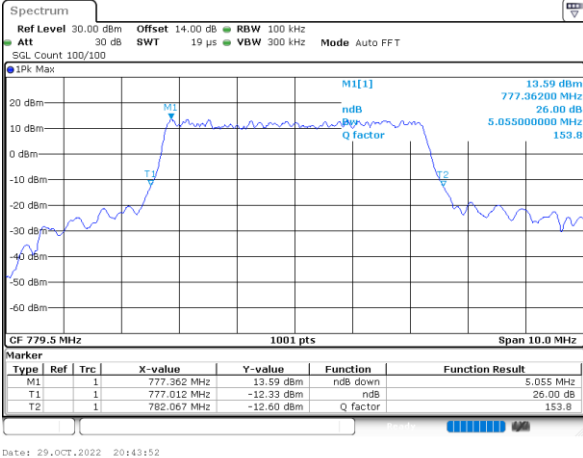




LTE Band 13

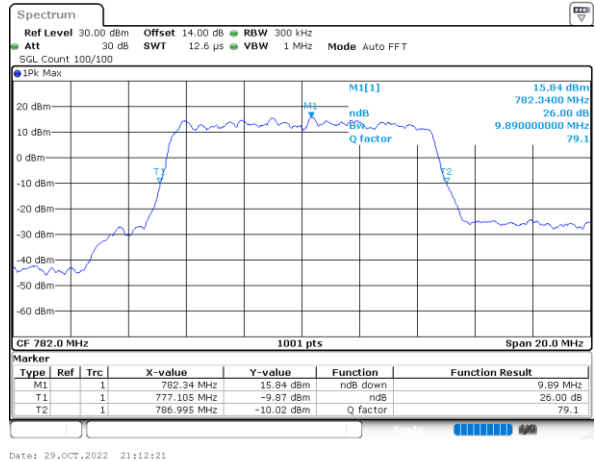
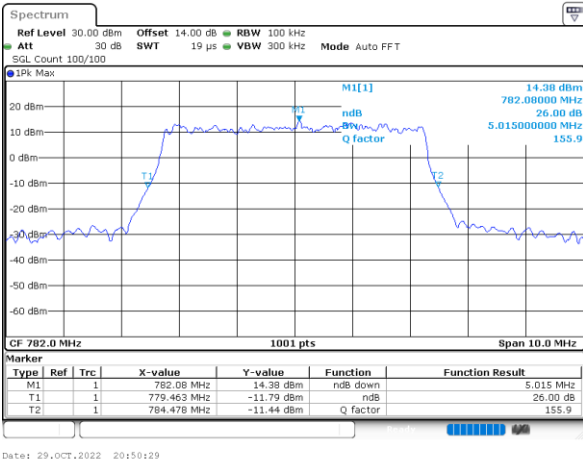
Lowest Channel / 5MHz / 64QAM

NA



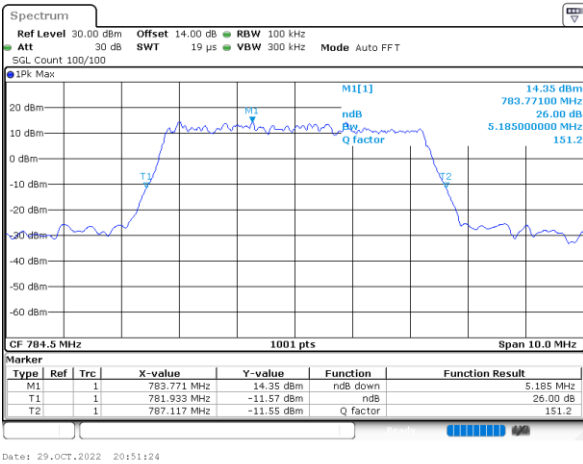
Middle Channel / 5MHz / 64QAM

Middle Channel / 10MHz / 64QAM



Highest Channel / 5MHz / 64QAM

NA



NA



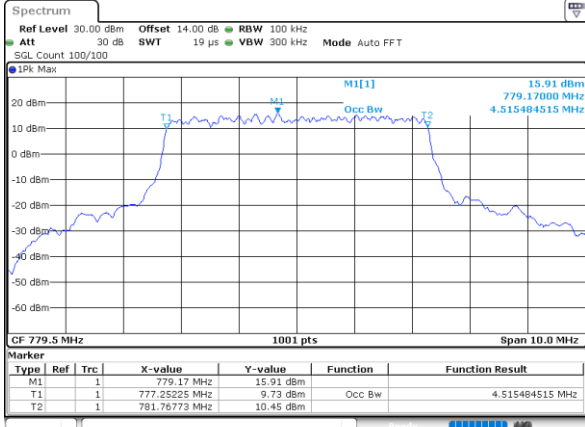
Occupied Bandwidth

Mode	LTE Band 13 : 99%OBW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM
Lowest CH	-	-	-	-	4.52	4.49	-	-	-	-	-	-
Middle CH	-	-	-	-	4.53	4.50	8.97	9.01	-	-	-	-
Highest CH	-	-	-	-	4.52	4.50	-	-	-	-	-	-
Mode	LTE Band 13 : 99%OBW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	64QAM		64QAM		64QAM		64QAM		64QAM		64QAM	
Lowest CH	-	-	-	-	4.54	-	-	-	-	-	-	-
Middle CH	-	-	-	-	4.53	-	9.07	-	-	-	-	-
Highest CH	-	-	-	-	4.49	-	-	-	-	-	-	-



