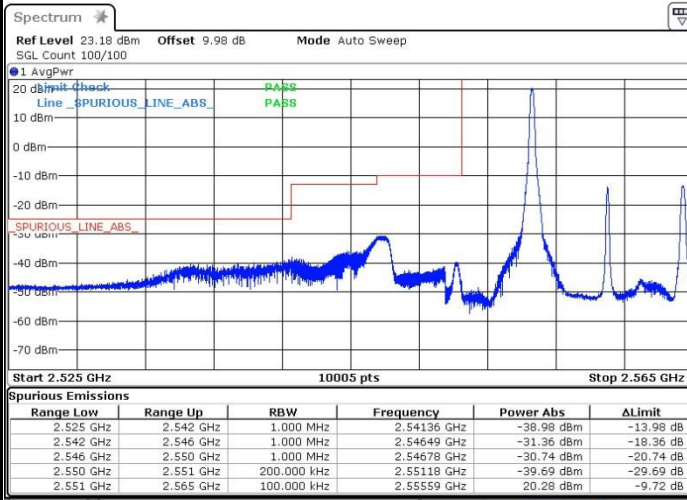




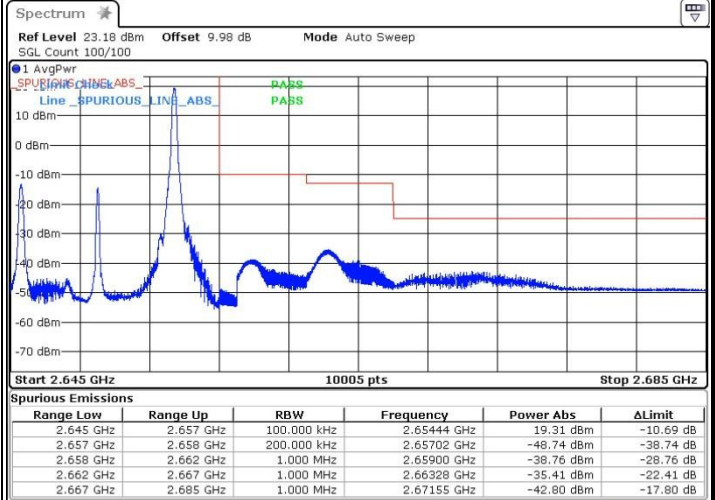
LTE Band 41 / 10MHz / 16QAM

Lowest Band Edge / 1 RB



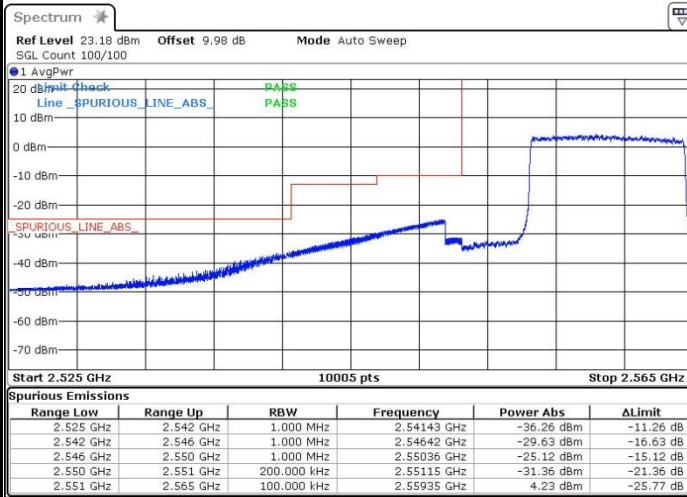
Date: 4 NOV.2016 09:45:25

Highest Band Edge / 1 RB



Date: 4 NOV.2016 10:00:50

Lowest Band Edge / Full RB



Date: 4 NOV.2016 09:48:03

Highest Band Edge / Full RB

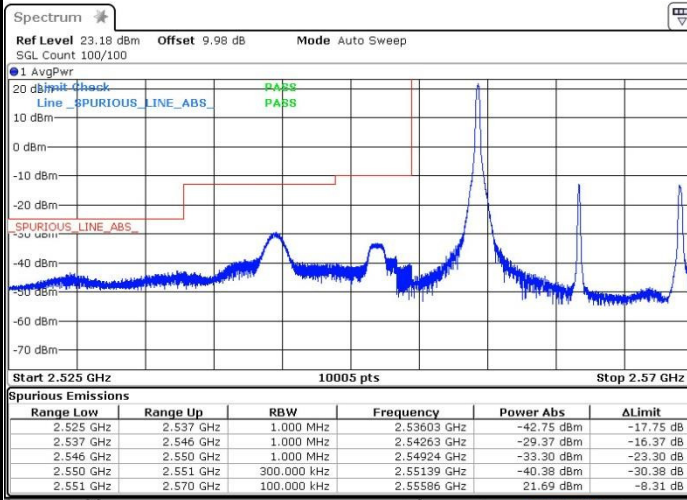


Date: 4 NOV.2016 09:55:49



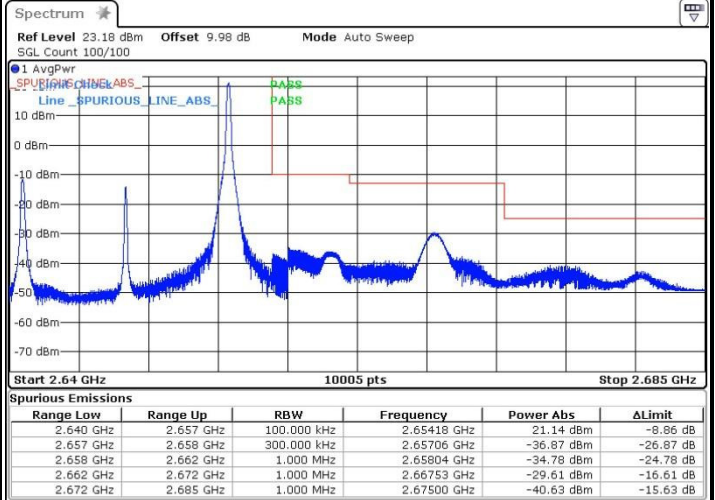
LTE Band 41 / 15MHz / QPSK

Lowest Band Edge / 1 RB



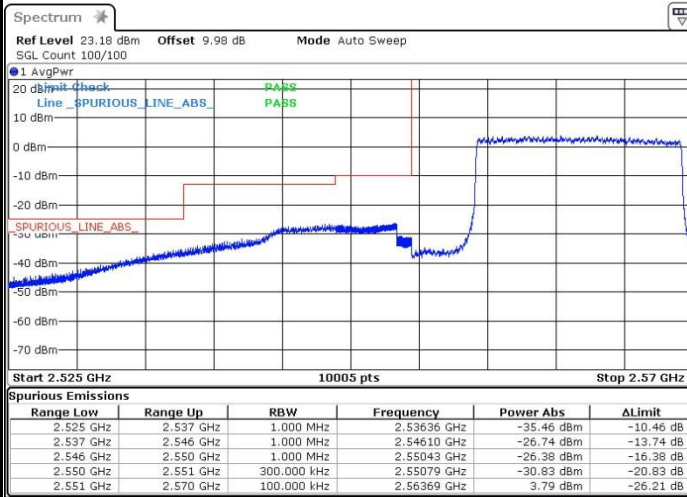
Date: 4.NOV.2016 10:11:19

