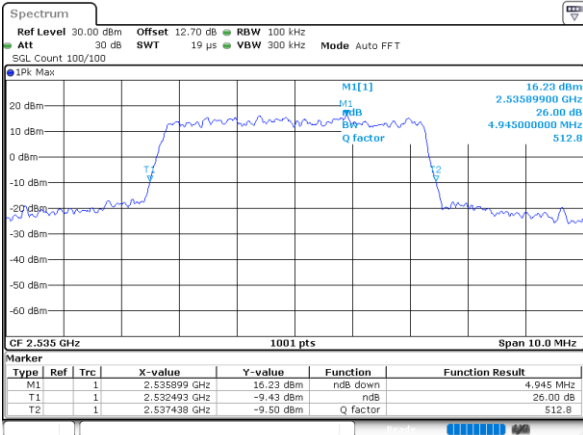




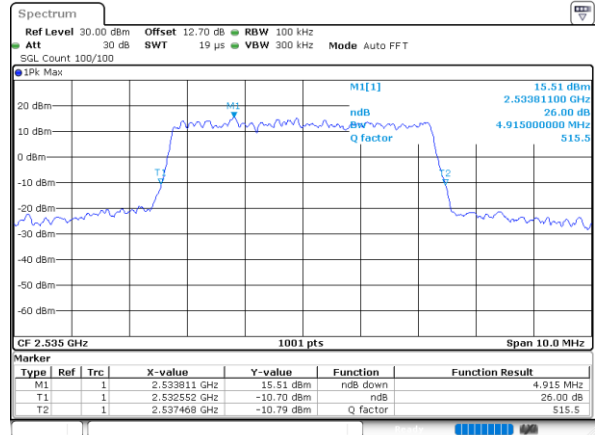
LTE Band 7

Middle Channel / 5MHz / QPSK



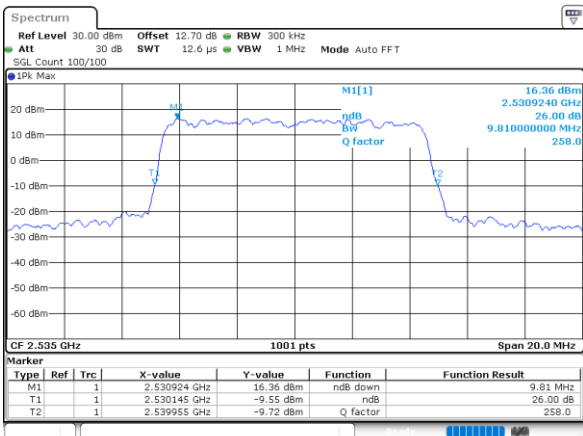
Date: 25.AUG.2023 03:30:43

Middle Channel / 5MHz / 16QAM



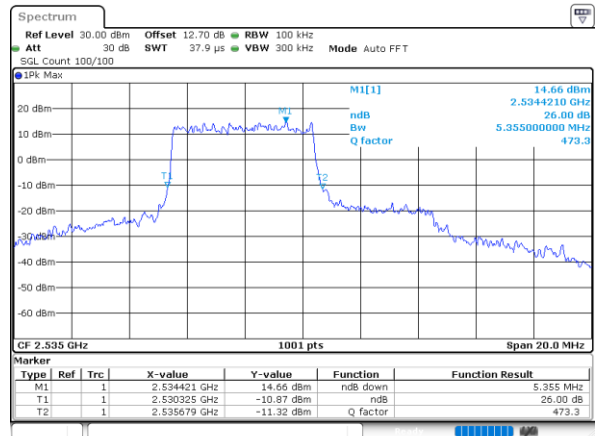
Date: 25.AUG.2023 03:31:08

Middle Channel / 10MHz / QPSK



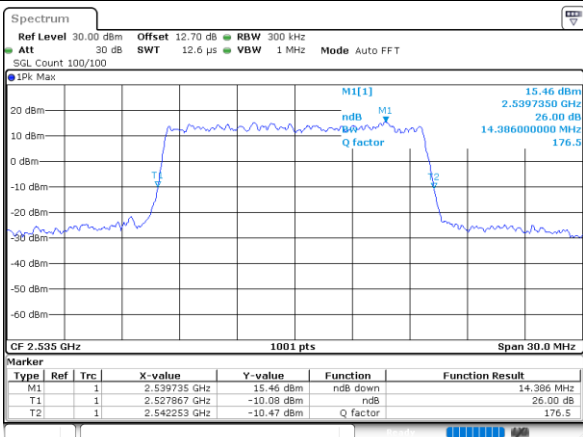
Date: 5.SEP.2023 20:53:39

Middle Channel / 10MHz / 16QAM



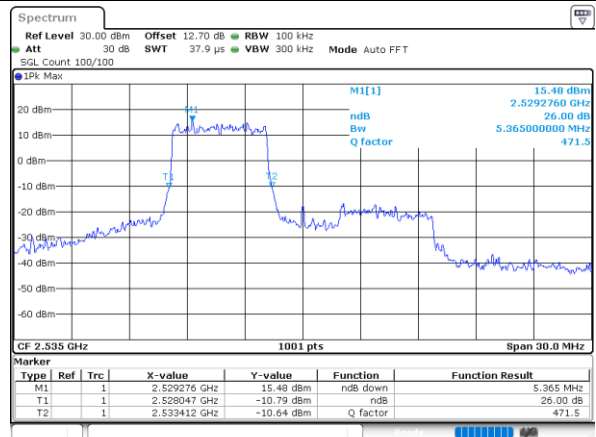
Date: 25.AUG.2023 03:41:22

Middle Channel / 15MHz / QPSK



Date: 5.SEP.2023 20:54:27

Middle Channel / 15MHz / 16QAM

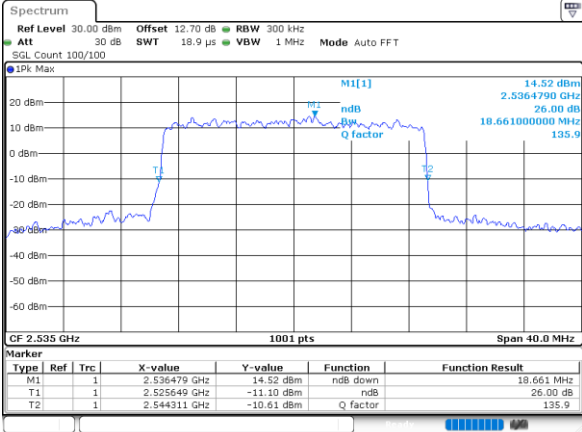


Date: 25.AUG.2023 03:46:54



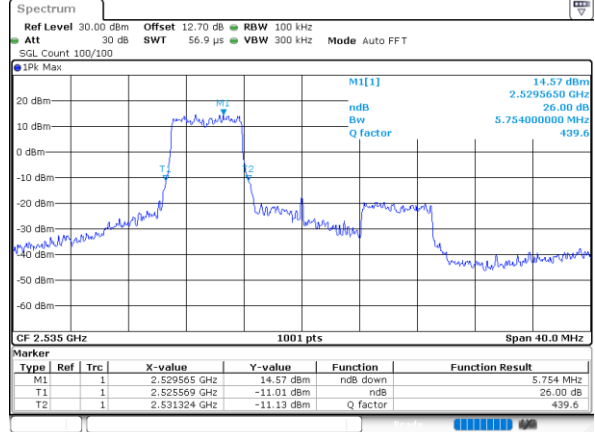
LTE Band 7

Middle Channel / 20MHz / QPSK



Date: 5.SEP.2023 20:55:14

Middle Channel / 20MHz / 16QAM



Date: 25.AUG.2023 03:53:06



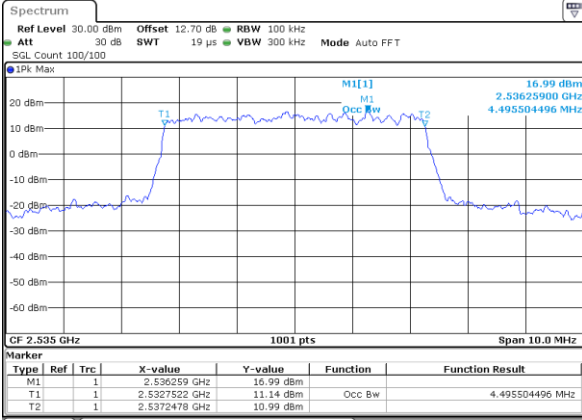
Occupied Bandwidth

Mode	LTE Band 7 : 99%OBW(MHz)											
	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM
Middle CH	-	-	-	-	4.50	4.49	9.03	4.88	13.45	4.86	17.90	4.92



