4.3.2 (2) when standalone SAR test exclusion applies to an antenna that transmits simultaneously with other antennas, the standalone SAR must be estimated according to following to determine simultaneous transmission SAR test exclusion:
   a) (max. power of channel, including tune-up tolerance, mW)/(min. test separation distance, mm)]·[√f (GHz) /x] W/kg for test separation distances≤ 50 mm;
   Where x = 7.5 for 1-g SAR, and x = 18.75 for 10-g SAR.
   b) 0.4W/Kg for 1-g SAR and 1.0W/Kg for 10-g SAR, when the separation distance is >50mm.

Estimated SAR		Maximum Power		Antenna to user(mm)	Frequency(GHz)	Stand Alone SAR(1g) [W/kg]
		dBm	mW			
BT	Head	1	1.259	5	2.480	0.053
	Body			10	2.480	0.026

Simultaneous Mode	Position	Mode	Max. 1-g SAR (W/kg)	1-g Sum SAR (W/kg)
GSM + 2.4GHz WLAN	Head	GSM	0.166	0.277
		2.4GHz WLAN	0.111	
	Body	GSM	0.354	0.414
		2.4GHz WLAN	0.060	
GSM + Bluetooth	Head	GSM	0.166	0.219
		Bluetooth	0.053	
	Body	GSM	0.354	0.380
		Bluetooth	0.026	
WCDMA + 2.4GHz WLAN	Head	WCDMA	0.187	0.298
		2.4GHz WLAN	0.111	
	Body	WCDMA	0.576	0.636
		2.4GHz WLAN	0.060	
WCDMA + Bluetooth	Head	WCDMA	0.187	0.240
		Bluetooth	0.053	
	Body	WCDMA	0.576	0.602
		Bluetooth	0.026	
LTE + 2.4GHz WLAN	Head	LTE	0.150	0.261
		2.4GHz WLAN	0.111	
	Body	LTE	0.575	0.635
		2.4GHz WLAN	0.060	
LTE + Bluetooth	Head	LTE	0.150	0.203
		Bluetooth	0.053	
	Body	LTE	0.575	0.601
		Bluetooth	0.026	

Simultaneous transmission SAR test exclusion is determined for each operating configuration and exposure condition according to the reported standalone SAR of each applicable simultaneous transmitting antenna.

When the sum of SAR 1g of all simultaneously transmitting antennas in an operating mode and exposure condition combination is within the SAR limit (SAR-1g 1.6 W/kg), the simultaneous transmission SAR is not required. When the sum of SAR 1g is greater than the SAR limit (SAR-1g 1.6 W/kg), SAR test exclusion is determined by the SPLSR.

13. Equipment List

Kind of Equipment	Manufacturer	Type No.	Serial No.	Last Calibration	Calibrated Until
835MHz Dipole	MVG	SID835	SN 30/14 DIP0G835-332	2017.08.15	2020.08.14
1800MHz Dipole	MVG	SID1800	SN 30/14 DIP1G800-329	2017.08.15	2020.08.14
1900MHz Dipole	MVG	SID1900	SN 30/14 DIP1G900-333	2017.08.15	2020.08.14
2450MHzDipole	MVG	SID2450	SN 30/14 DIP2G450-335	2017.08.15	2020.08.14
2600MHz Dipole	MVG	SID2600	SN 30/14 DIP2G600-336	2017.08.15	2020.08.14
E-Field Probe	MVG	SSE2	SN 41/18 EPGO334	2019.06.04	2020.06.03
Dielectric Probe Kit	MVG	SCLMP	SN 32/14 OCPG67	2019.11.25	2020.11.24
Antenna	MVG	ANTA3	SN 07/13 ZNTA52	N/A	N/A
Phantom1	MVG	SAM	SN 32/14 SAM115	N/A	N/A
Phantom2	MVG	SAM	SN 32/14 SAM116	N/A	N/A
Phone holder	MVG	N/A	SN 32/14 MSH97	N/A	N/A
Laptop holder	MVG	N/A	SN 32/14 LSH29	N/A	N/A
Attenuator	Agilent	99899	DC-18GHz	N/A	N/A
Directional coupler	Narda	4226-20	3305	N/A	N/A
Network Analyzer	Agilent	8753ES	US38432810	2019.10.11	2020.10.10
Multi Meter	Keithley	Multi Meter 2000	4050073	2019.10.11	2020.10.10
Signal Generator	Agilent	N5182A	MY50140530	2019.10.09	2020.10.08
Wireless Communication Test Set	Agilent	8960-E5515C	MY48360751	2019.10.09	2020.10.08
Wireless Communication Test Set	R&S	CMW500	117239	2019.10.09	2020.10.08
Power Amplifier	DESAY	ZHL-42W	9638	2019.10.09	2020.10.08
Power Meter	R&S	NRP	100510	2019.10.16	2020.10.15
Power Meter	Agilent	E4419B	QB43312265	2019.10.12	2020.10.11
Power Sensor	R&S	NRP-Z11	101919	2019.10.12	2020.10.11
Power Sensor	HP	E9300A	US39210170	2019.10.09	2020.10.08
Temperature hygrometer	SuWei	SW-108	N/A	2019.10.13	2020.10.12
Thermograph	Elitech	RC-4	S/N EF7176501537	2019.10.11	2020.10.10

Note:
Per KDB 865664 D01, Dipole SAR Validation Verification, STS LAB has adopted 3 years calibration intervals. On annual basis, every measurement dipole has been evaluated and is in compliance with the following criteria:
1. There is no physical damage on the dipole
2. System validation with specific dipole is within 10% of calibrated value
Return-loss in within 20% of calibrated measurement

Appendix A. System Validation Plots

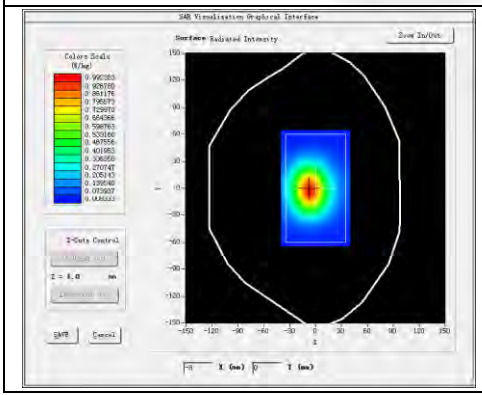
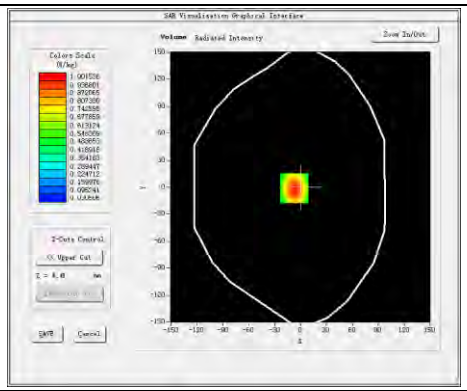
System Performance Check Data (835MHz Head)

Type: Phone measurement (Complete)

Area scan resolution: dx=8mm, dy=8mm
Zoom scan resolution: dx=8mm, dy=8mm, dz=5mm
Date of measurement: 2020-05-09

Experimental conditions

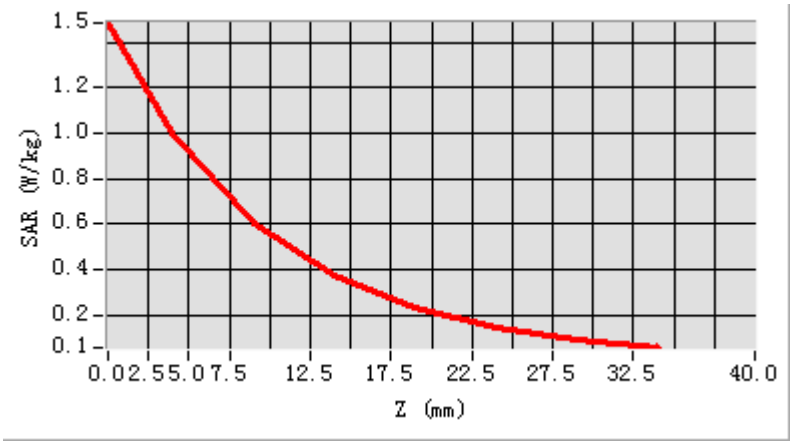
Phantom	Validation plane
Device Position	-
Band	835MHz
Channels	-
Signal	CW
Frequency (MHz)	835MHz
Relative permittivity	41.10
Conductivity (S/m)	0.89
Power drift (%)	1.27
Probe	SN 41/18 EPGO334
ConvF:	1.48
Crest factor:	1:1

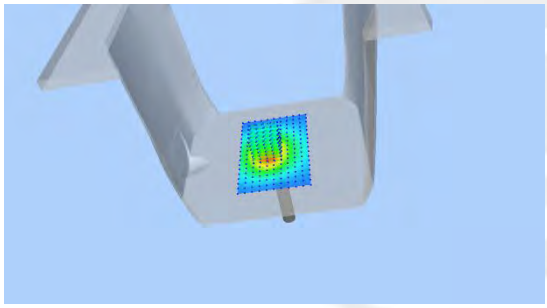
SURFACE SAR	VOLUME SAR
	

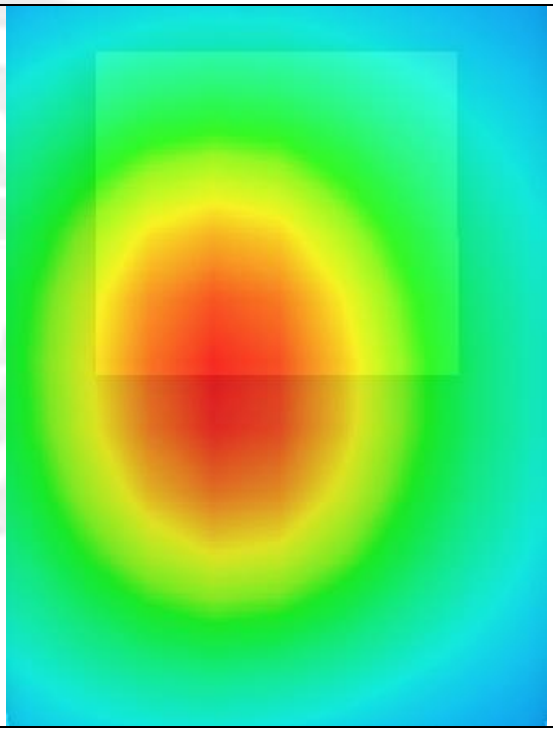
Maximum location: X=-7.00, Y=-1.00

SAR 10g (W/Kg)	0.646052
SAR 1g (W/Kg)	0.926959

Z Axis Scan


SAR (W/kg)
1.5
1.2
1.0
0.8
0.6
0.4
0.2
0.1
0.0 2.5 5.0 7.5 12.5 17.5 22.5 27.5 32.5 40.0
Z (mm)



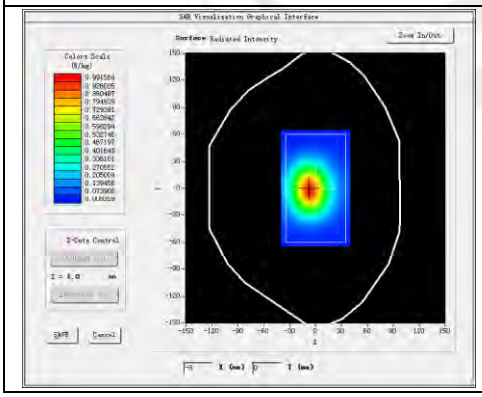
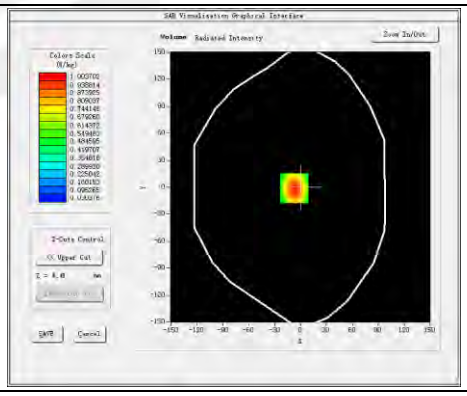


System Performance Check Data (835MHz Body)

Type: Phone measurement (Complete)
Area scan resolution: dx=8mm, dy=8mm
Zoom scan resolution: dx=8mm, dy=8mm, dz=5mm
Date of measurement: 2020-05-09

Experimental conditions.