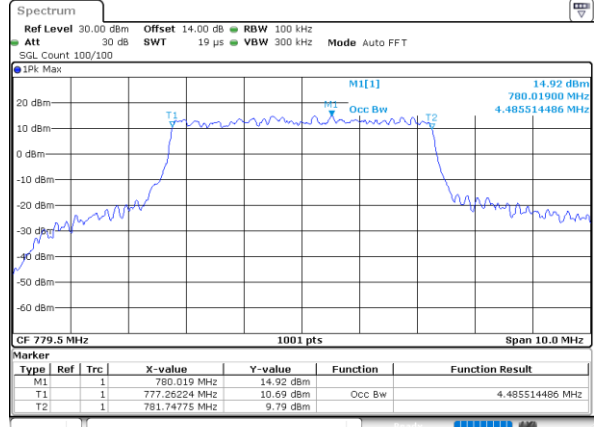
LTE Band 13

Lowest Channel / 5MHz / QPSK



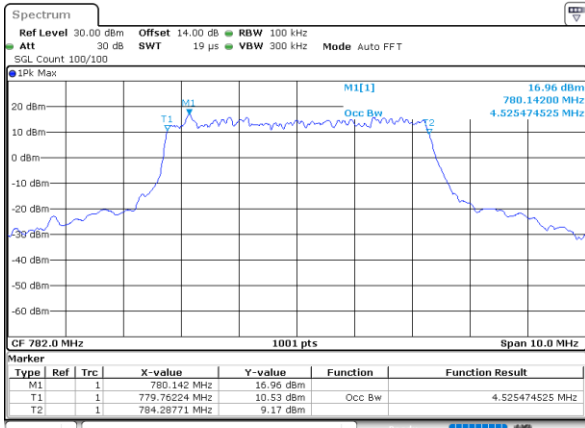
Date: 29.OCT.2022 20:16:16

Lowest Channel / 5MHz / 16QAM



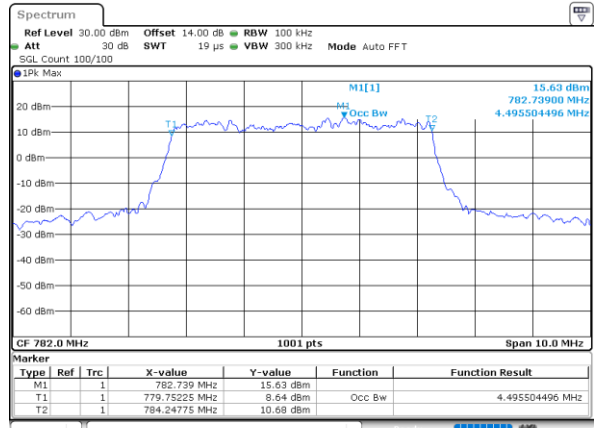
Date: 29.OCT.2022 20:16:41

Middle Channel / 5MHz / QPSK



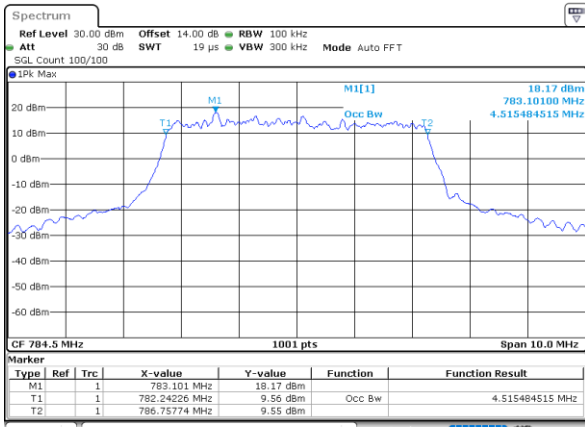
Date: 29.OCT.2022 20:31:05

Middle Channel / 5MHz / 16QAM



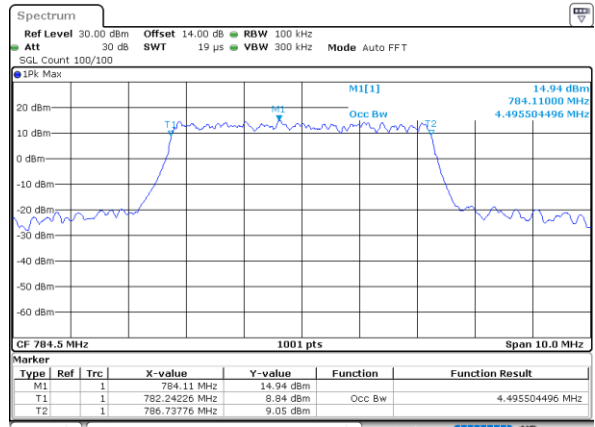
Date: 29.OCT.2022 20:31:11

Highest Channel / 5MHz / QPSK



Date: 29.OCT.2022 20:32:00

Highest Channel / 5MHz / 16QAM

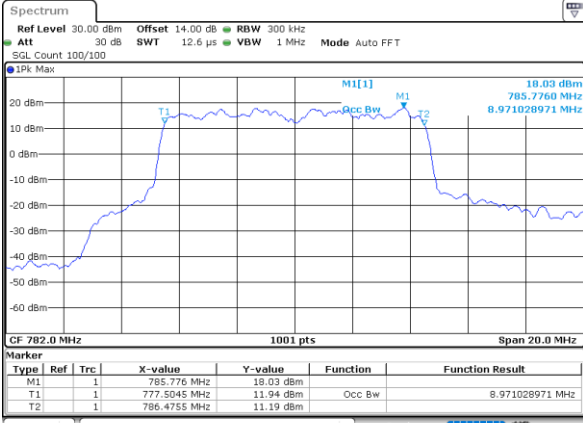


Date: 29.OCT.2022 20:32:24



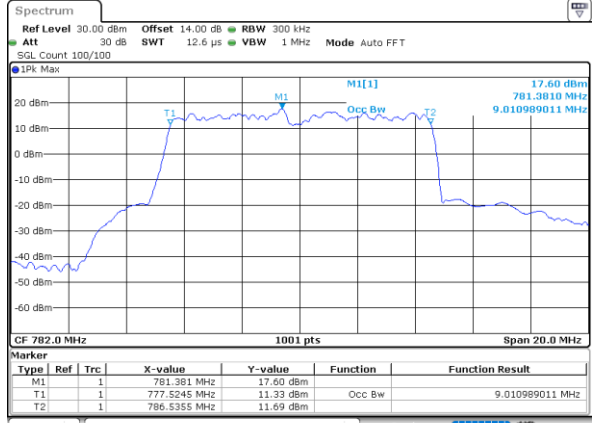
LTE Band 13

Middle Channel / 10MHz / QPSK



Date: 29.OCT.2022 20:56:48

Middle Channel / 10MHz / 16QAM



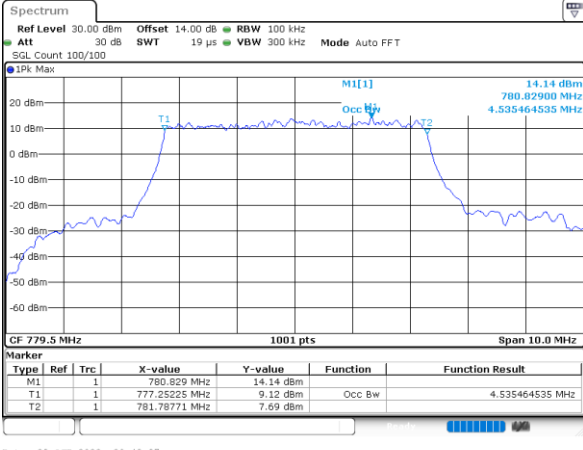
Date: 29.OCT.2022 20:57:12



LTE Band 13

Lowest Channel / 5MHz / 64QAM

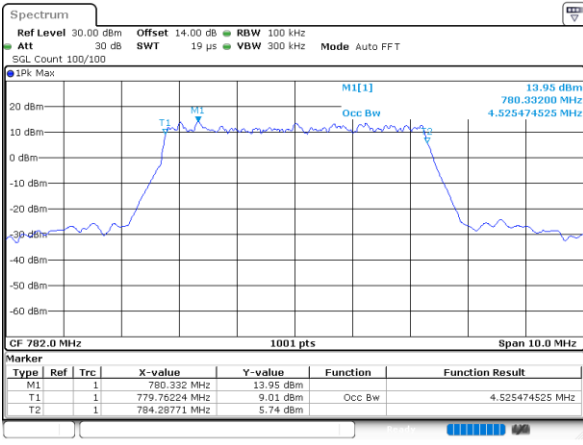
NA



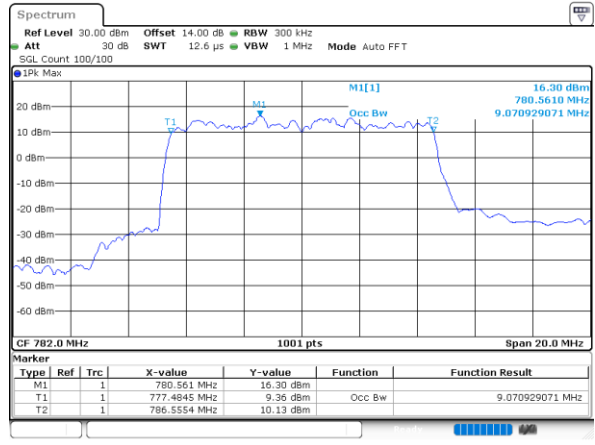
Date: 29.OCT.2022 20:43:37

Middle Channel / 5MHz / 64QAM

Middle Channel / 10MHz / 64QAM



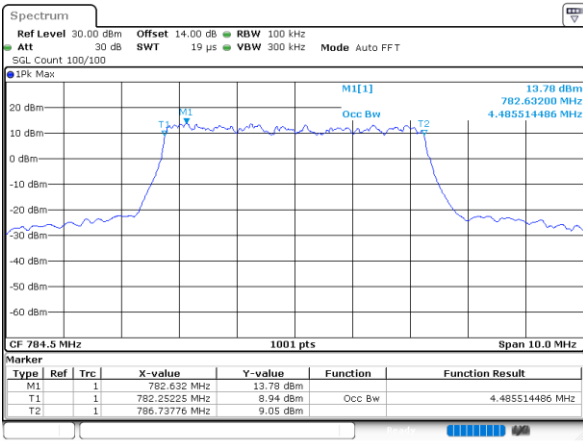
Date: 29.OCT.2022 20:50:44



Date: 29.OCT.2022 21:12:06

Highest Channel / 5MHz / 64QAM

NA



Date: 29.OCT.2022 20:51:09

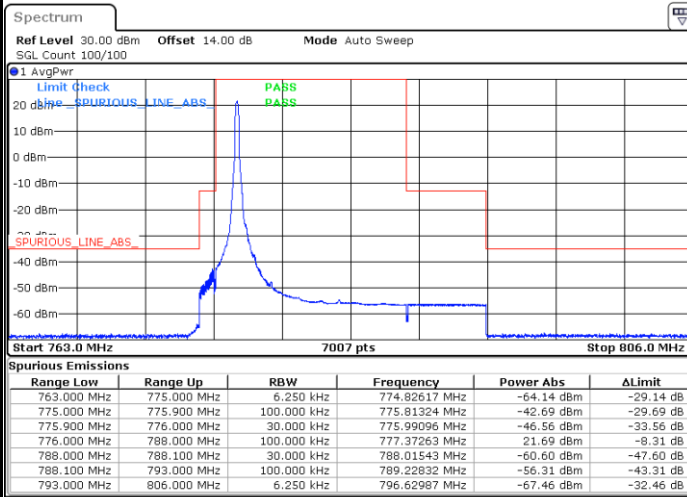
NA



Conducted Band Edge

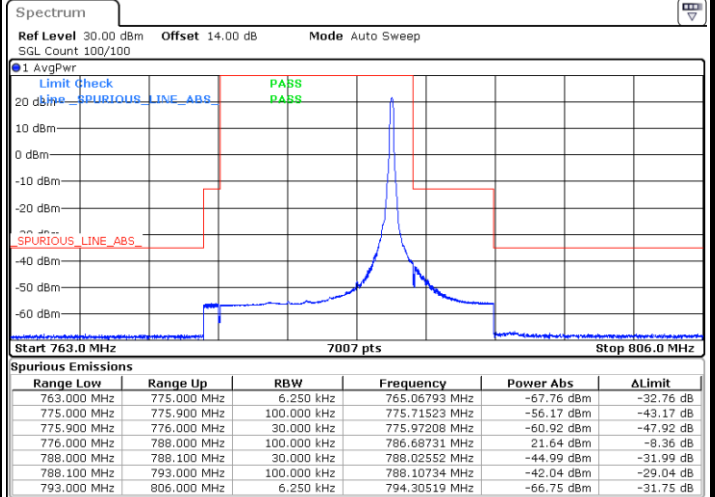
LTE Band 13 / 5MHz / QPSK

Lowest Band Edge / 1 RB



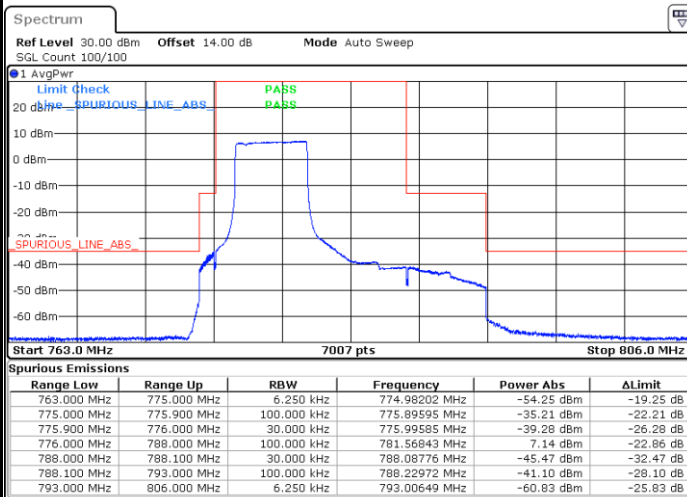
Date: 29.OCT.2022 20:24:42

Highest Band Edge / 1 RB



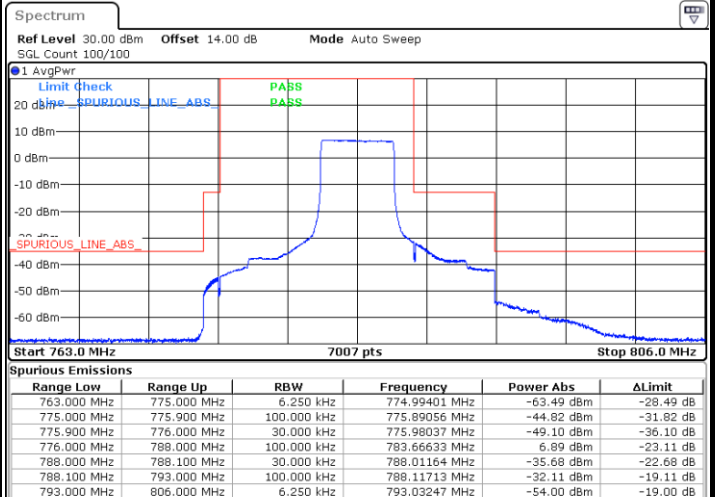
Date: 29.OCT.2022 20:40:27

Lowest Band Edge / Full RB



Date: 29.OCT.2022 20:19:04

Highest Band Edge / Full RB



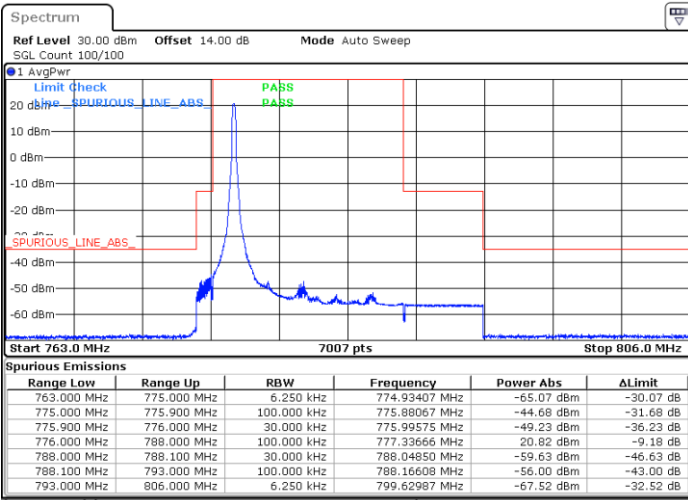
Date: 29.OCT.2022 20:34:48



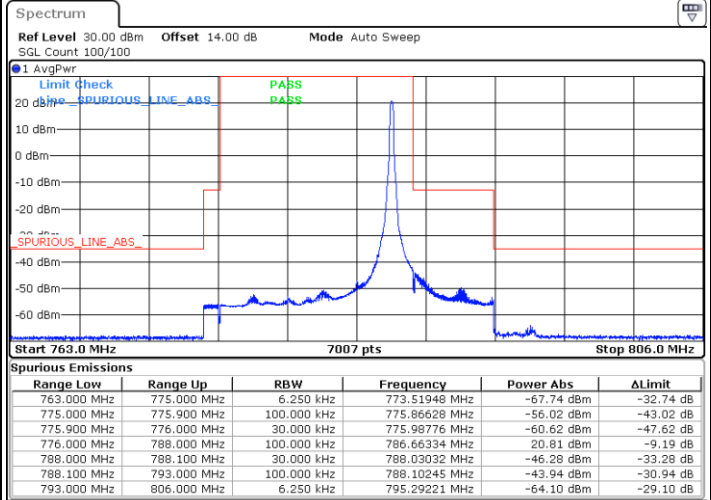
LTE Band 13 / 5MHz / 16QAM

Lowest Band Edge / 1 RB

Highest Band Edge / 1 RB



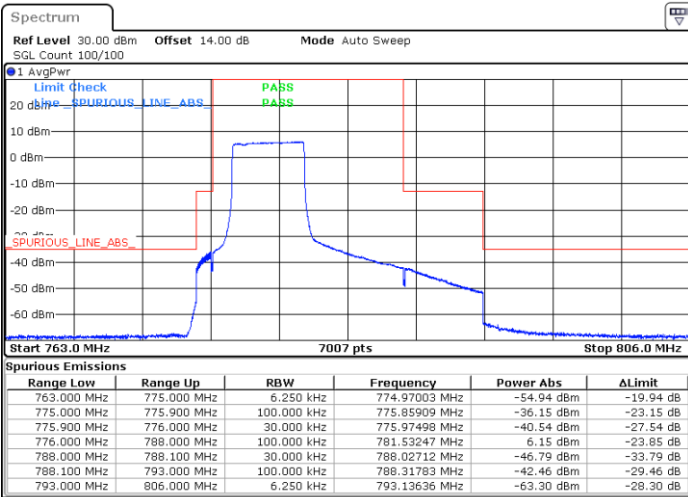
Date: 29.OCT.2022 20:22:50



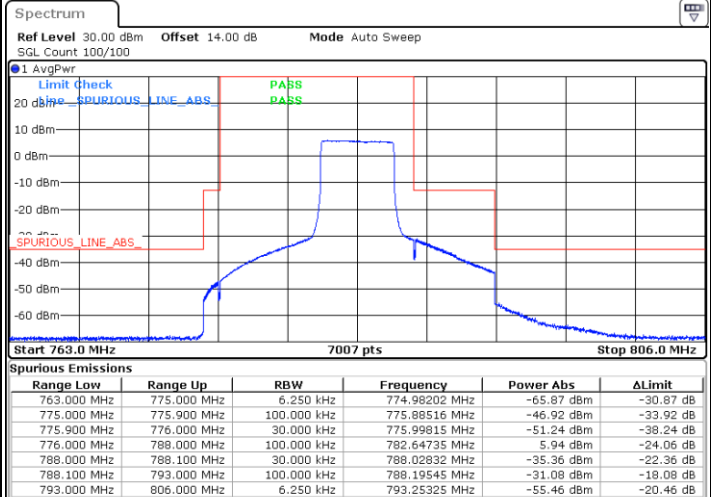
Date: 29.OCT.2022 20:38:34

Lowest Band Edge / Full RB

Highest Band Edge / Full RB



Date: 29.OCT.2022 20:20:57



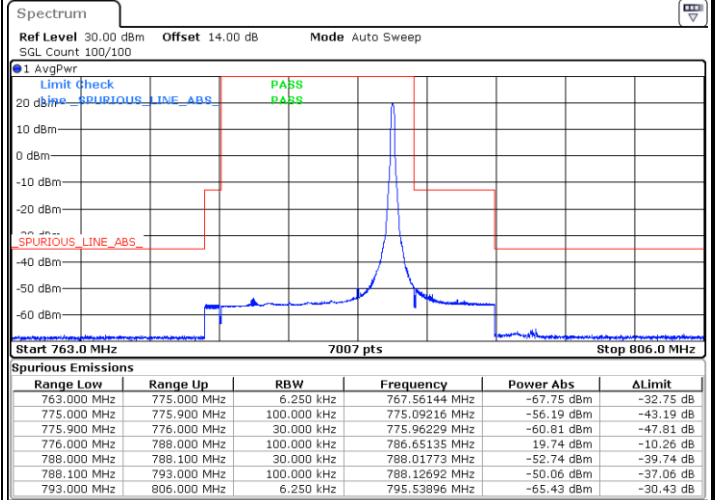
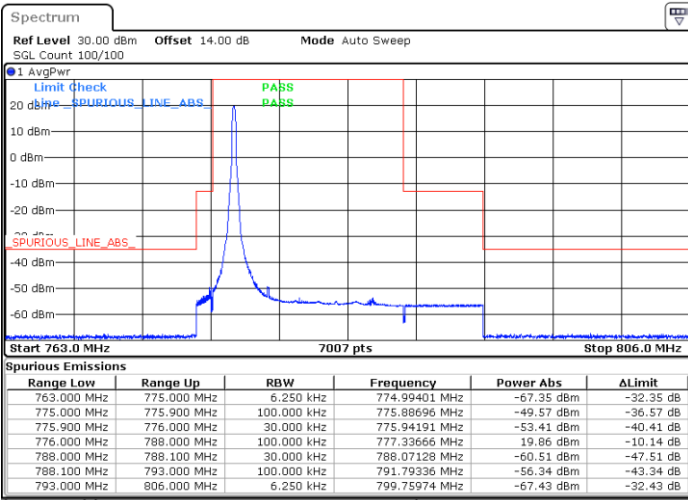
Date: 29.OCT.2022 20:36:41



