



FCC SAR Test Report

Report No. : FA4D1311-01

	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Front	5mm	Ant 4	-	ECI 3	656000	3840	1	15.85	17.30	1.396	-	-	0.1	0.269	0.376	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Front	5mm	Ant 4	-	ECI 3	656000	3840	1	15.83	17.30	1.403	-	-	-0.18	0.300	0.421	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Back	5mm	Ant 4	-	ECI 3	656000	3840	1	15.85	17.30	1.396	-	-	0.12	0.597	0.834	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	5mm	Ant 4	-	ECI 3	656000	3840	1	15.83	17.30	1.403	-	-	0.05	0.628	0.881	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	5mm	Ant 4	-	ECI 3	656000	3840	2	15.83	17.30	1.403	-	-	0.09	0.621	0.871	
	2nd	FR1 n77	100M	QPSK	270	0	DFT-SCS-30KHz	Back	5mm	Ant 4	-	ECI 3	656000	3840	1	15.79	17.30	1.416	-	-	0.08	0.620	0.878	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Front	14mm	Ant 4	-	ECI 4	656000	3840	1	26.35	27.00	1.161	-	-	0.17	0.325	0.377	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	15mm	Ant 4	-	ECI 4	656000	3840	1	26.35	27.00	1.161	-	-	-0.05	0.525	0.610	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Front	5mm	Ant 8	-	ECI 3	656000	3840	1	23.23	24.70	1.403	-	-	-0.17	0.559	0.784	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Front	5mm	Ant 8	-	ECI 3	656000	3840	1	23.21	24.70	1.409	-	-	-0.03	0.554	0.781	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Back	5mm	Ant 8	-	ECI 3	656000	3840	1	23.23	24.70	1.403	-	-	0.14	0.876	1.229	
54	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	5mm	Ant 8	-	ECI 3	656000	3840	1	23.21	24.70	1.409	-	-	0.15	0.910	1.282	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	5mm	Ant 8	-	ECI 3	656000	3840	2	23.21	24.70	1.409	-	-	0.06	0.903	1.273	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	5mm	Ant 8	Headset	ECI 3	656000	3840	1	23.21	24.70	1.409	-	-	0.06	0.847	1.194	
	2nd	FR1 n77	100M	QPSK	270	0	DFT-SCS-30KHz	Back	5mm	Ant 8	-	ECI 3	656000	3840	1	23.19	24.70	1.416	-	-	0.11	0.862	1.220	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Front	14mm	Ant 8	-	ECI 4	656000	3840	1	23.24	24.80	1.432	-	-	0.01	0.207	0.296	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	15mm	Ant 8	-	ECI 4	656000	3840	1	23.24	24.80	1.432	-	-	0.1	0.264	0.378	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Front	5mm	Ant 5	-	ECI 3	656000	3840	1	18.94	19.90	1.247	-	-	-0.05	0.193	0.241	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Front	5mm	Ant 5	-	ECI 3	656000	3840	1	18.93	19.90	1.250	-	-	0.18	0.249	0.311	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Back	5mm	Ant 5	-	ECI 3	656000	3840	1	18.94	19.90	1.247	-	-	0.14	0.590	0.736	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	5mm	Ant 5	-	ECI 3	656000	3840	1	18.93	19.90	1.250	-	-	-0.06	0.710	0.888	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	5mm	Ant 5	-	ECI 3	656000	3840	2	18.93	19.90	1.250	-	-	0.02	0.697	0.871	
	2nd	FR1 n77	100M	QPSK	270	0	DFT-SCS-30KHz	Back	5mm	Ant 5	-	ECI 3	656000	3840	1	18.91	19.90	1.256	-	-	-0.17	0.703	0.883	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Front	14mm	Ant 5	-	ECI 4	656000	3840	1	26.37	27.00	1.156	-	-	-0.17	0.365	0.422	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	15mm	Ant 5	-	ECI 4	656000	3840	1	26.37	27.00	1.156	-	-	0.04	0.476	0.550	

Plot No.	No.	Band	Mode	Test Position	Gap (mm)	Antenna	Headset	Power State	Ch.	Freq. (MHz)	Sample	Average Power (dBm)	Tune-Up Limit (dBm)	Tune-up Scaling Factor	Duty Cycle %	Duty Cycle Scaling Factor	Power Drift (dB)	Measured 1g SAR (W/kg)	Reported 1g SAR (W/kg)	Deviation
2450MHz																				
	1st	WLAN2.4GHz	802.11b 1Mbps	Back	5mm	Ant 3	-	Standalone	1	2412	1	19.10	20.50	1.380	99.14	1.009	-0.19	0.448	0.624	0.251
55	2nd	WLAN2.4GHz	802.11b 1Mbps	Back	5mm	Ant 3	-	Standalone	1	2412	1	19.12	20.50	1.374	99.14	1.009	-0.08	0.425	0.589	
	1st	Bluetooth	1Mbps	Back	5mm	Ant 3	-	Full power	39	2441	1	16.40	17.00	1.148	76.45	1.090	0.06	0.243	0.304	0.131
56	2nd	Bluetooth	1Mbps	Back	5mm	Ant 3	-	Full power	39	2441	1	16.43	17.00	1.140	76.45	1.090	-0.08	0.237	0.295	
5000MHz																				
	1st	WLAN5.3GHz	802.11n-HT40 MCS0	Front	5mm	Ant 4	-	Standalone	54	5270	1	18.42	20.00	1.440	93.7	1.067	-0.09	0.451	0.693	0.272
57	2nd	WLAN5.3GHz	802.11n-HT40 MCS0	Front	5mm	Ant 4	-	Standalone	54	5270	1	18.45	20.00	1.429	93.7	1.067	0.03	0.427	0.651	
	1st	WLAN5.5GHz	802.11n-HT40 MCS0	Back	5mm	Ant 4	-	Standalone	142	5710	1	18.79	20.50	1.482	93.7	1.067	0.07	0.653	1.032	0.185
58	2nd	WLAN5.5GHz	802.11n-HT40 MCS0	Back	5mm	Ant 4	-	Standalone	142	5710	1	18.78	20.50	1.486	93.7	1.067	0.01	0.624	0.989	
	1st	WLAN5.8GHz	802.11ax-HE40 MCS0	Back	5mm	Ant 4	-	Standalone	151	5755	1	18.86	20.50	1.459	92.46	1.082	-0.03	0.570	0.900	0.233
59	2nd	WLAN5.8GHz	802.11ax-HE40 MCS0	Back	5mm	Ant 4	-	Standalone	151	5755	1	18.83	20.50	1.469	92.46	1.082	0.08	0.537	0.853	



17.4 Product specific 10g SAR

Plot No.	No.	Band	BW (MHz)	Modulation	RB Size	RB offset	Mode	Test Position	Gap (mm)	Antenna	Power State	Ch.	Freq. (MHz)	Sample	Average Power (dBm)	Tune-Up Limit (dBm)	Tune-up Scaling Factor	Duty Cycle %	Duty Cycle Scaling Factor	Power Drift (dB)	Measured 10g SAR (W/kg)	Reported 10g SAR (W/kg)	Deviation
835MHz																							
	1st	GSM850	-	-	-	-	GPRS (3 Tx slots)	Back	0mm	Ant 0	ECI 6	189	836.4	1	29.14	31.00	1.535	-	-	0.07	1.450	2.225	0.377
	2nd	GSM850	-	-	-	-	GPRS (3 Tx slots)	Back	0mm	Ant 0	ECI 6	189	836.4	1	29.11	31.00	1.545	-	-	0.05	1.320	2.040	
	2nd	GSM850	-	-	-	-	GPRS (3 Tx slots)	Back	0mm	Ant 0	ECI 6	189	836.4	2	29.11	31.00	1.545	-	-	0.09	1.210	1.870	
	1st	GSM850	-	-	-	-	GPRS (4 Tx slots)	Top Side	0mm	Ant 1	ECI 6	128	824.2	1	27.80	29.00	1.318	-	-	0.02	1.770	2.333	0.564
60	2nd	GSM850	-	-	-	-	GPRS (4 Tx slots)	Top Side	0mm	Ant 1	ECI 6	128	824.2	1	27.76	29.00	1.330	-	-	0.08	1.540	2.049	
	2nd	GSM850	-	-	-	-	GPRS (4 Tx slots)	Top Side	0mm	Ant 1	ECI 6	128	824.2	2	27.76	29.00	1.330	-	-	0.08	1.430	1.903	
	1st	WCDMA V	-	-	-	-	RMC 12.2Kbps	Back	0mm	Ant 0	ECI 6	4182	836.4	1	22.81	24.00	1.315	-	-	-0.01	1.530	2.012	0.606
61	2nd	WCDMA V	-	-	-	-	RMC 12.2Kbps	Back	0mm	Ant 0	ECI 6	4182	836.4	1	22.84	24.00	1.306	-	-	-0.07	1.340	1.750	
	1st	LTE Band 26	15M	QPSK	1	0	-	Back	0mm	Ant 1	ECI 6	26865	831.5	1	22.51	24.00	1.409	-	-	-0.05	0.991	1.397	0.075
62	2nd	LTE Band 26	15M	QPSK	1	0	-	Back	0mm	Ant 1	ECI 6	26865	831.5	1	22.53	24.00	1.403	-	-	0.01	0.979	1.373	
	1st	FR1 n26	20M	QPSK	1	1	DFT-SCS-15KHz	Back	0mm	Ant 1	ECI 6	166300	831.5	1	22.69	24.00	1.352	-	-	0.09	0.797	1.078	0.309
63	2nd	FR1 n26	20M	QPSK	1	1	DFT-SCS-15KHz	Back	0mm	Ant 1	ECI 6	166300	831.5	1	22.68	24.00	1.355	-	-	0.03	0.741	1.004	
1900MHz																							
	1st	GSM1900	-	-	-	-	GPRS (3 Tx slots)	Back	0mm	Ant 2	ECI 6	512	1850.2	1	26.31	27.50	1.315	-	-	0.03	2.210	2.907	0.243
64	2nd	GSM1900	-	-	-	-	GPRS (3 Tx slots)	Back	0mm	Ant 2	ECI 6	512	1850.2	1	26.33	27.50	1.309	-	-	-0.04	2.100	2.749	
	1st	GSM1900	-	-	-	-	GPRS (4 Tx slots)	Top Side	0mm	Ant 1	ECI 6	661	1880	1	23.46	24.50	1.271	-	-	0.02	1.560	1.982	0.152
	2nd	GSM1900	-	-	-	-	GPRS (4 Tx slots)	Top Side	0mm	Ant 1	ECI 6	661	1880	1	23.47	24.50	1.268	-	-	0.09	1.510	1.914	
	1st	WCDMA II	-	-	-	-	RMC 12.2Kbps	Bottom Side	0mm	Ant 2	ECI 6	9262	1852.4	1	21.61	22.80	1.315	-	-	0.02	2.430	3.196	0.016
65	2nd	WCDMA II	-	-	-	-	RMC 12.2Kbps	Bottom Side	0mm	Ant 2	ECI 6	9262	1852.4	1	21.59	22.80	1.321	-	-	0.17	2.410	3.184	
	2nd	WCDMA II	-	-	-	-	RMC 12.2Kbps	Bottom Side	0mm	Ant 2	ECI 6	9262	1852.4	2	21.59	22.80	1.321	-	-	0.04	2.270	2.999	
	1st	WCDMA II	-	-	-	-	RMC 12.2Kbps	Back	0mm	Ant 2	ECI 6	9262	1852.4	1	21.61	22.80	1.315	-	-	0.17	2.410	3.170	0.202
	2nd	WCDMA II	-	-	-	-	RMC 12.2Kbps	Back	0mm	Ant 2	ECI 6	9262	1852.4	1	21.59	22.80	1.321	-	-	0.05	2.290	3.026	
	1st	WCDMA II	-	-	-	-	RMC 12.2Kbps	Top Side	0mm	Ant 1	ECI 6	9538	1907.6	1	20.24	21.40	1.306	-	-	-0.02	1.870	2.443	0.270
	2nd	WCDMA II	-	-	-	-	RMC 12.2Kbps	Top Side	0mm	Ant 1	ECI 6	9538	1907.6	1	20.27	21.40	1.297	-	-	0.13	1.770	2.296	
	2nd	WCDMA II	-	-	-	-	RMC 12.2Kbps	Top Side	0mm	Ant 1	ECI 6	9538	1907.6	2	20.27	21.40	1.297	-	-	0.02	1.730	2.244	
	1st	LTE Band 2	20M	QPSK	1	0	-	Front	0mm	Ant 2	ECI 6	18700	1860	1	22.47	23.60	1.297	-	-	-0.07	2.440	3.165	0.181
66	2nd	LTE Band 2	20M	QPSK	1	0	-	Front	0mm	Ant 2	ECI 6	18700	1860	1	22.45	23.60	1.303	-	-	0.15	2.330	3.036	
	1st	LTE Band 2	20M	QPSK	1	0	-	Back	0mm	Ant 2	ECI 6	18700	1860	1	22.47	23.60	1.297	-	-	0.11	2.250	2.919	0.198
	2nd	LTE Band 2	20M	QPSK	1	0	-	Back	0mm	Ant 2	ECI 6	18700	1860	1	22.45	23.60	1.303	-	-	0.03	2.140	2.789	
	1st	LTE Band 2	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	18900	1880	1	20.55	21.50	1.245	-	-	0.01	1.790	2.228	0.008
	2nd	LTE Band 2	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	18900	1880	1	20.41	21.50	1.285	-	-	0.02	1.730	2.224	
2600MHz																							
	1st	LTE Band 7	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	21350	2560	1	20.64	21.60	1.247	-	-	0.01	2.540	3.168	0.391
67	2nd	LTE Band 7	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	21350	2560	1	20.62	21.60	1.253	-	-	-0.02	2.310	2.895	
	1st	LTE Band 7	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	21100	2535	1	20.28	21.50	1.324	-	-	0.08	1.870	2.477	0.309
	2nd	LTE Band 7	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	21100	2535	1	20.25	21.50	1.334	-	-	0.08	1.730	2.307	
	1st	LTE Band 7	20M	QPSK	1	0	-	Back	0mm	Ant 0	ECI 6	21100	2535	1	21.27	22.50	1.327	-	-	-0.12	1.720	2.283	0.147
	2nd	LTE Band 7	20M	QPSK	1	0	-	Back	0mm	Ant 0	ECI 6	21100	2535	1	19.79	21.00	1.321	-	-	0.17	1.670	2.207	
	2nd	LTE Band 41	20M	QPSK	1	0	-	Back	0mm	Ant 2	ECI 6	40620	2593	1	22.61	24.00	1.377	62.9	1.006	-0.03	1.010	1.399	
	2nd	LTE Band 41	20M	QPSK	50	0	-	Back	0mm	Ant 2	ECI 6	40620	2593	1	21.56	23.00	1.393	62.9	1.006	-0.03	0.872	1.222	
	2nd	LTE Band 41	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	40620	2593	1	22.61	24.00	1.377	62.9	1.006	0.08	1.460	2.023	
	2nd	LTE Band 41	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	39750	2506	1	22.54	24.00	1.400	62.9	1.006	-0.07	1.790	2.520	
	2nd	LTE Band 41	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	40185	2549.5	1	22.43	24.00	1.435	62.9	1.006	0.05	1.930	2.787	
	2nd	LTE Band 41C	20M	QPSK	1	99	-	Bottom Side	0mm	Ant 2	ECI 6	40185+40383	2549.5+2569.3	1	22.41	24.00	1.442	62.9	1.006	0.15	1.850	2.684	
	2nd	LTE Band 41	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	41055	2636.5	1	22.56	24.00	1.393	62.9	1.006	-0.11	1.900	2.663	
	2nd	LTE Band 41	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	41490	2680	1	22.53	24.00	1.403	62.9	1.006	-0.12	1.840	2.597	
	2nd	LTE Band 41	20M	QPSK	50	0	-	Bottom Side	0mm	Ant 2	ECI 6	40620	2593	1	21.56	23.00	1.393	62.9	1.006	0.03	1.430	2.004	
	2nd	LTE Band 41	20M	QPSK	50	0	-	Bottom Side	0mm	Ant 2	ECI 6	39750	2506	1	21.51	23.00	1.409	62.9	1.006	-0.16	1.240	1.758	
	2nd	LTE Band 41	20M	QPSK	50	0	-	Bottom Side	0mm	Ant 2	ECI 6	40185	2549.5	1	21.47	23.00	1.422	62.9	1.006	-0.02	1.370	1.960	
	2nd	LTE Band 41	20M	QPSK	50	0	-	Bottom Side	0mm	Ant 2	ECI 6	41055	2636.5	1	21.45	23.00	1.429	62.9	1.006	0.15	1.060	1.524	



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2nd	LTE Band 41	20M	QPSK	50	0	-	Bottom Side	0mm	Ant 2	ECI 6	41490	2680	1	21.49	23.00	1.416	62.9	1.006	-0.09	1.160	1.652	
2nd	LTE Band 41	20M	QPSK	100	0	-	Bottom Side	0mm	Ant 2	ECI 6	40620	2593	1	21.41	23.00	1.442	62.9	1.006	0.11	1.410	2.046	
68	2nd	LTE Band 41 PC2	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	40185	2549.5	1	25.47	26.60	1.297	42.9	1.009	0.05	2.410	3.154
2nd	LTE Band 41 PC2	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	40185	2549.5	2	25.47	26.60	1.297	42.9	1.009	0.02	2.260	2.958	
2nd	LTE Band 41C PC2	20M	QPSK	1	99	-	Bottom Side	0mm	Ant 2	ECI 6	40185+40383	2549.5+2569.3	1	25.45	26.60	1.303	42.9	1.009	-0.09	2.190	2.880	
2nd	LTE Band 41	20M	QPSK	1	0	-	Back	6mm	Ant 2	ECI 4	40620	2593	1	22.61	24.00	1.377	62.9	1.006	0.08	0.412	0.571	
2nd	LTE Band 41 PC2	20M	QPSK	1	0	-	Back	6mm	Ant 2	ECI 4	40620	2593	1	25.56	27.00	1.393	42.9	1.009	0.01	0.521	0.732	
2nd	LTE Band 41	20M	QPSK	1	0	-	Bottom Side	12mm	Ant 2	ECI 4	40620	2593	1	22.61	24.00	1.377	62.9	1.006	0.03	0.235	0.326	
2nd	LTE Band 41 PC2	20M	QPSK	1	0	-	Bottom Side	12mm	Ant 2	ECI 4	40620	2593	1	25.56	27.00	1.393	42.9	1.009	-0.08	0.254	0.357	
2nd	LTE Band 41	20M	QPSK	1	0	-	Back	0mm	Ant 1	ECI 6	40620	2593	1	21.72	23.00	1.343	62.9	1.006	0.09	1.100	1.486	
2nd	LTE Band 41	20M	QPSK	50	0	-	Back	0mm	Ant 1	ECI 6	40620	2593	1	20.67	22.00	1.358	62.9	1.006	0.1	0.975	1.332	
2nd	LTE Band 41	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	40620	2593	1	21.72	23.00	1.343	62.9	1.006	-0.04	1.420	1.918	
2nd	LTE Band 41C	20M	QPSK	1	99	-	Top Side	0mm	Ant 1	ECI 6	40620+40818	2593+2612.8	1	21.61	23.00	1.377	62.9	1.006	-0.08	1.370	1.898	
2nd	LTE Band 41	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	39750	2506	1	21.65	23.00	1.365	62.9	1.006	0.15	1.350	1.853	
2nd	LTE Band 41	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	40185	2549.5	1	21.71	23.00	1.346	62.9	1.006	0.09	1.270	1.719	
2nd	LTE Band 41	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	41055	2636.5	1	21.68	23.00	1.355	62.9	1.006	-0.16	1.210	1.650	
2nd	LTE Band 41	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	41490	2680	1	21.70	23.00	1.349	62.9	1.006	0.05	1.180	1.601	
2nd	LTE Band 41	20M	QPSK	50	0	-	Top Side	0mm	Ant 1	ECI 6	40620	2593	1	20.67	22.00	1.358	62.9	1.006	0.08	1.070	1.462	
2nd	LTE Band 41	20M	QPSK	100	0	-	Top Side	0mm	Ant 1	ECI 6	40620	2593	1	20.65	22.00	1.365	62.9	1.006	-0.18	1.150	1.579	
2nd	LTE Band 41 PC2	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	40620	2593	1	24.59	26.00	1.384	42.9	1.009	-0.04	1.780	2.485	
2nd	LTE Band 41C PC2	20M	QPSK	1	99	-	Top Side	0mm	Ant 1	ECI 6	40620+40818	2593+2612.8	1	24.59	26.00	1.384	42.9	1.009	0.16	1.630	2.276	
2nd	LTE Band 38 Other PA	20M	QPSK	1	0	-	Top Side	0mm	Ant 1	ECI 6	38000	2595	1	22.82	24.00	1.312	62.9	1.006	-0.03	1.750	2.310	
2nd	LTE Band 41	20M	QPSK	1	0	-	Back	15mm	Ant 1	ECI 4	40620	2593	1	21.72	23.00	1.343	62.9	1.006	-0.08	0.137	0.185	
2nd	LTE Band 41 PC2	20M	QPSK	1	0	-	Back	15mm	Ant 1	ECI 4	40620	2593	1	24.59	26.00	1.384	42.9	1.009	0.1	0.156	0.218	
2nd	LTE Band 41	20M	QPSK	1	0	-	Top Side	13mm	Ant 1	ECI 4	40620	2593	1	21.72	23.00	1.343	62.9	1.006	-0.18	0.201	0.272	
2nd	LTE Band 41 PC2	20M	QPSK	1	0	-	Top Side	13mm	Ant 1	ECI 4	40620	2593	1	24.59	26.00	1.384	42.9	1.009	0.1	0.277	0.387	
2nd	LTE Band 41	20M	QPSK	1	0	-	Left Side	0mm	Ant 9	ECI 4	40620	2593	1	18.11	19.30	1.315	62.9	1.006	-0.16	1.860	2.461	
2nd	LTE Band 41	20M	QPSK	1	0	-	Left Side	0mm	Ant 9	ECI 4	40620	2593	2	18.11	19.30	1.315	62.9	1.006	0.03	1.750	2.315	
2nd	LTE Band 41C	20M	QPSK	1	99	-	Left Side	0mm	Ant 9	ECI 4	40620+40818	2593+2612.8	1	18.09	19.30	1.321	62.9	1.006	-0.03	1.750	2.326	
2nd	LTE Band 41	20M	QPSK	1	0	-	Left Side	0mm	Ant 9	ECI 4	39750	2506	1	18.05	19.30	1.334	62.9	1.006	0.01	0.985	1.321	
2nd	LTE Band 41	20M	QPSK	1	0	-	Left Side	0mm	Ant 9	ECI 4	40185	2549.5	1	18.09	19.30	1.321	62.9	1.006	-0.16	1.380	1.834	
2nd	LTE Band 41	20M	QPSK	1	0	-	Left Side	0mm	Ant 9	ECI 4	41055	2636.5	1	18.06	19.30	1.330	62.9	1.006	0.1	1.730	2.315	
2nd	LTE Band 41	20M	QPSK	1	0	-	Left Side	0mm	Ant 9	ECI 4	41490	2680	1	18.07	19.30	1.327	62.9	1.006	-0.04	1.400	1.870	
2nd	LTE Band 41	20M	QPSK	50	0	-	Left Side	0mm	Ant 9	ECI 4	40620	2593	1	18.09	19.30	1.321	62.9	1.006	-0.01	1.500	1.994	
2nd	LTE Band 41	20M	QPSK	50	0	-	Left Side	0mm	Ant 9	ECI 4	39750	2506	1	18.04	19.30	1.337	62.9	1.006	-0.11	0.833	1.120	
2nd	LTE Band 41	20M	QPSK	50	0	-	Left Side	0mm	Ant 9	ECI 4	40185	2549.5	1	18.05	19.30	1.334	62.9	1.006	-0.06	1.160	1.556	
2nd	LTE Band 41	20M	QPSK	50	0	-	Left Side	0mm	Ant 9	ECI 4	41055	2636.5	1	17.98	19.30	1.355	62.9	1.006	-0.15	1.390	1.895	
2nd	LTE Band 41	20M	QPSK	50	0	-	Left Side	0mm	Ant 9	ECI 4	41490	2680	1	18.03	19.30	1.340	62.9	1.006	0.03	1.120	1.509	
2nd	LTE Band 41	20M	QPSK	100	0	-	Left Side	0mm	Ant 9	ECI 4	40620	2593	1	18.08	19.30	1.324	62.9	1.006	-0.13	1.450	1.932	
2nd	LTE Band 41 PC2	20M	QPSK	1	0	-	Left Side	0mm	Ant 9	ECI 4	40620	2593	1	19.73	20.90	1.309	42.9	1.009	0.14	1.780	2.351	
2nd	LTE Band 41C PC2	20M	QPSK	1	99	-	Left Side	0mm	Ant 9	ECI 4	40620+40818	2593+2612.8	1	19.69	20.90	1.321	42.9	1.009	-0.15	1.620	2.160	
2nd	LTE Band 41	20M	QPSK	1	0	-	Back	0mm	Ant 0	ECI 6	40620	2593	1	19.98	21.00	1.265	62.9	1.006	0.11	1.280	1.629	
2nd	LTE Band 41C	20M	QPSK	1	99	-	Back	0mm	Ant 0	ECI 6	40620+40818	2593+2612.8	1	19.92	21.00	1.282	62.9	1.006	0.11	1.210	1.561	
2nd	LTE Band 41	20M	QPSK	1	0	-	Back	0mm	Ant 0	ECI 6	39750	2506	1	19.87	21.00	1.297	62.9	1.006	-0.13	1.170	1.527	
2nd	LTE Band 41	20M	QPSK	1	0	-	Back	0mm	Ant 0	ECI 6	40185	2549.5	1	19.86	21.00	1.300	62.9	1.006	0.12	1.110	1.452	
2nd	LTE Band 41	20M	QPSK	1	0	-	Back	0mm	Ant 0	ECI 6	41055	2636.5	1	19.92	21.00	1.282	62.9	1.006	-0.11	1.140	1.471	
2nd	LTE Band 41	20M	QPSK	1	0	-	Back	0mm	Ant 0	ECI 6	41490	2680	1	19.89	21.00	1.291	62.9	1.006	0.17	1.160	1.507	
2nd	LTE Band 41	20M	QPSK	50	0	-	Back	0mm	Ant 0	ECI 6	40620	2593	1	18.95	20.00	1.274	62.9	1.006	-0.16	1.130	1.448	
2nd	LTE Band 41	20M	QPSK	100	0	-	Back	0mm	Ant 0	ECI 6	40620	2680	1	18.93	20.00	1.279	62.9	1.006	-0.14	1.040	1.339	
2nd	LTE Band 41	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 0	ECI 6	40620	2680	1	19.98	21.00	1.265	62.9	1.006	-0.15	1.050	1.336	
2nd	LTE Band 41	20M	QPSK	50	0	-	Bottom Side	0mm	Ant 0	ECI 6	40620	2593	1	18.95	20.00	1.274	62.9	1.006	0.02	0.886	1.135	
2nd	LTE Band 41 PC2	20M	QPSK	1	0	-	Back	0mm	Ant 0	ECI 6	40620	2593	1	22.89	24.00	1.291	42.9	1.009	0.11	1.560	2.032	
2nd	LTE Band 41C PC2	20M	QPSK	1	99	-	Back	0mm	Ant 0	ECI 6	40620+40818	2593+2612.8	1	22.88	24.00	1.294	42.9	1.009	0.06	1.490	1.946	