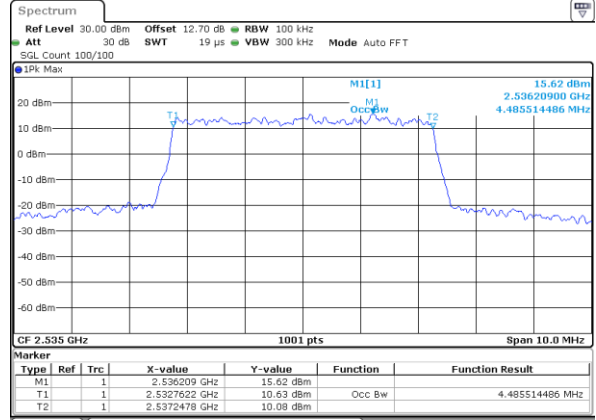
LTE Band 7

Middle Channel / 5MHz / QPSK



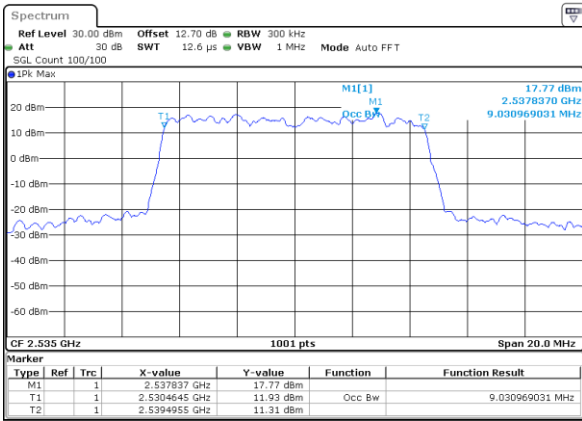
Date: 25.AUG.2023 03:29:52

Middle Channel / 5MHz / 16QAM



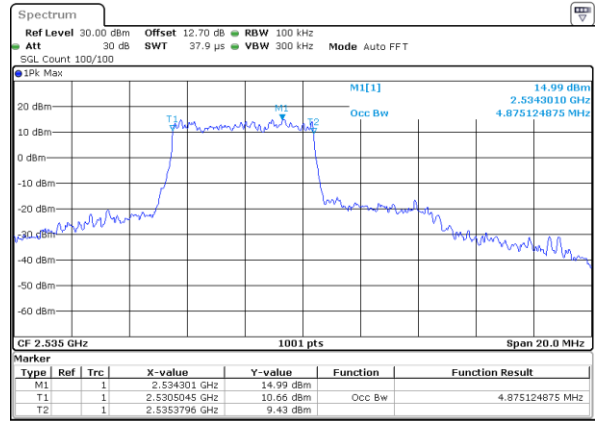
Date: 25.AUG.2023 03:30:17

Middle Channel / 10MHz / QPSK



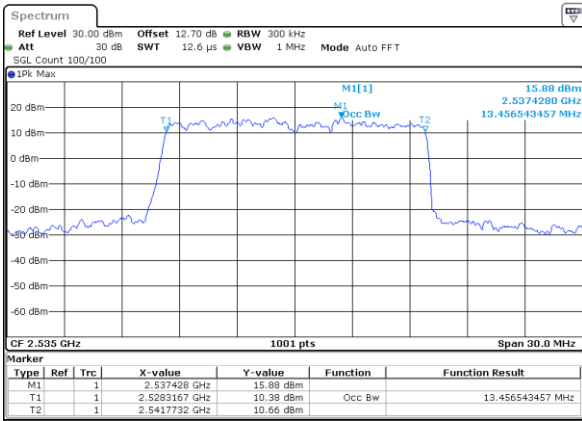
Date: 5.SEP.2023 20:53:16

Middle Channel / 10MHz / 16QAM



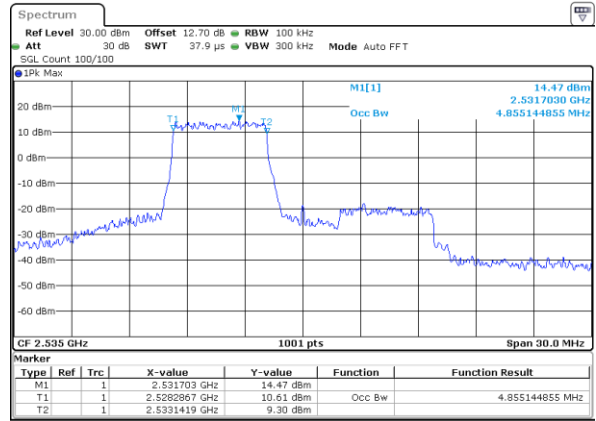
Date: 25.AUG.2023 03:40:31

Middle Channel / 15MHz / QPSK



Date: 5.SEP.2023 20:54:03

Middle Channel / 15MHz / 16QAM

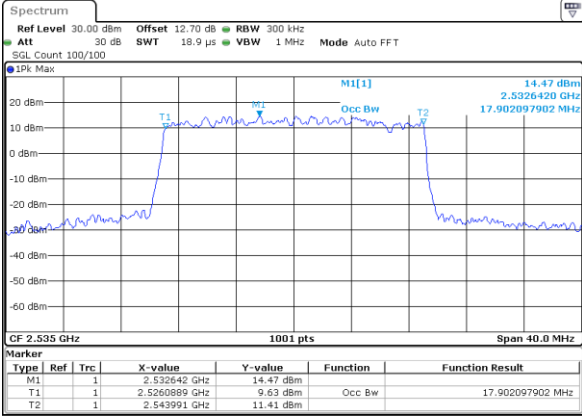


Date: 25.AUG.2023 03:46:03



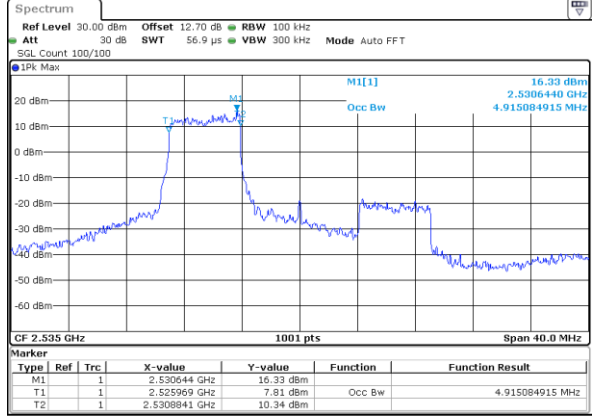
LTE Band 7

Middle Channel / 20MHz / QPSK



Date: 5.SEP.2023 20:54:51

Middle Channel / 20MHz / 16QAM



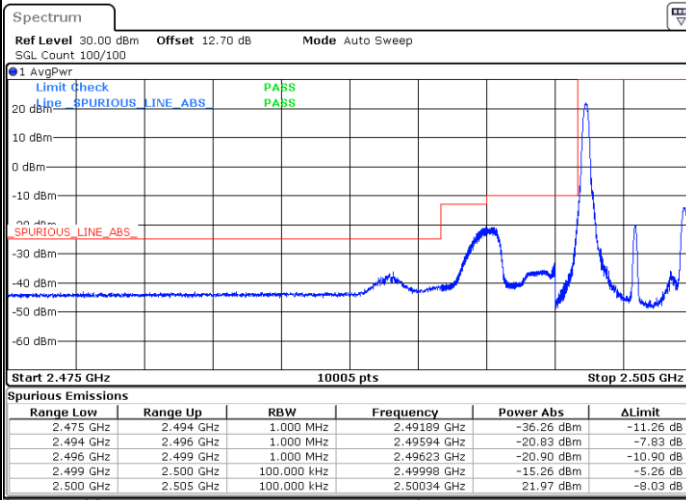
Date: 25.AUG.2023 03:52:15



Conducted Band Edge

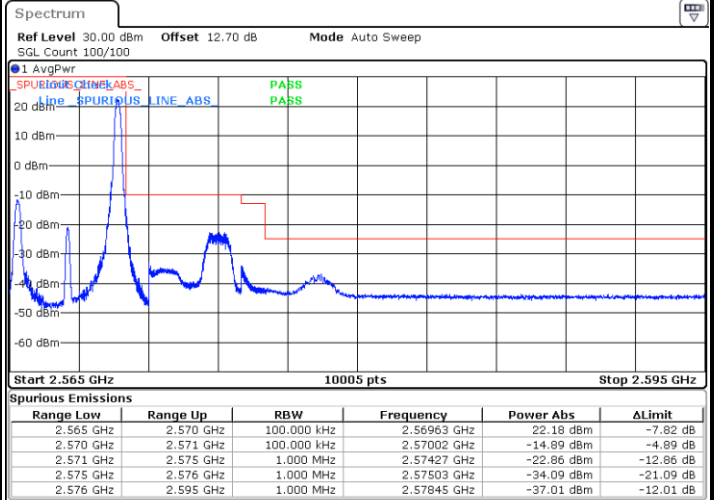
LTE Band 7 / 5MHz / QPSK

Lowest Band Edge / 1 RB



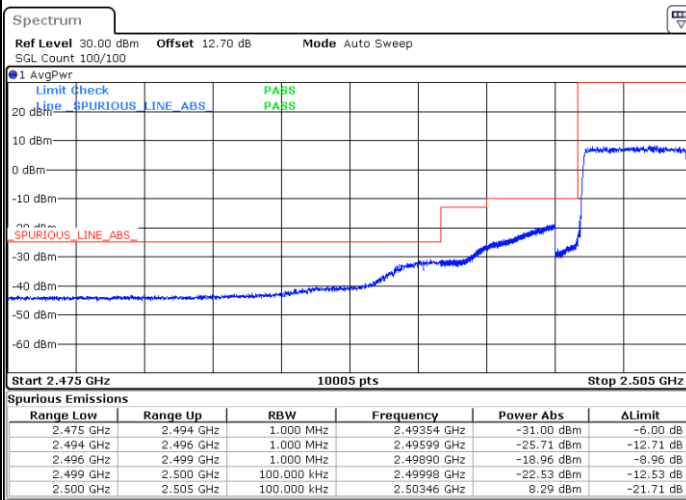
Date: 25.AUG.2023 03:25:28

Highest Band Edge / 1 RB



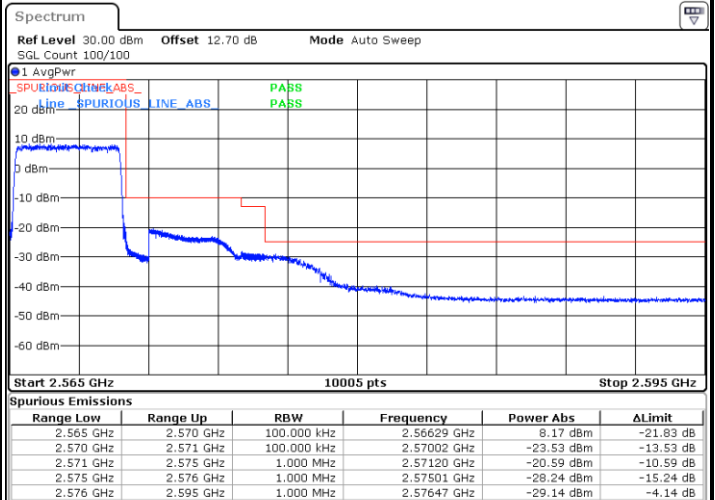
Date: 25.AUG.2023 03:33:07

Lowest Band Edge / Full RB



Date: 25.AUG.2023 03:27:22

Highest Band Edge / Full RB

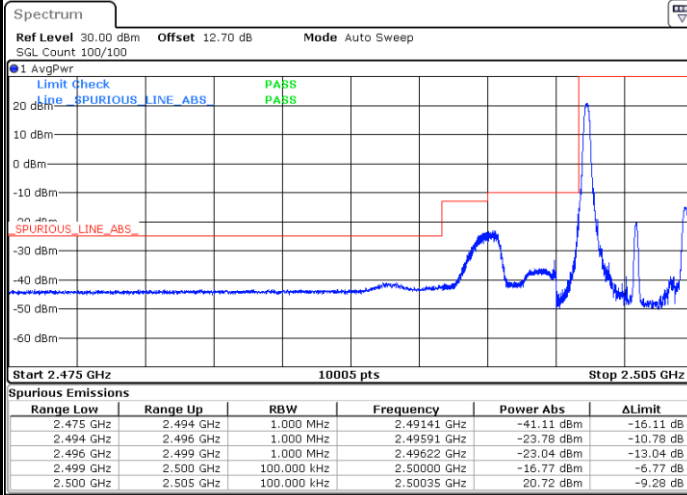


Date: 25.AUG.2023 03:35:00



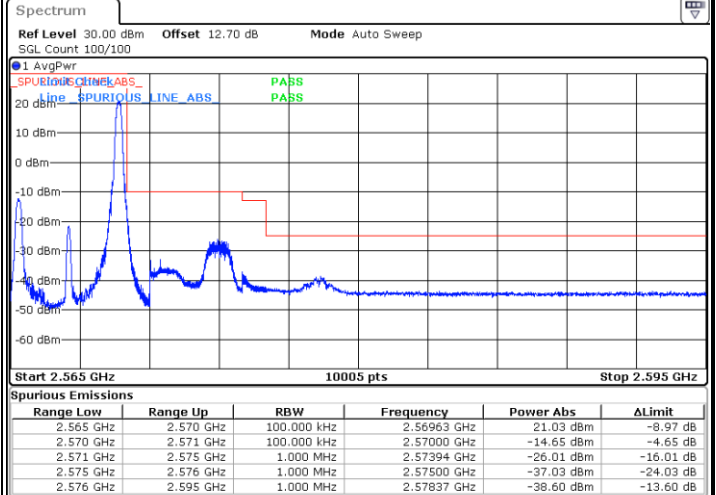
LTE Band 7 / 5MHz / 16QAM

Lowest Band Edge / 1RB



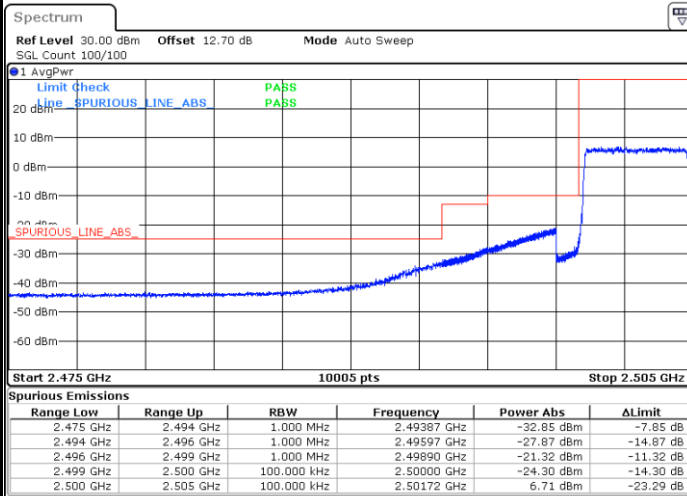
Date: 25.AUG.2023 03:26:25

Highest Band Edge / 1 RB



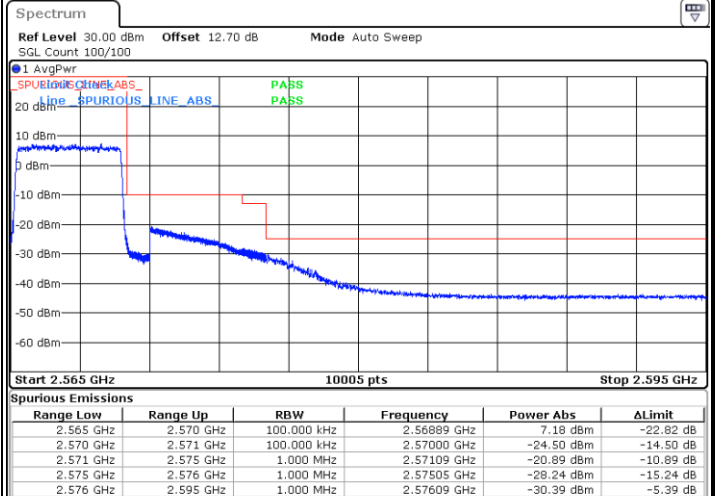
Date: 25.AUG.2023 03:34:03