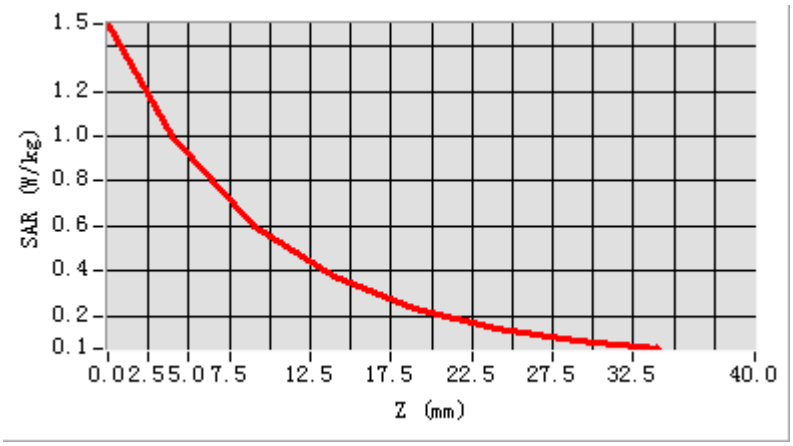
Probe	
Phantom	Validation plane
Device Position	-
Band	835MHz
Channels	-
Signal	CW
Frequency (MHz)	835MHz
Relative permittivity	54.66
Conductivity (S/m)	0.96
Power drift (%)	2.12
Probe	SN 41/18 EPGO334
ConvF:	1.53
Crest factor:	1:1

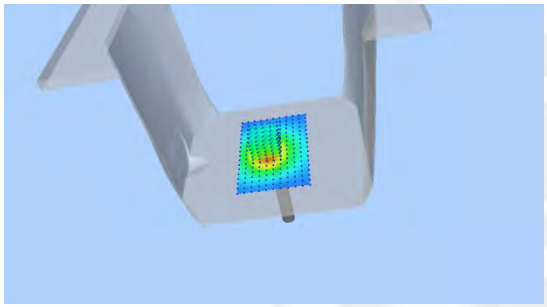
SURFACE SAR	VOLUME SAR
	

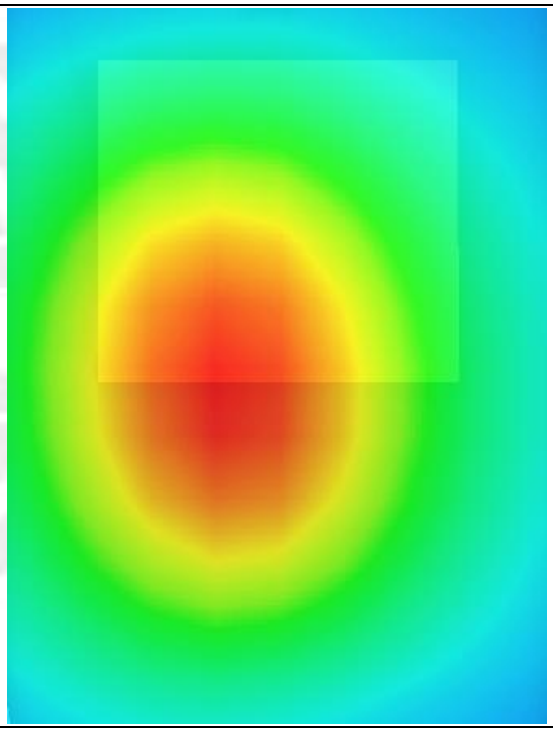
Maximum location: X=-7.00, Y=-1.00

SAR 10g (W/Kg)	0.650817
SAR 1g (W/Kg)	0.980499

Z Axis Scan


1.5
1.2
1.0
0.8
0.6
0.4
0.2
0.1
SAR (W/kg)
0.0 2.5 5.0 7.5 12.5 17.5 22.5 27.5 32.5 40.0
Z (mm)



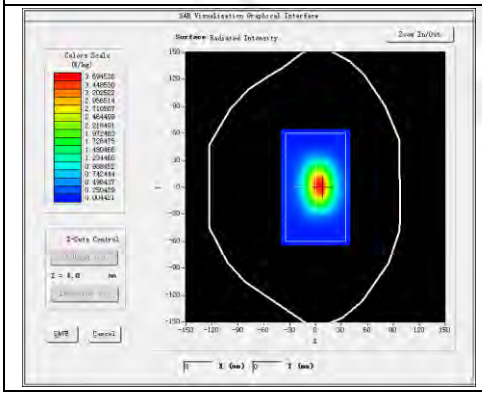
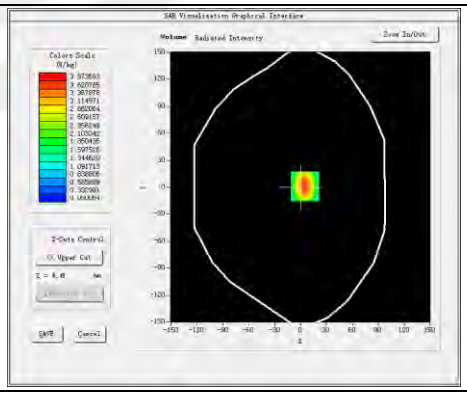


System Performance Check Data(1800MHz Head)

Type: Phone measurement (Complete)
Area scan resolution: dx=8mm, dy=8mm
Zoom scan resolution: dx=8mm, dy=8mm, dz=5mm
Date of measurement: 2020-05-11

Experimental conditions.

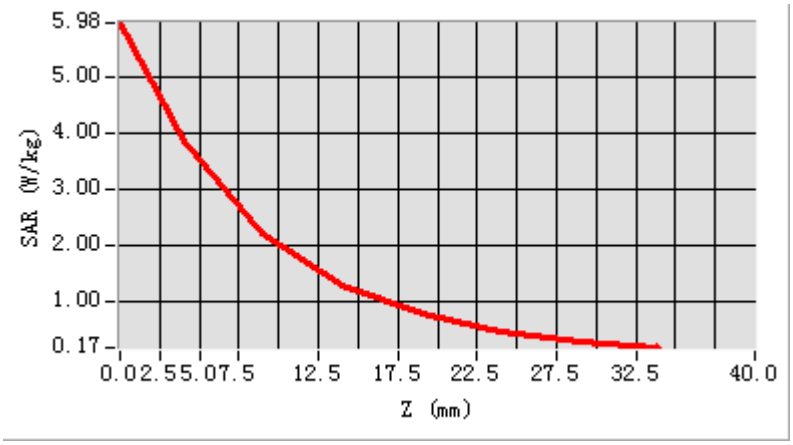
Phantom	Validation plane
Device Position	-
Band	1800MHz
Channels	-
Signal	CW
Frequency (MHz)	1800MHz
Relative permittivity	39.30
Conductivity (S/m)	1.42
Power drift (%)	0.78
Probe	SN 41/18 EPGO334
ConvF	1.60
Crest factor:	1:1

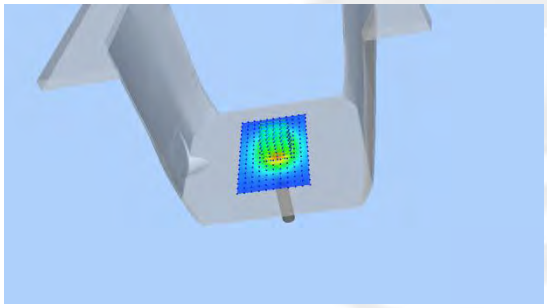
SURFACE SAR	VOLUME SAR
	

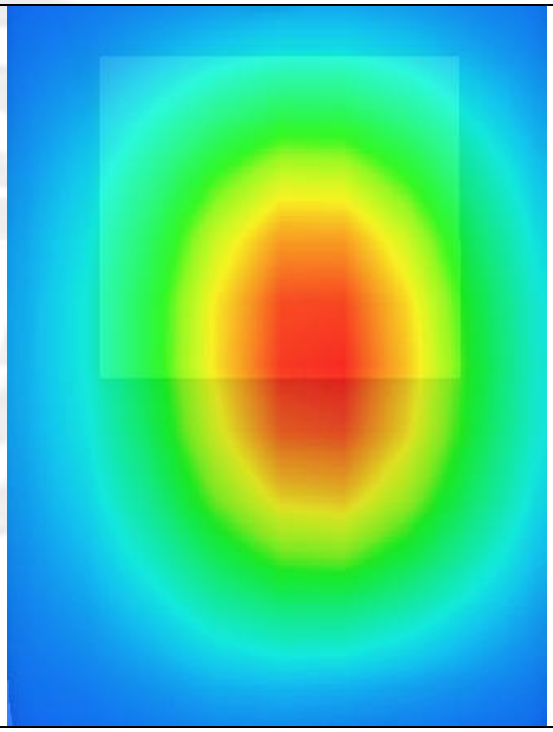
Maximum location: X=5.00, Y=1.00

SAR 10g (W/Kg)	2.015368
SAR 1g (W/Kg)	3.847084

Z Axis Scan


5.98
5.00
4.00
3.00
2.00
1.00
0.17
SAR (W/kg)
0.0 2.5 5.0 7.5 12.5 17.5 22.5 27.5 32.5 40.0
Z (mm)



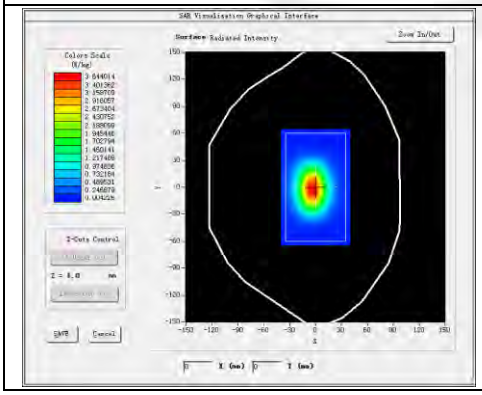
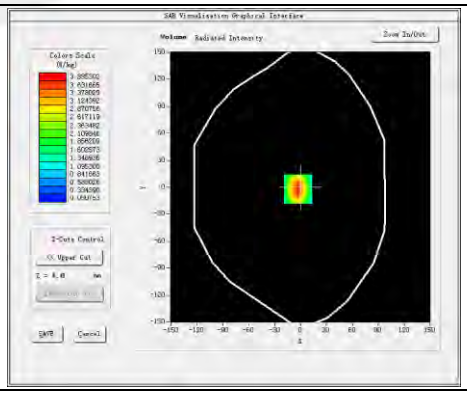


System Performance Check Data(1800MHz Body)

Type: Phone measurement (Complete)
Area scan resolution: dx=8mm, dy=8mm
Zoom scan resolution: dx=8mm, dy=8mm, dz=5mm
Date of measurement: 2020-05-11

Experimental conditions.

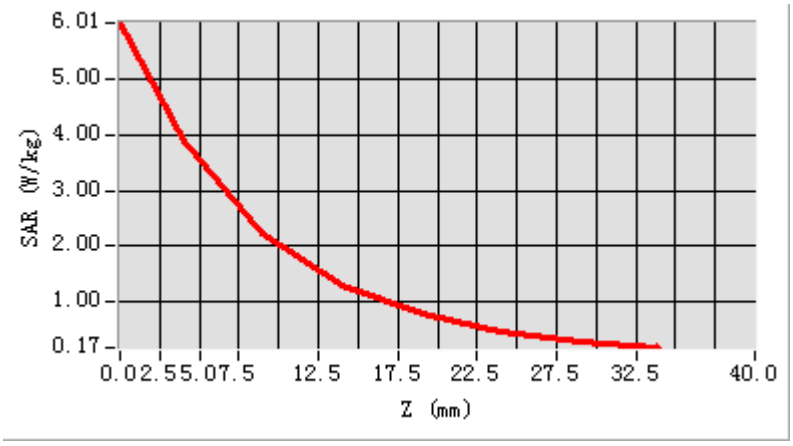
Phantom	Validation plane
Device Position	-
Band	1800MHz
Channels	-
Signal	CW
Frequency (MHz)	1800MHz
Relative permittivity	52.73
Conductivity (S/m)	1.58
Power drift (%)	-1.63
Probe	SN 41/18 EPGO334
ConvF	1.66
Crest factor:	1:1

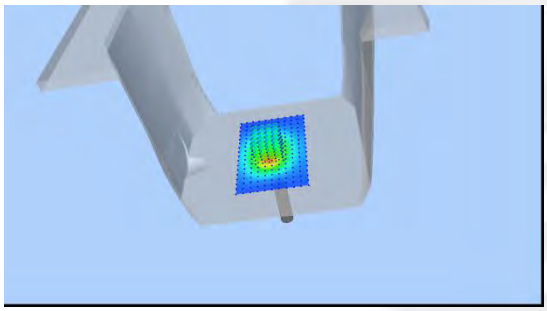
SURFACE SAR	VOLUME SAR
	

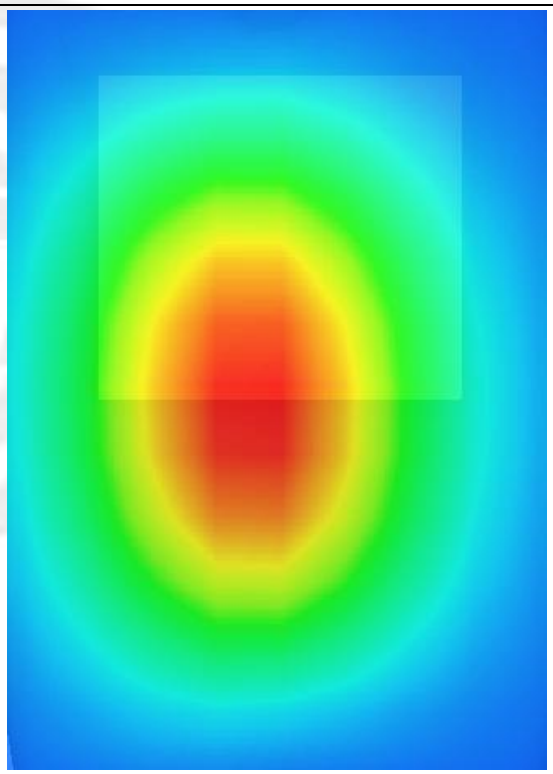
Maximum location: X=-3.00, Y=-2.00

SAR 10g (W/Kg)	1.950664
SAR 1g (W/Kg)	3.816258

Z Axis Scan


6.01
5.00
4.00
3.00
2.00
1.00
0.17
SAR (W/kg)
0.0 2.5 5.0 7.5 12.5 17.5 22.5 27.5 32.5 40.0
Z (mm)



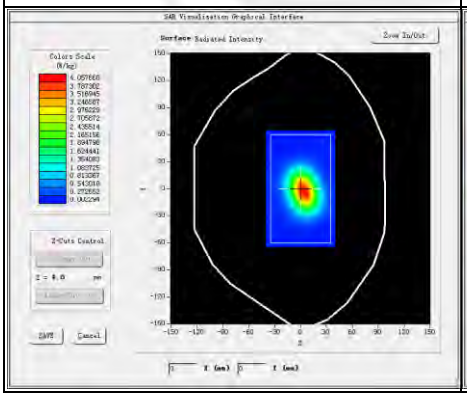
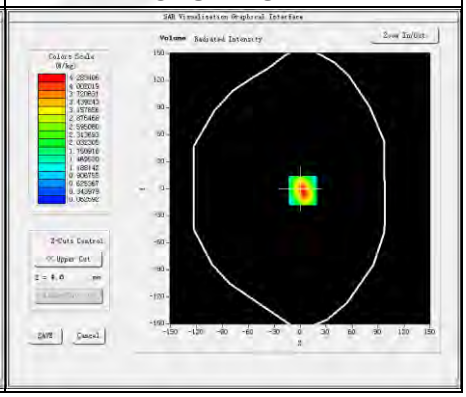


System Performance Check Data (1900MHz Head)

Type: Phone measurement (Complete)
Area scan resolution: dx=8mm, dy=8mm
Zoom scan resolution: dx=8mm, dy=8mm, dz=5mm
Date of measurement: 2020-05-13

Experimental conditions.

