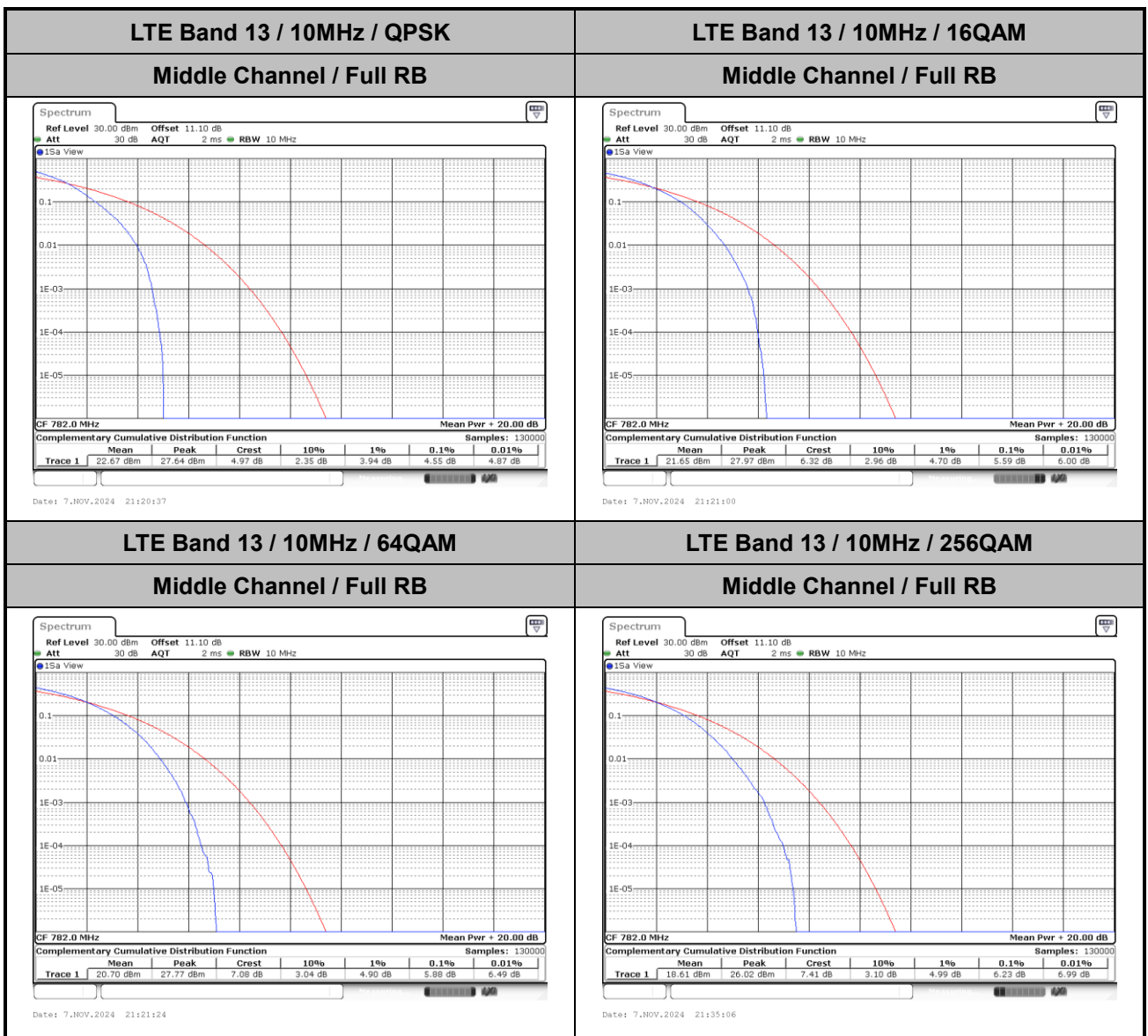




# LTE Band 13

## Peak-to-Average Ratio

Mode	LTE Band 13 / 10MHz				
Mod.	QPSK	16QAM	64QAM	256QAM	Limit: 13dB
RB Size	Full RB	Full RB	Full RB	Full RB	Result
Middle CH	4.55	5.59	5.88	6.23	PASS





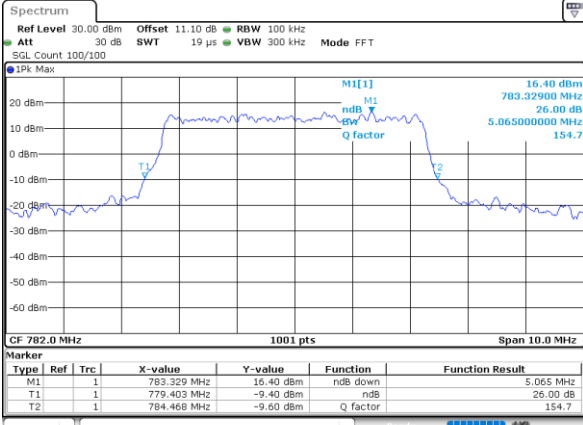
**26dB Bandwidth**

Mode	LTE Band 13 : 26dB BW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM
Middle CH	-	-	-	-	5.06	4.84	9.99	10.07	-	-	-	-
Mode	LTE Band 13 : 26dB BW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM
Middle CH	-	-	-	-	4.93	5.12	9.91	9.68	-	-	-	-



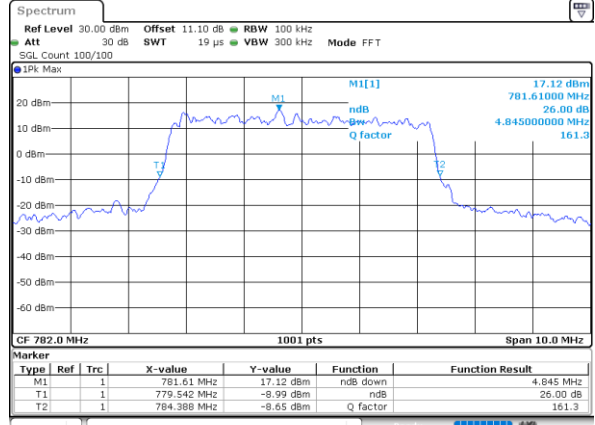
LTE Band 13

Middle Channel / 5MHz / QPSK



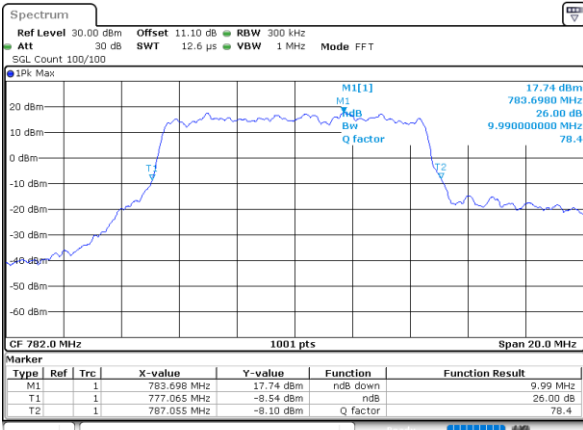
Date: 7.NOV.2024 21:17:36

Middle Channel / 5MHz / 16QAM



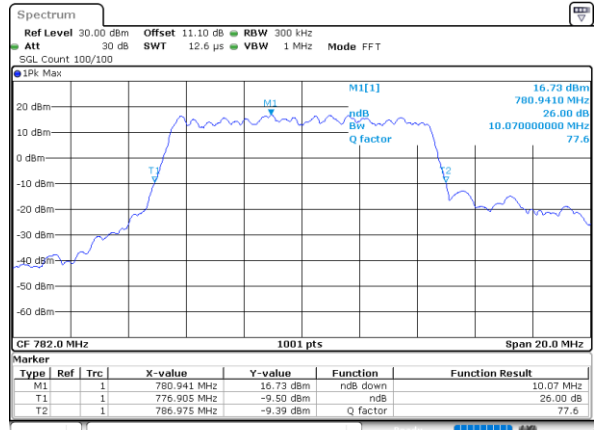
Date: 7.NOV.2024 21:17:59

Middle Channel / 10MHz / QPSK



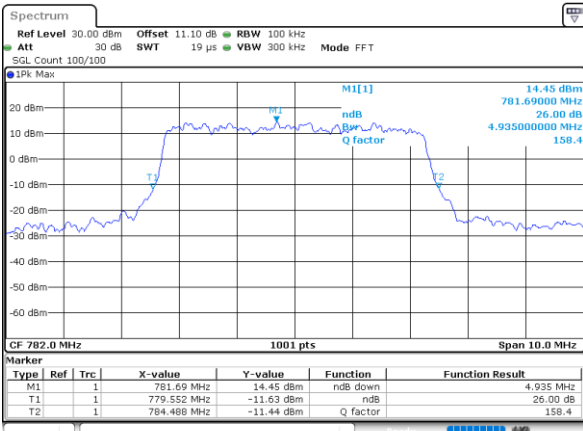
Date: 7.NOV.2024 21:19:06

Middle Channel / 10MHz / 16QAM



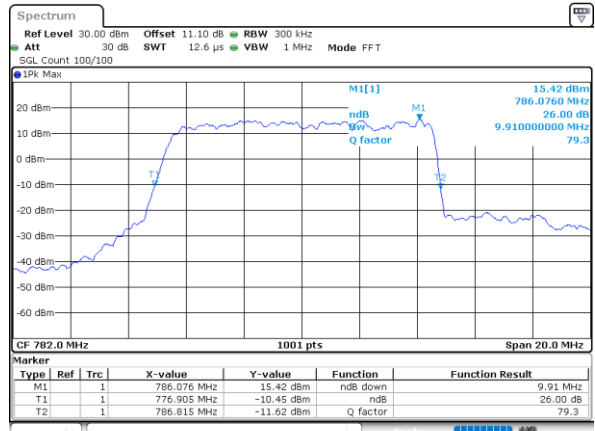
Date: 7.NOV.2024 21:19:29

Middle Channel / 5MHz / 64QAM



Date: 7.NOV.2024 21:18:21

Middle Channel / 10MHz / 64QAM



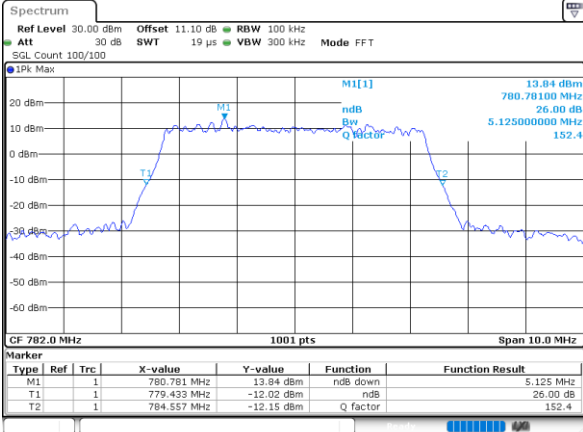
Date: 7.NOV.2024 21:19:51



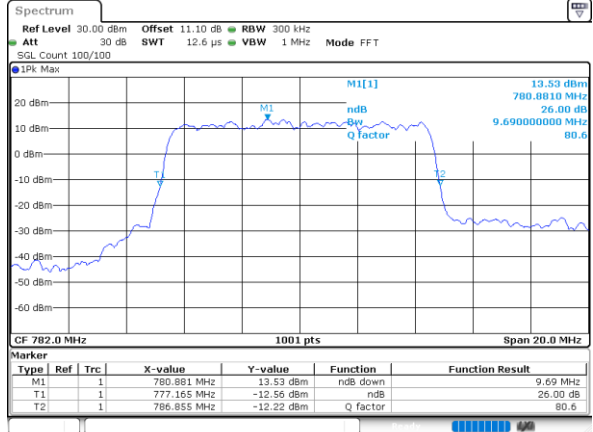
LTE Band 13

Middle Channel / 5MHz / 256QAM

Middle Channel / 10MHz / 256QAM



Date: 7.NOV.2024 21:18:43



Date: 7.NOV.2024 21:20:13



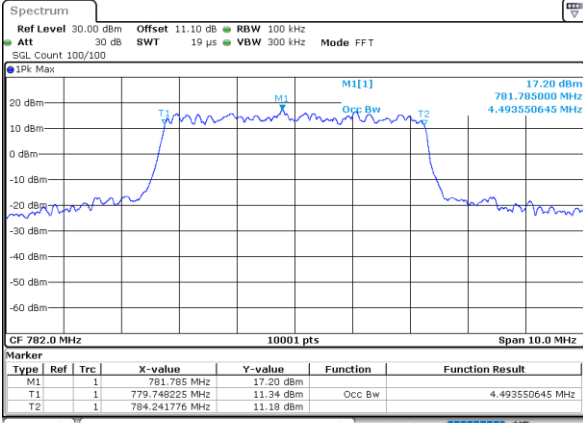
Occupied Bandwidth

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
Middle CH	-	-	-	-	4.49	4.49	9.08	8.97	-	-	-	-
Mode	LTE Band 13 : 99%OBW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM
Middle CH	-	-	-	-	4.49	4.46	8.98	8.97	-	-	-	-



