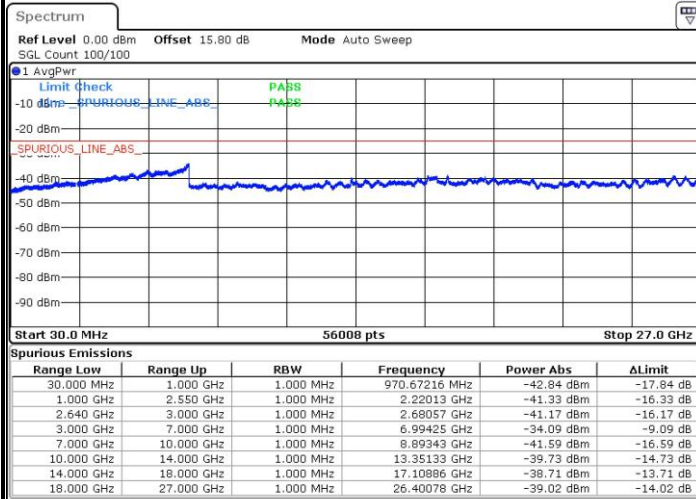




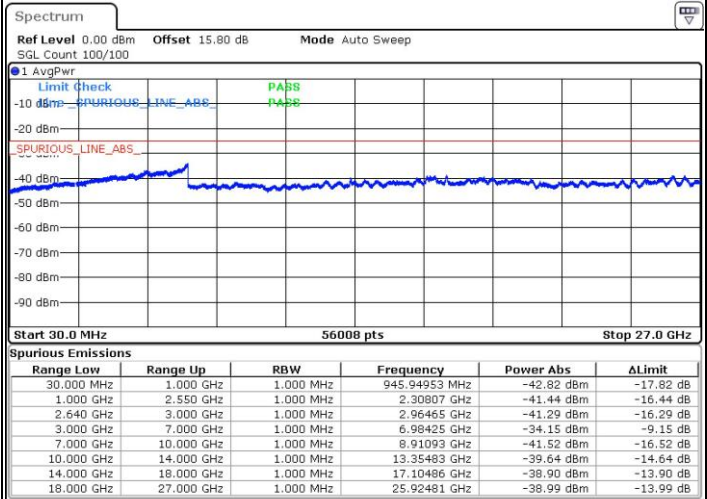
LTE Band 38 / 15MHz

Highest Channel / QPSK



Date: 22.AUG.2019 07:07:51

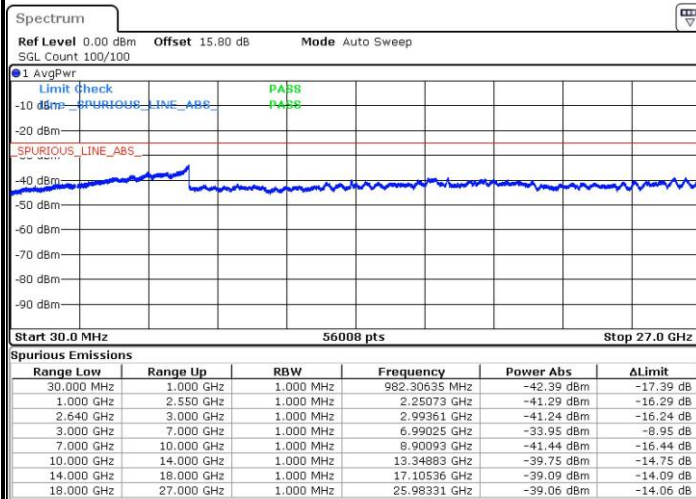
Highest Channel / 16QAM



Date: 22.AUG.2019 07:09:14

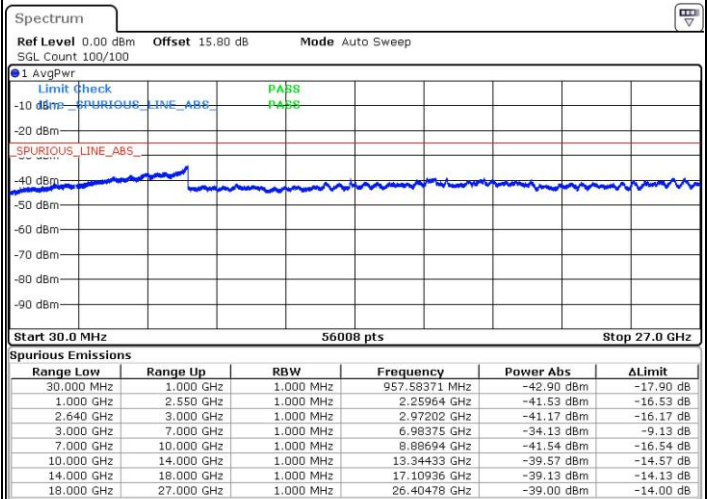
LTE Band 38 / 20MHz

Lowest Channel / QPSK



Date: 22.AUG.2019 07:14:48

Lowest Channel / 16QAM

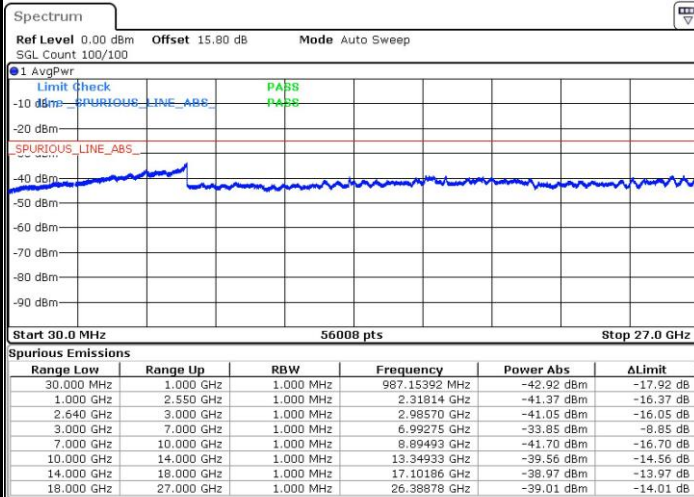


Date: 22.AUG.2019 07:16:11



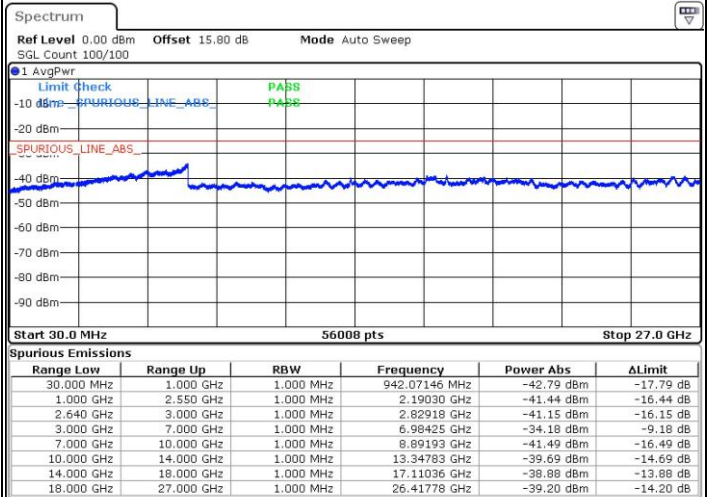
LTE Band 38 / 20MHz

Middle Channel / QPSK



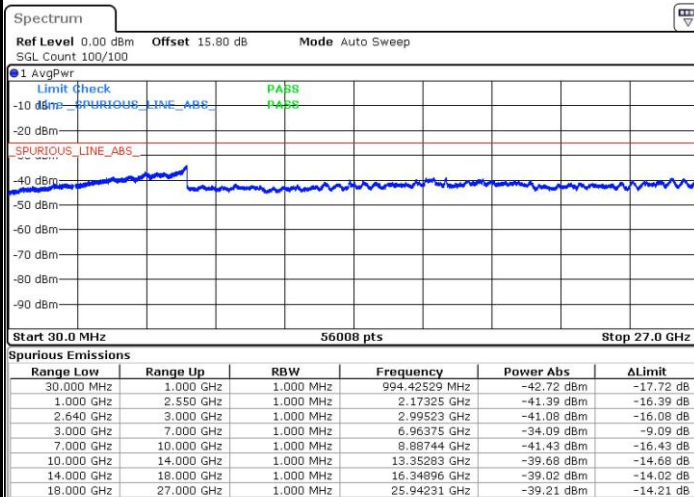
Date: 22.AUG.2019 07:17:34