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	2nd	LTE Band 38 Other PA	20M	QPSK	1	0	-	Back	0mm	Ant 0	ECI 6	38000	2595	1	21.78	23.00	1.324	62.9	1.006	-0.01	1.420	1.892	
	1st	FR1 n7	50M	QPSK	135	68	DFT-SCS-15KHz	Bottom Side	0mm	Ant 2	ECI 6	507000	2535	1	21.03	22.00	1.250	-	-	0.09	2.540	3.176	0.281
69	2nd	FR1 n7	50M	QPSK	135	68	DFT-SCS-15KHz	Bottom Side	0mm	Ant 2	ECI 6	507000	2535	1	21.01	22.00	1.256	-	-	0.08	2.370	2.977	
	1st	FR1 n7	50M	QPSK	135	68	DFT-SCS-15KHz	Top Side	0mm	Ant 1	ECI 6	507000	2535	1	20.23	21.10	1.222	-	-	-0.03	2.010	2.456	0.221
	2nd	FR1 n7	50M	QPSK	135	68	DFT-SCS-15KHz	Top Side	0mm	Ant 1	ECI 6	507000	2535	1	20.23	21.10	1.222	-	-	-0.03	1.910	2.334	
	2nd	FR1 n41	100M	QPSK	1	1	DFT-SCS-30KHz	Front	0mm	Ant 2	ECI 6	518598	2592.99	1	21.07	22.30	1.327	-	-	-0.17	1.100	1.460	0.039
	2nd	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Front	0mm	Ant 2	ECI 6	518598	2592.99	1	21.06	22.30	1.330	-	-	0.17	1.080	1.437	
	2nd	FR1 n41	100M	QPSK	1	1	DFT-SCS-30KHz	Back	0mm	Ant 2	ECI 6	518598	2592.99	1	21.07	22.30	1.327	-	-	-0.05	1.190	1.580	
	2nd	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Back	0mm	Ant 2	ECI 6	518598	2592.99	1	21.06	22.30	1.330	-	-	0.02	1.320	1.756	
	2nd	FR1 n41	100M	QPSK	1	1	DFT-SCS-30KHz	Bottom Side	0mm	Ant 2	ECI 6	518598	2592.99	1	21.07	22.30	1.327	-	-	0.01	2.360	3.133	
70	2nd	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Bottom Side	0mm	Ant 2	ECI 6	518598	2592.99	1	21.06	22.30	1.330	-	-	0.07	2.370	3.153	
	2nd	FR1 n41	100M	QPSK	270	0	DFT-SCS-30KHz	Bottom Side	0mm	Ant 2	ECI 6	518598	2592.99	1	21.03	22.30	1.340	-	-	0.1	1.940	2.599	
	2nd	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Front	6mm	Ant 2	ECI 4	518598	2592.99	1	22.63	24.00	1.371	-	-	-0.17	0.551	0.755	
	2nd	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Back	6mm	Ant 2	ECI 4	518598	2592.99	1	22.63	24.00	1.371	-	-	0.04	0.766	1.050	
	2nd	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Bottom Side	12mm	Ant 2	ECI 4	518598	2592.99	1	22.63	24.00	1.371	-	-	-0.01	0.470	0.644	
	1st	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Top Side	0mm	Ant 1	ECI 6	518598	2592.99	1	20.78	21.90	1.294	-	-	0.07	1.910	2.472	0.039
	2nd	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Top Side	0mm	Ant 1	ECI 6	518598	2592.99	1	20.75	21.90	1.303	-	-	-0.04	1.880	2.450	
	2nd	FR1 n41	100M	QPSK	1	1	DFT-SCS-30KHz	Left Side	0mm	Ant 9	ECI 4	518598	2592.99	1	17.75	18.80	1.274	-	-	0.16	1.710	2.178	0.667
	2nd	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Left Side	0mm	Ant 9	ECI 4	518598	2592.99	1	17.73	18.80	1.279	-	-	0.12	1.840	2.354	
	2nd	FR1 n41	100M	QPSK	270	0	DFT-SCS-30KHz	Left Side	0mm	Ant 9	ECI 4	518598	2592.99	1	17.71	18.80	1.285	-	-	-0.1	1.660	2.134	0.667
	1st	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Bottom Side	0mm	Ant 0	ECI 6	518598	2592.99	1	22.78	23.70	1.236	-	-	-0.15	2.570	3.176	
	2nd	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Bottom Side	0mm	Ant 0	ECI 6	518598	2592.99	1	22.85	23.70	1.216	-	-	0.02	2.240	2.724	0.667
	2nd	FR1 n41	100M	QPSK	135	69	DFT-SCS-30KHz	Bottom Side	0mm	Ant 0	ECI 6	518598	2592.99	2	22.85	23.70	1.216	-	-	0.03	2.150	2.615	
3500MHz																							
	1st	LTE Band 42	20M	QPSK	1	0	-	Left Side	0mm	Ant 7	ECI 6	42990	3540	1	20.04	21.30	1.337	62.9	1.006	0.07	1.830	2.461	0.368
71	2nd	LTE Band 42	20M	QPSK	1	0	-	Left Side	0mm	Ant 7	ECI 6	42990	3540	1	20.01	21.30	1.346	62.9	1.006	0.03	1.670	2.261	
	2nd	LTE Band 42	20M	QPSK	1	0	-	Left Side	0mm	Ant 7	ECI 6	42990	3540	2	20.01	21.30	1.346	62.9	1.006	0.07	1.520	2.058	0.009
	1st	LTE Band 42	20M	QPSK	1	0	-	Top Side	0mm	Ant 4	ECI 6	42590	3500	1	17.45	19.00	1.429	62.9	1.006	0.01	0.977	1.404	
	2nd	LTE Band 42	20M	QPSK	1	0	-	Top Side	0mm	Ant 4	ECI 6	42590	3500	1	17.38	19.00	1.452	62.9	1.006	-0.01	0.959	1.401	0.375
	2nd	LTE Band 42	20M	QPSK	1	0	-	Top Side	0mm	Ant 4	ECI 6	42590	3500	2	17.38	19.00	1.452	62.9	1.006	-0.01	0.944	1.379	
	1st	LTE Band 42	20M	QPSK	1	0	-	Right Side	0mm	Ant 8	ECI 4	42590	3500	1	22.38	24.00	1.452	62.9	1.006	0.08	1.490	2.177	0.375
	2nd	LTE Band 42	20M	QPSK	1	0	-	Right Side	0mm	Ant 8	ECI 4	42590	3500	1	22.42	24.00	1.439	62.9	1.006	-0.01	1.380	1.997	
	2nd	LTE Band 42	20M	QPSK	1	0	-	Right Side	0mm	Ant 8	ECI 4	42590	3500	2	22.42	24.00	1.439	62.9	1.006	0.05	1.270	1.838	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Back	0mm	Ant 7	ECI 6	556000	3840	1	18.86	20.10	1.330	-	-	0.08	1.450	1.929	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	0mm	Ant 7	ECI 6	556000	3840	1	18.83	20.10	1.340	-	-	0.01	1.340	1.795	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Left Side	0mm	Ant 7	ECI 6	556000	3840	1	18.86	20.10	1.330	-	-	-0.16	1.600	2.129	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Left Side	0mm	Ant 7	ECI 6	556000	3840	1	18.83	20.10	1.340	-	-	0.03	1.850	2.478	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Left Side	0mm	Ant 7	ECI 6	556000	3840	2	18.83	20.10	1.340	-	-	0.06	1.770	2.371	
	2nd	FR1 n77	100M	QPSK	270	0	DFT-SCS-30KHz	Left Side	0mm	Ant 7	ECI 6	556000	3840	1	18.79	20.10	1.352	-	-	0.05	1.810	2.447	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	15mm	Ant 7	ECI 4	556000	3840	1	25.75	27.00	1.334	-	-	0.05	0.988	1.318	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Left Side	11mm	Ant 7	ECI 4	556000	3840	1	25.75	27.00	1.334	-	-	0.01	1.230	1.640	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Back	0mm	Ant 4	ECI 6	556000	3840	1	20.42	21.30	1.225	-	-	0.01	0.891	1.091	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	0mm	Ant 4	ECI 6	556000	3840	1	20.40	21.30	1.230	-	-	-0.04	0.911	1.121	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Top Side	0mm	Ant 4	ECI 6	556000	3840	1	20.42	21.30	1.225	-	-	0.12	1.870	2.290	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Top Side	0mm	Ant 4	ECI 6	556000	3840	1	20.40	21.30	1.230	-	-	-0.01	1.990	2.448	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Top Side	0mm	Ant 4	ECI 6	556000	3840	2	20.40	21.30	1.230	-	-	0.09	1.830	2.251	
	2nd	FR1 n77	100M	QPSK	270	0	DFT-SCS-30KHz	Top Side	0mm	Ant 4	ECI 6	556000	3840	1	20.37	21.30	1.239	-	-	0.07	1.930	2.391	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	10mm	Ant 4	ECI 4	556000	3840	1	26.35	27.00	1.161	-	-	-0.13	1.210	1.405	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Top Side	11mm	Ant 4	ECI 4	556000	3840	1	26.35	27.00	1.161	-	-	-0.01	1.330	1.545	
72	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Right Side	0mm	Ant 8	ECI 4	556000	3840	1	23.26	24.80	1.426	-	-	-0.07	2.210	3.151	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Right Side	0mm	Ant 8	ECI 4	556000	3840	2	23.26	24.80	1.426	-	-	0.05	2.140	3.051	
	2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Right Side	0mm	Ant 8	ECI 4	556000	3840	1	23.24	24.80	1.432	-	-	-0.03	2.060	2.950	
	2nd	FR1 n77	100M	QPSK	270	0	DFT-SCS-30KHz	Right Side	0mm	Ant 8	ECI 4	556000	3840	1	23.19	24.80	1.449	-	-	0	2.150	3.115	
	2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Back	0mm	Ant 5	ECI 6	556000	3840	1	20.94	22.10	1.306	-	-	-0.05	0.719	0.939	
	2nd	FR1																					



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2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Right Side	0mm	Ant 5	ECI 6	556000	3840	1	20.93	22.10	1.309	-	-	0.06	1.870	2.448	
2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Right Side	0mm	Ant 5	ECI 6	556000	3840	2	20.93	22.10	1.309	-	-	0.02	1.820	2.383	
2nd	FR1 n77	100M	QPSK	270	0	DFT-SCS-30KHz	Right Side	0mm	Ant 5	ECI 6	556000	3840	1	20.89	22.10	1.321	-	-	0.07	1.760	2.325	
2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	10mm	Ant 5	ECI 4	556000	3840	1	26.37	27.00	1.156	-	-	0.19	0.354	0.409	
2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Right Side	12mm	Ant 5	ECI 4	556000	3840	1	26.37	27.00	1.156	-	-	0.13	0.321	0.371	

Plot No.	No.	Band	Mode	Test Position	Gap (mm)	Antenna	Power State	Ch.	Freq. (MHz)	Sample	Average Power (dBm)	Tune-Up Limit (dBm)	Tune-up Scaling Factor	Duty Cycle %	Duty Cycle Scaling Factor	Power Drift (dB)	Measured 10g SAR (W/kg)	Reported 10g SAR (W/kg)	Deviation
5000MHz																			
	1st	WLAN5.3GHz	802.11n-HT40 MCS0	Top Side	0mm	Ant 4	Standalone	54	5270	1	18.42	20.00	1.440	93.7	1.067	-0.01	0.926	1.423	0.584
73	2nd	WLAN5.3GHz	802.11n-HT40 MCS0	Top Side	0mm	Ant 4	Standalone	54	5270	1	18.45	20.00	1.429	93.7	1.067	0.12	0.827	1.261	
	2nd	WLAN5.3GHz	802.11n-HT40 MCS0	Top Side	0mm	Ant 4	Standalone	54	5270	2	18.45	20.00	1.429	93.7	1.067	0.05	0.816	1.244	
	1st	WLAN5.5GHz	802.11n-HT40 MCS0	Top Side	0mm	Ant 4	Standalone	142	5710	1	18.79	20.50	1.482	93.7	1.067	-0.04	1.100	1.739	0.616
74	2nd	WLAN5.5GHz	802.11n-HT40 MCS0	Top Side	0mm	Ant 4	Standalone	142	5710	1	18.78	20.50	1.486	93.7	1.067	0.08	0.964	1.528	
	2nd	WLAN5.5GHz	802.11n-HT40 MCS0	Top Side	0mm	Ant 4	Standalone	142	5710	2	18.78	20.50	1.486	93.7	1.067	0.04	0.952	1.509	

<NFC SAR>

Plot No.	No.	Band	Mode	Test Position	Gap (mm)	Freq. (MHz)	Sample	Power Drift (dB)	Measured 10g SAR (W/kg)	Reported 10g SAR (W/kg)	Deviation
	1st	NFC	ASK	Back	0mm	13.56	1	-0.01	0.033	0.033	0.561
75	2nd	NFC	ASK	Back	0mm	13.56	1	0.06	0.029	0.029	



17.5 Repeated SAR Measurement

<1g>

Plot No.	Band	BW (MHz)	Modulation	RB Size	RB offset	Mode	Test Position	Gap (mm)	Antenna	Power State	Ch.	Freq. (MHz)	Average Power (dBm)	Tune-Up Limit (dBm)	Tune-up Scaling Factor	Duty Cycle %	Duty Cycle Scaling Factor	Power Drift (dB)	Measured 1g SAR (W/kg)	Ratio	Reported 1g SAR (W/kg)
1st	WLAN2.4GHz	-	-	-	-	802.11b 1Mbps	Left Cheek	0mm	Ant 3	Standalone	1	2412	19.12	20.50	1.374	99.14	1.009	0.06	0.943	1	1.307
2nd	WLAN2.4GHz	-	-	-	-	802.11b 1Mbps	Left Cheek	0mm	Ant 3	Standalone	1	2412	19.12	20.50	1.374	99.14	1.009	0.02	0.928	1.016	1.287
1st	LTE Band 2	20M	QPSK	1	0	-	Bottom Side	5mm	Ant 2	ECI 7	18700	1860	18.51	19.70	1.315	-	-	0.12	0.956	1	1.257
2nd	LTE Band 2	20M	QPSK	1	0	-	Bottom Side	5mm	Ant 2	ECI 7	18700	1860	18.51	19.70	1.315	-	-	0.08	0.941	1.016	1.238
1st	LTE Band 42	20M	QPSK	1	0	-	Right Side	5mm	Ant 8	ECI 7	42590	3500	21.95	22.70	1.189	62.9	1.006	-0.08	0.923	1	1.104
2nd	LTE Band 42	20M	QPSK	1	0	-	Right Side	5mm	Ant 8	ECI 7	42590	3500	21.95	22.70	1.189	62.9	1.006	0.06	0.917	1.007	1.096
1st	GSM850	-	-	-	-	GPRS (3 Tx slots)	Back	5mm	Ant 0	ECI 3	251	848.8	29.07	30.00	1.239	-	-	-0.02	1.030	1	1.276
2nd	GSM850	-	-	-	-	GPRS (3 Tx slots)	Back	5mm	Ant 0	ECI 3	251	848.8	29.07	30.00	1.239	-	-	0.06	1.010	1.020	1.251
1st	LTE Band 41	20M	QPSK	1	0	-	Back	5mm	Ant 0	ECI 3	40620	2593	22.89	24.00	1.291	42.9	1.009	0.08	0.995	1	1.296
2nd	LTE Band 41	20M	QPSK	1	0	-	Back	5mm	Ant 0	ECI 3	40620	2593	22.89	24.00	1.291	42.9	1.009	0.03	0.982	1.013	1.279
1st	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	5mm	Ant 8	ECI 3	656000	3840	23.21	24.70	1.409	-	-	0.15	0.910	1	1.282
2nd	FR1 n77	100M	QPSK	135	69	DFT-SCS-30KHz	Back	5mm	Ant 8	ECI 3	656000	3840	23.21	24.70	1.409	-	-	0.05	0.903	1.008	1.273

<10g>

Plot No.	Band	BW (MHz)	Modulation	RB Size	RB offset	Mode	Test Position	Gap (mm)	Antenna	Power State	Ch.	Freq. (MHz)	Average Power (dBm)	Tune-Up Limit (dBm)	Tune-up Scaling Factor	Duty Cycle %	Duty Cycle Scaling Factor	Power Drift (dB)	Measured 10g SAR (W/kg)	Ratio	Reported 10g SAR (W/kg)
1st	WCDMA II	-	-	-	-	RMC 12.2Kbps	Bottom Side	0mm	Ant 2	ECI 6	9262	1852.4	21.59	22.80	1.321	-	-	0.17	2.410	1	3.184
2nd	WCDMA II	-	-	-	-	RMC 12.2Kbps	Bottom Side	0mm	Ant 2	ECI 6	9262	1852.4	21.59	22.80	1.321	-	-	0.03	2.350	1.026	3.105
1st	LTE Band 41	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	40185	2549.5	25.47	26.60	1.297	42.9	1.009	0.05	2.410	1	3.154
2nd	LTE Band 41	20M	QPSK	1	0	-	Bottom Side	0mm	Ant 2	ECI 6	40185	2549.5	25.47	26.60	1.297	42.9	1.009	-0.03	2.330	1.034	3.050
1st	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Right Side	0mm	Ant 8	ECI 4	656000	3840	23.26	24.80	1.426	-	-	-0.07	2.210	1	3.151
2nd	FR1 n77	100M	QPSK	1	1	DFT-SCS-30KHz	Right Side	0mm	Ant 8	ECI 4	656000	3840	23.26	24.80	1.426	-	-	0.02	2.130	1.038	3.037

General Note:

1. Per KDB 865664 D01v01r04, for each frequency band, repeated SAR measurement is required only when the measured SAR is $\geq 0.8\text{W/kg}$.
2. Per KDB 865664 D01v01r04, if the ratio among the repeated measurement is ≤ 1.2 and the measured SAR $< 1.45\text{W/kg}$, only one repeated measurement is required.
3. Per KDB 865664 D01v01r04, if the extremity repeated SAR is necessary, the same procedures should be adapted for measurements according to extremity and occupational exposure limits by applying a factor of 2.5 for extremity exposure and a factor of 5 for occupational exposure to the corresponding SAR thresholds.
4. The ratio is the difference in percentage between original and repeated *measured* SAR.
5. All measurement SAR result is scaled-up to account for tune-up tolerance and is compliant.

17.6 TDD LTE Linearity Data Analysis

General Note:

This device support Power Class 2 and Power Class 3 operations for LTE Band 41. The highest available duty cycle for Power Class 2 operation is 43.3% using UL-DL configuration 1. Per FCC Guidance based on the device behavior, all SAR tests were performed using Power Class 3. Power Class 2 is tested using the highest SAR test configuration in Power Class 3 for each LTE configuration and exposure condition combination, according to the highest time averaged power for all applicable uplink-downlink configurations in Power Class 2. When the reported SAR vs. output power is linearly scaled with < 10% discrepancy between power classes and all reported SAR are < 1.4 W/kg for 1g and < 3.5 W/kg for 10g, Separate SAR testing for Power Class 2 is not required.

LTE B41-Linearity Data for Head Ant 2			LTE B41-Linearity Data for Head Ant 1		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	24.00	27.00	Maximum Tune up Power (dBm)	21.50	23.10
Reported 1g SAR (W/kg)	0.087	0.119	Reported 1g SAR (W/kg)	0.883	0.877
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	159.00	217.01	Frame Averaged (mW)	89.41	88.41
Linearity SAR (W/kg)	0.119		Linearity SAR (W/kg)	0.873	
% deviation from expected linearity		0.22%	% deviation from expected linearity		0.45%
LTE B41-Linearity Data for Body-worn Ant 2			LTE B41-Linearity Data for Body-worn Ant 1		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	22.70	24.30	Maximum Tune up Power (dBm)	20.40	22.00
Reported 1g SAR (W/kg)	1.287	1.269	Reported 1g SAR (W/kg)	0.894	0.829
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	117.87	116.54	Frame Averaged (mW)	69.41	68.63
Linearity SAR (W/kg)	1.273		Linearity SAR (W/kg)	0.884	
% deviation from expected linearity		-0.28%	% deviation from expected linearity		-6.22%
LTE B41-Linearity Data for Hotspot Ant 2			LTE B41-Linearity Data for Hotspot Ant 1		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	21.20	22.80	Maximum Tune up Power (dBm)	19.00	20.60
Reported 1g SAR (W/kg)	1.075	1.023	Reported 1g SAR (W/kg)	0.630	0.602
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	83.45	82.51	Frame Averaged (mW)	50.28	49.72
Linearity SAR (W/kg)	1.063		Linearity SAR (W/kg)	0.623	
% deviation from expected linearity		-3.75%	% deviation from expected linearity		-3.36%
LTE B41-Linearity Data for Extremity Ant 2			LTE B41-Linearity Data for Extremity Ant 1		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	24.00	26.60	Maximum Tune up Power (dBm)	23.00	26.00
Reported 10g SAR (W/kg)	2.787	3.154	Reported 10g SAR (W/kg)	1.918	2.485
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	159.00	197.92	Frame Averaged (mW)	126.30	172.38
Linearity SAR (W/kg)	3.469		Linearity SAR (W/kg)	2.618	
% deviation from expected linearity		-9.08%	% deviation from expected linearity		-5.07%

LTE B41-Linearity Data for Head Ant 9			LTE B41-Linearity Data for Head Ant 0		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	21.40	23.00	Maximum Tune up Power (dBm)	21.00	24.00
Reported 1g SAR (W/kg)	0.898	0.867	Reported 1g SAR (W/kg)	0.041	0.059
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	87.38	86.39	Frame Averaged (mW)	79.69	108.76
Linearity SAR (W/kg)	0.888		Linearity SAR (W/kg)	0.056	
% deviation from expected linearity		-2.35%	% deviation from expected linearity		5.43%
LTE B41-Linearity Data for Body-worn Ant 9			LTE B41-Linearity Data for Body-worn Ant 0		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	19.00	20.60	Maximum Tune up Power (dBm)	21.00	24.00
Reported 1g SAR (W/kg)	0.892	0.877	Reported 1g SAR (W/kg)	1.027	1.296
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	50.28	49.72	Frame Averaged (mW)	79.69	108.76
Linearity SAR (W/kg)	0.882		Linearity SAR (W/kg)	1.402	
% deviation from expected linearity		-0.56%	% deviation from expected linearity		-7.54%
LTE B41-Linearity Data for Hotspot Ant 9			LTE B41-Linearity Data for Hotspot Ant 0		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	14.50	16.10	Maximum Tune up Power (dBm)	21.00	24.00
Reported 1g SAR (W/kg)	0.625	0.598	Reported 1g SAR (W/kg)	1.027	1.296
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	17.84	17.64	Frame Averaged (mW)	79.69	108.76
Linearity SAR (W/kg)	0.618		Linearity SAR (W/kg)	1.402	
% deviation from expected linearity		-3.23%	% deviation from expected linearity		-7.54%
LTE B41-Linearity Data for Extremity Ant 9			LTE B41-Linearity Data for Extremity Ant 0		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	19.30	20.90	Maximum Tune up Power (dBm)	21.00	24.00
Reported 10g SAR (W/kg)	2.461	2.351	Reported 10g SAR (W/kg)	1.629	2.032
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	53.88	53.27	Frame Averaged (mW)	79.69	108.76
Linearity SAR (W/kg)	2.433		Linearity SAR (W/kg)	2.223	
% deviation from expected linearity		-3.38%	% deviation from expected linearity		-8.61%