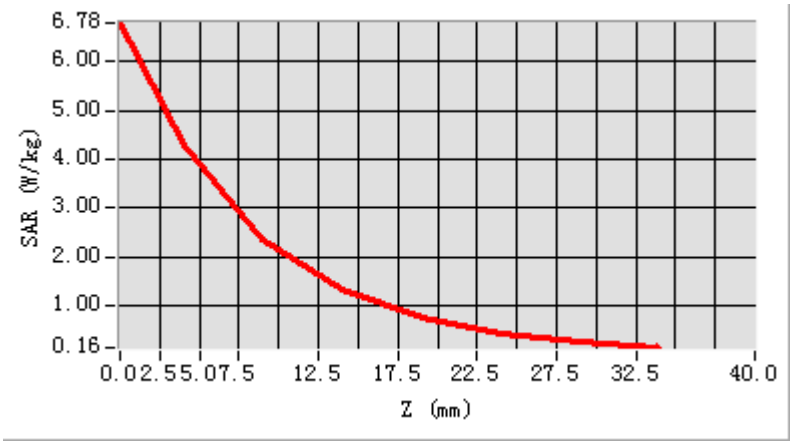
Phantom	Validation plane
Device Position	-
Band	1900MHz
Channels	-
Signal	CW
Frequency (MHz)	1900MHz
Relative permittivity	40.41
Conductivity (S/m)	1.46
Power drift (%)	3.14
Probe	SN 41/18 EPGO334
ConvF:	1.84
Crest factor:	1:1

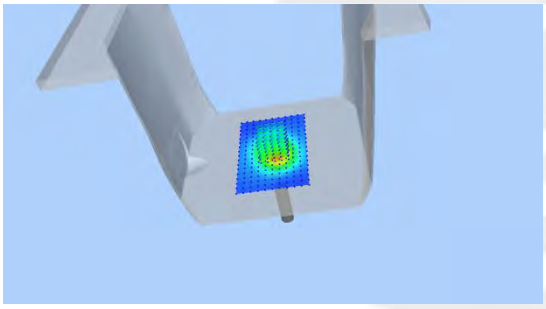
SURFACE SAR	VOLUME SAR
	

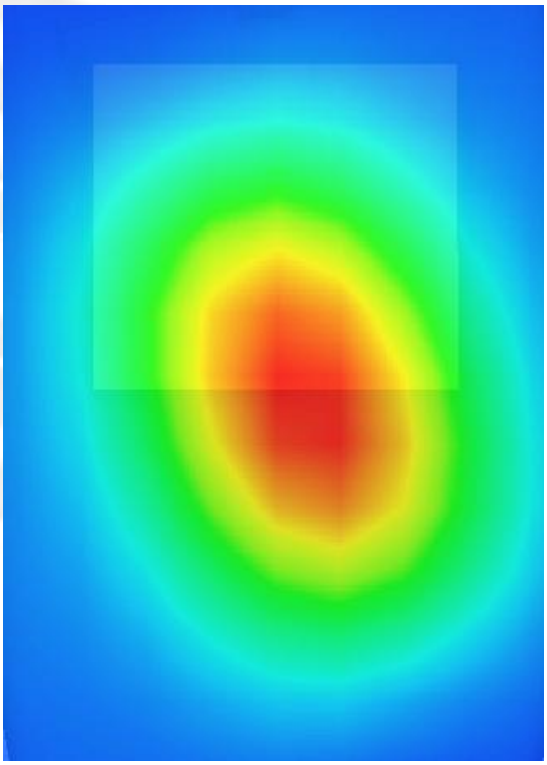
Maximum location: X=3.00, Y=-2.00

SAR 10g (W/Kg)	2.097781
SAR 1g (W/Kg)	4.015046

Z Axis Scan


6.78
6.00
5.00
4.00
3.00
2.00
1.00
0.16
SAR (W/kg)
0.0 2.5 5.0 7.5 12.5 17.5 22.5 27.5 32.5 40.0
Z (mm)



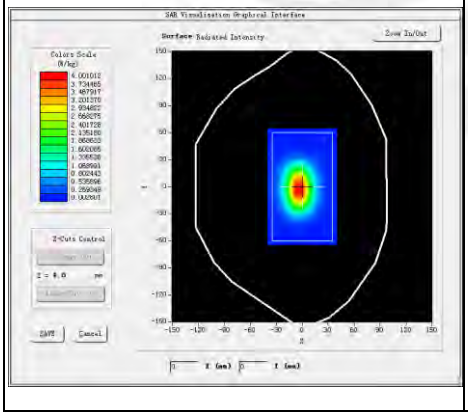
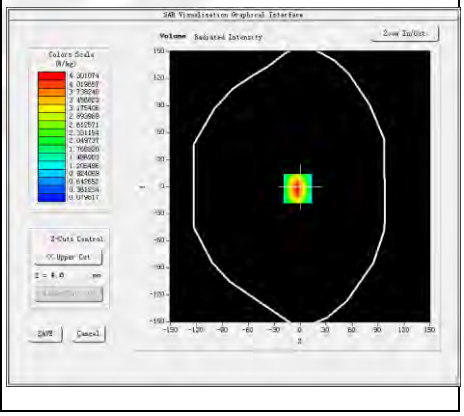


System Performance Check Data (1900MHz Body)

Type: Phone measurement (Complete)
Area scan resolution: dx=8mm, dy=8mm
Zoom scan resolution: dx=8mm, dy=8mm, dz=5mm
Date of measurement: 2020-05-13

Experimental conditions.

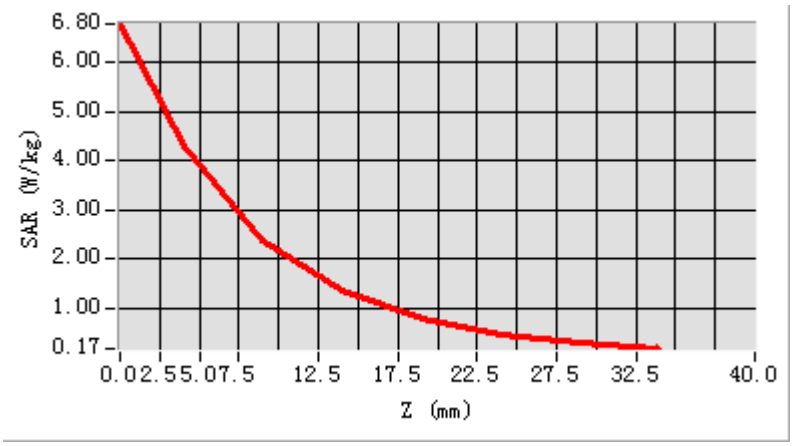
Device Position	-
Band	1900MHz
Channels	-
Signal	CW
Frequency (MHz)	1900
Relative permittivity	52.61
Conductivity (S/m)	1.49
Power drift (%)	-1.86
Probe	SN 41/18 EPGO334
ConvF:	1.88
Crest factor:	1:1

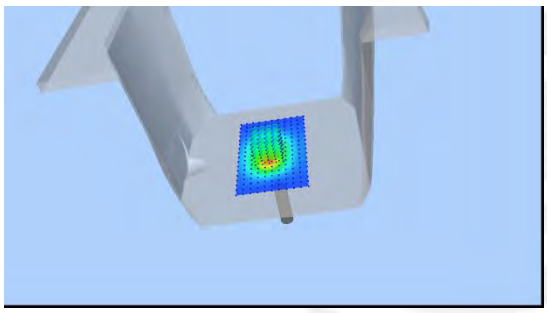
SURFACE SAR	VOLUME SAR
	

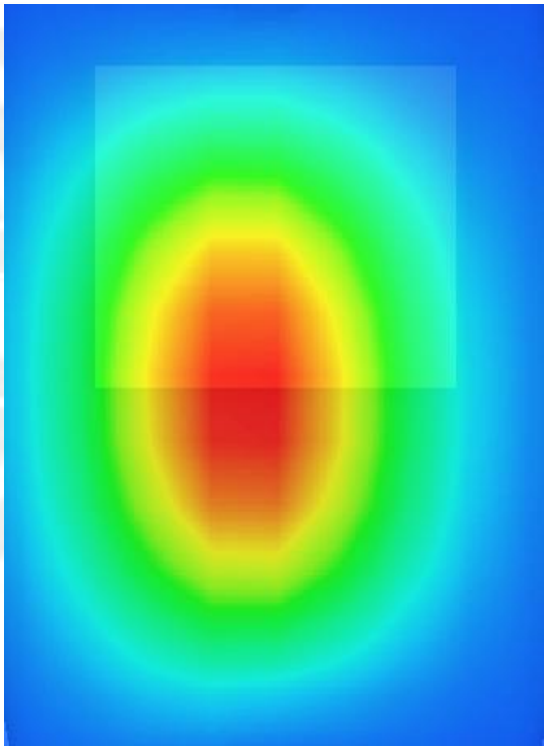
Maximum location: X=-3.00, Y=-2.00

SAR 10g (W/Kg)	2.054472
SAR 1g (W/Kg)	3.938677

Z Axis Scan


6.80
6.00
5.00
4.00
3.00
2.00
1.00
0.17
SAR (W/kg)
0.0 2.5 5.0 7.5 12.5 17.5 22.5 27.5 32.5 40.0
Z (mm)



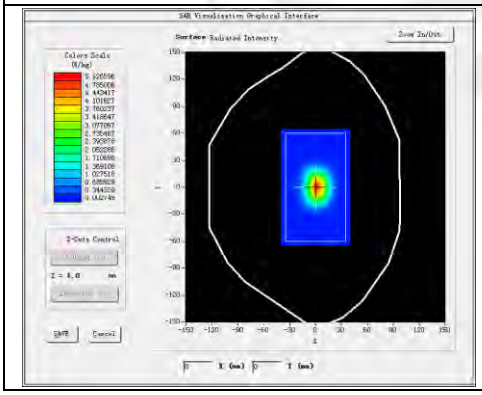
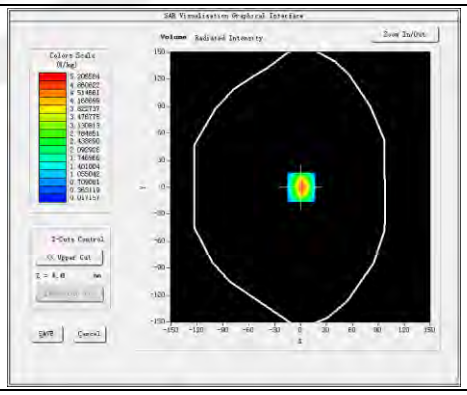


System Performance Check Data (2450MHz Head)

Type: Phone measurement (Complete)
Area scan resolution: dx=8mm, dy=8mm
Zoom scan resolution: dx=8mm, dy=8mm, dz=5mm
Date of measurement: 2020-05-12

Experimental conditions.

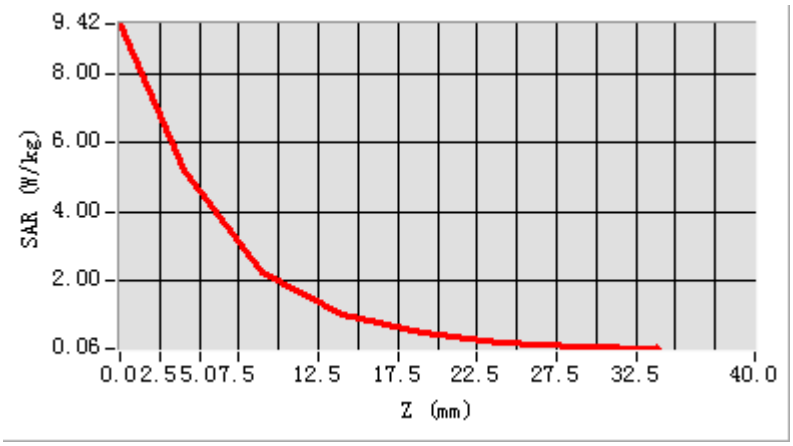
Device Position	Validation plane
Band	2450 MHz
Channels	-
Signal	CW
Frequency (MHz)	2450
Relative permittivity	38.07
Conductivity (S/m)	1.83
Power drift (%)	0.95
Probe	SN 41/18 EPGO334
ConvF	1.97
Crest factor:	1:1

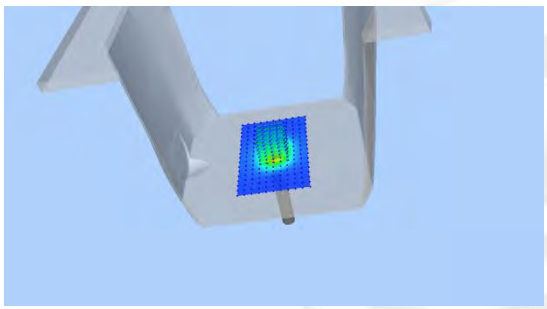
SURFACE SAR	VOLUME SAR
	

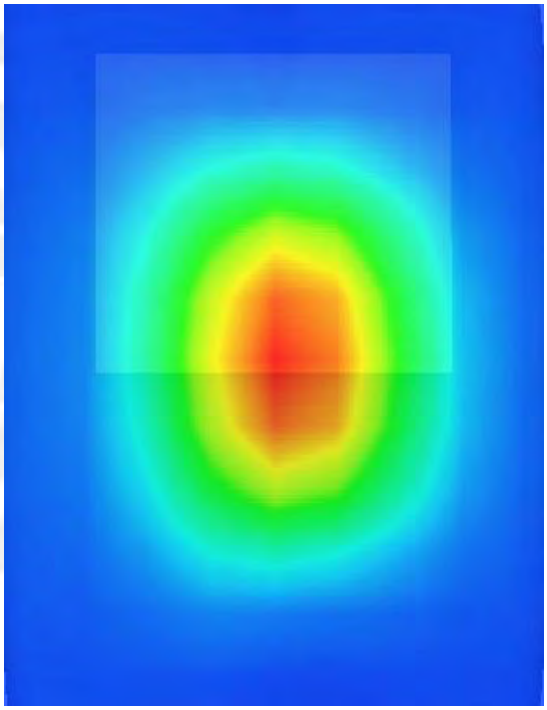
Maximum location: X=1.00, Y=0.00

SAR 10g (W/Kg)	2.394425
SAR 1g (W/Kg)	5.238191

Z Axis Scan


9.42
8.00
6.00
4.00
2.00
0.06
SAR (W/kg)
0.0 2.5 5.0 7.5 12.5 17.5 22.5 27.5 32.5 40.0
Z (mm)