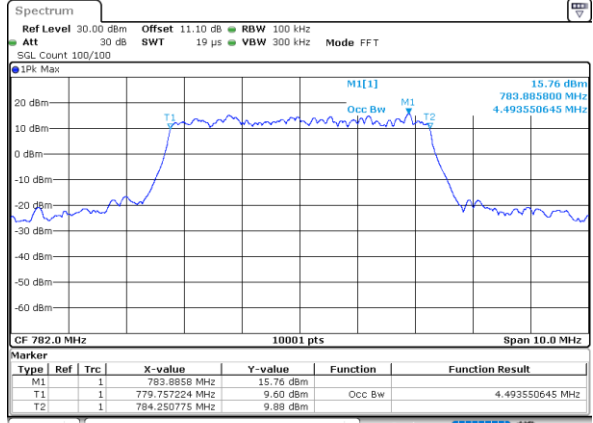
LTE Band 13

Middle Channel / 5MHz / QPSK



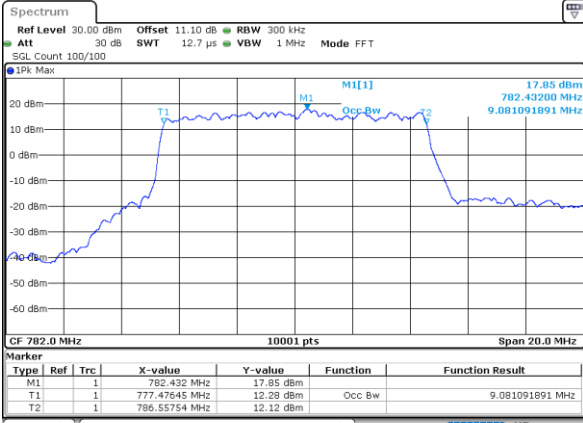
Date: 7.NOV.2024 21:14:36

Middle Channel / 5MHz / 16QAM



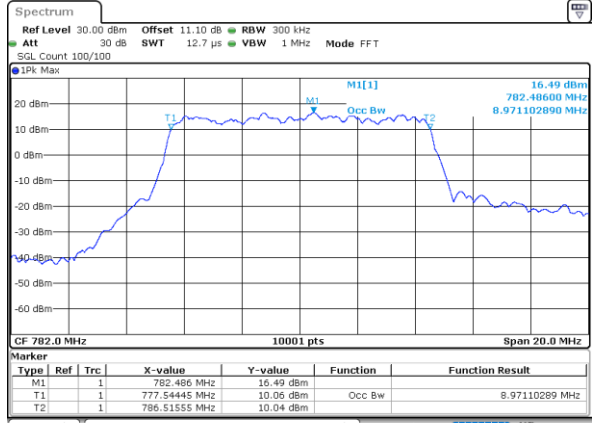
Date: 7.NOV.2024 21:14:58

Middle Channel / 10MHz / QPSK



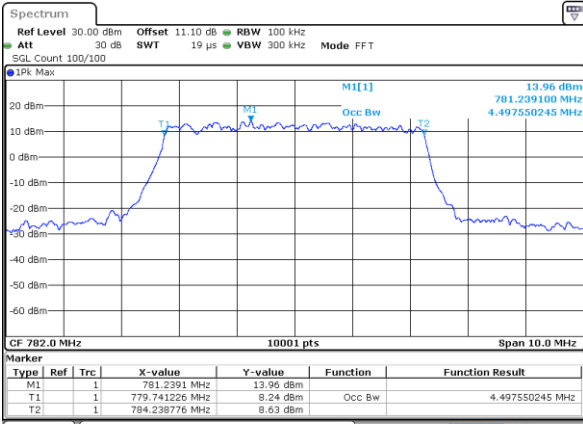
Date: 7.NOV.2024 21:16:06

Middle Channel / 10MHz / 16QAM



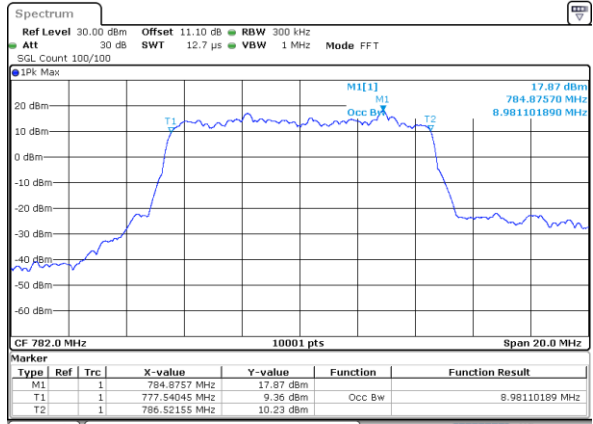
Date: 7.NOV.2024 21:16:29

Middle Channel / 5MHz / 64QAM



Date: 7.NOV.2024 21:15:20

Middle Channel / 10MHz / 64QAM

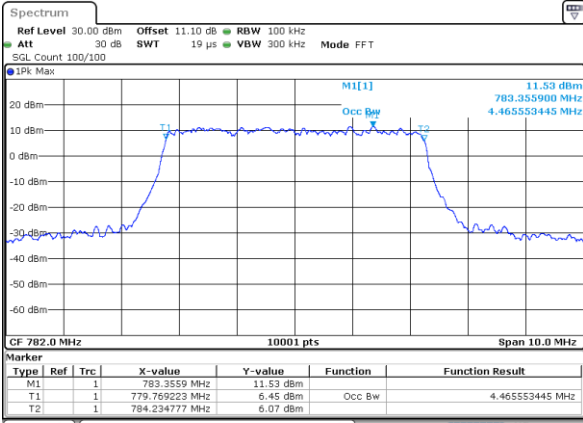


Date: 7.NOV.2024 21:16:51



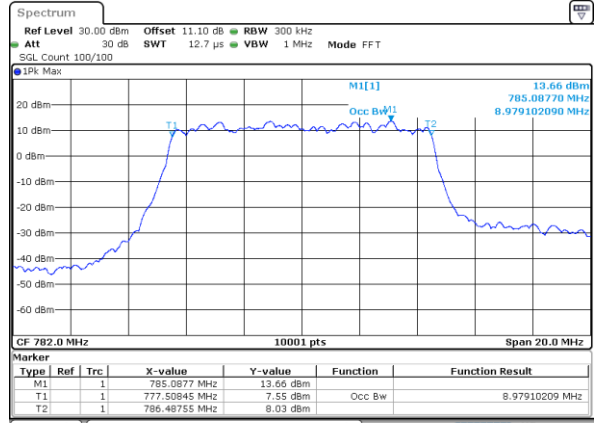
LTE Band 13

Middle Channel / 5MHz / 256QAM



Date: 7.NOV.2024 21:15:43

Middle Channel / 10MHz / 256QAM



Date: 7.NOV.2024 21:17:13

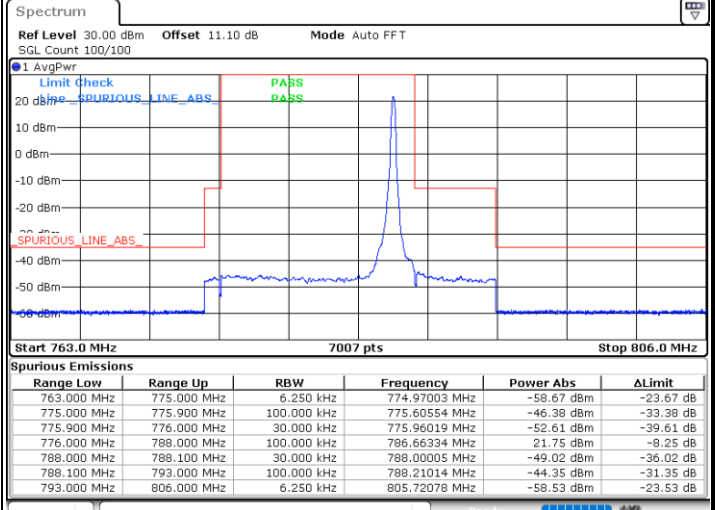
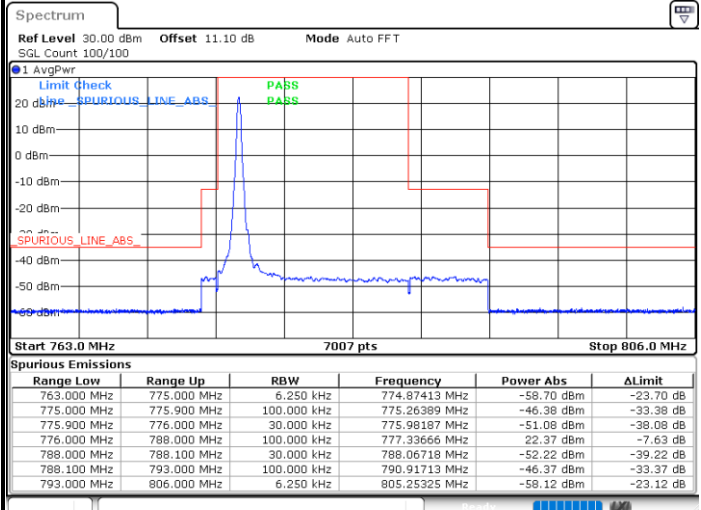


# Conducted Band Edge

## LTE Band 13 / 5MHz / QPSK

### Lowest Band Edge / 1 RB

### Highest Band Edge / 1 RB

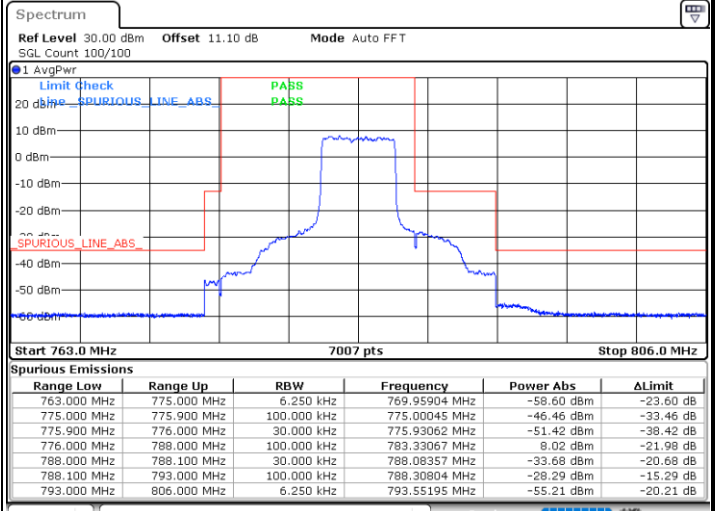
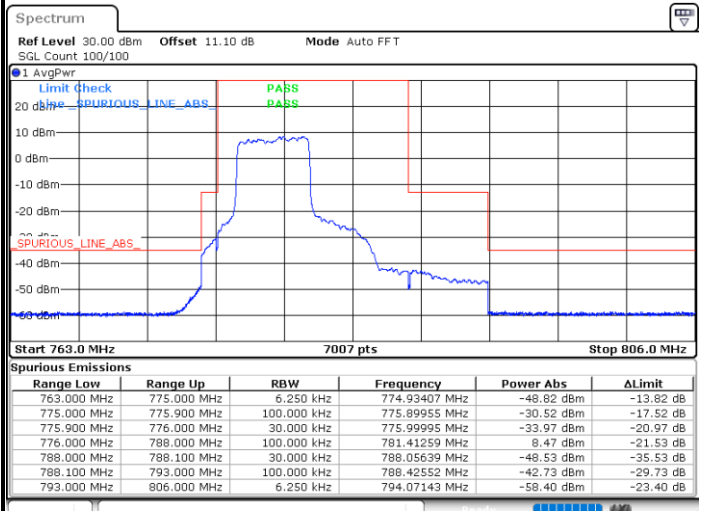


Date: 7.NOV.2024 20:54:55

Date: 7.NOV.2024 21:03:22

### Lowest Band Edge / Full RB

### Highest Band Edge / Full RB



Date: 7.NOV.2024 20:50:42

Date: 7.NOV.2024 20:59:09

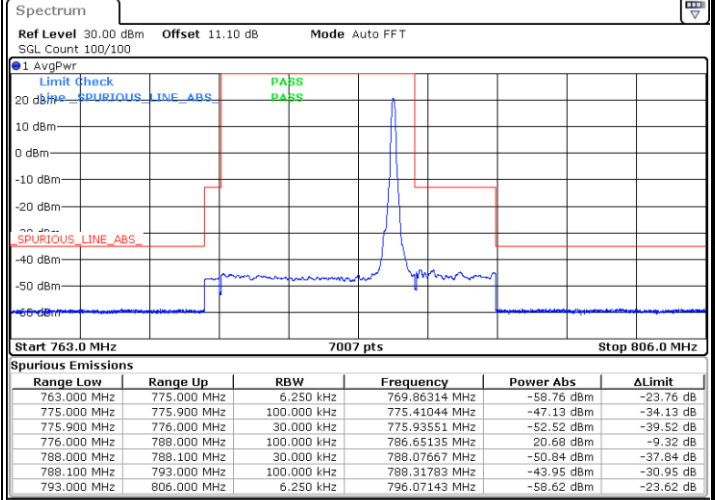
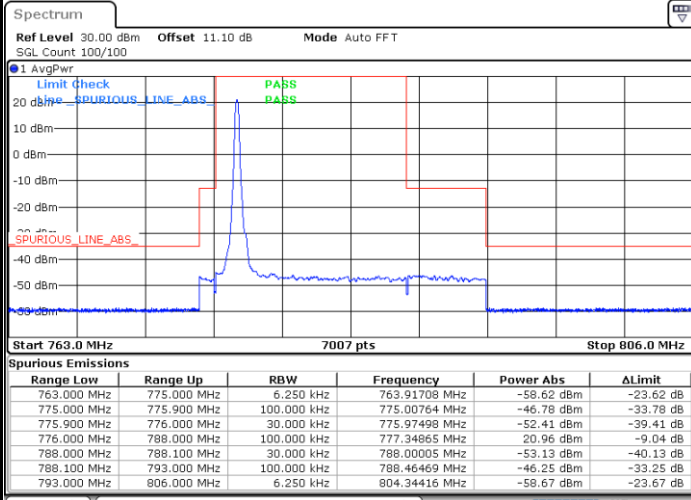




LTE Band 13 / 5MHz / 16QAM

Lowest Band Edge / 1 RB

Highest Band Edge / 1 RB

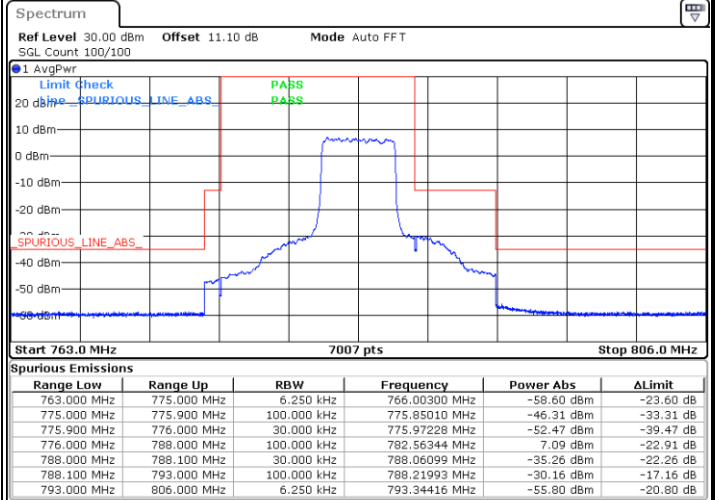
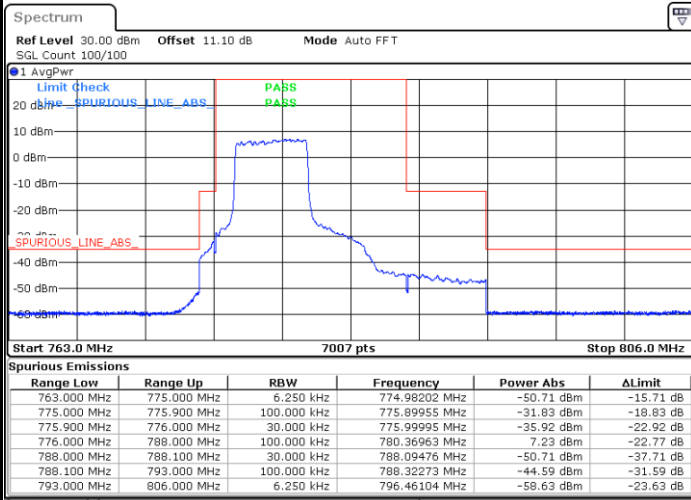