Highest Band Edge / 1 RB



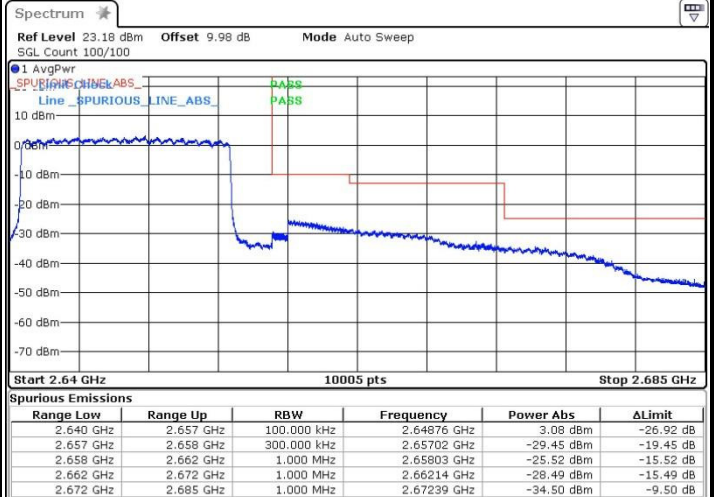
Date: 4 NOV 2016 10:32:32

Lowest Band Edge / Full RB



Date: 4.NOV.2016 10:20:22

Highest Band Edge / Full RB

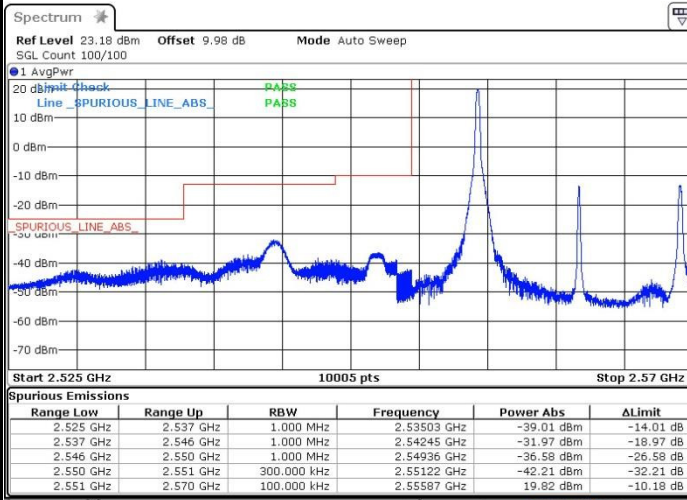


Date: 4 NOV 2016 10:21:56



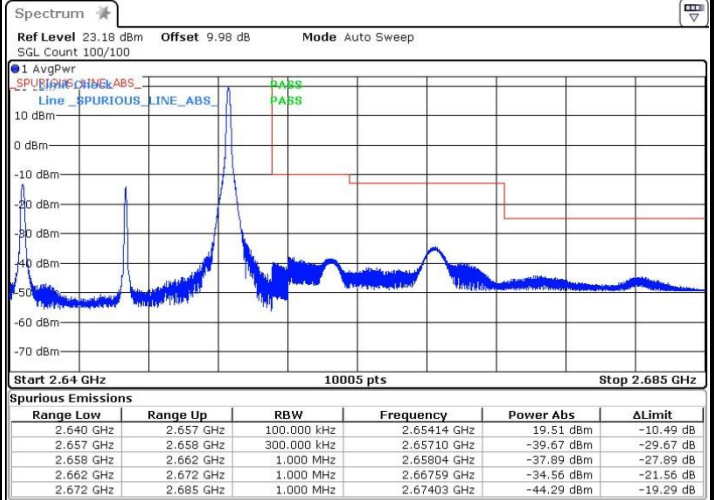
LTE Band 41 / 15MHz / 16QAM

Lowest Band Edge / 1 RB



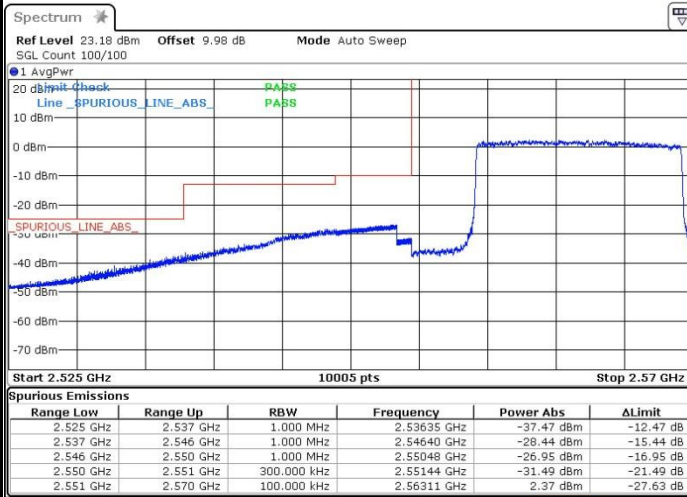
Date: 4.NOV.2016 10:15:50

Highest Band Edge / 1 RB



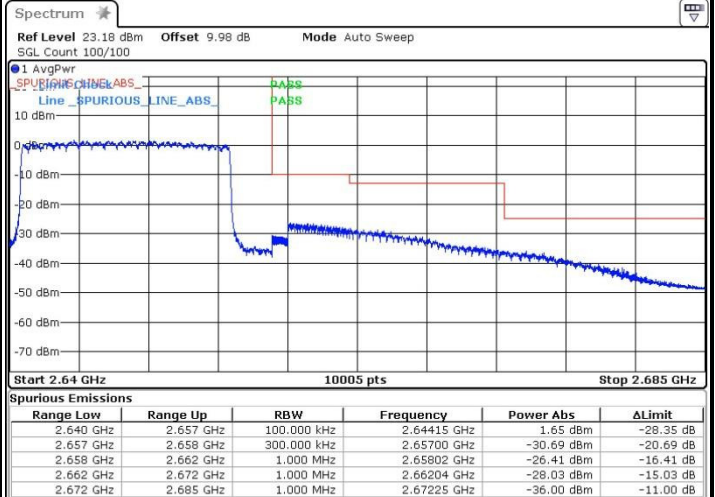
Date: 4 NOV.2016 10:28:12

Lowest Band Edge / Full RB



Date: 4.NOV.2016 10:18:30

Highest Band Edge / Full RB