LTE B41-Linearity Data for Body-worn Ant 2			LTE B41-Linearity Data for Body-worn Ant 1		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	24.00	27.00	Maximum Tune up Power (dBm)	23.00	26.00
Reported 1g SAR (W/kg)	0.302	0.388	Reported 1g SAR (W/kg)	0.250	0.341
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	159.00	217.01	Frame Averaged (mW)	126.30	172.38
Linearity SAR (W/kg)	0.412		Linearity SAR (W/kg)	0.341	
% deviation from expected linearity		-5.87%	% deviation from expected linearity		-0.06%
LTE B41-Linearity Data for Extremity Ant 2			LTE B41-Linearity Data for Extremity Ant 1		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	24.00	27.00	Maximum Tune up Power (dBm)	23.00	26.00
Reported 10g SAR (W/kg)	0.571	0.732	Reported 10g SAR (W/kg)	0.272	0.387
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	159.00	217.01	Frame Averaged (mW)	126.30	172.38
Linearity SAR (W/kg)	0.779		Linearity SAR (W/kg)	0.371	
% deviation from expected linearity		-6.07%	% deviation from expected linearity		4.25%
LTE B41-Linearity Data for Body-worn Ant 9			LTE B41-Linearity Data for Body-worn Ant 0		
	LTE B41 (Power Class 3)	LTE B41 (Power Class 2)		LTE B41 (Power Class 3)	LTE B41 (Power Class 2)
Maximum Tune up Power (dBm)	19.30	20.90	Maximum Tune up Power (dBm)	21.00	24.00
Reported 1g SAR (W/kg)	0.311	0.320	Reported 1g SAR (W/kg)	0.097	0.135
Duty Cycle	63.30%	43.30%	Duty Cycle	63.30%	43.30%
Frame Averaged (mW)	53.88	53.27	Frame Averaged (mW)	79.69	108.76
Linearity SAR (W/kg)	0.307		Linearity SAR (W/kg)	0.132	
% deviation from expected linearity		4.07%	% deviation from expected linearity		1.97%

18. Simultaneous Transmission Analysis

No.	Simultaneous Transmission Configurations	Portable Handset			
		Head	Body-worn	Hotspot	Product specific 10g SAR
1.	WWAN + WLAN2.4GHz	Yes	Yes	Yes	Yes
2.	WWAN + WLAN5GHz	Yes	Yes	Yes	Yes
3.	WWAN + Bluetooth	Yes	Yes	Yes	Yes
4.	WLAN5GHz+ Bluetooth	Yes	Yes	Yes	Yes
5.	WWAN + WLAN5GHz+ Bluetooth	Yes	Yes	Yes	Yes
6.	WWAN + WLAN2.4GHz + NFC				Yes
7.	WWAN + WLAN5GHz + NFC				Yes
8.	WWAN + Bluetooth + NFC				Yes
9.	WLAN5GHz+ Bluetooth + NFC				Yes
10.	WWAN + WLAN5GHz+ Bluetooth + NFC				Yes

General Note:

- This device supports VoIP in GPRS, EGPRS, WCDMA, LTE and 5GNR (e.g. for 3rd-party VoIP), LTE supports VoLTE operation.
- WWAN above includes 5G NR bands and EN-DC combination.
- EUT will choose each GSM, WCDMA, LTE and 5GNR according to the network signal condition; therefore, they will not operate simultaneously at any moment.
- For EN-DC mode, MediaTek TA-SAR algorithm in WWAN adds directly the time-averaged RF exposure from 4G(LTE) and time-averaged RF exposure from 5G NR. TA-SAR algorithm controls the total RF exposure from both 4G and 5G NR to not exceed SAR exposure limit. Therefore, simultaneous transmission compliance between 4G+5G NR operation is demonstrated in the Part 2 Report during algorithm validation. In this Report, simultaneous transmission compliance was evaluated individually with other Radios (WLAN or BT) using one of 4G or 5G NR.
- This device 2.4GHz WLAN support hotspot operation and Bluetooth support tethering applications.
- This device 5.2GHz WLAN/5.8GHz WLAN support hotspot operation, and 5.2GHz WLAN/5.8GHz WLAN supports WLAN Direct (GC/GO), and 5.3GHz / 5.5GHz supports WLAN Direct (GC only).
- The worst case 5 GHz WLAN SAR for each configuration was used for SAR summation.
- According to the EUT characteristic, WLAN 5GHz and Bluetooth can transmit simultaneously.
- According to the EUT characteristic, WLAN 5GHz and WLAN 2.4GHz can't transmit simultaneously.
- According to the EUT characteristic, WLAN 2.4GHz and Bluetooth cannot transmit simultaneously.
- NFC can transmit simultaneously with other Radios in extremity exposure condition.
- For Headset SAR and non-Headset SAR always chose higher SAR to do co-located analysis.
- For distance SAR and non-distance SAR at extremity exposure conditions always chose higher SAR to do co-located analysis.
- For simultaneously analysis, since the SAR summation of 3 transmitters can cover others combination of 2 transmitters, therefore in this section did not additional to evaluate 2TX combination of simultaneously transmission.
- For standalone WWAN, always choose the highest SAR among all WWAN bands within the selected antenna for each exposure position to perform simultaneous transmission analysis with WLAN/BT together. This is the worst co-located analysis and can represent each band.
- The maximum SAR summation is calculated based on the same configuration and test position.
- Per KDB 447498 D01v06, simultaneous transmission SAR is compliant if,
 - 1g Scalar SAR summation < 1.6W/kg and 10g Scalar SAR summation < 4.0W/kg.
 - $SPLSR = (SAR1 + SAR2)^{1.5} / (\min. \text{ separation distance, mm})$, and the peak separation distance is determined from the square root of $[(x1-x2)^2 + (y1-y2)^2 + (z1-z2)^2]$, where (x1, y1, z1) and (x2, y2, z2) are the coordinates of the extrapolated peak SAR locations in the zoom scan.
 - If $SPLSR \leq 0.04$ for 1g SAR and $SPLSR \leq 0.10$ for 10g SAR, simultaneously transmission SAR measurement is not necessary.
 - Simultaneously transmission SAR measurement, and the reported multi-band 1g SAR < 1.6W/kg and 10g SAR < 4.0W/kg.
 - The SPLSR calculated results please refer to section 18.5.

18.1 5G NR + LTE + WLAN + BT Sim-Tx analysis

In 5G NR + LTE + WLAN + BT simultaneous transmission, 5G NR and LTE transmission are managed and controlled by MediaTek TA-SAR, while the RF exposure from WLAN and BT radios is managed using legacy approach, i.e., through a fixed power back-off if needed.

Since WLAN and BT do not employ time-averaging, 1gSAR and 10gSAR measurement for WLAN and BT need to be conducted at their corresponding rated power following current FCC test procedures to determine reported SAR values.

TA-SAR current implementation assumes hotspots from 5G NR and LTE are collocated. Therefore, for a total of 100% exposure margin, if LTE uses x, then the exposure margin left for 5G NR is capped to y. Thus, the compliance equation for LTE + 5G NR is

$$\begin{aligned} x \cdot A + y \cdot B + m &\leq 1 \\ x + y &= g \leq 1 \\ g + m &\leq 1 \end{aligned}$$

Where, A is normalized reported time-averaged SAR exposure ratio from LTE, and $A \leq 1.0$; B is normalized reported time-averaged exposure ratio from 5G NR (i.e., PD exposure for 5G FR2 or SAR exposure for 5G FR1), and $B \leq 1.0$.

Let m = normalized reported SAR exposure ratio from WLAN+BT, then for compliance,

$$x \cdot A + y \cdot B + m \leq 1.0 \quad (1)$$

$$x \cdot A + y \cdot B \leq x \cdot \max(A, B) + (g-x) \cdot \max(A, B) \leq \max(A, B)$$

$$x \cdot A + (g-x) \cdot B + m \leq \max(A, B) + m \leq 1.0 \quad (2)$$

If $A + m \leq 1.0$ and $B + m \leq 1.0$ can be proven, then " $x \cdot A + y \cdot B + m \leq 1.0$ ". Therefore simultaneous transmission analysis for 5G NR + LTE + WLAN + BT can be performed in two steps

Step 1: Prove total exposure ratio (TER) of LTE + WLAN + BT < 1

Step 2: Prove total exposure ratio (TER) of 5G NR + WLAN + BT < 1

Else, if $A + m > 1.0$ and/or $B + m > 1.0$, then the followings need to hold true for compliance:

- i. A and m are decoupled based on the SPLSR criteria, and
- ii. $y \cdot B + m \leq 1.0$, and
- iii. $x \cdot A + y \cdot B \leq 1.0$

Note iii. is covered in Part 2 report; i. and ii. should be addressed in Part 1 report.

Above analysis is also apply to LTE/NR inter-band uplink, LTE(NR)1 + LTE(NR)2 + WLAN + BT simultaneous transmission, so inter-band uplink CA no need to do additional simultaneously analysis again. Only required comply with total exposure ratio (TER) of LTE/NR + WLAN + BT < 1.

The device also enabled Mediatek's TA-SAR Gen2 algorithm to improve antenna performance by applying separate SAR budgets to each predefined antenna group. There are two predefined antenna groups of AG0, AG1, more detail as following table. Each antenna group is spatially separated to others. Simultaneous transmission analysis is performed per antenna group. Below analysis demonstrates the spatially separation of AG0, AG1, and the compliance between AG0 and BT/WLAN/NFC and between AG1 and BT/WLAN/NFC.

Thus, the concept was to split the SAR/TER on the transmitting RATs even they are transmitting on different antennas. Such approach is considered as a worst-case scenario in terms of transmitting power. Thus, to enhance the performance of the transmission power of RATs, consider the spatial properties of each antenna and the correlations between the antenna's transmissions.

SPLSR_Group (Antenna Group):

Antenna Group 0 (AG0)	ANT0 & ANT2& ANT8
Antenna Group 1 (AG1)	ANT1 & ANT4 & ANT5 & ANT7& ANT9

Note that WLAN/BT operations are not enabled with TA-SAR Gen2 feature.

The verification of spatial separation of the antenna groups is demonstrated through the following steps, together with WIF/BT simultaneous transmission analysis results.

- i) The highest reported SAR at Plimit (or Pmax when Plimit > Pmax) for each antenna should be obtained out of all supported technologies and frequency bands for each power index. Demonstrate that the sum of reported SAR of one antenna from each of the antenna groups and the sum of RF exposure from all supported radios outside of TAS feature should be less than the regulatory limit as given below for each power index.
- ii) If the sum of SAR from step i) is over 1.6 W/kg for 1g, demonstrate for a given power index that every antenna from one antenna group meets SPLSR criteria with every antenna in another antenna group for all frequency bands. SPLSR criteria must be demonstrated for all antenna pair combinations irrespective of supported simultaneous transmission scenarios, SPLSR Hotspot combination procedure (Hybrid SPLSR) also be considered for simultaneous transmission analysis.
- iii) If SPLSR evaluation and analysis is needed to determine compliance for a certain power index configuration, SPLSR is performed by taking the highest summation SAR for each of the supported technologies and bands per antenna, along with the minimum of peak SAR location distance. The minimum of peak location distance is documented in the Highest Report SAR and Hotspot Location below for each power index configuration.
- iv) In section 18.5 SPLSR analysis only evaluation Sim-Tx SAR configuration are rounded to two decimal higher or equal to 1.6W/kg.
- v) The analysis addresses the simultaneous transmission and the transition among non-simultaneous transmission radios

For summed SAR results and SPLSR detailed analysis, please refer to section 18.2/18.3 / 18.4 / 18.5 of this report. All of the combinations of sub6 antenna groups are sufficient to show that AG0 is mutually exclusive from AG1 and that simultaneous transmission cases will not exceed the SAR limit and therefore no measured volumetric simultaneous SAR summation is required per FCC KDB Publication 447498 D01v06 and IEEE 1528- 2013 Section 6.3.4.1.

Conclusion:

1. The Spot check results from chapter 17.1 to 17.4, showed that Deviation of the SAR results did not exceed 3 dB, SAR data reuse is justified.
2. For simultaneously transmission SAR analysis, Simultaneous transmission analysis for the WWAN/WLAN/BT bands and each position are based on max SAR results chosen between the original SAR results (Sporton SAR report no.: FA4D1311) and Spot check results.

18.2 Head Exposure Conditions

General Note: The unit of SAR evaluation is W/kg.

Simultaneous Transmission Evaluation of WWAN+WLAN+BT:

<AG0 maximum reported SAR>:

Test Position	Ant0	Ant2	Ant8	MAX
Right Cheek	0.190	0.225	0.553	0.553
Right Tilted	0.110	0.123	0.192	0.192
Left Cheek	0.267	0.189	0.304	0.304
Left Tilted	0.157	0.123	0.331	0.331

<AG1 maximum reported SAR>:

Test Position	Ant1	Ant4	Ant5	Ant7	Ant9	MAX
Right Cheek	0.886	0.576	0.213	0.893	0.898	0.898
Right Tilted	0.893	0.795	0.191	0.393	0.186	0.893
Left Cheek	0.603	0.721	0.878	0.217	0.746	0.878
Left Tilted	0.709	0.893	0.475	0.153	0.112	0.893

<WLAN2.4GHz/5GHz+BT Worse-case SAR>:

NO	1	2	3	2+3	WLAN+BT worse case
Test Position	WLAN2.4GHz Ant3	WLAN5GHz Ant4	BT Ant3		
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	Summed 1g SAR (W/kg)	Summed 1g SAR (W/kg)
Right Cheek	0.199	0.199	0.131	0.330	0.330
Right Tilted	0.206	0.214	0.158	0.372	0.372
Left Cheek	0.386	0.397	0.284	0.681	0.681
Left Tilted	0.278	0.340	0.256	0.596	0.596

<Simultaneous Transmission analysis of AG0 + AG1 + WLAN+BT Worse-case>:

Test Position	AG1	AG0	WLAN/BT worst case	AG1+AG0+WLAN +BT worse case
	1g SAR (W/kg)	1g SAR (W/kg)	Summed 1g SAR (W/kg)	Summed 1g SAR (W/kg)
Right Cheek	0.898	0.553	0.330	1.78
Right Tilted	0.893	0.192	0.372	1.46
Left Cheek	0.878	0.304	0.681	1.86
Left Tilted	0.893	0.331	0.596	1.82

Note: The results marked yellow in above table refers to the detailed analysis corresponding to each position below tables.

Right Cheek					
Ant combination	AG0	AG1	WLAN/BT worst case	AG1+AG0+WLAN +BT worst case	Note
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	
Ant0-Ant1	0.190	0.886	0.330	1.41	-
Ant0-Ant4	0.190	0.576	0.330	1.10	-
Ant0-Ant5	0.190	0.213	0.330	0.73	-
Ant0-Ant7	0.190	0.893	0.330	1.41	-
Ant0-Ant9	0.190	0.898	0.330	1.42	-
Ant2-Ant1	0.225	0.886	0.330	1.44	-
Ant2-Ant4	0.225	0.576	0.330	1.13	-
Ant2-Ant5	0.225	0.213	0.330	0.77	-
Ant2-Ant7	0.225	0.893	0.330	1.45	-
Ant2-Ant9	0.225	0.898	0.330	1.45	-
Ant8-Ant1	0.553	0.886	0.330	1.77	Case 1
Ant8-Ant4	0.553	0.576	0.330	1.46	-
Ant8-Ant5	0.553	0.213	0.330	1.10	-
Ant8-Ant7	0.553	0.893	0.330	1.78	Case 2
Ant8-Ant9	0.553	0.898	0.330	1.78	Case 3

Left Cheek					
Ant combination	AG0	AG1	WLAN/BT worst case	AG1+AG0+WLAN +BT worst case	Note
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	
Ant0-Ant1	0.267	0.603	0.681	1.55	-
Ant0-Ant4	0.267	0.721	0.681	1.67	Case 4
Ant0-Ant5	0.267	0.878	0.681	1.83	Case 5
Ant0-Ant7	0.267	0.217	0.681	1.17	-
Ant0-Ant9	0.267	0.746	0.681	1.69	Case 6
Ant2-Ant1	0.189	0.603	0.681	1.47	-
Ant2-Ant4	0.189	0.721	0.681	1.59	-
Ant2-Ant5	0.189	0.878	0.681	1.75	Case 8
Ant2-Ant7	0.189	0.217	0.681	1.09	-
Ant2-Ant9	0.189	0.746	0.681	1.62	Case 9
Ant8-Ant1	0.304	0.603	0.681	1.59	-
Ant8-Ant4	0.304	0.721	0.681	1.71	Case 10
Ant8-Ant5	0.304	0.878	0.681	1.86	Case 11
Ant8-Ant7	0.304	0.217	0.681	1.20	-
Ant8-Ant9	0.304	0.746	0.681	1.73	Case 12

Left Tilted					
Ant combination	AG0	AG1	WLAN/BT worst case	AG1+AG0+WLAN +BT worst case	Note
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	
Ant0-Ant1	0.157	0.709	0.596	1.46	-
Ant0-Ant4	0.157	0.893	0.596	1.65	Case 13
Ant0-Ant5	0.157	0.475	0.596	1.23	-
Ant0-Ant7	0.157	0.153	0.596	0.91	-
Ant0-Ant9	0.157	0.112	0.596	0.87	-
Ant2-Ant1	0.123	0.709	0.596	1.43	-
Ant2-Ant4	0.123	0.893	0.596	1.61	Case 15
Ant2-Ant5	0.123	0.475	0.596	1.19	-
Ant2-Ant7	0.123	0.153	0.596	0.87	-
Ant2-Ant9	0.123	0.112	0.596	0.83	-
Ant8-Ant1	0.331	0.709	0.596	1.64	Case 14
Ant8-Ant4	0.331	0.893	0.596	1.82	Case 16
Ant8-Ant5	0.331	0.475	0.596	1.40	-
Ant8-Ant7	0.331	0.153	0.596	1.08	-
Ant8-Ant9	0.331	0.112	0.596	1.04	-

<Simultaneous Transmission analysis of WLAN/BT only without WWAN>:

NO	1	2	1+2
Test Position	WLAN5GHz Ant4	BT Ant3	
	1g SAR (W/kg)	1g SAR (W/kg)	Summed 1g SAR (W/kg)
Right Cheek	0.534	0.212	0.75
Right Tilted	0.615	0.278	0.89
Left Cheek	1.117	0.454	1.57
Left Tilted	0.866	0.417	1.28

18.3 Hotspot Exposure Conditions

General Note: The unit of SAR evaluation is W/kg.

Simultaneous Transmission Evaluation of WWAN+WLAN+BT:

<AG0 maximum reported SAR>:

Test Position	Ant0	Ant2	Ant8	MAX
Front	0.945	0.939	0.592	0.945
Back	1.298	1.005	1.045	1.298
Left Side	0.940	0.276	0.042	0.940
Right Side	0.103	0.341	1.297	1.297
Top Side				0.000
Bottom Side	1.293	1.291	0.390	1.293

<AG1 maximum reported SAR>:

Test Position	Ant1	Ant4	Ant5	Ant7	Ant9	MAX
Front	0.285	0.171	0.231	0.271	0.202	0.285
Back	0.626	0.357	0.588	0.620	0.353	0.626
Left Side	0.270	0.050	0.034	0.621	0.627	0.627
Right Side	0.056	0.027	0.627	0.018		0.627
Top Side	0.583	0.627	0.128	0.069	0.012	0.627
Bottom Side						0.000

<WLAN2.4GHz/5GHz+BT Worse-case SAR>:

NO	1	2	3	2+3	WLAN+BT worse case
Test Position	WLAN2.4GHz Ant3	WLAN5GHz Ant4	BT Ant3	Summed 1g SAR (W/kg)	Summed 1g SAR (W/kg)
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)		
Front	0.460	0.434	0.188	0.622	0.622
Back	0.624	0.614	0.304	0.918	0.918
Left Side	0.065	0.066		0.066	0.066
Right Side	0.262	0.268	0.101	0.369	0.369
Top Side	0.610	0.580	0.297	0.877	0.877
Bottom Side				0.000	0.000

<Simultaneous Transmission analysis of AG0 + AG1 + WLAN+BT Worse-case>:

Test Position	AG1	AG0	WLAN/BT worst case	AG1+AG0+WLAN +BT worse case
	1g SAR (W/kg)	1g SAR (W/kg)	Summed 1g SAR (W/kg)	Summed 1g SAR (W/kg)
Front	0.285	0.945	0.622	1.85
Back	0.626	1.298	0.918	2.84
Left Side	0.627	0.940	0.066	1.63
Right Side	0.627	1.297	0.369	2.29
Top Side	0.627		0.877	1.50
Bottom Side		1.293		1.29

Note: The results marked yellow in above table refers to the detailed analysis corresponding to each position below tables.

Front					
Ant combination	AG0	AG1	WLAN/BT worst case	AG1+AG0+WLAN +BT worst case	Note
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	
Ant0-Ant1	0.945	0.285	0.622	1.85	Case 1
Ant0-Ant4	0.945	0.171	0.622	1.74	Case 2
Ant0-Ant5	0.945	0.231	0.622	1.80	Case 3
Ant0-Ant7	0.945	0.271	0.622	1.84	Case 4
Ant0-Ant9	0.945	0.202	0.622	1.77	Case 5
Ant2-Ant1	0.939	0.285	0.622	1.85	Case 6
Ant2-Ant4	0.939	0.171	0.622	1.73	Case 7
Ant2-Ant5	0.939	0.231	0.622	1.79	Case 8
Ant2-Ant7	0.939	0.271	0.622	1.83	Case 9
Ant2-Ant9	0.939	0.202	0.622	1.76	Case 10
Ant8-Ant1	0.592	0.285	0.622	1.50	-
Ant8-Ant4	0.592	0.171	0.622	1.39	-
Ant8-Ant5	0.592	0.231	0.622	1.45	-
Ant8-Ant7	0.592	0.271	0.622	1.49	-
Ant8-Ant9	0.592	0.202	0.622	1.42	-

Back					
Ant combination	AG0	AG1	WLAN/BT worst case	AG1+AG0+WLAN +BT worst case	Note
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	
Ant0-Ant1	1.298	0.626	0.918	2.84	Case 11
Ant0-Ant4	1.298	0.357	0.918	2.57	Case 12
Ant0-Ant5	1.298	0.588	0.918	2.80	Case 13
Ant0-Ant7	1.298	0.620	0.918	2.84	Case 14
Ant0-Ant9	1.298	0.353	0.918	2.57	Case 15
Ant2-Ant1	1.005	0.626	0.918	2.55	Case 16
Ant2-Ant4	1.005	0.357	0.918	2.28	Case 17
Ant2-Ant5	1.005	0.588	0.918	2.51	Case 18
Ant2-Ant7	1.005	0.620	0.918	2.54	Case 19
Ant2-Ant9	1.005	0.353	0.918	2.28	Case 20
Ant8-Ant1	1.045	0.626	0.918	2.59	Case 21
Ant8-Ant4	1.045	0.357	0.918	2.32	Case 22
Ant8-Ant5	1.045	0.588	0.918	2.55	Case 23
Ant8-Ant7	1.045	0.620	0.918	2.58	Case 24
Ant8-Ant9	1.045	0.353	0.918	2.32	Case 25

Left Side					
Ant combination	AG0	AG1	WLAN/BT worst case	AG1+AG0+WLAN +BT worst case	Note
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	
Ant0-Ant1	0.940	0.270	0.066	1.28	-
Ant0-Ant4	0.940	0.050	0.066	1.06	-
Ant0-Ant5	0.940	0.034	0.066	1.04	-
Ant0-Ant7	0.940	0.621	0.066	1.63	Case 26
Ant0-Ant9	0.940	0.627	0.066	1.63	Case 27
Ant2-Ant1	0.276	0.270	0.066	0.61	-
Ant2-Ant4	0.276	0.050	0.066	0.39	-
Ant2-Ant5	0.276	0.034	0.066	0.38	-
Ant2-Ant7	0.276	0.621	0.066	0.96	-
Ant2-Ant9	0.276	0.627	0.066	0.97	-
Ant8-Ant1	0.042	0.270	0.066	0.38	-
Ant8-Ant4	0.042	0.050	0.066	0.16	-
Ant8-Ant5	0.042	0.034	0.066	0.14	-
Ant8-Ant7	0.042	0.621	0.066	0.73	-
Ant8-Ant9	0.042	0.627	0.066	0.74	-

Right Side					
Ant combination	AG0	AG1	WLAN/BT worst case	AG1+AG0+WLAN +BT worst case	Note
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	
Ant0-Ant1	0.103	0.056	0.369	0.53	-
Ant0-Ant4	0.103	0.027	0.369	0.50	-
Ant0-Ant5	0.103	0.627	0.369	1.10	-
Ant0-Ant7	0.103	0.018	0.369	0.49	-
Ant0-Ant9	0.103		0.369	0.47	-
Ant2-Ant1	0.341	0.056	0.369	0.77	-
Ant2-Ant4	0.341	0.027	0.369	0.74	-
Ant2-Ant5	0.341	0.627	0.369	1.34	-
Ant2-Ant7	0.341	0.018	0.369	0.73	-
Ant2-Ant9	0.341		0.369	0.71	-
Ant8-Ant1	1.297	0.056	0.369	1.72	Case 28
Ant8-Ant4	1.297	0.027	0.369	1.69	Case 29
Ant8-Ant5	1.297	0.627	0.369	2.29	Case 30
Ant8-Ant7	1.297	0.018	0.369	1.68	Case 31
Ant8-Ant9	1.297		0.369	1.67	Case 32

18.4 Body-Worn Accessory Exposure Conditions

General Note: The unit of SAR evaluation is W/kg.