LTE Band 13 / 5MHz / 64QAM

Lowest Band Edge / 1 RB

Highest Band Edge / 1 RB

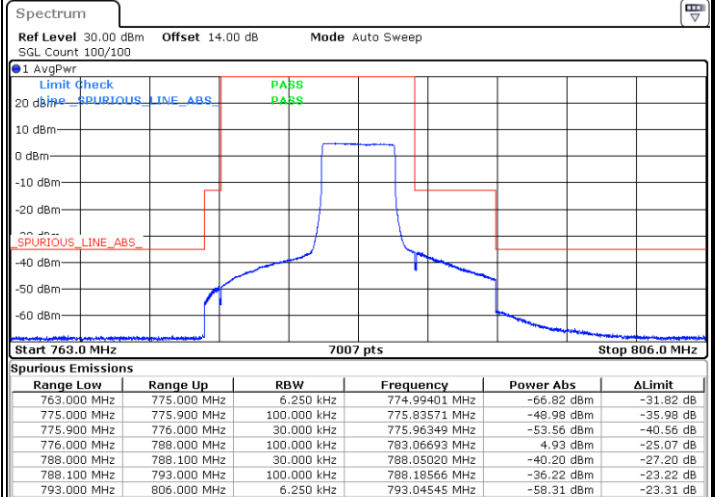
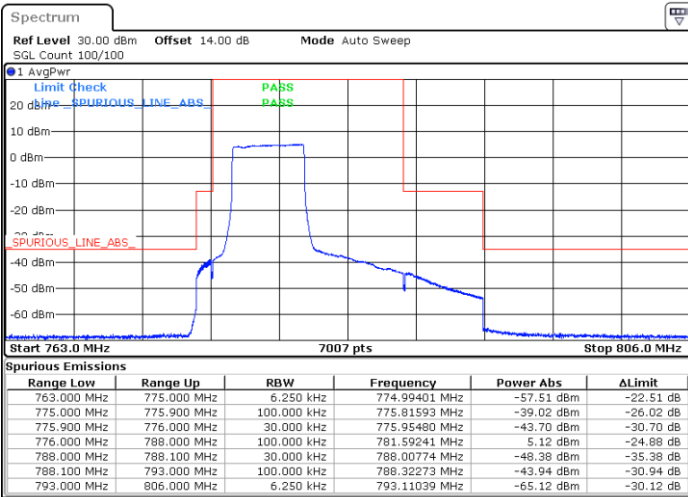