Middle Channel / 16QAM



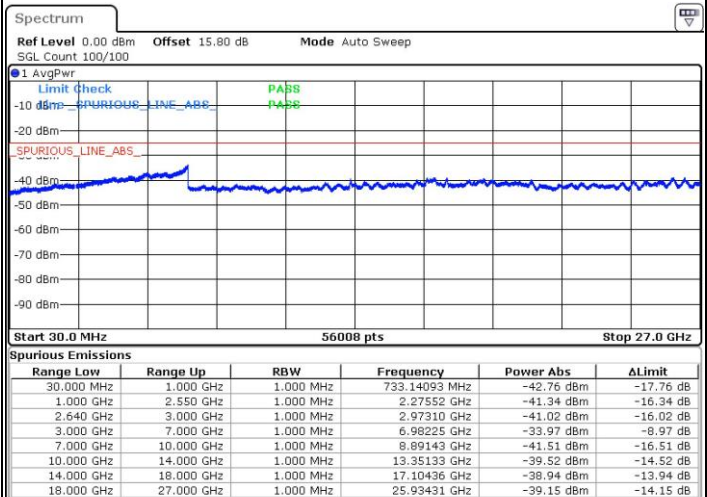
Date: 22.AUG.2019 07:18:57

Highest Channel / QPSK



Date: 22.AUG.2019 07:20:20

Highest Channel / 16QAM

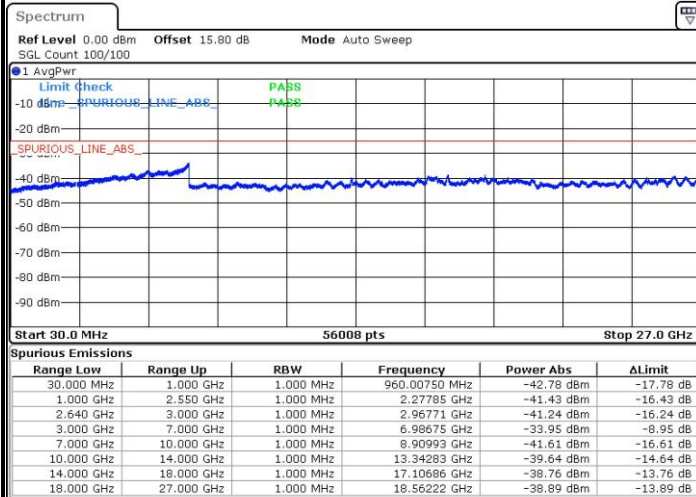


Date: 22.AUG.2019 07:21:44



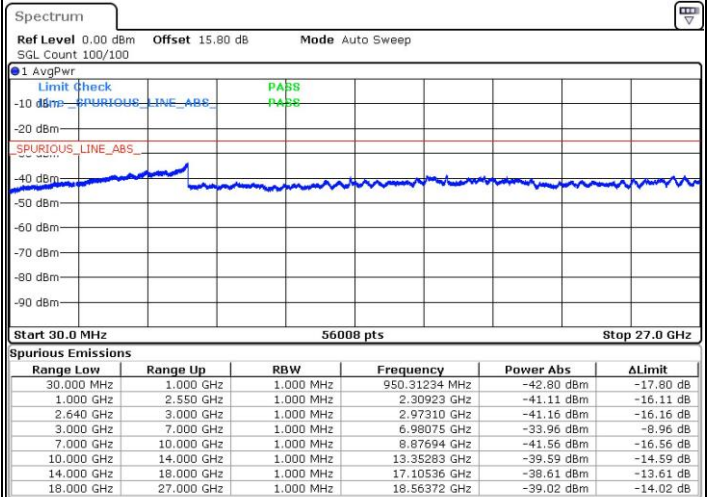
LTE Band 38 / 5MHz

Lowest Channel / 64QAM



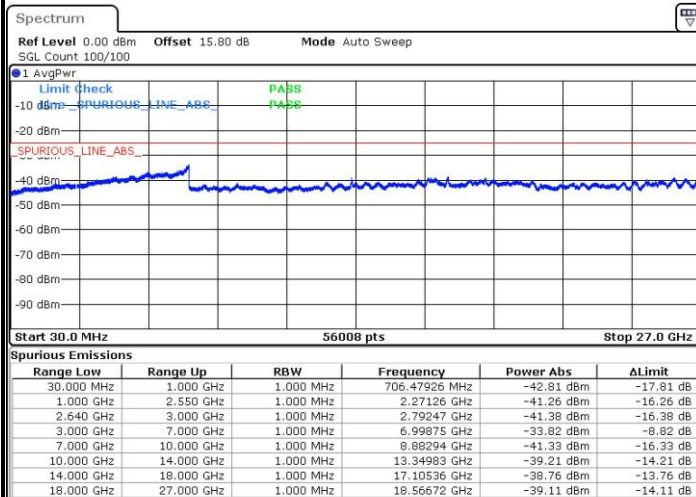
Date: 22.AUG.2019 02:23:12

Middle Channel / 64QAM



Date: 22.AUG.2019 02:24:35

Highest Channel / 64QAM

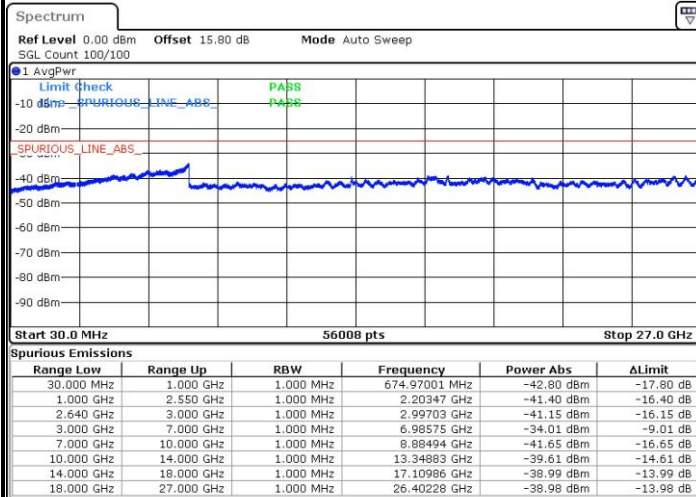


Date: 22.AUG.2019 02:25:58



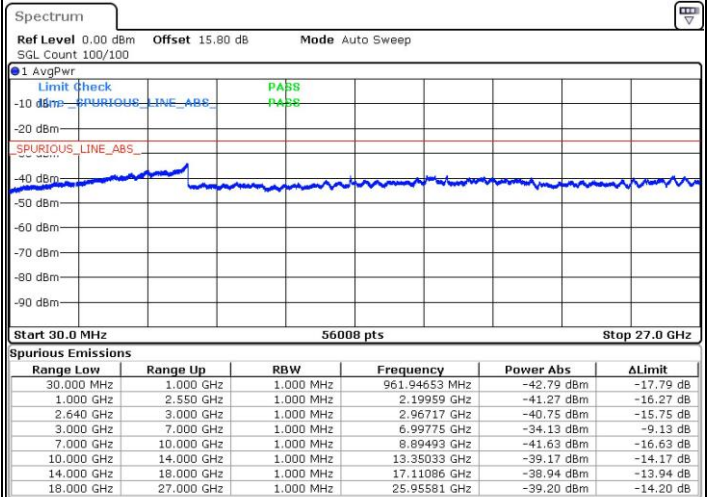
LTE Band 38 / 10MHz

Lowest Channel / 64QAM