Date: 7.NOV.2024 20:55:58

Date: 7.NOV.2024 21:04:25

Lowest Band Edge / Full RB

Highest Band Edge / Full RB



Date: 7.NOV.2024 20:51:45

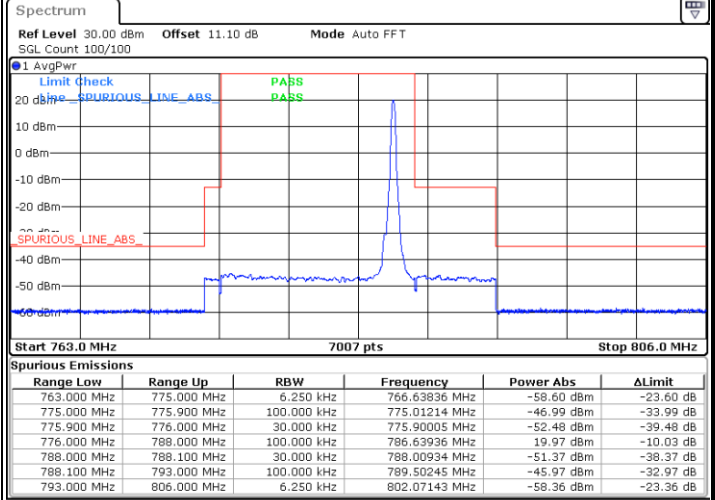
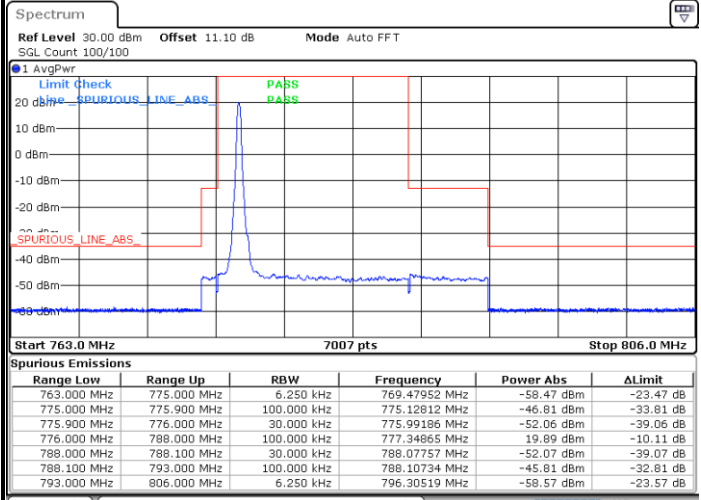
Date: 7.NOV.2024 21:00:12



LTE Band 13 / 5MHz / 64QAM

Lowest Band Edge / 1 RB

Highest Band Edge / 1 RB

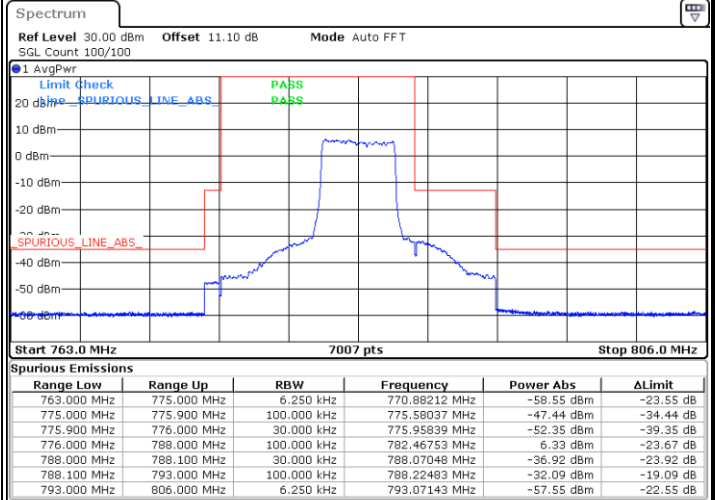
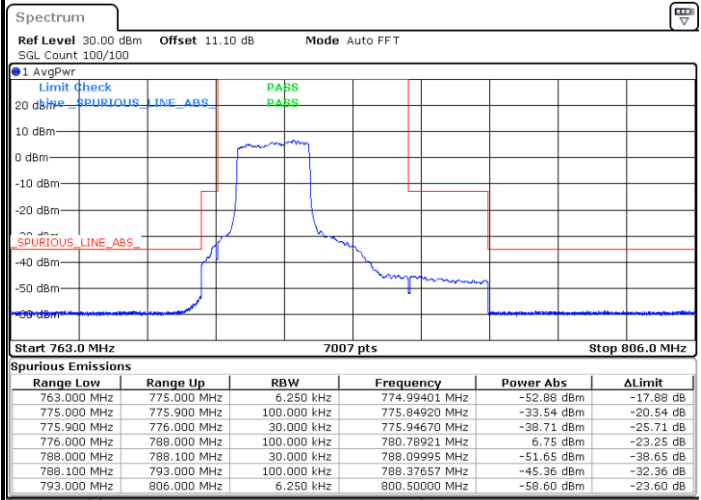


Date: 7.NOV.2024 20:57:01

Date: 7.NOV.2024 21:05:27

Lowest Band Edge / Full RB

Highest Band Edge / Full RB



Date: 7.NOV.2024 20:52:47

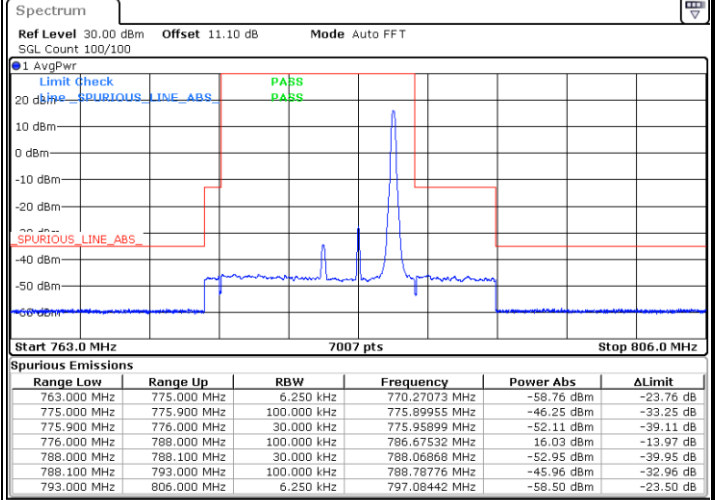
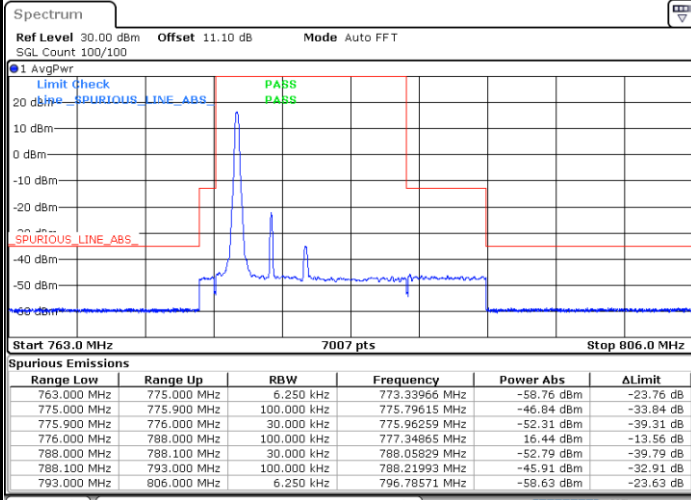
Date: 7.NOV.2024 21:01:14



LTE Band 13 / 5MHz / 256QAM

Lowest Band Edge / 1 RB

Highest Band Edge / 1 RB

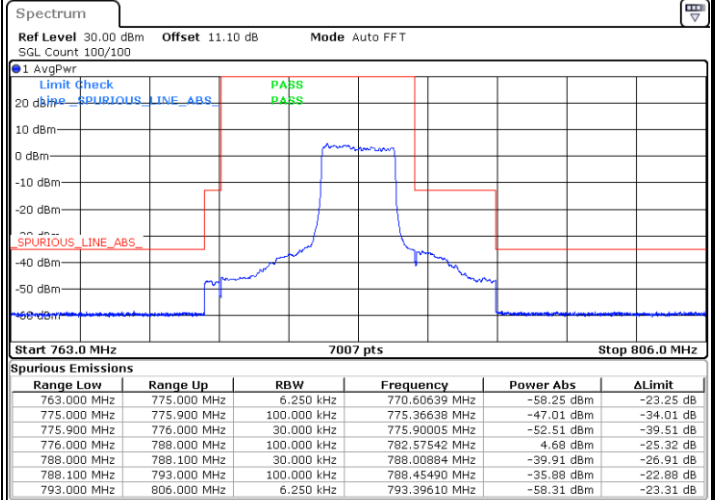
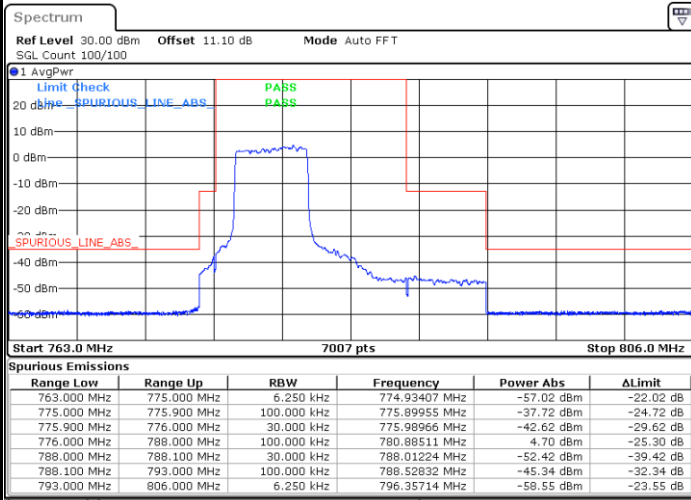


Date: 7.NOV.2024 20:58:03

Date: 7.NOV.2024 21:06:30

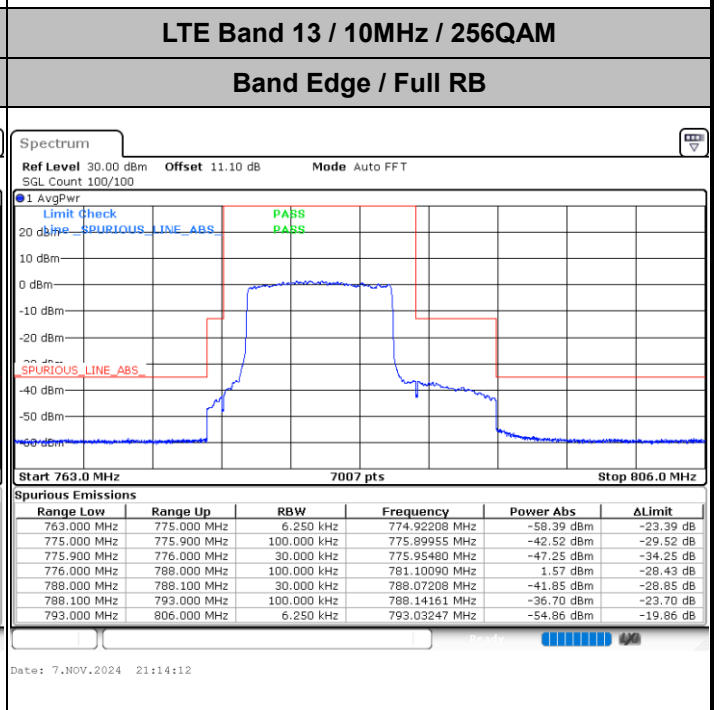
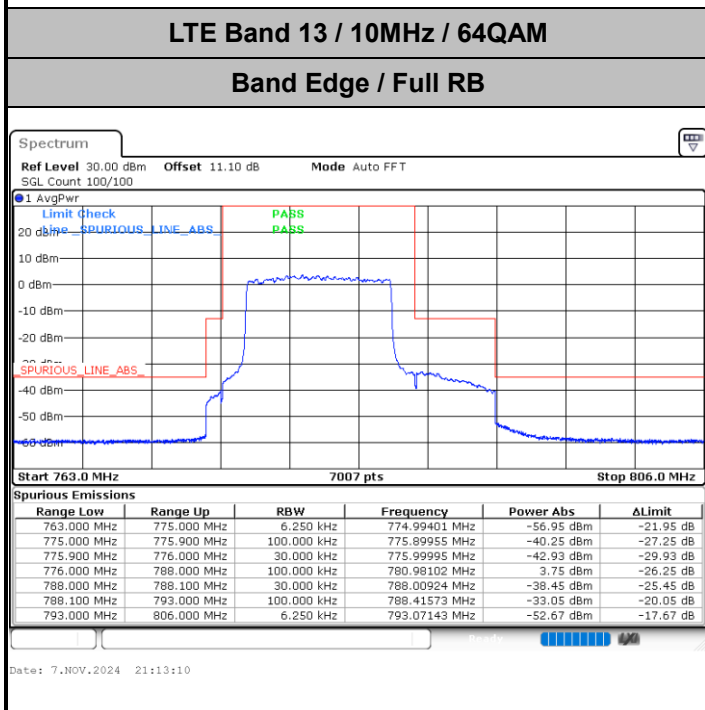
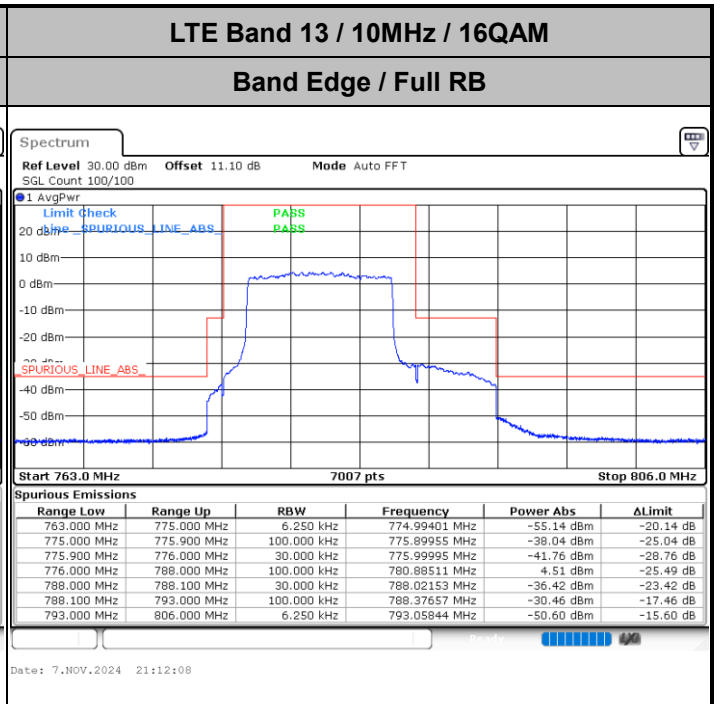
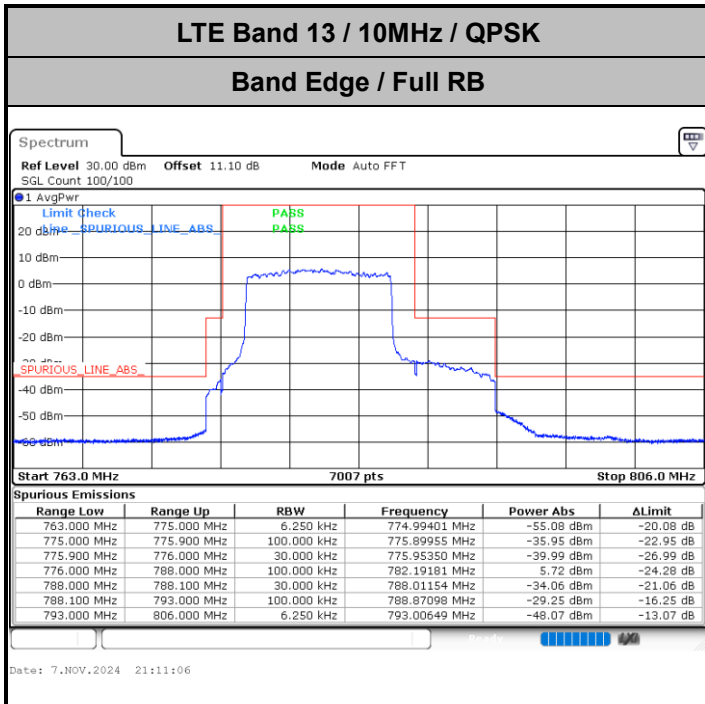
Lowest Band Edge / Full RB