Lowest Band Edge / Full RB



Date: 25.AUG.2023 03:28:19

Highest Band Edge / Full RB

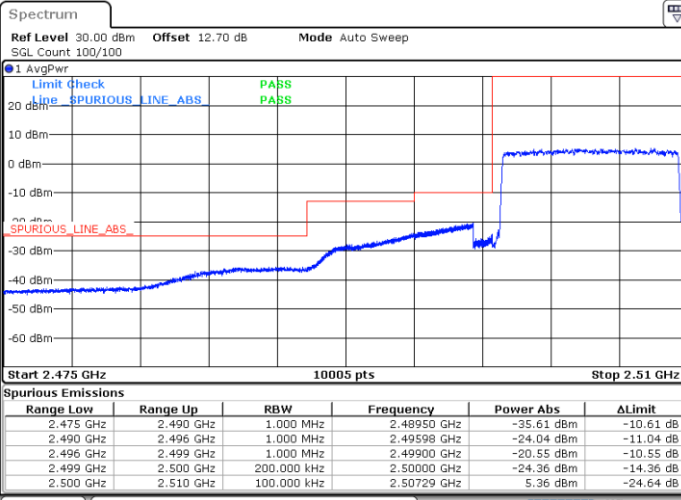


Date: 25.AUG.2023 03:35:57



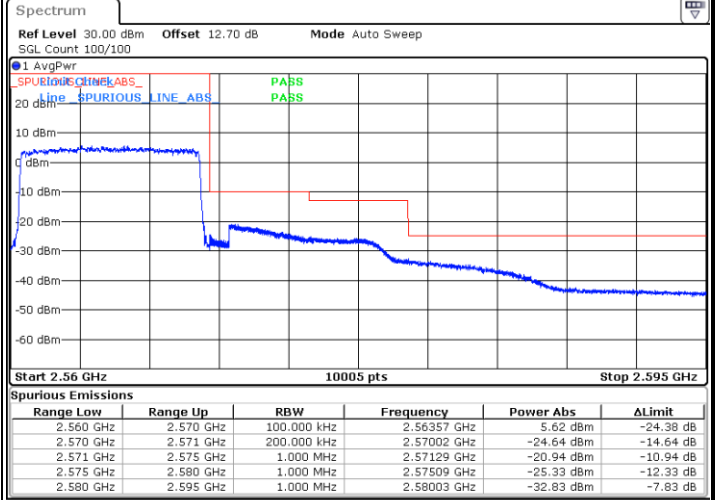
LTE Band 7 / 10MHz / QPSK

Lowest Band Edge / Full RB



Date: 25.AUG.2023 03:38:41

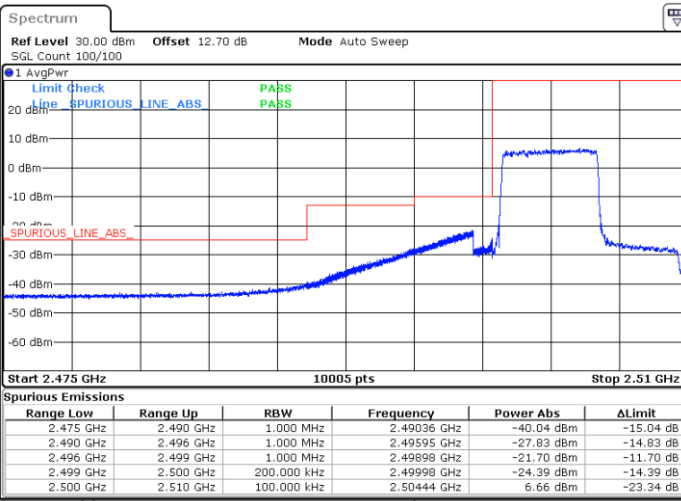
Highest Band Edge / Full RB



Date: 25.AUG.2023 03:42:17

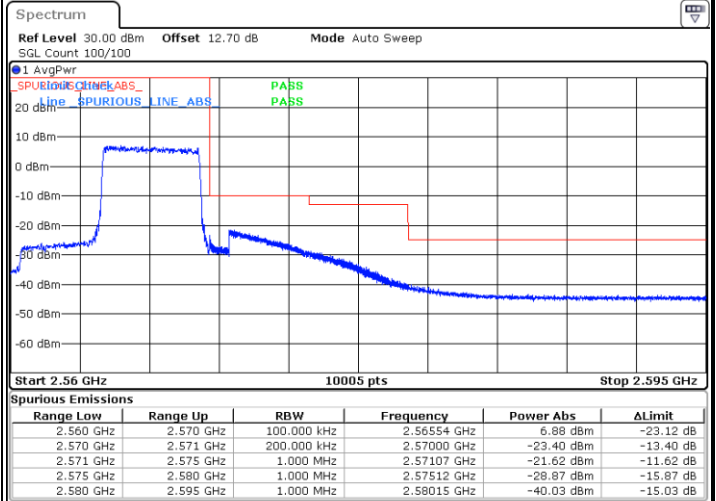
LTE Band 7 / 10MHz / 16QAM

Lowest Band Edge / 27 RB



Date: 25.AUG.2023 03:39:37

Highest Band Edge / 27 RB

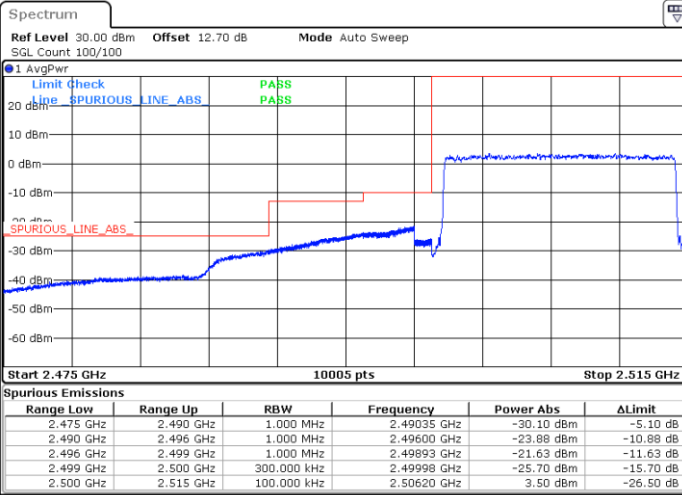


Date: 26.AUG.2023 00:41:50



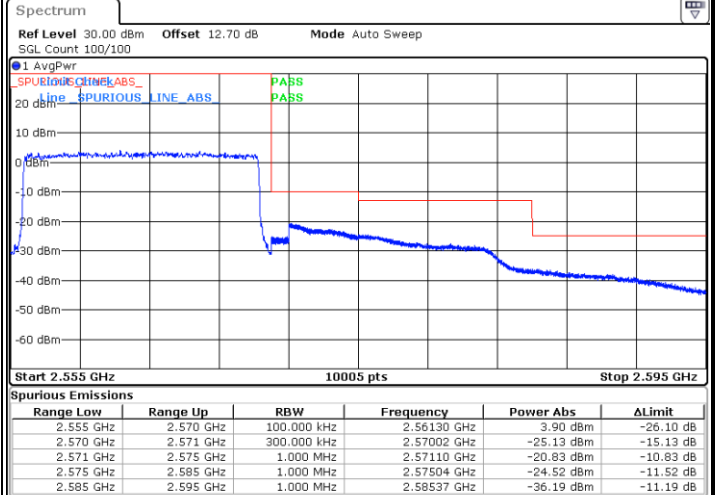
LTE Band 7 / 15MHz / QPSK

Lowest Band Edge / Full RB



Date: 25.AUG.2023 03:44:12

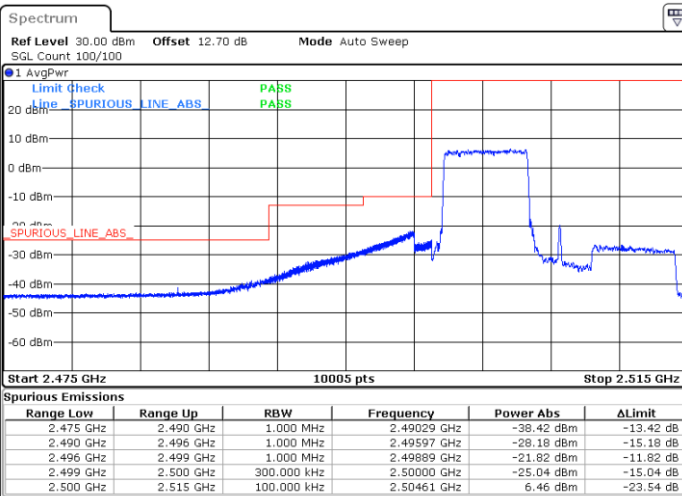
Highest Band Edge / Full RB



Date: 25.AUG.2023 03:47:49

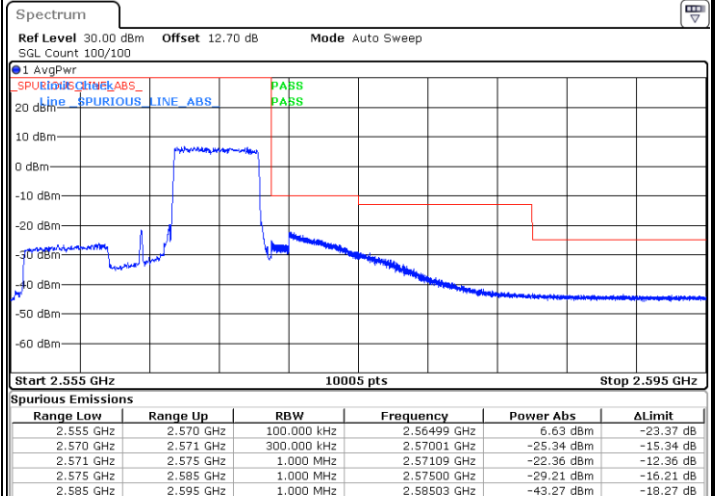
LTE Band 7 / 15MHz / 16QAM

Lowest Band Edge / 27 RB



Date: 25.AUG.2023 03:45:09

Highest Band Edge / 27 RB

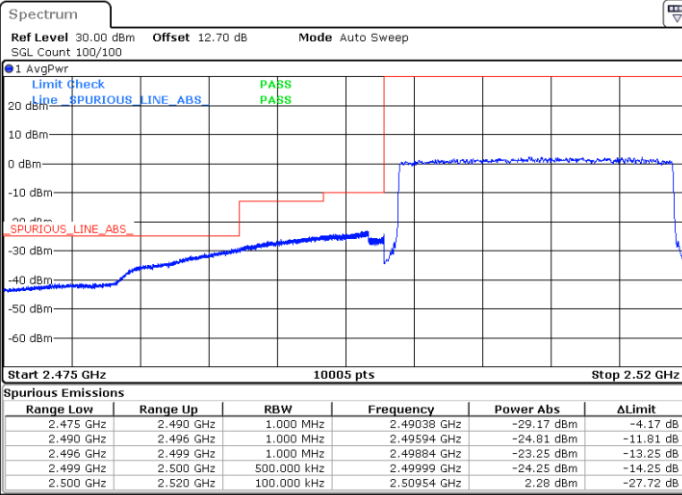


Date: 26.AUG.2023 01:14:56



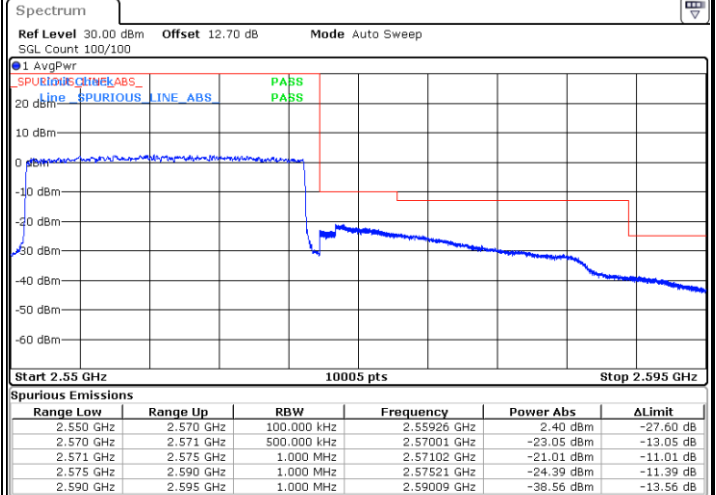
LTE Band 7 / 20MHz / QPSK

Lowest Band Edge / Full RB



Date: 25.AUG.2023 03:50:25

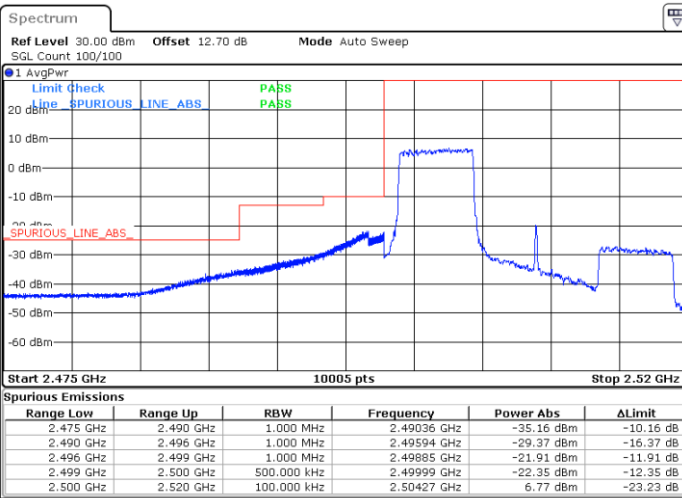
Highest Band Edge / Full RB



Date: 25.AUG.2023 03:54:58

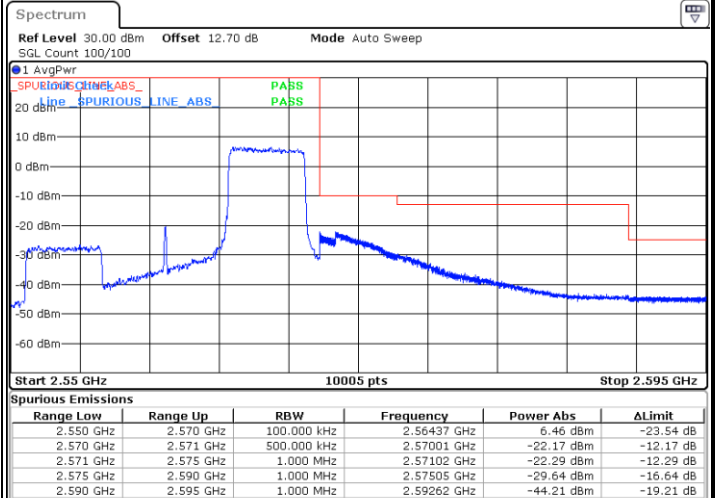
LTE Band 7 / 20MHz / 16QAM

Lowest Band Edge / 27 RB



Date: 25.AUG.2023 03:51:22

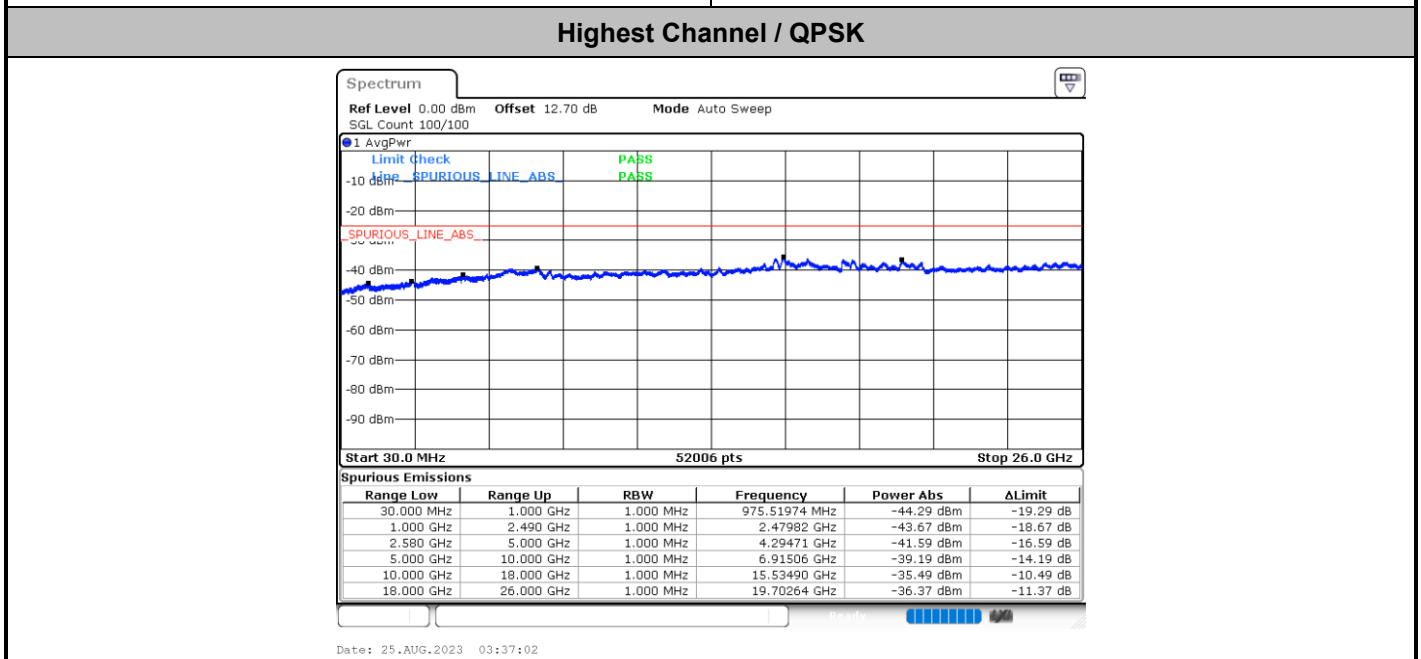
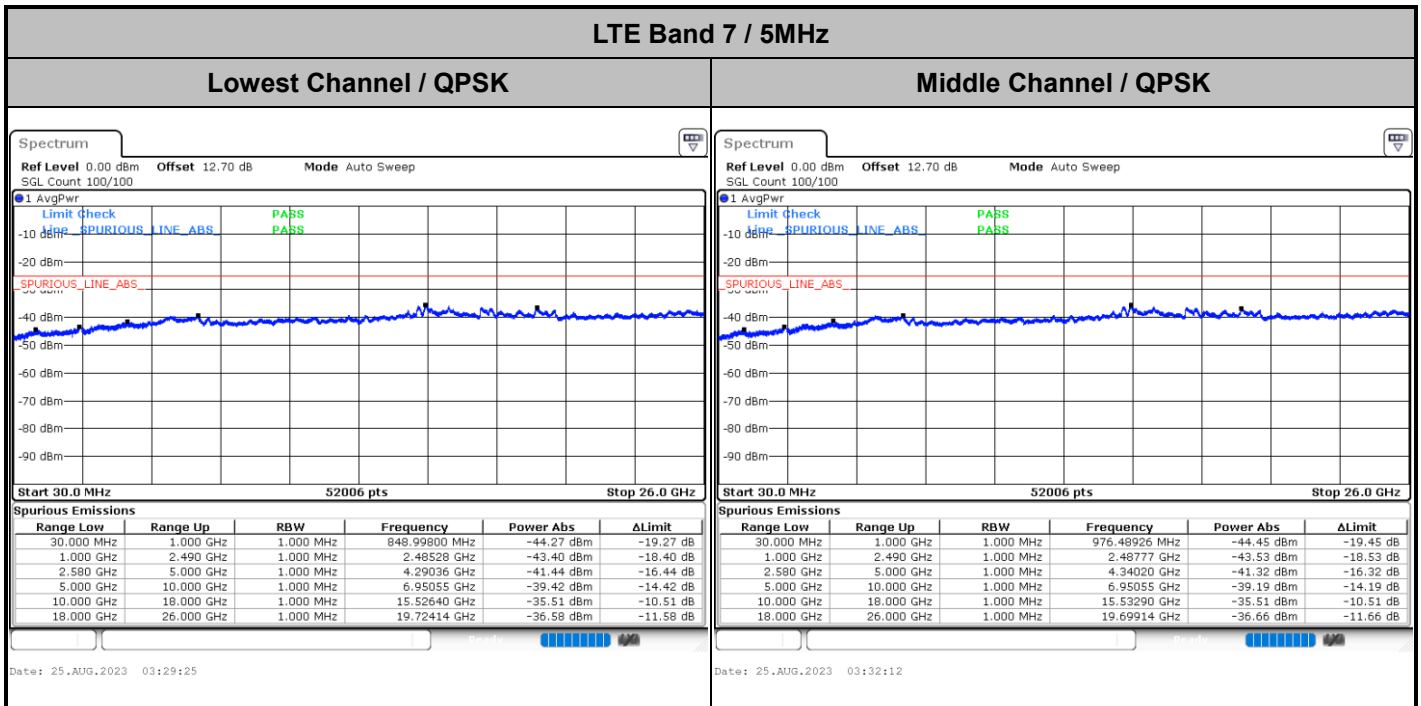
Highest Band Edge / 27 RB