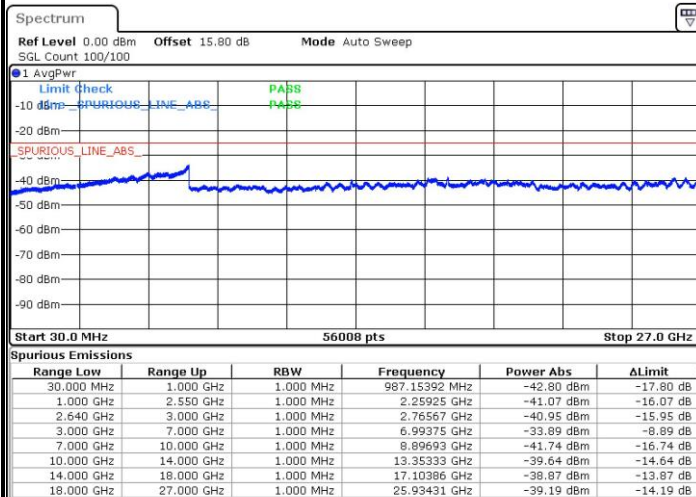
Date: 22.AUG.2019 02:35:40

Middle Channel / 64QAM



Date: 22.AUG.2019 02:37:03

Highest Channel / 64QAM

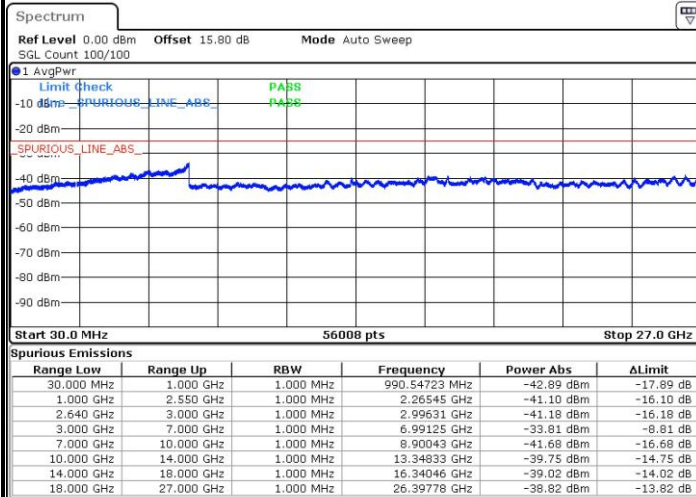


Date: 22.AUG.2019 02:38:26



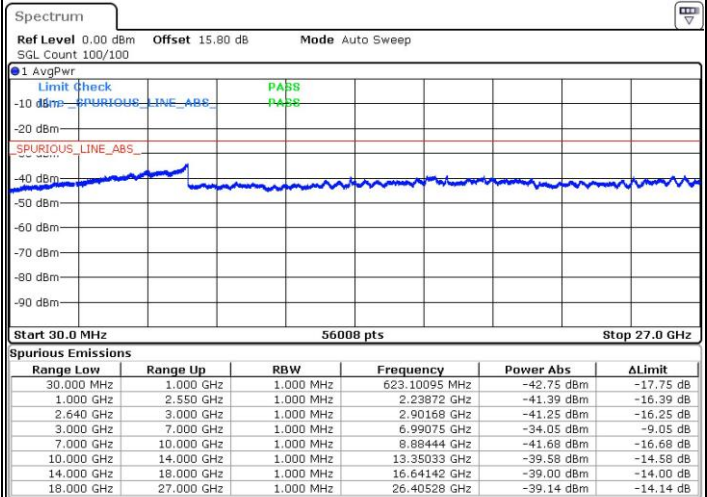
LTE Band 38 / 15MHz

Lowest Channel / 64QAM



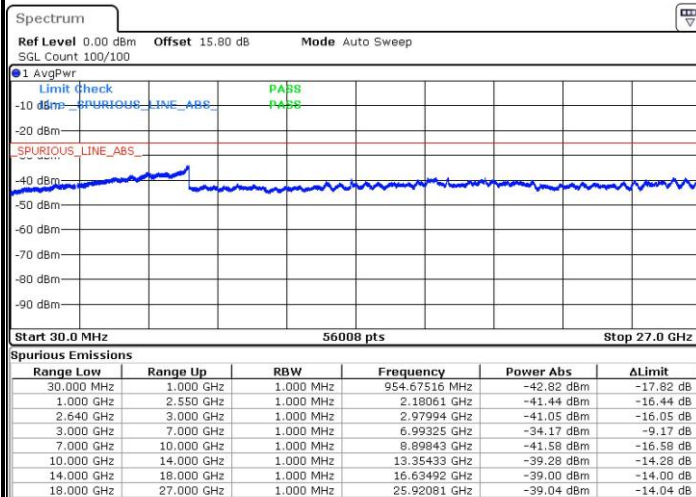
Date: 22.AUG.2019 07:10:38

Middle Channel / 64QAM



Date: 22.AUG.2019 07:12:01

Highest Channel / 64QAM

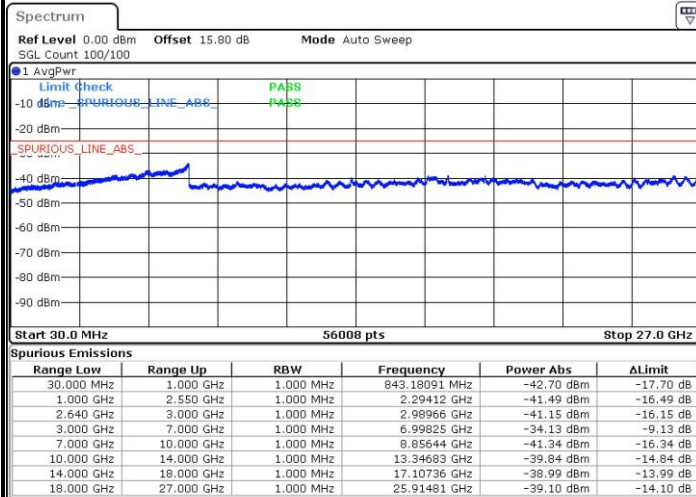


Date: 22.AUG.2019 07:13:24



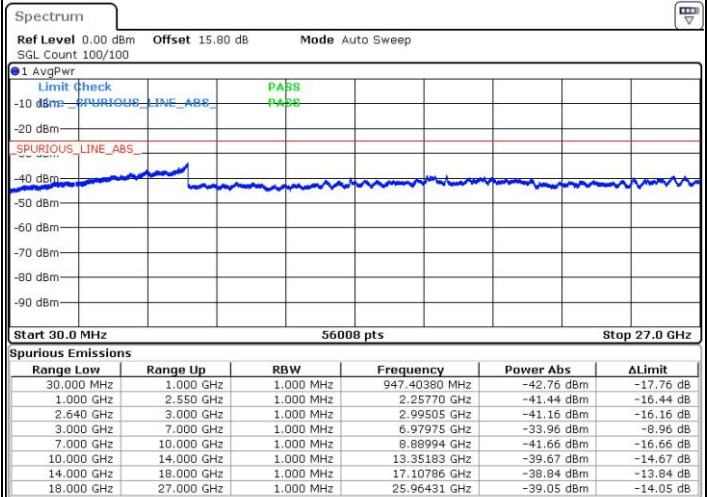
LTE Band 38 / 20MHz

Lowest Channel / 64QAM