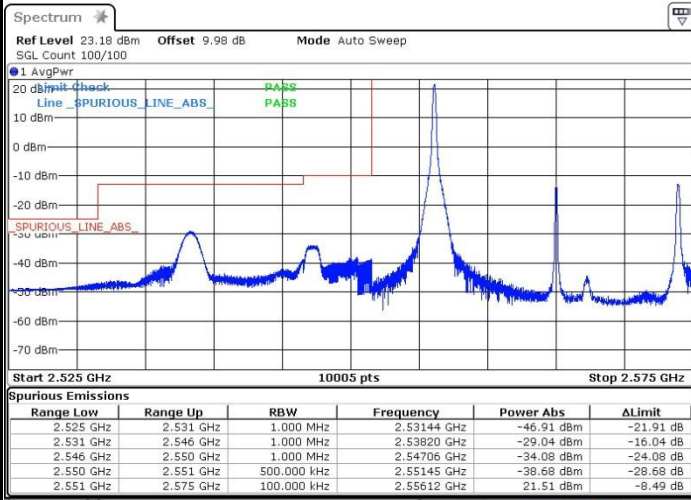


Date: 4 NOV.2016 10:23:42



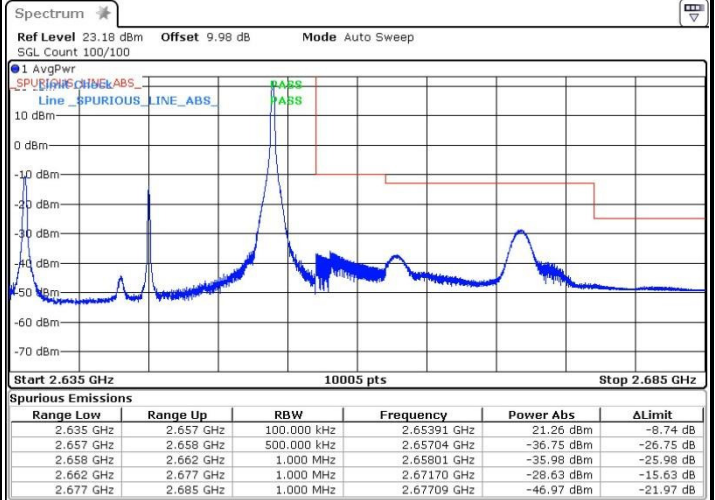
LTE Band 41 / 20MHz / QPSK

Lowest Band Edge / 1 RB



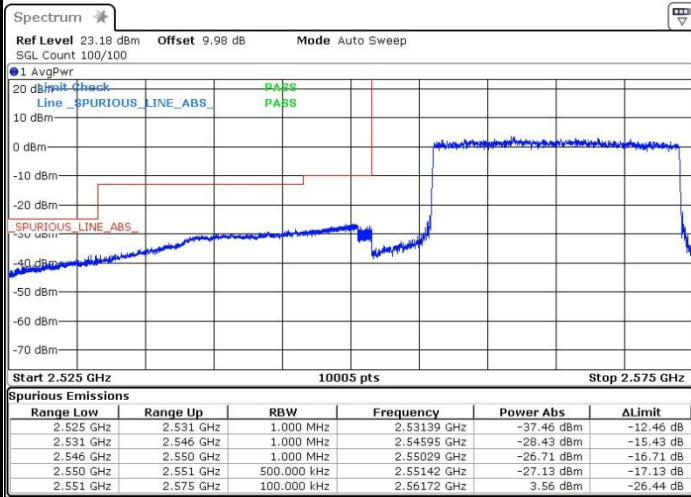
Date: 4.NOV.2016 10:38:15

Highest Band Edge / 1 RB



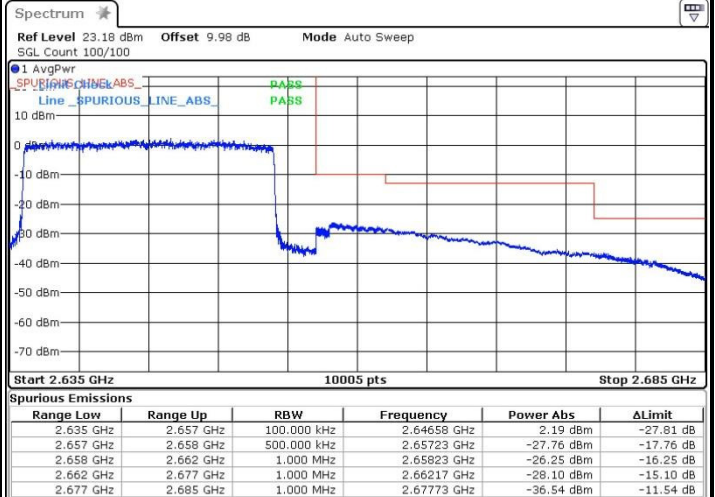
Date: 4.NOV.2016 10:55:00

Lowest Band Edge / Full RB



Date: 4.NOV.2016 10:44:09

Highest Band Edge / Full RB

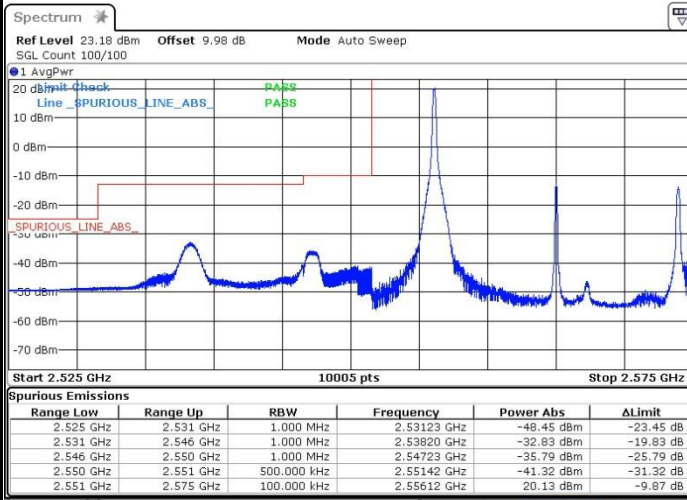


Date: 4.NOV.2016 10:44:46



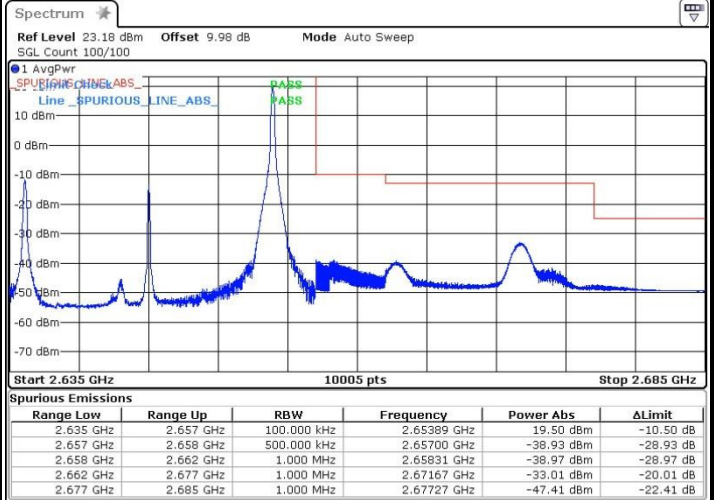
LTE Band 41 / 20MHz / 16QAM

Lowest Band Edge / 1 RB



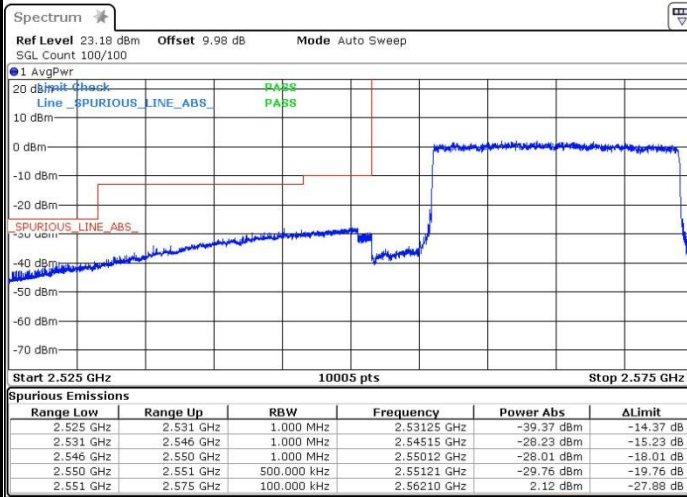