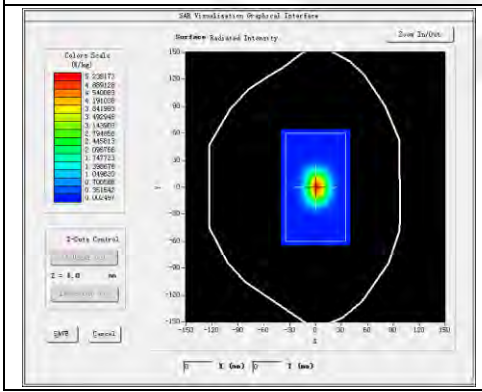
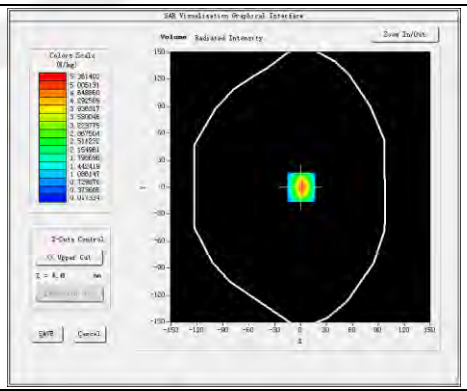


System Performance Check Data (2450MHz Body)

Type: Phone measurement (Complete)
Area scan resolution: dx=8mm, dy=8mm
Zoom scan resolution: dx=8mm, dy=8mm, dz=5mm
Date of measurement: 2020-05-12

Experimental conditions.

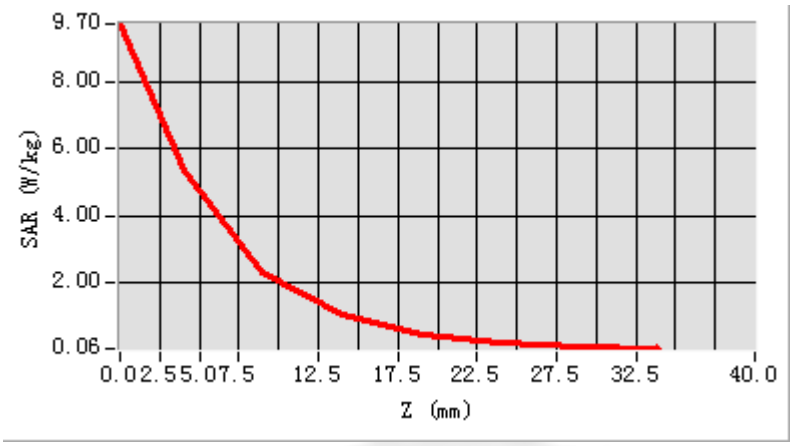
Device Position	Validation plane
Band	2450 MHz
Channels	-
Signal	CW
Frequency (MHz)	2450
Relative permittivity	52.87
Conductivity (S/m)	1.92
Power drift (%)	2.27
Probe	SN 41/18 EPGO334
ConvF	2.02
Crest factor:	1:1

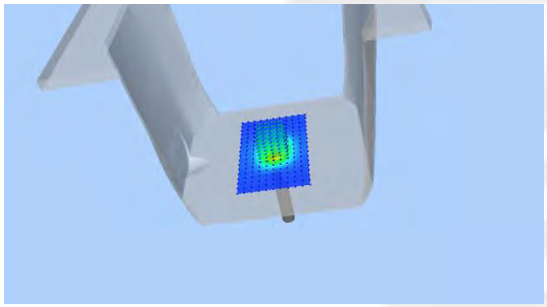
SURFACE SAR	VOLUME SAR
	

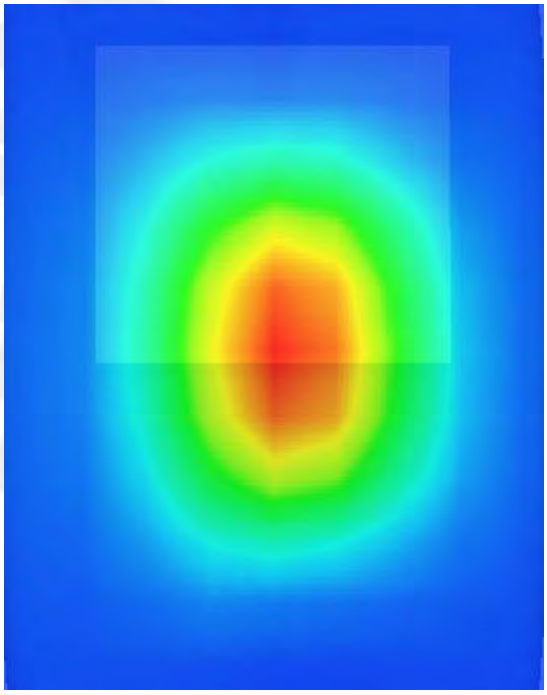
Maximum location: X=1.00, Y=0.00

SAR 10g (W/Kg)	2.588841
SAR 1g (W/Kg)	5.433465

Z Axis Scan


9.70
8.00
6.00
4.00
2.00
0.06
SAR (W/kg)
0.0 2.5 5.0 7.5 12.5 17.5 22.5 27.5 32.5 40.0
Z (mm)



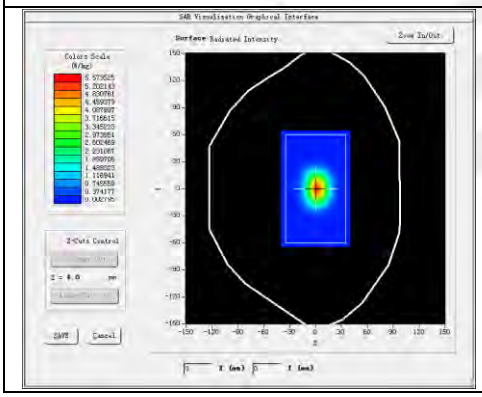
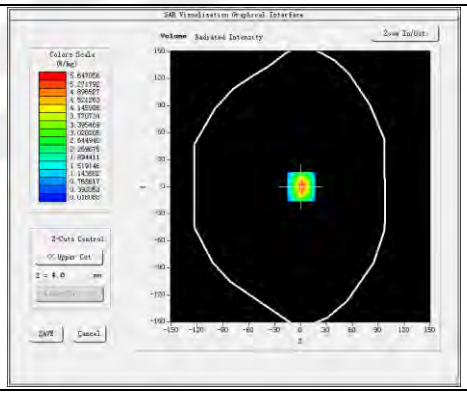


System Performance Check Data(2600MHz Head)

Type: Phone measurement (Complete)
Area scan resolution: dx=8mm, dy=8mm
Zoom scan resolution: dx=8mm, dy=8mm, dz=5mm
Date of measurement: 2020-05-14

Experimental conditions.

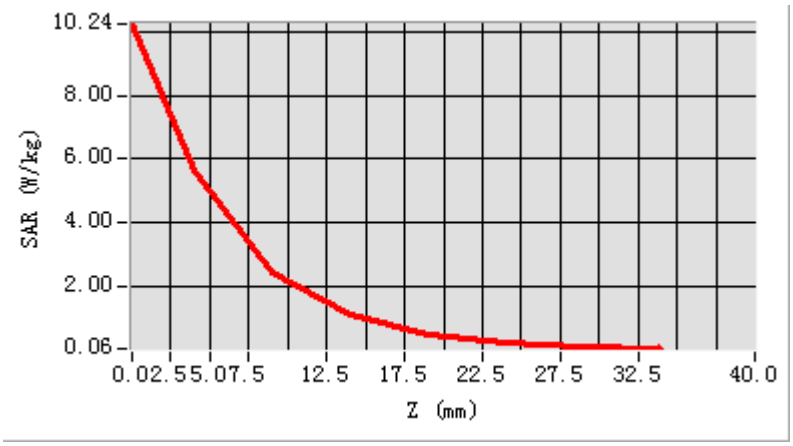
Device Position	Validation plane
Band	2600 MHz
Channels	-
Signal	CW
Frequency (MHz)	2600
Relative permittivity	39.75
Conductivity (S/m)	1.98
Power drift (%)	-0.63
Probe	SN 41/18 EPGO334
ConvF	1.85
Crest factor:	1:1

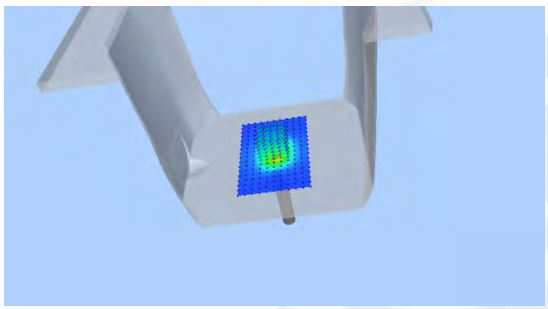
SURFACE SAR	VOLUME SAR
	

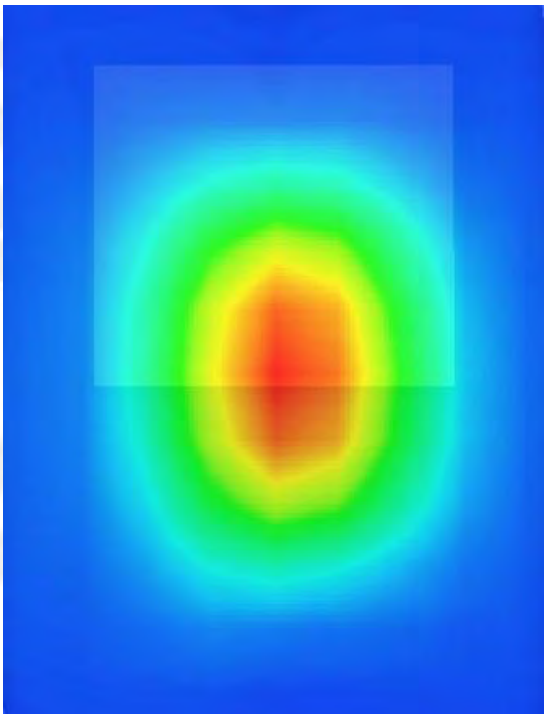
Maximum location: X=1.00, Y=0.00

SAR 10g (W/Kg)	2.571817
SAR 1g (W/Kg)	5.393459

Z Axis Scan


10.24
8.00
6.00
4.00
2.00
0.06
SAR (W/kg)
0.0 2.5 5.0 7.5 12.5 17.5 22.5 27.5 32.5 40.0
Z (mm)



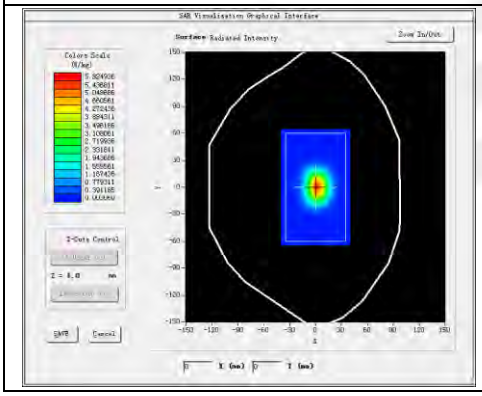
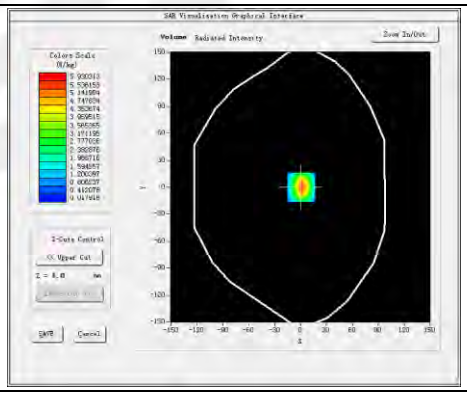


System Performance Check Data (2600MHz Body)

Type: Phone measurement (Complete)
Area scan resolution: dx=8mm, dy=8mm
Zoom scan resolution: dx=8mm, dy=8mm, dz=5mm
Date of measurement: 2020-05-14

Experimental conditions.