Date: 26.AUG.2023 01:16:20



Conducted Spurious Emission

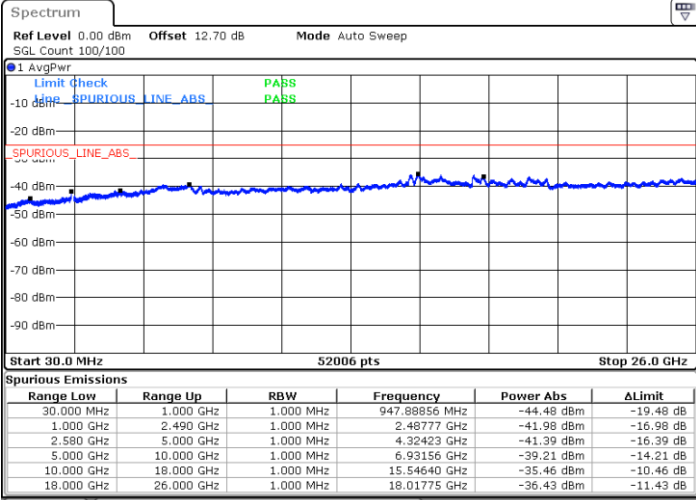




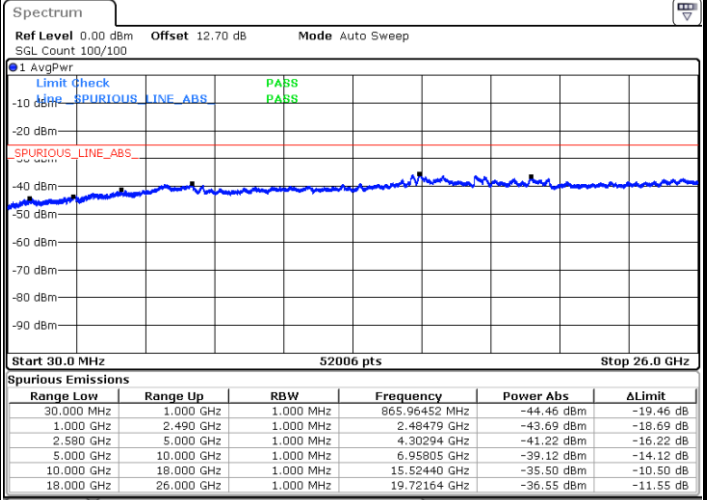
LTE Band 7 / 10MHz

Lowest Channel / QPSK

Middle Channel / QPSK

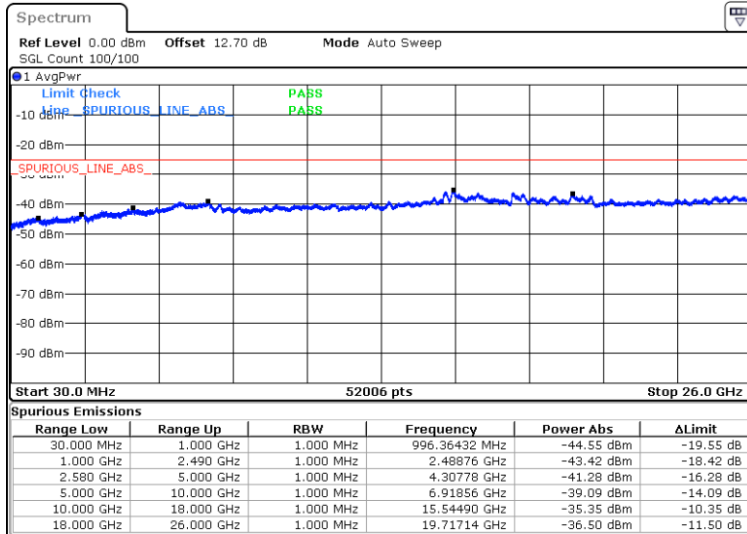


Date: 25.AUG.2023 08:50:39



Date: 25.AUG.2023 08:51:43

Highest Channel / QPSK



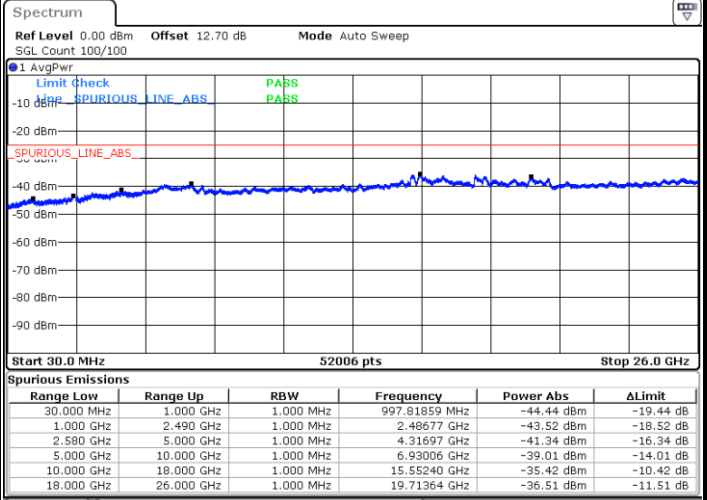
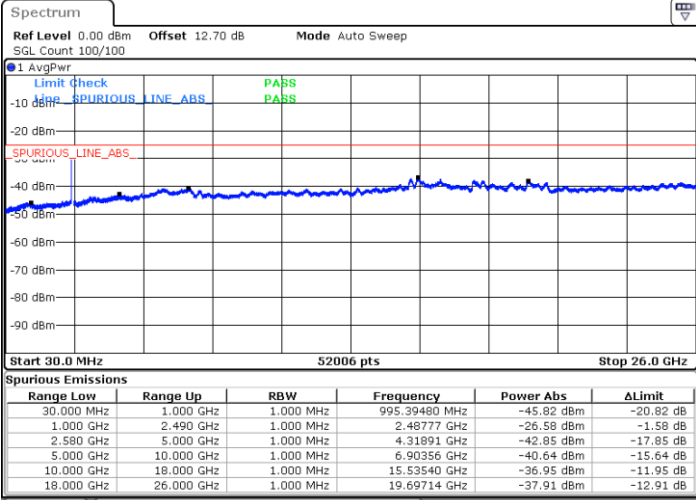
Date: 25.AUG.2023 08:52:47



LTE Band 7 / 15MHz

Lowest Channel / QPSK

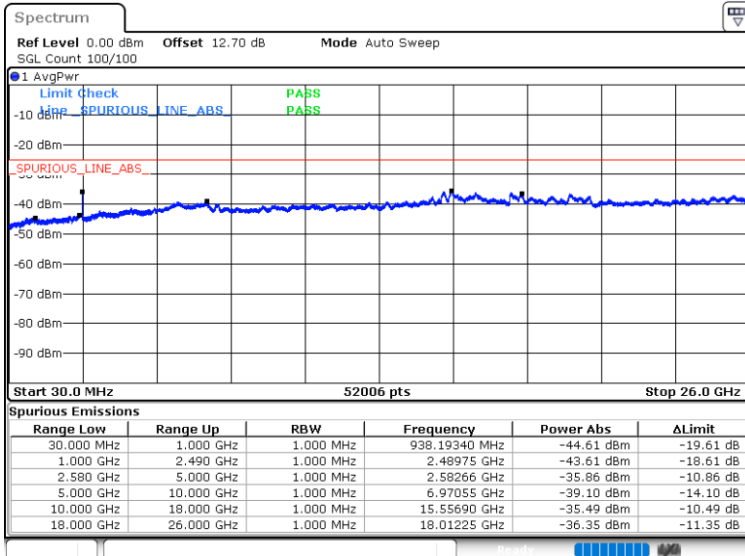
Middle Channel / QPSK



Date: 28.AUG.2023 20:21:04

Date: 25.AUG.2023 08:54:58

Highest Channel / QPSK

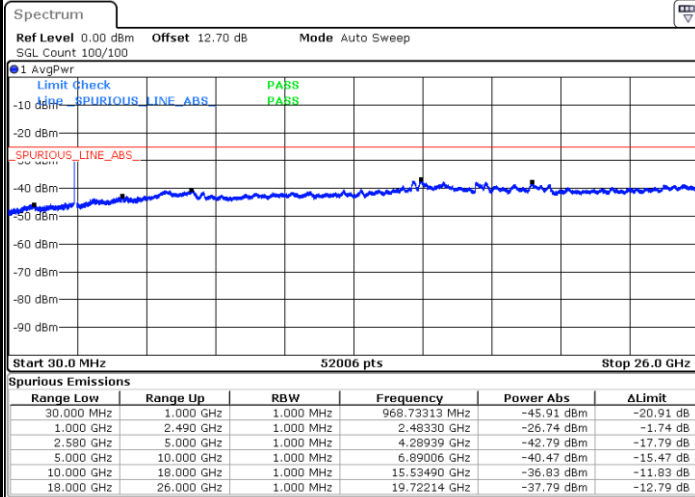


Date: 25.AUG.2023 08:56:02



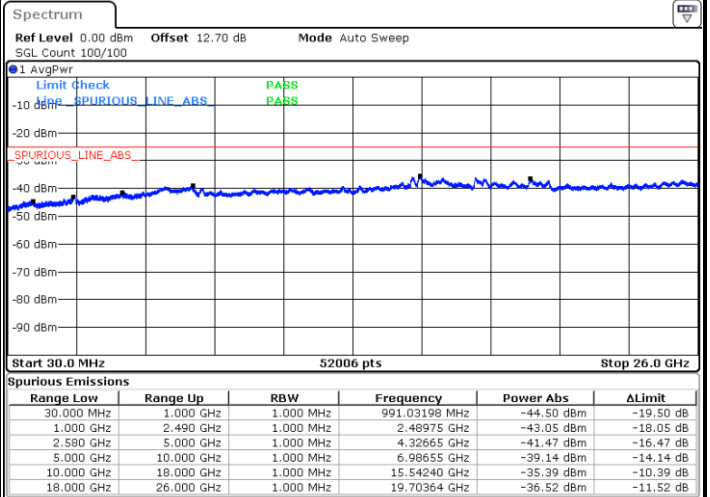
LTE Band 7 / 20MHz

Lowest Channel / QPSK



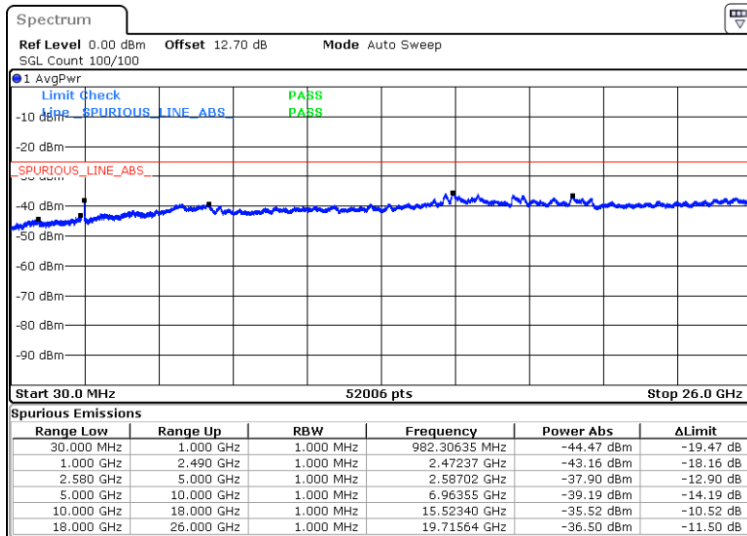
Date: 28.AUG.2023 20:26:31

Middle Channel / QPSK



Date: 25.AUG.2023 08:58:53

Highest Channel / QPSK



Date: 25.AUG.2023 08:59:58



Frequency Stability

Test Conditions		LTE Band 7 (QPSK) / Middle Channel	Limit
Temperature (°C)	Voltage (Volt)	BW 10MHz	Note 2.
		Deviation (ppm)	Result
50	Normal Voltage	0.0043	PASS
40	Normal Voltage	0.0036	
30	Normal Voltage	0.0014	
20(Ref.)	Normal Voltage	0.0000	
10	Normal Voltage	0.0020	
0	Normal Voltage	0.0044	
-10	Normal Voltage	0.0016	
20	Maximum Voltage	0.0030	
20	Normal Voltage	0.0000	
20	Battery End Point	0.0004	

Note:

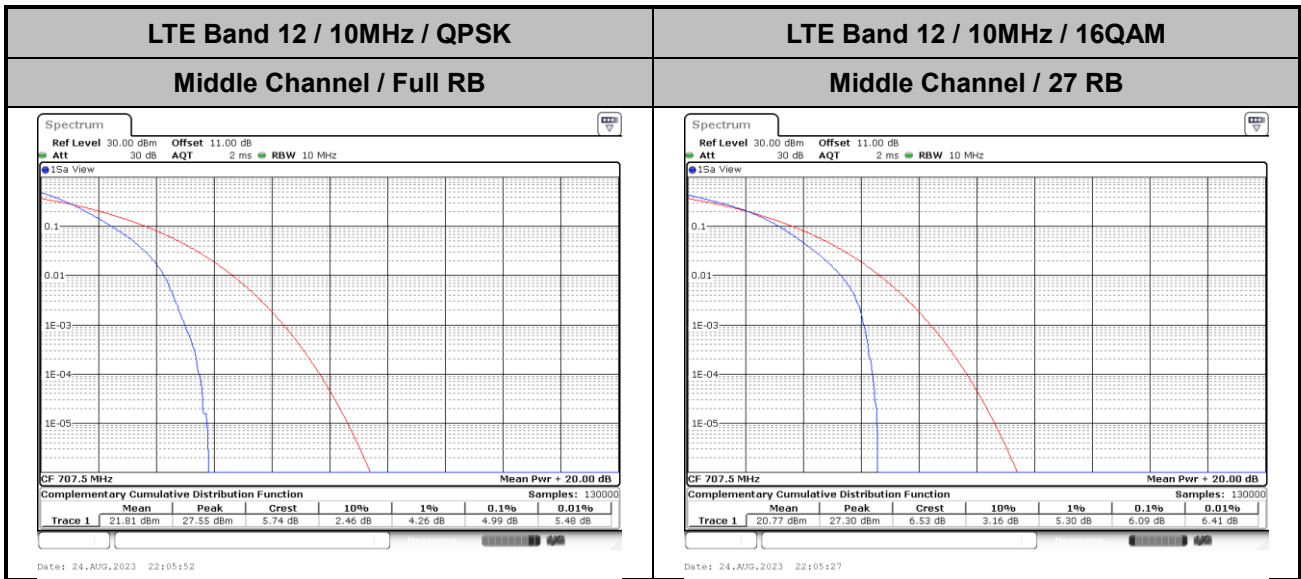
1. Normal Voltage = 3.8 V. ; Battery End Point (BEP) = 3.3 V. ; Maximum Voltage = 4.2 V.
2. The frequency fundamental emissions stay within the authorized frequency block.