Date: 4.NOV.2016 10:42:38

Highest Band Edge / 1 RB



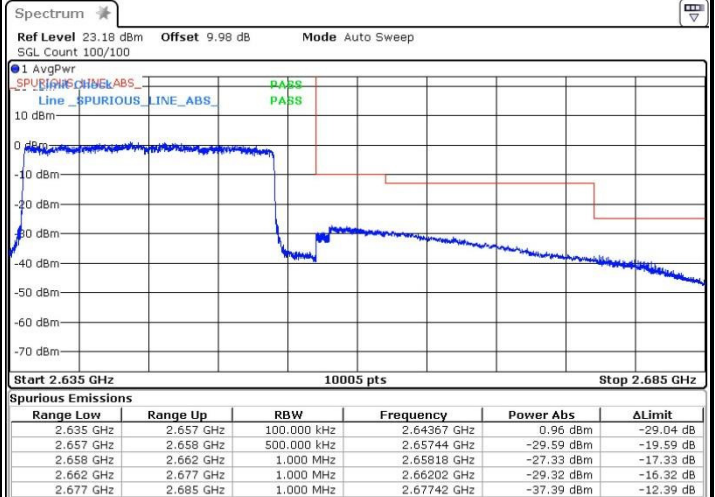
Date: 4.NOV.2016 10:50:06

Lowest Band Edge / Full RB



Date: 4.NOV.2016 10:43:34

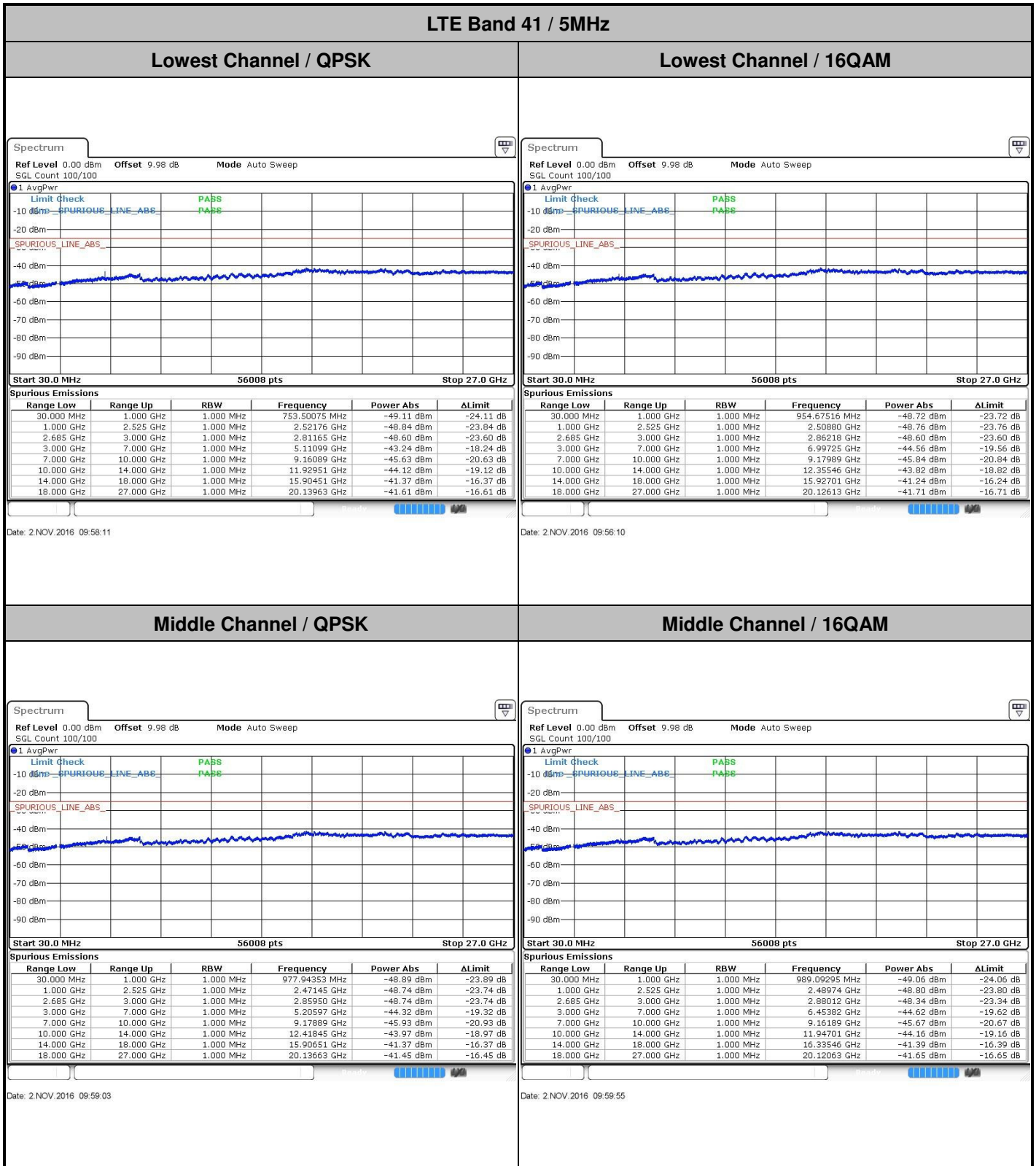
Highest Band Edge / Full RB



Date: 4.NOV.2016 10:45:26



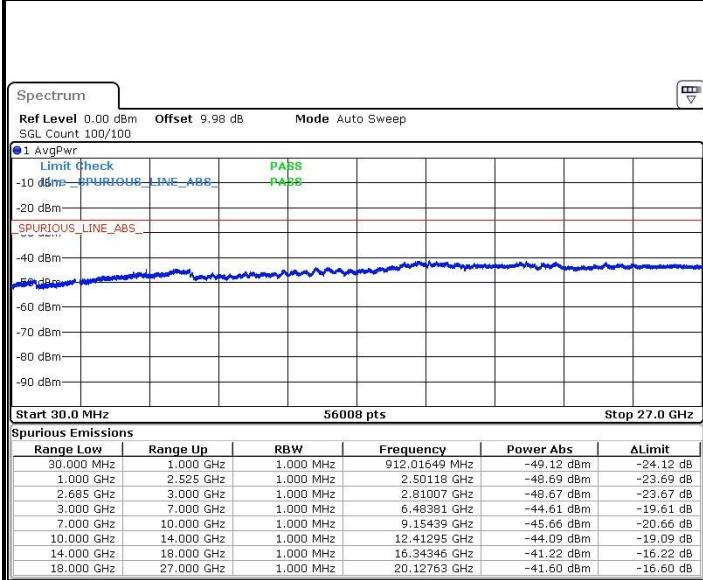
Conducted Spurious Emission





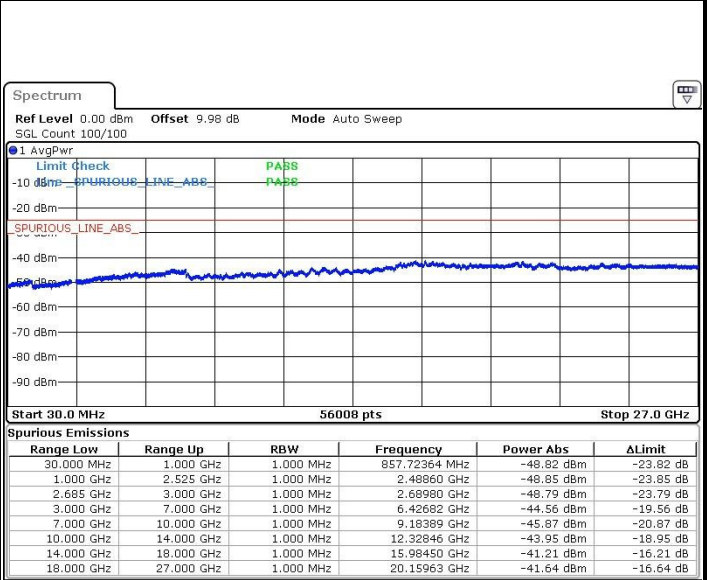
LTE Band 41 / 5MHz

Highest Channel / QPSK



Date: 2 NOV.2016 10:01:37

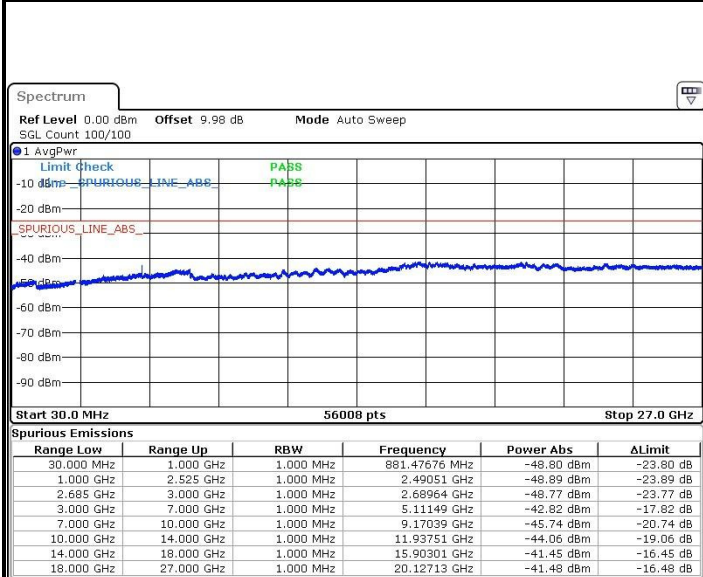
Highest Channel / 16QAM



Date: 2 NOV.2016 10:00:48

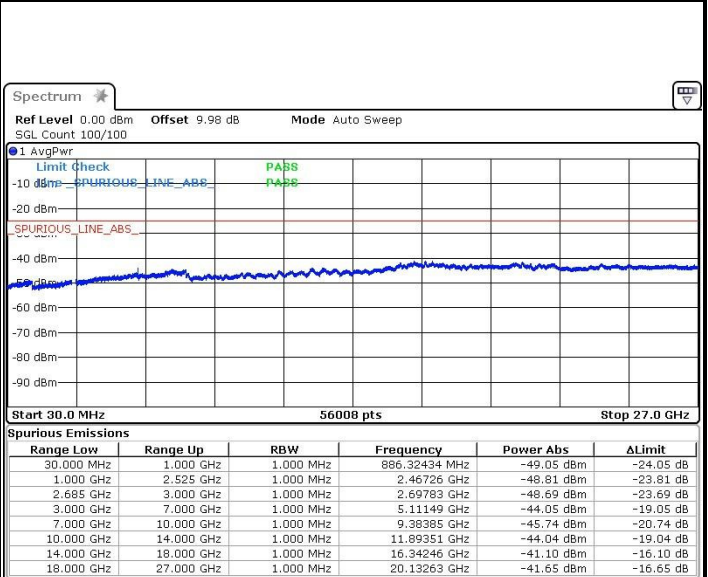