Simultaneous Transmission Evaluation of WWAN+WLAN+BT:

<AG0 maximum reported SAR>:

Test Position	Ant0	Ant2	Ant8	MAX
Front	0.986	1.195	0.784	1.195
Back	1.298	1.289	1.282	1.298

<AG1 maximum reported SAR>:

Test Position	Ant1	Ant4	Ant5	Ant7	Ant9	MAX
Front	0.401	0.421	0.422	0.466	0.500	0.500
Back	0.894	0.896	0.888	0.895	0.892	0.896

<WLAN2.4GHz/5GHz+BT Worse-case SAR>:

NO	1	2	3	2+3	WLAN+BT worse case
Test Position	WLAN2.4GHz Ant3	WLAN5GHz Ant4	BT Ant3		
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	Summed 1g SAR (W/kg)	Summed 1g SAR (W/kg)
Front	0.280	0.391	0.188	0.579	0.579
Back	0.391	0.384	0.304	0.688	0.688

<Simultaneous Transmission analysis of AG0 + AG1 + WLAN+BT Worse-case>:

Test Position	AG1	AG0	WLAN/BT worst case	AG1+AG0+WLAN +BT worse case
	1g SAR (W/kg)	1g SAR (W/kg)	Summed 1g SAR (W/kg)	Summed 1g SAR (W/kg)
Front	0.500	1.195	0.579	2.27
Back	0.896	1.298	0.688	2.88

Note: The results marked yellow in above table refers to the detailed analysis corresponding to each position below tables.

Front					
Ant combination	AG0	AG1	WLAN/BT worst case	AG1+AG0+WLAN +BT worst case	Note
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	
Ant0-Ant1	0.986	0.401	0.579	1.97	Case 1
Ant0-Ant4	0.986	0.421	0.579	1.99	Case 2
Ant0-Ant5	0.986	0.422	0.579	1.99	Case 3
Ant0-Ant7	0.986	0.466	0.579	2.03	Case 4
Ant0-Ant9	0.986	0.500	0.579	2.07	Case 5
Ant2-Ant1	1.195	0.401	0.579	2.18	Case 6
Ant2-Ant4	1.195	0.421	0.579	2.20	Case 7
Ant2-Ant5	1.195	0.422	0.579	2.20	Case 8
Ant2-Ant7	1.195	0.466	0.579	2.24	Case 9
Ant2-Ant9	1.195	0.500	0.579	2.27	Case 10
Ant8-Ant1	0.784	0.401	0.579	1.76	Case 11
Ant8-Ant4	0.784	0.421	0.579	1.78	Case 12
Ant8-Ant5	0.784	0.422	0.579	1.79	Case 13
Ant8-Ant7	0.784	0.466	0.579	1.83	Case 14
Ant8-Ant9	0.784	0.500	0.579	1.86	Case 15

Back					
Ant combination	AG0	AG1	WLAN/BT worst case	AG1+AG0+WLAN +BT worst case	Note
	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	1g SAR (W/kg)	
Ant0-Ant1	1.298	0.894	0.688	2.88	Case 16
Ant0-Ant4	1.298	0.896	0.688	2.88	Case 17
Ant0-Ant5	1.298	0.888	0.688	2.87	Case 18
Ant0-Ant7	1.298	0.895	0.688	2.88	Case 19
Ant0-Ant9	1.298	0.892	0.688	2.88	Case 20
Ant2-Ant1	1.289	0.894	0.688	2.87	Case 21
Ant2-Ant4	1.289	0.896	0.688	2.87	Case 22
Ant2-Ant5	1.289	0.888	0.688	2.87	Case 23
Ant2-Ant7	1.289	0.895	0.688	2.87	Case 24
Ant2-Ant9	1.289	0.892	0.688	2.87	Case 25
Ant8-Ant1	1.282	0.894	0.688	2.86	Case 26
Ant8-Ant4	1.282	0.896	0.688	2.87	Case 27
Ant8-Ant5	1.282	0.888	0.688	2.86	Case 28
Ant8-Ant7	1.282	0.895	0.688	2.87	Case 29
Ant8-Ant9	1.282	0.892	0.688	2.86	Case 30

<Simultaneous Transmission analysis of WLAN/BT only without WWAN>:

NO	1	2	1+2
Test Position	WLAN5GHz Ant4	BT Ant3	
	1g SAR (W/kg)	1g SAR (W/kg)	Summed 1g SAR (W/kg)
Front	0.877	0.188	1.07
Back	1.032	0.304	1.34

<Sensor off>

General Note: The unit of SAR evaluation is W/kg.

Simultaneous Transmission Evaluation of WWAN+WLAN+BT:
<AG0 maximum reported SAR>:

Test Position	Ant0	Ant2	Ant8	MAX
Front	0.250	0.542	0.296	0.542
Back	0.294	0.660	0.378	0.660

<AG1 maximum reported SAR>:

Test Position	Ant1	Ant4	Ant5	Ant7	Ant9	MAX
Front	0.358	0.377	0.422	0.348	0.269	0.422
Back	0.596	0.610	0.550	0.427	0.320	0.610

<WLAN2.4GHz/5GHz/BT Worse-case SAR

NO	1	2	WLAN/BT worse case
Test Position	WLAN2.4GHz Ant3	WLAN5GHz Ant4	
	1g SAR (W/kg)	1g SAR (W/kg)	Summed 1g SAR (W/kg)
Front	0.125	0.247	0.247
Back	0.103	0.305	0.305

<Simultaneous Transmission analysis of AG0 + AG1 + WLAN/BT Worse-case>:

Test Position	AG1	AG0	WLAN/BT worst case	AG1+AG0+WLAN /BT worse case
	1g SAR (W/kg)	1g SAR (W/kg)	Summed 1g SAR (W/kg)	Summed 1g SAR (W/kg)
Front	0.422	0.542	0.247	1.21
Back	0.610	0.660	0.305	1.58

18.5 Product specific 10g SAR Exposure Conditions

Remark:

- For Bluetooth Product specific 10g stand-alone SAR is not required for a transmitter or antenna, due to 1g hotspot SAR is <1.2W/kg.

General Note: The unit of SAR evaluation is W/kg.

Simultaneous Transmission Evaluation of WWAN+WLAN+BT+NFC:
<AG0 maximum reported SAR>:

Test Position	Ant0	Ant2	Ant8	MAX
Front	2.534	3.165		3.165
Back	3.115	3.170	1.427	3.170
Left Side				0.000
Right Side			3.151	3.151
Top Side				0.000
Bottom Side	3.176	3.196		3.196

<AG1 maximum reported SAR>:

Test Position	Ant1	Ant4	Ant5	Ant7	Ant9	MAX
Front						0.000
Back	2.135	1.121	0.939	1.994		2.135
Left Side				2.478	2.461	2.478
Right Side			2.448			2.448
Top Side	2.485	2.448				2.485
Bottom Side						0.000

<WLAN2.4GHz/5GHz/BT Worse-case SAR>

NO	2	WLAN/BT worse case
Test Position	WLAN5GHz Ant4	
	10g SAR (W/kg)	Summed 10g SAR (W/kg)
Front	0.909	0.909
Back	0.293	0.293
Left Side	0.055	0.055
Right Side	0.344	0.344
Top Side	0.995	0.995
Bottom Side		0.000

<Simultaneous Transmission analysis of AG0 + AG1 + WLAN/BT Worse-case+NFC>:

Test Position	AG1	AG0	WLAN/BT worse case	NFC	AG1+AG0+WLAN /BT worse case+NFC
	10g SAR (W/kg)	10g SAR (W/kg)	Summed 10g SAR (W/kg)	10g SAR (W/kg)	Summed 10g SAR (W/kg)
Front	0.000	3.165	0.909	0.001	4.08
Back	2.135	3.170	0.293	0.033	5.63
Left Side	2.478	0.000	0.055	0.001	2.53
Right Side	2.448	3.151	0.344	0.001	5.94
Top Side	2.485	0.000	0.995	0.001	3.48
Bottom Side	0.000	3.196	0.000	0.001	3.20

Note: The results marked yellow in above table refers to the detailed analysis corresponding to each position below tables.

Front						
Ant combination	AG0	AG1	WLAN/BT worse case	NFC	AG1+AG0+WLAN /BT worse case+NFC	Note
	10g SAR (W/kg)	10g SAR (W/kg)	10g SAR (W/kg)	10g SAR (W/kg)	10g SAR (W/kg)	
Ant0-Ant1	2.534		0.909	0.001	3.44	-
Ant0-Ant4	2.534		0.909	0.001	3.44	-
Ant0-Ant5	2.534		0.909	0.001	3.44	-
Ant0-Ant7	2.534		0.909	0.001	3.44	-
Ant0-Ant9	2.534		0.909	0.001	3.44	-
Ant2-Ant1	3.165		0.909	0.001	4.08	Case 1
Ant2-Ant4	3.165		0.909	0.001	4.08	Case 1
Ant2-Ant5	3.165		0.909	0.001	4.08	Case 1
Ant2-Ant7	3.165		0.909	0.001	4.08	Case 1
Ant2-Ant9	3.165		0.909	0.001	4.08	Case 1
Ant8-Ant1			0.909	0.001	0.91	-
Ant8-Ant4			0.909	0.001	0.91	-
Ant8-Ant5			0.909	0.001	0.91	-
Ant8-Ant7			0.909	0.001	0.91	-
Ant8-Ant9			0.909	0.001	0.91	-

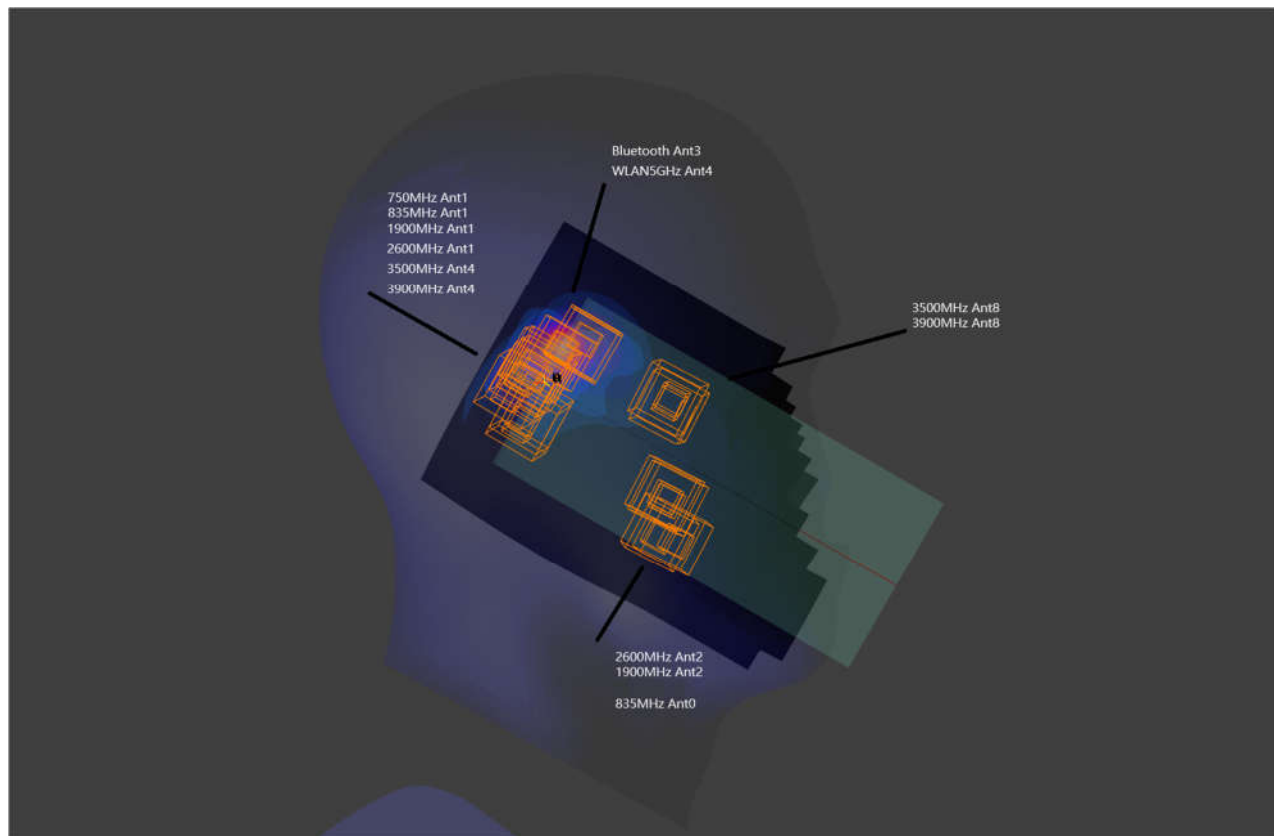
Back						
Ant combination	AG0	AG1	WLAN/BT worse case	NFC	AG1+AG0+WLAN /BT worse case+NFC	Note
	10g SAR (W/kg)	10g SAR (W/kg)	10g SAR (W/kg)	10g SAR (W/kg)	10g SAR (W/kg)	
Ant0-Ant1	3.115	2.135	0.293	0.033	5.58	Case 2
Ant0-Ant4	3.115	1.121	0.293	0.033	4.56	Case 3
Ant0-Ant5	3.115	0.939	0.293	0.033	4.38	Case 4
Ant0-Ant7	3.115	1.994	0.293	0.033	5.44	Case 5
Ant0-Ant9	3.115		0.293	0.033	3.44	-
Ant2-Ant1	3.170	2.135	0.293	0.033	5.63	Case 7
Ant2-Ant4	3.170	1.121	0.293	0.033	4.62	Case 8
Ant2-Ant5	3.170	0.939	0.293	0.033	4.44	Case 9
Ant2-Ant7	3.170	1.994	0.293	0.033	5.49	Case 10
Ant2-Ant9	3.170		0.293	0.033	3.50	-
Ant8-Ant1	1.427	2.135	0.293	0.033	3.89	-
Ant8-Ant4	1.427	1.121	0.293	0.033	2.87	-
Ant8-Ant5	1.427	0.939	0.293	0.033	2.69	-
Ant8-Ant7	1.427	1.994	0.293	0.033	3.75	-
Ant8-Ant9	1.427		0.293	0.033	1.75	-

Right Side						
Ant combination	AG0	AG1	WLAN/BT worse case	NFC	AG1+AG0+WLAN /BT worse case+NFC	Note
	10g SAR (W/kg)	10g SAR (W/kg)	10g SAR (W/kg)	10g SAR (W/kg)	10g SAR (W/kg)	
Ant0-Ant1			0.344	0.001	0.35	-
Ant0-Ant4			0.344	0.001	0.35	-
Ant0-Ant5		2.448	0.344	0.001	2.79	-
Ant0-Ant7			0.344	0.001	0.35	-
Ant0-Ant9			0.344	0.001	0.35	-
Ant2-Ant1			0.344	0.001	0.35	-
Ant2-Ant4			0.344	0.001	0.35	-
Ant2-Ant5		2.448	0.344	0.001	2.79	-
Ant2-Ant7			0.344	0.001	0.35	-
Ant2-Ant9			0.344	0.001	0.35	-
Ant8-Ant1	3.151		0.344	0.001	3.50	-
Ant8-Ant4	3.151		0.344	0.001	3.50	-
Ant8-Ant5	3.151	2.448	0.344	0.001	5.94	Case 16
Ant8-Ant7	3.151		0.344	0.001	3.50	-
Ant8-Ant9	3.151		0.344	0.001	3.50	-

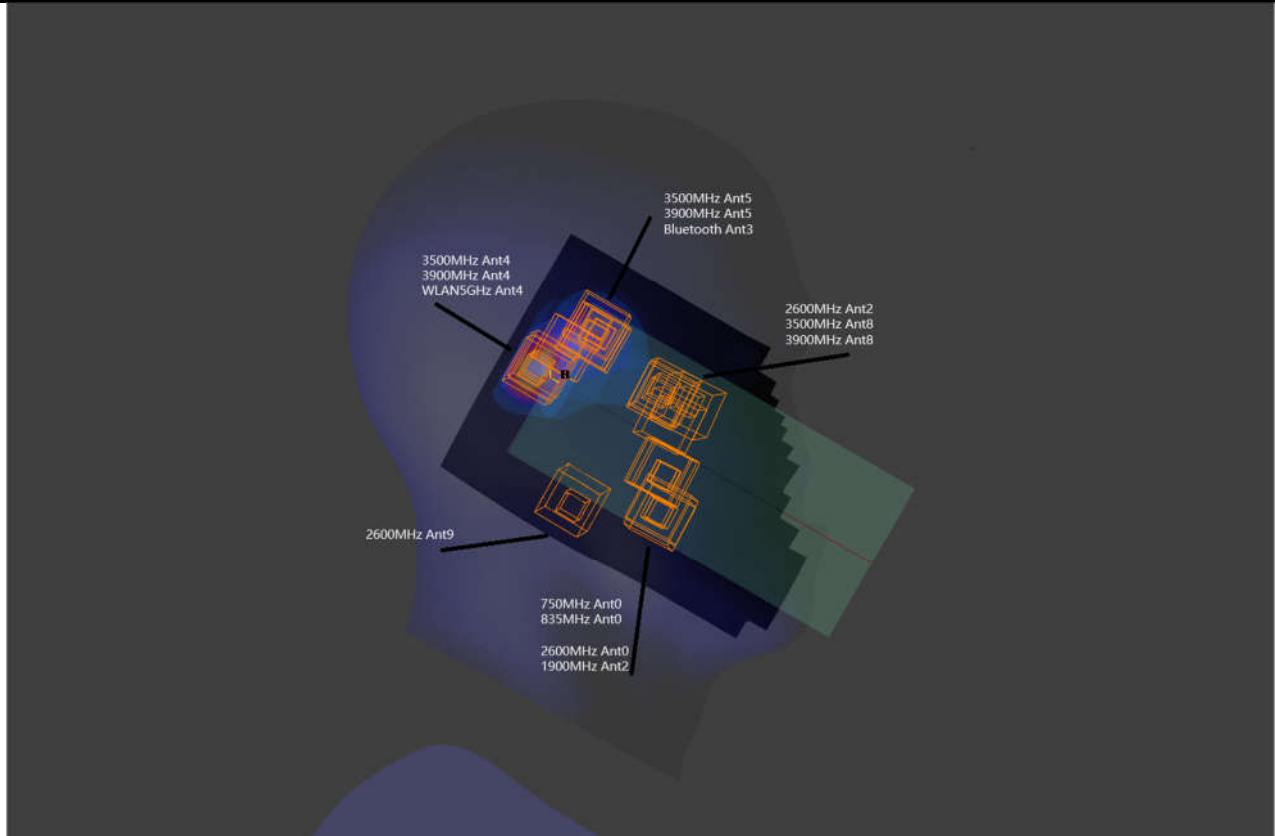
18.6 SPLSR Evaluation and Analysis

General Note:

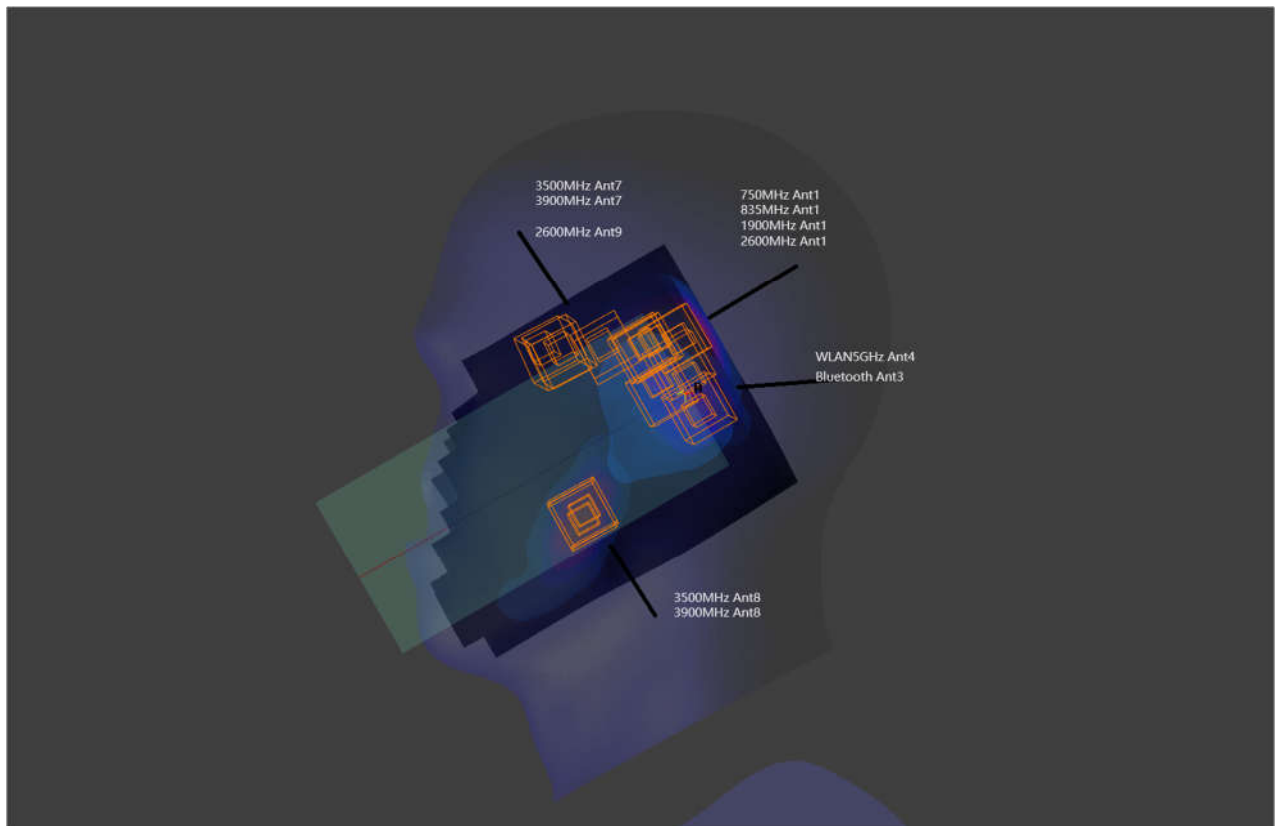
1. When standalone SAR is measured for both antennas in the pair, the peak location separation distance is computed by the square root of $[(x_1-x_2)^2 + (y_1-y_2)^2 + (z_1-z_2)^2]$, where (x_1, y_1, z_1) and (x_2, y_2, z_2) are the coordinates in the area scans or extrapolated peak SAR locations in the zoom scans, as appropriate.
2. $SPLSR = (SAR_1 + SAR_2)1.5 / (\text{min. separation distance, mm})$. If $SPLSR \leq 0.04$ for 1g SAR and $SPLSR \leq 0.10$ for 10g SAR, simultaneously transmission SAR measurement is not necessary.
3. Per April 2022 TCB Workshop Notes, WLAN /BT/ NFC was summed algebraically with the AG1 for the purposes of hybrid SPLSR combination and they are located at the top of the device
4. Per April 2022 TCB Workshop, instead of doing a small volume scan over a co-located antenna pair, used summing the SAR values of the co-located pair and using that value in SPLSR calculation. In the calculation used the minimum distance between the spatially separated antenna and the closest antenna of the co-located antenna pair to be conservative.
5. The detail hotspot point for each transmitter in each exposure condition are showing as below figure and the minimum 3D distance for each sum combination is used for SPLSR analysis.
6. The axis peak locations refer to Section 18.7.