LTE Band 12

Peak-to-Average Ratio

Mode	LTE Band 12 / 10MHz		
Mod.	QPSK	16QAM	Limit: 13dB
RB Size	Full RB	27 RB	Result
Middle CH	4.99	6.09	PASS





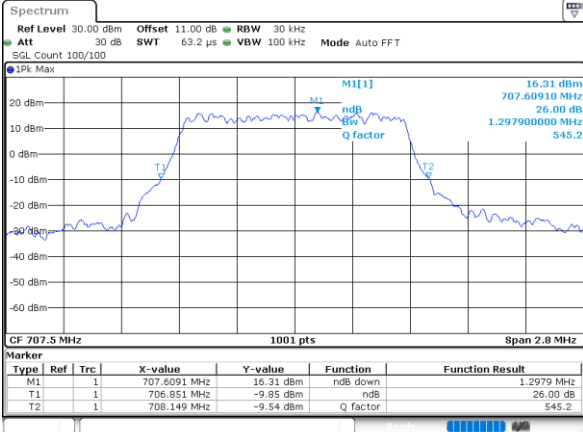
26dB Bandwidth

Mode	LTE Band 12 : 26dB BW(MHz)											
	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
BW												
Mod.	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM
Middle CH	1.30	1.28	3.04	3.06	4.99	4.86	9.97	5.46	-	-	-	-



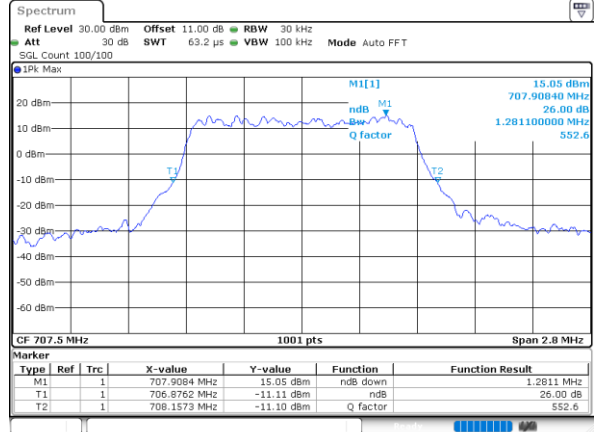
LTE Band 12

Middle Channel / 1.4MHz / QPSK



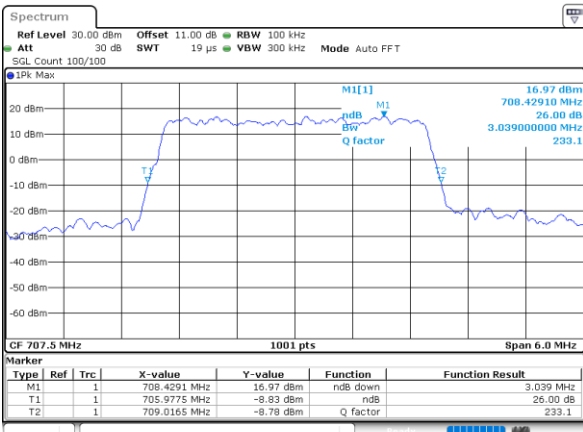
Date: 24.AUG.2023 21:43:23

Middle Channel / 1.4MHz / 16QAM



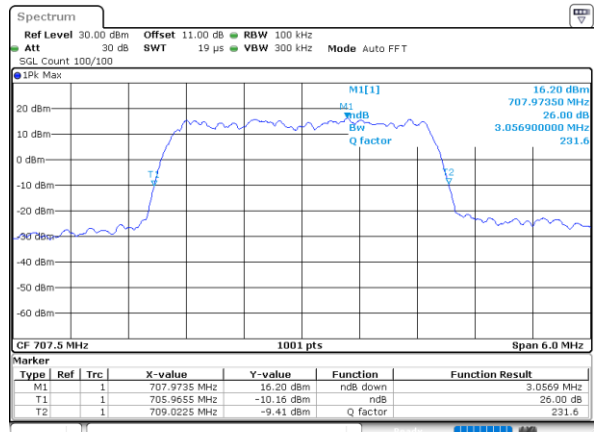
Date: 24.AUG.2023 21:43:46

Middle Channel / 3MHz / QPSK



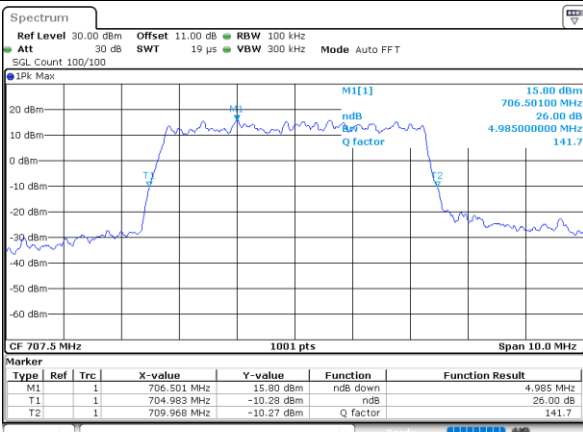
Date: 24.AUG.2023 21:52:28

Middle Channel / 3MHz / 16QAM



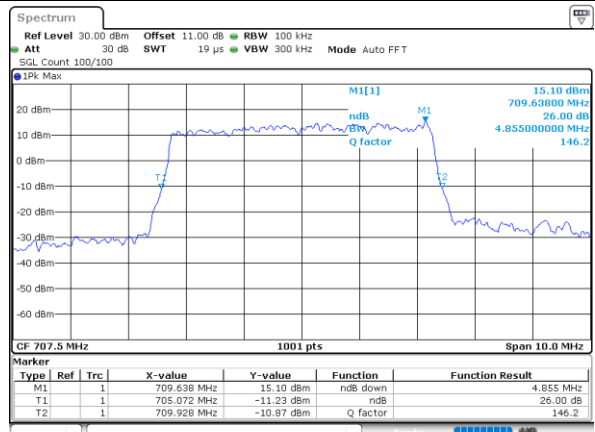
Date: 24.AUG.2023 21:52:51

Middle Channel / 5MHz / QPSK



Date: 24.AUG.2023 21:57:39

Middle Channel / 5MHz / 16QAM

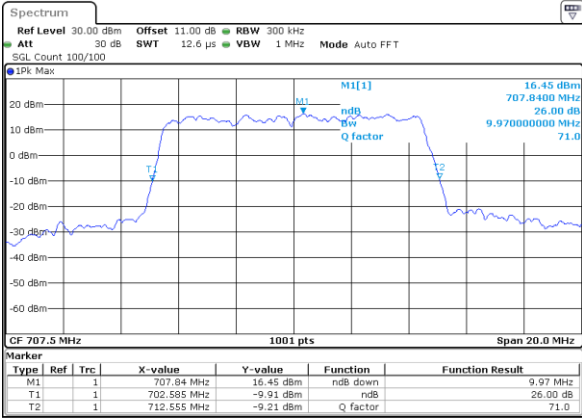


Date: 24.AUG.2023 21:58:02



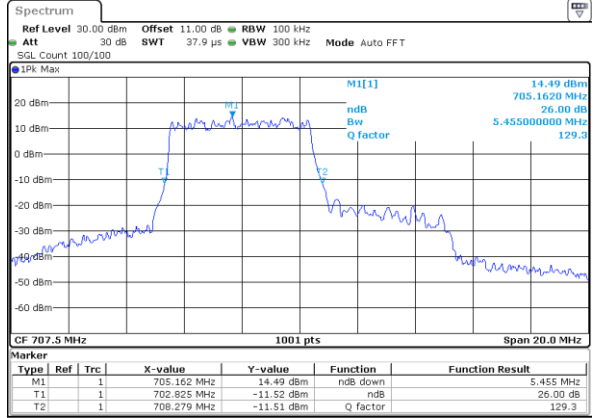
LTE Band 12

Middle Channel / 10MHz / QPSK



Date: 5. SEP. 2023 21:32:39

Middle Channel / 10MHz / 16QAM



Date: 24. AUG. 2023 22:03:14



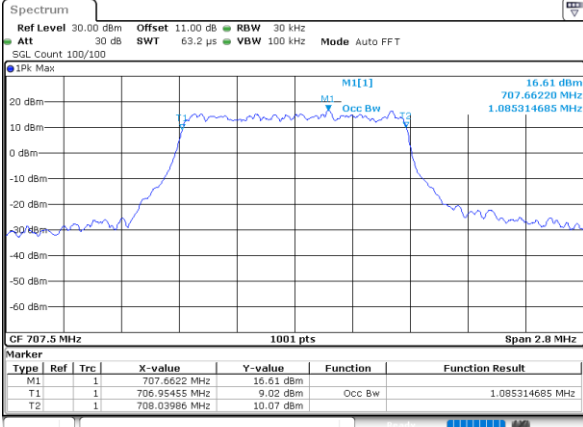
Occupied Bandwidth

Mode	LTE Band 12 : 99%OBW(MHz)											
	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
BW												
Mod.	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM
Middle CH	1.09	1.10	2.74	2.73	4.48	4.50	9.01	4.88	-	-	-	-