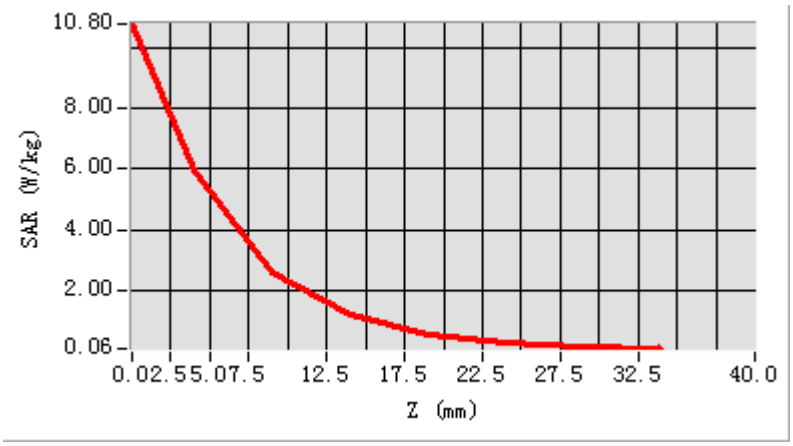
Device Position	Validation plane
Band	2600 MHz
Channels	-
Signal	CW
Frequency (MHz)	2600
Relative permittivity	51.87
Conductivity (S/m)	2.09
Power drift (%)	1.15
Probe	SN 41/18 EPGO334
ConvF	1.92
Crest factor:	1:1

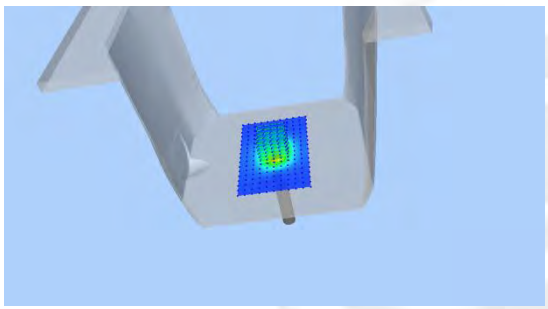
SURFACE SAR	VOLUME SAR
	

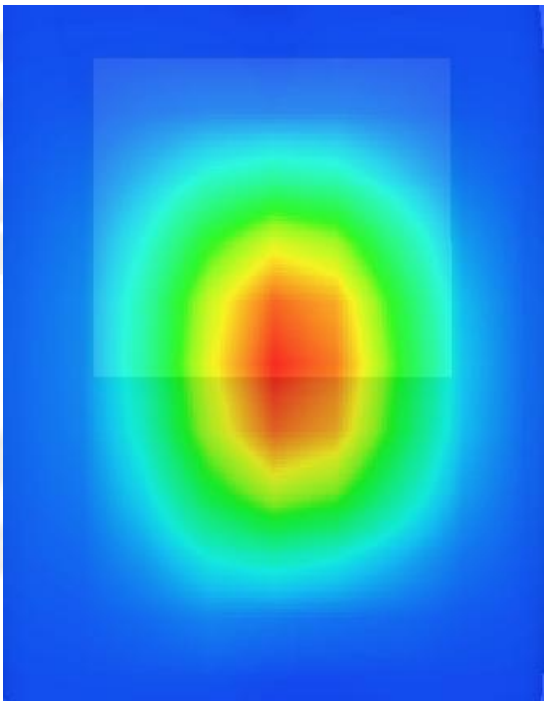
Maximum location: X=3.00, Y=1.00

SAR 10g (W/Kg)	2.592033
SAR 1g (W/Kg)	5.756894

Z Axis Scan


10.80
8.00
6.00
4.00
2.00
0.06
SAR (W/kg)
0.0 2.5 5.0 7.5 12.5 17.5 22.5 27.5 32.5 40.0
Z (mm)





Appendix B. SAR Test Plots

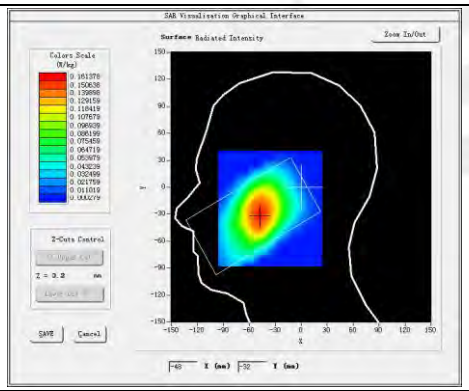
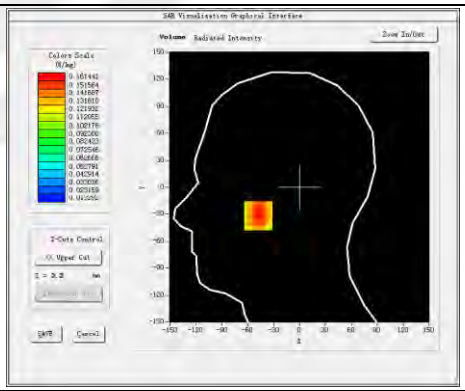
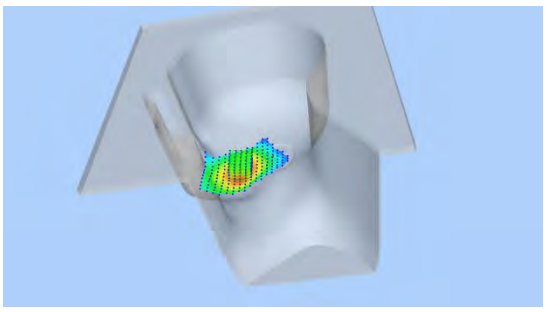
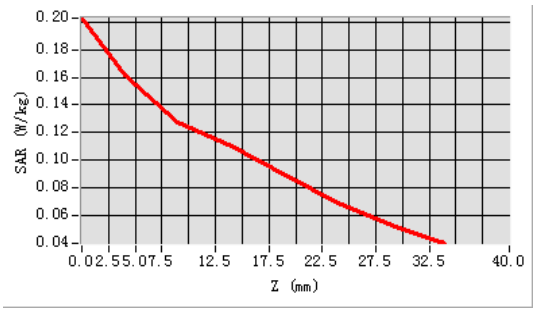
Plot 1: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-09
Probe	SN 41/18 EPGO334
ConvF	1.48
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Right head
Device Position	Cheek
Band	EGPRS 850
Channels	High
Signal	Duty Cycle: 2.00 (Crest factor: 2.0)
Frequency (MHz)	848.8
Relative permittivity (real part)	41.10
Conductivity (S/m)	0.89
Variation (%)	0.24

Maximum location: X=-48.00, Y=-32.00

SAR Peak: 0.20 W/kg

SAR 10g (W/Kg)	0.119086
SAR 1g (W/Kg)	0.157459

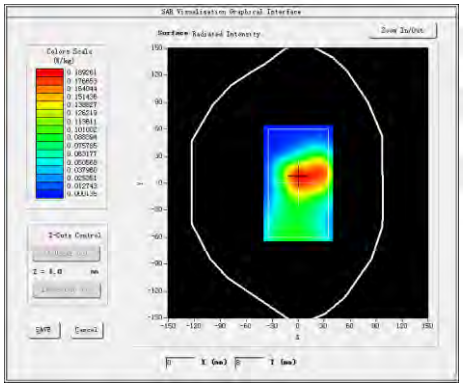
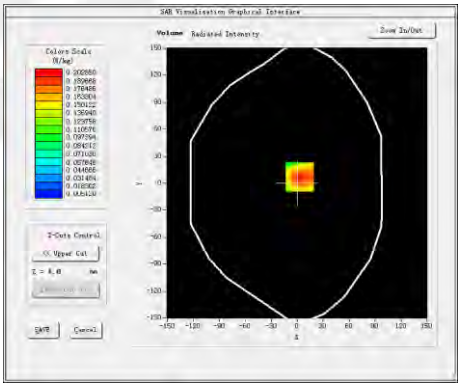
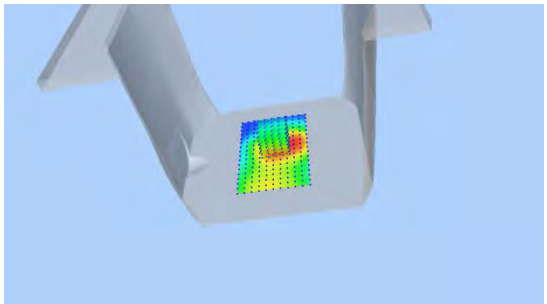
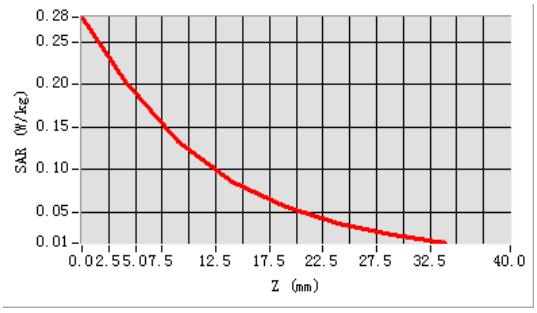
SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Plot 2: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-09
Probe	SN 41/18 EPGO334
ConvF	1.53
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Validation plane
Device Position	Back side
Band	EGPRS 850
Channels	High
Signal	Duty Cycle: 2.00 (Crest factor: 2.0)
Frequency (MHz)	848.8
Relative permittivity (real part)	54.66
Conductivity (S/m)	0.96
Variation (%)	2.52

Maximum location: X=3.00, Y=7.00
SAR Peak: 0.28 W/kg

SAR 10g (W/Kg)	0.121602
SAR 1g (W/Kg)	0.192904

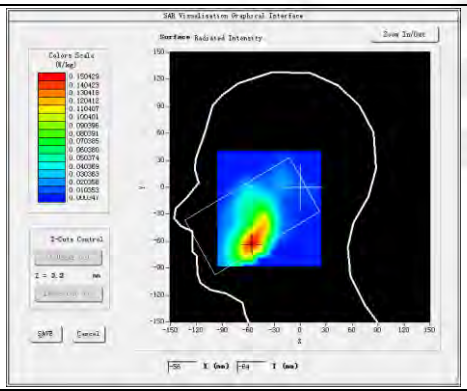
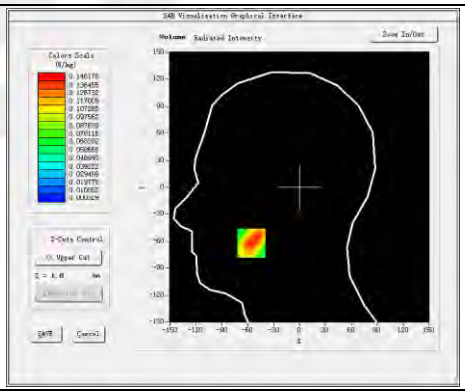
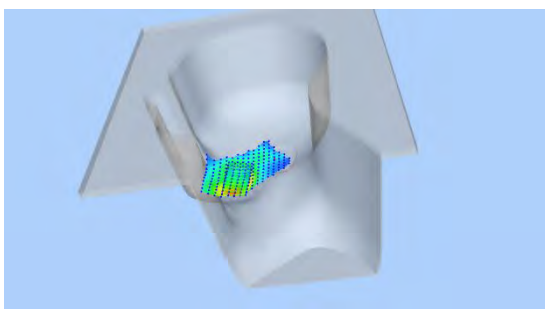
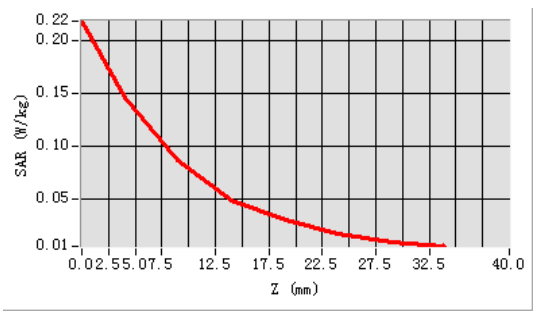
SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Plot 3: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-13
Probe	SN 41/18 EPGO334
ConvF	1.84
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Right head
Device Position	Cheek
Band	EGPRS 1900
Channels	Middle
Signal	Duty Cycle: 1:2.00 (Crest factor: 2.0)
Frequency (MHz)	1880.0
Relative permittivity (real part)	40.41
Conductivity (S/m)	1.46
Variation (%)	1.79

Maximum location: X=-56.00, Y=-62.00
SAR Peak: 0.23 W/kg

SAR 10g (W/Kg)	0.076205
SAR 1g (W/Kg)	0.138755

SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

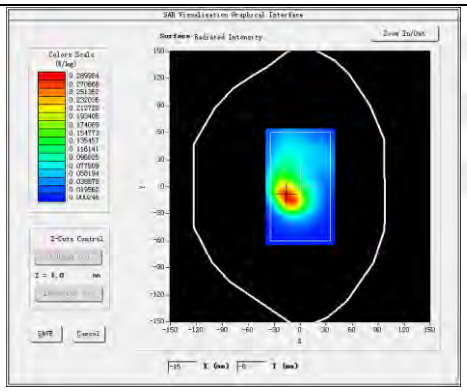
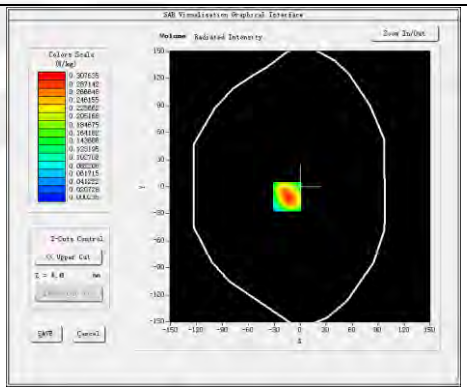
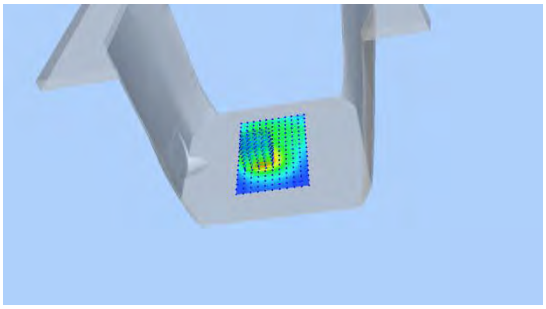
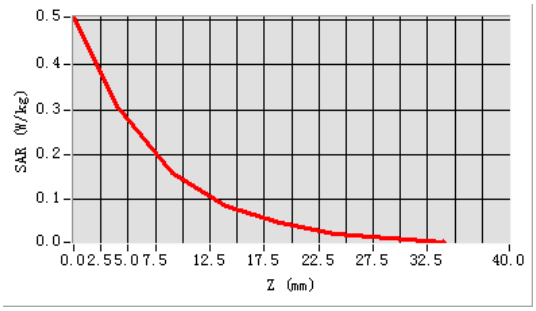
Plot 4: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-13
Probe	SN 41/18 EPGO334
ConvF	1.88
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Validation plane
Device Position	Back side
Band	EGPRS 1900
Channels	Middle
Signal	Duty Cycle: 1:2.00 (Crest factor: 2.0)
Frequency (MHz)	1880.0
Relative permittivity (real part)	52.61
Conductivity (S/m)	1.49
Variation (%)	1.20