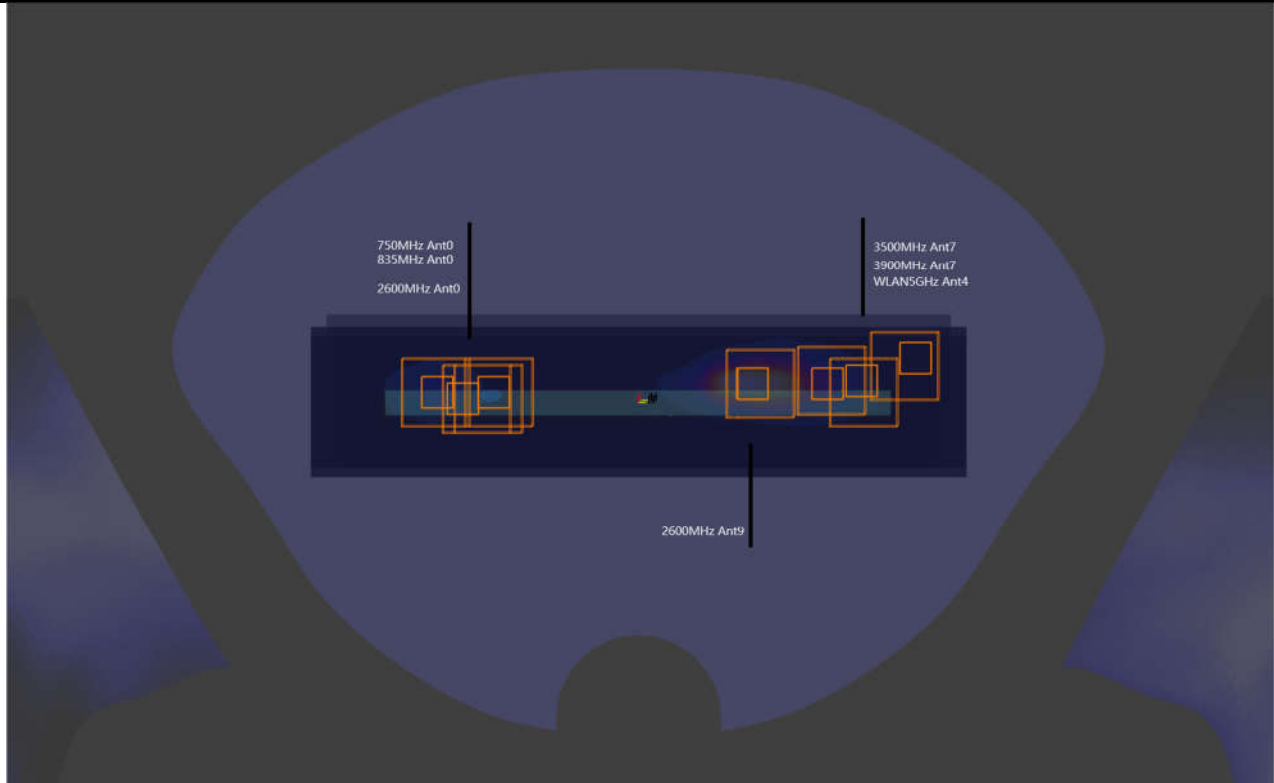
Head WWAN+WLAN+BT Left Tilted 0mm



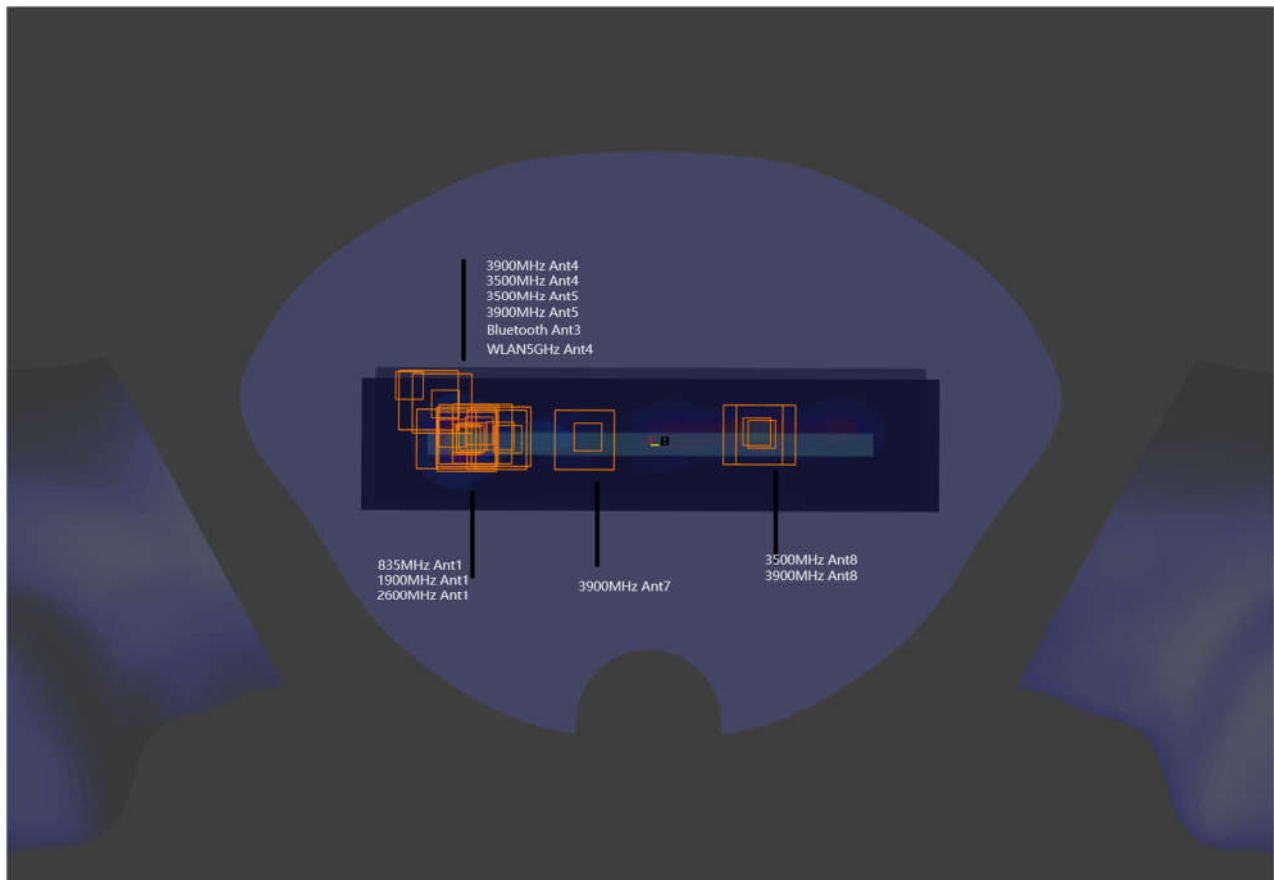
Head WWAN+WLAN+BT Left Check 0mm



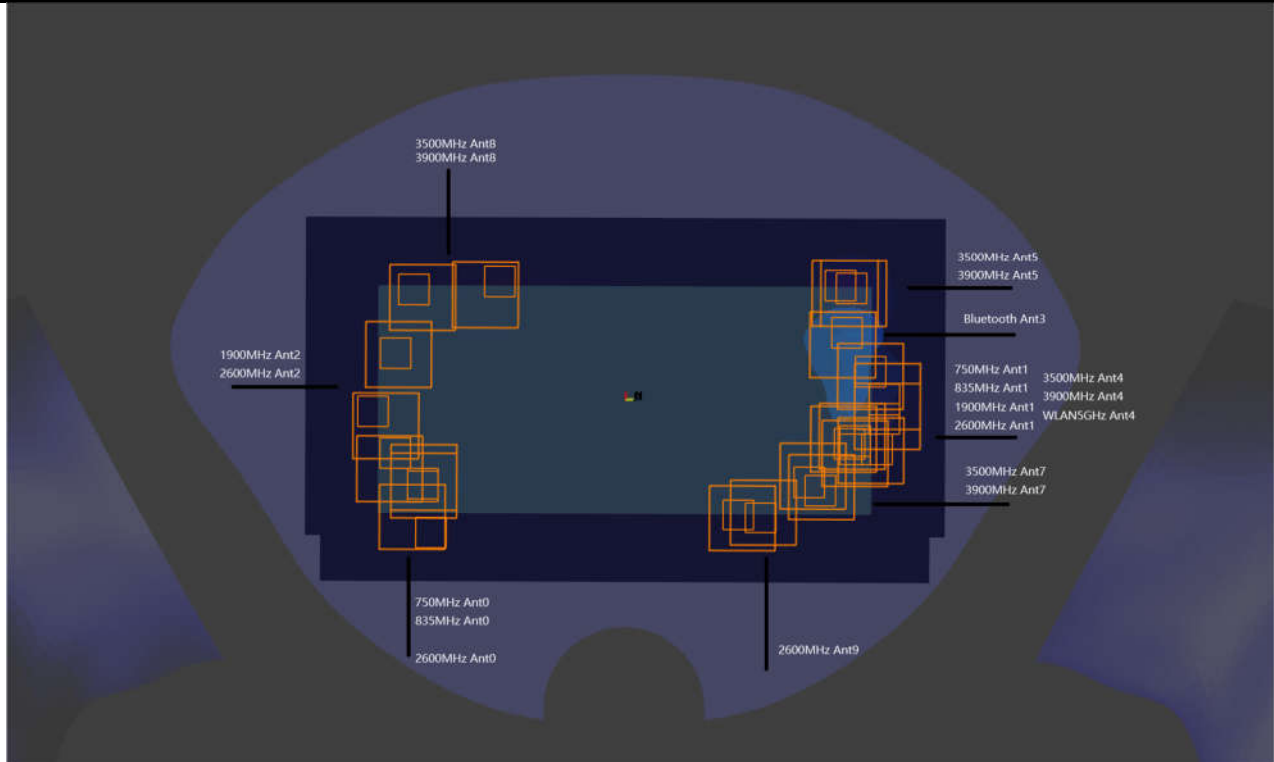
Head WWAN+WLAN+BT Right Check 0mm



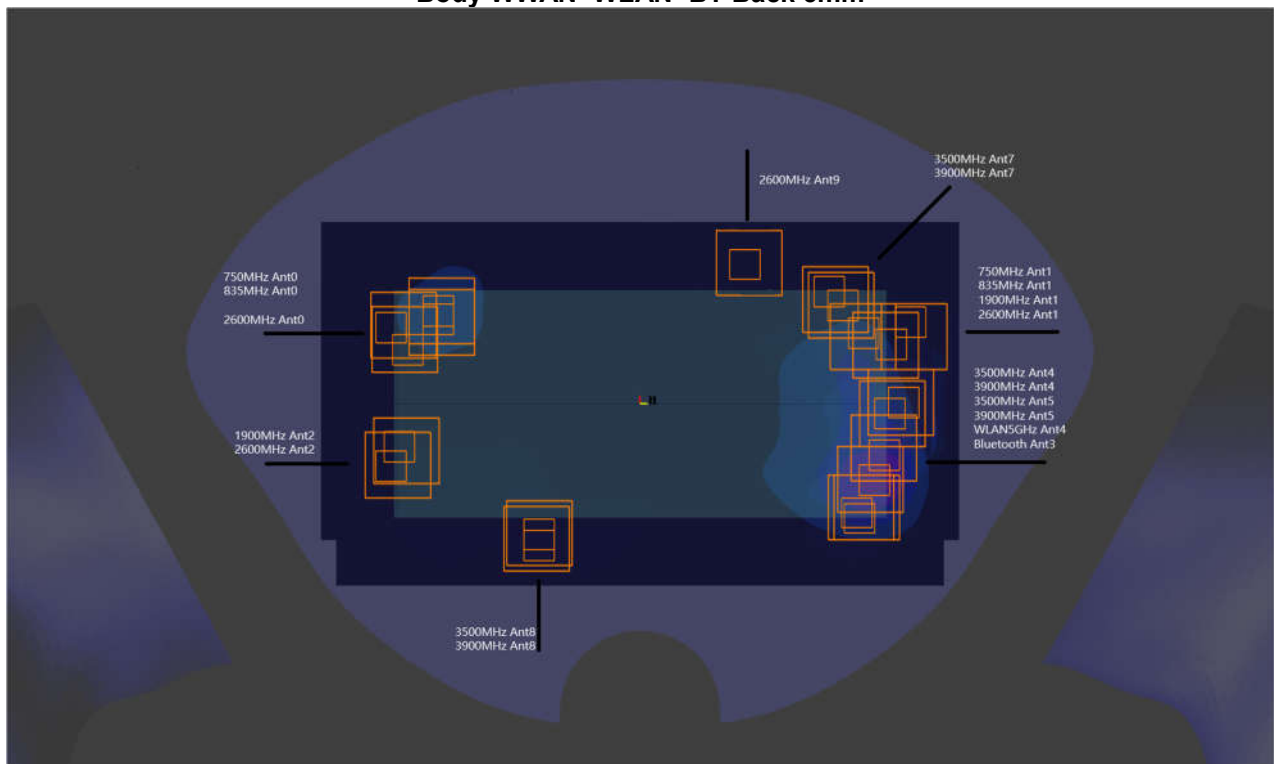
Hotspot WWAN+WLAN Left Side 5mm



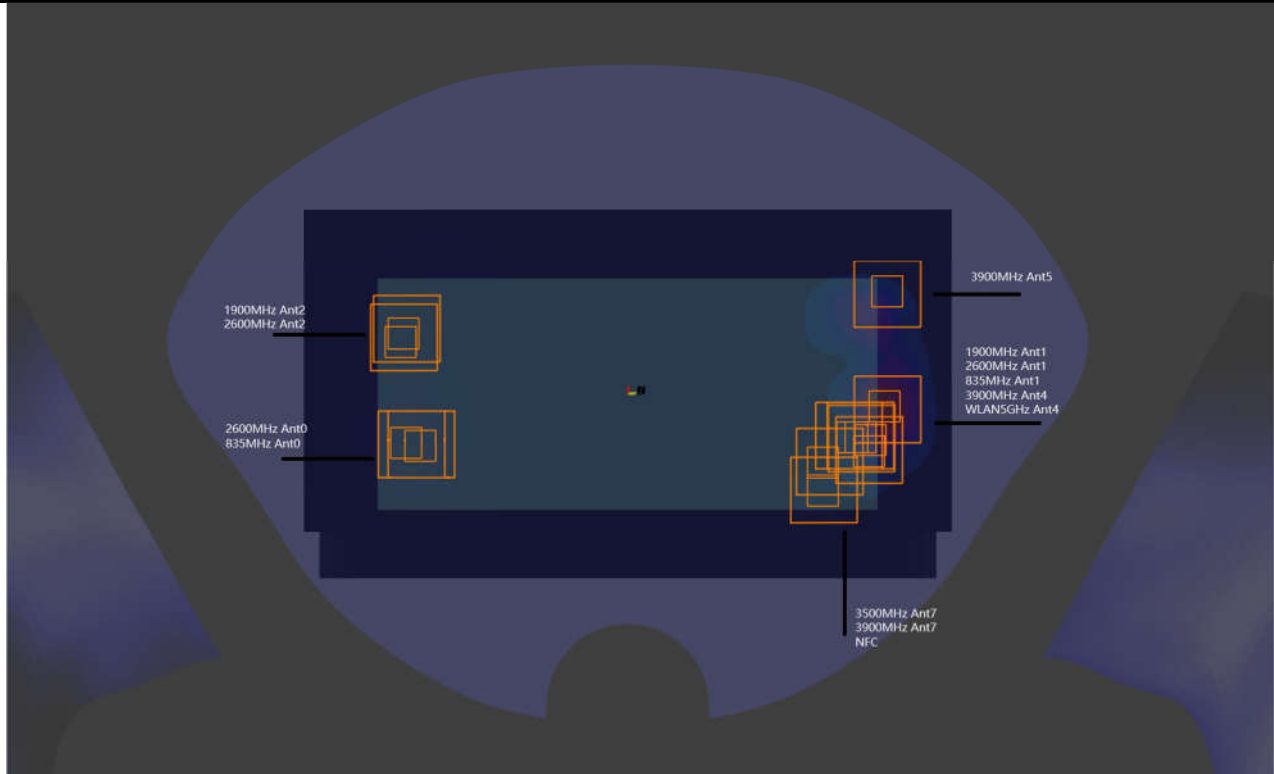
Hotspot WWAN+WLAN+BT Right Side 5mm



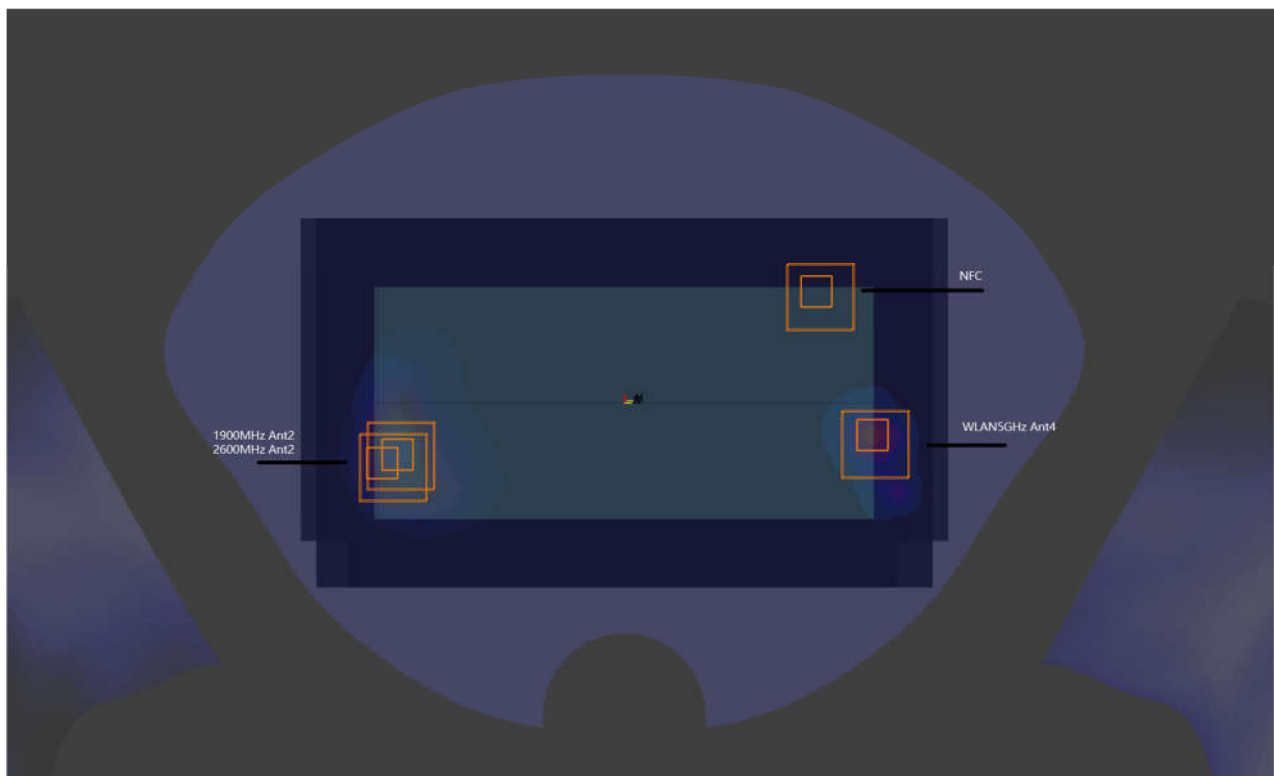
Body WWAN+WLAN+BT Back 5mm



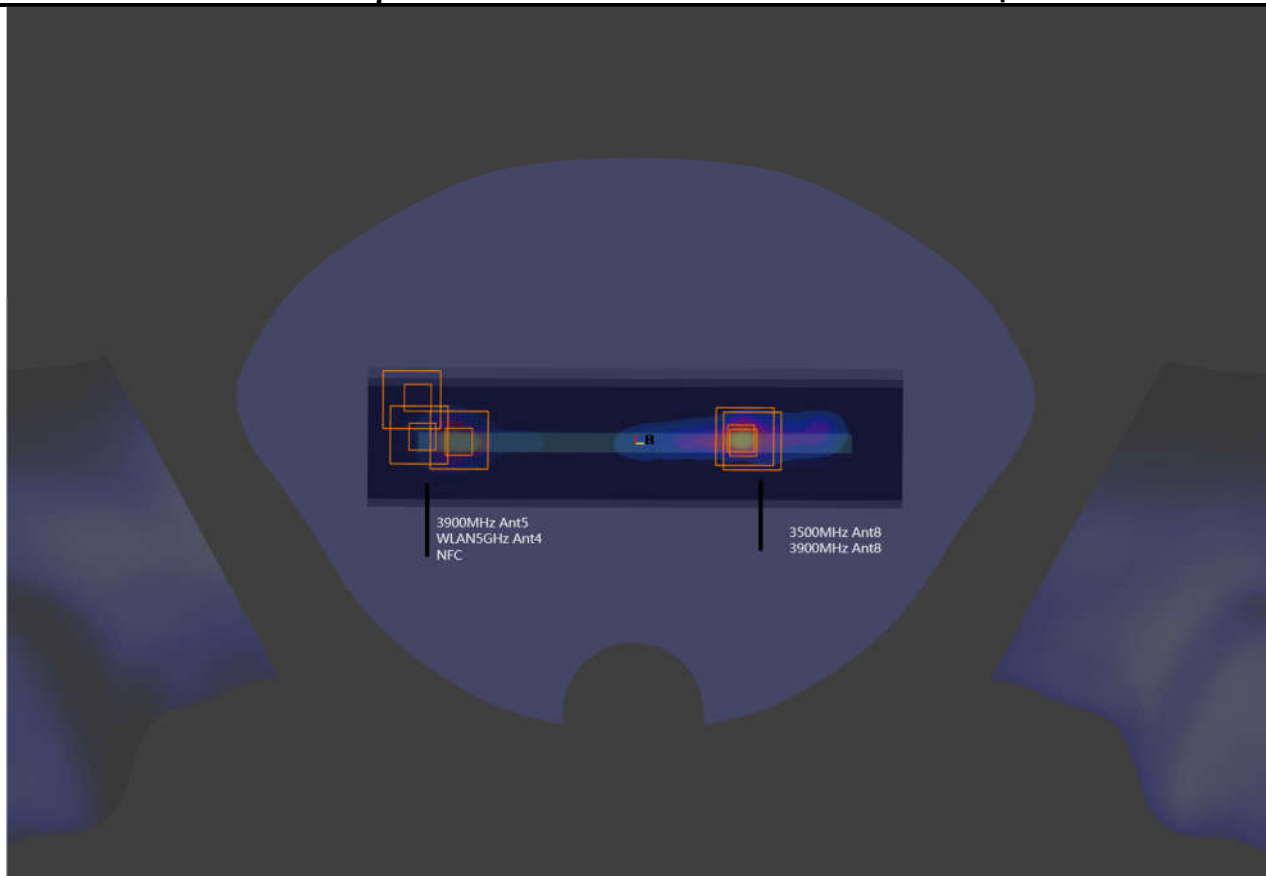
Body WWAN+WLAN+BT Front 5mm



Extremity WWAN+WLAN+NFC Back 0mm



Extremity WWAN+WLAN+NFC Front 0mm



Extremity WWAN+WLAN+NFC Right Side 0mm

<Head>

No.1 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Right Cheek	0.553	1.216	0mm	48.5	-256.9	-172.3	71.1	1.77	0.03	Not required
Ant 1		0.886		0mm	3.7	-312.1	-169.7				
WLAN 5G		0.199		0mm							
BT		0.131		0mm							
Ant 8	Right Cheek	0.553	1.216	0mm	48.7	-253.4	-171.9	67.4	1.77	0.03	Not required
Ant 1		0.886		0mm							
WLAN 5G		0.199		0mm	0.4	-300.2	-168.3				
BT		0.131		0mm							
Ant 8	Right Cheek	0.553	1.216	0mm	48.5	-256.9	-172.3	64.0	1.77	0.04	Not required
Ant 1		0.886		0mm							
WLAN 5G		0.199		0mm							
BT		0.131		0mm	18.1	-313.2	-171.5				
No.2 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Right Cheek	0.553	1.223	0mm	48.5	-256.9	-172.3	73.1	1.78	0.03	Not required
Ant 7		0.893		0mm	41.1	-329.6	-171.6				
WLAN 5G		0.199		0mm							
BT		0.131		0mm							
Ant 8	Right Cheek	0.553	1.223	0mm	48.7	-253.4	-171.9	67.4	1.78	0.04	Not required
Ant 7		0.893		0mm							
WLAN 5G		0.199		0mm	0.4	-300.2	-168.3				
BT		0.131		0mm							
Ant 8	Right Cheek	0.553	1.223	0mm	48.5	-256.9	-172.3	64.0	1.78	0.04	Not required
Ant 7		0.893		0mm							



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WLAN 5G		0.199		0mm							
BT		0.131		0mm	18.1	-313.2	-171.5				
No.3 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Right Cheek	0.553	1.228	0mm	48.5	-256.9	-172.3	67.4	1.78	0.04	Not required
Ant 9		0.898		0mm	67.1	-321.6	-169.2				
WLAN 5G		0.199		0mm							
BT		0.131		0mm							
Ant 8	Right Cheek	0.553	1.228	0mm	48.7	-253.4	-171.9	67.4	1.78	0.04	Not required
Ant 9		0.898		0mm							
WLAN 5G		0.199		0mm	0.4	-300.2	-168.3				
BT		0.131		0mm							
Ant 8	Right Cheek	0.553	1.228	0mm	48.5	-256.9	-172.3	64.0	1.78	0.04	Not required
Ant 9		0.898		0mm							
WLAN 5G		0.199		0mm							
BT		0.131		0mm	18.1	-313.2	-171.5				

No.4 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Left Cheek	0.267	1.402	0mm	54.2	268.1	-170.8	70.7	1.67	0.03	Not required
Ant 4		0.721		0mm	-0.3	313.1	-169.2				
WLAN 5G		0.397		0mm							
BT		0.284		0mm							
Ant 0	Left Cheek	0.267	1.402	0mm	54.2	268.1	-170.8	68.4	1.67	0.03	Not required
Ant 4		0.721		0mm							
WLAN 5G		0.397		0mm	15.3	324.4	-171.2				
BT		0.284		0mm							
Ant 0	Left Cheek	0.267	1.402	0mm	54.2	268.1	-170.8	68.0	1.67	0.03	Not required
Ant 4		0.721		0mm							
WLAN 5G		0.397		0mm							
BT		0.284		0mm	22.6	328.3	-171.6				
No.5 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Left Cheek	0.267	1.559	0mm	54.2	268.1	-170.8	65.8	1.83	0.04	Not required
Ant 5		0.878		0mm	27.9	328.4	-171.8				
WLAN 5G		0.397		0mm							
BT		0.284		0mm							
Ant 0	Left Cheek	0.267	1.559	0mm	54.2	268.1	-170.8	68.4	1.83	0.04	Not required
Ant 5		0.878		0mm							
WLAN 5G		0.397		0mm	15.3	324.4	-171.2				
BT		0.284		0mm							
Ant 0	Left Cheek	0.267	1.559	0mm	54.2	268.1	-170.8	68.0	1.83	0.04	Not required
Ant 5		0.878		0mm							
WLAN 5G		0.397		0mm							
BT		0.284		0mm	22.6	328.3	-171.6				
No.6 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Left Cheek	0.267	1.427	0mm	57.3	262.6	-172.6	55.8	1.69	0.04	Not required
Ant 9		0.746		0mm	33.2	212.6	-167.2				
WLAN 5G		0.397		0mm							
BT		0.284		0mm							
Ant 0	Left Cheek	0.267	1.427	0mm	54.2	268.1	-170.8	68.4	1.69	0.03	Not required
Ant 9		0.746		0mm							
WLAN 5G		0.397		0mm	15.3	324.4	-171.2				
BT		0.284		0mm							
Ant 0	Left Cheek	0.267	0.267	0mm	54.2	268.1	-170.8	68.0	1.69	0.03	Not required