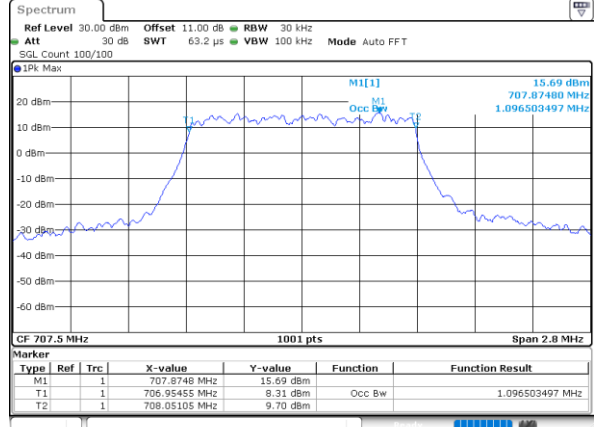
LTE Band 12

Middle Channel / 1.4MHz / QPSK



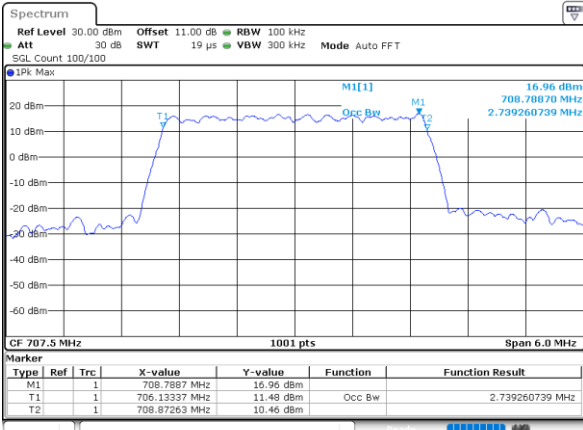
Date: 24.AUG.2023 21:42:59

Middle Channel / 1.4MHz / 16QAM



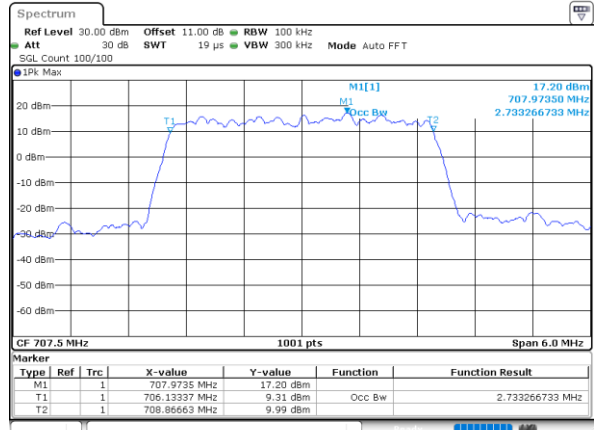
Date: 24.AUG.2023 21:42:36

Middle Channel / 3MHz / QPSK



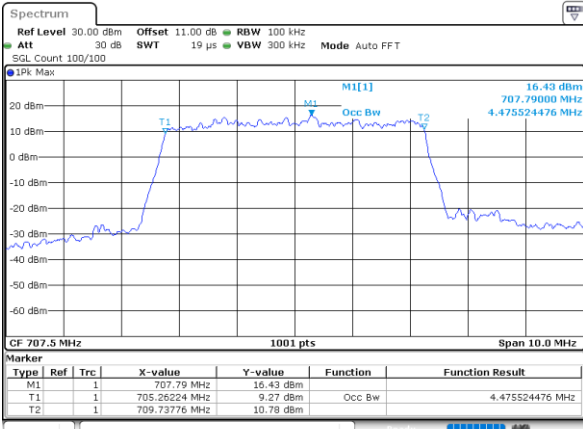
Date: 24.AUG.2023 21:52:04

Middle Channel / 3MHz / 16QAM



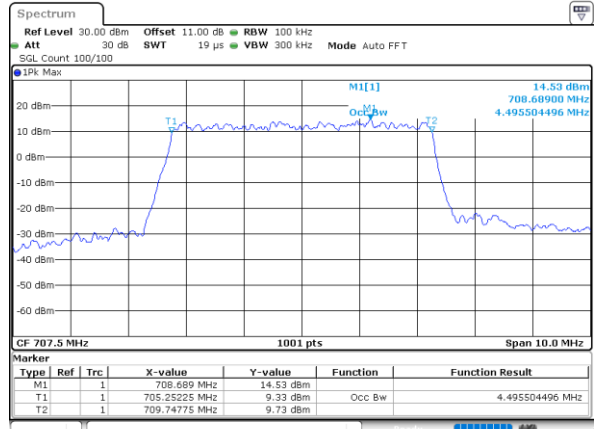
Date: 24.AUG.2023 21:51:41

Middle Channel / 5MHz / QPSK



Date: 24.AUG.2023 21:57:16

Middle Channel / 5MHz / 16QAM

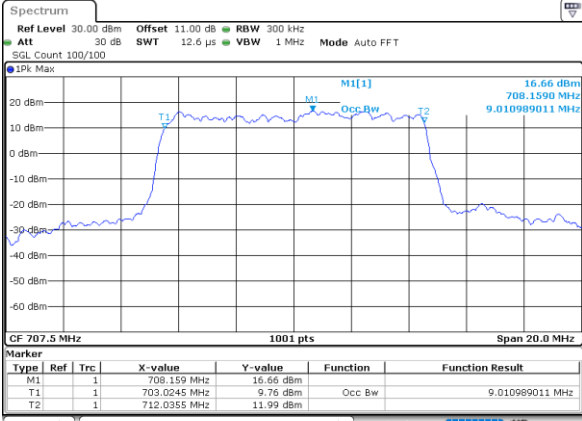


Date: 24.AUG.2023 21:56:52



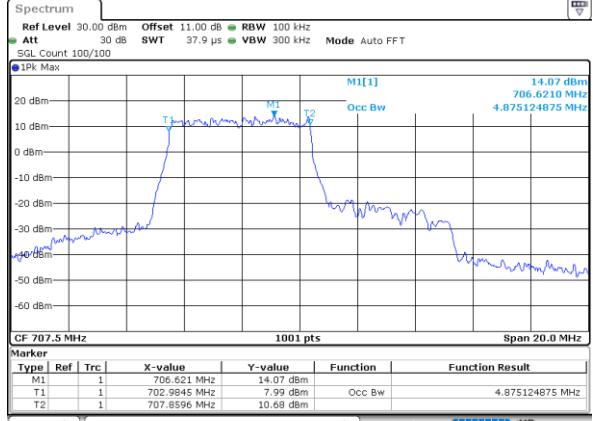
LTE Band 12

Middle Channel / 10MHz / QPSK



Date: 5.SEP.2023 21:32:16

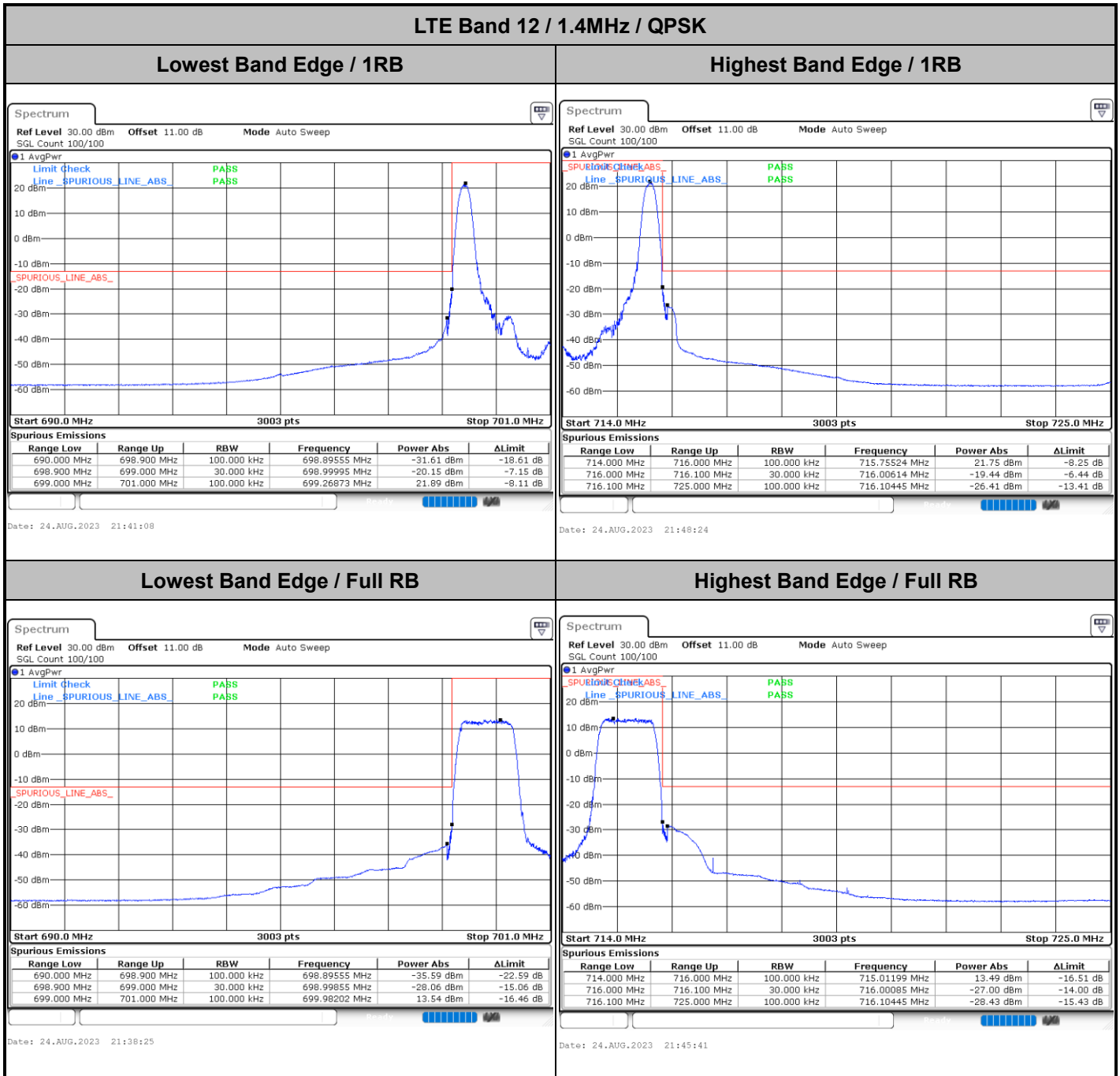
Middle Channel / 10MHz / 16QAM



Date: 24.AUG.2023 22:02:04



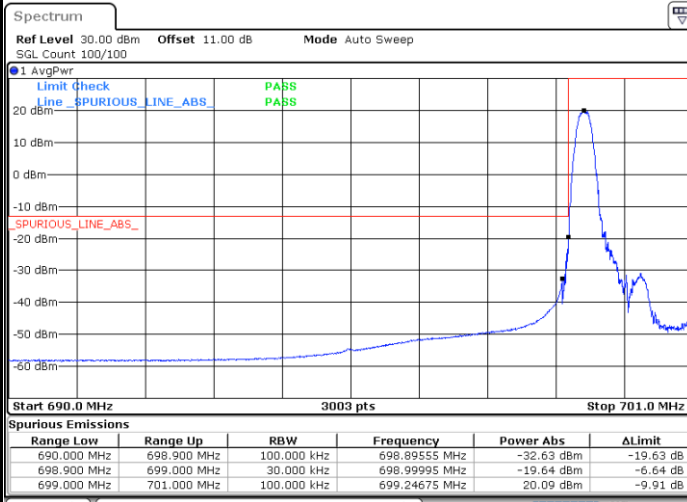
Conducted Band Edge





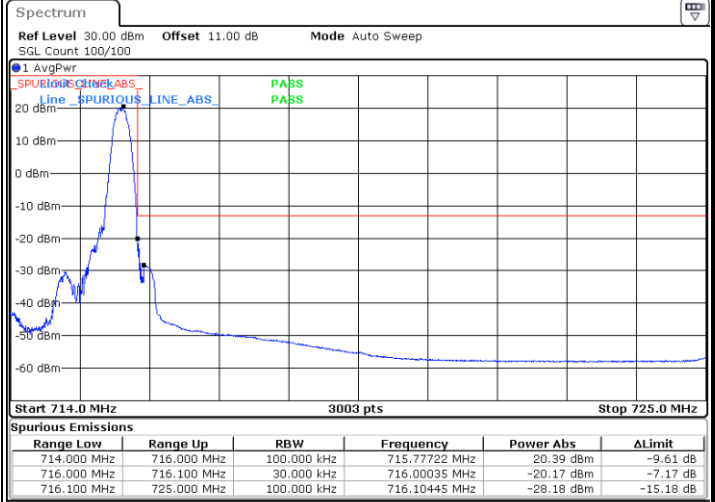
LTE Band 12 / 1.4MHz / 16QAM

Lowest Band Edge / 1 RB



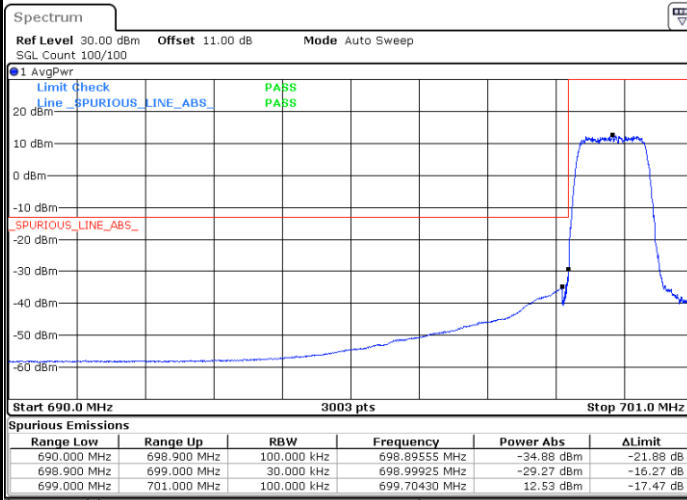
Date: 24.AUG.2023 21:40:14

Highest Band Edge / 1 RB



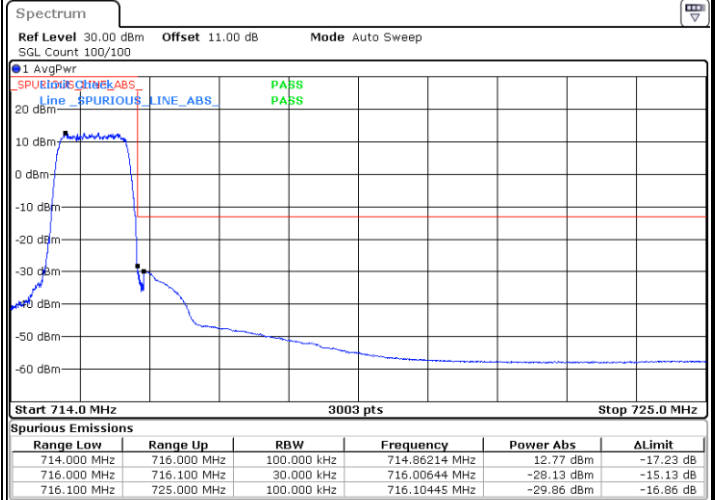
Date: 24.AUG.2023 21:47:30

Lowest Band Edge / Full RB



Date: 24.AUG.2023 21:39:20

Highest Band Edge / Full RB

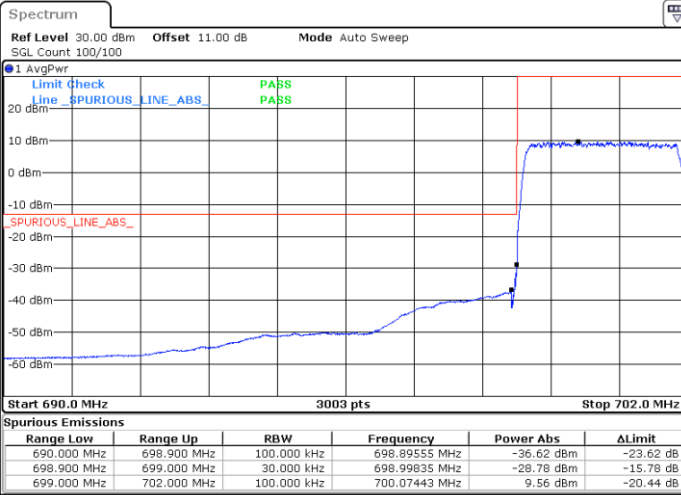


Date: 24.AUG.2023 21:46:36



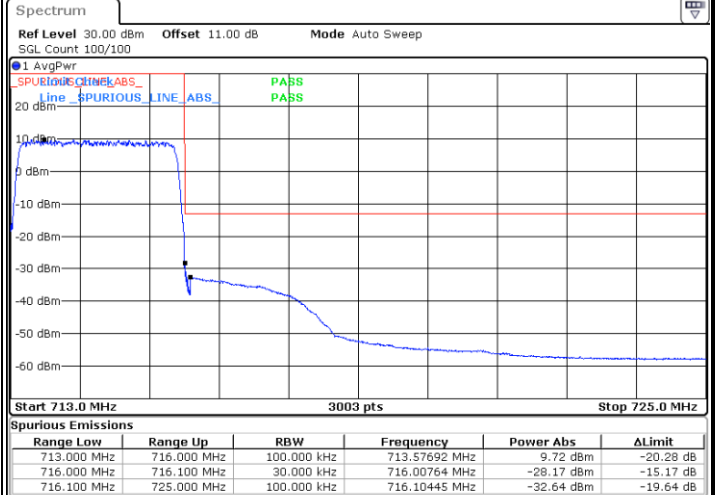
LTE Band 12 / 3MHz / QPSK