Highest Band Edge / Full RB



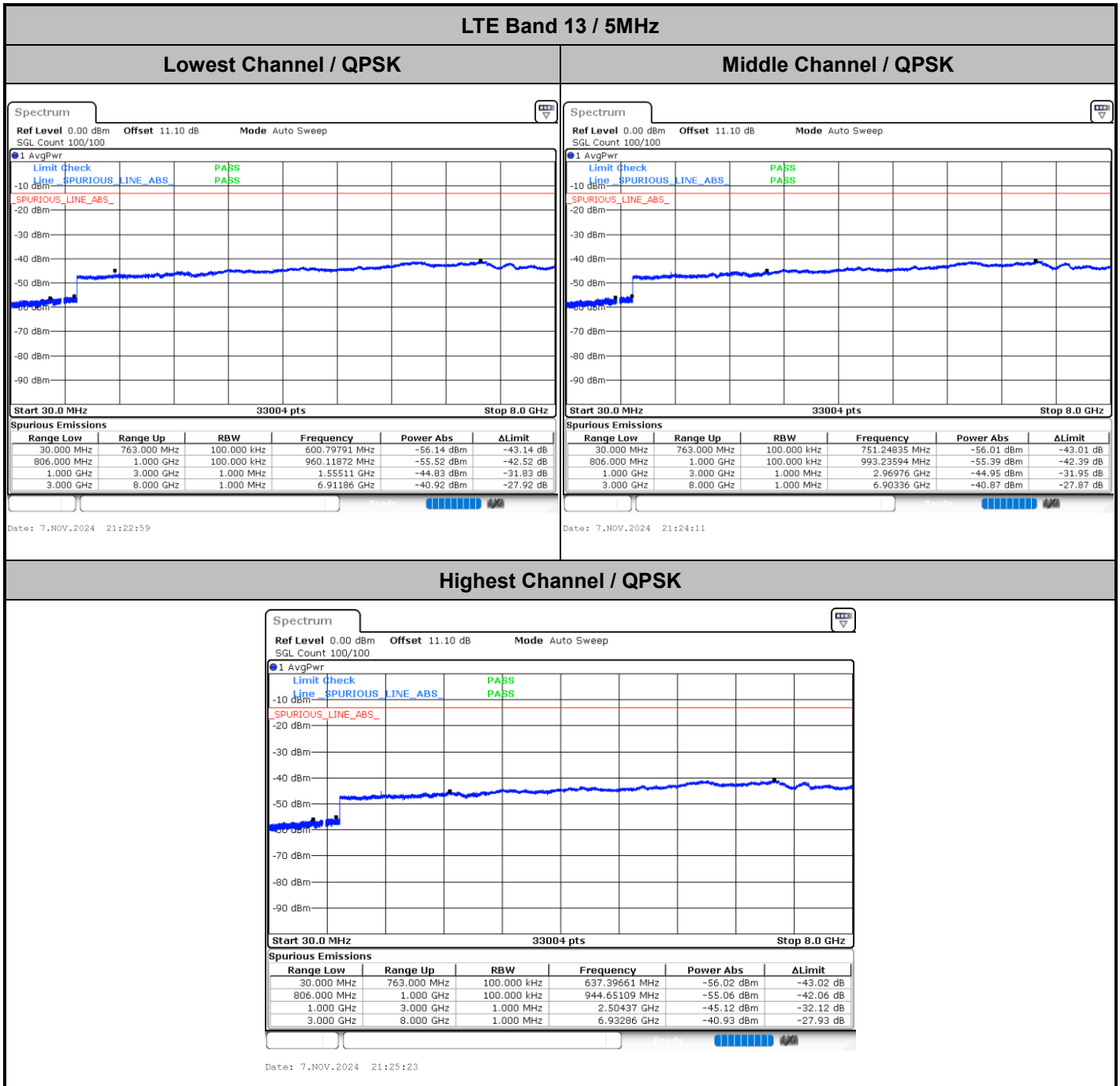
Date: 7.NOV.2024 20:53:50

Date: 7.NOV.2024 21:02:17





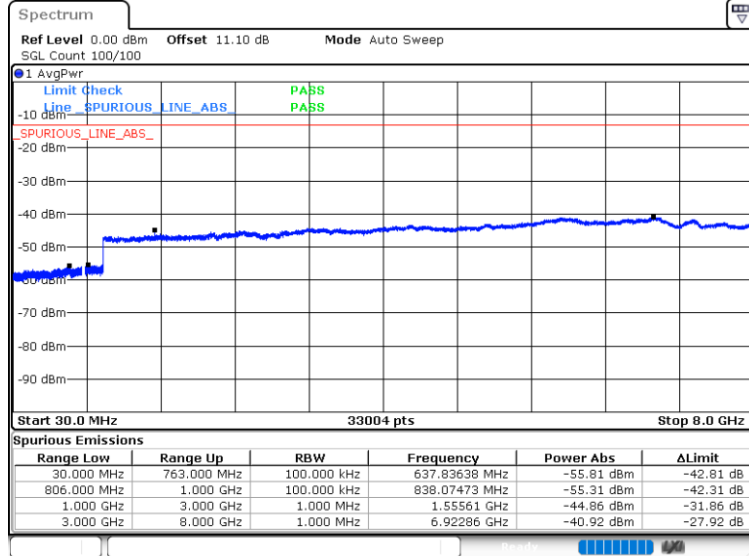
# Conducted Spurious Emission





LTE Band 13 / 10MHz

Middle Channel / QPSK



Date: 7.NOV.2024 21:26:36



**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	0.0026	
30	Normal Voltage	0.0055	
20(Ref.)	Normal Voltage	0.0000	
10	Normal Voltage	0.0056	
0	Normal Voltage	0.0093	
-10	Normal Voltage	0.0001	
-20	Normal Voltage	0.0017	
-30	Normal Voltage	0.0059	
20	Maximum Voltage	0.0052	
20	Normal Voltage	0.0000	
20	Minimum Voltage	0.0066	

**Note:**

1. Normal Voltage =3.3 V. ; Minimum Voltage =3.135 V. ; Maximum Voltage =3.465 V.
2. The frequency fundamental emissions stay within the authorized frequency block.

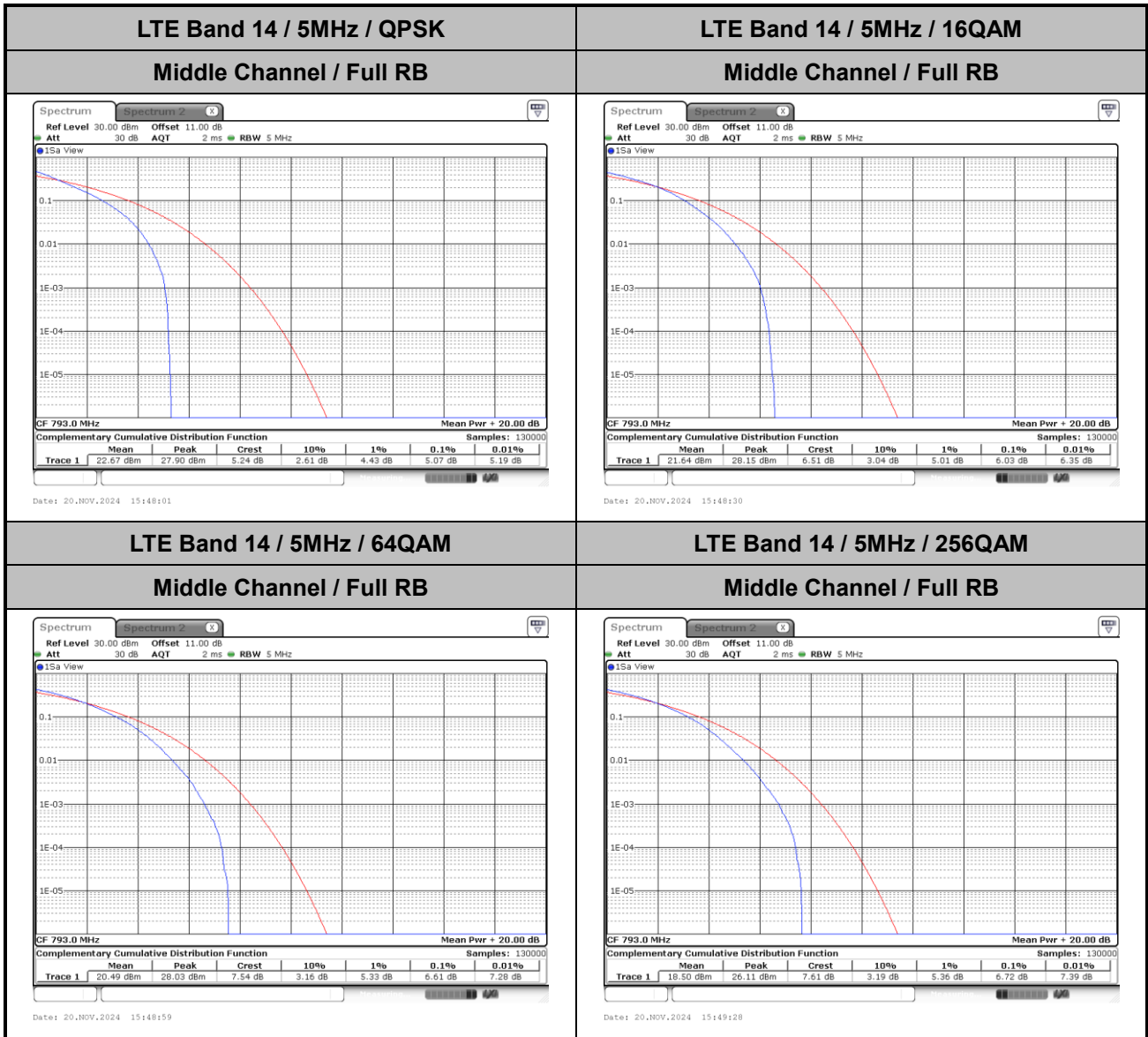


## LTE Band 14

### Peak-to-Average Ratio

Mode	LTE Band 14 / 5MHz				
Mod.	QPSK	16QAM	64QAM	256QAM	Limit: 13dB
RB Size	Full RB	Full RB	Full RB	Full RB	Result
Middle CH	5.07	6.03	6.61	6.72	PASS
Mode	LTE Band 14 / 10MHz				
Mod.	QPSK	16QAM	64QAM	256QAM	Limit: 13dB
RB Size	Full RB	Full RB	Full RB	Full RB	Result
Middle CH	5.07	6.00	6.43	6.87	PASS