Date: 29.OCT.2022 20:47:28

Date: 29.OCT.2022 20:55:00

Lowest Band Edge / Full RB

Highest Band Edge / Full RB



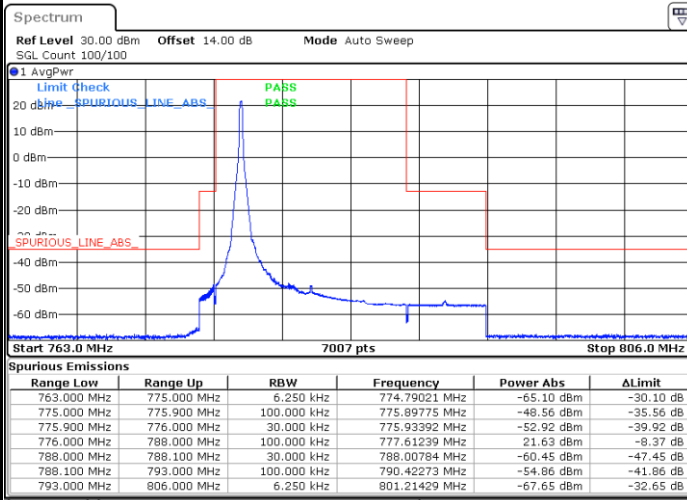
Date: 29.OCT.2022 20:45:36

Date: 29.OCT.2022 20:53:07



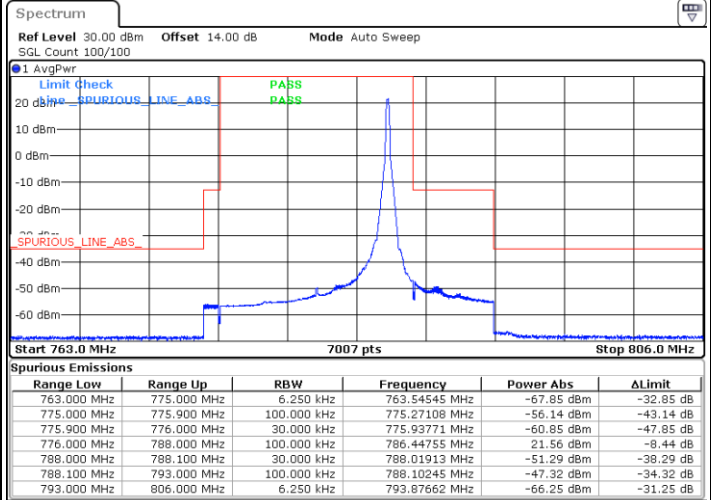
LTE Band 13 / 10MHz / QPSK

Lowest Band Edge / 1 RB



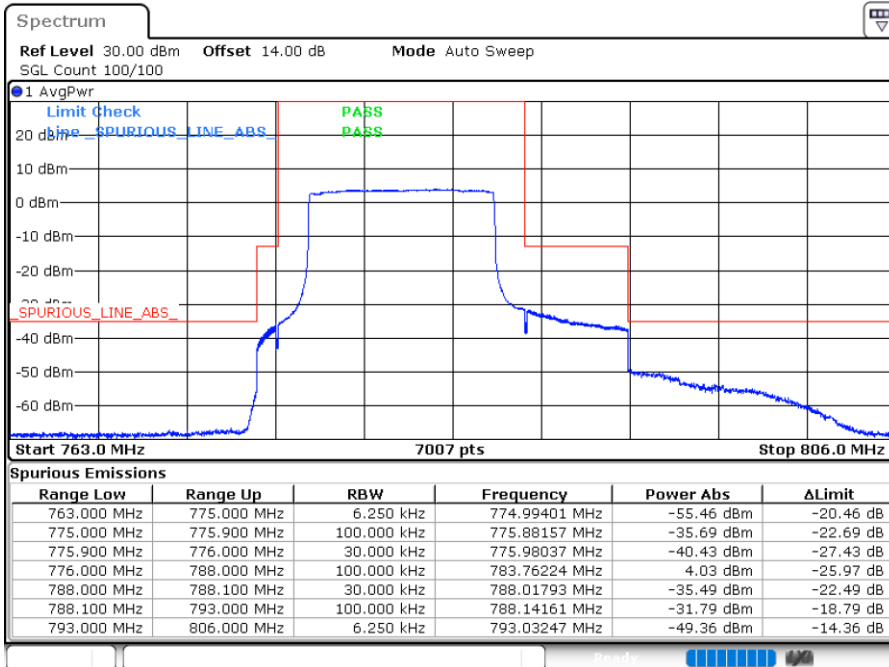
Date: 29.OCT.2022 21:05:13

Highest Band Edge / 1 RB



Date: 29.OCT.2022 21:07:05

Band Edge / Full RB

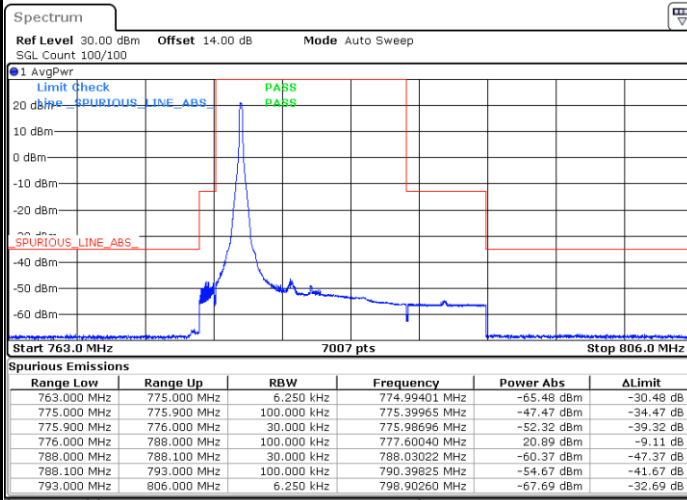


Date: 29.OCT.2022 20:59:36



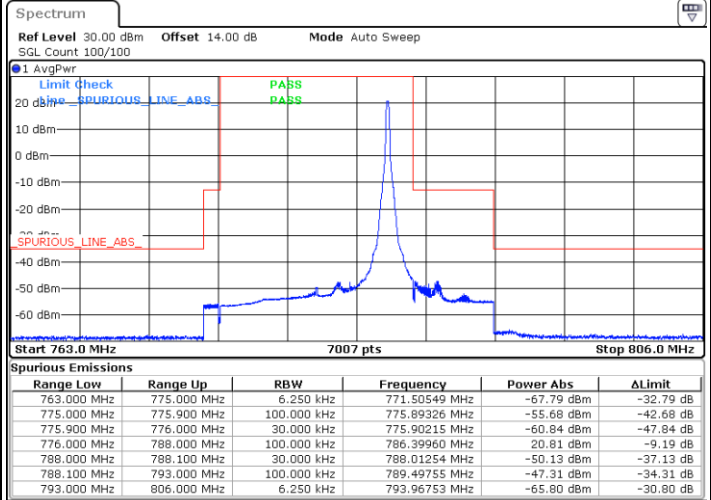
LTE Band 13 / 10MHz / 16QAM

Lowest Band Edge / 1 RB



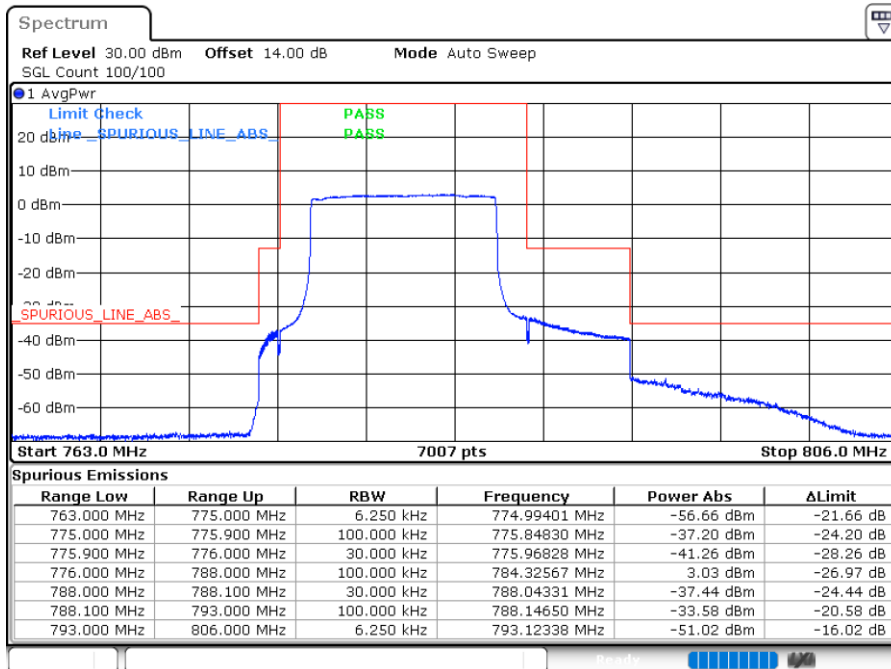
Date: 29.OCT.2022 21:03:21

Highest Band Edge / 1 RB



Date: 29.OCT.2022 21:08:57

Band Edge / Full RB

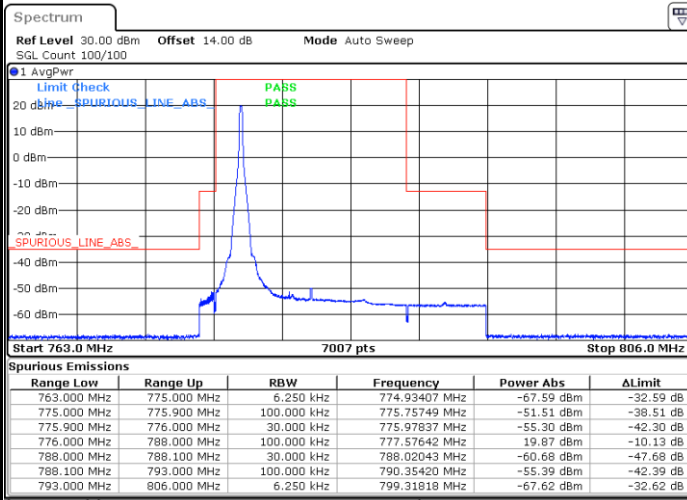


Date: 29.OCT.2022 21:01:28



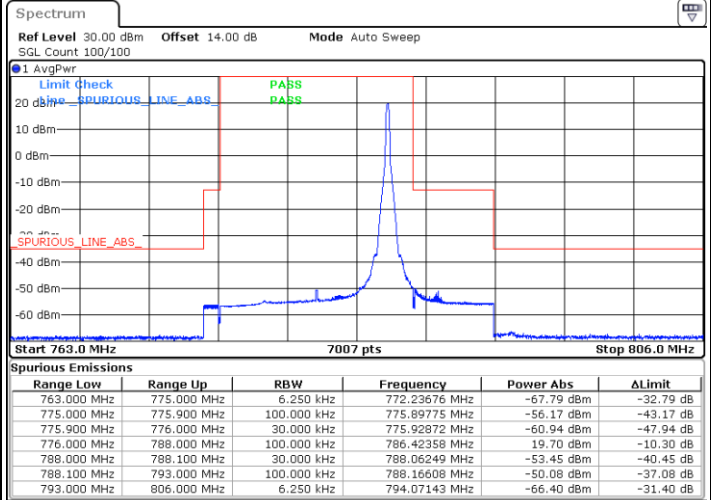
LTE Band 13 / 10MHz / 64QAM

Lowest Band Edge / 1 RB



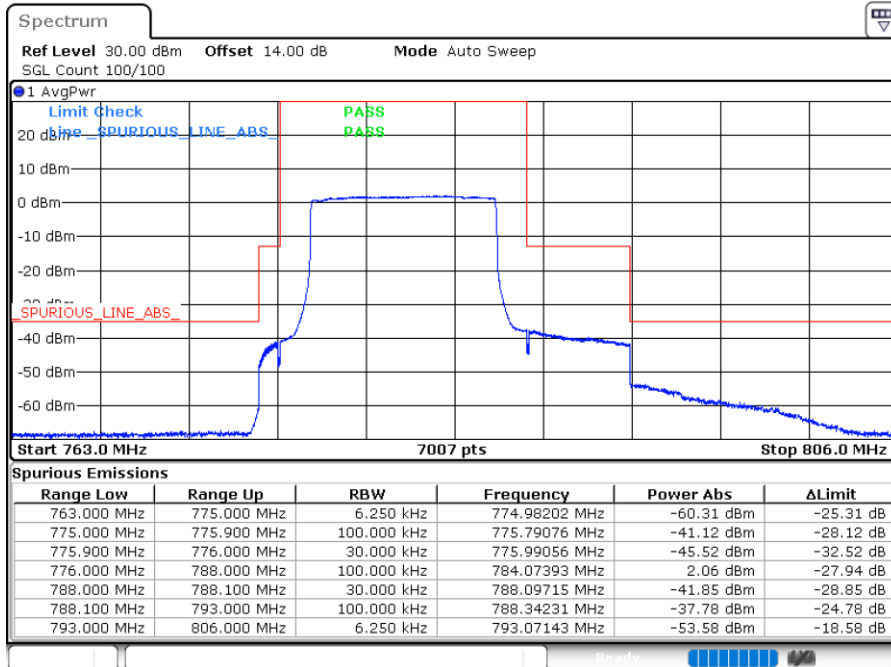
Date: 29.OCT.2022 21:15:57

Highest Band Edge / 1 RB



Date: 29.OCT.2022 21:17:50

Band Edge / Full RB



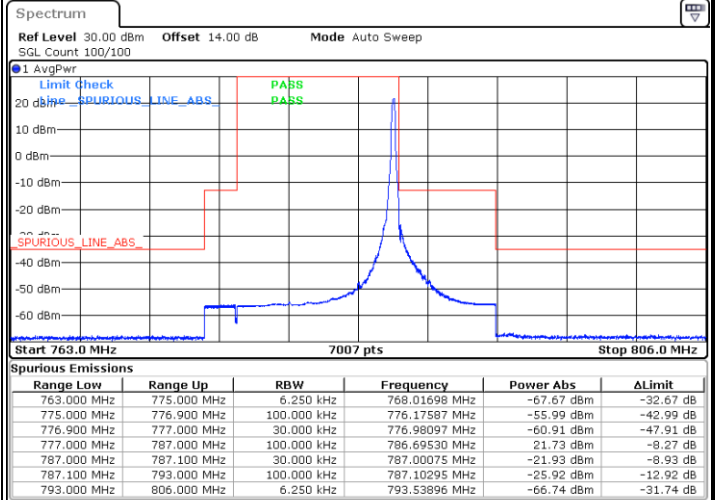
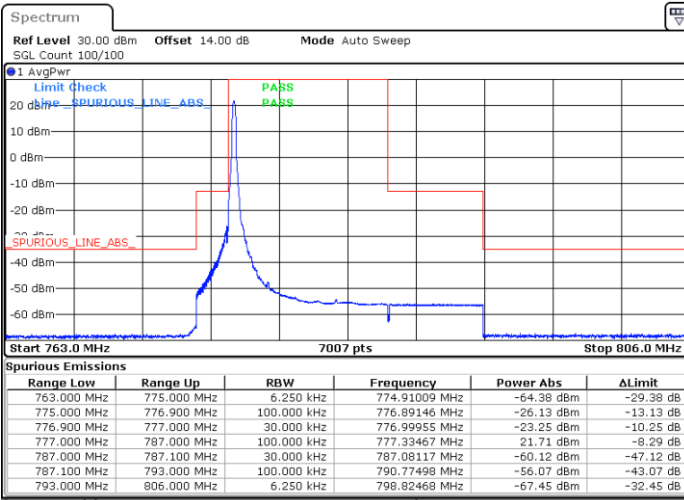
Date: 29.OCT.2022 21:14:05



IC LTE Band 13 / 5MHz / QPSK

Lowest Band Edge / 1 RB

Highest Band Edge / 1 RB

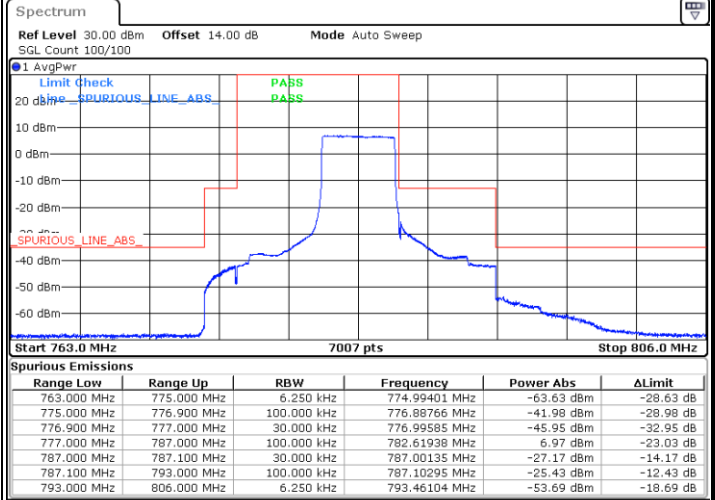
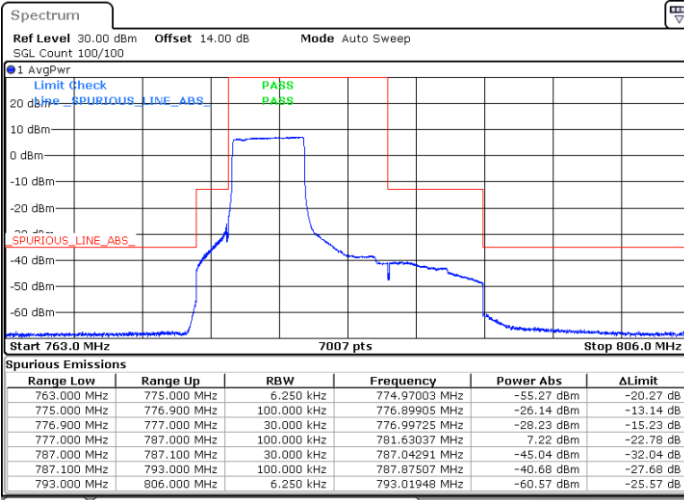


Date: 31.OCT.2022 08:43:55

Date: 31.OCT.2022 08:55:11

Lowest Band Edge / Full RB

Highest Band Edge / Full RB



Date: 31.OCT.2022 08:38:17

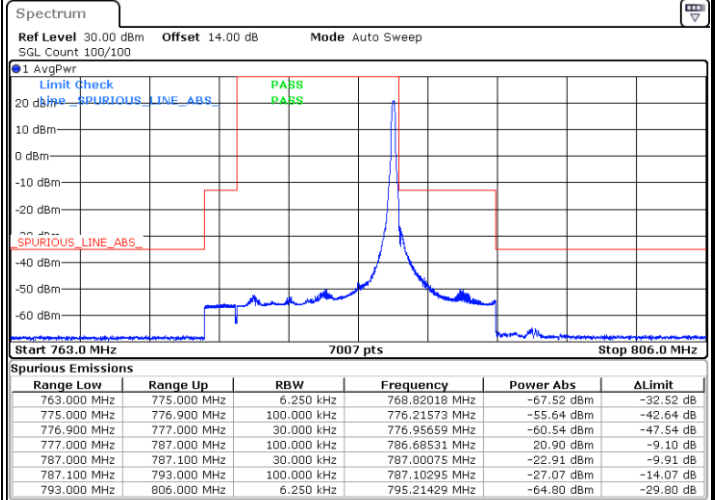
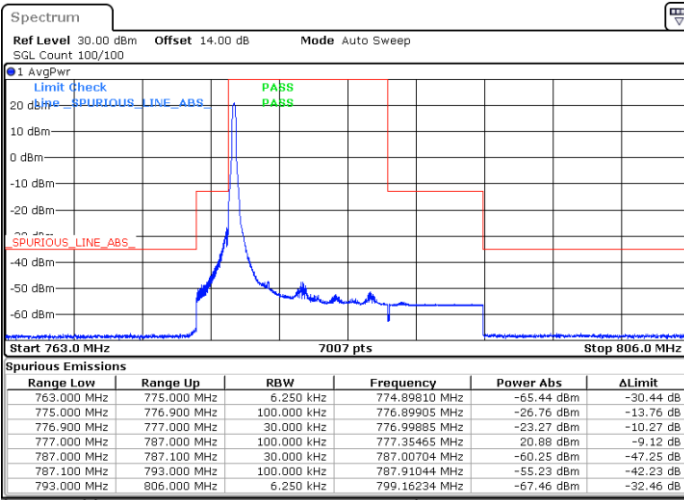
Date: 31.OCT.2022 08:49:33



IC LTE Band 13 / 5MHz / 16QAM

Lowest Band Edge / 1 RB

Highest Band Edge / 1 RB

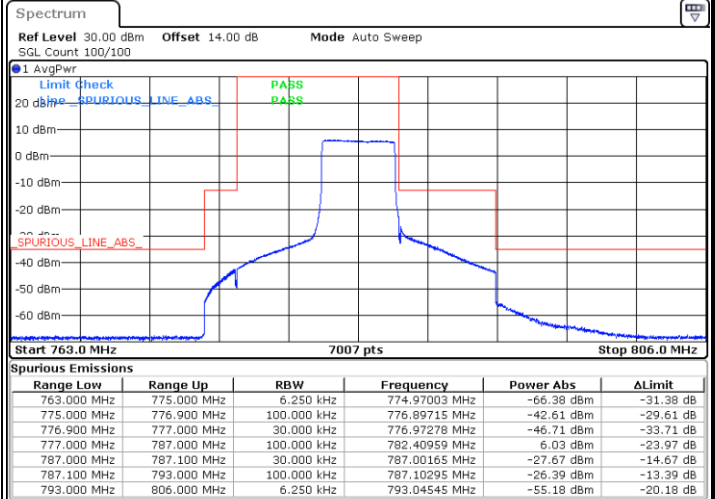
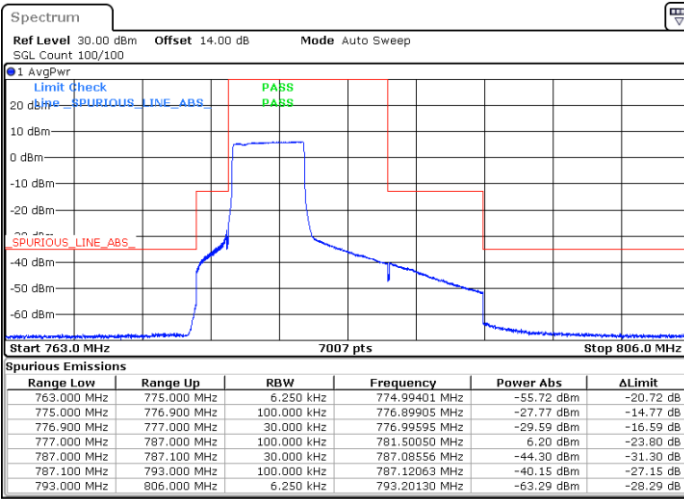


Date: 31.OCT.2022 08:45:48

Date: 31.OCT.2022 08:57:04

Lowest Band Edge / Full RB

Highest Band Edge / Full RB



Date: 31.OCT.2022 08:40:10

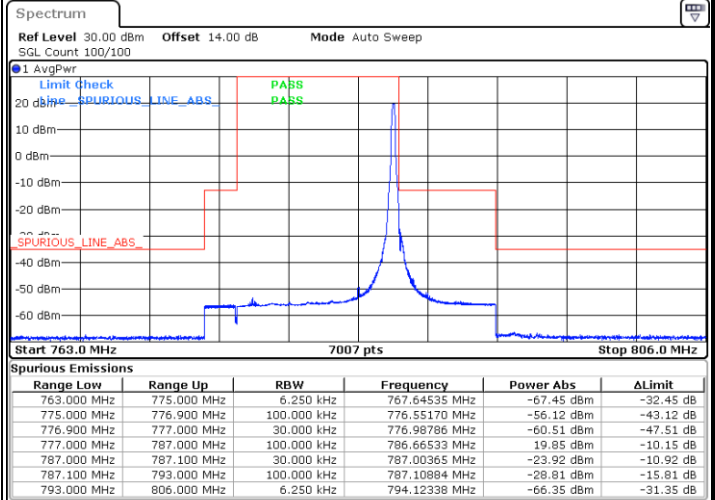
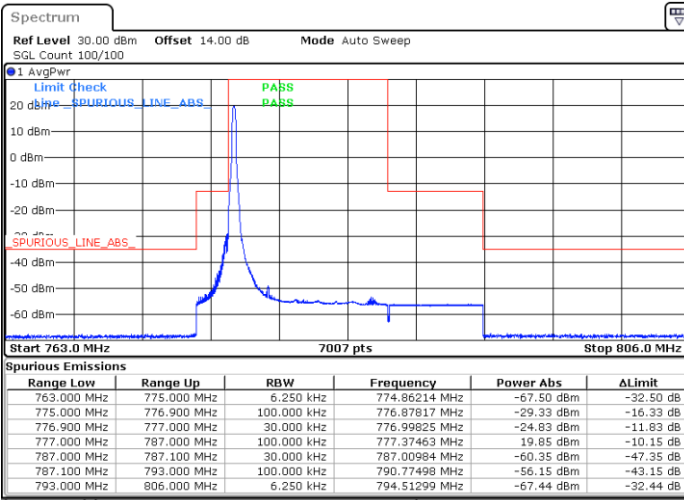
Date: 31.OCT.2022 08:51:26



IC LTE Band 13 / 5MHz / 64QAM

Lowest Band Edge / 1 RB

Highest Band Edge / 1 RB

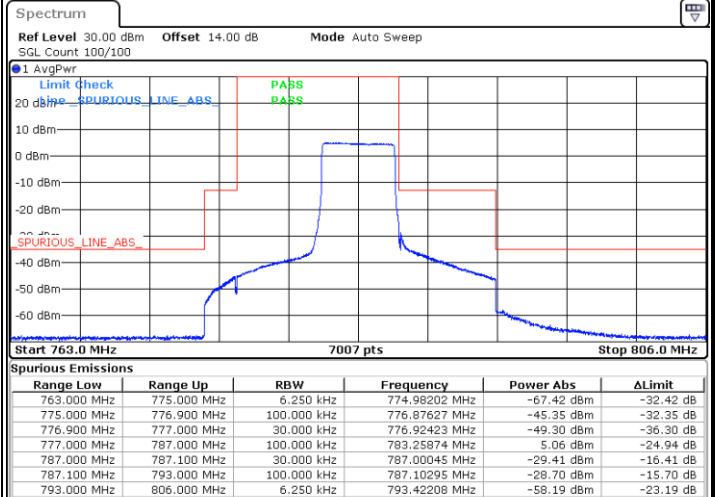
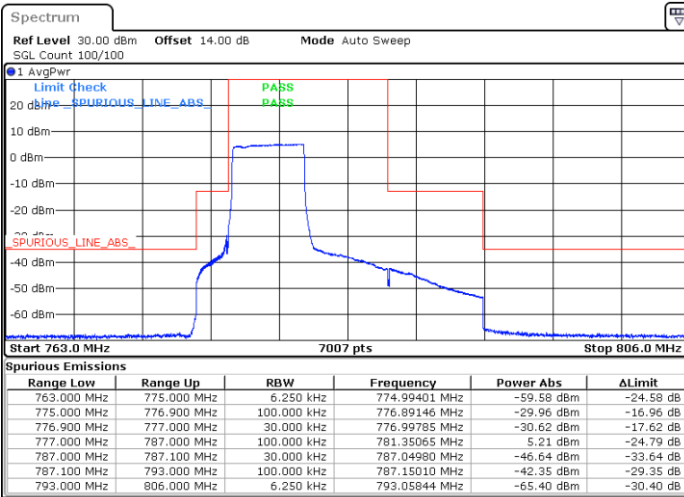