LTE Band 41 / 10MHz

Lowest Channel / QPSK



Date: 2 NOV.2016 10:23:42

Lowest Channel / 16QAM

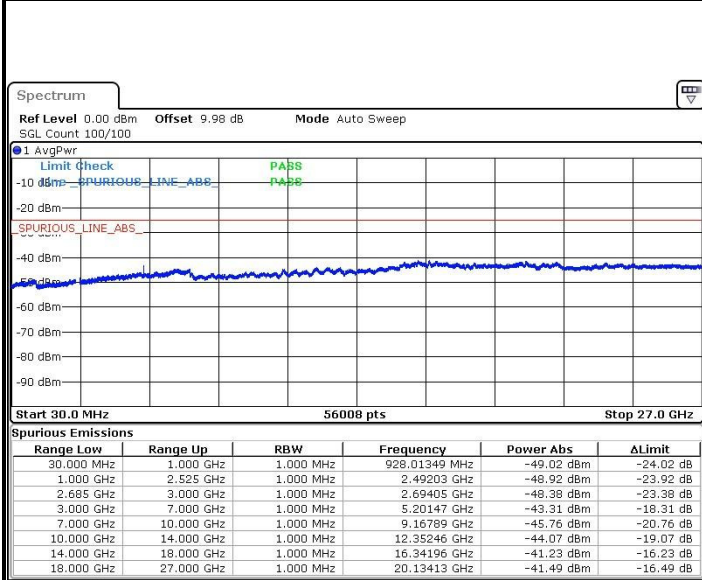


Date: 2 NOV.2016 10:24:43



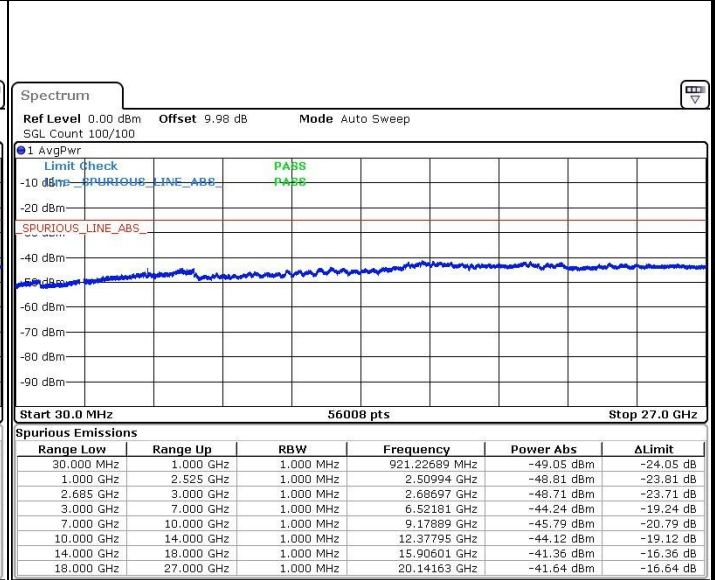
LTE Band 41 / 10MHz

Middle Channel / QPSK



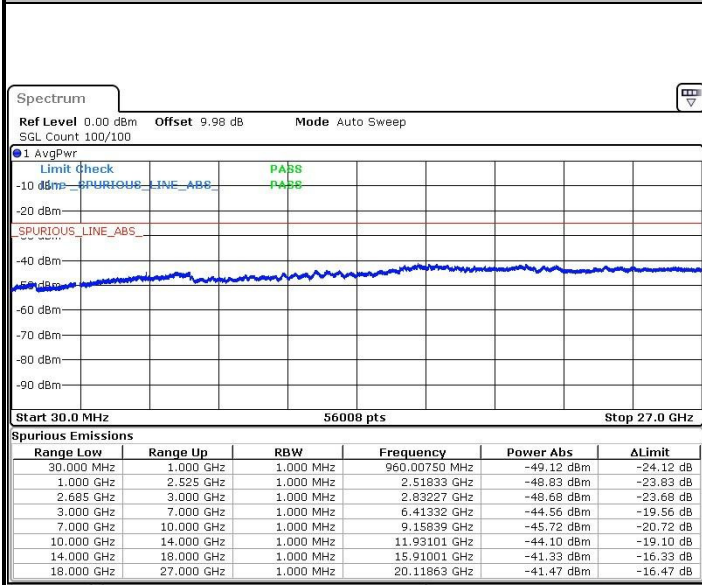
Date: 2.NOV.2016 10:30:51

Middle Channel / 16QAM



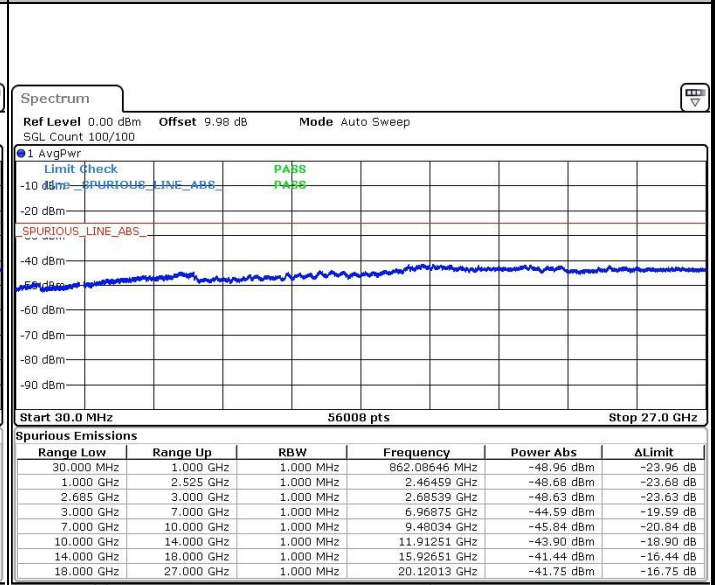
Date: 2.NOV.2016 10:29:57

Highest Channel / QPSK



Date: 2.NOV.2016 10:31:44

Highest Channel / 16QAM



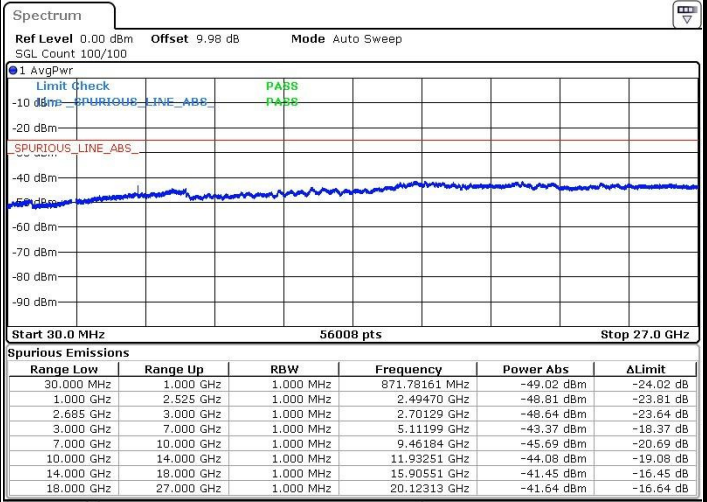
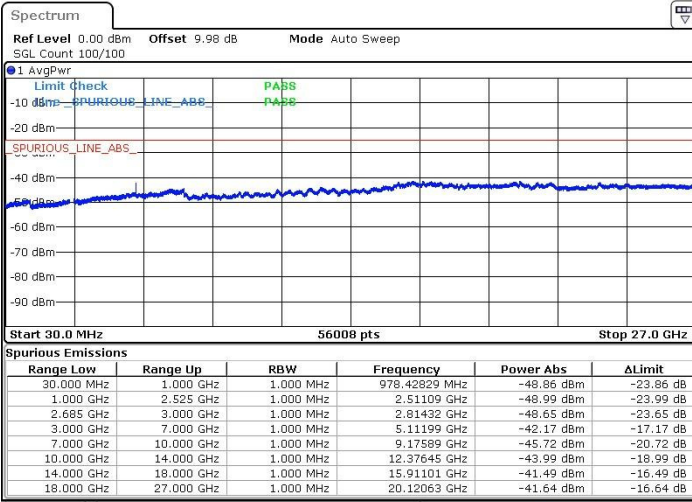