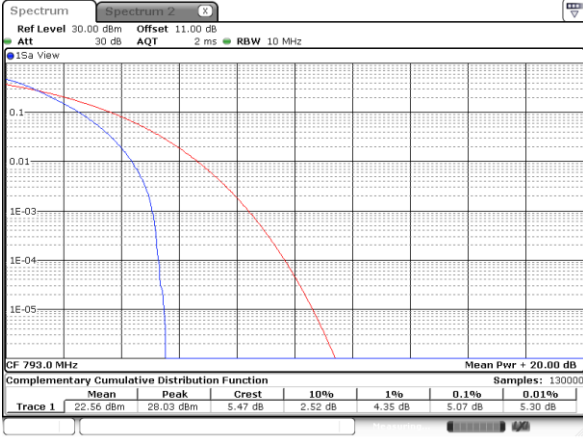






LTE Band 14 / 10MHz / QPSK

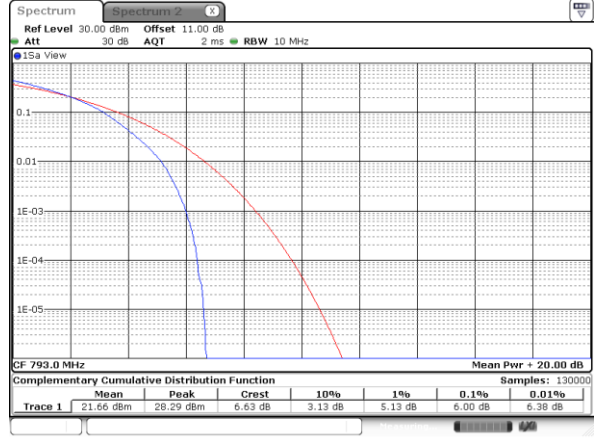
Middle Channel / Full RB



Date: 20.NOV.2024 15:50:03

LTE Band 14 / 10MHz / 16QAM

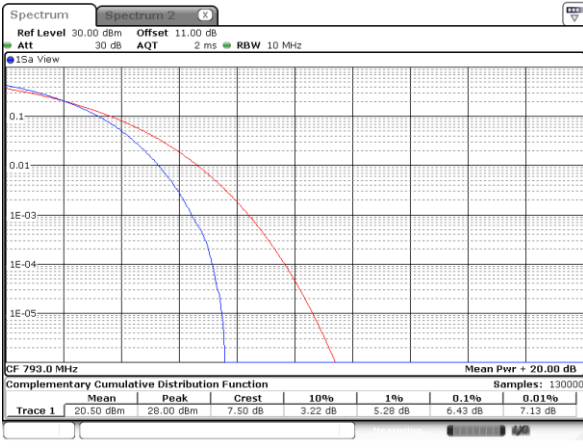
Middle Channel / Full RB



Date: 20.NOV.2024 15:50:32

LTE Band 14 / 10MHz / 64QAM

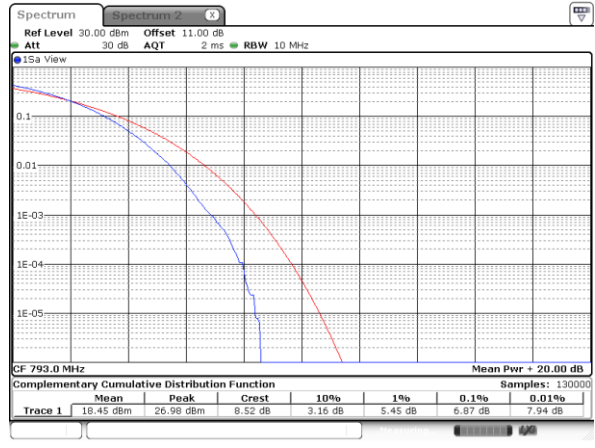
Middle Channel / Full RB



Date: 20.NOV.2024 15:51:01

LTE Band 14 / 10MHz / 256QAM

Middle Channel / Full RB



Date: 20.NOV.2024 15:51:30



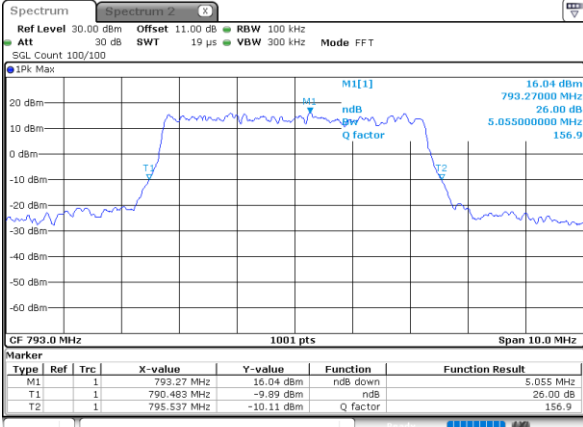
**26dB Bandwidth**

Mode	LTE Band 14 : 26dB BW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM
Middle CH	-	-	-	-	5.05	4.95	9.89	9.92	-	-	-	-
Mode	LTE Band 14 : 26dB BW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM
Middle CH	-	-	-	-	4.96	5.10	9.94	9.86	-	-	-	-



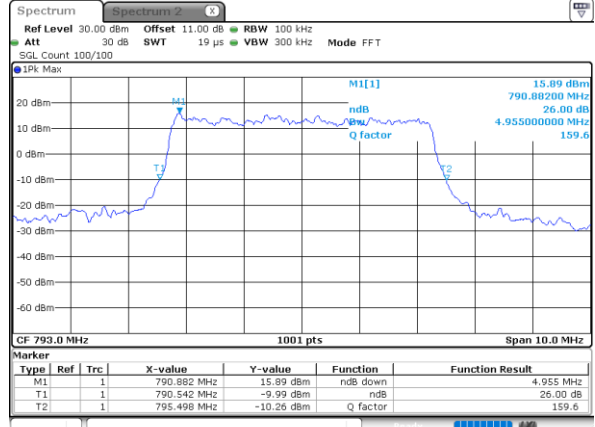
LTE Band 14

Middle Channel / 5MHz / QPSK



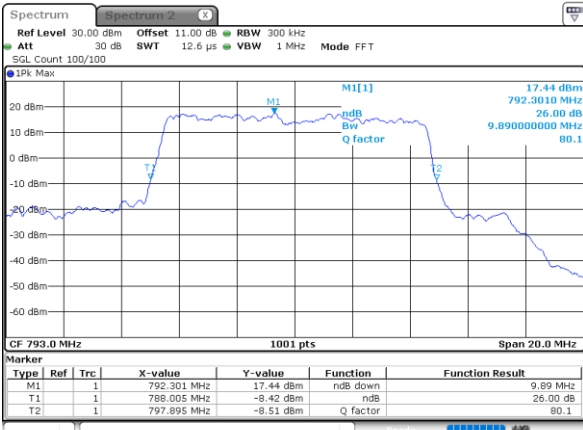
Date: 20.NOV.2024 15:44:06

Middle Channel / 5MHz / 16QAM



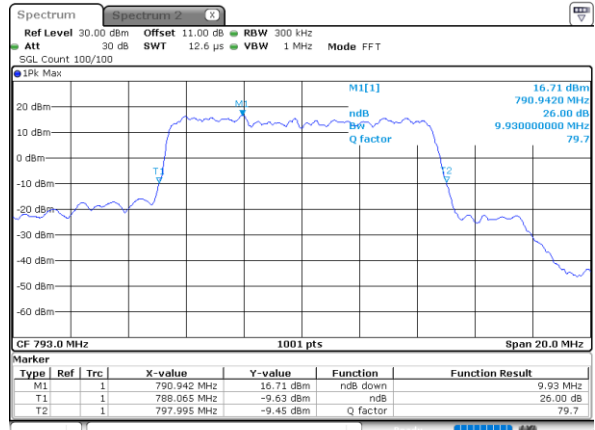
Date: 20.NOV.2024 15:44:34

Middle Channel / 10MHz / QPSK



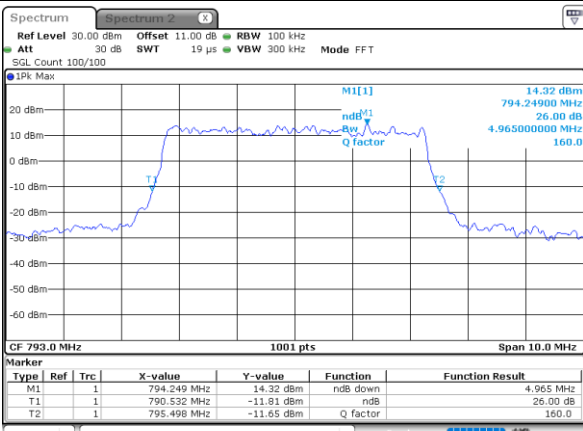
Date: 20.NOV.2024 15:46:03

Middle Channel / 10MHz / 16QAM



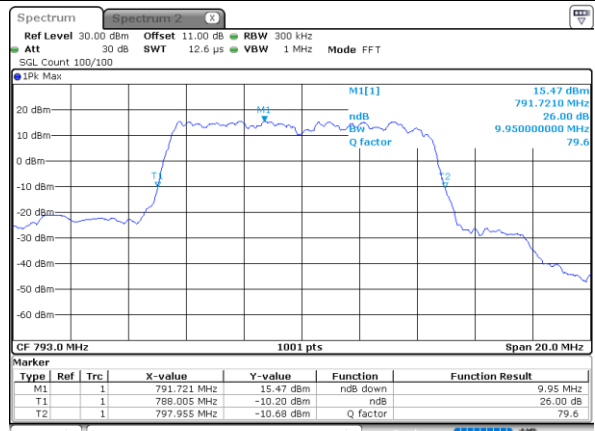
Date: 20.NOV.2024 15:46:31

Middle Channel / 5MHz / 64QAM



Date: 20.NOV.2024 15:45:02

Middle Channel / 10MHz / 64QAM



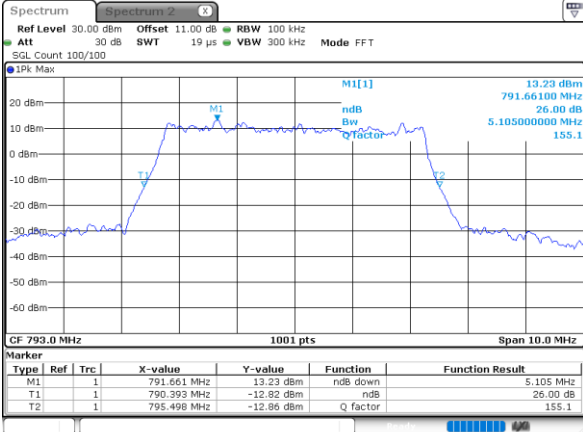
Date: 20.NOV.2024 15:46:59



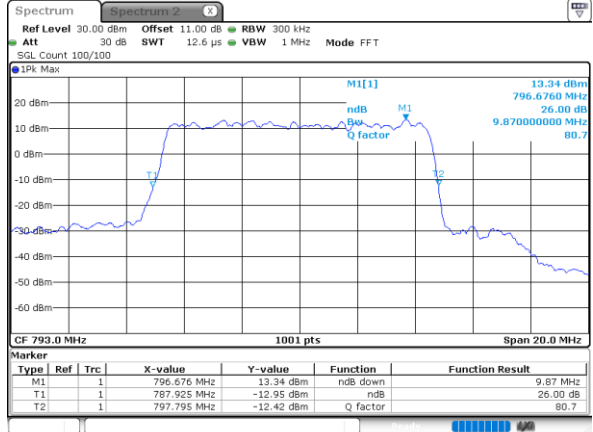
LTE Band 14

Middle Channel / 5MHz / 256QAM

Middle Channel / 10MHz / 256QAM



Date: 20.NOV.2024 15:45:30



Date: 20.NOV.2024 15:47:27



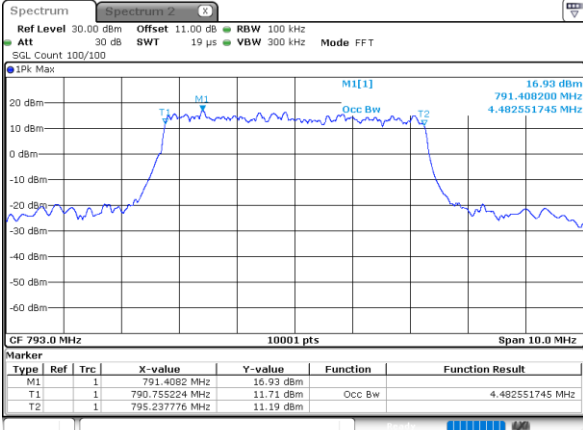
**Occupied Bandwidth**

Mode	LTE Band 14 : 99%OBW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM	QPSK	16QAM
Middle CH	-	-	-	-	4.48	4.47	9.03	9.01	-	-	-	-
Mode	LTE Band 14 : 99%OBW(MHz)											
BW	1.4MHz		3MHz		5MHz		10MHz		15MHz		20MHz	
Mod.	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM	64QAM	256QAM
Middle CH	-	-	-	-	4.49	4.51	9.02	9.04	-	-	-	-



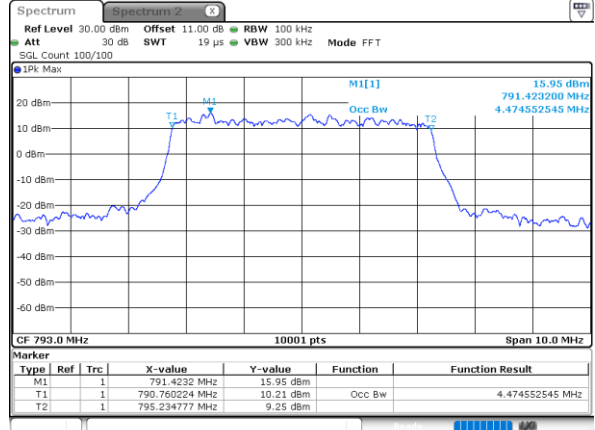
LTE Band 14

Middle Channel / 5MHz / QPSK



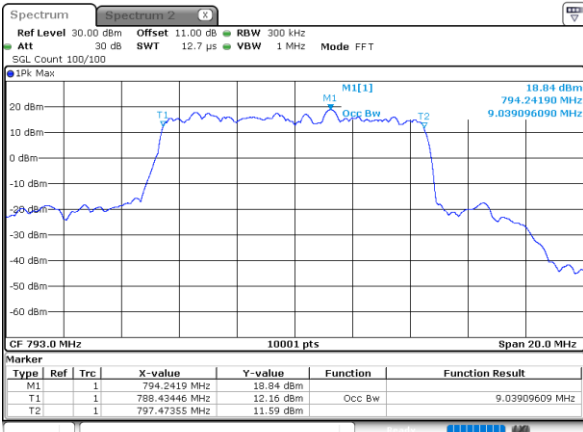
Date: 20,NOV,2024 15:40:12

Middle Channel / 5MHz / 16QAM



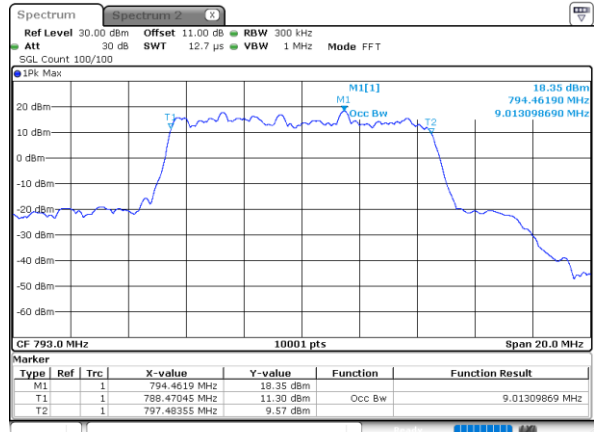
Date: 20,NOV,2024 15:40:40

Middle Channel / 10MHz / QPSK



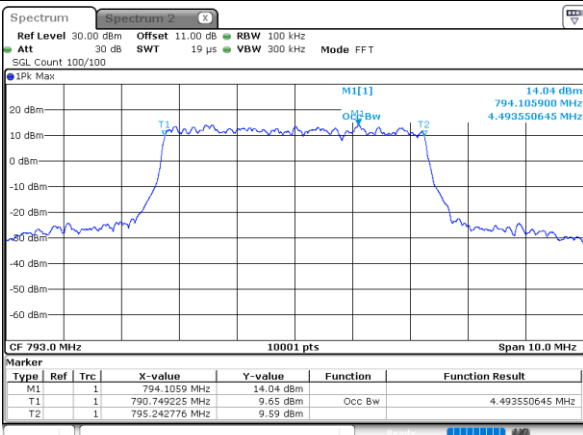
Date: 20,NOV,2024 15:42:09

Middle Channel / 10MHz / 16QAM



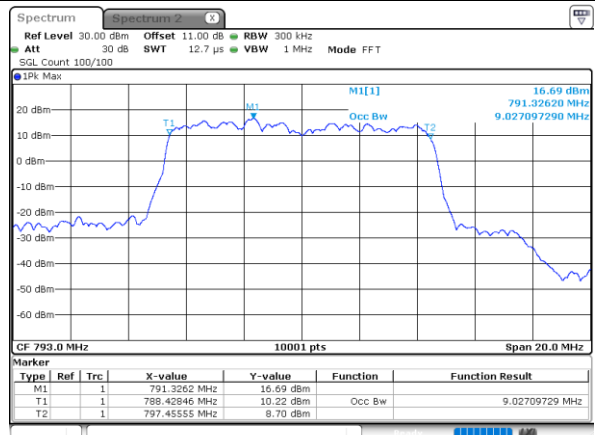
Date: 20,NOV,2024 15:42:37

Middle Channel / 5MHz / 64QAM



Date: 20,NOV,2024 15:41:08

Middle Channel / 10MHz / 64QAM



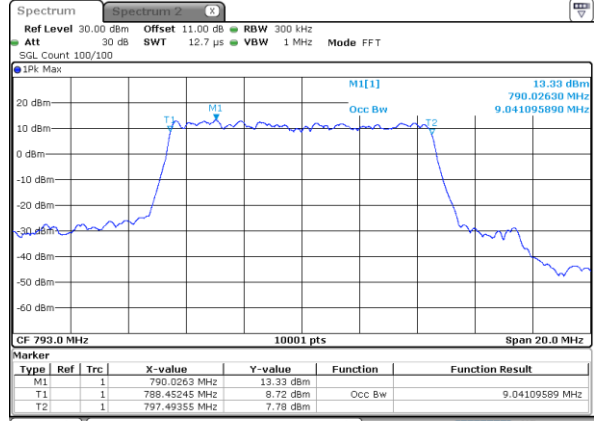
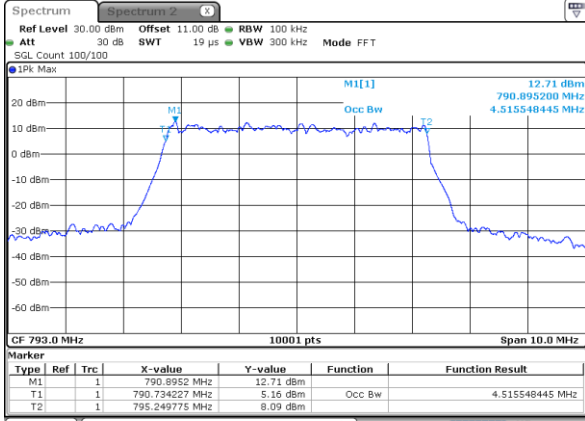
Date: 20,NOV,2024 15:43:05