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Ant 9		0.746		0mm							
WLAN 5G		0.397	1.427	0mm							
BT		0.284		0mm	22.6	328.3	-171.6				
No.8 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Left Cheek	0.189	0.189	0mm	52.1	266.7	-170.9	66.3	1.75	0.03	Not required
Ant 5		0.878	1.559	0mm	27.9	328.4	-171.8				
WLAN 5G		0.397		0mm							
BT		0.284		0mm							
Ant 2	Left Cheek	0.189	0.189	0mm	52.1	266.7	-170.9	68.4	1.75	0.03	Not required
Ant 5		0.878	1.559	0mm							
WLAN 5G		0.397		0mm	15.3	324.4	-171.2				
BT		0.284		0mm							
Ant 2	Left Cheek	0.189	0.189	0mm	52.1	266.7	-170.9	68.3	1.75	0.03	Not required
Ant 5		0.878	1.559	0mm							
WLAN 5G		0.397		0mm							
BT		0.284		0mm	22.6	328.3	-171.6				
No.9 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Left Cheek	0.189	0.189	0mm	56.4	264.3	-170.8	56.8	1.62	0.04	Not required
Ant 9		0.746	1.427	0mm	33.2	212.6	-167.2				
WLAN 5G		0.397		0mm							
BT		0.284		0mm							
Ant 2	Left Cheek	0.189	0.189	0mm	52.1	266.7	-170.9	68.4	1.62	0.03	Not required
Ant 9		0.746	1.427	0mm							
WLAN 5G		0.397		0mm	15.3	324.4	-171.2				
BT		0.284		0mm							
Ant 2	Left Cheek	0.189	0.189	0mm	52.1	266.7	-170.9	68.3	1.62	0.03	Not required
Ant 9		0.746	1.427	0mm							
WLAN 5G		0.397		0mm							
BT		0.284		0mm	22.6	328.3	-171.6				
No.10 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Left Cheek	0.304	0.304	0mm	55.4	265.3	-172.5	73.5	1.71	0.03	Not required
Ant 4		0.721	1.402	0mm	-0.3	313.1	-169.2				
WLAN 5G		0.397		0mm							
BT		0.284		0mm							
Ant 8	Left Cheek	0.304	0.304	0mm	55.4	265.3	-172.5	71.4	1.71	0.03	Not required
Ant 4		0.721	1.402	0mm							
WLAN 5G		0.397		0mm	15.3	324.4	-171.2				
BT		0.284		0mm							
Ant 8	Left Cheek	0.304	0.304	0mm	55.4	265.3	-172.5	71.0	1.71	0.03	Not required
Ant 4		0.721	1.402	0mm							
WLAN 5G		0.397		0mm							
BT		0.284		0mm	22.6	328.3	-171.6				
No.11 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Left Cheek	0.304	0.304	0mm	55.4	265.3	-172.5	72.2	1.86	0.04	Not required
Ant 5		0.878	1.559	0mm	27.9	332.1	-171.8				
WLAN 5G		0.397		0mm							
BT		0.284		0mm							
Ant 8	Left Cheek	0.304	0.304	0mm	55.4	265.3	-172.5	71.4	1.86	0.04	Not required
Ant 5		0.878	1.559	0mm							
WLAN 5G		0.397		0mm	15.3	324.4	-171.2				
BT		0.284		0mm							
Ant 8	Left Cheek	0.304	0.304	0mm	55.4	265.3	-172.5	71.0	1.86	0.04	Not required



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Ant 5		0.878		0mm							
WLAN 5G		0.397	1.559	0mm							
BT		0.284		0mm	22.6	328.3	-171.6				
No.12 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Left Cheek	0.304	0.304	0mm	55.4	265.3	-172.5	57.4	1.73	0.04	Not required
Ant 9		0.746	1.427	0mm	33.2	212.6	-167.2				
WLAN 5G		0.397		0mm							
BT		0.284		0mm							
Ant 8	Left Cheek	0.304	0.304	0mm	55.4	265.3	-172.5	71.4	1.73	0.03	Not required
Ant 9		0.746	1.427	0mm							
WLAN 5G		0.397		0mm	15.3	324.4	-171.2				
BT		0.284		0mm							
Ant 8	Left Cheek	0.304	0.304	0mm	55.4	265.3	-172.5	71.0	1.73	0.03	Not required
Ant 9		0.746	1.427	0mm							
WLAN 5G		0.397		0mm							
BT		0.284		0mm	22.6	328.3	-171.6				

No.13 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Left Tilted	0.157	0.157	0mm	53.7	265.1	-171.5	71.4	1.65	0.03	Not required
Ant 4		0.893	1.489	0mm	1.1	313.4	-169.4				
WLAN 5G		0.340		0mm							
BT		0.256		0mm							
Ant 0	Left Tilted	0.157	0.157	0mm	53.7	265.1	-171.5	76.9	1.65	0.03	Not required
Ant 4		0.893	1.489	0mm							
WLAN 5G		0.340		0mm	14.9	331.5	-171.2				
BT		0.256		0mm							
Ant 0	Left Tilted	0.157	0.157	0mm	53.7	265.1	-171.5	77.5	1.65	0.03	Not required
Ant 4		0.893	1.489	0mm							
WLAN 5G		0.340		0mm							
BT		0.256		0mm	22.9	336.2	-171.8				
No.14 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Left Tilted	0.331	0.331	0mm	56.9	282.1	-172.5	59.8	1.64	0.04	Not required
Ant 1		0.709	1.305	0mm	3.5	308.9	-170.2				
WLAN 5G		0.340		0mm							
BT		0.256		0mm							
Ant 8	Left Tilted	0.331	0.331	0mm	56.9	282.1	-172.5	64.9	1.64	0.03	Not required
Ant 1		0.709	1.305	0mm							
WLAN 5G		0.340		0mm	14.9	331.5	-171.2				
BT		0.256		0mm							
Ant 8	Left Tilted	0.331	0.331	0mm	56.9	282.1	-172.5	63.9	1.64	0.03	Not required
Ant 1		0.709	1.305	0mm							
WLAN 5G		0.340		0mm							
BT		0.256		0mm	22.9	336.2	-171.8				
No.15 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Left Tilted	0.123	0.123	0mm	68.9	285.4	-171.2	73.4	1.61	0.03	Not required
Ant 4		0.893	1.489	0mm	1.1	313.4	-169.4				
WLAN 5G		0.340		0mm							
BT		0.256		0mm							
Ant 2	Left Tilted	0.123	0.123	0mm	68.9	285.4	-171.2	71.0	1.61	0.03	Not required
Ant 4		0.893	1.489	0mm							
WLAN 5G		0.340		0mm	14.9	331.5	-171.2				
BT		0.256		0mm							



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Ant 2	Left Tilted	0.123	0.123	0mm	68.9	285.4	-171.2	68.5	1.61	0.03	Not required
Ant 4		0.893	1.489	0mm							
WLAN 5G		0.340		0mm							
BT		0.256		0mm	22.9	336.2	-171.8				
No.16 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Left Tilted	0.331	1.489	0mm	56.9	282.1	-172.5	64.1	1.82	0.04	Not required
Ant 4		0.893		0mm	1.1	313.4	-169.4				
WLAN 5G		0.340		0mm							
BT		0.256		0mm							
Ant 8	Left Tilted	0.331	1.489	0mm	56.9	282.1	-172.5	64.9	1.82	0.04	Not required
Ant 4		0.893		0mm							
WLAN 5G		0.340		0mm	14.9	331.5	-171.2				
BT		0.256		0mm							
Ant 8	Left Tilted	0.331	1.489	0mm	56.9	282.1	-172.5	63.9	1.82	0.04	Not required
Ant 4		0.893		0mm							
WLAN 5G		0.340		0mm							
BT		0.256		0mm	22.9	336.2	-171.8				

<Hotspot>

No.1 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Front	0.945	0.907	5mm	-15.8	-61.8	-204	139.2	1.85	0.02	Not required
Ant 1		0.285		5mm	-48.6	73.5	-204				
WLAN 5G		0.434		5mm							
BT		0.188		5mm							
Ant 0	Front	0.945	0.907	5mm	-15.8	-61.8	-204	142.1	1.85	0.02	Not required
Ant 1		0.285		5mm							
WLAN 5G		0.434		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 0	Front	0.945	0.907	5mm	-15.8	-61.8	-204	141.8	1.85	0.02	Not required
Ant 1		0.285		5mm							
WLAN 5G		0.434		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.2 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Front	0.945	0.793	5mm	-15.8	-61.8	-204	143.0	1.74	0.02	Not required
Ant 4		0.171		5mm	-24	81	-204				
WLAN 5G		0.434		5mm							
BT		0.188		5mm							
Ant 0	Front	0.945	0.793	5mm	-15.8	-61.8	-204	142.1	1.74	0.02	Not required
Ant 4		0.171		5mm							
WLAN 5G		0.434		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 0	Front	0.945	0.793	5mm	-15.8	-61.8	-204	141.8	1.74	0.02	Not required
Ant 4		0.171		5mm							
WLAN 5G		0.434		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.3 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Front	0.945	0.853	5mm	18.5	-61.5	-204	132.6	1.80	0.02	Not required
Ant 5		0.231		5mm	13	71	-204				
WLAN 5G		0.434		5mm							
BT		0.188		5mm							
Ant 0	Front	0.945	0.853	5mm	-15.8	-61.8	-204	142.1	1.80	0.02	Not required
Ant 5		0.231		5mm							



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WLAN 5G		0.434		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 0	Front	0.945	0.945	5mm	-15.8	-61.8	-204	141.8	1.80	0.02	Not required
Ant 5		0.231	0.853	5mm							
WLAN 5G		0.434		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.4 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Front	0.945	0.945	5mm	-35	-67.5	-204	131.5	1.84	0.02	Not required
Ant 7		0.271	0.893	5mm	-63	61	-204				
WLAN 5G		0.434		5mm							
BT		0.188		5mm							
Ant 0	Front	0.945	0.945	5mm	-15.8	-61.8	-204	142.1	1.84	0.02	Not required
Ant 7		0.271	0.893	5mm							
WLAN 5G		0.434		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 0	Front	0.945	0.945	5mm	-15.8	-61.8	-204	141.8	1.84	0.02	Not required
Ant 7		0.271	0.893	5mm							
WLAN 5G		0.434		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.5 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Front	0.945	0.945	5mm	-35	-67.5	-204	105.0	1.77	0.02	Not required
Ant 9		0.202	0.824	5mm	-70	31.5	-204				
WLAN 5G		0.434		5mm							
BT		0.188		5mm							
Ant 0	Front	0.945	0.945	5mm	-15.8	-61.8	-204	142.1	1.77	0.02	Not required
Ant 9		0.202	0.824	5mm							
WLAN 5G		0.434		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 0	Front	0.945	0.945	5mm	-15.8	-61.8	-204	141.8	1.77	0.02	Not required
Ant 9		0.202	0.824	5mm							
WLAN 5G		0.434		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.6 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	155.0	1.85	0.02	Not required
Ant 1		0.285	0.907	5mm	-48.6	73.5	-204				
WLAN 5G		0.434		5mm							
BT		0.188		5mm							
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	153.7	1.85	0.02	Not required
Ant 1		0.285	0.907	5mm							
WLAN 5G		0.434		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	152.7	1.85	0.02	Not required
Ant 1		0.285	0.907	5mm							
WLAN 5G		0.434		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.7 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	156.4	1.73	0.01	Not required
Ant 4		0.171	0.793	5mm	-24	81	-204				
WLAN 5G		0.434		5mm							
BT		0.188		5mm							
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	153.7	1.73	0.01	Not required
Ant 4		0.171	0.793	5mm							



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WLAN 5G		0.434		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	152.7	1.73	0.01	Not required
Ant 4		0.171	0.793	5mm							
WLAN 5G		0.434		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.8 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	145.0	1.79	0.02	Not required
Ant 5		0.231	0.853	5mm	13	71	-204				
WLAN 5G		0.434		5mm							
BT		0.188		5mm							
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	153.7	1.79	0.02	Not required
Ant 5		0.231	0.853	5mm							
WLAN 5G		0.434		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	152.7	1.79	0.02	Not required
Ant 5		0.231	0.853	5mm							
WLAN 5G		0.434		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.9 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	148.7	1.83	0.02	Not required
Ant 7		0.271	0.893	5mm	-63	61	-204				
WLAN 5G		0.434		5mm							
BT		0.188		5mm							
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	153.7	1.83	0.02	Not required
Ant 7		0.271	0.893	5mm							
WLAN 5G		0.434		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	152.7	1.83	0.02	Not required
Ant 7		0.271	0.893	5mm							
WLAN 5G		0.434		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.10 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	126.5	1.76	0.02	Not required
Ant 9		0.202	0.824	5mm	-70	31.5	-204				
WLAN 5G		0.434		5mm							
BT		0.188		5mm							
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	153.7	1.76	0.02	Not required
Ant 9		0.202	0.824	5mm							
WLAN 5G		0.434		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 2	Front	0.939	0.939	5mm	0.5	-73.5	-204	152.7	1.76	0.02	Not required
Ant 9		0.202	0.824	5mm							
WLAN 5G		0.434		5mm							
BT		0.188		5mm	-1	79.2	-204				

No.11 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	137.3	2.84	0.03	Not required
Ant 1		0.626	1.544	5mm	-10.2	73.5	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	148.0	2.84	0.03	Not required



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Ant 1		0.626		5mm							
WLAN 5G		0.614	1.544	5mm	-33	80	-204				
BT		0.304		5mm							
Ant 0		1.298	1.298	5mm	5	-63	-204				
Ant 1	Back	0.626		5mm				144.5	2.84	0.03	Not required
WLAN 5G		0.614	1.544	5mm							
BT		0.304		5mm	-46.6	72	-204				
No.12 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0		1.298	1.298	5mm	5	-63	-204				
Ant 4	Back	0.357		5mm	-25	83	-204	149.1	2.57	0.03	Not required
WLAN 5G		0.614	1.275	5mm							
BT		0.304		5mm							
Ant 0		1.298	1.298	5mm	5	-63	-204				
Ant 4	Back	0.357		5mm				148.0	2.57	0.03	Not required
WLAN 5G		0.614	1.275	5mm	-33	80	-204				
BT		0.304		5mm							
Ant 0		1.298	1.298	5mm	5	-63	-204				
Ant 4	Back	0.357		5mm				144.5	2.57	0.03	Not required
WLAN 5G		0.614	1.275	5mm							
BT		0.304		5mm	-46.6	72	-204				
No.13 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0		1.298	1.298	5mm	5	-63	-204				
Ant 5	Back	0.588		5mm	-64	70	-204	149.8	2.80	0.03	Not required
WLAN 5G		0.614	1.506	5mm							
BT		0.304		5mm							
Ant 0		1.298	1.298	5mm	5	-63	-204				
Ant 5	Back	0.588		5mm				148.0	2.80	0.03	Not required
WLAN 5G		0.614	1.506	5mm	-33	80	-204				
BT		0.304		5mm							
Ant 0		1.298	1.298	5mm	5	-63	-204				
Ant 5	Back	0.588		5mm				144.5	2.80	0.03	Not required
WLAN 5G		0.614	1.506	5mm							
BT		0.304		5mm	-46.6	72	-204				
No.14 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0		1.298	1.298	5mm	18.5	-61.5	-204				
Ant 7	Back	0.620		5mm	5	61	-204	123.2	2.84	0.04	Not required
WLAN 5G		0.614	1.538	5mm							
BT		0.304		5mm							
Ant 0		1.298	1.298	5mm	5	-63	-204				
Ant 7	Back	0.620		5mm				148.0	2.84	0.03	Not required
WLAN 5G		0.614	1.538	5mm	-33	80	-204				
BT		0.304		5mm							
Ant 0		1.298	1.298	5mm	5	-63	-204				
Ant 7	Back	0.620		5mm				144.5	2.84	0.03	Not required
WLAN 5G		0.614	1.538	5mm							
BT		0.304		5mm	-46.6	72	-204				
No.15 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0		1.298	1.298	5mm	18.5	-61.5	-204				
Ant 9	Back	0.353		5mm	15.5	65	-204	126.5	2.57	0.03	Not required
WLAN 5G		0.614	1.271	5mm							
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	148.0	2.57	0.03	Not required



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Ant 9		0.353	1.271	5mm				144.5	2.57	0.03	Not required
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	144.5	2.57	0.03	Not required
Ant 9		0.353	1.271	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.16 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	147.8	2.55	0.03	Not required
Ant 1		0.626	1.544	5mm	-11.5	73.5	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	152.8	2.55	0.03	Not required
Ant 1		0.626	1.544	5mm							
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	145.5	2.55	0.03	Not required
Ant 1		0.626	1.544	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.17 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	156.0	2.28	0.02	Not required
Ant 4		0.357	1.275	5mm	-25	83	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	152.8	2.28	0.02	Not required
Ant 4		0.357	1.275	5mm							
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	145.5	2.28	0.02	Not required
Ant 4		0.357	1.275	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.18 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	146.2	2.51	0.03	Not required
Ant 5		0.588	1.506	5mm	-64	70	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	152.8	2.51	0.03	Not required
Ant 5		0.588	1.506	5mm							
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	145.5	2.51	0.03	Not required
Ant 5		0.588	1.506	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.19 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	137.5	2.54	0.03	Not required
Ant 7		0.620	1.538	5mm	3	60	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	152.8	2.54	0.03	Not required



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Ant 7		0.620	1.538	5mm				145.5	2.54	0.03	Not required
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	145.5	2.54	0.03	Not required
Ant 7		0.620	1.538	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.20 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	145.9	2.28	0.02	Not required
Ant 9		0.353	1.271	5mm	12.2	66	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	152.8	2.28	0.02	Not required
Ant 9		0.353	1.271	5mm							
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 2	Back	1.005	1.005	5mm	-32.8	-72.8	-204	145.5	2.28	0.02	Not required
Ant 9		0.353	1.271	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.21 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	135.1	2.59	0.03	Not required
Ant 1		0.626	1.544	5mm	-11.5	73.5	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	134.6	2.59	0.03	Not required
Ant 1		0.626	1.544	5mm							
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	124.2	2.59	0.03	Not required
Ant 1		0.626	1.544	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.22 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	139.6	2.32	0.03	Not required
Ant 4		0.357	1.275	5mm	-25	83	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	134.6	2.32	0.03	Not required
Ant 4		0.357	1.275	5mm							
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	124.2	2.32	0.03	Not required
Ant 4		0.357	1.275	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.23 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	121.0	2.55	0.03	Not required
Ant 5		0.588	1.506	5mm	-64	70	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	134.6	2.55	0.03	Not required



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Ant 5		0.588	1.506	5mm				124.2	2.55	0.03	Not required
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	129.7	2.58	0.03	Not required
Ant 5		0.588	1.506	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.24 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	129.7	2.58	0.03	Not required
Ant 7		0.620	1.538	5mm	3	60	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	134.6	2.58	0.03	Not required
Ant 7		0.620	1.538	5mm							
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	124.2	2.58	0.03	Not required
Ant 7		0.620	1.538	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.25 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	139.6	2.32	0.03	Not required
Ant 9		0.353	1.271	5mm	12.2	66	-204				
WLAN 5G		0.614		5mm							
BT		0.304		5mm							
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	134.6	2.32	0.03	Not required
Ant 9		0.353	1.271	5mm							
WLAN 5G		0.614		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 8	Back	1.045	1.045	5mm	-64	-51	-204	124.2	2.32	0.03	Not required
Ant 9		0.353	1.271	5mm							
WLAN 5G		0.614		5mm							
BT		0.304		5mm	-46.6	72	-204				

No.26 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Left Side	0.940	0.940	5mm	-27.1	-46.8	-204	106.9	1.63	0.02	Not required
Ant 7		0.621	0.687	5mm	-31.3	60	-204				
WLAN 5G		0.066		5mm							
Ant 0	Left Side	0.940	0.940	5mm	-27.1	-46.8	-204	136.3	1.63	0.02	Not required
Ant 7		0.621	0.687	5mm							
WLAN 5G		0.066		5mm	-39	89	-204				
No.27 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Left Side	0.940	0.940	5mm	-27.1	-46.8	-204	69.6	1.63	0.03	Not required
Ant 9		0.627	0.693	5mm	-26.4	22.8	-204				
WLAN 5G		0.066		5mm							
Ant 0	Left Side	0.940	0.940	5mm	-27.1	-46.8	-204	136.3	1.63	0.02	Not required
Ant 9		0.627	0.693	5mm							
WLAN 5G		0.066		5mm	-39	89	-204				



No.28 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	63.8	1.72	0.04	Not required
Ant 1		0.056	0.425	5mm	-27.1	-23.7	-204				
WLAN 5G		0.268		5mm							
BT		0.101		5mm							
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	106.0	1.72	0.02	Not required
Ant 1		0.056	0.425	5mm							
WLAN 5G		0.268		5mm	-30.6	-66	-204				
BT		0.101		5mm							
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	94.0	1.72	0.02	Not required
Ant 1		0.056	0.425	5mm							
WLAN 5G		0.268		5mm							
BT		0.101		5mm	-27.8	-54	-204				
No.29 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	112.0	1.69	0.02	Not required
Ant 4		0.027	0.396	5mm	-29.2	-72	-204				
WLAN 5G		0.268		5mm							
BT		0.101		5mm							
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	106.0	1.69	0.02	Not required
Ant 4		0.027	0.396	5mm							
WLAN 5G		0.268		5mm	-30.6	-66	-204				
BT		0.101		5mm							
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	94.0	1.69	0.02	Not required
Ant 4		0.027	0.396	5mm							
WLAN 5G		0.268		5mm							
BT		0.101		5mm	-27.8	-54	-204				
No.30 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	106.1	2.29	0.03	Not required
Ant 5		0.627	0.996	5mm	-27.1	-66	-204				
WLAN 5G		0.268		5mm							
BT		0.101		5mm							
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	106.0	2.29	0.03	Not required
Ant 5		0.627	0.996	5mm							
WLAN 5G		0.268		5mm	-30.6	-66	-204				
BT		0.101		5mm							
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	94.0	2.29	0.04	Not required
Ant 5		0.627	0.996	5mm							
WLAN 5G		0.268		5mm							
BT		0.101		5mm	-27.8	-54	-204				
No.31 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Right Side	1.297	1.297	5mm	-31	40	-204	129.9	1.68	0.02	Not required
Ant 7		0.018	0.387	5mm	-46	-89	-204				
WLAN 5G		0.268		5mm							
BT		0.101		5mm							
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	106.0	1.68	0.02	Not required
Ant 7		0.018	0.387	5mm							
WLAN 5G		0.268		5mm	-30.6	-66	-204				
BT		0.101		5mm							
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	94.0	1.68	0.02	Not required
Ant 7		0.018	0.387	5mm							
WLAN 5G		0.268		5mm							



BT		0.101		5mm	-27.8	-54	-204				
No.32 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	106.0	1.67	0.02	Not required
Ant 9			0.369	5mm							
WLAN 5G		0.268		5mm	-30.6	-66	-204				
BT		0.101		5mm							
Ant 8	Right Side	1.297	1.297	5mm	-30.6	40	-204	94.0	1.67	0.02	Not required
Ant 9			0.369	5mm							
WLAN 5G		0.268		5mm							
BT		0.101		5mm	-27.8	-54	-204				

<Body-worn>

No.1 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Front	0.986	0.986	5mm	-15.8	-61.8	-204	139.2	1.97	0.02	Not required
Ant 1		0.401	0.980	5mm	-48.6	73.5	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 0	Front	0.986	0.986	5mm	-15.8	-61.8	-204	142.1	1.97	0.02	Not required
Ant 1		0.401	0.980	5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 0	Front	0.986	0.986	5mm	-15.8	-61.8	-204	141.8	1.97	0.02	Not required
Ant 1		0.401	0.980	5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
No.2 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Front	0.986	0.986	5mm	-15.8	-61.8	-204	143.0	1.99	0.02	Not required
Ant 4		0.421	1.000	5mm	-24	81	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 0	Front	0.986	0.986	5mm	-15.8	-61.8	-204	142.1	1.99	0.02	Not required
Ant 4		0.421	1.000	5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 0	Front	0.986	0.986	5mm	-15.8	-61.8	-204	141.8	1.99	0.02	Not required
Ant 4		0.421	1.000	5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.3 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Front	0.986	0.986	5mm	18.5	-61.5	-204	132.6	1.99	0.02	Not required
Ant 5		0.422	1.001	5mm	13	71	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 0	Front	0.986	0.986	5mm	-15.8	-61.8	-204	142.1	1.99	0.02	Not required
Ant 5		0.422	1.001	5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 0	Front	0.986	0.986	5mm	-15.8	-61.8	-204	141.8	1.99	0.02	Not required
Ant 5		0.422	1.001	5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				