Maximum location: X=-15.00, Y=-11.00

SAR Peak: 0.52 W/kg

SAR 10g (W/Kg)	0.147383
SAR 1g (W/Kg)	0.296000

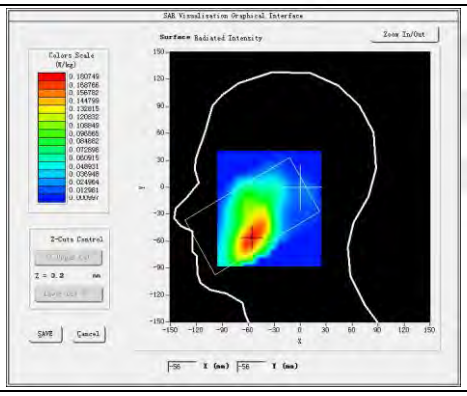
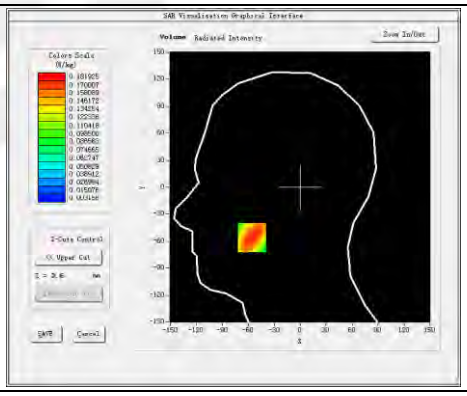
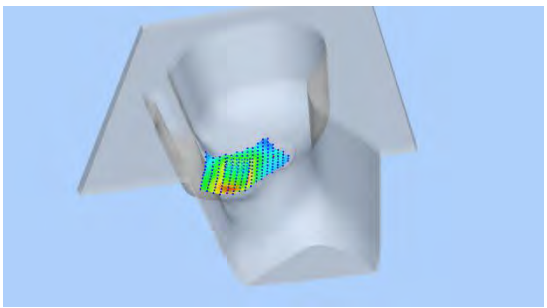
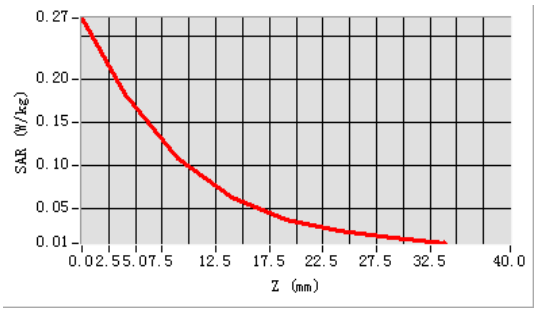
SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Plot 5: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-13
Probe	SN 41/18 EPGO334
ConvF	1.84
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Right head
Device Position	Cheek
Band	WCDMA II
Channels	Middle
Signal	WCDMA (Crest factor: 1.0)
Frequency (MHz)	1852.4
Relative permittivity (real part)	40.41
Conductivity (S/m)	1.46
Variation (%)	2.61

Maximum location: X=-56.00, Y=-56.00
SAR Peak: 0.28 W/kg

SAR 10g (W/Kg)	0.102197
SAR 1g (W/Kg)	0.175186

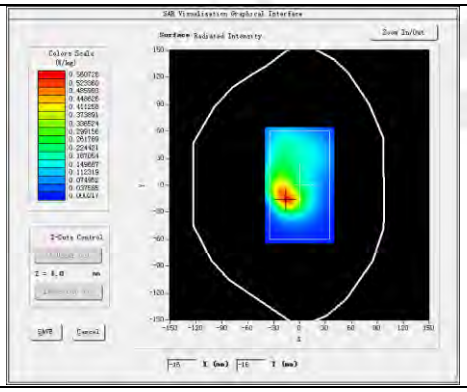
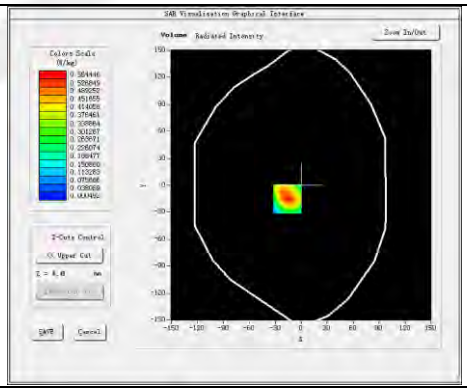
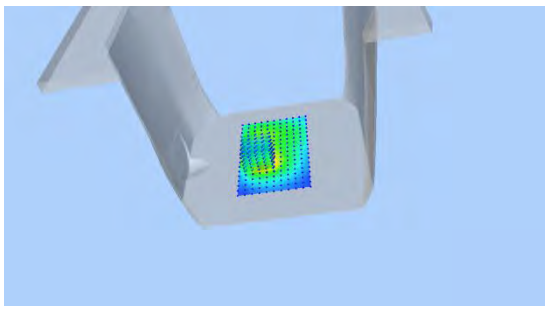
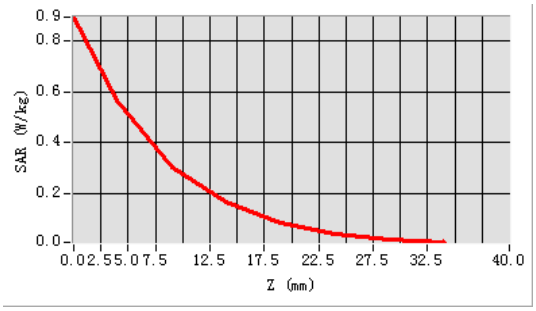
SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Plot 6: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-13
Probe	SN 41/18 EPGO334
ConvF	1.88
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Validation plane
Device Position	Back side
Band	WCDMA II
Channels	Middle
Signal	WCDMA (Crest factor: 1.0)
Frequency (MHz)	1852.4
Relative permittivity (real part)	52.61
Conductivity (S/m)	1.49
Variation (%)	-0.78

Maximum location: X=-16.00, Y=-15.00
SAR Peak: 0.89 W/kg

SAR 10g (W/Kg)	0.281017
SAR 1g (W/Kg)	0.539150

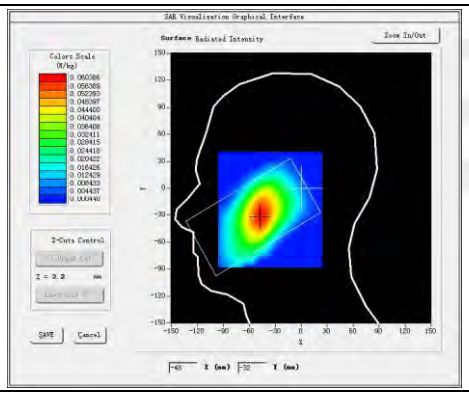
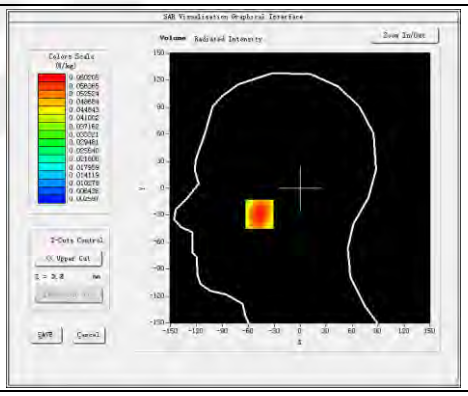
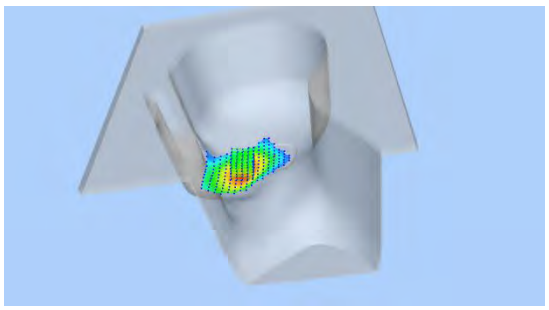
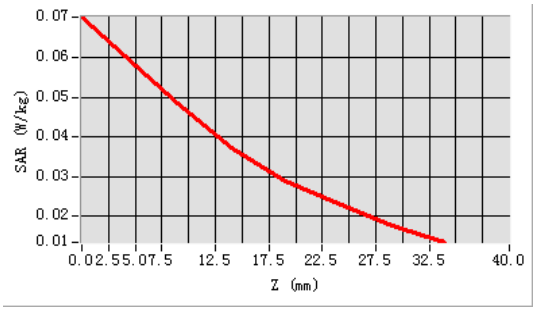
SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Plot 7: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-09
Probe	SN 41/18 EPGO334
ConvF	1.48
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Right head
Device Position	Cheek
Band	WCDMA V
Channels	High
Signal	WCDMA (Crest factor: 1.0)
Frequency (MHz)	846.6
Relative permittivity (real part)	41.10
Conductivity (S/m)	0.89
Variation (%)	0.75

Maximum location: X=-47.00, Y=-29.00
SAR Peak: 0.07 W/kg

SAR 10g (W/Kg)	0.042622
SAR 1g (W/Kg)	0.057793

SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

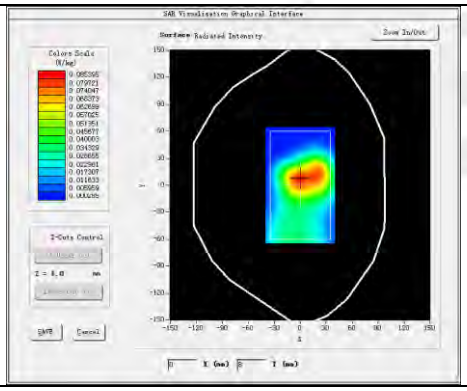
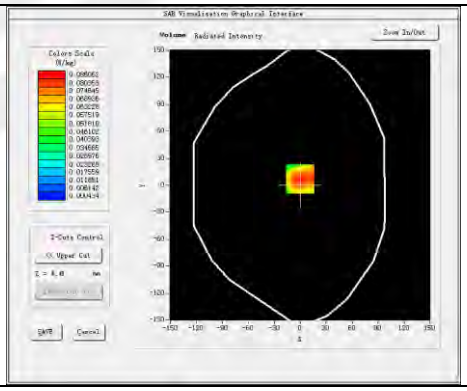
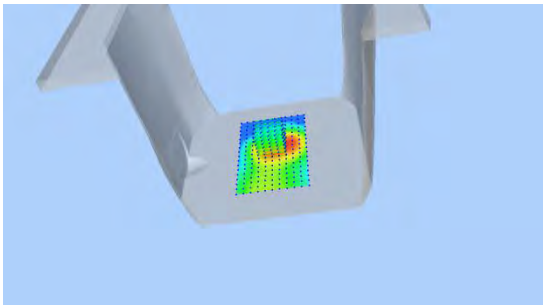
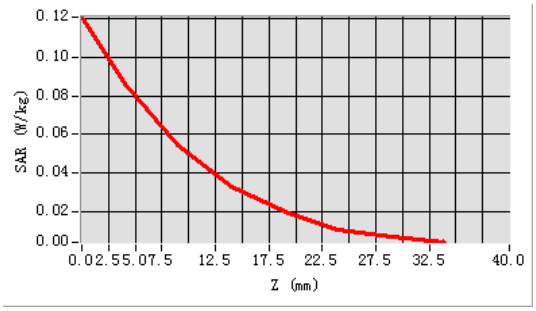
Plot 8: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-09
Probe	SN 41/18 EPGO334
ConvF	1.53
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Validation plane
Device Position	Back side
Band	WCDMA V
Channels	High
Signal	WCDMA (Crest factor: 1.0)
Frequency (MHz)	846.6
Relative permittivity (real part)	54.66
Conductivity (S/m)	0.96
Variation (%)	1.31

Maximum location: X=0.00, Y=7.00

SAR Peak: 0.12 W/kg

SAR 10g (W/Kg)	0.049831
SAR 1g (W/Kg)	0.082145

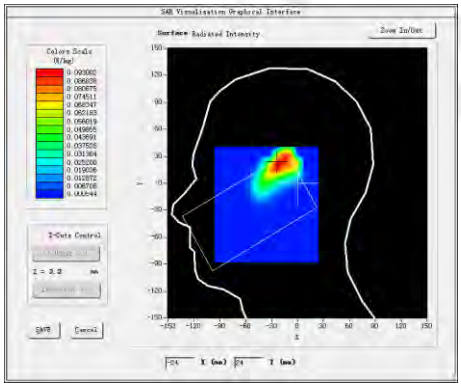
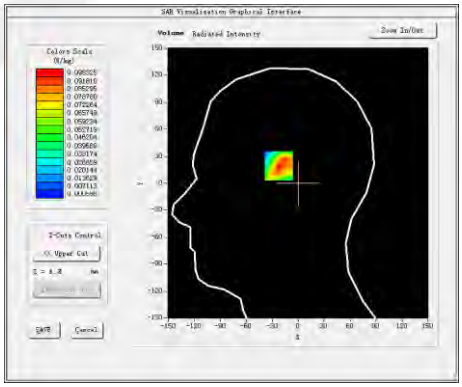
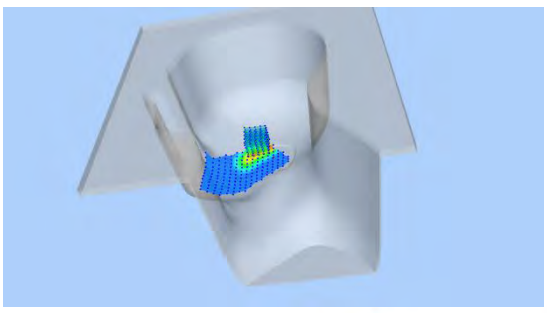
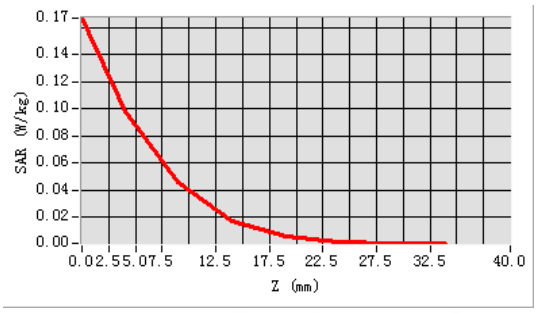
SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Plot 9: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-12
Probe	SN 41/18 EPGO334
ConvF	1.97
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Right head
Device Position	Cheek
Band	IEEE 802.11b ISM
Channels	Low
Signal	IEEE802.b (Crest factor: 1.0)
Frequency (MHz)	2412
Relative permittivity (real part)	38.07
Conductivity (S/m)	1.83
Variation (%)	-3.62