Date: 31.OCT.2022 08:47:40

Date: 31.OCT.2022 08:58:56

Lowest Band Edge / Full RB

Highest Band Edge / Full RB



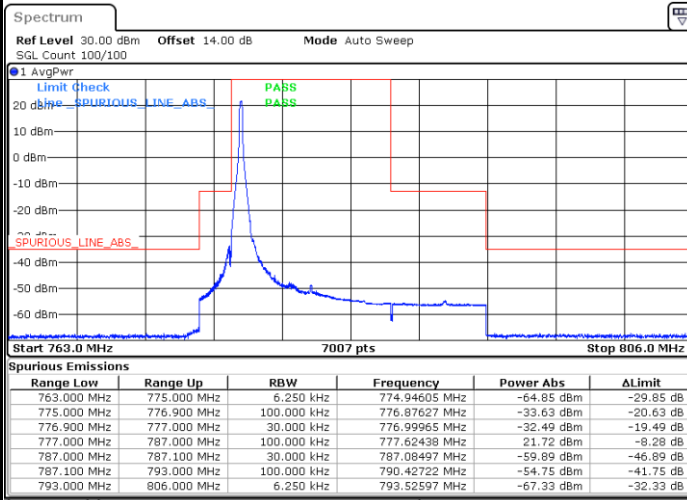
Date: 31.OCT.2022 08:42:02

Date: 31.OCT.2022 08:53:18



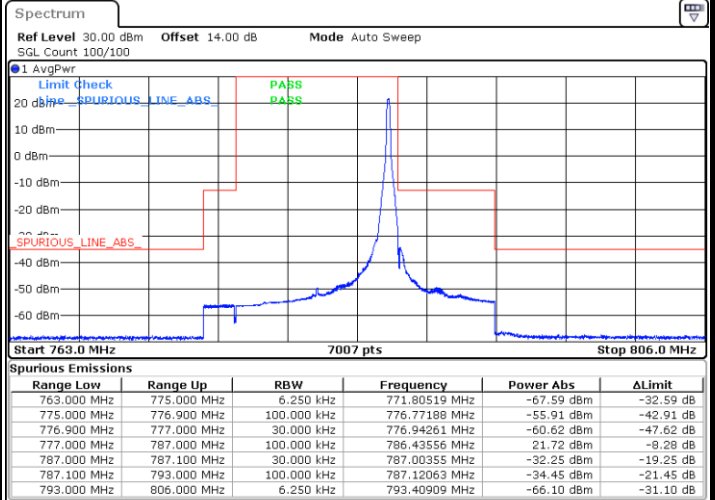
IC LTE Band 13 / 10MHz / QPSK

Lowest Band Edge / 1 RB



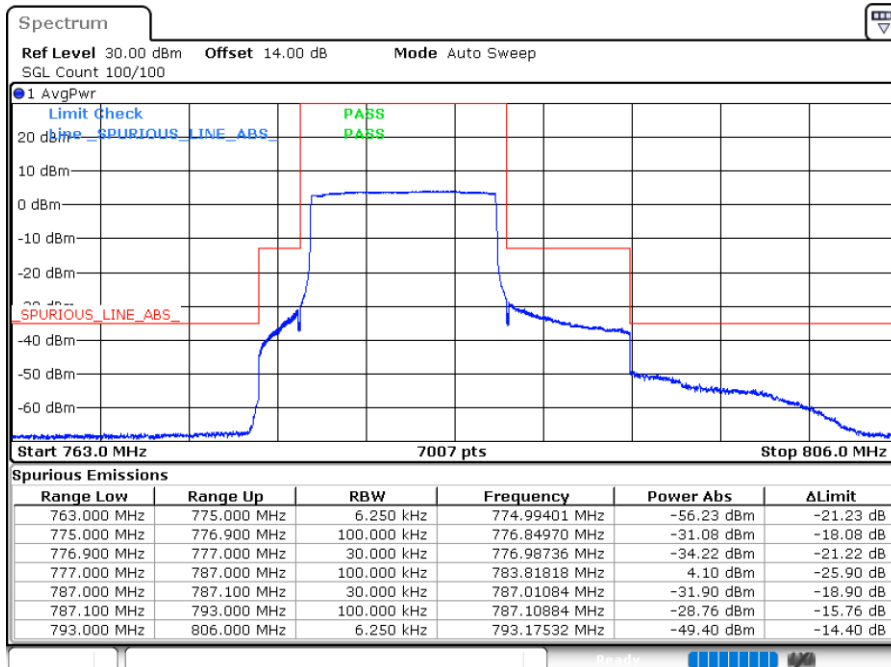
Date: 31.OCT.2022 09:06:25

Highest Band Edge / 1 RB



Date: 31.OCT.2022 09:12:01

Band Edge / Full RB

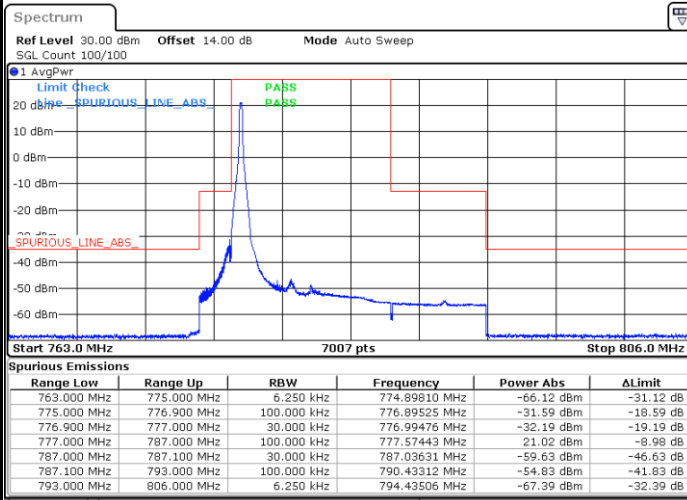


Date: 31.OCT.2022 09:00:49



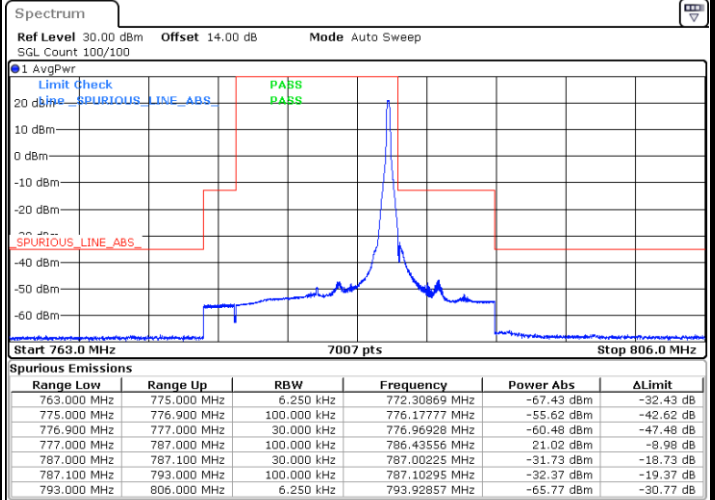
IC LTE Band 13 / 10MHz / 16QAM

Lowest Band Edge / 1 RB



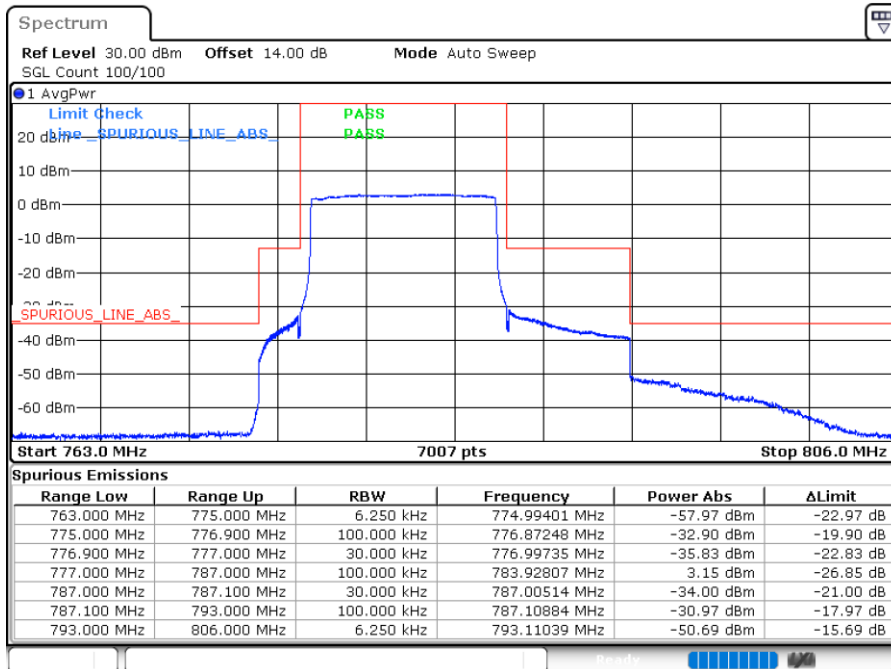
Date: 31.OCT.2022 09:08:17

Highest Band Edge / 1 RB



Date: 31.OCT.2022 09:13:54

Band Edge / Full RB



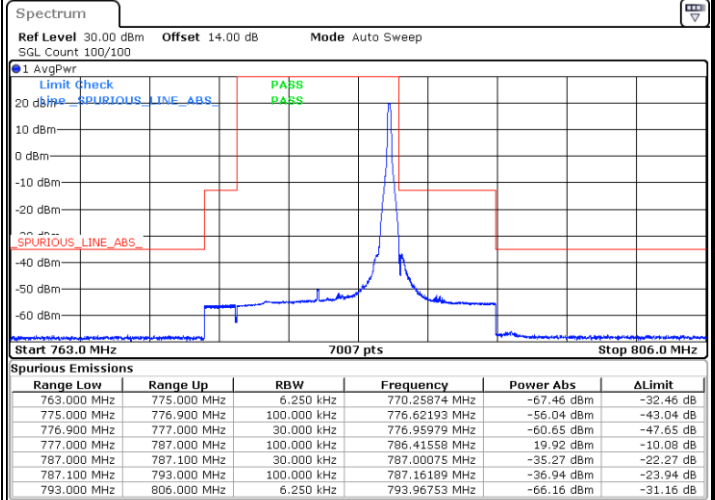
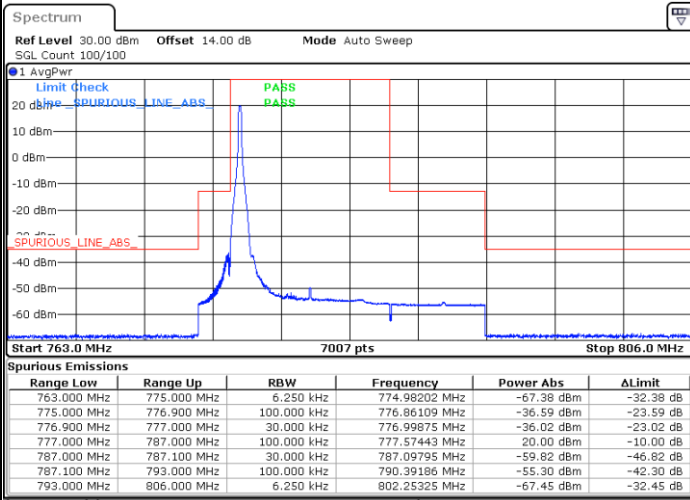
Date: 31.OCT.2022 09:02:41