Lowest Band Edge / Full RB



Date: 24.AUG.2023 21:50:22

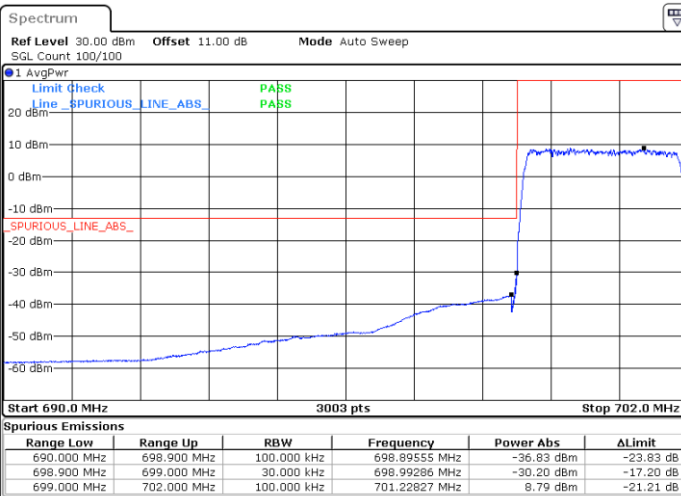
Highest Band Edge / Full RB



Date: 24.AUG.2023 21:53:44

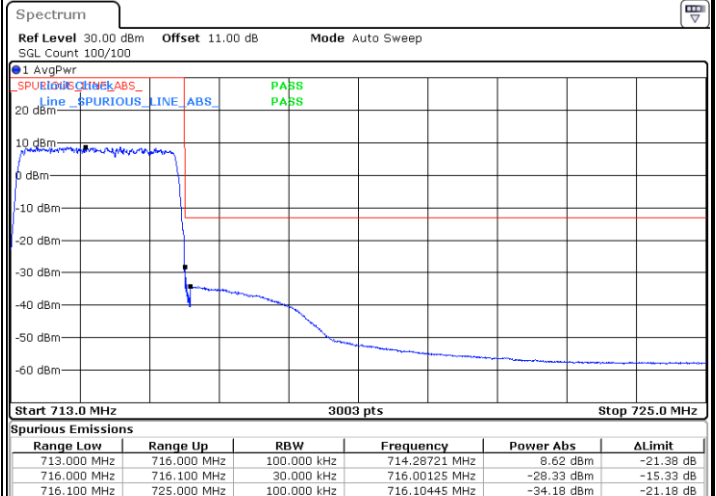
LTE Band 12 / 3MHz / 16QAM

Lowest Band Edge / Full RB



Date: 24.AUG.2023 21:51:16

Highest Band Edge / Full RB

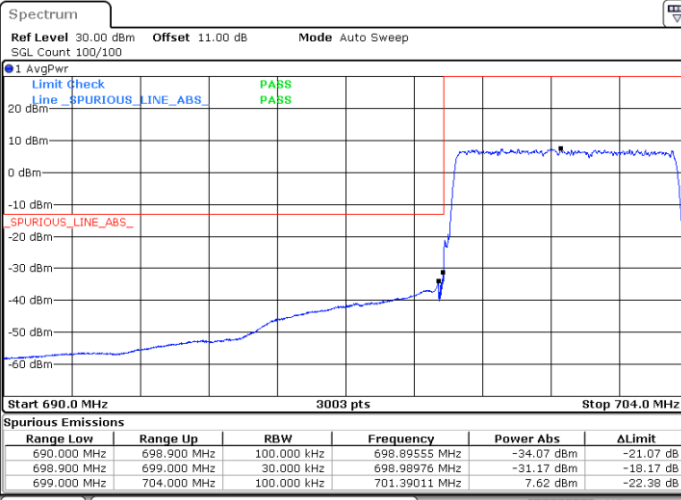


Date: 24.AUG.2023 21:54:38



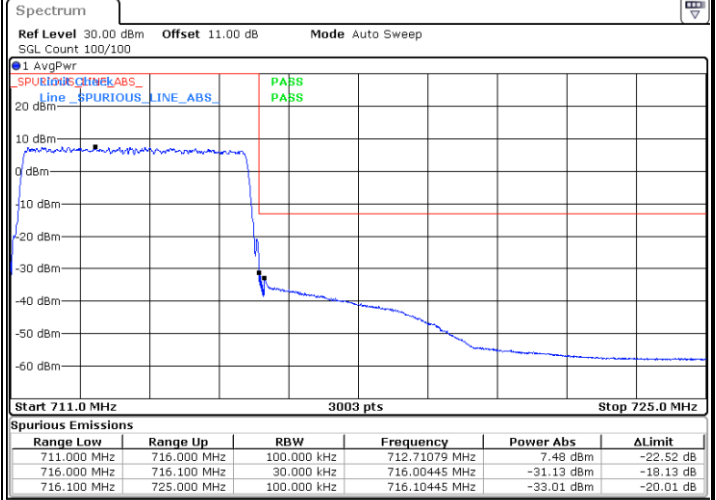
LTE Band 12 / 5MHz / QPSK

Lowest Band Edge / Full RB



Date: 24.AUG.2023 21:55:33

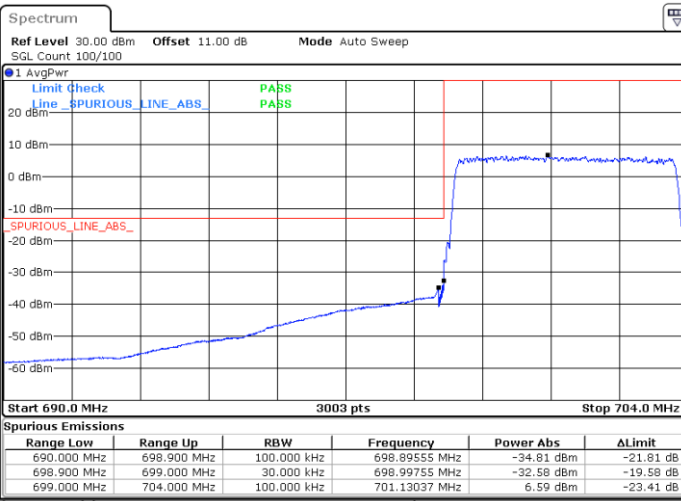
Highest Band Edge / Full RB



Date: 24.AUG.2023 21:58:55

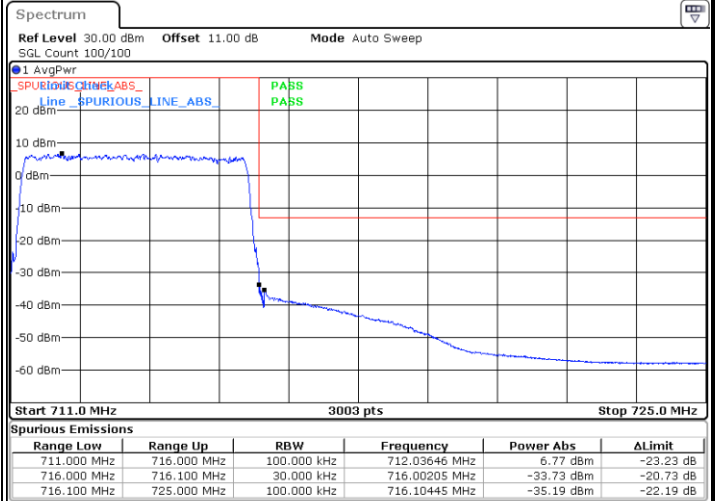
LTE Band 12 / 5MHz / 16QAM

Lowest Band Edge / Full RB



Date: 24.AUG.2023 21:56:27

Highest Band Edge / Full RB

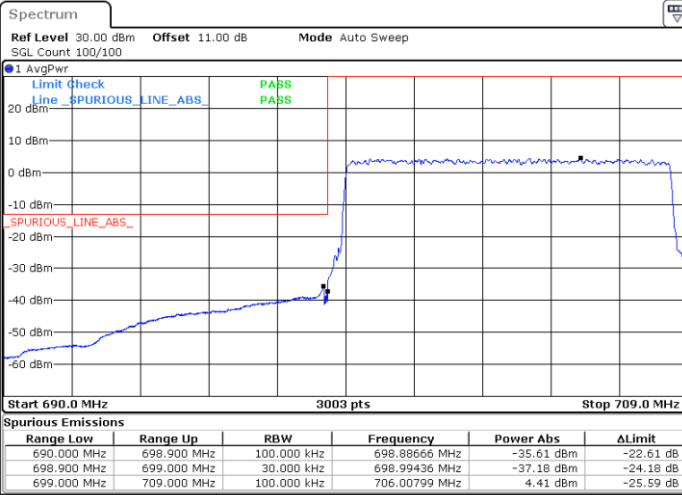


Date: 24.AUG.2023 21:59:49



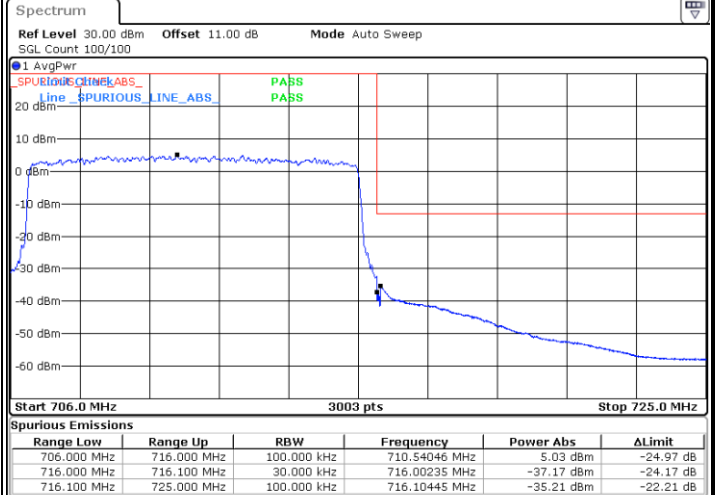
LTE Band 12 / 10MHz / QPSK

Lowest Band Edge / Full RB



Date: 24.AUG.2023 22:00:44

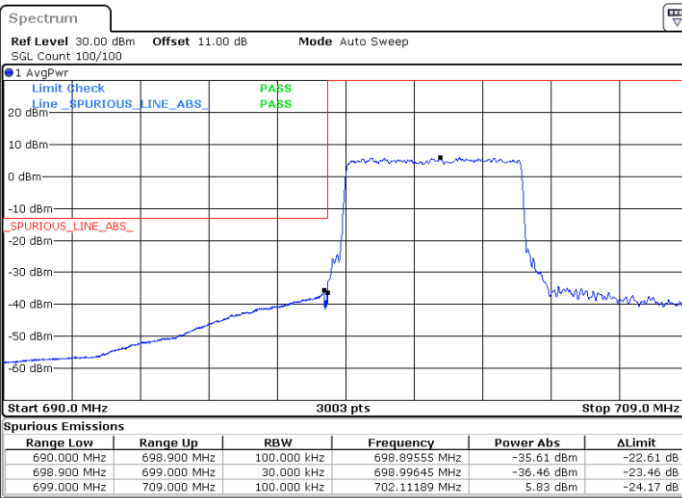
Highest Band Edge / Full RB



Date: 24.AUG.2023 22:04:07

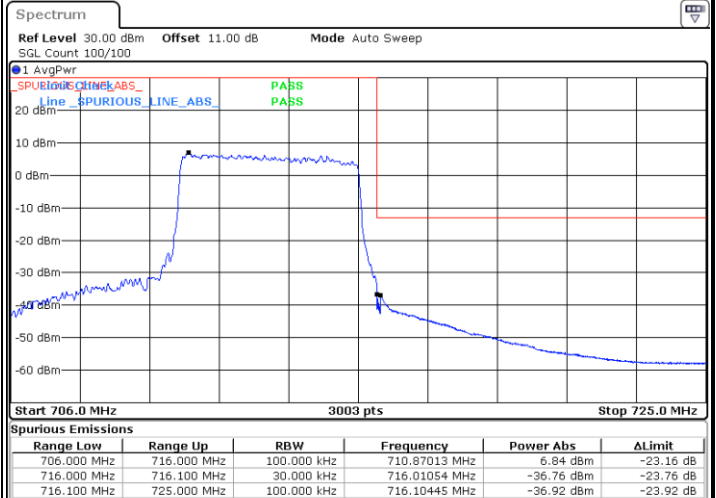
LTE Band 12 / 10MHz / 16QAM

Lowest Band Edge / 27 RB



Date: 24.AUG.2023 22:01:39

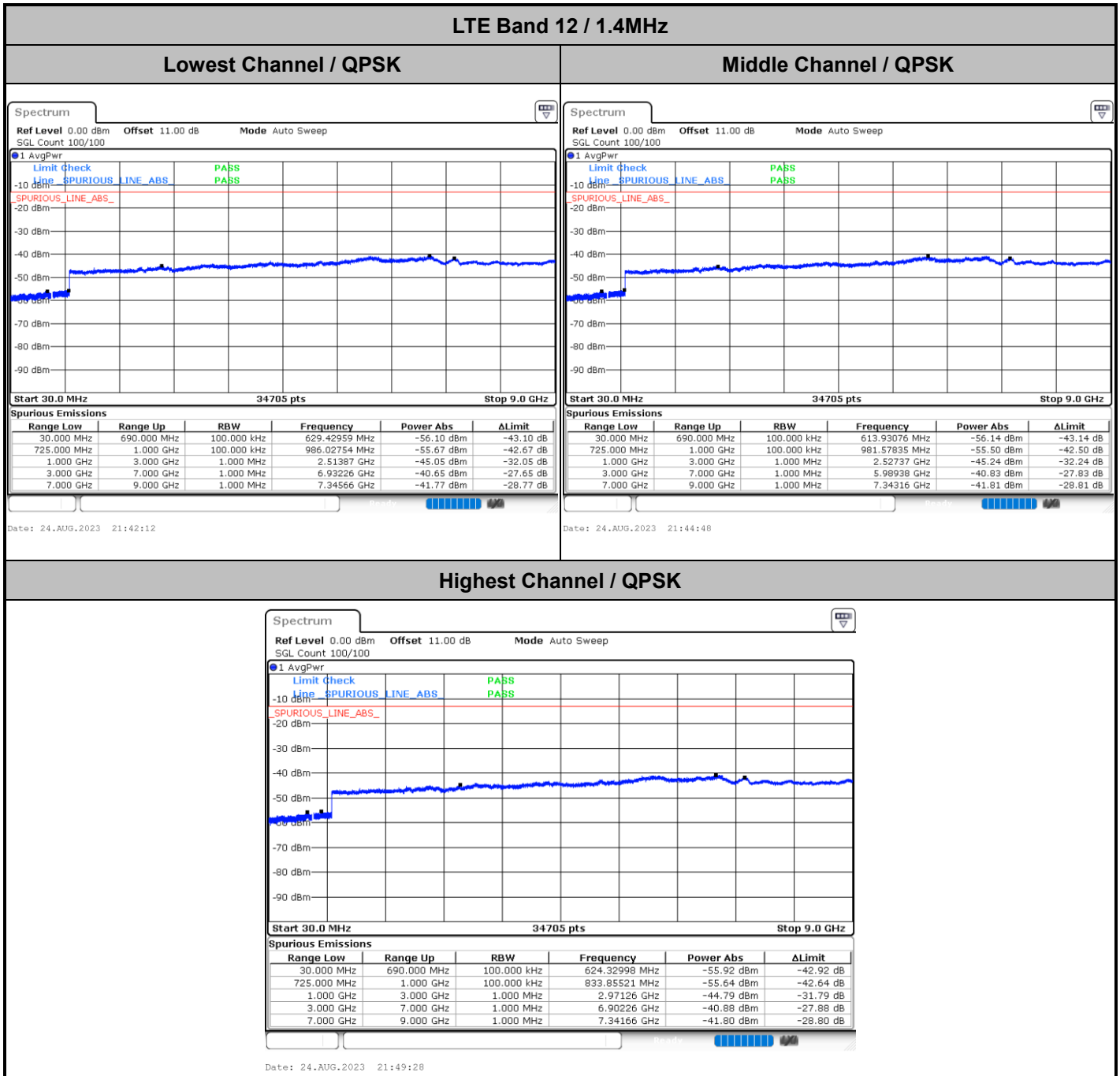
Highest Band Edge / 27 RB



Date: 26.AUG.2023 01:23:38



Conducted Spurious Emission

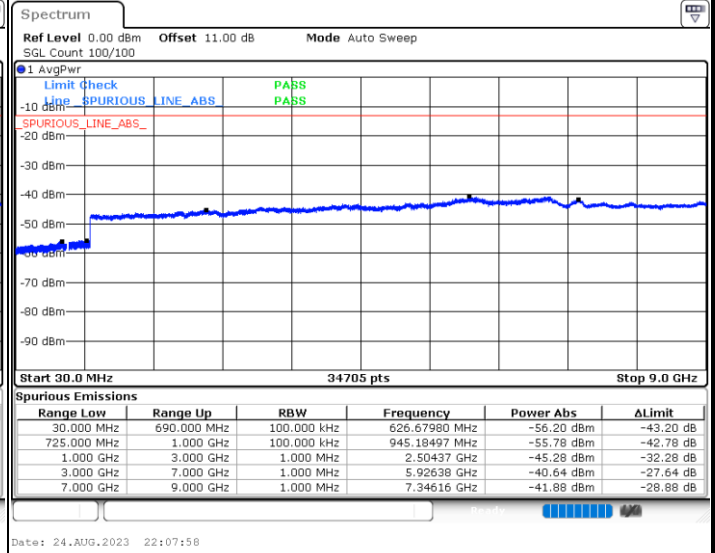
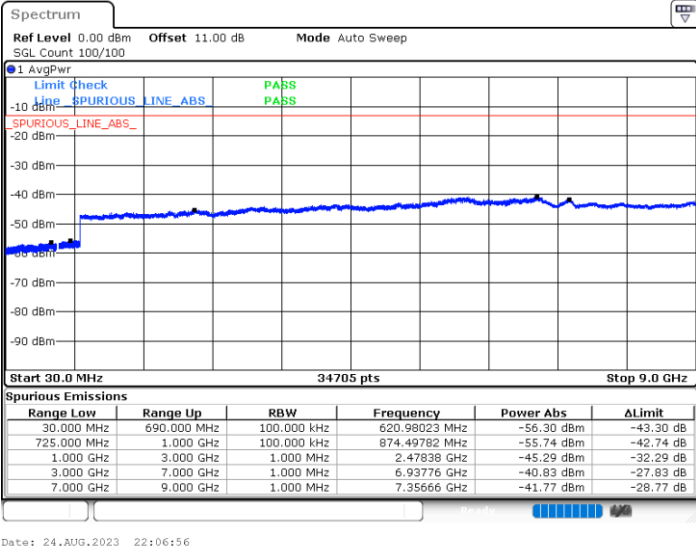