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No.4 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Front	0.986	1.045	5mm	-35	-67.5	-204	131.5	2.03	0.02	Not required
Ant 7		0.466		5mm	-63	61	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 0	Front	0.986	1.045	5mm	-15.8	-61.8	-204	142.1	2.03	0.02	Not required
Ant 7		0.466		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 0	Front	0.986	1.045	5mm	-15.8	-61.8	-204	141.8	2.03	0.02	Not required
Ant 7		0.466		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.5 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Front	0.986	1.079	5mm	-35	-67.5	-204	105.0	2.07	0.03	Not required
Ant 9		0.500		5mm	-70	31.5	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 0	Front	0.986	1.079	5mm	-15.8	-61.8	-204	142.1	2.07	0.02	Not required
Ant 9		0.500		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 0	Front	0.986	1.079	5mm	-15.8	-61.8	-204	141.8	2.07	0.02	Not required
Ant 9		0.500		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.6 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	1.195	0.980	5mm	0.5	-73.5	-204	155.0	2.18	0.02	Not required
Ant 1		0.401		5mm	-48.6	73.5	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 2	Front	1.195	0.980	5mm	0.5	-73.5	-204	153.7	2.18	0.02	Not required
Ant 1		0.401		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 2	Front	1.195	0.980	5mm	0.5	-73.5	-204	152.7	2.18	0.02	Not required
Ant 1		0.401		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.7 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	1.195	1.000	5mm	0.5	-73.5	-204	156.4	2.20	0.02	Not required
Ant 4		0.421		5mm	-24	81	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 2	Front	1.195	1.000	5mm	0.5	-73.5	-204	153.7	2.20	0.02	Not required
Ant 4		0.421		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 2	Front	1.195	1.000	5mm	0.5	-73.5	-204	152.7	2.20	0.02	Not required
Ant 4		0.421		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				



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No.8 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	1.195	1.001	5mm	0.5	-73.5	-204	145.0	2.20	0.02	Not required
Ant 5		0.422		5mm	13	71	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 2	Front	1.195	1.001	5mm	0.5	-73.5	-204	153.7	2.20	0.02	Not required
Ant 5		0.422		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 2	Front	1.195	1.001	5mm	0.5	-73.5	-204	152.7	2.20	0.02	Not required
Ant 5		0.422		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.9 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	1.195	1.045	5mm	0.5	-73.5	-204	148.7	2.24	0.02	Not required
Ant 7		0.466		5mm	-63	61	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 2	Front	1.195	1.045	5mm	0.5	-73.5	-204	153.7	2.24	0.02	Not required
Ant 7		0.466		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 2	Front	1.195	1.045	5mm	0.5	-73.5	-204	152.7	2.24	0.02	Not required
Ant 7		0.466		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.10 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	1.195	1.079	5mm	0.5	-73.5	-204	126.5	2.27	0.03	Not required
Ant 9		0.500		5mm	-70	31.5	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 2	Front	1.195	1.079	5mm	0.5	-73.5	-204	153.7	2.27	0.02	Not required
Ant 9		0.500		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 2	Front	1.195	1.079	5mm	0.5	-73.5	-204	152.7	2.27	0.02	Not required
Ant 9		0.500		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.11 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Front	0.784	0.980	5mm	23	-31	-204	124.5	1.76	0.02	Not required
Ant 1		0.401		5mm	-24.3	84.2	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 8	Front	0.784	0.980	5mm	23	-31	-204	115.0	1.76	0.02	Not required
Ant 1		0.401		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 8	Front	0.784	0.980	5mm	23	-31	-204	112.8	1.76	0.02	Not required
Ant 1		0.401		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				



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No.12 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Front	0.784	1.000	5mm	19	-33	-204	127.8	1.78	0.02	Not required
Ant 4		0.421		5mm	-25	87	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 8	Front	0.784	1.000	5mm	23	-31	-204	115.0	1.78	0.02	Not required
Ant 4		0.421		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 8	Front	0.784	1.000	5mm	23	-31	-204	112.8	1.78	0.02	Not required
Ant 4		0.421		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.13 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Front	0.784	1.001	5mm	23	-31	-204	102.4	1.79	0.02	Not required
Ant 5		0.422		5mm	14	71	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 8	Front	0.784	1.001	5mm	23	-31	-204	115.0	1.79	0.02	Not required
Ant 5		0.422		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 8	Front	0.784	1.001	5mm	23	-31	-204	112.8	1.79	0.02	Not required
Ant 5		0.422		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.14 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Front	0.784	1.045	5mm	19	-33	-204	124.7	1.83	0.02	Not required
Ant 7		0.466		5mm	-63	61	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 8	Front	0.784	1.045	5mm	23	-31	-204	115.0	1.83	0.02	Not required
Ant 7		0.466		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 8	Front	0.784	1.045	5mm	23	-31	-204	112.8	1.83	0.02	Not required
Ant 7		0.466		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				
No.15 Band	Position	SAR 1g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Front	0.784	1.079	5mm	19	-33	-204	109.9	1.86	0.02	Not required
Ant 9		0.500		5mm	-70	31.5	-204				
WLAN 5G		0.391		5mm							
BT		0.188		5mm							
Ant 8	Front	0.784	1.079	5mm	23	-31	-204	115.0	1.86	0.02	Not required
Ant 9		0.500		5mm							
WLAN 5G		0.391		5mm	-7	80	-204				
BT		0.188		5mm							
Ant 8	Front	0.784	1.079	5mm	23	-31	-204	112.8	1.86	0.02	Not required
Ant 9		0.500		5mm							
WLAN 5G		0.391		5mm							
BT		0.188		5mm	-1	79.2	-204				



No.16 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	137.3	2.88	0.04	Not required
Ant 1		0.894	1.582	5mm	-10.2	73.5	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	148.0	2.88	0.03	Not required
Ant 1		0.894	1.582	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	144.5	2.88	0.03	Not required
Ant 1		0.894	1.582	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.17 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	149.1	2.88	0.03	Not required
Ant 4		0.896	1.584	5mm	-25	83	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	148.0	2.88	0.03	Not required
Ant 4		0.896	1.584	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	144.5	2.88	0.03	Not required
Ant 4		0.896	1.584	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.18 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	149.8	2.87	0.03	Not required
Ant 5		0.888	1.576	5mm	-64	70	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	148.0	2.87	0.03	Not required
Ant 5		0.888	1.576	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	144.5	2.87	0.03	Not required
Ant 5		0.888	1.576	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.19 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Back	1.298	1.298	5mm	18.5	-61.5	-204	123.2	2.88	0.04	Not required
Ant 7		0.895	1.583	5mm	5	61	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	148.0	2.88	0.03	Not required
Ant 7		0.895	1.583	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	144.5	2.88	0.03	Not required
Ant 7		0.895	1.583	5mm							



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WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.20 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Back	1.298	1.298	5mm	18.5	-61.5	-204	126.5	2.88	0.04	Not required
Ant 9		0.892	1.580	5mm	15.5	65	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	148.0	2.88	0.03	Not required
Ant 9		0.892	1.580	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 0	Back	1.298	1.298	5mm	5	-63	-204	144.5	2.88	0.03	Not required
Ant 9		0.892	1.580	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.21 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	147.8	2.87	0.03	Not required
Ant 1		0.894	1.582	5mm	-11.5	73.5	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	152.8	2.87	0.03	Not required
Ant 1		0.894	1.582	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	145.5	2.87	0.03	Not required
Ant 1		0.894	1.582	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.22 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	156.0	2.87	0.03	Not required
Ant 4		0.896	1.584	5mm	-25	83	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	152.8	2.87	0.03	Not required
Ant 4		0.896	1.584	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	145.5	2.87	0.03	Not required
Ant 4		0.896	1.584	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.23 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	146.2	2.87	0.03	Not required
Ant 5		0.888	1.576	5mm	-64	70	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	152.8	2.87	0.03	Not required
Ant 5		0.888	1.576	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	145.5	2.87	0.03	Not required



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Ant 5		0.888		5mm							
WLAN 5G		0.384	1.576	5mm							
BT		0.304		5mm	-46.6	72	-204				
No.24 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	137.5	2.87	0.04	Not required
Ant 7		0.895	1.583	5mm	3	60	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	152.8	2.87	0.03	Not required
Ant 7		0.895	1.583	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	145.5	2.87	0.03	Not required
Ant 7		0.895	1.583	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.25 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	145.9	2.87	0.03	Not required
Ant 9		0.892	1.580	5mm	12.2	66	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	152.8	2.87	0.03	Not required
Ant 9		0.892	1.580	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 2	Back	1.289	1.289	5mm	-32.8	-72.8	-204	145.5	2.87	0.03	Not required
Ant 9		0.892	1.580	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.26 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	135.1	2.86	0.04	Not required
Ant 1		0.894	1.582	5mm	-11.5	73.5	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	134.6	2.86	0.04	Not required
Ant 1		0.894	1.582	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	124.2	2.86	0.04	Not required
Ant 1		0.894	1.582	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.27 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	139.6	2.87	0.03	Not required
Ant 4		0.896	1.584	5mm	-25	83	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	134.6	2.87	0.04	Not required
Ant 4		0.896	1.584	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							



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Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	124.2	2.87	0.04	Not required
Ant 4		0.896	1.584	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.28 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	121.0	2.86	0.04	Not required
Ant 5		0.888	1.576	5mm	-64	70	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	134.6	2.86	0.04	Not required
Ant 5		0.888	1.576	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	124.2	2.86	0.04	Not required
Ant 5		0.888	1.576	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.29 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	129.7	2.87	0.04	Not required
Ant 7		0.895	1.583	5mm	3	60	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	134.6	2.87	0.04	Not required
Ant 7		0.895	1.583	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	124.2	2.87	0.04	Not required
Ant 7		0.895	1.583	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				
No.30 Band	Position	SAR 1g SAR (W/kg)	Summed 1g SAR (W/kg)	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	139.6	2.86	0.03	Not required
Ant 9		0.892	1.580	5mm	12.2	66	-204				
WLAN 5G		0.384		5mm							
BT		0.304		5mm							
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	134.6	2.86	0.04	Not required
Ant 9		0.892	1.580	5mm							
WLAN 5G		0.384		5mm	-33	80	-204				
BT		0.304		5mm							
Ant 8	Back	1.282	1.282	5mm	-64	-51	-204	124.2	2.86	0.04	Not required
Ant 9		0.892	1.580	5mm							
WLAN 5G		0.384		5mm							
BT		0.304		5mm	-46.6	72	-204				

<Extremity>

No.1 Band	Position	SAR 10g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Front	3.165	3.165	0mm	-40	-73.5	-204	157.4	4.08	0.05	Not required
WLAN 5G		0.909		0mm	-11.2	81.2	-207				
NFC		0.001		0mm							
Ant 2	Front	3.165	3.165	0mm	-40	-73.5	-204	135.5	4.08	0.06	Not required
WLAN 5G		0.909		0mm							
NFC		0.001		0mm	-63	60	-204				

No.2 Band	Position	SAR 10g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Back	3.115	3.115	0mm	-10	-71	-204	144.5	5.58	0.09	Not required
Ant 1		2.135		0mm	-10	73.5	-204				
WLAN 5G		0.293		0mm							
NFC		0.033		0mm							
Ant 0	Back	3.115	3.115	0mm	-10	-71	-204	165.2	5.58	0.08	Not required
Ant 1		2.135		0mm							
WLAN 5G		0.293		0mm	-55	88	-204				
NFC		0.033		0mm							
Ant 0	Back	3.115	3.115	0mm	-10	-71	-204	146.1	5.58	0.09	Not required
Ant 1		2.135		0mm							
WLAN 5G		0.293		0mm							
NFC		0.033		0mm	-15	75	-204				
No.3 Band	Position	SAR 10g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Back	3.115	3.115	0mm	-10	-71	-204	153.6	4.56	0.06	Not required
Ant 4		1.121		0mm	-23	82	-204				
WLAN 5G		0.293		0mm							
NFC		0.033		0mm							
Ant 0	Back	3.115	3.115	0mm	-10	-71	-204	165.2	4.56	0.06	Not required
Ant 4		1.121		0mm							
WLAN 5G		0.293		0mm	-55	88	-204				
NFC		0.033		0mm							
Ant 0	Back	3.115	3.115	0mm	-10	-71	-204	146.1	4.56	0.07	Not required
Ant 4		1.121		0mm							
WLAN 5G		0.293		0mm							
NFC		0.033		0mm	-15	75	-204				
No.4 Band	Position	SAR 10g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Back	3.115	3.115	0mm	-10	-71	-204	144.1	4.38	0.06	Not required
Ant 5		0.939		0mm	-63	63	-204				
WLAN 5G		0.293		0mm							
NFC		0.033		0mm							
Ant 0	Back	3.115	3.115	0mm	-10	-71	-204	165.2	4.38	0.06	Not required
Ant 5		0.939		0mm							
WLAN 5G		0.293		0mm	-55	88	-204				
NFC		0.033		0mm							
Ant 0	Back	3.115	3.115	0mm	-10	-71	-204	146.1	4.38	0.06	Not required
Ant 5		0.939		0mm							
WLAN 5G		0.293		0mm							
NFC		0.033		0mm	-15	75	-204				
No.6 Band	Position	SAR 10g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 0	Back	3.115	3.115	0mm	-10	-71	-204	137.8	5.44	0.09	Not required



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Ant 7		1.994		0mm	5	66	-204				
WLAN 5G		0.293	2.320	0mm							
NFC		0.033		0mm							
Ant 0		3.115	3.115	0mm	-10	-71	-204				
Ant 7		1.994		0mm							
WLAN 5G		0.293	2.320	0mm	-55	88	-204				
NFC		0.033		0mm							
Ant 0		3.115	3.115	0mm	-10	-71	-204				
Ant 7		1.994		0mm							
WLAN 5G		0.293	2.320	0mm							
NFC		0.033		0mm	-15	75	-204				
No.7 Band	Position	SAR 10g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2		3.170	3.170	0mm	-10	-73.5	-204				
Ant 1		2.135		0mm	-10	73.5	-204				
WLAN 5G		0.293	2.461	0mm							
NFC		0.033		0mm							
Ant 2		3.170	3.170	0mm	-41.5	-73.5	-204				
Ant 1		2.135		0mm							
WLAN 5G		0.293	2.461	0mm	-55	88	-204				
NFC		0.033		0mm							
Ant 2		3.170	3.170	0mm	-10	-73.5	-204				
Ant 1		2.135		0mm							
WLAN 5G		0.293	2.461	0mm							
NFC		0.033		0mm	-15	75	-204				
No.8 Band	Position	SAR 10g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2		3.170	3.170	0mm	-10	-73.5	-204				
Ant 4		1.121		0mm	-23	82	-204				
WLAN 5G		0.293	1.447	0mm							
NFC		0.033		0mm							
Ant 2		3.170	3.170	0mm	-41.5	-73.5	-204				
Ant 4		1.121		0mm							
WLAN 5G		0.293	1.447	0mm	-55	88	-204				
NFC		0.033		0mm							
Ant 2		3.170	3.170	0mm	-10	-73.5	-204				
Ant 4		1.121		0mm							
WLAN 5G		0.293	1.447	0mm							
NFC		0.033		0mm	-15	75	-204				
No.9 Band	Position	SAR 10g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2		3.170	3.170	0mm	-41.5	-73.5	-204				
Ant 5		0.939		0mm	-63	63	-204				
WLAN 5G		0.293	1.265	0mm							
NFC		0.033		0mm							
Ant 2		3.170	3.170	0mm	-41.5	-73.5	-204				
Ant 5		0.939		0mm							
WLAN 5G		0.293	1.265	0mm	-55	88	-204				
NFC		0.033		0mm							
Ant 2		3.170	3.170	0mm	-10	-73.5	-204				
Ant 5		0.939		0mm							
WLAN 5G		0.293	1.265	0mm							
NFC		0.033		0mm	-15	75	-204				
No.10 Band	Position	SAR 10g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 2	Back	3.170	3.170	0mm	-10	-73.5	-204	140.3	5.49	0.09	Not required



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Ant 7		1.994	2.320	0mm	5	66	-204				
WLAN 5G		0.293		0mm							
NFC		0.033		0mm							
Ant 2	Back	3.170	3.170	0mm	-41.5	-73.5	-204	162.1	5.49	0.08	Not required
Ant 7		1.994	2.320	0mm							
WLAN 5G		0.293		0mm	-55	88	-204				
NFC		0.033		0mm							
Ant 2	Back	3.170	3.170	0mm	-10	-73.5	-204	148.6	5.49	0.09	Not required
Ant 7		1.994	2.320	0mm							
WLAN 5G		0.293		0mm							
NFC		0.033		0mm	-15	75	-204				

No.16 Band	Position	SAR 10g SAR (W/kg)	Summed	Gap	SAR peak location (mm)			3D distance (mm)	Summed SAR (W/kg)	SPLSR Results	Simultaneous SAR
					X	Y	Z				
Ant 8	Right Side	3.151	3.151	0mm	-26.6	65	-204	148.0	5.94	0.10	Not required
Ant 5		2.448	2.793	0mm	-25	-83	-204				
WLAN 5G		0.344		0mm							
NFC		0.001		0mm							
Ant 8	Right Side	3.151	3.151	0mm	-26.6	65	-204	150.0	5.94	0.10	Not required
Ant 5		2.448	2.793	0mm							
WLAN 5G		0.344		0mm	-26.4	-85	-204				
NFC		0.001		0mm							
Ant 8	Right Side	3.151	3.151	0mm	-26.6	65	-204	150.3	5.94	0.10	Not required
Ant 5		2.448	2.793	0mm							
WLAN 5G		0.344		0mm							
NFC		0.001		0mm	-46.7	-84	-204				

18.7 Maximum Reported SAR and SAR Peak Locations

General Note:

1. The maximum reported SAR and SAR Peak Locations corresponding to each position of each frequency band of each antenna in the below tables are as follows.
2. The unit of SAR evaluation is W/kg. The unit of x, y, z with Axis evaluation is mm.

<Head>

Right Cheek													
Band		Ant1			Ant8			Ant7			Ant9		
GSM850	SAR (W/kg)	0.884											
	Axis	13.6	-333.5	-173.8									
GSM1900	SAR (W/kg)	0.746											
	Axis	6.8	-328.6	-170.4									
WCDMA II	SAR (W/kg)	0.835											
	Axis	6.5	-329.7	-170.9									
WCDMA V	SAR (W/kg)	0.886											
	Axis	16.8	-332	-170.9									
LTE Band 71	SAR (W/kg)	0.453											
	Axis	15	-334.8	-170.7									
LTE Band 2	SAR (W/kg)	0.685											
	Axis	7.5	-331.1	-170.9									
LTE Band 26	SAR (W/kg)	0.875											
	Axis	12.7	-334.3	-173.7									
LTE Band 7	SAR (W/kg)	0.688									0.886		
	Axis	2.7	-312.7	-169.6							61.2	-323.2	-168.6
LTE Band 41	SAR (W/kg)	0.706									0.898		
	Axis	3.4	-314.1	-170.1							66.4	-326.9	-167.7
LTE Band 42	SAR (W/kg)				0.317			0.89					
	Axis				48.5	-256.9	-172.3	41.1	-329.6	-171.6			
FR1 n26	SAR (W/kg)	0.809											
	Axis	23.3	-328.2	-171.5									
FR1 n71	SAR (W/kg)	0.412											
	Axis	15	-334.8	-170.7									
FR1 n7	SAR (W/kg)	0.883											
	Axis	3.7	-312.1	-169.7									
FR1 n41	SAR (W/kg)	0.714									0.817		
	Axis	4.3	-313.1	-169.8							67.1	-321.6	-169.2
FR1 n77	SAR (W/kg)				0.553			0.893					
	Axis				48.7	-253.4	-171.9	41.6	-332.6	-171.6			

WLAN5GHz Ant4	SAR (W/kg)	0.199					
	Axis	0.4		-300.2		-168.3	
BT Ant3	SAR (W/kg)	0.131					
	Axis	18.1		-313.2		-171.5	

Left Cheek																			
Band		Ant0			Ant2			Ant8			Ant4			Ant5			Ant9		
GSM850	SAR (W/kg)	0.267																	
	Axis	55.9	267.9	-172.4															
GSM1900	SAR (W/kg)				0.12														
	Axis				52.8	261.9	-171.3												
WCDMA II	SAR (W/kg)				0.173														
	Axis				52.3	261.7	-171.3												
WCDMA V	SAR (W/kg)	0.233																	
	Axis	55.3	268.3	-172.5															
LTE Band 71	SAR (W/kg)	0.104																	
	Axis	56.5	267.5	-172.4															
LTE Band 2	SAR (W/kg)				0.129														
	Axis				64.8	265.2	-170.6												
LTE Band 26	SAR (W/kg)	0.467																	
	Axis	56.2	266.9	-172.5															
LTE Band 7	SAR (W/kg)	0.126			0.189											0.576			
	Axis	54.2	268.1	-170.8	52.8	265.3	-171.3									31.2	212.1 -167.3		
LTE Band 41	SAR (W/kg)	0.059														0.542			
	Axis	56.4	264.3	-170.8												32.8	212.4 -166.8		
LTE Band 42	SAR (W/kg)							0.183			0.893			0.791					
	Axis							55.4	265.3	-172.5	-0.3	313.1	-169.2	27.9	332.3	-171.8			
FR1 n26	SAR (W/kg)	0.171																	
	Axis	55.8	266.3	-172.5															
FR1 n71	SAR (W/kg)	0.052																	
	Axis	56.5	267.5	-172.4															
FR1 n7	SAR (W/kg)				0.137														
	Axis				51.5	265.6	-170.8												
FR1 n41	SAR (W/kg)	0.161			0.115											0.746			
	Axis	57.3	268.6	-172.2	52.1	266.7	-170.9									33.2	212.6 -167.2		
FR1 n77	SAR (W/kg)							0.304			0.721			0.878					
	Axis							55.4	265.3	-172.5	0.2	313.9	-169.2	25.5	332.1	-171.5			
WLAN5GHz Ant4		SAR (W/kg)			0.397														
		Axis			15.3			324.4			-171.2								
BT Ant3		SAR (W/kg)			0.284														
		Axis			22.6			332.3			-171.6								

Left Tilted																
Band		Ant0			Ant2			Ant8			Ant4			Ant1		
GSM850	SAR (W/kg)	0.157												0.466		
	Axis	53.7	265.1	-171.5										-3.1	294.5	-167.8
GSM1900	SAR (W/kg)				0.068									0.516		
	Axis				69.3	287.7	-170.6							-5	305.7	-169.8
WCDMA II	SAR (W/kg)				0.123									0.594		
	Axis				68.9	285.4	-171.2							-3.6	308.5	167.8
WCDMA V	SAR (W/kg)	0.129												0.462		
	Axis	53.7	264.7	-171.5										-3.2	295.1	168.7
LTE Band 71	SAR (W/kg)													0.243		
	Axis													-4.7	292.1	-166.8
LTE Band 2	SAR (W/kg)				0.085									0.64		
	Axis				71.2	287.9	-169.4							-0.9	310.1	-168.8
LTE Band 26	SAR (W/kg)	0.108												0.504		
	Axis	55	265.4	-172.6										-2.9	294.4	-166.8
LTE Band 7	SAR (W/kg)				0.078									0.656		
	Axis				52.1	246.7	-170.9							3.2	311.2	-169.6
LTE Band 41	SAR (W/kg)				0.119									0.574		
	Axis				51.1	247.2	-171.1							3.5	308.9	-170.2
LTE Band 42	SAR (W/kg)							0.221			0.893					
	Axis							56	286.4	-172.7	1.1	313.4	-169.4			
FR1 n26	SAR (W/kg)	0.092												0.419		
	Axis	53	263.4	-171.6										-3.1	294.5	-167.1
FR1 n71	SAR (W/kg)													0.204		
	Axis													-4.7	292.1	-166.8
FR1 n7	SAR (W/kg)				0.058									0.709		
	Axis				51.6	248.5	-170.9							2.7	309.6	-168.7
FR1 n41	SAR (W/kg)				0.085									0.681		
	Axis				52.3	247.6	-171.1							2.1	307.5	-170.3
FR1 n77	SAR (W/kg)							0.331			0.876					
	Axis							56.9	282.1	-172.5	1.1	313.6	-169.4			

WLAN5GHz Ant4		SAR (W/kg)	0.34					
		Axis	14.9		331.5		-171.2	
BT Ant3		SAR (W/kg)	0.256					
		Axis	22.9		336.2		-171.8	

<Hotspot>

Front																						
Band		Ant0			Ant1			Ant2			Ant4			Ant5			Ant7			Ant9		
GSM850	SAR (W/kg)	0.513			0.285																	
	Axis	-15.8	-61.8	-204	-44.8	84.2	-204															
GSM1900	SAR (W/kg)				0.213			0.683														
	Axis				-52.8	88.3	-204	1.6	-74.1	-204												
WCDMA II	SAR (W/kg)				0.2			0.708														
	Axis				-53.5	88.5	-204	2.3	-73.7	-204												
WCDMA V	SAR (W/kg)	0.633			0.229																	
	Axis	16.7	-62.3	-204	-44.5	84	-204															
LTE Band 71	SAR (W/kg)	0.352			0.125																	
	Axis	4.7	-71.2	-204	-48.6	73.5	-204															
LTE Band 2	SAR (W/kg)				0.178			0.939														
	Axis				-52	90	-204	0.5	-73.5	-204												
LTE Band 26	SAR (W/kg)	0.513			0.233																	
	Axis	18.1	-61.7	-204	-44.5	84.6	-204															
LTE Band 7	SAR (W/kg)	0.922			0.197			0.718											0.185			
	Axis	-29	-82.8	-204	-25	84	-204	13	-80.4	-204									-71.8	34.8	-204	
LTE Band 41	SAR (W/kg)	0.887			0.213			0.555											0.116			
	Axis	-25	-81.5	-204	-25.6	85.6	-204	12	-78.9	-204									-72.5	33.7	-204	
LTE Band 42	SAR (W/kg)										0.085			0.231			0.271					
	Axis										-25	87	-204	14	71	-204	-55	69	-204			
FR1 n26	SAR (W/kg)	0.231			0.434																	
	Axis	18.5	-61.5	-204	-44.6	84.3	-204															
FR1 n71	SAR (W/kg)	0.245			0.124																	
	Axis	4.7	-71.2	-204	-48.6	73.5	-204															
FR1 n7	SAR (W/kg)				0.182			0.612														
	Axis				-24.3	84.2	-204	11.6	-78.4	-204												
FR1 n41	SAR (W/kg)	0.945			0.193			0.584											0.202			
	Axis	-27.8	-78.6	-204	-26.1	86.7	-204	13	-79.1	-204									-71.5	-34.5	-204	
FR1 n77	SAR (W/kg)										0.171			0.206			0.262					
	Axis										-24	81	-204	13	71	-204	-63	61	-204			