IC LTE Band 13 / 10MHz / 64QAM

Lowest Band Edge / 1 RB

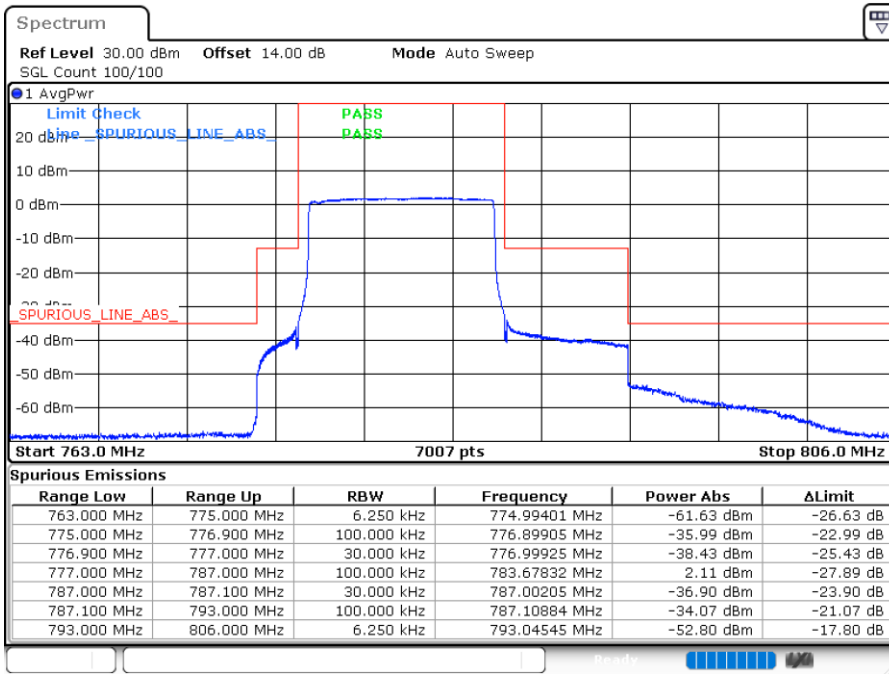
Highest Band Edge / 1 RB



Date: 31.OCT.2022 09:10:09

Date: 31.OCT.2022 09:15:46

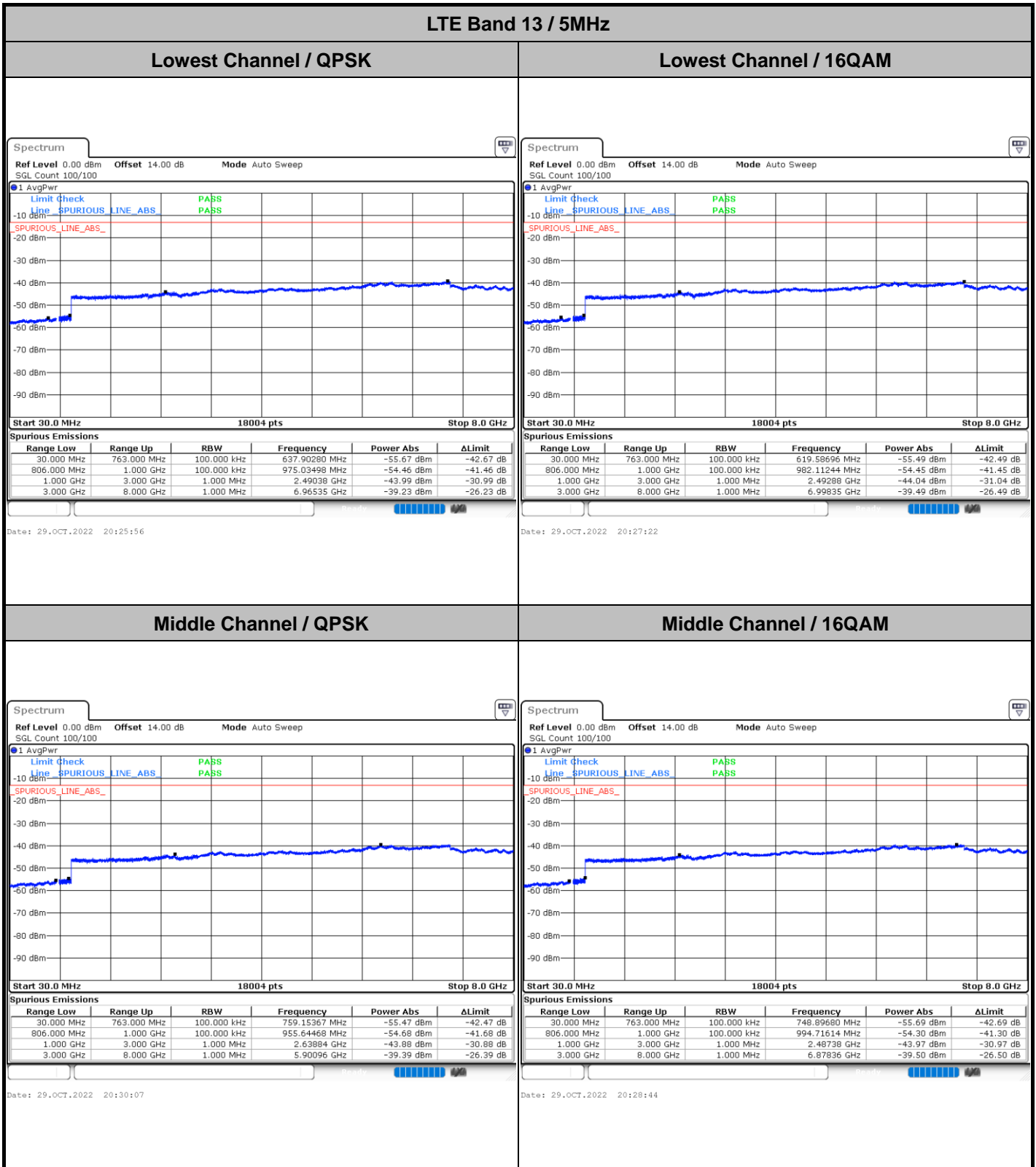
Band Edge / Full RB



Date: 31.OCT.2022 09:04:33



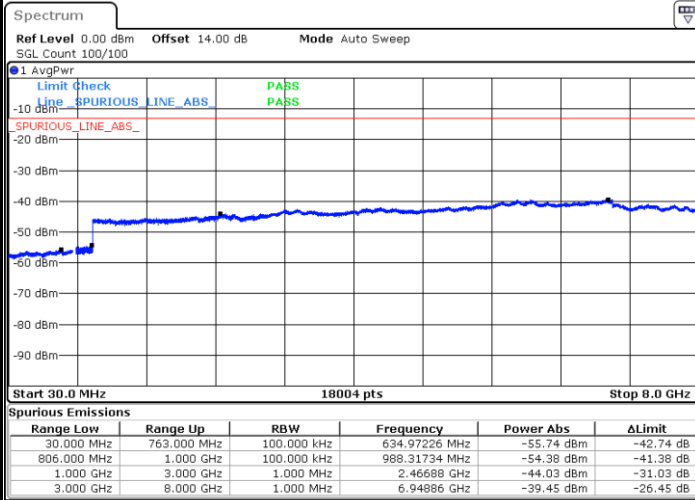
Conducted Spurious Emission





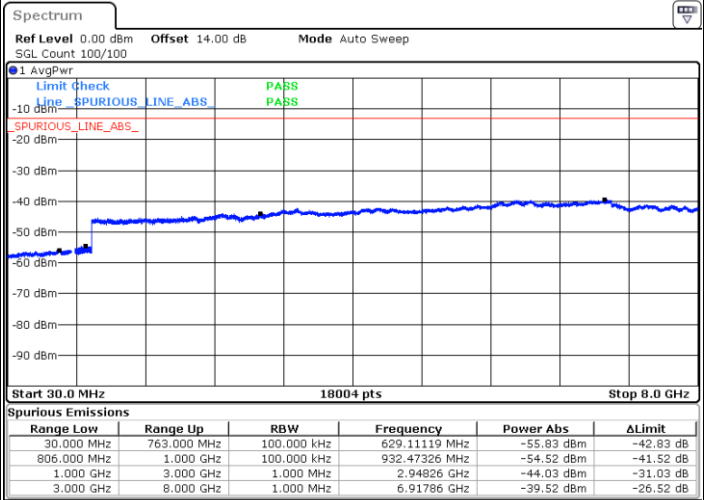
LTE Band 13 / 5MHz

Highest Channel / QPSK



Date: 29.OCT.2022 20:41:50

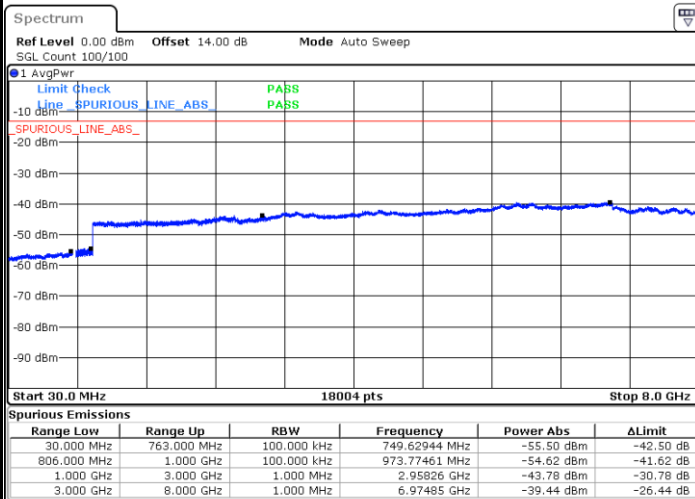
Highest Channel / 16QAM



Date: 29.OCT.2022 20:43:13

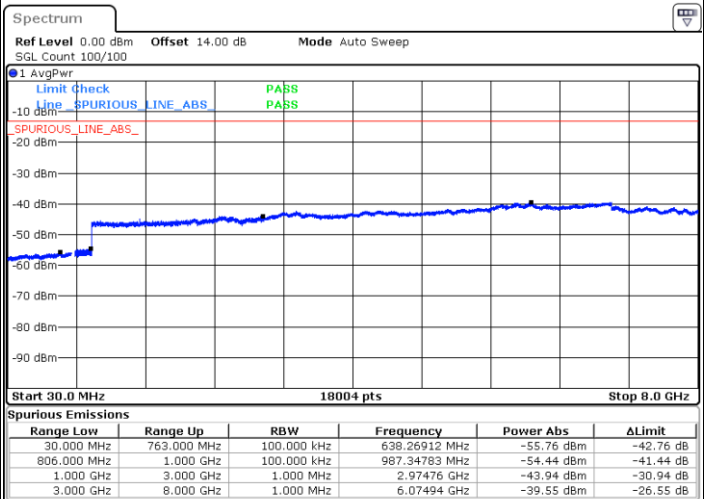
LTE Band 13 / 10MHz

Middle Channel / QPSK



Date: 29.OCT.2022 21:11:42

Middle Channel / 16QAM



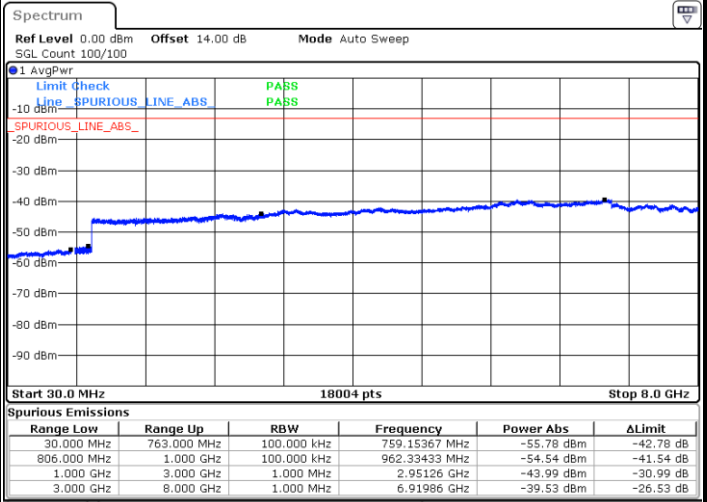
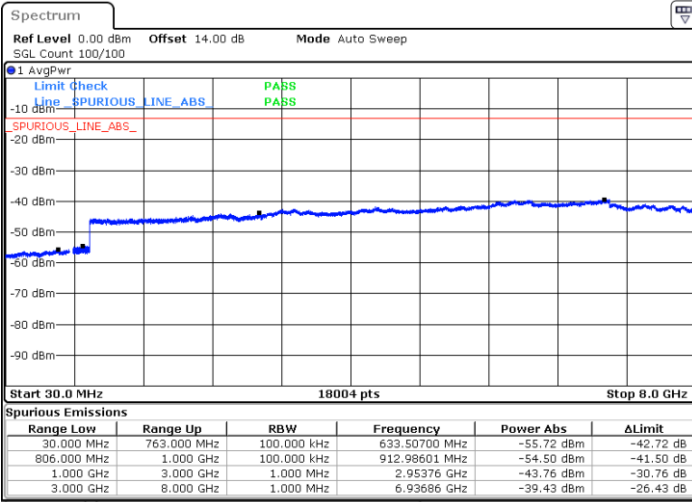
Date: 29.OCT.2022 21:10:20



LTE Band 13 / 5MHz

Lowest Channel / 64QAM

Middle Channel / 64QAM

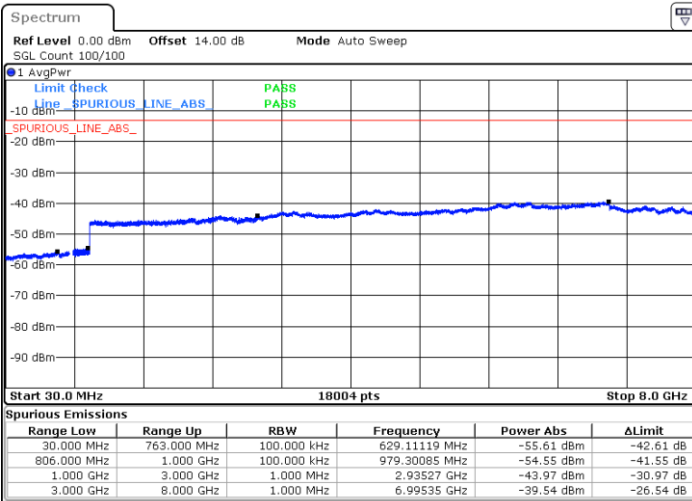


Date: 29.OCT.2022 20:48:41

Date: 29.OCT.2022 20:50:04

Highest Channel / 64QAM

NA



Date: 29.OCT.2022 20:56:23

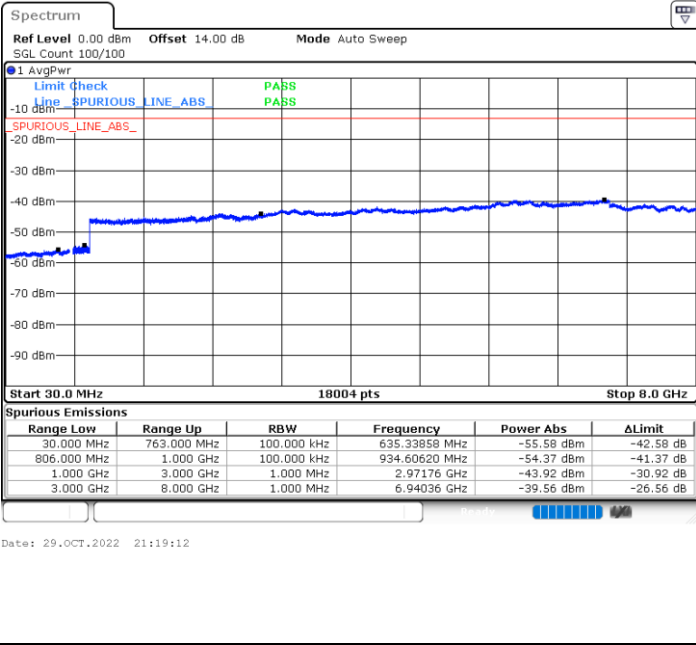
NA



LTE Band 13 / 10MHz

Middle Channel / 64QAM

NA



NA



Frequency Stability

Test Conditions		LTE Band 13 (QPSK) / Middle Channel	Limit
Temperature (°C)	Voltage (Volt)	BW 10MHz	Note 2.
		Deviation (ppm)	Result
50	Normal Voltage	0.0012	PASS
40	Normal Voltage	0.0015	
30	Normal Voltage	0.0004	
20(Ref.)	Normal Voltage	0.0000	
10	Normal Voltage	0.0014	
0	Normal Voltage	0.0019	
-10	Normal Voltage	0.0008	
-20	Normal Voltage	0.0003	
-30	Normal Voltage	0.0013	
20	Maximum Voltage	0.0020	
20	Normal Voltage	0.0000	
20	Battery End Point	0.0018	

Note:

1. Normal Voltage =7.78 V. ; Battery End Point (BEP) =6.6 V. ; Maximum Voltage =8.96 V.
2. Note: The frequency fundamental emissions stay within the authorized frequency block.