LTE Band 14

Middle Channel / 5MHz / 256QAM

Middle Channel / 10MHz / 256QAM



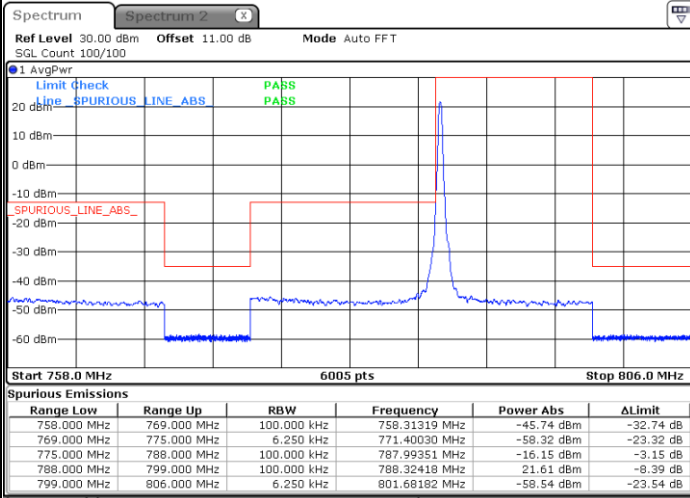




# Conducted Band Edge

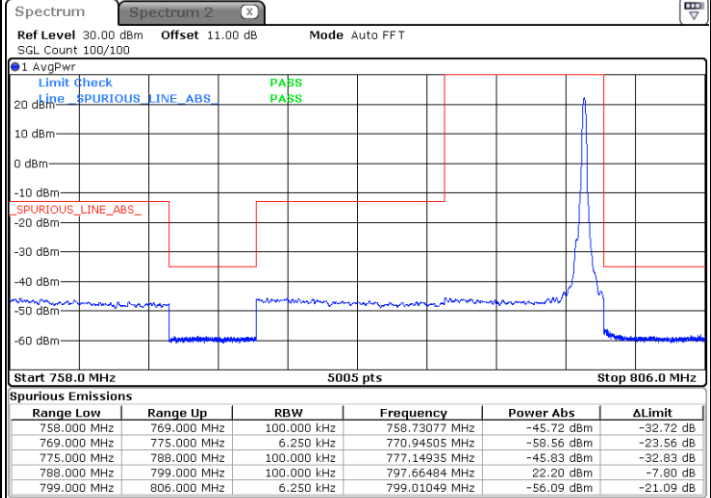
## LTE Band 14 / 5MHz / QPSK

### Lowest Band Edge / 1 RB



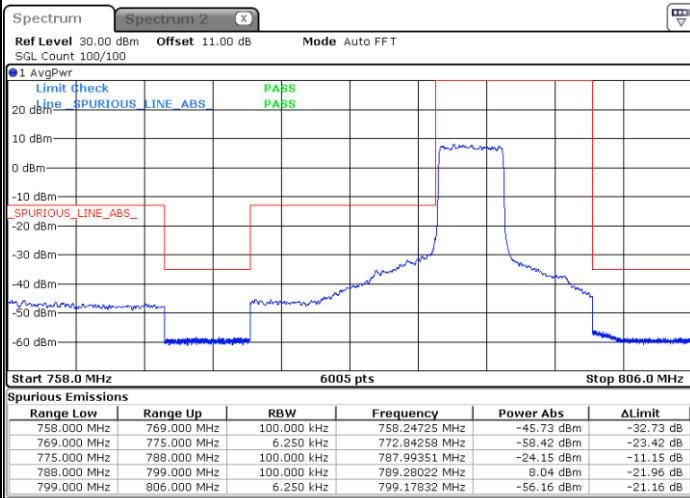
Date: 20.NOV.2024 14:37:17

### Highest Band Edge / 1 RB



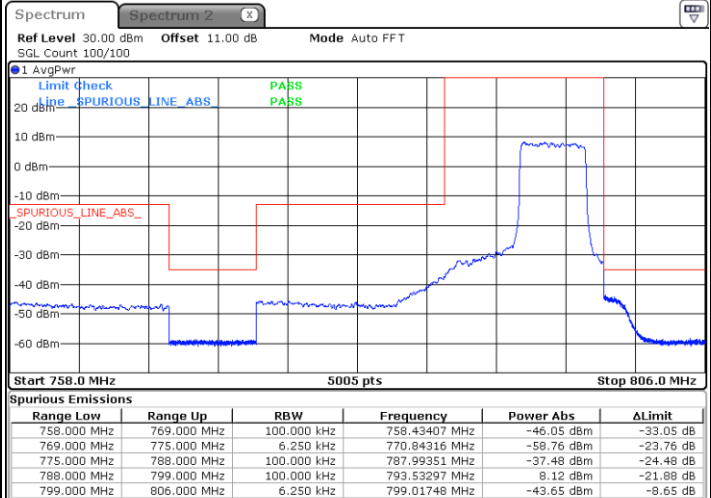
Date: 20.NOV.2024 14:46:27

### Lowest Band Edge / Full RB



Date: 20.NOV.2024 14:23:22

### Highest Band Edge / Full RB

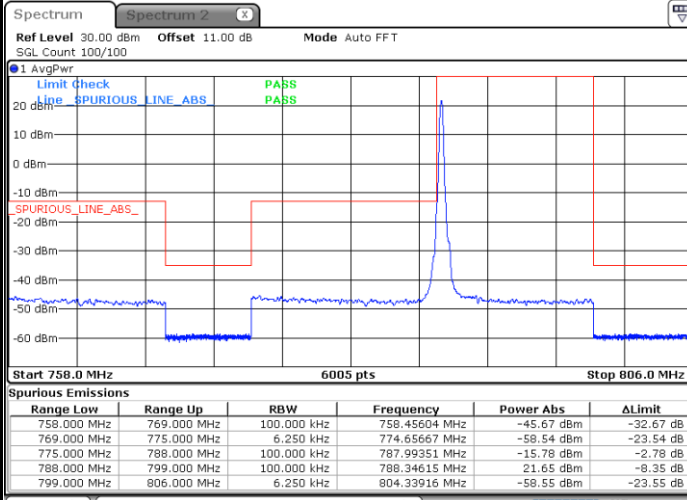


Date: 20.NOV.2024 14:41:52



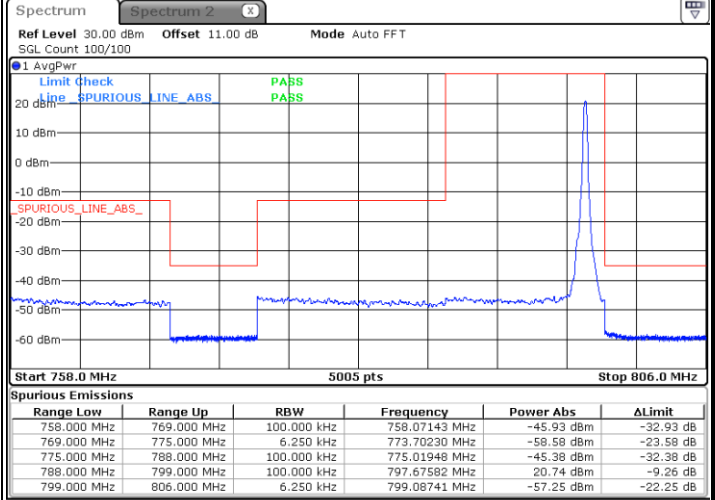
LTE Band 14 / 5MHz / 16QAM

Lowest Band Edge / 1 RB



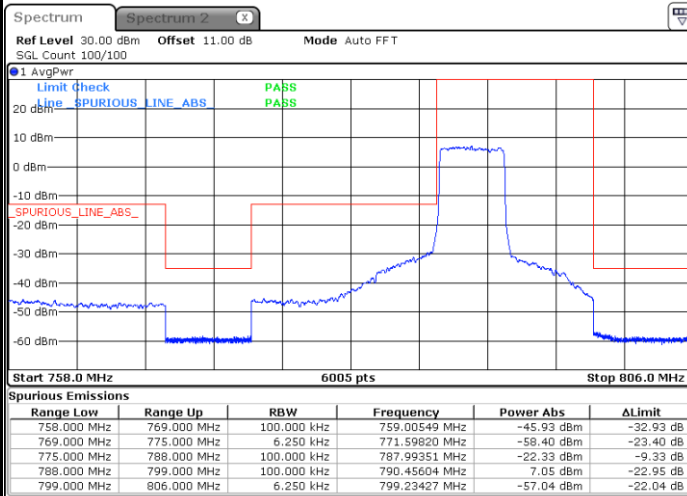
Date: 20.NOV.2024 14:38:25

Highest Band Edge / 1 RB



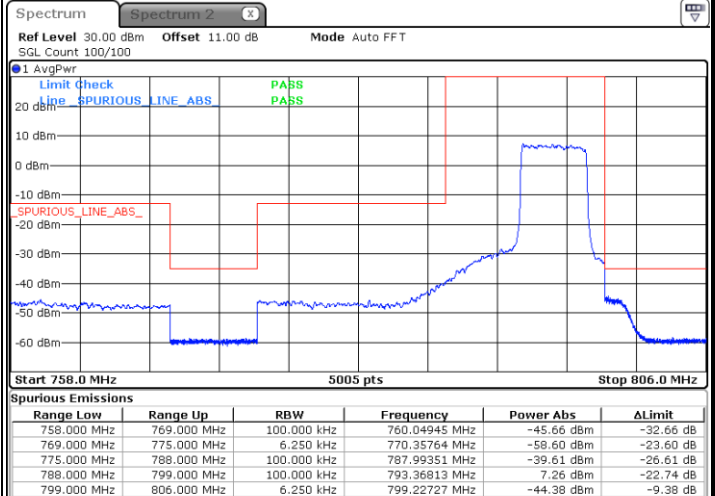
Date: 20.NOV.2024 14:47:35

Lowest Band Edge / Full RB



Date: 20.NOV.2024 14:29:49

Highest Band Edge / Full RB