WLAN5GHz Ant4	SAR (W/kg)	0.434		
	Axis	-7	80	-204
BT Ant3	SAR (W/kg)	0.188		
	Axis	-1	79.2	-204

Back																									
Band		Ant0			Ant1			Ant2			Ant4			Ant5			Ant7			Ant8			Ant9		
GSM850	SAR (W/kg)	1.298			0.619																				
	Axis	18.6	-61.6	-204	-10.8	74.1	-204																		
GSM1900	SAR (W/kg)				0.622			0.85																	
	Axis				-8.9	74.5	-204	-32.4	-74.1	-204															
WCDMA II	SAR (W/kg)				0.623			0.898																	
	Axis				-9.1	74.7	-204	-32.8	-72.8	-204															
WCDMA V	SAR (W/kg)	1.261			0.617																				
	Axis	5	-63	-204	-10.2	73.5	-204																		
LTE Band 71	SAR (W/kg)	0.723			0.517																				
	Axis	18.5	-61.5	-204	-11.5	75	-204																		
LTE Band 2	SAR (W/kg)				0.619			1.003																	
	Axis				-10	75	-204	-38.5	-73.5	-204															
LTE Band 26	SAR (W/kg)	0.474			0.624																				
	Axis	-8.5	-75	-204	-11.5	73.5	-204																		
LTE Band 7	SAR (W/kg)	1.183			0.626			1.005															0.26		
	Axis	-3.4	-81.6	-204	-13	80.4	-204	-23.8	-82.8	-204													13.4	66.7	-204
LTE Band 41	SAR (W/kg)	1.296			0.63			0.842															0.173		
	Axis	-3.5	-79.5	-204	-11.8	82.8	-204	-31.5	-79.5	-204													12.2	66	-204
LTE Band 42	SAR (W/kg)										0.2			0.386			0.504			1.045					
	Axis													-25	83	-204	-64	70	-204	5	61	-204	-64	-51	-204
FR1 n26	SAR (W/kg)	0.619			0.619																				
	Axis	-8.2	-75.3	-204	-10.8	74.1	-204																		
FR1 n71	SAR (W/kg)	0.479			0.442																				
	Axis	18.5	-61.5	-204	-11.5	75	-204																		
FR1 n7	SAR (W/kg)				0.621			0.797																	
	Axis				-11	78.6	-204	-30.2	-78.5	-204															
FR1 n41	SAR (W/kg)	1.238			0.624			0.768															0.353		
	Axis	-4.2	-80.2	-204	-12	78.9	-204	-31.3	-79.5	-204													12.5	68.5	-204
FR1 n77	SAR (W/kg)										0.357			0.588			0.62			0.447					
	Axis													-19	86	-204	-64	72	-204	3	60	-204	-63	-69	-204

WLAN5GHz Ant4	SAR (W/kg)	0.614																	
	Axis	-33						80						-204					
BT Ant3	SAR (W/kg)	0.304																	
	Axis	-46.6						72						-204					

Left Side									
Band		Ant0			Ant7			Ant9	
GSM850	SAR (W/kg)	0.574							
	Axis	-26.8	-59.6	-204					
GSM1900	SAR (W/kg)								
	Axis								
WCDMA II	SAR (W/kg)								
	Axis								
WCDMA V	SAR (W/kg)	0.27							
	Axis	-26.3	-57.4	-204					
LTE Band 71	SAR (W/kg)	0.789							
	Axis	-24.5	-61.2	-204					
LTE Band 2	SAR (W/kg)								
	Axis								
LTE Band 26	SAR (W/kg)	0.377							
	Axis	-25.8	-58.2	-204					
LTE Band 7	SAR (W/kg)	0.323						0.625	
	Axis	-27.1	-46.8	-204				-28.4	30.8
LTE Band 41	SAR (W/kg)	0.286						0.625	
	Axis	-27.5	-48.6	-204				-26.4	22.8
LTE Band 42	SAR (W/kg)				0.621				
	Axis				-31.3	60	-204		
FR1 n26	SAR (W/kg)	0.756							
	Axis	-25.8	-61.1	-204					
FR1 n71	SAR (W/kg)	0.522							
	Axis	-24.5	-61.2	-204					
FR1 n7	SAR (W/kg)								
	Axis								
FR1 n41	SAR (W/kg)	0.443						0.627	
	Axis	-27.5	-47.6	-204				-28.4	31.2
FR1 n77	SAR (W/kg)				0.568				
	Axis				-32	70	-204		
WLAN5GHz Ant4	SAR (W/kg)	0.066							
	Axis	-39			89			-204	

Right Side																	
Band		Ant1			Ant4			Ant5			Ant7			Ant8			Ant9
GSM850	SAR (W/kg)	0.055															
	Axis	-27.1	-64.2	-204													
GSM1900	SAR (W/kg)	0.033															
	Axis	-26.4	-63.7	-204													
WCDMA II	SAR (W/kg)	0.033															
	Axis	-268	-63.1	-204													
WCDMA V	SAR (W/kg)	0.044															
	Axis	-26.3	-61.8	-204													
LTE Band 71	SAR (W/kg)	0.071															
	Axis	-27.1	-23.7	-204													
LTE Band 2	SAR (W/kg)	0.069															
	Axis	-26.6	-64.5	-204													
LTE Band 26	SAR (W/kg)	0.056															
	Axis	-27.4	-64.5	-204													
LTE Band 7	SAR (W/kg)	0.023															
	Axis	-40.2	-74.4	-204													
LTE Band 41	SAR (W/kg)	0.026															
	Axis	-38.2	-71.4	-204													
LTE Band 42	SAR (W/kg)				0.014			0.627						1.297			
	Axis				-29.2	-72	-204	-26.4	-66	-204				-30.6	40	-204	
FR1 n26	SAR (W/kg)	0.054															
	Axis	-25.8	-62.3	-204													
FR1 n71	SAR (W/kg)	0.073															
	Axis	-27.1	-23.7	204													
FR1 n7	SAR (W/kg)	0.024															
	Axis	-36.7	-68.5	-204													
FR1 n41	SAR (W/kg)	0.026															
	Axis	-37.1	-69.2	-204													
FR1 n77	SAR (W/kg)				0.027			0.621			0.018			1.279			
	Axis				-29.2	-72	-204	-27.1	-66	-204	-46	-89	-204	-31	40	-204	
WLAN5GHz Ant4		SAR (W/kg)			0.268												
		Axis			-30.6			-66			-204						
BT Ant3		SAR (W/kg)			0.101												
		Axis			-27.8			-54			-204						

<Body-worn>

Front																			
Band		Ant0			Ant1			Ant2			Ant4			Ant5			Ant7		
GSM850	SAR (W/kg)	0.513			0.401														
	Axis	-15.8	-61.8	-204	-44.8	84.2	-204												
GSM1900	SAR (W/kg)				0.303			1.044											
	Axis				-52.8	88.3	-204	1.6	-74.1	-204									
WCDMA II	SAR (W/kg)				0.284			1.069											
	Axis				-53.5	88.5	-204	2.3	-73.7	-204									
WCDMA V	SAR (W/kg)	0.633			0.325														
	Axis	16.7	-62.3	-204	-44.5	84	-204												
LTE Band 71	SAR (W/kg)	0.306			0.125														
	Axis	4.7	-71.2	-204	-48.6	73.5	-204												
LTE Band 2	SAR (W/kg)				0.252			1.195											
	Axis				-52	90	-204	0.5	-73.5	-204									
LTE Band 26	SAR (W/kg)	0.513			0.334														
	Axis	18.1	-61.7	-204	-44.5	84.6	-204												
LTE Band 7	SAR (W/kg)	0.986			0.272			0.994											0.422
	Axis	-29	-82.8	-204	-25	84	-204	13	-80.4	-204								-71.8	34.8 -204
LTE Band 41	SAR (W/kg)	0.887			0.302			0.835											0.331
	Axis	-25	-81.5	-204	-25.6	85.6	-204	12	-78.9	-204								-72.5	33.7 -204
LTE Band 42	SAR (W/kg)										0.224			0.332			0.466		
	Axis										-25	87	-204	14	71	-204	-55	69	-204
FR1 n26	SAR (W/kg)	0.434			0.33														
	Axis	18.5	-61.5	-204	-44.6	84.3	-204												
FR1 n71	SAR (W/kg)	0.224			0.124														
	Axis	4.7	-71.2	-204	-48.6	73.5	-204												
FR1 n7	SAR (W/kg)				0.261			0.985											
	Axis				-24.3	84.2	-204	11.6	-78.4	-204									
FR1 n41	SAR (W/kg)	0.981			0.271			0.854											0.5
	Axis	-27.8	-78.6	-204	-26.1	86.7	-204	13	-79.1	-204								-71.5	34.5 -204
FR1 n77	SAR (W/kg)										0.421			0.311			0.421		
	Axis										-24	81	-204	13	71	-204	-63	61	-204

WLAN5GHz Ant4	SAR (W/kg)	0.391		
	Axis	-7	80	-204
BT Ant3	SAR (W/kg)	0.188		
	Axis	-1	79.2	-204

Back																									
Band		Ant0			Ant1			Ant2			Ant4			Ant5			Ant7			Ant8			Ant9		
GSM850	SAR (W/kg)	1.298			0.882																				
	Axis	18.6	-61.6	-204	-10.8	74.1	-204																		
GSM1900	SAR (W/kg)				0.892			1.283																	
	Axis				-8.9	74.5	-204	-32.4	-74.1	-204															
WCDMA II	SAR (W/kg)				0.88			1.273																	
	Axis				-9.1	74.7	-204	-32.8	-72.8	-204															
WCDMA V	SAR (W/kg)	1.261			0.875																				
	Axis	-8.3	-76	-204	-10.2	73.5	-204																		
LTE Band 71	SAR (W/kg)	0.63			0.517																				
	Axis	18.5	-61.5	-204	-11.5	75	-204																		
LTE Band 2	SAR (W/kg)				0.883			1.289																	
	Axis				-10	75.2	-204	-38.5	-73.5	-204															
LTE Band 26	SAR (W/kg)	0.474			0.894																				
	Axis	-8.5	-75	-204	-11.5	73.5	-204																		
LTE Band 7	SAR (W/kg)	1.265			0.881			1.277															0.879		
	Axis	-3.4	-81.6	-204	-13	80.4	-204	-23.8	-82.8	-204													13.4	66.7	-204
LTE Band 41	SAR (W/kg)	1.296			0.894			1.287															0.892		
	Axis	-3.5	-79.5	-204	-11.8	82.8	-204	-31.5	-79.5	-204													12.2	66	-204
LTE Band 42	SAR (W/kg)										0.896			0.556			0.895			1.205					
	Axis													-25	83	-204	-64	70	-204	5	61	-204	-64	-51	-204
FR1 n26	SAR (W/kg)	0.819			0.883																				
	Axis	-8.2	-75.3	-204	-10.8	74.1	-204																		
FR1 n71	SAR (W/kg)	0.438			0.442																				
	Axis	18.5	-61.5	-204	-11.5	75	-204																		
FR1 n7	SAR (W/kg)				0.876			1.28																	
	Axis				-11	78.6	-204	-30.2	-78.5	-204															
FR1 n41	SAR (W/kg)	1.285			0.877			1.121															0.844		
	Axis	-4.2	-80.2	-204	-12	78.9	-204	-31.3	-79.5	-204													12.5	68.5	-204
FR1 n77	SAR (W/kg)										0.881			0.888			0.884			1.282					
	Axis													-19	86	-204	-64	72	-204	3	60	-204	-63	-69	-204
WLAN5GHz Ant4		SAR (W/kg)			0.384																				
		Axis			-33					80					-204										
BT Ant3		SAR (W/kg)			0.304																				
		Axis			-46.6					72					-204										

<Extremity>

Front				
Band		Ant2		
GSM850	SAR (W/kg)			
	Axis			
GSM1900	SAR (W/kg)	2.586		
	Axis	-40	-73.5	-204
WCDMA II	SAR (W/kg)	3.13		
	Axis	-40	-73.5	-204
WCDMA V	SAR (W/kg)			
	Axis			
LTE Band 71	SAR (W/kg)			
	Axis			
LTE Band 2	SAR (W/kg)	3.165		
	Axis	-40	-73.5	-204
LTE Band 26	SAR (W/kg)			
	Axis			
LTE Band 7	SAR (W/kg)	2.143		
	Axis	-5	-79	-204
LTE Band 41	SAR (W/kg)			
	Axis			
LTE Band 42	SAR (W/kg)			
	Axis			
FR1 n26	SAR (W/kg)			
	Axis			
FR1 n71	SAR (W/kg)			
	Axis			
FR1 n7	SAR (W/kg)	1.8		
	Axis	-5	-79	-204
FR1 n41	SAR (W/kg)	1.46		
	Axis	-5	-79	-204
FR1 n77	SAR (W/kg)			
	Axis			
WLAN5GHz Ant4	SAR (W/kg)	0.909		
	Axis	-11.2	81.2	-207
NFC	SAR (W/kg)	0.001		
	Axis	-63	60	-204

Back																		
Band		Ant0			Ant1			Ant2			Ant4			Ant5			Ant7	
GSM850	SAR (W/kg)	2.225			1.591													
	Axis	3.5	-72	-204	-10	73.5	-204											
GSM1900	SAR (W/kg)				1.487			2.907										
	Axis				-11.5	75	-204	-10	-73.5	-204								
WCDMA II	SAR (W/kg)				2.103			3.17										
	Axis				-11.5	75	-204	-10	-73.5	-204								
WCDMA V	SAR (W/kg)	2.012																
	Axis	3.5	-72	-204														
LTE Band 71	SAR (W/kg)																	
	Axis																	
LTE Band 2	SAR (W/kg)				1.9			2.919										
	Axis				-11.5	75	-204	-10	-73.5	-204								
LTE Band 26	SAR (W/kg)				1.397													
	Axis				-10	73.5	-204											
LTE Band 7	SAR (W/kg)	2.283			1.947			1.981										
	Axis	-11.8	-72	-204	-14	79	-204	-25	-79	-204								
LTE Band 41	SAR (W/kg)	2.032			1.553			1.399										
	Axis	-11.8	-72	-204	-14	79	-204	-25	-79	-204								
LTE Band 42	SAR (W/kg)																1.994	
	Axis															5	66 -204	
FR1 n26	SAR (W/kg)				1.078													
	Axis				2	73.5	-204											
FR1 n71	SAR (W/kg)																	
	Axis																	
FR1 n7	SAR (W/kg)				2.063			1.875										
	Axis				-14	79	-204	-25	-79	-204								
FR1 n41	SAR (W/kg)	3.115			2.135			1.756										
	Axis	-10.6	-71.6	-204	-14	79	-204	-25	-79	-204								
FR1 n77	SAR (W/kg)										1.121			0.939			1.929	
	Axis										-23	82	-204	-63	63	-204	5 66 -204	
WLAN5GHz Ant4		SAR (W/kg)			0.293													
		Axis			-55			88			-204							
NFC		SAR (W/kg)			0.033													
		Axis			-15			75			-204							

Right Side							
Band		Ant5			Ant8		
GSM850	SAR (W/kg)						
	Axis						
GSM1900	SAR (W/kg)						
	Axis						
WCDMA II	SAR (W/kg)						
	Axis						
WCDMA V	SAR (W/kg)						
	Axis						
LTE Band 71	SAR (W/kg)						
	Axis						
LTE Band 2	SAR (W/kg)						
	Axis						
LTE Band 26	SAR (W/kg)						
	Axis						
LTE Band 7	SAR (W/kg)						
	Axis						
LTE Band 41	SAR (W/kg)						
	Axis						
LTE Band 42	SAR (W/kg)				1.49		
	Axis				-26.6	65	-204
FR1 n26	SAR (W/kg)						
	Axis						
FR1 n71	SAR (W/kg)						
	Axis						
FR1 n7	SAR (W/kg)						
	Axis						
FR1 n41	SAR (W/kg)						
	Axis						
FR1 n77	SAR (W/kg)	2.448			3.151		
	Axis	-25	-83	-204	-25	67	-204

WLAN5GHz Ant4	SAR (W/kg)	0.344					
	Axis	-26.4		-85		-204	
NFC	SAR (W/kg)	0.001					
	Axis	-46.7		-84		-204	

Test Engineer : Martin Li, Varus Wang, Light Wang

19. Uncertainty Assessment

Per KDB 865664 D01 SAR measurement 100MHz to 6GHz, when the highest measured 1-g SAR within a frequency band is < 1.5 W/kg and the measured 10-g SAR within a frequency band is < 3.75 W/kg. The expanded SAR measurement uncertainty must be $\leq 30\%$, for a confidence interval of $k = 2$. If these conditions are met, extensive SAR measurement uncertainty analysis described in IEEE Std 1528-2013 is not required in SAR reports submitted for equipment approval. For this device, the highest measured 1-g SAR is less 1.5W/kg and highest measured 10-g SAR is less 3.75W/kg. Therefore, the measurement uncertainty table is not required in this report.

Declaration of Conformity:

The test results with all measurement uncertainty excluded is presented in accordance with the regulation limits or requirements declared by manufacturers.

Comments and Explanations:

The declared of product specification for EUT presented in the report are provided by the manufacturer, and the manufacturer takes all the responsibilities for the accuracy of product specification.

The component of uncertainty may generally be categorized according to the methods used to evaluate them. The evaluation of uncertainty by the statistical analysis of a series of observations is termed a Type A evaluation of uncertainty. The evaluation of uncertainty by means other than the statistical analysis of a series of observation is termed a Type B evaluation of uncertainty. Each component of uncertainty, however evaluated, is represented by an estimated standard deviation, termed standard uncertainty, which is determined by the positive square root of the estimated variance.

A Type A evaluation of standard uncertainty may be based on any valid statistical method for treating data. This includes calculating the standard deviation of the mean of a series of independent observations; using the method of least squares to fit a curve to the data in order to estimate the parameter of the curve and their standard deviations; or carrying out an analysis of variance in order to identify and quantify random effects in certain kinds of measurement.

A type B evaluation of standard uncertainty is typically based on scientific judgment using all of the relevant information available. These may include previous measurement data, experience, and knowledge of the behavior and properties of relevant materials and instruments, manufacture's specification, data provided in calibration reports and uncertainties assigned to reference data taken from handbooks. Broadly speaking, the uncertainty is either obtained from an outdoor source or obtained from an assumed distribution, such as the normal distribution, rectangular or triangular distributions indicated in table below.

Uncertainty Distributions	Normal	Rectangular	Triangular	U-Shape
Multi-plying Factor ^(a)	$1/k^{(b)}$	$1/\sqrt{3}$	$1/\sqrt{6}$	$1/\sqrt{2}$

(a) standard uncertainty is determined as the product of the multiplying factor and the estimated range of variations in the measured quantity

(b) k is the coverage factor

Standard Uncertainty for Assumed Distribution

The combined standard uncertainty of the measurement result represents the estimated standard deviation of the result. It is obtained by combining the individual standard uncertainties of both Type A and Type B evaluation using the usual "root-sum-squares" (RSS) methods of combining standard deviations by taking the positive square root of the estimated variances.

Expanded uncertainty is a measure of uncertainty that defines an interval about the measurement result within which the measured value is confidently believed to lie. It is obtained by multiplying the combined standard uncertainty by a coverage factor. Typically, the coverage factor ranges from 2 to 3. Using a coverage factor allows the true value of a measured quantity to be specified with a defined probability within the specified uncertainty range. For purpose of this document, a coverage factor two is used, which corresponds to confidence interval of about 95 %. The DASY uncertainty Budget is shown in the following tables.

The judgment of conformity in the report is based on the measurement results excluding the measurement uncertainty.

Uncertainty Budget According to IEC/IEEE 62209-1528 (Frequency band: 4 MHz - 10 GHz range)							
Error Description	Uncert. Value (±%)	Prob. Dist.	Div.	(Ci) 1g	(Ci) 10g	Standard Uncertainty (1g) (±%)	Standard Uncertainty (10g) (±%)
Measurement System errors							
Probe calibration	18.6	N	2	1	1	9.3	9.3
Probe calibration drift	1.7	R	1.732	1	1	1.0	1.0
Probe linearity and detection Limit	4.7	R	1.732	1	1	2.7	2.7
Broadband signal	2.8	R	1.732	1	1	1.6	1.6
Probe isotropy	7.6	R	1.732	1	1	4.4	4.4
Other probe and data acquisition errors	2.4	N	1	1	1	2.4	2.4
RF ambient and noise	1.8	N	1	1	1	1.8	1.8
Probe positioning errors	0.006	N	1	0.5	0.5	0.0	0.0
Data processing errors	4.0	N	1	1	1	4.0	4.0
Phantom and Device Errors							
Measurement of phantom conductivity (σ)	2.5	N	1	0.78	0.71	2.0	1.8
Temperature effects (medium)	5.4	R	1.732	0.78	0.71	2.4	2.2
Shell permittivity	14.0	R	1.732	0.5	0.5	4.0	4.0
Distance between the radiating element of the DUT and the phantom medium	2.0	N	1	2	2	4.0	4.0
Repeatability of positioning the DUT or source against the phantom	1.0	N	1	1	1	1.0	1.0
Device holder effects	3.6	N	1	1	1	3.6	3.6
Effect of operating mode on probe sensitivity	2.4	R	1.732	1	1	1.4	1.4
Time-average SAR	1.7	R	1.732	1	1	1.0	1.0
Variation in SAR due to drift in output of DUT	2.5	N	1	1	1	2.5	2.5
Validation antenna uncertainty (validation measurement only)	0.0	N	1	1	1	0.0	0.0
Uncertainty in accepted power (validation measurement only)	0.0	N	1	1	1	0.0	0.0
Correction to the SAR results							
Phantom deviation from target (ϵ' , σ)	1.9	N	1	1	0.84	1.9	1.6
SAR scaling	0.0	R	1.732	1	1	0.0	0.0
Combined Std. Uncertainty						14.5%	14.4%
Coverage Factor for 95 %						K=2	K=2
Expanded STD Uncertainty						29.0%	28.8%

20. References

- [1] FCC 47 CFR Part 2 “Frequency Allocations and Radio Treaty Matters; General Rules and Regulations”
- [2] ANSI/IEEE Std. C95.1-1992, “IEEE Standard for Safety Levels with Respect to Human Exposure to Radio Frequency Electromagnetic Fields, 3 kHz to 300 GHz”, September 1992
- [3] IEEE Std. 1528-2013, “IEEE Recommended Practice for Determining the Peak Spatial-Average Specific Absorption Rate (SAR) in the Human Head from Wireless Communications Devices: Measurement Techniques”, Sep 2013
- [4] IEC/IEEE 62209-1528:2020, “Measurement procedure for the assessment of specific absorption rate of human exposure to radio frequency fields from hand-held and body-mounted wireless communication devices – Part 1528: Human models, instrumentation, and procedures (Frequency range of 4 MHz to 10 GHz)”
- [5] SPEAG DASY System Handbook
- [6] FCC KDB 865664 D01 v01r04, “SAR Measurement Requirements for 100 MHz to 6 GHz”, Aug 2015.
- [7] FCC KDB 865664 D02 v01r02, “RF Exposure Compliance Reporting and Documentation Considerations” Oct 2015.
- [8] FCC KDB 648474 D04 v01r03, “SAR Evaluation Considerations for Wireless Handsets”, Oct 2015.
- [9] FCC KDB 248227 D01 v02r02, “SAR Guidance for IEEE 802.11 (WiFi) Transmitters”, Oct 2015.
- [10] FCC KDB 616217 D04 v01r02, “SAR Evaluation Considerations for Laptop, Notebook, Netbook and Tablet Computers”, Oct 2015
- [11] FCC KDB 941225 D01 v03r01, “3G SAR MEAUREMENT PROCEDURES”, Oct 2015
- [12] FCC KDB 941225 D05 v02r05, “SAR Evaluation Considerations for LTE Devices”, Dec 2015
- [13] FCC KDB 941225 D05A v01r02, “Rel. 10 LTE SAR Test Guidance and KDB Inquiries”, Oct 2015
- [14] FCC KDB 941225 D06 v02r01, “SAR Evaluation Procedures for Portable Devices with Wireless Router Capabilities”, Oct 2015.
- [15] FCC KDB 447498 D01 v06, “Mobile and Portable Device RF Exposure Procedures and Equipment Authorization Policies”, Oct 2015
- [16] FCC KDB 484596 D01 v02r03, “Test Reductions Via Data Referencing”, Mar. 2024

Appendixes

Please refer to separated files for the following appendixes

Appendix A. Plots of System Performance Check

Appendix B. Plots of High SAR Measurement

Appendix C. DASYS Calibration Certificate

Appendix D. Test Setup Photos

Appendix E. Conducted RF Output Power Table

Appendix F. Power measurement connection diagram and LTE CA Conducted RF Output Power Table

Appendix G. Power reduction mechanism verification

Appendix H. Reference report

Please refer to Sporton report number FA4D1311-01 and FA4D1311-01A which is exhibit separately.

-----THE END-----