LTE Band 25

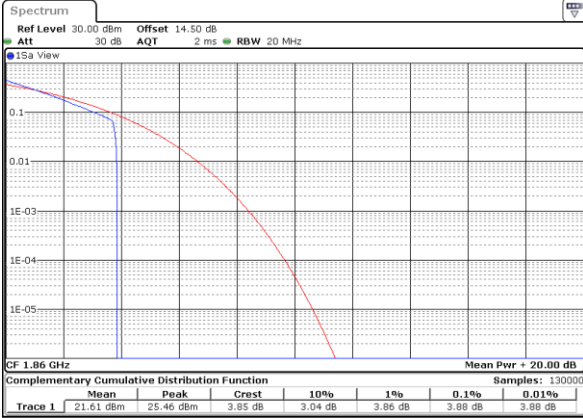
Peak-to-Average Ratio

Mode	LTE Band 25 / 20MHz				
Mod.	QPSK		16QAM		Limit: 13dB
RB Size	1RB	Full RB	1RB	Full RB	Result
Lowest CH	3.88	4.70	4.61	5.77	PASS
Middle CH	3.65	4.70	4.26	5.83	
Highest CH	3.88	5.33	4.67	6.06	
Mode	LTE Band 25 / 20MHz				
Mod.	64QAM				Limit: 13dB
RB Size	1RB	Full RB			Result
Lowest CH	5.42	6.49	-	-	PASS
Middle CH	5.30	6.41	-	-	
Highest CH	5.86	6.67	-	-	