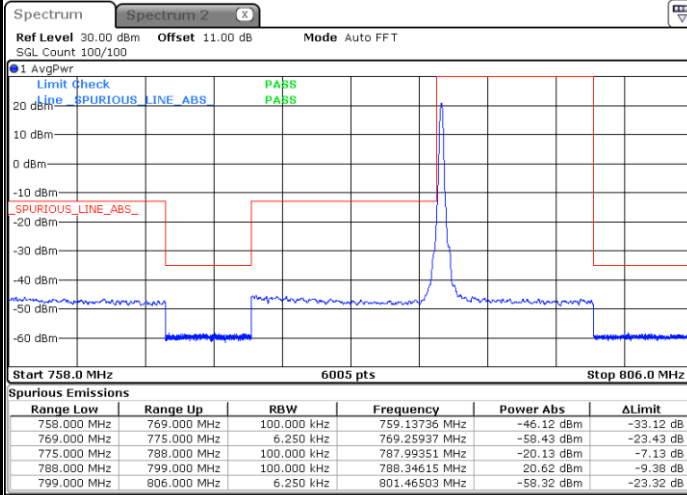


Date: 20.NOV.2024 14:43:00



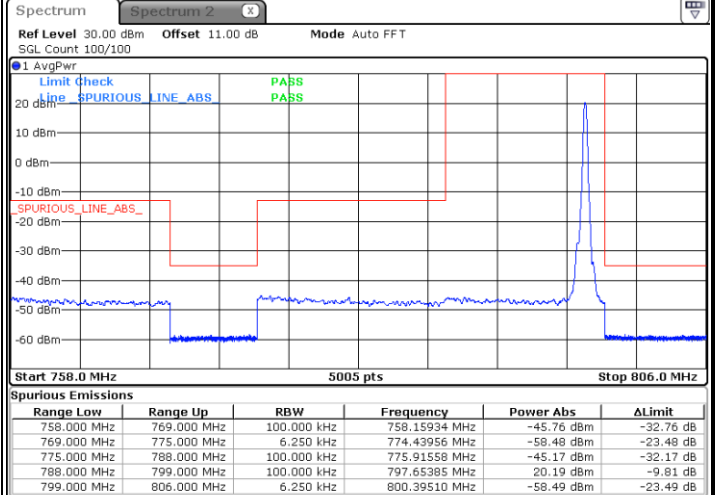
LTE Band 14 / 5MHz / 64QAM

Lowest Band Edge / 1 RB



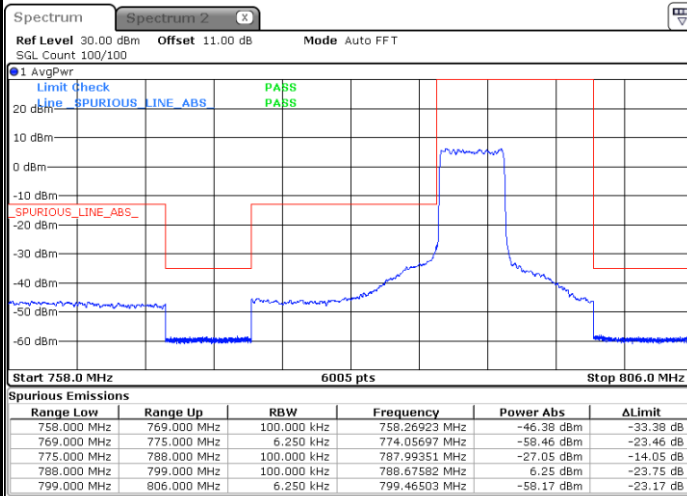
Date: 20.NOV.2024 14:39:33

Highest Band Edge / 1 RB



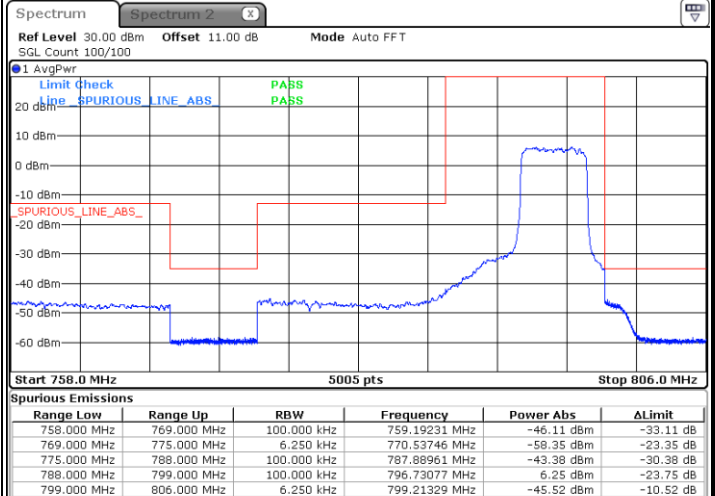
Date: 20.NOV.2024 14:48:43

Lowest Band Edge / Full RB



Date: 20.NOV.2024 14:30:51

Highest Band Edge / Full RB

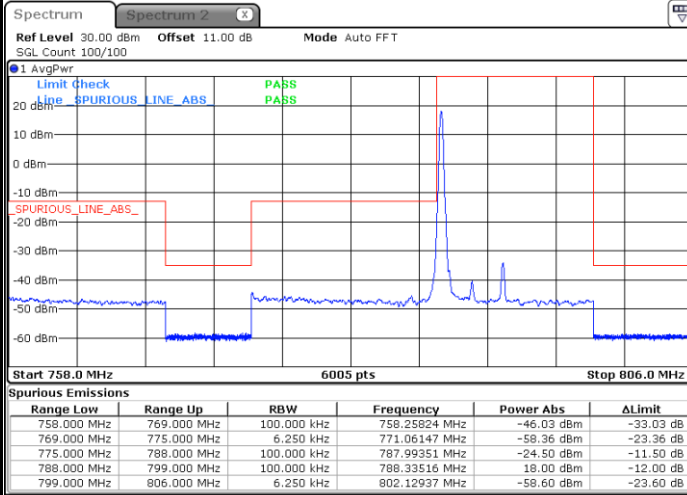


Date: 20.NOV.2024 14:44:08



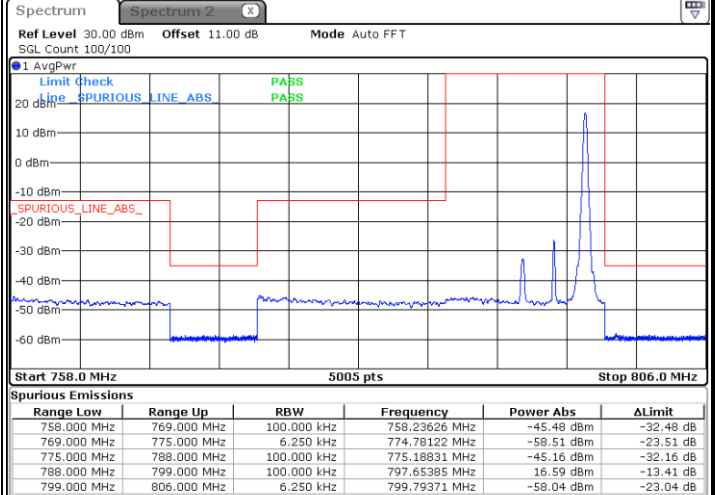
LTE Band 14 / 5MHz / 256QAM

Lowest Band Edge / 1 RB



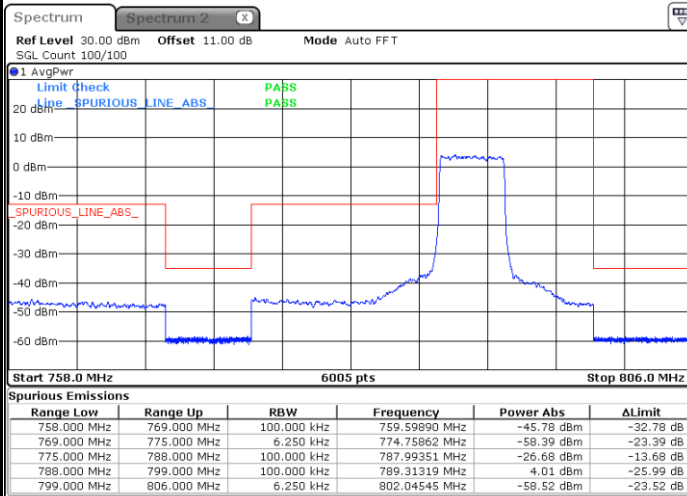
Date: 20.NOV.2024 14:40:41

Highest Band Edge / 1 RB



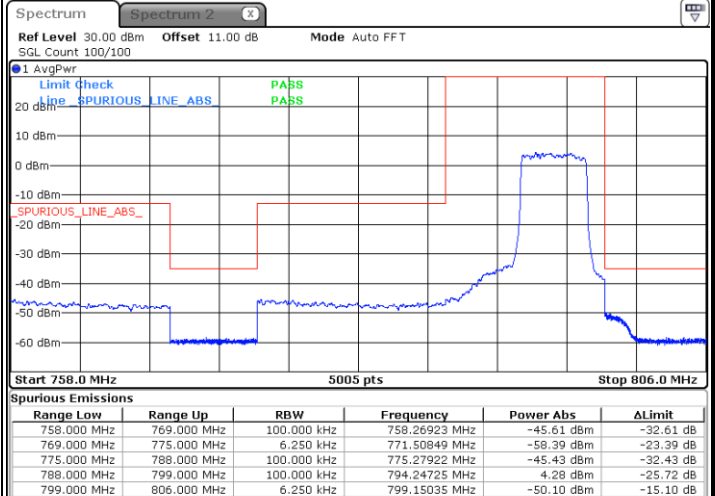
Date: 20.NOV.2024 14:49:51

Lowest Band Edge / Full RB

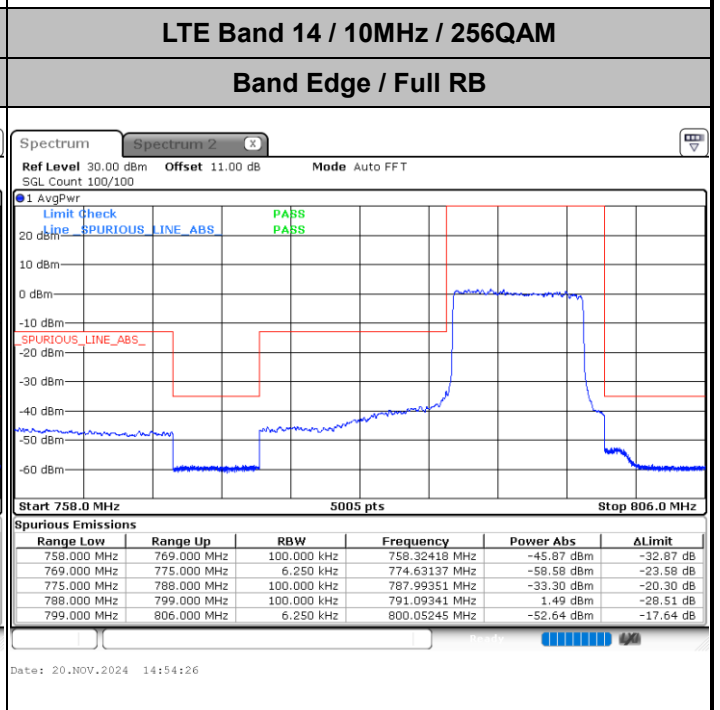
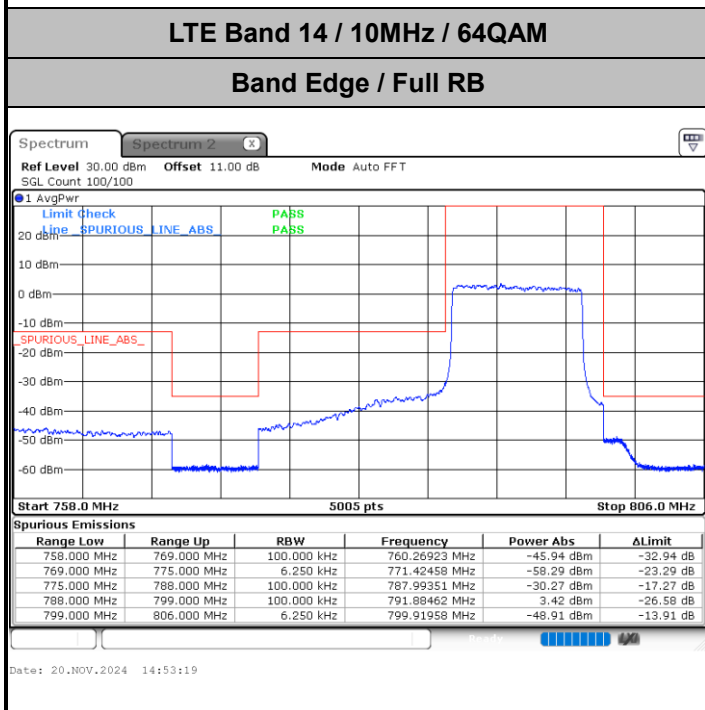
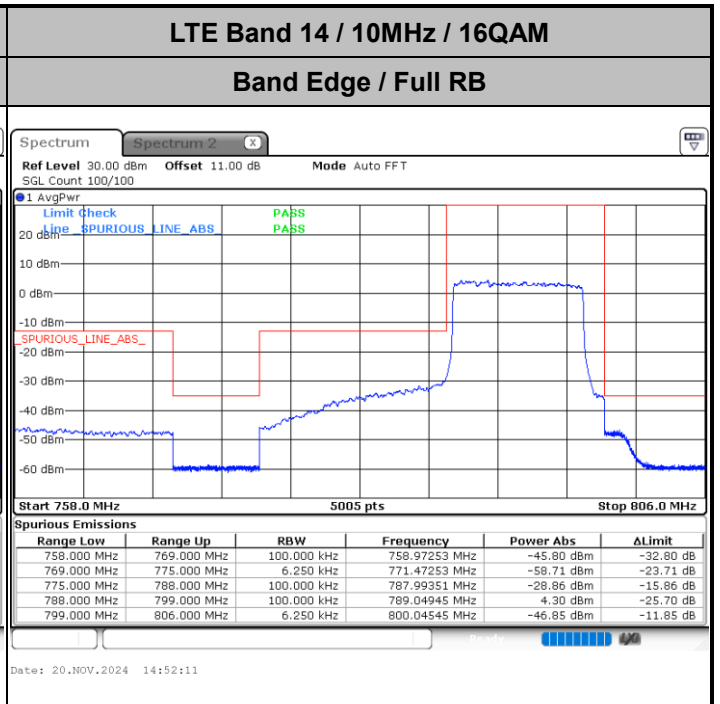
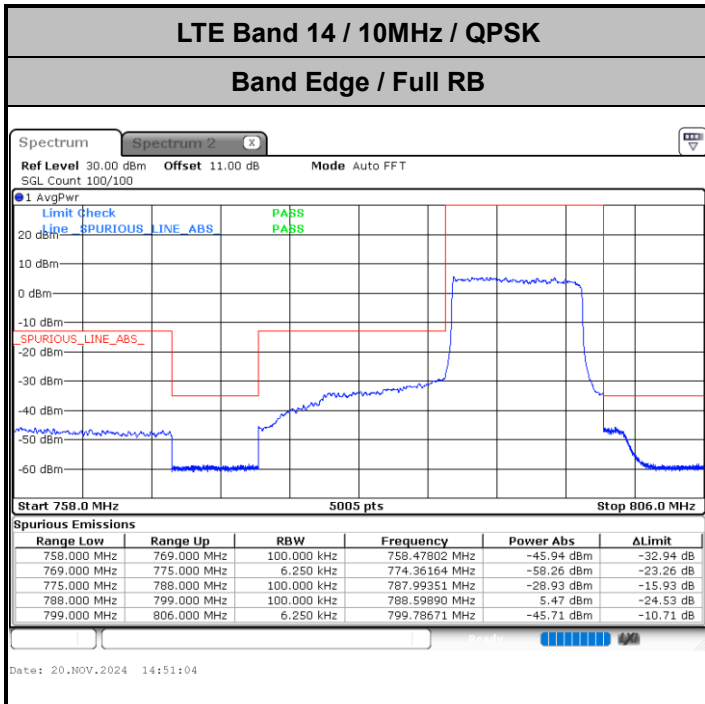