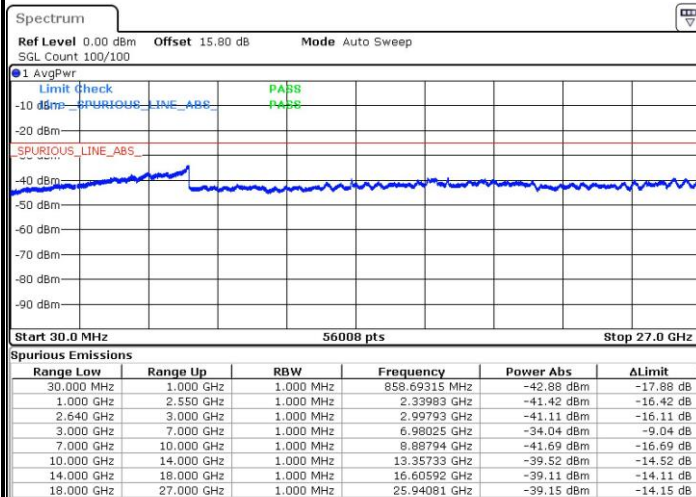
Date: 22.AUG.2019 07:23:07

Middle Channel / 64QAM



Date: 22.AUG.2019 07:24:30

Highest Channel / 64QAM



Date: 22.AUG.2019 07:25:53

Frequency Stability

Test Conditions		LTE Band 38 (QPSK) / Middle Channel	Limit
Temperature (°C)	Voltage (Volt)	BW 10MHz	Note 2.
		Deviation (ppm)	Result
50	Normal Voltage	0.0035	PASS
40	Normal Voltage	0.0021	
30	Normal Voltage	0.0015	
20(Ref.)	Normal Voltage	0.0000	
10	Normal Voltage	0.0019	
0	Normal Voltage	0.0039	
-10	Normal Voltage	0.0021	
-20	Normal Voltage	0.0016	
-30	Normal Voltage	0.0029	
20	Maximum Voltage	0.0012	
20	Normal Voltage	0.0000	