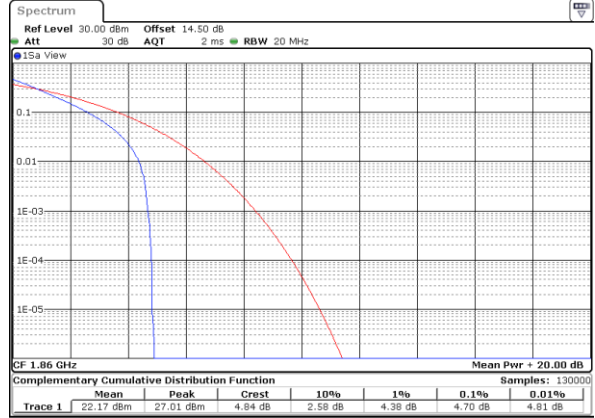
LTE Band 25 / 20MHz / QPSK

Lowest Channel / 1RB



Date: 7,NOV,2022 13:09:35

Lowest Channel / Full RB



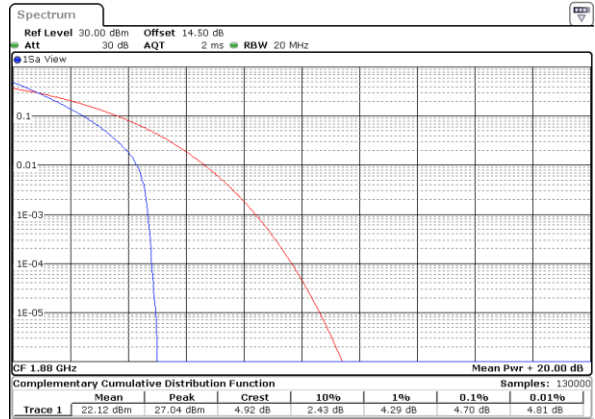
Date: 7,NOV,2022 13:10:01

Middle Channel / 1RB



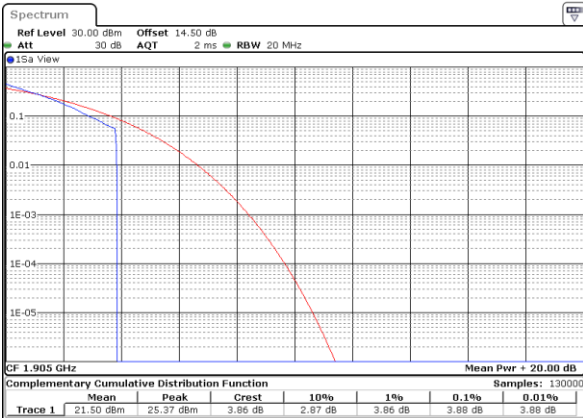
Date: 7,NOV,2022 13:11:20

Middle Channel / Full RB



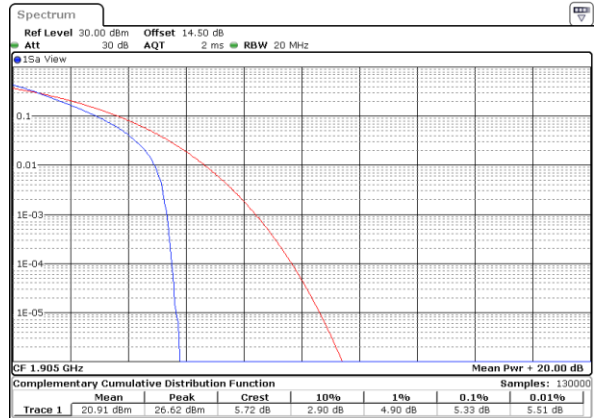
Date: 7,NOV,2022 13:11:46

Highest Channel / 1RB



Date: 7,NOV,2022 13:13:04

Highest Channel / Full RB

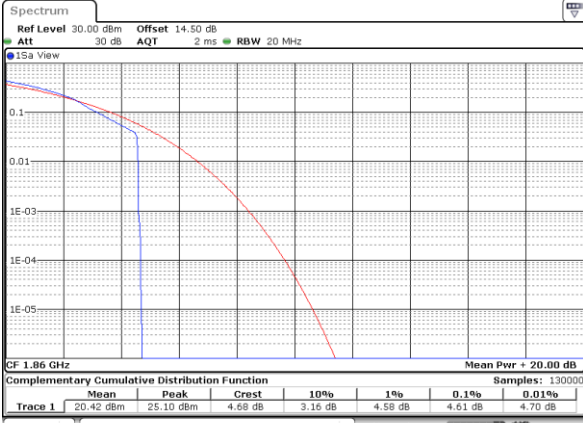


Date: 7,NOV,2022 13:13:30



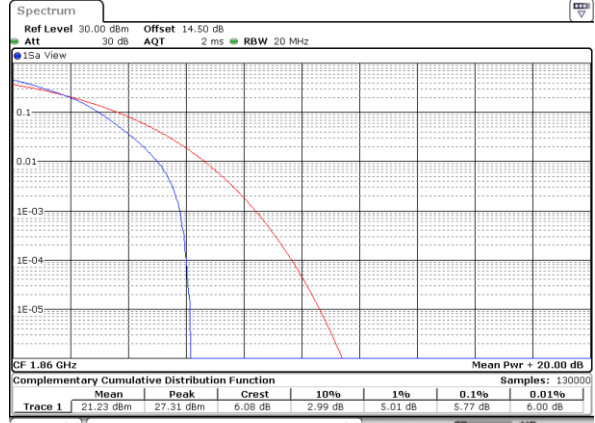
LTE Band 25 / 20MHz / 16QAM

Lowest Channel / 1RB



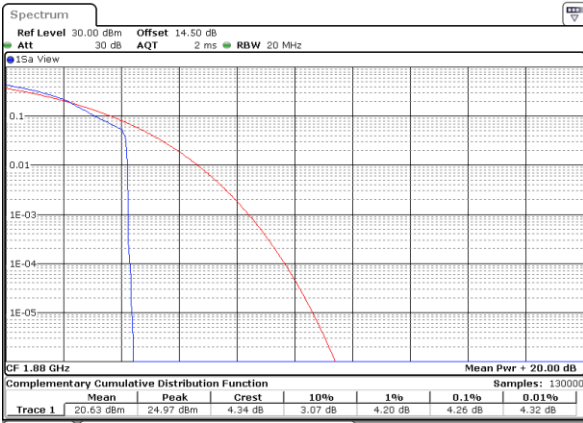
Date: 7,NOV,2022 13:08:43

Lowest Channel / Full RB



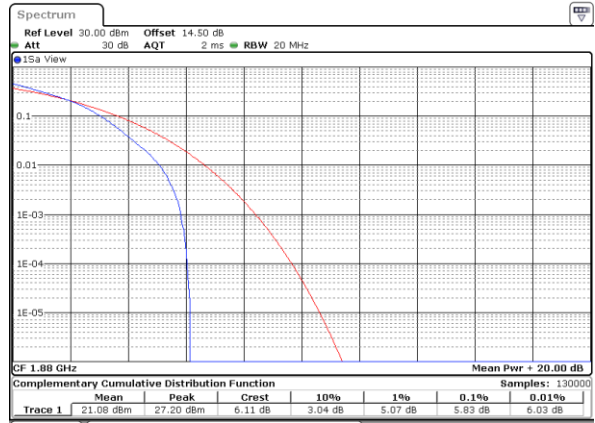
Date: 7,NOV,2022 13:09:09

Middle Channel / 1RB



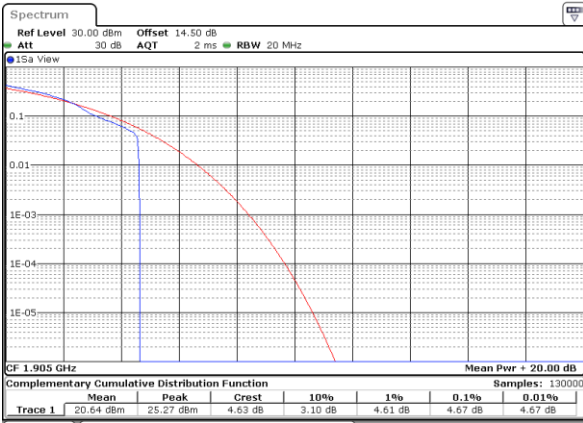
Date: 7,NOV,2022 13:10:27

Middle Channel / Full RB



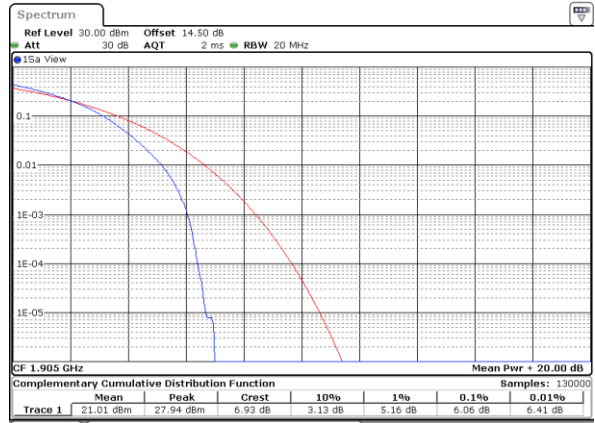
Date: 7,NOV,2022 13:10:54

Highest Channel / 1RB



Date: 7,NOV,2022 13:11:00

Highest Channel / Full RB



Date: 7,NOV,2022 13:12:38



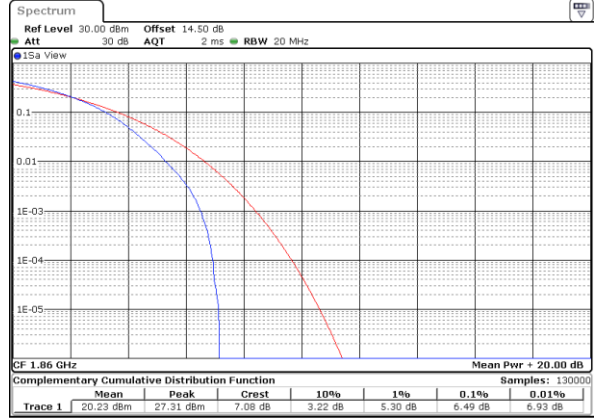
LTE Band 25 / 20MHz / 64QAM

Lowest Channel / 1RB



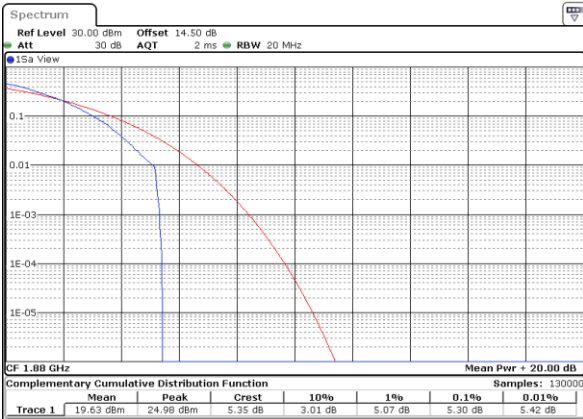
Date: 7,NOV,2022 13:06:06

Lowest Channel / Full RB



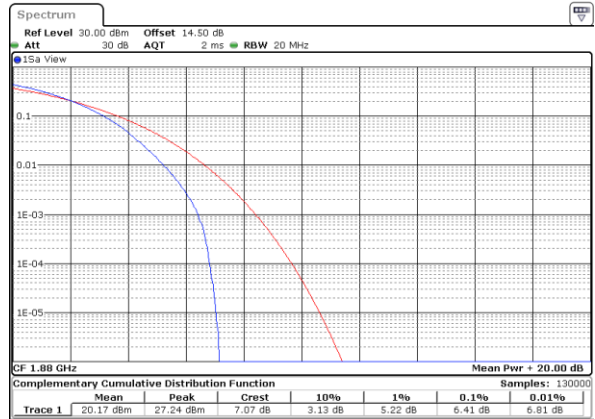
Date: 7,NOV,2022 13:06:32

Middle Channel / 1RB



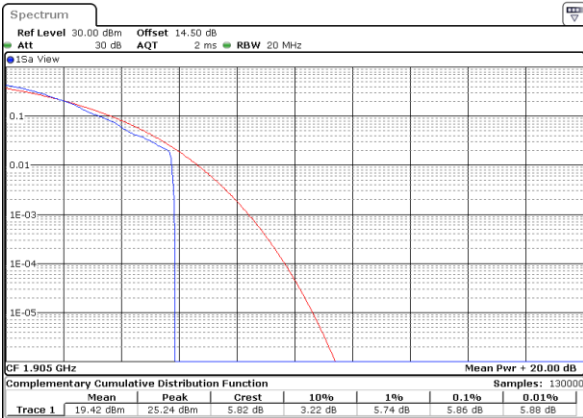
Date: 7,NOV,2022 13:06:58

Middle Channel / Full RB



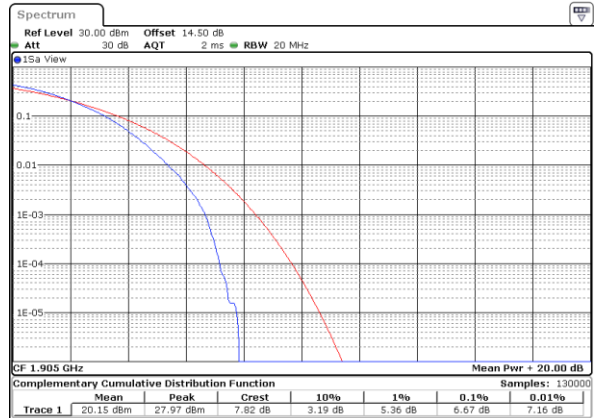
Date: 7,NOV,2022 13:07:24

Highest Channel / 1RB



Date: 7,NOV,2022 13:07:51

Highest Channel / Full RB



Date: 7,NOV,2022 13:08:17



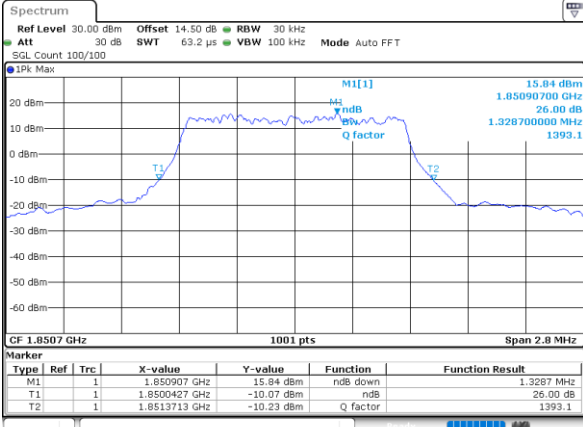
26dB Bandwidth

Mode	LTE Band 25 : 26dB BW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM
Lowest CH	1.33	1.39	3.11	3.06	5.04	5.03	9.85	9.77	14.39	14.69	19.34	18.78
Middle CH	1.35	1.37	3.07	3.12	5.08	4.97	10.03	9.83	14.75	14.57	19.50	18.86
Highest CH	1.35	1.30	3.07	3.05	4.99	4.82	9.71	10.21	14.33	14.60	19.14	19.14
Mode	LTE Band 25 : 26dB BW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	64QAM		64QAM		64QAM		64QAM		64QAM		64QAM	
Lowest CH	1.36	-	3.11	-	5.00	-	9.93	-	14.45	-	19.10	-
Middle CH	1.33	-	3.01	-	5.06	-	10.21	-	14.90	-	18.90	-
Highest CH	1.32	-	3.05	-	4.98	-	9.73	-	14.75	-	19.22	-



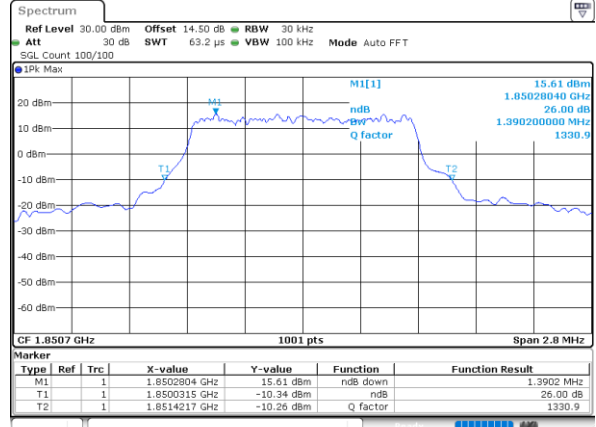
LTE Band 25

Lowest Channel / 1.4MHz / QPSK



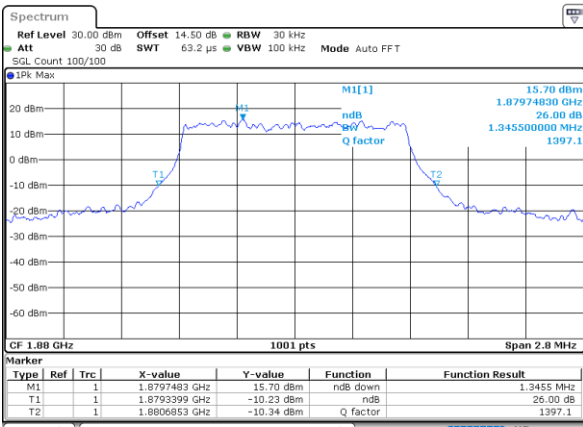
Date: 7,NOV,2022 10:02:46

Lowest Channel / 1.4MHz / 16QAM



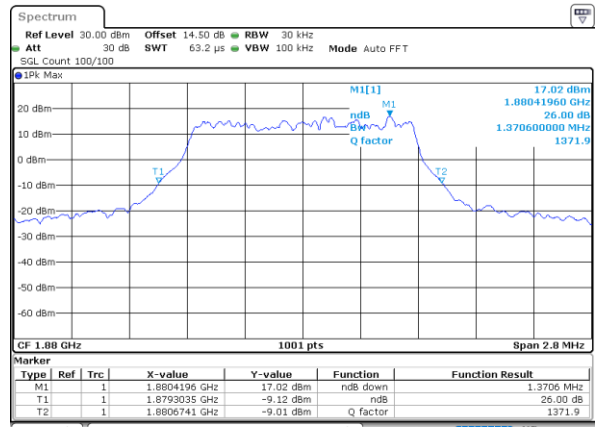
Date: 7,NOV,2022 10:03:11

Middle Channel / 1.4MHz / QPSK



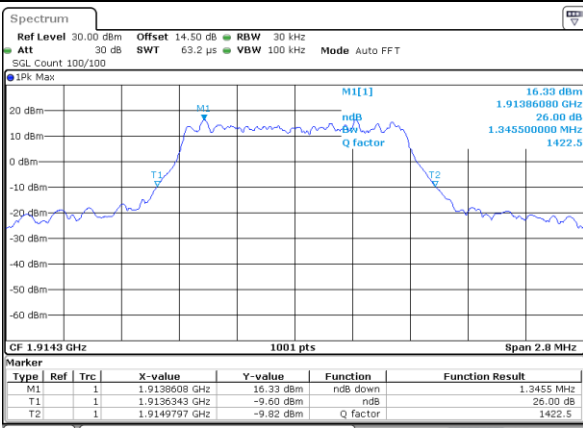
Date: 7,NOV,2022 10:15:44

Middle Channel / 1.4MHz / 16QAM



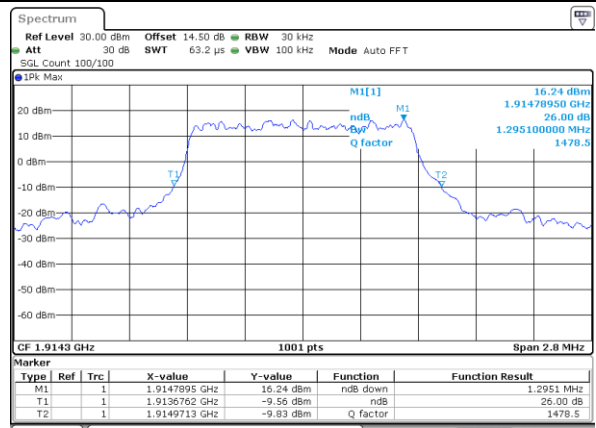
Date: 7,NOV,2022 10:16:09

Highest Channel / 1.4MHz / QPSK



Date: 7,NOV,2022 10:19:25

Highest Channel / 1.4MHz / 16QAM

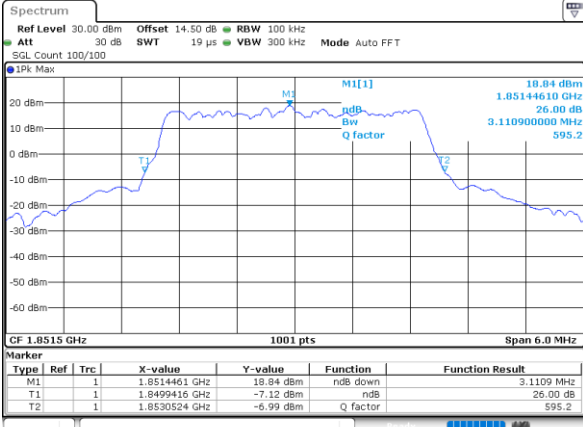


Date: 7,NOV,2022 10:19:01



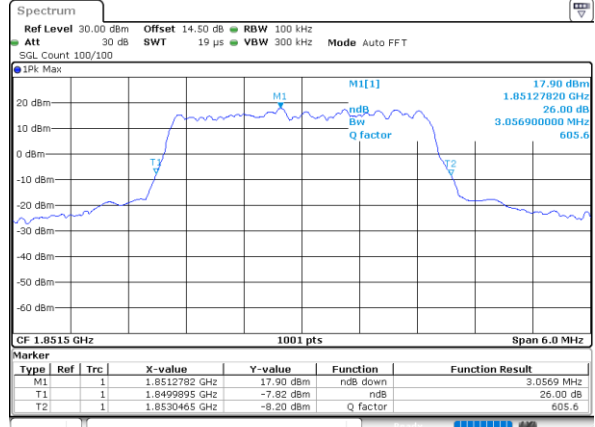
LTE Band 25

Lowest Channel / 3MHz / QPSK



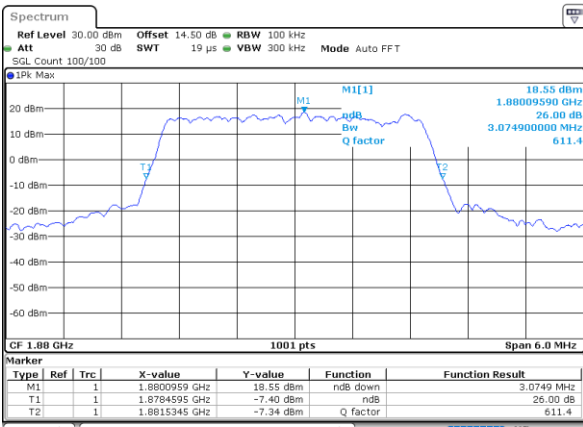
Date: 7,NOV,2022 10:51:03

Lowest Channel / 3MHz / 16QAM



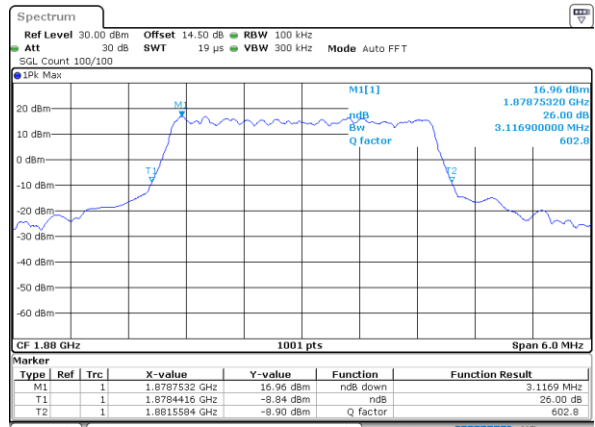
Date: 7,NOV,2022 10:51:28

Middle Channel / 3MHz / QPSK



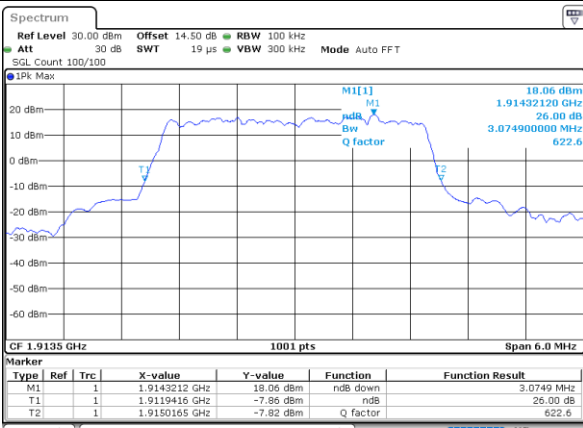
Date: 7,NOV,2022 10:59:15

Middle Channel / 3MHz / 16QAM



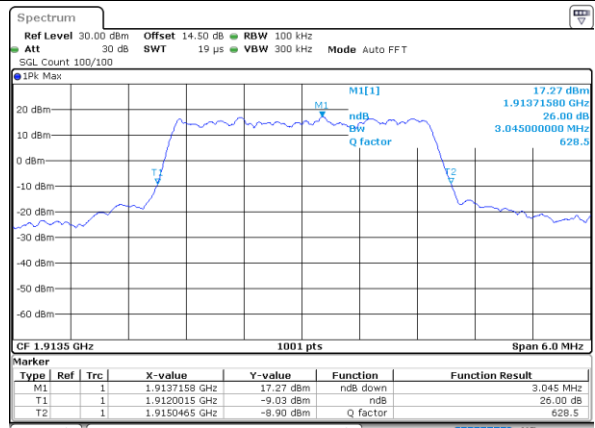
Date: 7,NOV,2022 10:59:39

Highest Channel / 3MHz / QPSK



Date: 7,NOV,2022 11:02:55

Highest Channel / 3MHz / 16QAM



Date: 7,NOV,2022 11:02:31