Date: 20.NOV.2024 14:31:54

Highest Band Edge / Full RB

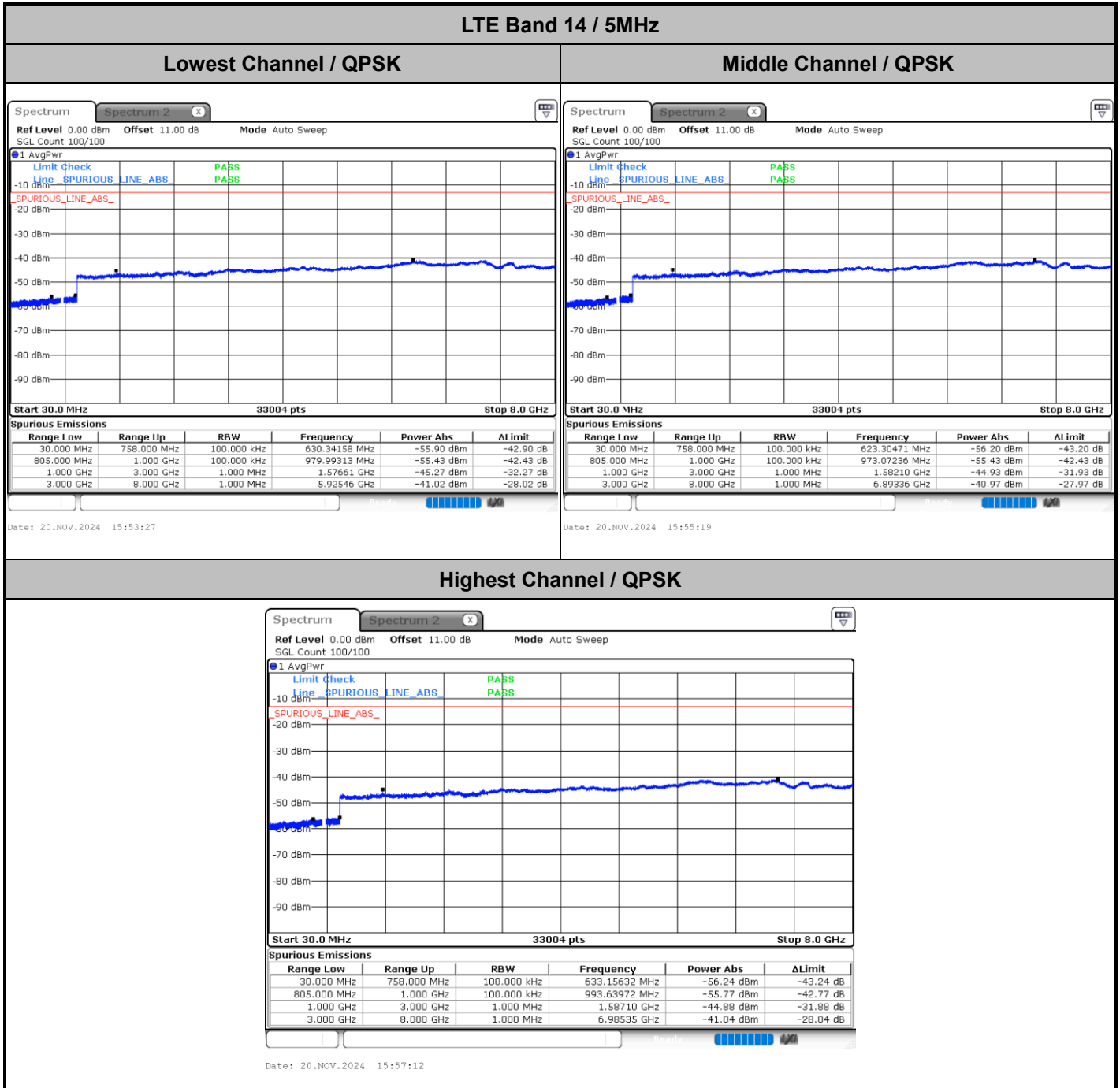


Date: 20.NOV.2024 14:45:16





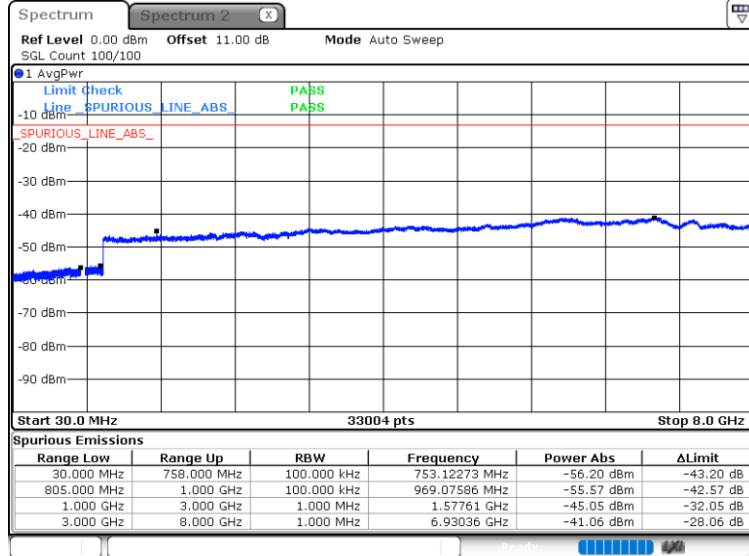
# Conducted Spurious Emission





LTE Band 14 / 10MHz

Middle Channel / QPSK



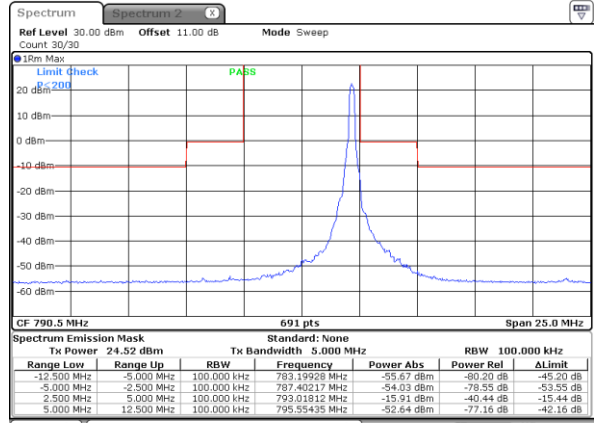
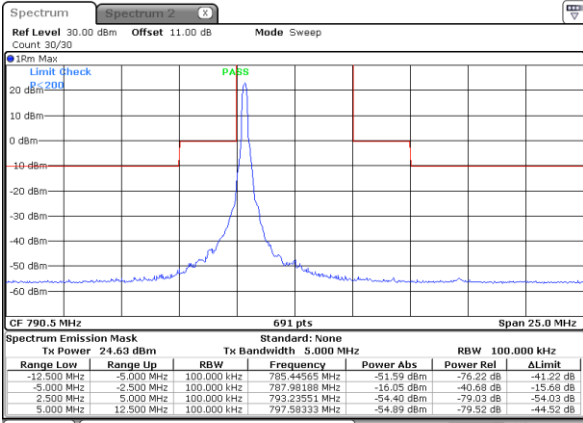
Date: 20.NOV.2024 15:59:10



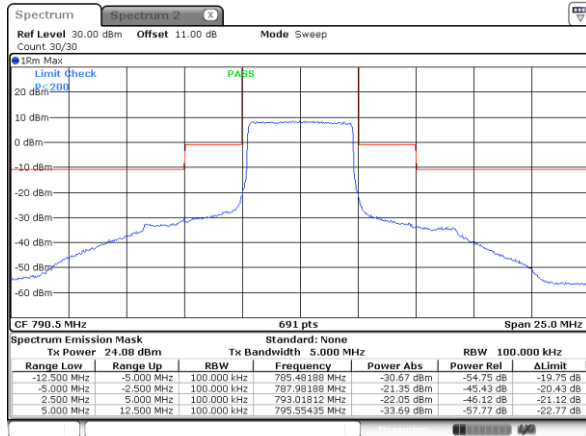
**Mask**

**LTE Band 14 / 5MHz / QPSK**

**Lowest Channel / 1RB**



**Lowest Channel / Full RB**

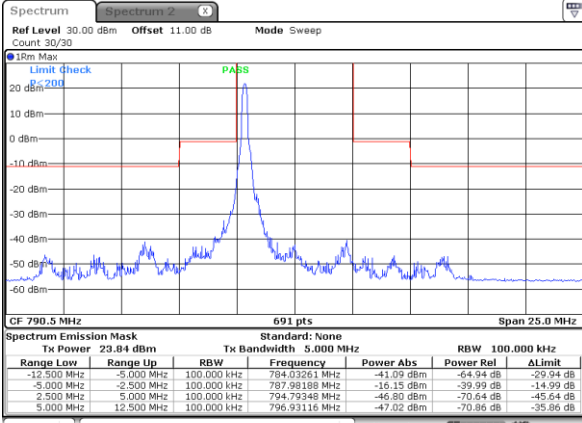




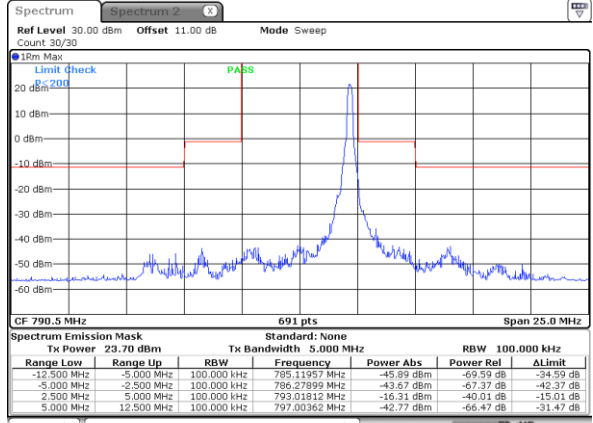


LTE Band 14 / 5MHz / 16QAM

Lowest Channel / 1RB

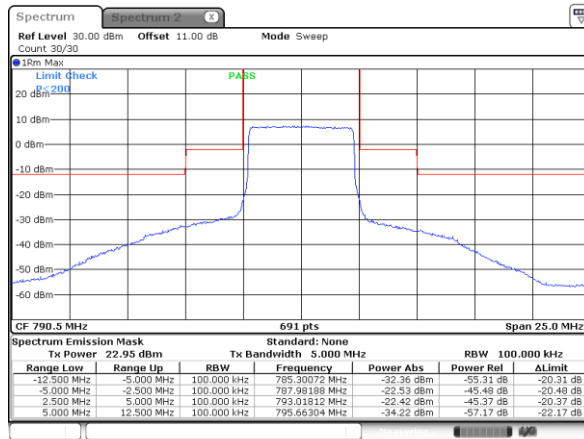


Date: 20.NOV.2024 15:01:19



Date: 20.NOV.2024 15:05:51

Lowest Channel / Full RB

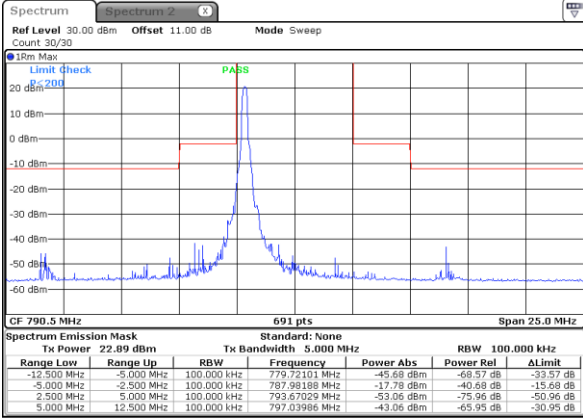


Date: 20.NOV.2024 14:56:46

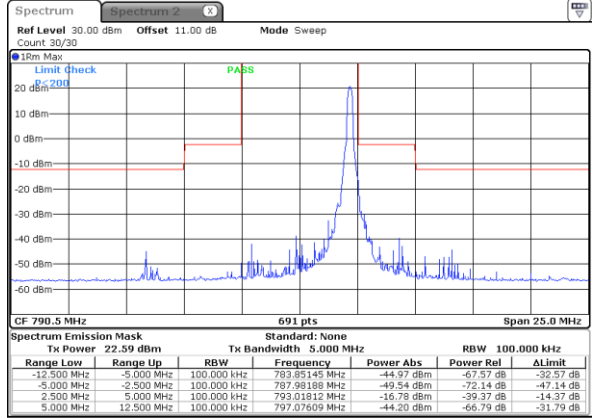


LTE Band 14 / 5MHz / 64QAM

Lowest Channel / 1RB

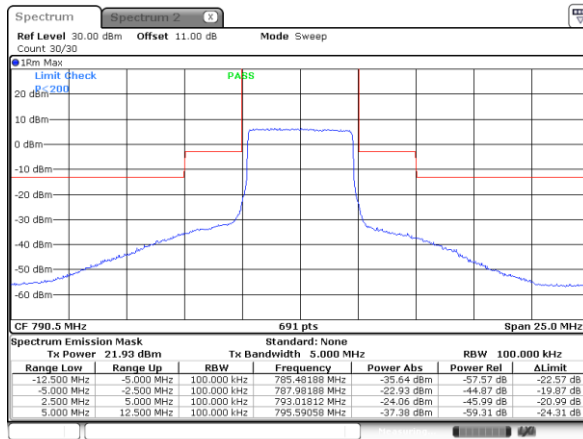


Date: 20.NOV.2024 15:02:26



Date: 20.NOV.2024 15:06:58

Lowest Channel / Full RB

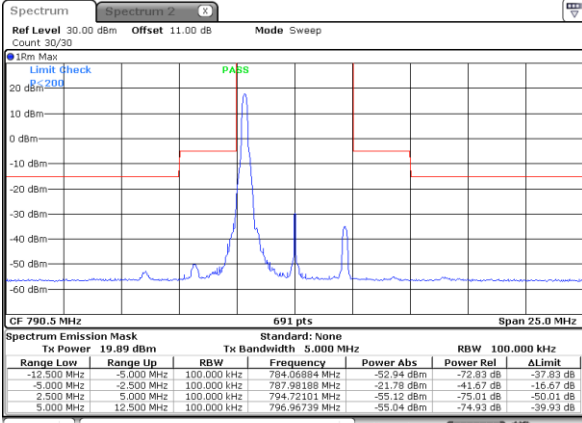


Date: 20.NOV.2024 14:57:54

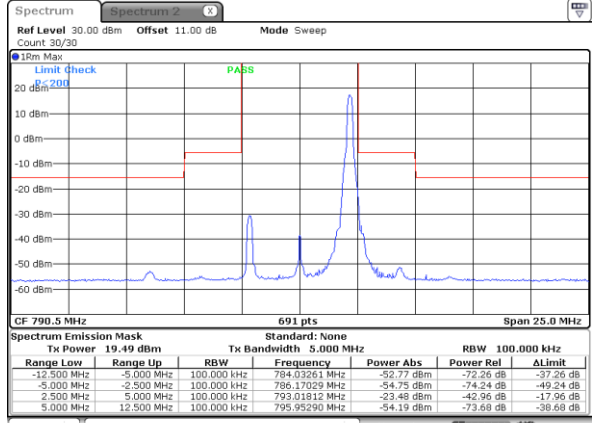


LTE Band 14 / 5MHz / 256QAM

Lowest Channel / 1RB

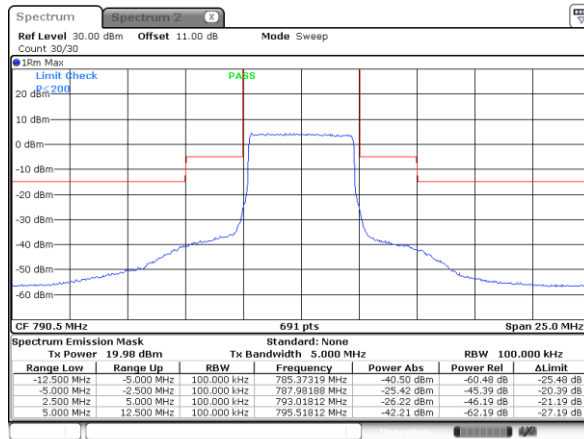


Date: 20,NOV,2024 15:03:33



Date: 20,NOV,2024 15:08:06

Lowest Channel / Full RB



Date: 20,NOV,2024 14:59:01