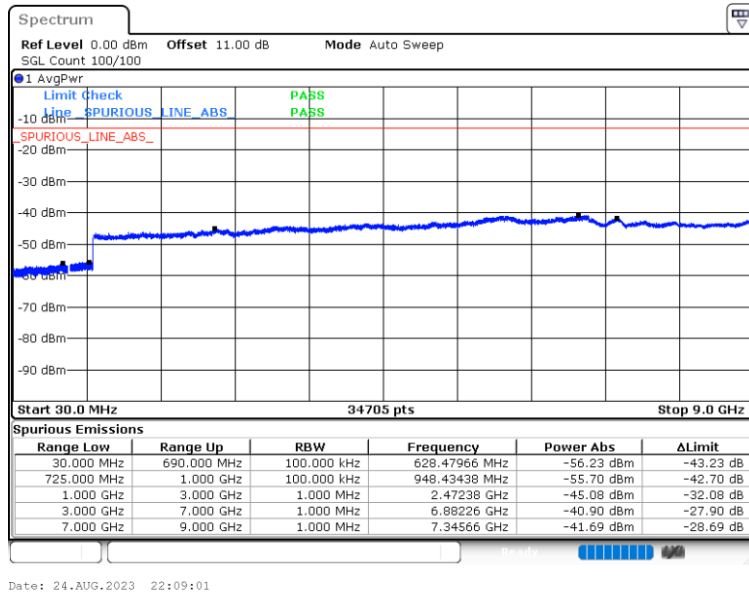
LTE Band 12 / 3MHz

Lowest Channel / QPSK

Middle Channel / QPSK



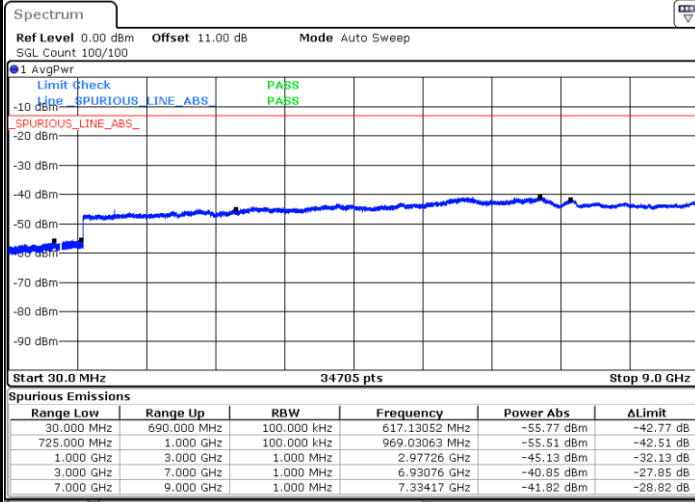
Highest Channel / QPSK





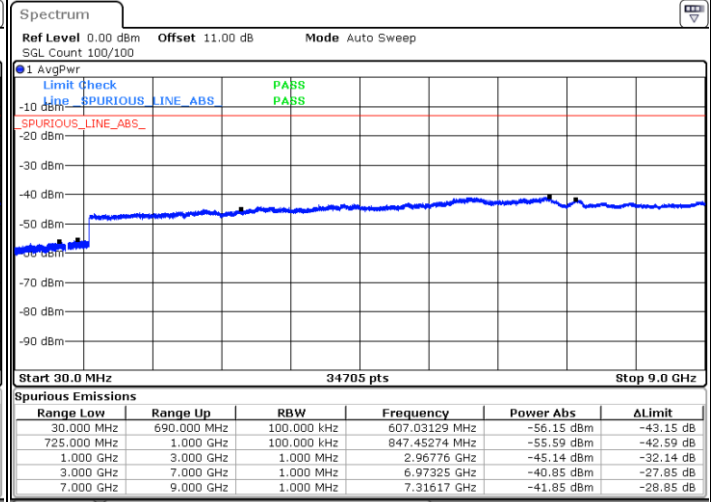
LTE Band 12 / 5MHz

Lowest Channel / QPSK



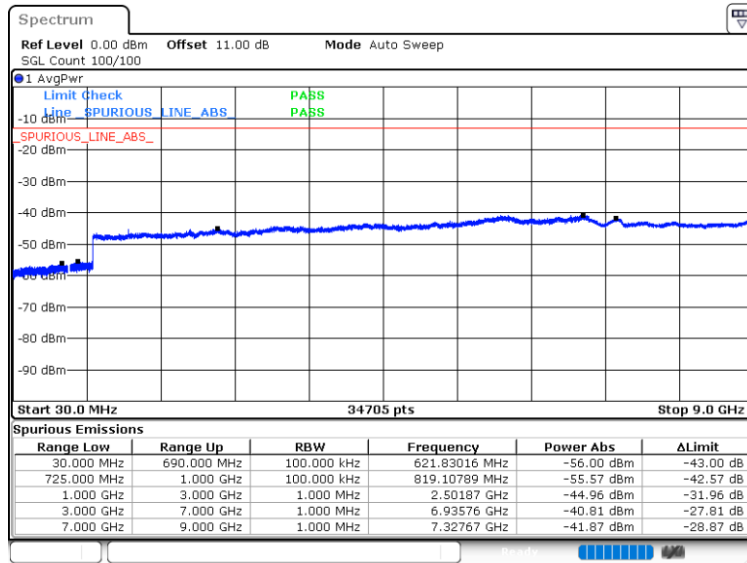
Date: 24.AUG.2023 22:10:04

Middle Channel / QPSK



Date: 24.AUG.2023 22:11:07

Highest Channel / QPSK



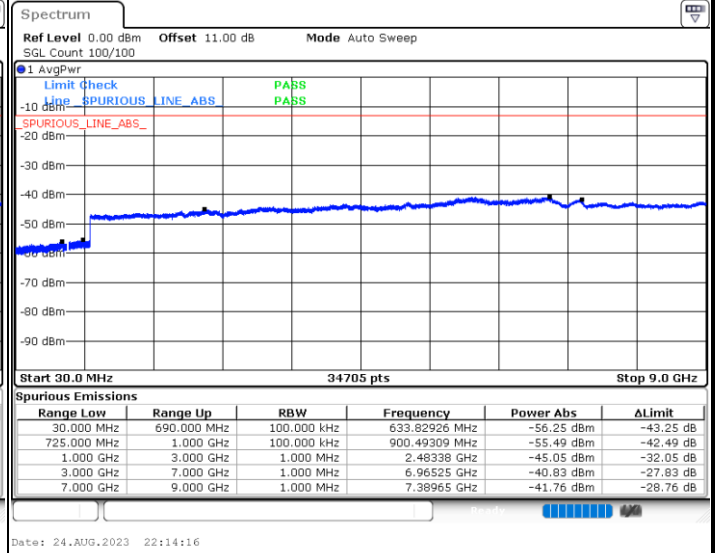
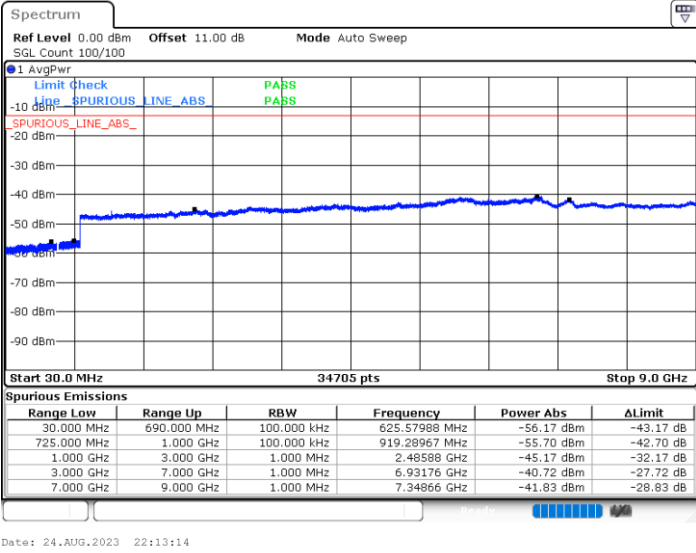
Date: 24.AUG.2023 22:12:10



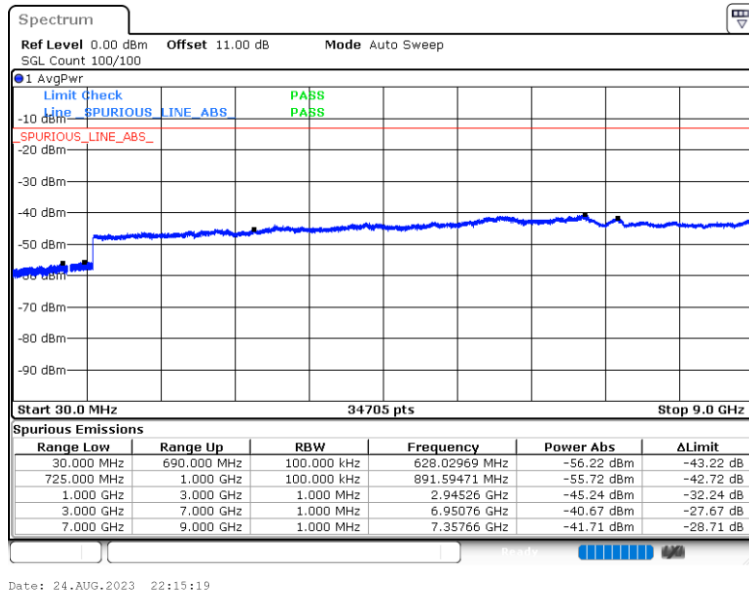
LTE Band 12 / 10MHz

Lowest Channel / QPSK

Middle Channel / QPSK



Highest Channel / QPSK





Frequency Stability

Test Conditions		LTE Band 12 (QPSK) / Middle Channel	Limit
Temperature (°C)	Voltage (Volt)	BW 10MHz	Note 2.
		Deviation (ppm)	Result
50	Normal Voltage	0.0230	PASS
40	Normal Voltage	0.0031	
30	Normal Voltage	0.0196	
20(Ref.)	Normal Voltage	0.0000	
10	Normal Voltage	0.0194	
0	Normal Voltage	0.0054	
-10	Normal Voltage	0.0078	
20	Maximum Voltage	0.0232	
20	Normal Voltage	0.0000	
20	Battery End Point	0.0273	

Note:

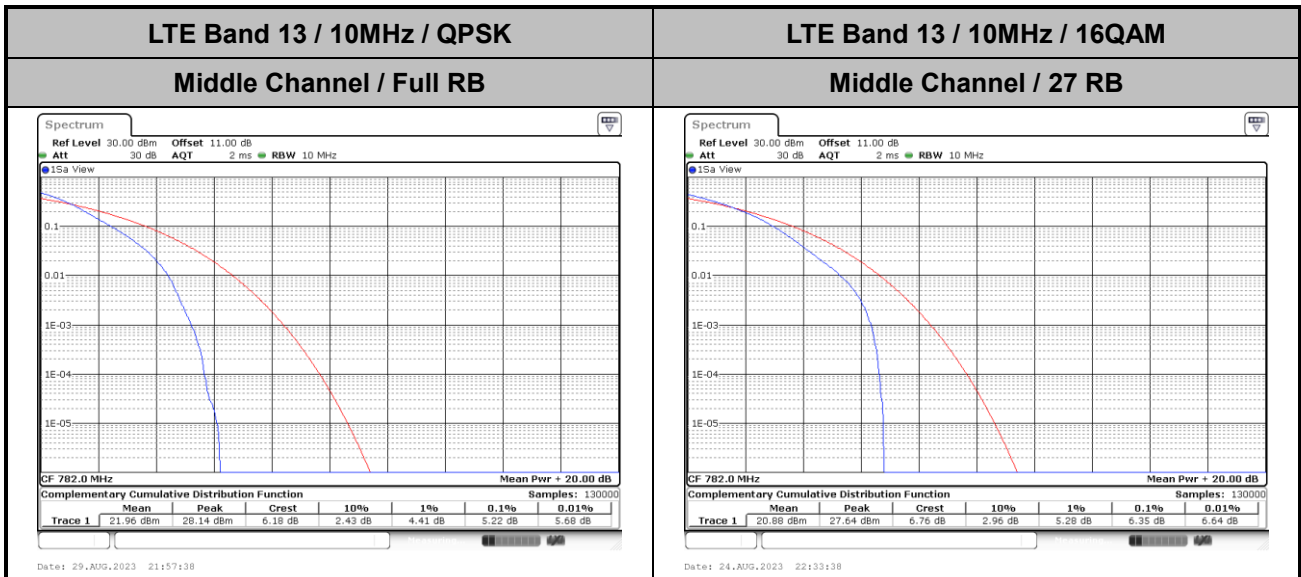
1. Normal Voltage = 3.8 V. ; Battery End Point (BEP) = 3.3 V. ; Maximum Voltage = 4.2 V.
2. The frequency fundamental emissions stay within the authorized frequency block.



LTE Band 13

Peak-to-Average Ratio

Mode	LTE Band 13 / 10MHz		
Mod.	QPSK	16QAM	Limit: 13dB
RB Size	Full RB	27 RB	Result
Middle CH	5.22	6.35	PASS





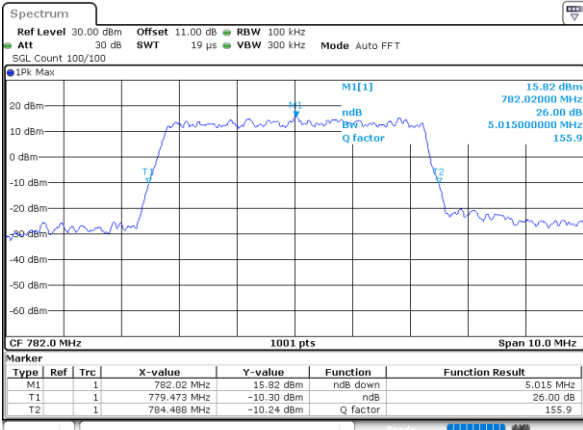
26dB Bandwidth

Mode	LTE Band 13 : 26dB BW(MHz)											
	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
BW												
Mod.	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM
Middle CH	-	-	-	-	5.02	4.94	9.79	5.42	-	-	-	-



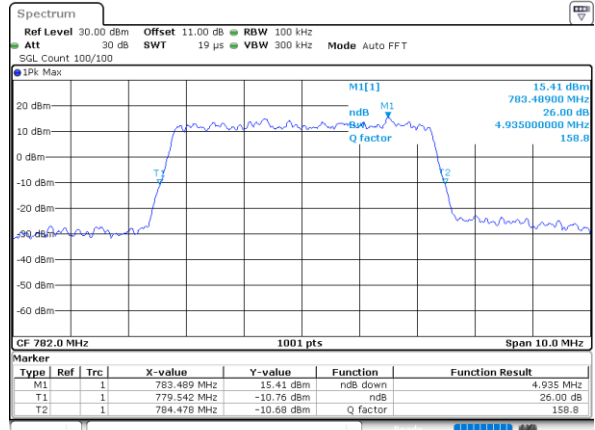
LTE Band 13

Middle Channel / 5MHz / QPSK



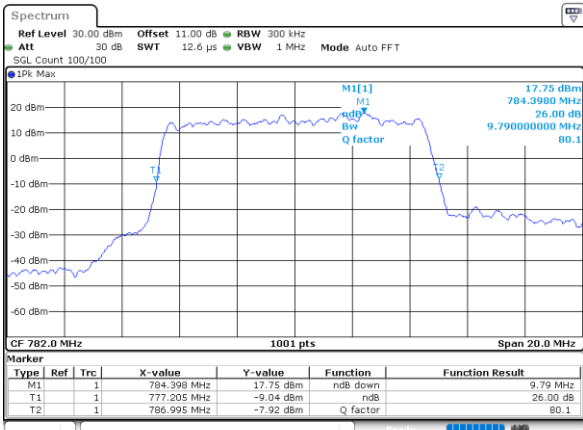
Date: 24.AUG.2023 22:24:02

Middle Channel / 5MHz / 16QAM



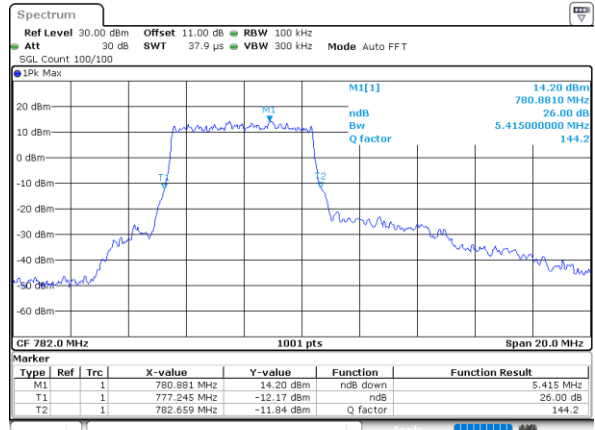
Date: 24.AUG.2023 22:24:25

Middle Channel / 10MHz / QPSK



Date: 5.SEP.2023 21:41:17

Middle Channel / 10MHz / 16QAM



Date: 24.AUG.2023 22:31:03



Occupied Bandwidth

Mode	LTE Band 13 : 99%OBW(MHz)											
	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM
Middle CH	-	-	-	-	4.47	4.49	9.01	4.86	-	-	-	-