Maximum location: X=-22.00, Y=23.00
SAR Peak: 0.18 W/kg

SAR 10g (W/Kg)	0.041006
SAR 1g (W/Kg)	0.091367

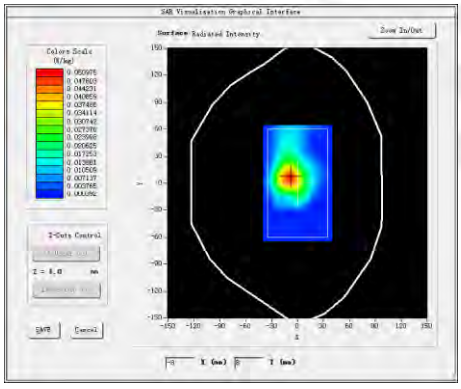
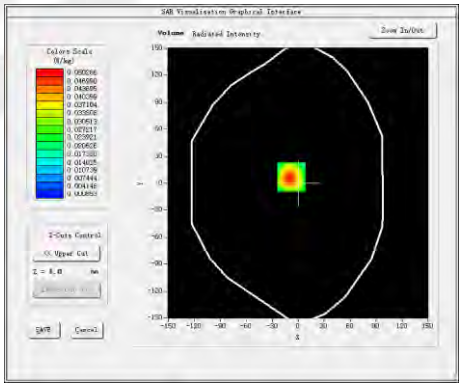
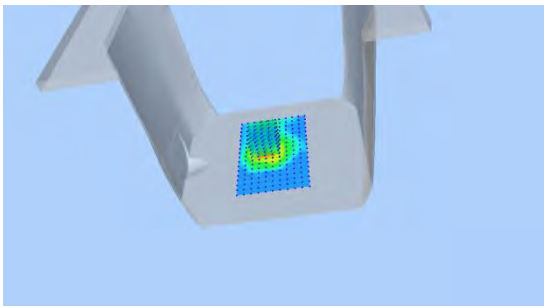
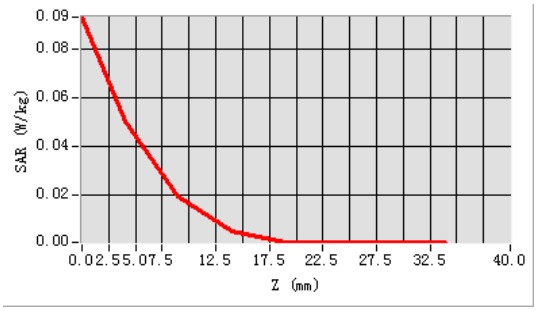
SURFACE SAR	VOLUME SAR
	
3D	**Z Axis Scan**
	

Plot 10: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-12
Probe	SN 41/18 EPGO334
ConvF	2.02
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Validation plane
Device Position	Back side
Band	IEEE 802.11b ISM
Channels	Low
Signal	IEEE802.b (Crest factor: 1.0)
Frequency (MHz)	2412
Relative permittivity (real part)	52.87
Conductivity (S/m)	1.92
Variation (%)	-1.64

Maximum location: X=-8.00, Y=1.00
SAR Peak: 0.10 W/kg

SAR 10g (W/Kg)	0.020899
SAR 1g (W/Kg)	0.049206

SURFACE SAR	VOLUME SAR
	
3D	**Z Axis Scan**
	

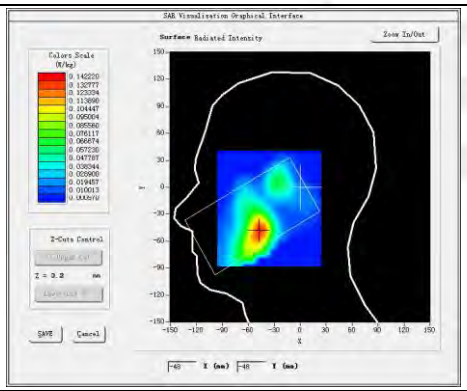
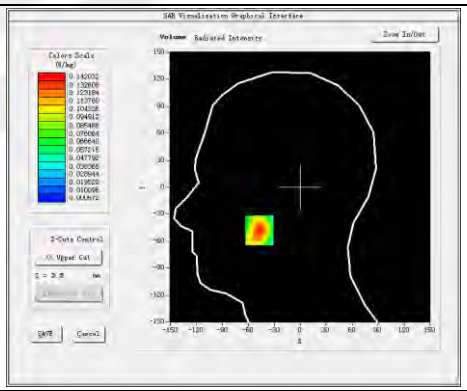
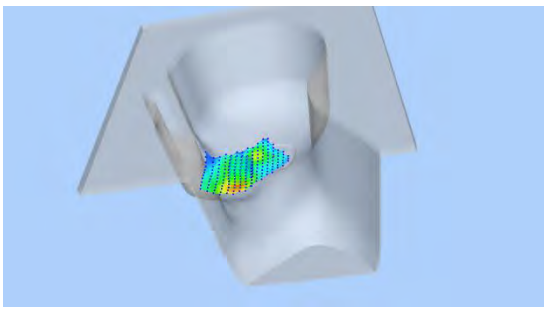
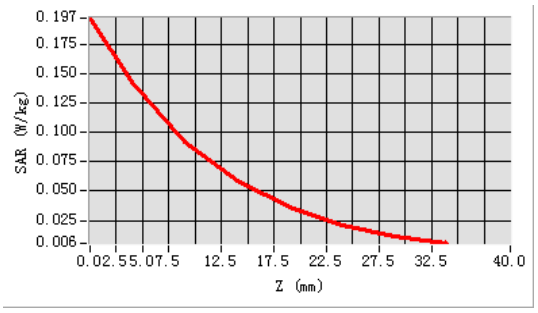
Plot 11: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-13
Probe	SN 41/18 EPGO334
ConvF	1.84
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Right head
Device Position	Cheek
Band	LTE Band 2 (RB 1)
Channels	High
Signal	LTE (Crest factor: 1.0)
Frequency (MHz)	1900
Relative permittivity (real part)	39.30
Conductivity (S/m)	1.42
Variation (%)	1.33

Maximum location: X=-47.00, Y=-48.00

SAR Peak: 0.20 W/kg

SAR 10g (W/Kg)	0.075570
SAR 1g (W/Kg)	0.132368

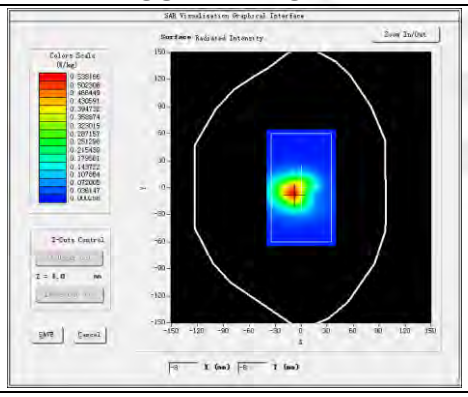
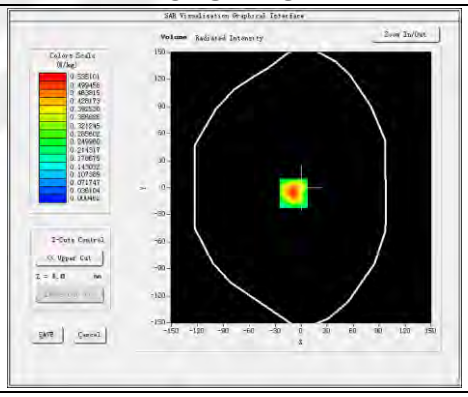
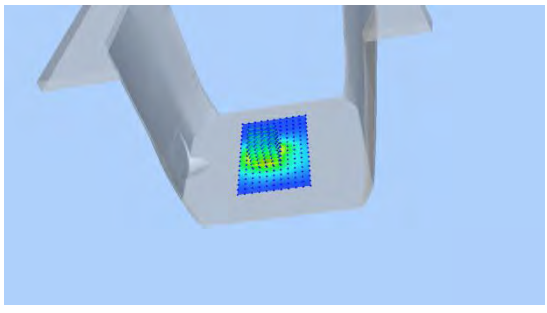
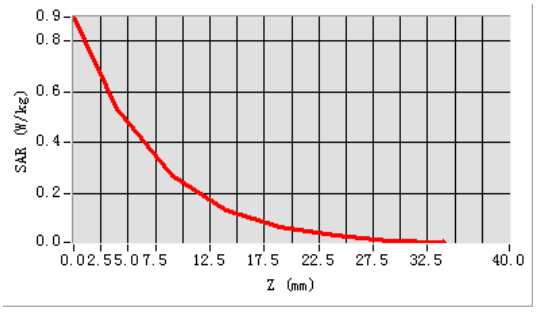
SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Plot 12: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-13
Probe	SN 41/18 EPGO334
ConvF	1.88
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Validation plane
Device Position	Back side
Band	LTE Band 2(RB 1)
Channels	High
Signal	LTE (Crest factor: 1.0)
Frequency (MHz)	1900
Relative permittivity (real part)	52.61
Conductivity (S/m)	1.49
Variation (%)	-3.28

Maximum location: X=-9.00, Y=-6.00
SAR Peak: 0.91 W/kg

SAR 10g (W/Kg)	0.249580
SAR 1g (W/Kg)	0.507474

SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

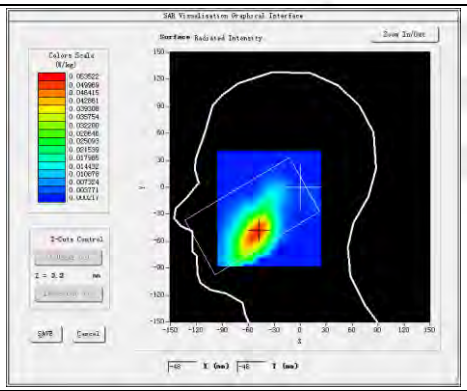
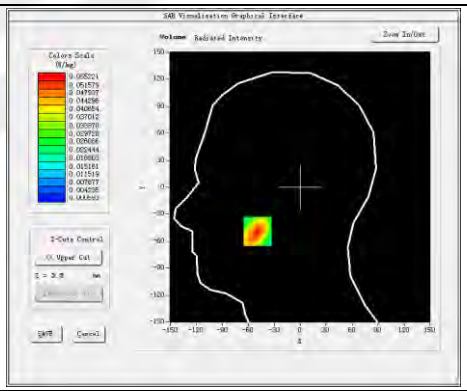
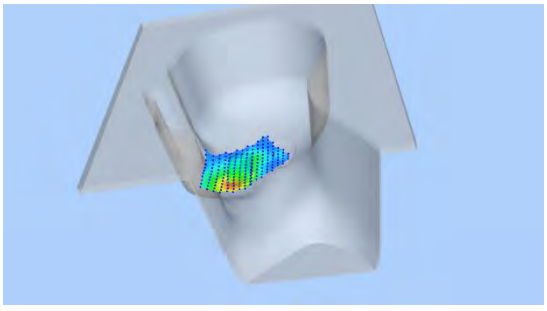
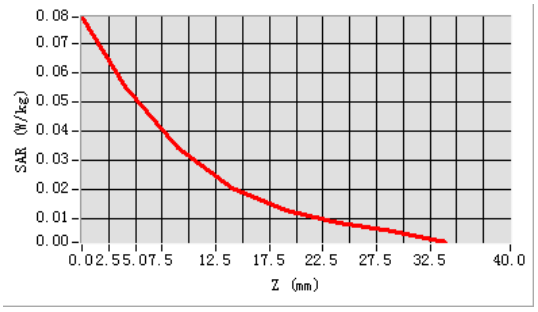
Plot 13: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-11
Probe	SN 41/18 EPGO334
ConvF	1.60
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Right head
Device Position	Cheek
Band	LTE Band 4 (RB 1)
Channels	High
Signal	LTE (Crest factor: 1.0)
Frequency (MHz)	1745.0
Relative permittivity (real part)	39.30
Conductivity (S/m)	1.42
Variation (%)	1.61