Date: 2.NOV.2016 10:32:41



LTE Band 41 / 15MHz

Lowest Channel / QPSK

Lowest Channel / 16QAM

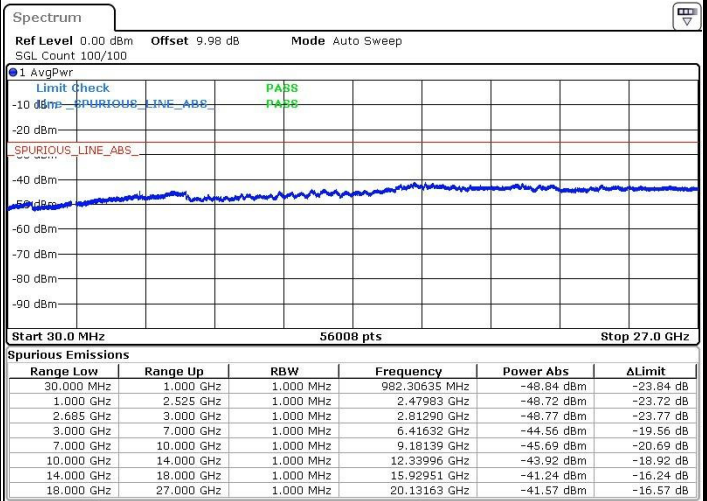
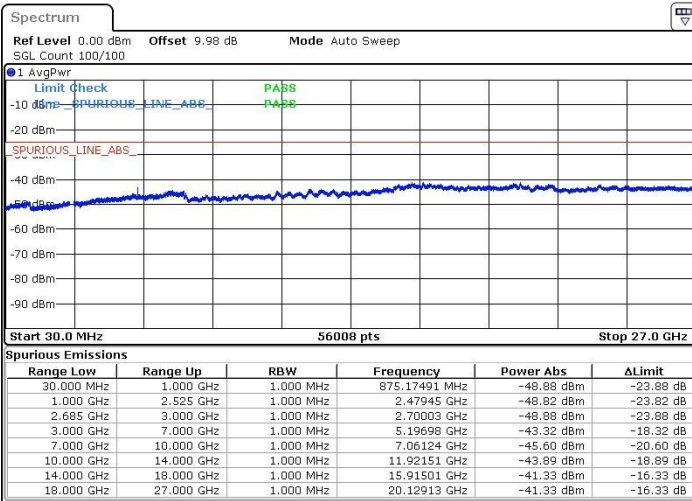


Date: 2 NOV.2016 12:43:17

Date: 2 NOV.2016 12:44:06

Middle Channel / QPSK

Middle Channel / 16QAM



Date: 2 NOV.2016 12:45:55

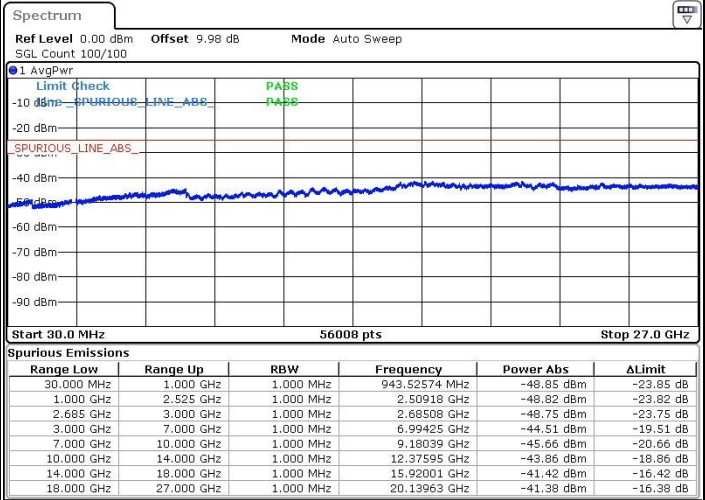
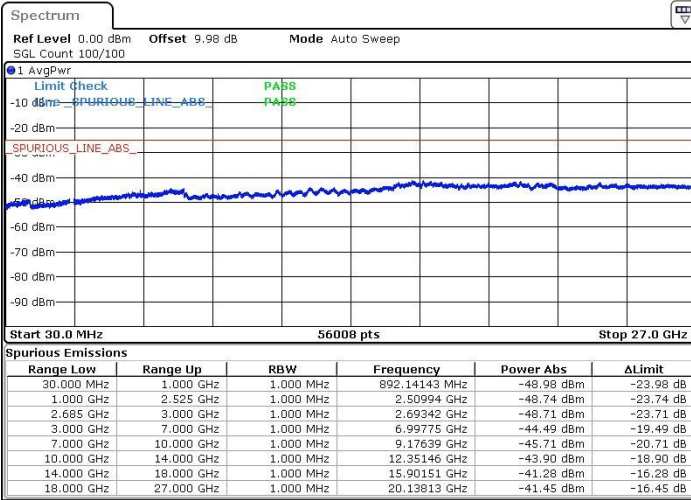
Date: 2 NOV.2016 12:45:07



LTE Band 41 / 15MHz

Highest Channel / QPSK

Highest Channel / 16QAM



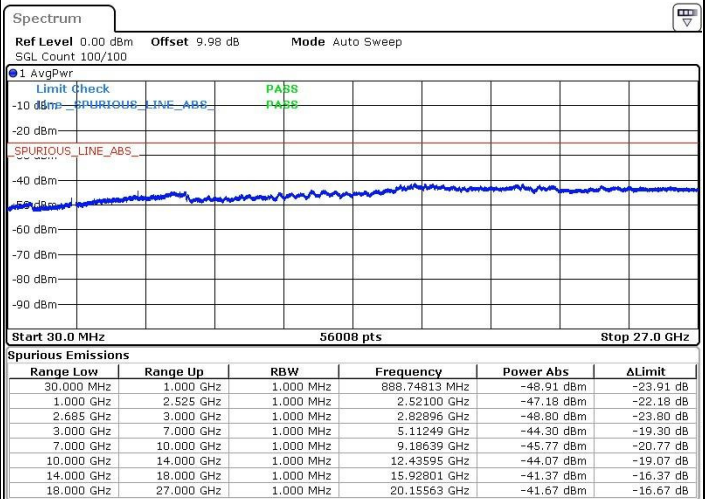
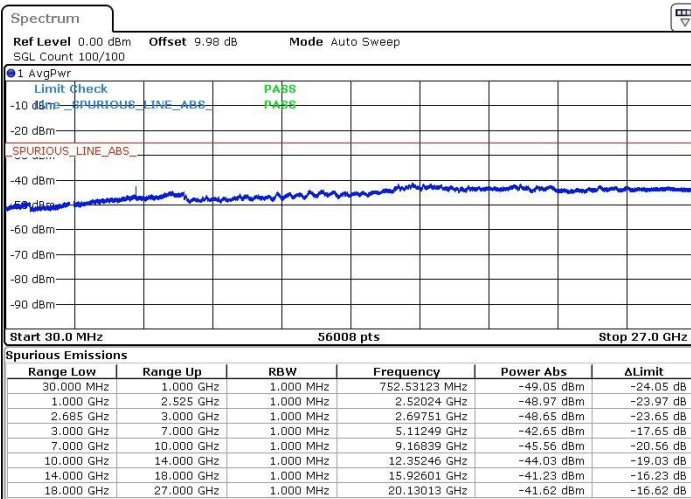
Date: 2 NOV 2016 12:46:55