20	Battery End Point	0.0015	

Note:

1. Normal Voltage =3.9 V. ; Battery End Point (BEP) =3.4 V. ; Maximum Voltage =4.35 V.
2. The frequency fundamental emissions stay within the authorized frequency block.



Appendix B. Test Results of EIRP and Radiated Test

EIRP

LTE Band 38 / 5MHz (Peak) (GT - LC = -6 dB)							
Channel	Mode	RB		Conducted		EIRP	
		Size	Offset	Power (dBm)	Power (Watts)	EIRP(dBm)	EIRP(W)
Lowest	QPSK	1	0	22.77	0.1892	16.77	0.0475
Middle		1	0	22.78	0.1897	16.78	0.0476
Highest		1	0	22.78	0.1897	16.78	0.0476
Lowest	16QAM	1	0	21.70	0.1479	15.70	0.0372
Middle		1	0	21.85	0.1531	15.85	0.0385
Highest		1	0	21.83	0.1524	15.83	0.0383
Lowest	64QAM	1	0	20.67	0.1167	14.67	0.0293
Middle		1	0	20.79	0.1199	14.79	0.0301
Highest		1	0	20.82	0.1208	14.82	0.0303
Limit	EIRP < 2W			Result		PASS	

LTE Band 38 / 10MHz (Peak) (GT - LC = -6 dB)							
Channel	Mode	RB		Conducted		EIRP	
		Size	Offset	Power (dBm)	Power (Watts)	EIRP(dBm)	EIRP(W)
Lowest	QPSK	1	0	22.79	0.1901	16.79	0.0478
Middle		1	0	22.79	0.1901	16.79	0.0478
Highest		1	0	22.71	0.1866	16.71	0.0469
Lowest	16QAM	1	0	21.70	0.1479	15.70	0.0372
Middle		1	0	21.85	0.1531	15.85	0.0385
Highest		1	0	21.80	0.1514	15.80	0.0380
Lowest	64QAM	1	25	20.57	0.1140	14.57	0.0286
Middle		1	25	20.67	0.1167	14.67	0.0293
Highest		1	25	20.83	0.1211	14.83	0.0304
Limit	EIRP < 2W			Result		PASS	

LTE Band 38 / 15MHz (Peak) (GT - LC = -6 dB)							
Channel	Mode	RB		Conducted		EIRP	
		Size	Offset	Power (dBm)	Power (Watts)	EIRP(dBm)	EIRP(W)
Lowest	QPSK	1	0	22.74	0.1879	16.74	0.0472
Middle		1	0	22.73	0.1875	16.73	0.0471
Highest		1	0	22.75	0.1884	16.75	0.0473
Lowest	16QAM	1	0	21.64	0.1459	15.64	0.0366
Middle		1	0	21.67	0.1469	15.67	0.0369
Highest		1	0	21.85	0.1531	15.85	0.0385
Lowest	64QAM	1	74	20.61	0.1151	14.61	0.0289
Middle		1	74	20.70	0.1175	14.70	0.0295
Highest		1	74	20.92	0.1236	14.92	0.0310
Limit	EIRP < 2W			Result		PASS	