Maximum location: X=-49.00, Y=-49.00

SAR Peak: 0.08 W/kg

SAR 10g (W/Kg)	0.029635
SAR 1g (W/Kg)	0.051943

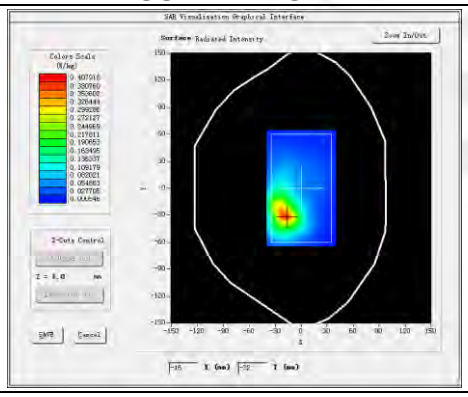
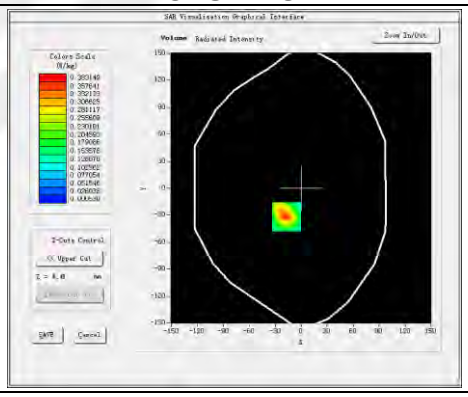
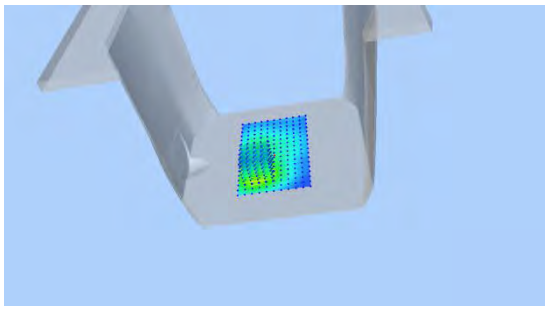
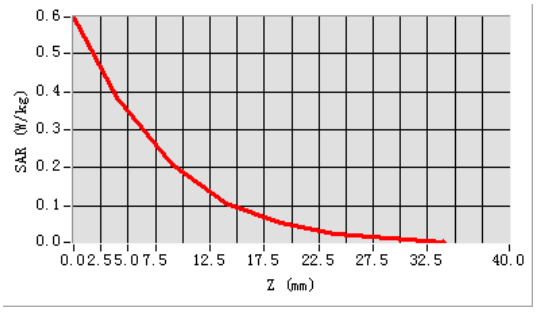
SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Plot 14: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-11
Probe	SN 41/18 EPGO334
ConvF	1.66
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Validation plane
Device Position	Back side
Band	LTE Band 4 (RB 1)
Channels	High
Signal	LTE (Crest factor: 1.0)
Frequency (MHz)	1745.0
Relative permittivity (real part)	52.73
Conductivity (S/m)	1.58
Variation (%)	-3.87

Maximum location: X=-17.00, Y=-32.00
SAR Peak: 0.61 W/kg

SAR 10g (W/Kg)	0.174819
SAR 1g (W/Kg)	0.352180

SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

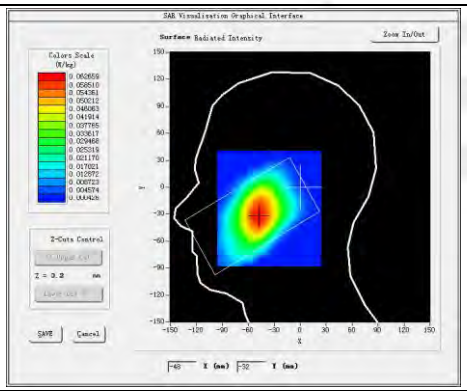
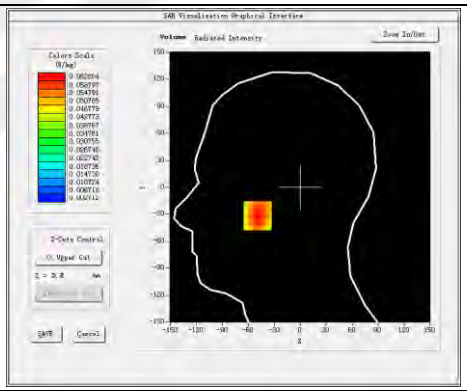
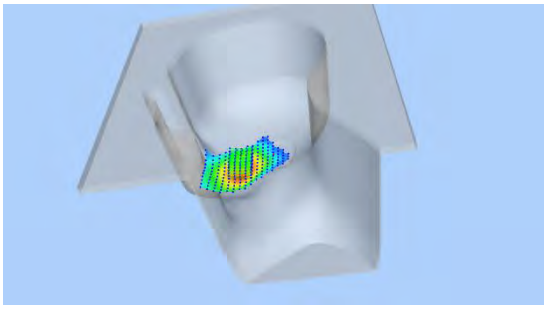
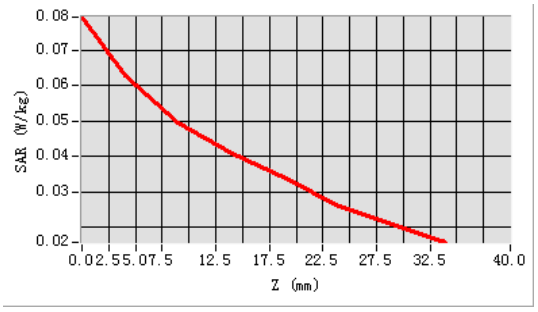
Plot 15: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-09
Probe	SN 41/18 EPGO334
ConvF	1.48
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Right head
Device Position	Cheek
Band	LTE Band 5 (RB 1)
Channels	High
Signal	LTE (Crest factor: 1.0)
Frequency (MHz)	844.0
Relative permittivity (real part)	41.10
Conductivity (S/m)	0.89
Variation (%)	3.00

Maximum location: X=-49.00, Y=-32.00

SAR Peak: 0.08 W/kg

SAR 10g (W/Kg)	0.046026
SAR 1g (W/Kg)	0.061620

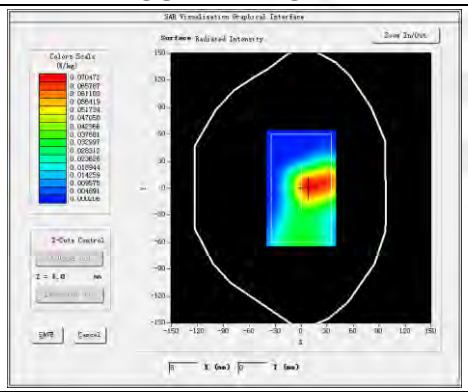
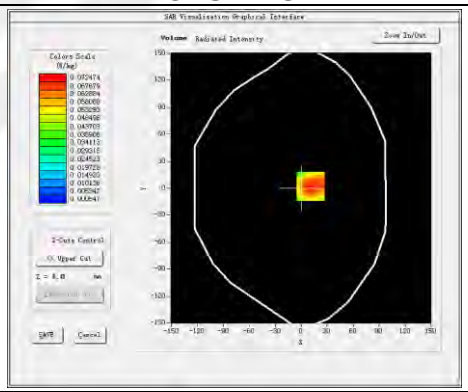
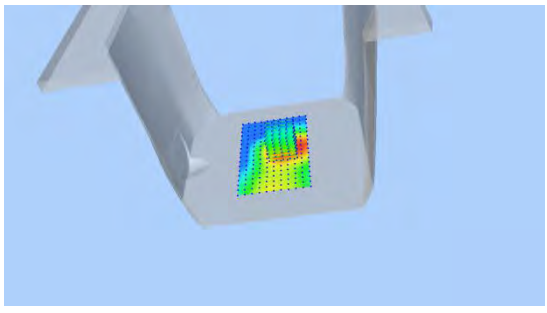
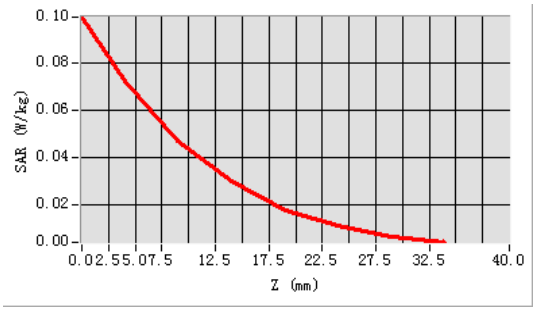
SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Plot 16: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-09
Probe	SN 41/18 EPGO334
ConvF	1.53
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Validation plane
Device Position	Back side
Band	LTE Band 5 (RB 1)
Channels	High
Signal	LTE (Crest factor: 1.0)
Frequency (MHz)	844.0
Relative permittivity (real part)	54.66
Conductivity (S/m)	0.96
Variation (%)	-3.11

Maximum location: X=11.00, Y=2.00
SAR Peak: 0.10 W/kg

SAR 10g (W/Kg)	0.042828
SAR 1g (W/Kg)	0.069425

SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

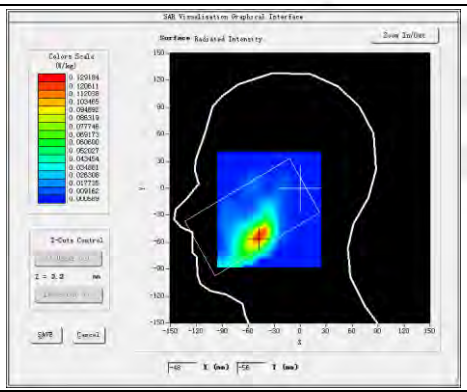
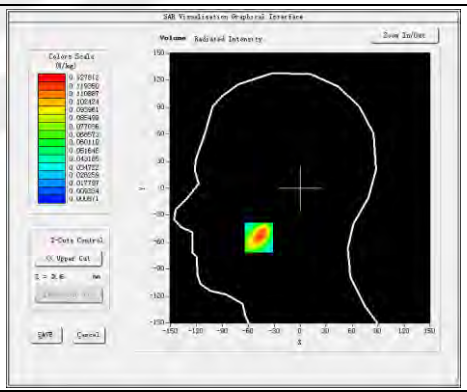
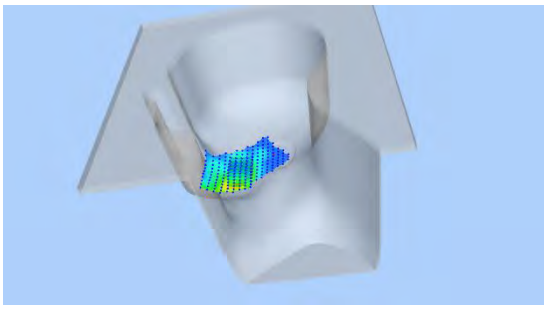
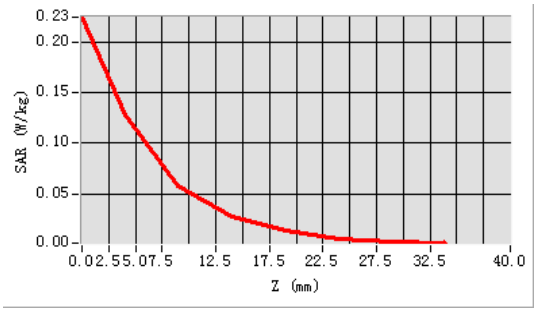
Plot 17: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-14
Probe	SN 41/18 EPGO334
ConvF	1.85
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Right head
Device Position	Cheek
Band	LTE Band 7 (RB 1)
Channels	Low
Signal	LTE (Crest factor: 1.0)
Frequency (MHz)	2510
Relative permittivity (real part)	39.75
Conductivity (S/m)	1.98
Variation (%)	-3.88

Maximum location: X=-48.00, Y=-55.00

SAR Peak: 0.24 W/kg

SAR 10g (W/Kg)	0.052142
SAR 1g (W/Kg)	0.121778

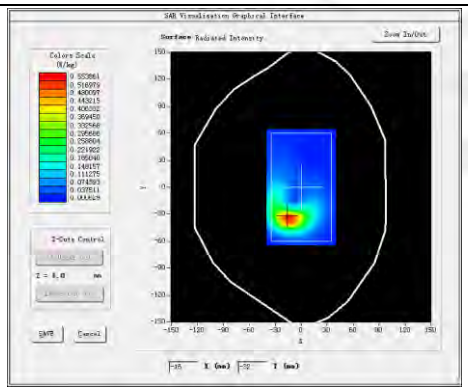
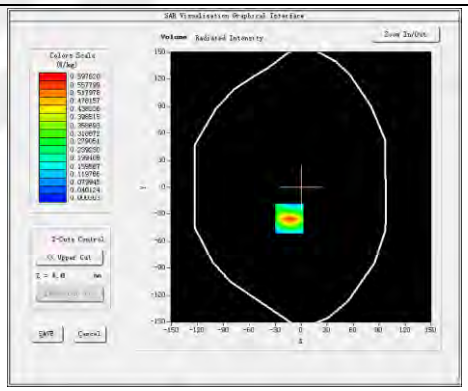
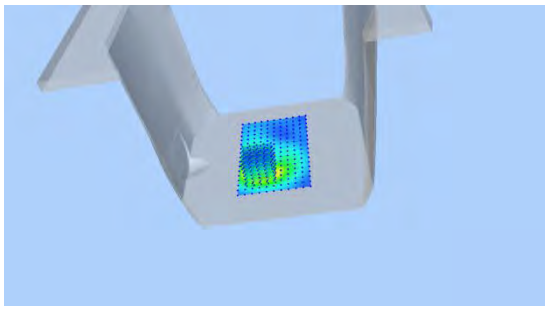
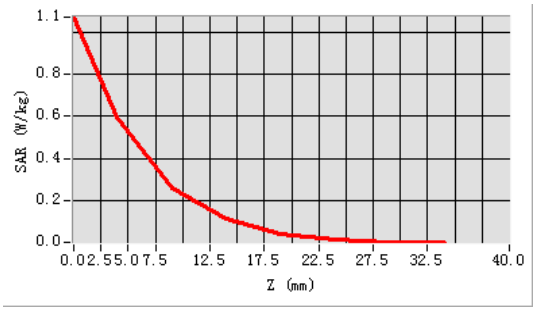
SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Plot 18: DUT: Mobile phone; EUT Model: Q6

Test Date	2020-05-14
Probe	SN 41/18 EPGO334
ConvF	1.92
Area Scan	dx=8mm, dy=8mm, h= 5.00 mm
Zoom Scan	5x5x7, dx=8mm, dy=8mm, dz=5mm, Complete/ndx=8mm, dy=8mm, h= 5.00 mm
Phantom	Validation plane
Device Position	Back side
Band	LTE Band 7 (RB 1)
Channels	Low
Signal	LTE (Crest factor: 1.0)
Frequency (MHz)	2510
Relative permittivity (real part)	51.87
Conductivity (S/m)	2.09
Variation (%)	2.54

Maximum location: X=-14.00, Y=-35.00
SAR Peak: 1.06 W/kg

SAR 10g (W/Kg)	0.225226
SAR 1g (W/Kg)	0.540443

SURFACE SAR	VOLUME SAR
	
3D screen shot	**Z Axis Scan**
	

Appendix C. Probe Calibration and Dipole Calibration Report

Refer the appendix Calibration Report.

※※※※※END OF THE REPORT※※※※※