Date: 2 NOV 2016 12:47:43

LTE Band 41 / 20MHz

Lowest Channel / QPSK

Lowest Channel / 16QAM



Date: 2 NOV 2016 13:20:21

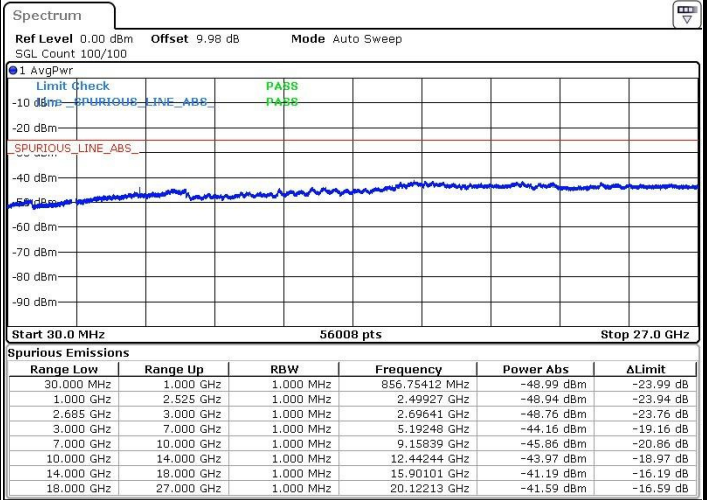
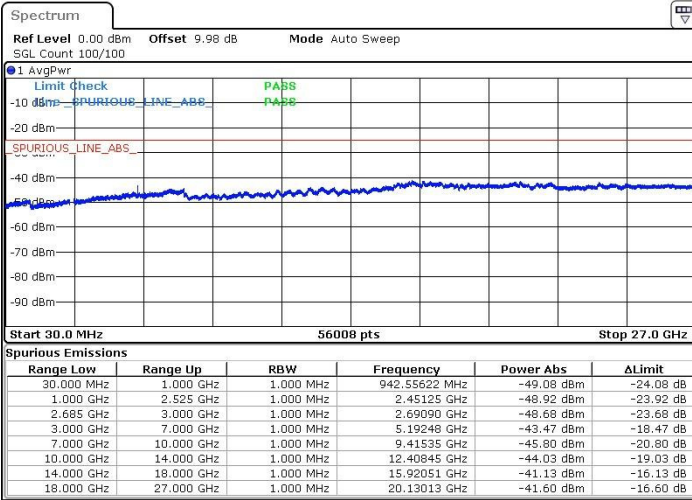
Date: 2 NOV 2016 13:19:32



LTE Band 41 / 20MHz

Middle Channel / QPSK

Middle Channel / 16QAM

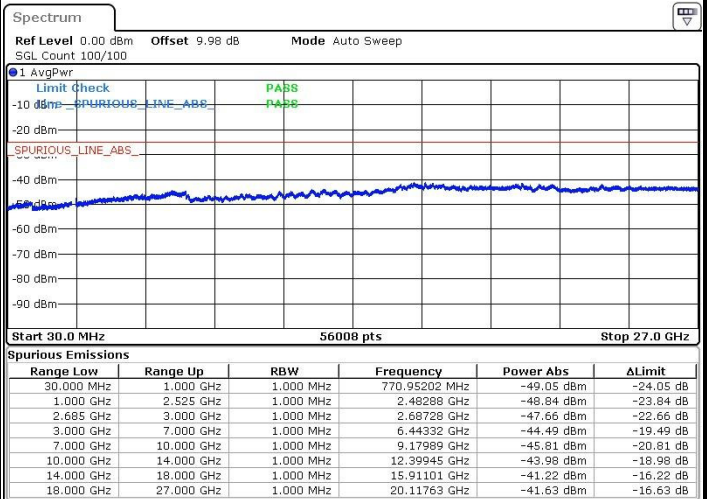
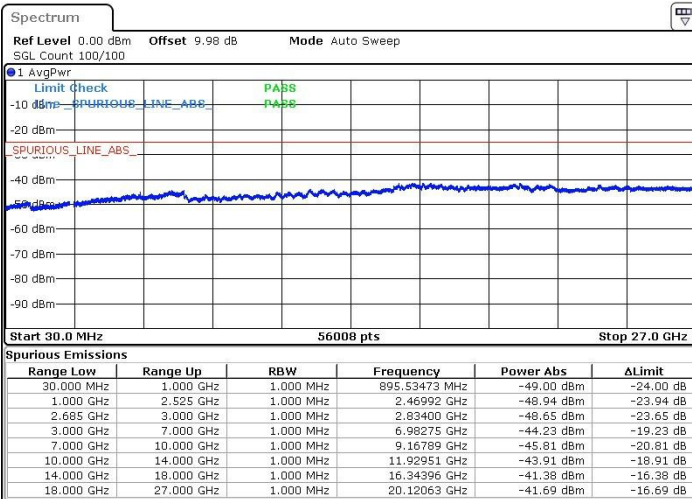


Date: 2 NOV.2016 13:21:15

Date: 2 NOV.2016 13:22:04

Highest Channel / QPSK

Highest Channel / 16QAM



Date: 2 NOV.2016 13:23:58

Date: 2 NOV.2016 13:22:56



Frequency Stability

Test Conditions		LTE Band 41 (QPSK) / Middle Channel	Limit
Temperature (°C)	Voltage (Volt)	BW 10MHz	Note 2.
		Deviation (ppm)	Result
50	Normal Voltage	0.0005	PASS
40	Normal Voltage	0.0003	
30	Normal Voltage	0.0025	
20(Ref.)	Normal Voltage	0.0000	
10	Normal Voltage	0.0018	
0	Normal Voltage	0.0003	
-10	Normal Voltage	0.0026	
-20	Normal Voltage	0.0021	
-30	Normal Voltage	0.0023	
20	Maximum Voltage	0.0006	
20	Normal Voltage	0.0017	
20	Battery End Point	0.0024	

Note:

1. Normal Voltage =3.82 V. ; Battery End Point (BEP) =3.65 V. ; Maximum Voltage =4.40 V.
2. Note: The frequency fundamental emissions stay within the authorized frequency block.



EIRP

LTE Band 41 (G _T - L _C = 2.81 dBi) QPSK									
Bandwidth	5M			10M			15M		
Channel	40265	40740	41215	40290	40740	41190	40315	40740	41165
	(Low)	(Mid)	(High)	(Low)	(Mid)	(High)	(Low)	(Mid)	(High)
Frequency	2557.5	2605	2652.5	2560	2605	2650	2562.5	2605	2647.5
(MHz)									
Conducted Power (dBm)	23.85	23.60	23.29	23.80	23.57	23.16	23.88	23.81	23.36
Conducted Power (Watts)	0.2427	0.2291	0.2133	0.2399	0.2275	0.2070	0.2443	0.2404	0.2168
EIRP(dBm)	26.66	26.41	26.10	26.61	26.38	25.97	26.69	26.62	26.17
EIRP(Watts)	0.4634	0.4375	0.4074	0.4581	0.4345	0.3954	0.4667	0.4592	0.4140

LTE Band 41 (G _T - L _C = 2.81 dBi) QPSK			
Bandwidth	20M		
Channel	40340	40740	41140
	(Low)	(Mid)	(High)
Frequency	2565	2605	2645
(MHz)			
Conducted Power (dBm)	23.89	23.59	23.36
Conducted Power (Watts)	0.2449	0.2286	0.2168
EIRP(dBm)	26.70	26.40	26.17
EIRP(Watts)	0.4677	0.4365	0.4140