LTE Band 38 / 20MHz (Peak) (GT - LC = -6 dB)							
Channel	Mode	RB		Conducted		EIRP	
		Size	Offset	Power (dBm)	Power (Watts)	EIRP(dBm)	EIRP(W)
Lowest	QPSK	1	0	22.74	0.1879	16.74	0.0472
Middle		1	0	22.83	0.1920	16.83	0.0482
Highest		1	0	22.73	0.1875	16.73	0.0471
Lowest	16QAM	1	49	21.57	0.1435	15.57	0.0361
Middle		1	49	21.82	0.1521	15.82	0.0382
Highest		1	49	21.69	0.1476	15.69	0.0371
Lowest	64QAM	1	99	20.63	0.1156	14.63	0.0290
Middle		1	99	20.66	0.1164	14.66	0.0292
Highest		1	99	20.88	0.1225	14.88	0.0308
Limit	EIRP < 2W			Result		PASS	

**Radiated Spurious Emission**

<Open Mode>

LTE Band 38

LTE Band 38 / 20MHz / QPSK									
Channel	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Over Limit (dB)	SPA Reading (dBm)	S.G. Power (dBm)	TX Cable loss (dB)	TX Antenna Gain (dBi)	Polarization (H/V)
Lowest	5140	-53.62	-25	-28.62	-77.59	-60.9	2.42	9.70	H
	7716	-45.87	-25	-20.87	-73.45	-55.44	2.36	11.93	H
	10278	-45.11	-25	-20.11	-77.18	-54.73	2.69	12.31	H
									H
									H
	5160	-53.57	-25	-28.57	-77.39	-60.84	2.43	9.70	V
	7716	-46.34	-25	-21.34	-74.21	-55.91	2.36	11.93	V
	10314	-45.56	-25	-20.56	-77.49	-55.19	2.69	12.33	V
									V
									V
Middle	5172	-52.58	-25	-27.58	-76.73	-59.84	2.44	9.70	H
	7758	-46.47	-25	-21.47	-74.33	-56.08	2.35	11.95	H
	10332	-45.25	-25	-20.25	-77.57	-54.89	2.69	12.33	H
									H
									H
									H
	5172	-53.26	-25	-28.26	-77.24	-60.52	2.44	9.70	V
	7758	-46.61	-25	-21.61	-74.74	-56.22	2.35	11.95	V
	10332	-45.32	-25	-20.32	-77.54	-54.96	2.69	12.33	V
									V
Highest	5202	-53.19	-25	-28.19	-77.3	-60.44	2.45	9.70	H
	7806	-47.12	-25	-22.12	-74.91	-56.77	2.33	11.98	H
	10404	-45.55	-25	-20.55	-77.94	-55.22	2.69	12.36	H
									H
									H
	5202	-53.66	-25	-28.66	-77.63	-60.91	2.45	9.70	V
	7806	-46.53	-25	-21.53	-74.62	-56.18	2.33	11.98	V
	10404	-45.56	-25	-20.56	-77.8	-55.23	2.69	12.36	V
									V
									V

Remark: Spurious emissions within 30-1000MHz were found more than 20dB below limit line.



<Class Mode>

LTE Band 38

LTE Band 38 / 20MHz / QPSK									
Channel	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Over Limit (dB)	SPA Reading (dBm)	S.G. Power (dBm)	TX Cable loss (dB)	TX Antenna Gain (dBi)	Polarization (H/V)
Lowest	5140	-53.36	-25	-28.36	-77.45	-60.64	2.42	9.70	H
	7716	-46.47	-25	-21.47	-74.19	-56.04	2.36	11.93	H
	10278	-45.81	-25	-20.81	-78.02	-55.43	2.69	12.31	H
									H
									H
									H
									H
	5160	-53.54	-25	-28.54	-77.51	-60.81	2.43	9.70	V
	7716	-47.78	-25	-22.78	-75.81	-57.35	2.36	11.93	V
	10314	-45.16	-25	-20.16	-77.23	-54.79	2.69	12.33	V
									V
									V
									V
									V

Remark: Spurious emissions within 30-1000MHz were found more than 20dB below limit line.

—————THE END—————