LTE Band 41 (G _T - L _C = 2.81 dBi) 16QAM									
Bandwidth	5M			10M			15M		
Channel	40265	40740	41215	40290	40740	41190	40315	40740	41165
	(Low)	(Mid)	(High)	(Low)	(Mid)	(High)	(Low)	(Mid)	(High)
Frequency (MHz)	2557.5	2605	2652.5	2560	2605	2650	2562.5	2605	2647.5
Conducted Power (dBm)	22.99	22.38	22.03	22.75	22.58	22.09	22.71	22.31	21.78
Conducted Power (Watts)	0.1991	0.1730	0.1596	0.1884	0.1811	0.1618	0.1866	0.1702	0.1507
EIRP(dBm)	25.80	25.19	24.84	25.56	25.39	24.90	25.52	25.12	24.59
EIRP(Watts)	0.3802	0.3304	0.3048	0.3597	0.3459	0.3090	0.3565	0.3251	0.2877

LTE Band 41 (G _T - L _C = 2.81 dBi) 16QAM			
Bandwidth	20M		
Channel	40340	40740	41140
	(Low)	(Mid)	(High)
Frequency (MHz)	2565	2605	2645
Conducted Power (dBm)	22.60	22.80	22.06
Conducted Power (Watts)	0.1820	0.1905	0.1607
EIRP(dBm)	25.41	25.61	24.87
EIRP(Watts)	0.3475	0.3639	0.3069



Appendix B. Test Results of Radiated Test

Radiated Spurious Emission

LTE Band 5 / 1.4MHz / QPSK / RB Size 1 Offset 0									
Channel	Frequency (MHz)	ERP (dBm)	Limit (dBm)	Over Limit (dB)	SPA Reading (dBm)	S.G. Power (dBm)	TX Cable loss (dB)	TX Antenna Gain (dBi)	Polarization (H/V)
Middle	1671.92	-62.10	-13	-49.10	-64.93	-68.79	0.56	9.40	H
	2507.88	-60.74	-13	-47.74	-66.48	-68.45	0.74	10.60	H
	3343.84	-58.77	-13	-45.77	-67.58	-68.37	0.85	12.60	H
	1671.92	-63.83	-13	-50.83	-65.49	-70.52	0.56	9.40	V
	2507.88	-60.80	-13	-47.80	-66.38	-68.51	0.74	10.60	V
	3343.84	-59.40	-13	-46.40	-67.54	-69.00	0.85	12.60	V

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

LTE Band 5 / 3MHz / QPSK / RB Size 1 Offset 0									
Channel	Frequency (MHz)	ERP (dBm)	Limit (dBm)	Over Limit (dB)	SPA Reading (dBm)	S.G. Power (dBm)	TX Cable loss (dB)	TX Antenna Gain (dBi)	Polarization (H/V)
Middle	1670.48	-61.71	-13	-48.71	-64.54	-68.40	0.56	9.40	H
	2505.72	-60.70	-13	-47.70	-66.44	-68.41	0.74	10.60	H
	3340.96	-58.63	-13	-45.63	-67.44	-68.23	0.85	12.60	H
	1670.48	-63.22	-13	-50.22	-64.88	-69.91	0.56	9.40	V
	2505.72	-60.76	-13	-47.76	-66.34	-68.47	0.74	10.60	V
	3340.96	-59.81	-13	-46.81	-67.95	-69.41	0.85	12.60	V

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



LTE Band 5 / 5MHz / QPSK / RB Size 1 Offset 0									
Channel	Frequency (MHz)	ERP (dBm)	Limit (dBm)	Over Limit (dB)	SPA Reading (dBm)	S.G. Power (dBm)	TX Cable loss (dB)	TX Antenna Gain (dBi)	Polarization (H/V)
Middle	1668.68	-61.77	-13	-48.77	-64.60	-68.46	0.56	9.40	H
	2503.02	-61.21	-13	-48.21	-66.95	-68.92	0.74	10.60	H
	3337.36	-58.54	-13	-45.54	-67.35	-68.14	0.85	12.60	H
	1668.68	-63.43	-13	-50.43	-65.09	-70.12	0.56	9.40	V
	2503.02	-61.03	-13	-48.03	-66.61	-68.74	0.74	10.60	V
	3337.36	-59.87	-13	-46.87	-68.01	-69.47	0.85	12.60	V

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

LTE Band 5 / 10MHz / QPSK / RB Size 1 Offset 0									
Channel	Frequency (MHz)	ERP (dBm)	Limit (dBm)	Over Limit (dB)	SPA Reading (dBm)	S.G. Power (dBm)	TX Cable loss (dB)	TX Antenna Gain (dBi)	Polarization (H/V)
Middle	1664.08	-60.86	-13	-47.86	-63.69	-67.55	0.56	9.40	H
	2496.27	-60.39	-13	-47.39	-66.13	-68.10	0.74	10.60	H
	3328.36	-58.36	-13	-45.36	-67.17	-67.96	0.85	12.60	H
	1664.08	-63.82	-13	-50.82	-65.48	-70.51	0.56	9.40	V
	2496.27	-60.60	-13	-47.60	-66.18	-68.31	0.74	10.60	V
	3328.36	-59.31	-13	-46.31	-67.45	-68.91	0.85	12.60	V

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



LTE Band 41 / 5MHz / 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)
Middle	5205.50	-63.03	-25	-38.03	-78.51	-68.04	7.69	12.70	H
	7808.25	-57.30	-25	-32.30	-78.01	-59.03	9.57	11.30	H
	10411.00	-54.49	-25	-29.49	-79.15	-55.39	11.2	12.10	H
	5205.50	-63.39	-25	-38.39	-78.61	-68.40	7.69	12.70	V
	7808.25	-58.15	-25	-33.15	-78.03	-59.88	9.57	11.30	V
	10411.00	-56.35	-25	-31.35	-78.89	-57.25	11.2	12.10	V

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

LTE Band 41 / 10MHz / 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)
Middle	5201.00	-62.92	-25	-37.92	-78.40	-67.93	7.69	12.70	H
	7801.50	-57.22	-25	-32.22	-77.93	-58.95	9.57	11.30	H
	10402.00	-54.32	-25	-29.32	-78.98	-55.22	11.2	12.10	H
	5201.00	-63.26	-25	-38.26	-78.48	-68.27	7.69	12.70	V
	7801.50	-57.90	-25	-32.90	-77.78	-59.63	9.57	11.30	V
	10402.00	-56.47	-25	-31.47	-79.01	-57.37	11.2	12.10	V

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



LTE Band 41 / 15MHz / 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)
Middle	5196.50	-63.25	-25	-38.25	-78.73	-68.26	7.69	12.70	H
	7794.75	-57.25	-25	-32.25	-77.96	-58.98	9.57	11.30	H
	10393.00	-54.23	-25	-29.23	-78.89	-55.13	11.2	12.10	H
	5196.50	-63.40	-25	-38.40	-78.62	-68.41	7.69	12.70	V
	7794.75	-58.07	-25	-33.07	-77.95	-59.80	9.57	11.30	V
	10393.00	-56.40	-25	-31.40	-78.94	-57.30	11.2	12.10	V

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

LTE Band 41 / 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)
Middle	5192.00	-63.09	-25	-38.09	-78.57	-68.10	7.69	12.70	H
	7788.00	-57.08	-25	-32.08	-77.79	-58.81	9.57	11.30	H
	10384.00	-54.12	-25	-29.12	-78.78	-55.02	11.2	12.10	H
	5192.00	-63.20	-25	-38.20	-78.42	-68.21	7.69	12.70	V
	7788.00	-57.99	-25	-32.99	-77.87	-59.72	9.57	11.30	V
	10384.00	-56.09	-25	-31.09	-78.63	-56.99	11.2	12.10	V

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



Appendix D. Original Report

Please refer to Sporton report number FG6O1212B which is issued separately.